

Critical Release Notice

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The content of this customer NTP supports the
SN07 (DMS) software release.

Bookmarks used in this NTP highlight the changes between the NA015 baseline and the current release. The bookmarks provided are color-coded to identify release-specific content changes. NTP volumes that do not contain bookmarks indicate that the NA015 baseline remains unchanged and is valid for the current release.

Bookmark Color Legend

Black: Applies to new or modified content for NA015 that is valid through the current release.

Red: Applies to new or modified content for NA017 that is valid through the current release.

Blue: Applies to new or modified content for NA018 (SN05 DMS) that is valid through the current release.

Green: Applies to new or modified content for SN06 (DMS) that is valid through the current release.

Purple : Applies to new or modified content for SN07 (DMS) that is valid through the current release.

Attention!

Adobe Acrobat Reader 5.0 or higher is required to view bookmarks in color.

Publication History

Note: Refer to the NA015 baseline document for Publication History prior to the NA017 software release.

December 2004

Standard release 10.02 for software release SN07 (DMS). Updates made in the North America Data Schema Reference Manual are shown below

Volume 1

AINPRESC (new), ACDENLOG, ACDGRP, ACDLOGIN, ANNS

Volume 2

No changes

Volume 3

CMIPADDR, CUSTSTN option AINDENY

Volume 4

No changes

Volume 5

IBNFEAT feature ACD, IBNFEAT feature SUPR

Volume 6

IPAPPL (new), KSETFEAT feature SUPR, KSETFEAT feature IPCLIENT, KSETLINE feature ACD

Volume 7

No changes

Volume 8

MULTITM (new), OAFUNDEF, OANODINV

Volume 9

PADDDATA, QMSMIS

Volume 10

No changes

Volume 11

TOPSFTR, TOPTDROP, TRIGINFO, TRIGITM, TRKAIN

Volume 12

No changes

September 2004

Preliminary release 10.01 for software release SN07 (DMS). Updates made in the North America Data Schema Reference Manual are shown below

Volume 1

ACDENLOG, ACDGRP, ACDLOGIN

Volume 2

AUTHCDE

Volume 3

CUSTN, CUSTN option VOWDN (new)

Volume 4

DIRPOOL2 (new), DIRPPool, DNROUTE, DNROUTE feature VOWDN (new)

Volume 5

IBNFEAT feature ECM, IBNXLA

Volume 6

ISUPTRK, KSETFEAT feature ECM

Volume 7

LIUINV, LTCINV, MNHSCARR, MSCIDMAP (new), MSCINMAP (new)

Volume 8

MUMRTAB

Volume 9

RESFEAT

Volume 10

TDBDAOPT, TMTMAP

Volume 11

TOLLTRKS, TOPSFTR, TOPSPARM, TOPSTLDN

Volume 12

TRKOPTS, VOWINV (new), XLABILL (new), XLACCLASS (new)

March 2004

Standard release 09.03 for software release SN06 (DMS). Updates made in the North America Data Schema Reference Manual are shown below.

Volume 1

DCA references changed / made obsolete

Volume 2

CARRMTC, C7UPTMR

Volume 3

DCA references changed / made obsolete

Volume 4

DNROUTE, DNROUTE feature DISA

Volume 5-6

No changes

Volume 7

LNPOPTS, LTDATA

Volume 8

OPTOPT

Volume 9

PADDDATA, RDTINV

Volume 10

SUSHELF, SYNCLK, DCA references changed / made obsolete

Volume 11-12

No changes

September 2003

Standard release 09.02 for software release SN06 (DMS). Updates made in the North America Data Schema Reference Manual are shown below.

Volume 1

No changes

Volume 2

BCCODES

Volume 3

CSEDPMAP

Volume 4

DSLIMIT, FNPACONT.RTEREF

Volume 5

HNPACONT.RTEREF, IBNFEAT feature MWT, IBNLINES option MDN, IBNLINES option STN, IBNRTE selector CND, IBNRTE selector NOT, IBNXLA, IBNXLA selector FTR type LSPKP

Volume 6

ISDNPARM, ISERVOPT, KSETLINE

Volume 7

LENLINES, LTCINV, MNMGPIP

Volume 8

OFRT selector CND, OFRT selector NOT

Volume 9

No changes

Volume 10

STDPRCTCT.STDPRT selector E911

Volume 11

TODHEAD, TONES, TRKGRP E911, TRKGRP type IT

Volume 12

TRKOPTS, VFGDATA, VIRGRPS

June 2003

Preliminary release 09.01 for software release SN06 (DMS). Updates made in the North America Data Schema Reference Manual are shown below.

Volume 1

ACRTE, ALMSC, ALMSCGRP, ALMSD, ALDSDGRP, ANNAUDID (new), ANNMEMS, ANNPHLST (new)

Volume 2

No changes

Volume 3

CSEDPMAP (new), CUSTN option CFIND, DEFDATA

Volume 4

FNPACONT

Volume 5

HNPACONT, IBNFEAT feature CFIND, IBNLINES, IBNRTE selector CND, IBNRTE selector NOT

Volume 6

ISERVOPT, KSETLINE

Volume 7

LRGPINV (new), LTDATA, MNCKTPAK, MNIPPARM (new), MNNODE

Volume 8

OFRT selector CND, OFRT selector NOT

Volume 9

PADDDATA, REXSCHED

Volume 10

SERVSINV, SPMECAN, SPMLDVAL (new), STDPRTCT.STDPRT selector E911

Volume 11

TODHEAD, TONES, TRKGRP E911, TRKGRP type IT

Volume 12

TRKMEM, TRKOPTS, TRKSGRP, VFGDATA, VIRTGRPS

297-8021-351

DMS-100 Family

North American DMS-100

Customer Data Schema Reference Manual Volume 8 of 12

Data Schema MTAHORIZ-OPTOPT

LET0015 and up Standard 05.02 May 2001

DMS-100 Family

North American DMS-100

Customer Data Schema Reference Manual Volume 8 of 12

Data Schema MTAHORIZ-OPTOPT

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1 Data schema tables

The following pages contain the data schema tables.

MTAHORIZ

Table name

Metallic Test Access Horizontal Connection Table

Functional description

Table MTAHORIZ lists the assignment of horizontal agents, line test units (LTU), metallic (or multi-line) test units (MTU), operator verification, metallic jacks (MJACK), incoming test access trunks, extended metallic test access (MTA) and short circuits to a horizontal connection and horizontal group of metallic test access minibars (MTAM).

Different horizontal agents can use the same horizontal connection, but are associated with different MTAMs and horizontal groups. A maximum of 160 different horizontal agents are permitted for a given horizontal connection.

A maximum limit of 32 MTAMs can be multiplied (grouped) to connect to a single horizontal agent. A horizontal agent can be used only once.

Line test units for the host and remote locations are assigned to pseudo common language location identifier (CLLI) code LTU.

Metallic (or multi-line) test units for the host and remote locations are assigned to pseudo CLLI code MTU.

Operator verification trunks for the host switching unit are assigned to the pseudo CLLI code VER90.

The CLLI codes for operator verification trunk groups for remote locations are assigned by the operating company.

Metallic jacks are assigned to pseudo CLLI code MJACK.

The CLLIs for incoming test access trunks for the host and remote locations are assigned by the operating company.

MTAHORIZ (continued)

The assignment rules for table MTAHORIZ are as follows:

- There are no horizontal connections reserved for dedicated LTUs. Non-dedicated LTUs have no restrictions on assignment.

If the MTAM is a 2X50, the maximum number of lines for each LTU is governed by hardware restraints. One LTU is required for 6400 lines (10 line concentrating modules [LCM]) or any fraction of this.

If the MTAM is a 3X90BA, the recommended maximum number of lines for each LTU is 5120 (8 LCMs).

When a line test unit is assigned to the host switching unit, the horizontal connection to which it is assigned is multiplied to all minibar switches that are assigned to the host switching unit.

When a line test unit is assigned to a remote location, the horizontal connection to which it is assigned is multiplied to all minibar switches that are assigned to the remote location.

- If the minibar switch is located at the host switching unit, no assignment restrictions exist for the assignment of incoming test and operator verification trunks. One horizontal connection is required for each incoming test access trunk and operator verification trunk.

If the MTA configuration is small or medium, the horizontal connections to which the incoming test access and operator verification trunks are assigned are multiplied to all minibar switches that are located at the host switching unit. If the MTA configuration is large, see the "Large MTA configuration" section below.

- If the minibar switch is remote from the host switching unit, all horizontal connections are available for the assignment of incoming test access and operator verification trunks, as well as for the extension of the metallic test access feature.

One horizontal is required for each incoming test access trunk, operator verification trunk and for each vertical connection on the host minibar switch that is assigned to a horizontal connection on the minibar switch located at the remote or host location.

- The number of metallic jacks in each DMS office is restricted to 256.

For the assignment of the LTUs, incoming test access and operator verification trunks to trunk group, trunk subgroup and trunk member tables, see tables TRKGRP, TRKSGRP and TRKMEM respectively.

An LTU, MTU, or both must be entered in table TRKMEM before being added to table MTAHORIZ. If the LTU or MTU is deleted from the TRKMEM table,

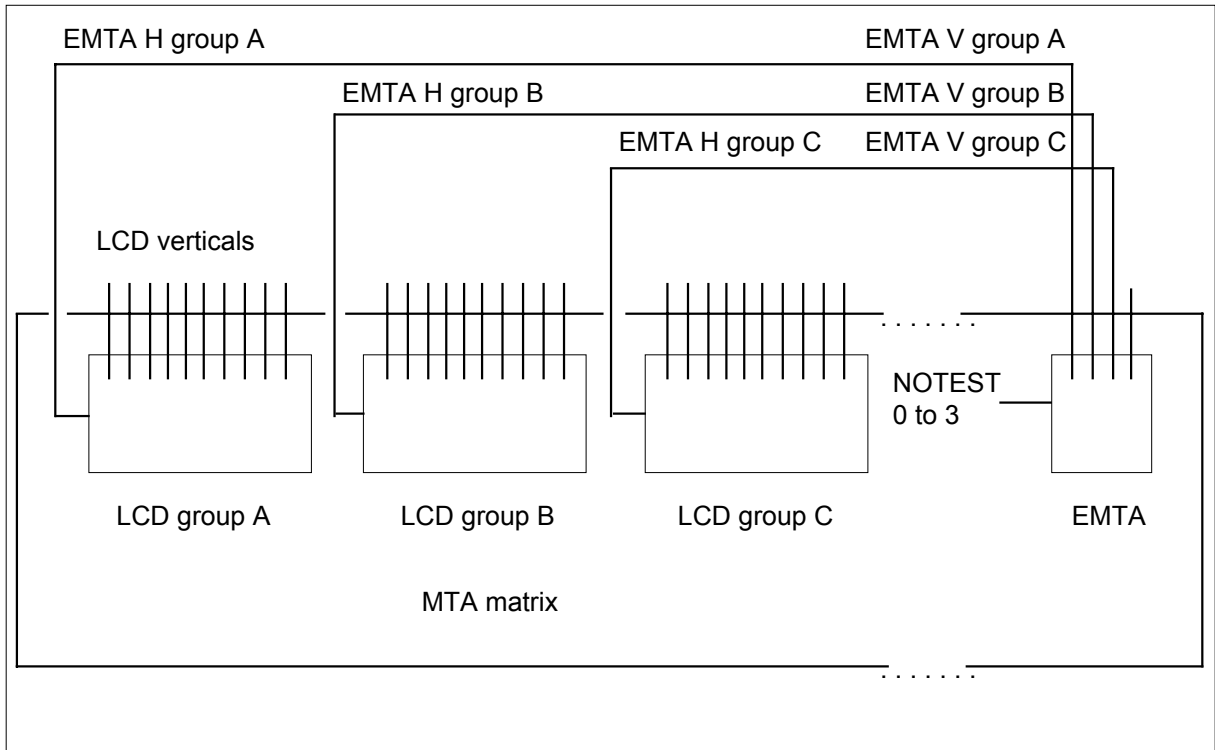
MTAHORIZ (continued)

the corresponding tuple in table MTAHORIZ is marked as deleted, but is automatically restored if the LTU or MTU is re-added to table TRKMEM.

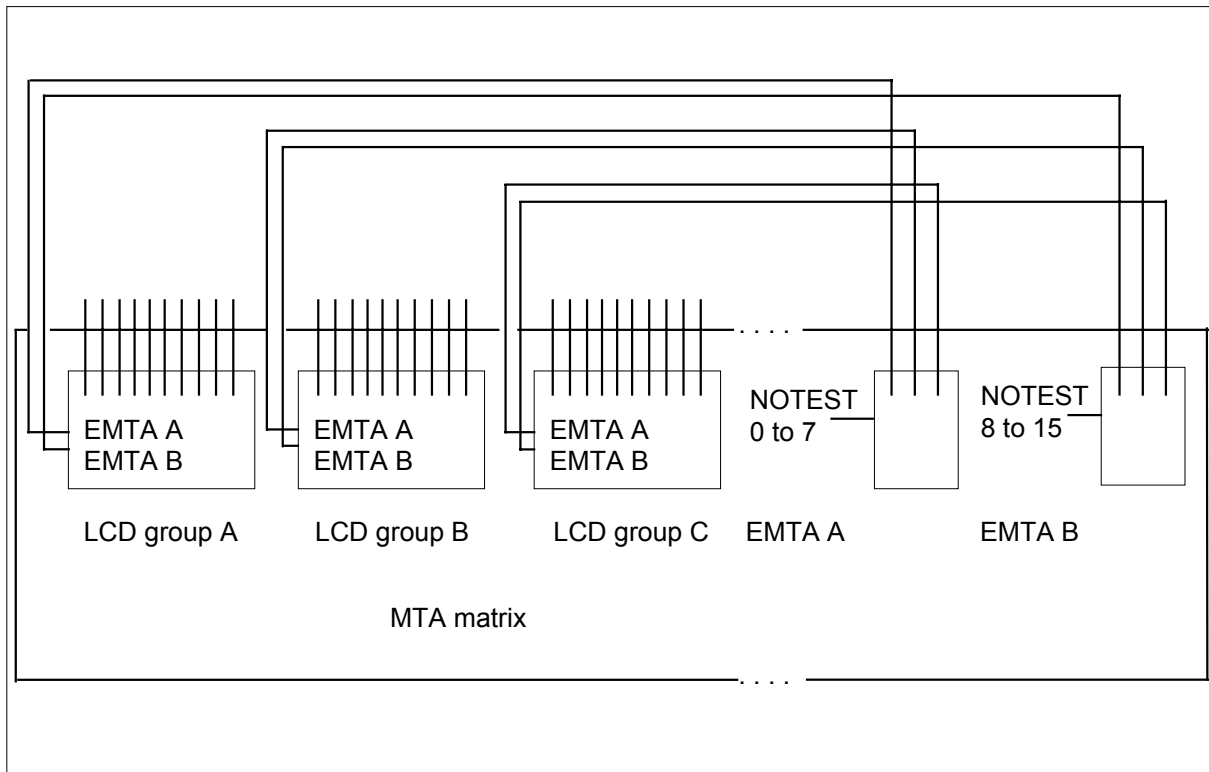
Large MTA con guration

A large MTA con guration is used if the vertical connections that are required to connect to the NOTEST trunk through the MTA exceed the MTAHORIZ limitation of 32 MTA drivers. The NOTEST trunk is placed on an extended metallic trunk access (EMTA), and the EMTA capability of connecting to line concentrating device (LCD) vertical connections is used as shown in the diagrams.

The following gure shows how the LCD group MTA drivers and the EMTA connections and MTA drivers connect. Figure xxxLCD connections to EMTA



If there are a large number of test access trunks, the previous solution could result in a large number of MTA drivers needed for the EMTA con guration. The number of MTA drivers for the EMTA can be reduced by breaking it into groups also, as shown in the following gure. Figure xxxMTA driver reduction through grouping

MTAHORIZ (continued)

For related information, refer to table MTAMDRVE.

Data II sequence and implications

The following tables must be data lled before table MT AHORIZ:

- MTAMDRVE
- MTAVERT
- TRKMEM
- TSTEQUIP

Table MTAHORIZ interacts with of ce parameter
CABLE_SHORT_TIMEOUT in table OFCENG (timed short circuit [eld
SELECTOR set to S]).

Table size

Memory for this table is dynamically allocated up to a maximum of 2000
tuples.

MTAHORIZ (continued)**Data II**

The following table lists data II for table MT AHORIZ.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
HORIZ		0 to 127	<i>Metallic test access horizontal connection</i> Enter the metallic test access (MTA) horizontal connection to which the test equipment (horizontal agent) is connected.
HORIZGRP		0 to 159	<i>Metallic test access horizontal group</i> Enter the horizontal group number which identifies the horizontal connection and its horizontal agent as a unique tuple. The horizontal group is used to assign different test equipment (horizontal agents) on the same MTA horizontal. A horizontal group can involve only one horizontal agent, but is cross-connected (multiplied) at the main distribution frame (MDF) to a single or a number of MTA minibar (MTAM) driver horizontal connections.
HORIZAGT		see subfield	<i>Horizontal agent</i> This field consists of subfield SELECTOR.
	SELECTOR	B, BBT, E, J, L, LA, MJ, NT1, S, T	<i>Selector</i> If the assignment is for a board-to-board dedicated horizontal connection, enter B and datafill refinement BBTNR, section "SELECTOR = B". If the assignment is for the MTA horizontal connections on a board-to-board testing (BBT) unit, enter BBT and datafill refinement BBTNR. If the assignment is to multiple a horizontal connection of a minibar switch from a host or remote connection to the vertical of a host minibar switch, enter E (extension of MTA) and datafill refinement EMTAVERT, section "SELECTOR = E".

MTAHORIZ (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	SELECTOR (continued)	B, BBT, E, J, L, LA, MJ, NT1, S, T	If a metallic connection to the tip and ring of the subscriber line is required, enter MJ and datafill refinements CLLI and MJACKNUM, in section "SELECTOR = MJ". Selector values J and LA are for licensee use only. If the assignment is for a line test unit (LTU) or metallic (or multi-line) test unit (MTU), enter L and datafill refinements CLLI, EXTRKNM, and ALTUSE in section SELECTOR = L". If the assignment is for a test NT1, enter NT1 and complete refinement NT1NUM in section "SELECTOR = NT1". If the assignment is for a timed short circuit (and the time is defined by the office parameter CABLE_SHORT_TIMEOUT in table OFCENG), enter S. No refinements require datafill. Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T". If the assignment is for an incoming test access or operator verification trunk, enter T and datafill refinements CLLI and EXTRKNM in section "SELECTOR = T".

SELECTOR = B

If the entry in field SELECTOR is B, datafill refinement BBTNR as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	BBTNR	0 to 7	<i>Board-to-board testing number</i> Enter the number of the board-to-board set with which this horizontal connection is associated. Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T".

MTAHORIZ (continued)**SELECTOR = BBT**

If the entry in field SELECT OR is BBT, data refinement BBTNR as described below.

Field descriptions for conditional data II (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
	BBTNR	0 to 7	<i>Board-to-board testing number</i> Enter the number of the board-to-board set with which this horizontal connection is associated.
	CLLI_NAME	alphanumeric	<i>Common language location identifier</i> This subfield specifies the CLLI name of the BBT outgoing trunk.
	EXTRKNM	0 to 9999	<i>External trunk number</i> This subfield specifies the external trunk number assigned in table TRKMEM to the BBT outgoing trunk.
	PREDIAL_ DELAY	0 to 300	<i>Predial delay</i> This subfield specifies the time in hundreds of milliseconds between sending an off-hook by the DMS switch on the no-test trunk to the old office and outpulsing of digits on that trunk. For example, an input of 2 gives a delay of 200 milliseconds.
	SDMEM	0 to 511	<i>Signal distribution member</i> This subfield specifies the group number associated with the primary SD circuit of an NT2X57 card connected to this BBT test unit previously datafilled in table SDGRP.
	SCMEM	0 to 511	<i>Scan detector member</i> This subfield specifies the group number associated with the primary SC circuit of a NT0X10 card connected to this BBT test unit previously datafilled in table SCGRP.
	DISC_ RELAY	A, K	<i>Disc relay</i> This subfield specifies the relay in the NT5X73AB BBT test unit which, when operated, disconnects the BBT test unit from the old office. The default is the A relay.

MTAHORIZ (continued)**Field descriptions for conditional data II (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	DISC_TIME	1 to 300	<i>Disc time</i> This subfield specifies the time in 100-millisecond increments required for the old office to properly release once a disconnect signal has been received from the DMS switch.
	OFFICE TYPE	SxS, XBAR, ESS, DMS, and OTHER	<i>Office type</i> This subfield specifies the information required by the BBT software to communicate with the old office. The old offices are categorized as SxS, XBAR, ESS, DMS, and OTHER.
	OPTIMIZE_OUTPULSING	Y or N	<i>Optimized outpulsing</i> This subfield specifies if the old office uses optimized outpulsing. This subfield is displayed only for SxS offices.
	DIGSOUT	0 to 18	<i>Digit number</i> This subfield specifies the number of digits that must be outpulsed by the DMS switch to connect to a line in the old office.
	AT_HOST	YES or NO	<i>At host</i> This subfield specifies if the ABBT test unit is located at the host site.
	RELAY_DELAY	0 to 100	<i>Relay delay</i> This subfield specifies the time in 100-millisecond increments for a signal output from an SD point of the host DMS switch to travel to the BBT test unit located at a remote site and operate a relay in the BBT test unit. For example, an input of 2 specifies a delay of 200 milliseconds. The prompt appears only if the BBT test unit is located at a remote site (AT HOST=NO).

MTAHORIZ (continued)**Field descriptions for conditional data II (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	SCAN_ DELAY	0 to 10	<i>Scan delay</i> This subfield specifies the time in 100-millisecond increments for a signal generated by an ABBT test unit located at a remote site to travel to a SCAN point of the host DMS switch and be read. For example, an input of 2 specifies a delay of 200 milliseconds. The prompt appears only if the ABBT test unit is located at a remote site (AT HOST=NO).
	VERT	0 to 639	<i>Vertical</i> This subfield is the starting vertical number on the MTA driver.
	NBRVERTS	0 to 640	<i>Number verticals</i> This subfield is the number of verticals for the MTA driver. Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T".

SELECTOR = E

If the entry in field SELECTOR is E, data II refinement EMTA VERT as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	EMTAVERT	0 to 1023	<i>Extended metallic test access column</i> Enter the associated vertical connection on the MTA in the host to which the horizontal connection is connected. Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T".

MTAHORIZ (continued)**SELECTOR = L**

If the entry in field SELECTOR is L, data II refinements CLLI, EXTRKNM, and ALTUSE as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	CLLI	LTU or MTU	<i>Common language location identifier</i> If the assignment is for an LTU, enter the pseudo common language location identifier (CLLI) code LTU. If the assignment is for an MTU, enter the pseudo CLLI code MTU. The pseudo CLLI codes must be previously entered in table CLLI.
	EXTRKNM	0 to 9999	<i>External trunk number</i> Enter the external trunk number assigned in table TRKMEM to the LTU or MTU.
	ALTUSE	Y or N	<i>Automatic line test use</i> Enter Y (yes) to use the line test equipment for automatic line testing. Otherwise, enter N (no). Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T".

MTAHORIZ (continued)**SELECTOR = MJ**

If the entry in field SELECT OR is MJ, data elements CLLI and MJACKNUM as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	CLLI	MJACK	<i>Common language location identifier</i> If the assignment is for a metallic jack, enter the pseudo common language location identifier (CLLI) code MJACK. The pseudo CLLI code must be previously entered in table CLLI.
	MJACKNUM	1 to 256	<i>Metallic jack number</i> Enter the metallic jack number. Note: The vertical connection to which the horizontal connection is being extended, must be previously datafilled as an EMTA vertical connection in table MTAVERT. Go to field MTAGRP on page Section , "SELECTOR = B, BBT, E, LA, MJ, S, T" on page -13.

SELECTOR = NT1

If the entry in field SELECT OR is NT1, data element NT1NUM as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	NT1NUM	0 to 255	<i>Network termination 1 number</i> Enter the number of the test network termination 1 (NT1) in the DMS testing system with which this horizontal connection is associated. Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T".

MTAHORIZ (continued)**SELECTOR = T**

If the entry in field SELECT OR is T, data elements CLLI and EXTRKNM as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	CLLI	alphanumeric (up to 16 characters) or VER90	<i>Common language location identifier</i>If the assignment is for the host operator verification trunk, enter the pseudo common language location identifier (CLLI) code VER90. If the assignment is for an operator verification trunk for a remote location, or an incoming test access trunk, enter the pseudo CLLI code previously datafilled in table CLLI. The pseudo CLLI codes must be previously entered in table CLLI.
	EXTRKNM	0 to 9999	<i>External trunk number</i>Enter the external trunk number assigned in table TRKMEM to the operator verification trunk or the incoming test access trunk. Go to field MTAGRP in section "SELECTOR = B, BBT, E, LA, MJ, S, T"..

SELECTOR = B, BBT, E, LA, MJ, S, T

If the entry in field SELECTOR is B, BBT, E, LA, MJ, S, or T (all valid entries except NT1), data element MTAGRP as described below.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
MTAGRP		see subfields	<i>Metallic test access group</i> This field consists of a list of MTA drivers that multiple to the test equipment and is a vector of up to 32 multiples of subfields MTAMEM and HORIZ. If less than 32 multiples are required, end the list with a \$ (dollar sign).

MTAHORIZ (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	MTAMEM	0 to 511	<i>Metallic test access minibar driver member</i> Enter the metallic test access minibar (MTAM) driver member number to which the horizontal connection is connected.
	HORIZ	0 to 127	<i>Horizontal</i> This read-only field gives information about the MTA drivers physical horizontal connection. Enter 0 (zero) to satisfy table control. Any entry outside the range indicated for this field is invalid.

Data II e xample

An example of data II for table MT AHORIZ is shown below.

The example shows an addition to table MTAHORIZ. The value in eld HORIZ is entered which is part of the vector of eld MT AGRP. After the values have been input, a display of the table shows the actual horizontal connection on the physical driver.

MAP display example for table MTAHORIZ

HORIZ	HORIZGRP	HORIZAGT	MTAGRP
3	159	BBT 0 BBTOUT 0 8 0 0 A 12	
		DMS Y 7 YES 24 4 (6 3) \$	

MTAHORIZ (end)

Table history
NA002

The following changes were made to table MTAHORIZ:

- Entry BBT, with an action paragraph, was added under sub eld SELECTOR of eld HORIZA GT.
- The section SELECTOR=BBT, with its sub elds and e xplanations, was added.
- A new MAP display for data lling table MT AHORIZ was added.

MTAMDRVE

Table name

Metallic Test Access Minibar Driver Table

Overview

The metallic test access (MTA) is a matrix of vertical and horizontal crosspoints (comparable to a minibar) which can connect specified verticals to horizontals within the MTA. It connects test equipment to a circuit that requires testing in cases where the test equipment is connected to a horizontal, and the circuit that requires testing is connected to a vertical.

An MTA of the required size is constructed through the interconnection of a number of smaller minibar circuits. The DMS-100 switch has three circuit elements that can be used as building block components in the construction of an MTA. These elements, which are referred to as MTA minibar drivers (MTAM), are described by product engineering code (PEC) in the following table.

MTA minibar drivers (Sheet 1 of 2)

Model (PEC)	Function	Description
NT2X50AB	minibar driver	This is a 20 vertical by 16 horizontal circuit that has two components: cards NT2X46 and NT2X50AB. NT2X46 is the physical minibar. Located in a miscellaneous frame, it receives crosspoint connection requirements from the NT2X50AB control card and makes the corresponding connections. The NT2X50AB is a single package card that requires one slot in a peripheral module (PM) shelf. The MTA uses the control card to request crosspoint connections or disconnections on the minibar.
NT3X09AA	remote metallic test access	This is a four vertical by eight horizontal (see note) circuit that allows MTA access on remote line concentrating devices (RLCDs). Relays on this circuit card handle the crosspoint connections. The NT3X09AA is a single card package that requires one slot in the PM shelf.

MTAMDRIVE (continued)

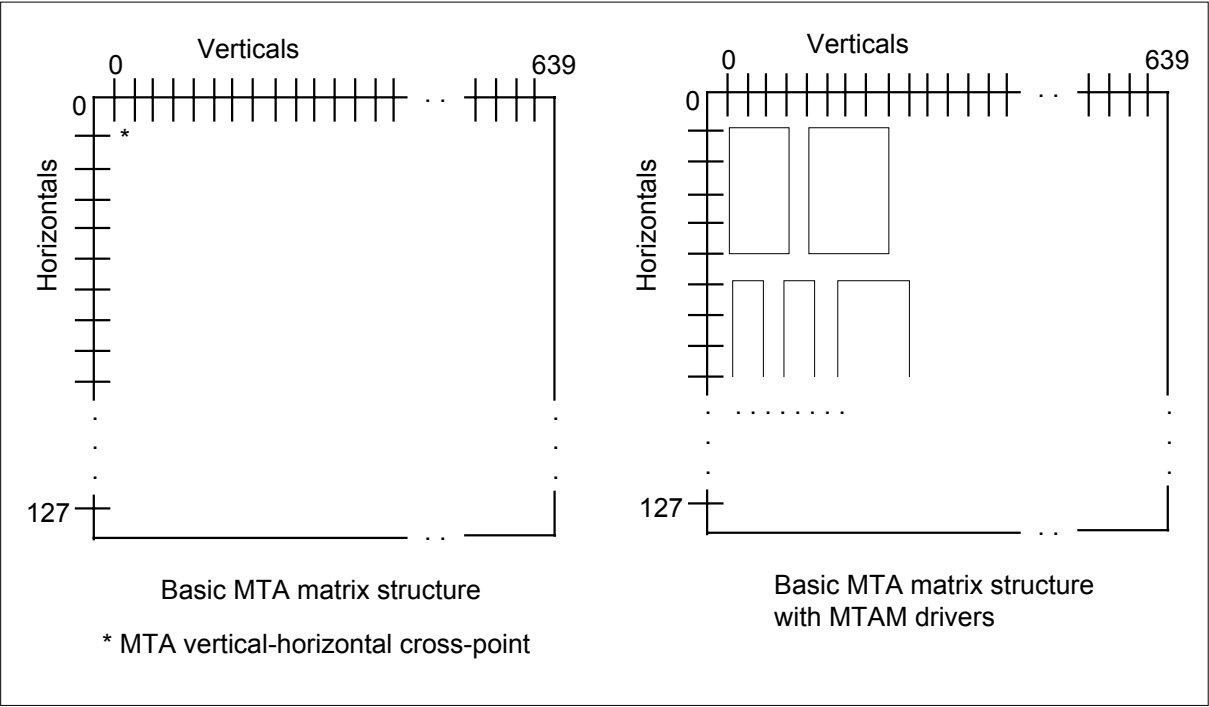
MTA minibar drivers (Sheet 2 of 2)

Model (PEC)	Function	Description
NT3X09BA	8x8 remote metallic test access	Note: Although software uses this circuit as a four vertical by eight horizontal minibar, the physical wiring (hardware design) is eight verticals by four horizontals. This is an eight vertical by eight horizontal circuit. The physical package is similar to the 3X09AA. Relays on this circuit card handle the crosspoint connections.

The minibar components are interconnected to construct an MTA using the main distribution frame (MDF). The MDF has connections to all circuits and PMs in a switch and connects the various circuits together. This type of connection is known as a cross-connect.

In the case of MTAMs, each vertical and horizontal is wired to the MDF and cross-connects are made between various MTAMs. These MTAMs are data lled as being part of the MT A. A large MTA can be constructed using this approach.

Basic MTA matrix



MTAMDRVE (continued)

Building the MTA structure

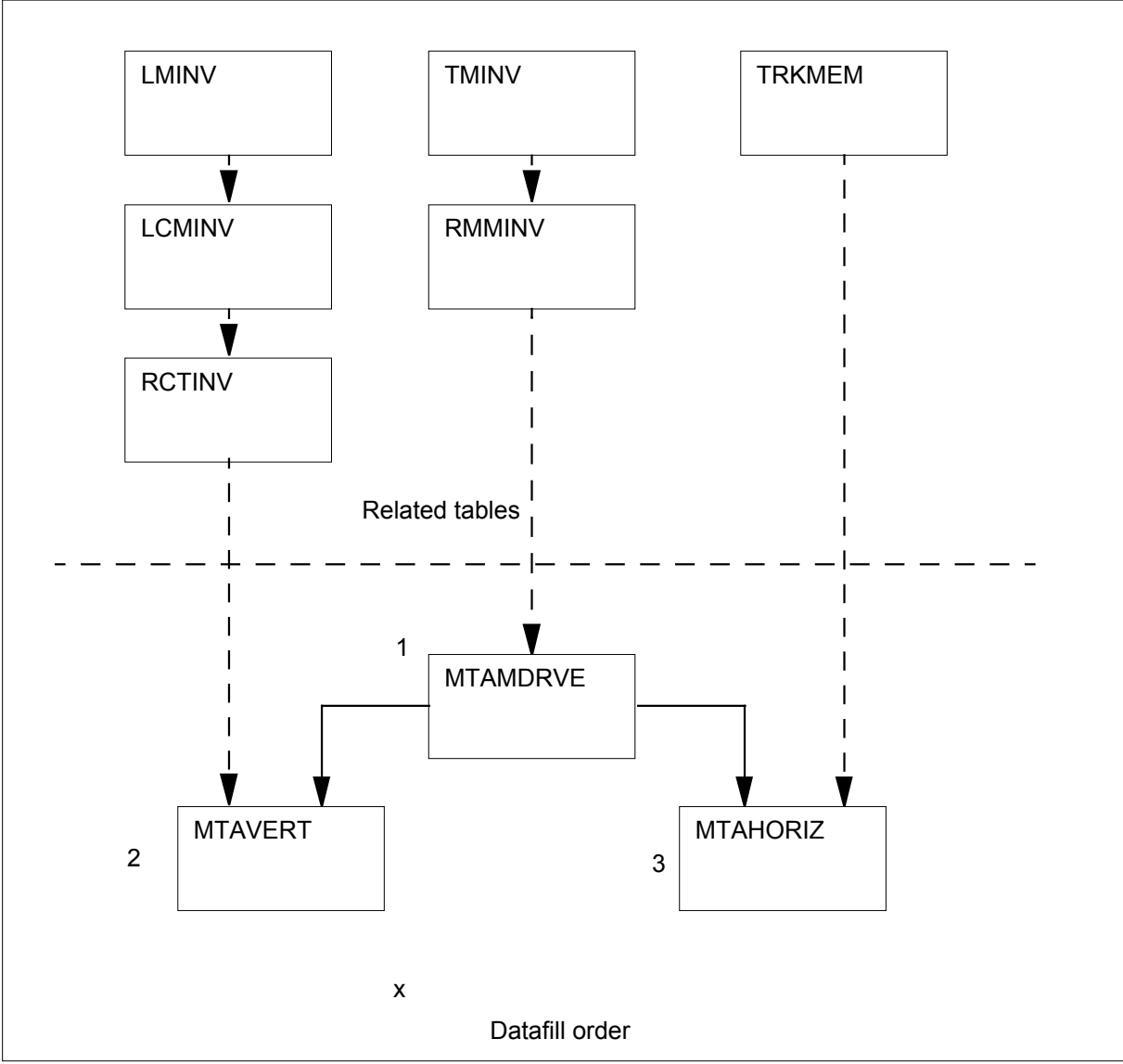
The MTA requires three tables to define all the connections involved. The use of these tables is described in the following table and figure.

MTA table structure

Table name	Description
MTAMDRVE	Datafiled to locate an MTAM driver in the MTA structure.
MTAVERT	Datafiled to define the physical vertical connections on the MTA.
MTAHORIZ	Datafiled to define the physical horizontal connections on the MTA.

MTAMDRVE (continued)

Basic system and MTA table relationship



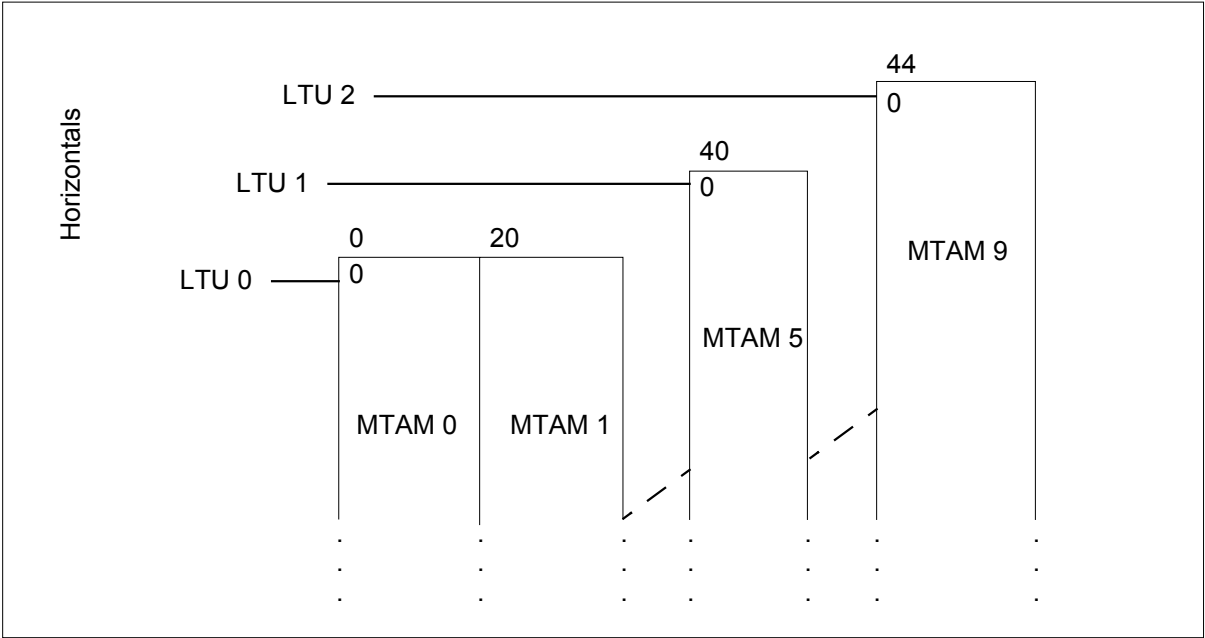
Horizontal groups

The horizontal group provides a method of assigning different test equipment (horizontal agents) on the same MTA horizontal. A horizontal group can involve only one horizontal agent, but is cross-connected (multiplied) at the MDF on one or more MTAM driver horizontals, as shown in the following two figures.

In the following figure, each horizontal agent relates as a horizontal group on the MTA. This figure is the same as remote usage.

MTAMDRVE (continued)

MTA horizontal groups



The following examples show data ll for the previous diagram (not including table MTAVERT).

MTAMDRVE (continued)

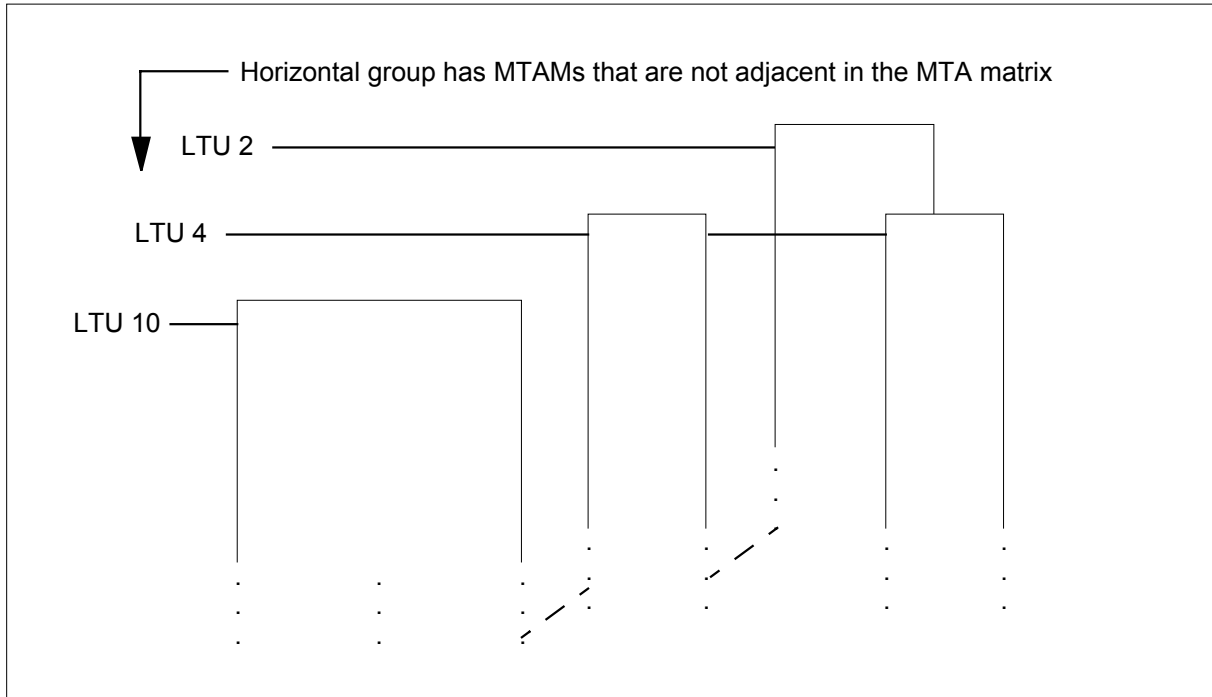
MTAMEM	VERT	HORIZ	TMTYPE	TMNO	TMCKTNO	MTACARD
0	0	0	MTM	n	n	2X50AB
1	20	0	MTM	n	n	2X50AB
5	40	0	RMM	n	n	3X09AA
9	44	0	RMM	n	n	3X09BA

HORIZ	HORIZGRP	HORIZAGT	MTAGRP
0	0	L	LTU 0 (0 0) (1 0)\$
0	0	L	LTU 1 (5 0)\$
0	0	L	LTU 2 (9 0)\$

The following figure also shows the cross-connections of horizontal groups.

MTAMDRVE (continued)

MTA horizontal group multiplied over MTAMs



Extended MTA (EMTA)

The main use of the extended MTA is for NOTEST trunks. These trunks are used for local test cabinet, line test desk, repair and verification access, and mechanized loop test access. The interface is similar in all cases and works in the following manner:

- The trunk is seized by the far-end of ce, and digits are collected. The digits identify a line that resides on the switch.
- A metallic MTA connection is made between the NOTEST trunk and the line.

There are two reasons for using the extended MTA capabilities to make the metallic MTA connection between the NOTEST trunk and the line. These are as follows:

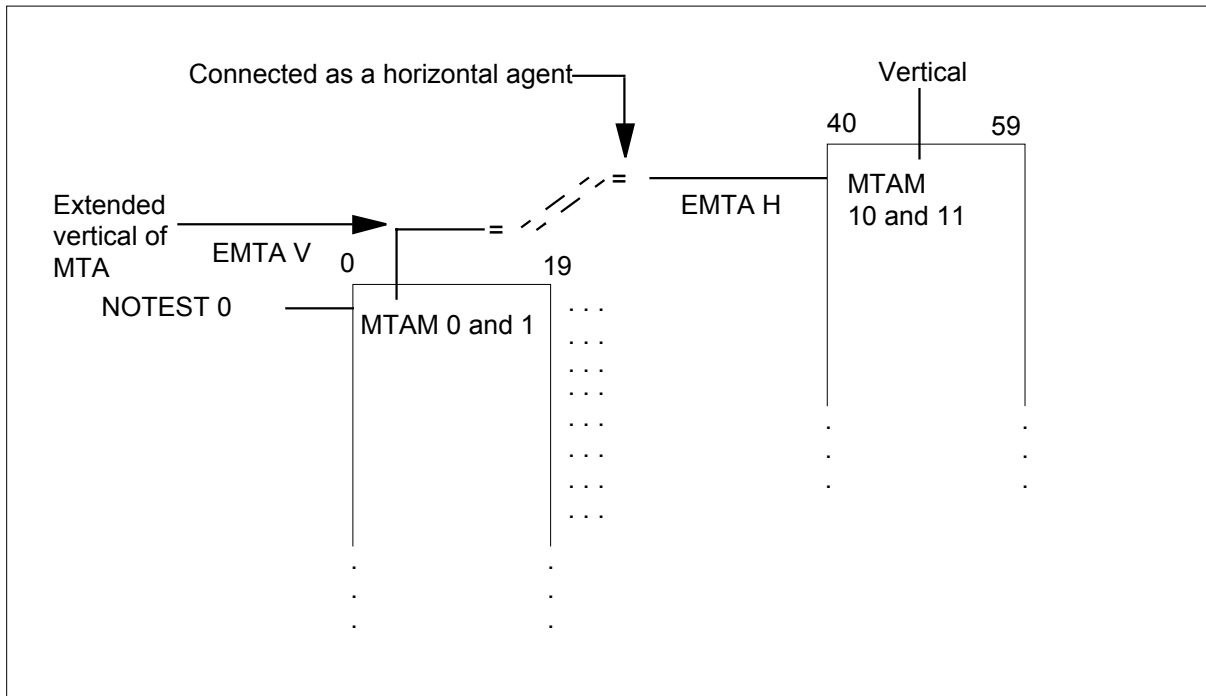
- A remote site has no room to support its own NOTEST trunk circuit.
- The NOTEST trunk accesses ALL lines on a site or in the of ce.

In both cases, connectivity issues must be addressed if a large MTA structure is required due to a large number of lines. The extended MTA overcomes some of the connectivity issues. See the "Large MTA con guration" section in this table description.

MTAMDRIVE (continued)

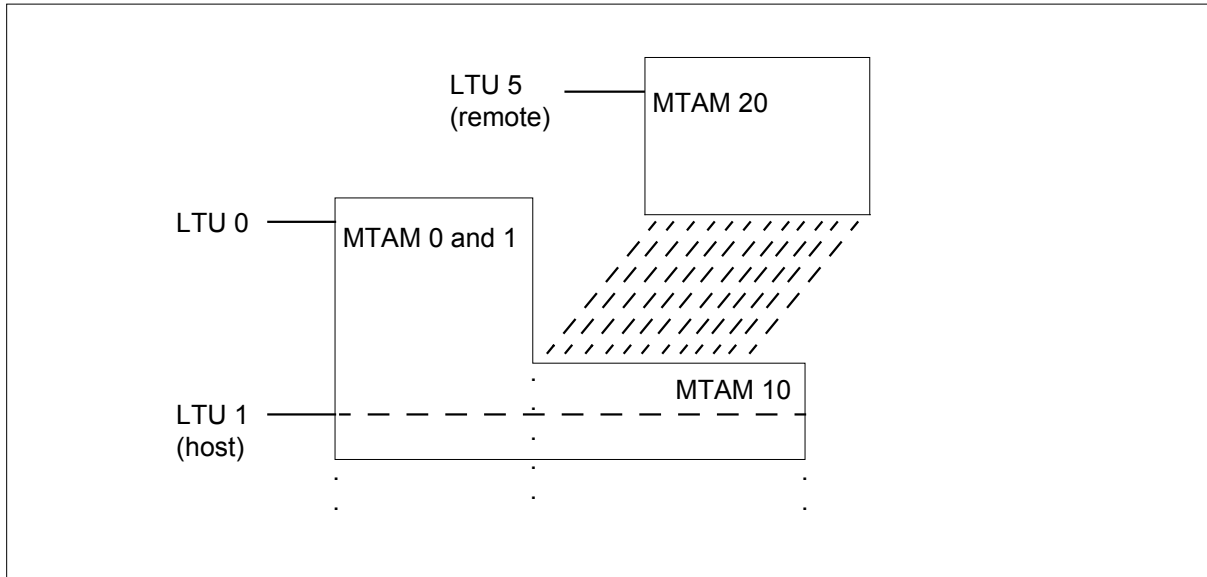
If a vertical is either a host or remote vertical, the extended MTA connection connects the vertical to a horizontal as a horizontal agent at host.

Only one EMTA connection at a time is allowed between a horizontal agent and a vertical. An EMTA horizontal and line test equipment (LTUs and MTUs) cannot make extended MTA connections to get a metallic connection.

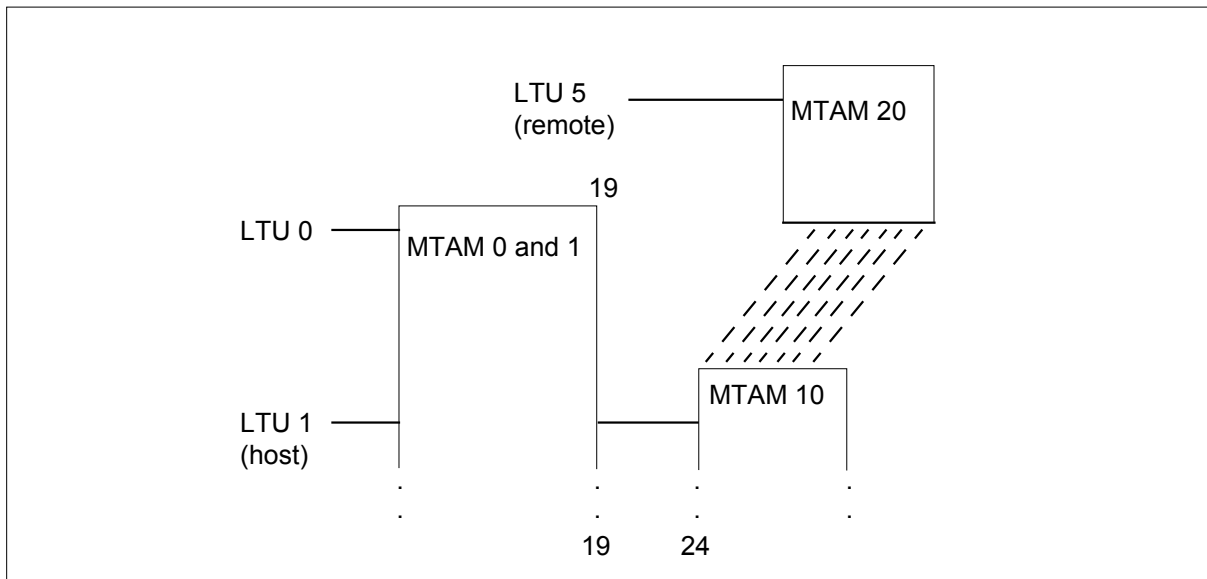
MTA horizontal group multiplied over MTAMs**Vertical at remote and host**

The following figures show the verticals served by the remote and the host verticals.

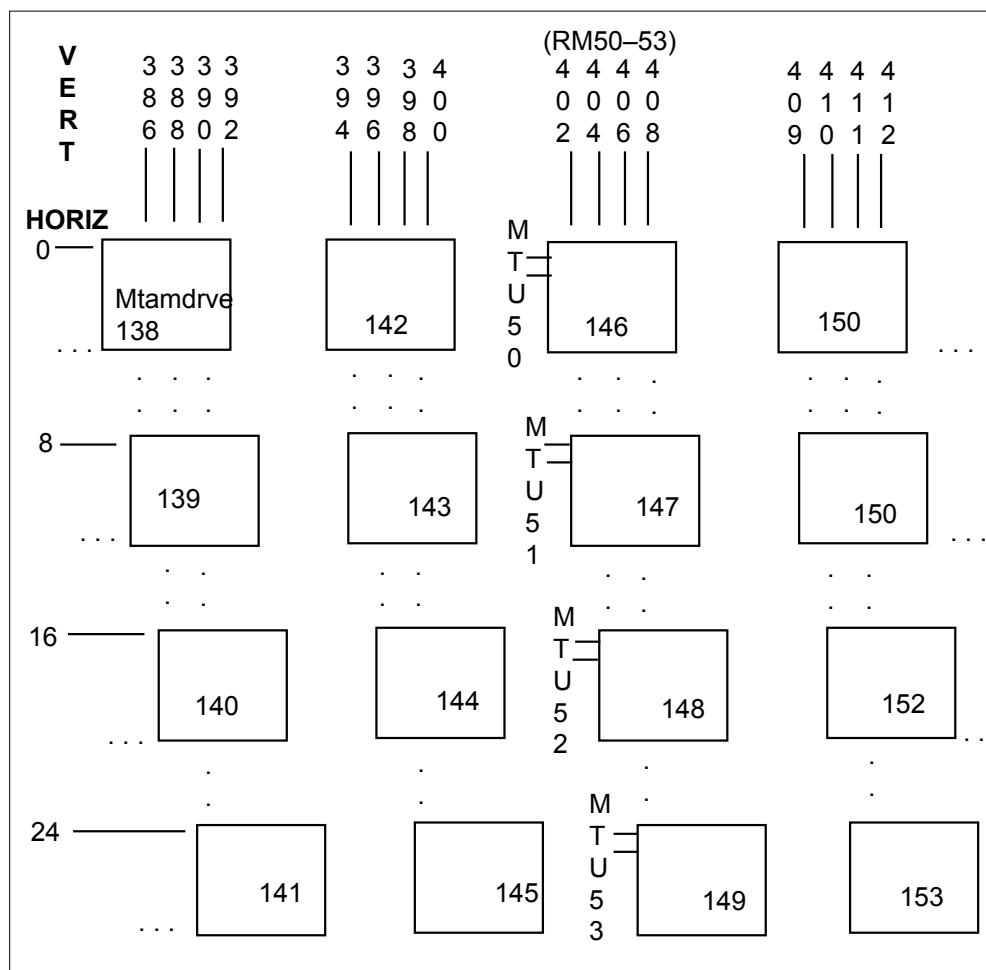
Note: In the first figure, MTAM 0 and 1 has MTAM 10 directly adjacent.

MTAMDRVE (continued)**Verticals served by remote and host**

In the following example, verticals 20 through 23 are not used.

Verticals served by remote and host**Many remotes in an MTA**

An MTA can support up to a maximum of 509 remotes, by adding up to four horizontal rows with an offset of two verticals. This configuration works with either NT3X09AA or NT3X09BA MTAMDRVE cards. See the following figure.

MTAMDRVE (continued)**Example configuration for an MTA with many remotes**

The following MAP display example shows table MTAMDRVE data for the previous example.

Data example for table MTAMDRVE

MTAMEM	VERT	HORIZ	TMTYPE	TMNO	TMCKTNO	MTACARD
146	402	0	RMM	50	18	3X09BA
147	404	8	RMM	51	18	3X09BA
148	406	16	RMM	52	18	3X09BA
149	408	24	RMM	53	18	3X09BA

MTAMDRVE (continued)

The following MAP display example shows table MTAHORIZ data for the previous example.

Data file example for table MTAHORIZ

HORIZ	HORIZGRP	HORIZAGT				MTAGRP		
0	5	L	MTU	50	Y	(146 0)	\$	
8	5	L	MTU	51	Y	(147 0)	\$	
16	5	L	MTU	52	Y	(148 0)	\$	
24	5	L	MTU	53	Y	(149 0)	\$	

The following MAP display example shows table MTAVERT data for the previous example.

Data file example for table MTAVERT

VERT	VERTCONN						
402			S	L	RM50	0	0
404			S	L	RM51	0	0
406			S	L	RM52	0	0
408			S	L	RM53	0	0

Large MTA configuration

The size of an MTA depends on the size of an office and the number of verticals required to serve the LCDs. If dealing with large MTA configurations, there are two issues that require consideration:

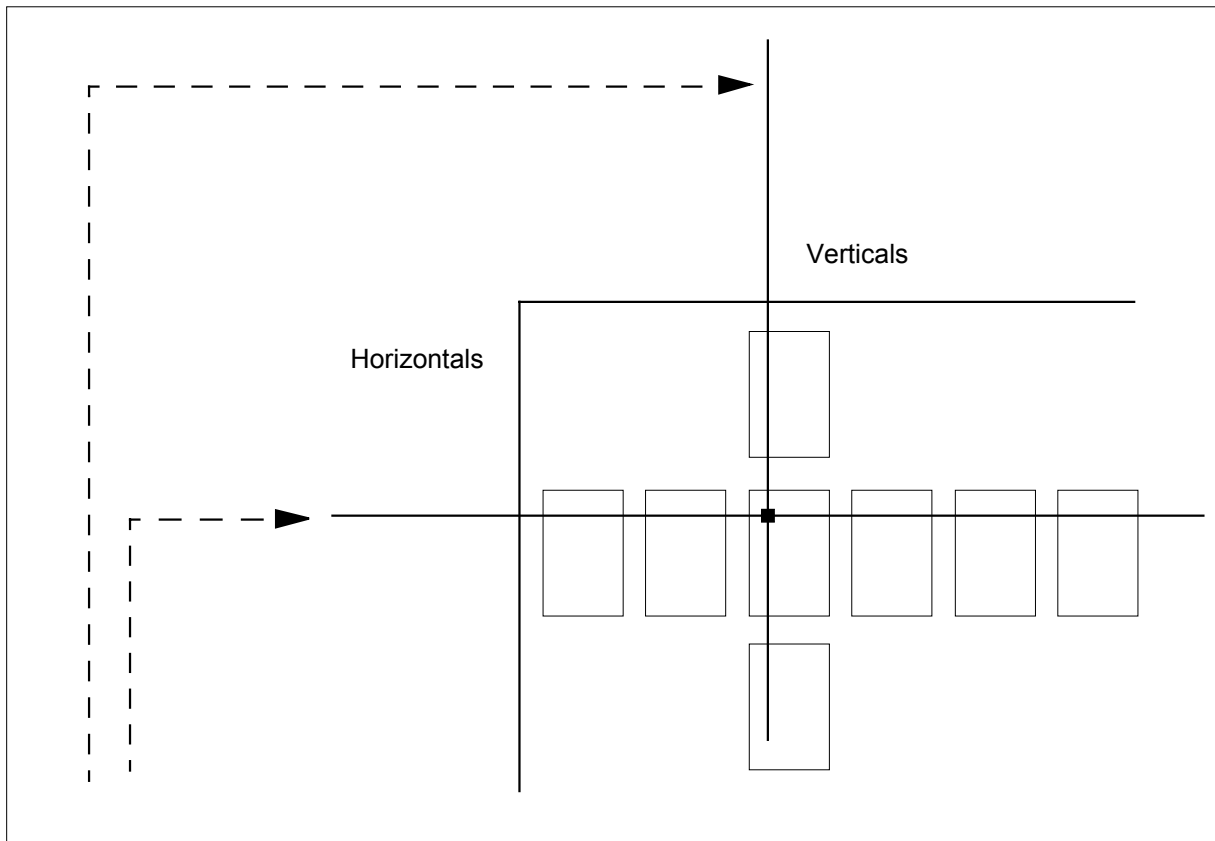
- The MTA drivers that are multiplexed introduce extra cable into the metallic connections that use the MTA. This extra cable must be taken into account when measurements are involved.
- The number of verticals that can connect to a horizontal agent is limited. The limitation depends upon the type of MTA drivers associated with the horizontal agent and the first consideration above.

The first consideration is of primary importance because it imposes a physical hardware constraint. This constraint makes it necessary to engineer on a switch basis to satisfy MTA requirements that are different for each switch.

MTAMDRVE (continued)**Connection considerations**

An individual crosspoint has multiple connections to all vertical and horizontal MTA drivers associated with the crosspoint vertical and horizontal.

When determining the physical hardware constraints, all vertical MTA drivers, horizontal MTA drivers and the interconnecting cabling require consideration, as shown in the following figure.

Crosspoint connections

If EMTA connections are involved, extended connections also require consideration, as shown in the following figure.

A schematic diagram showing a 2D grid of rectangular cells. The grid is divided into four quadrants by a central horizontal and vertical axis. The horizontal axis is labeled 'EMTA H' and the vertical axis is labeled 'EMTA V'. Dashed arrows point from the left edge of the grid towards the center, indicating a direction of flow or measurement. The grid is composed of solid lines, and the central intersection is marked with a small black square.

Horizontal agent considerations

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MTAMDRIVE (continued)

This limit depends on the connection considerations of the MTA. If the LTE has too many connections, measurements on loops are incorrect or inaccurate. The recommended equipment for an office is one LTE for every 5 120 lines and one extra rover LTE for every 20 000 lines. LTEs must be equipped in accordance with operating company requirements and the setup of the MTA matrix in the switch.

Other types of horizontal agents (such as the test access or verification trunk) require the capability of connecting to all LCDs that are located at the same site. In cases where agents such as these are used and the number of verticals and MTA driver limits can be met, rearrangement of the MTA is required. The rearrangement uses the extended MTA capabilities of the MTA matrix.

Example

The following example illustrates the interconnection of MTAs to meet the requirements of an application.

A switch has 155 LCMs and 3X09BA MTA drivers. The 155 LCMs require 310 of the MTA matrix verticals (two verticals for each LCM). Thirty-nine MTA drivers are required to serve the 310 verticals. Table MTAHORIZ allows the data lling of up to 32 MT A drivers for a given horizontal agent.

Four test access trunks require connection capability to the 155 LCMs (all HOST site). There is a physical cabling constraint that prevents more than 15 MTA drivers from being multiplied in this of ce.

Based on the above information, the following approach can be taken:

Because of the 15 MTA driver cabling constraint, three groups of multiplied MTA drivers are needed in order to meet the 39 MTA driver requirement. These groups are referred to in this example as LCD groups A, B, and C.

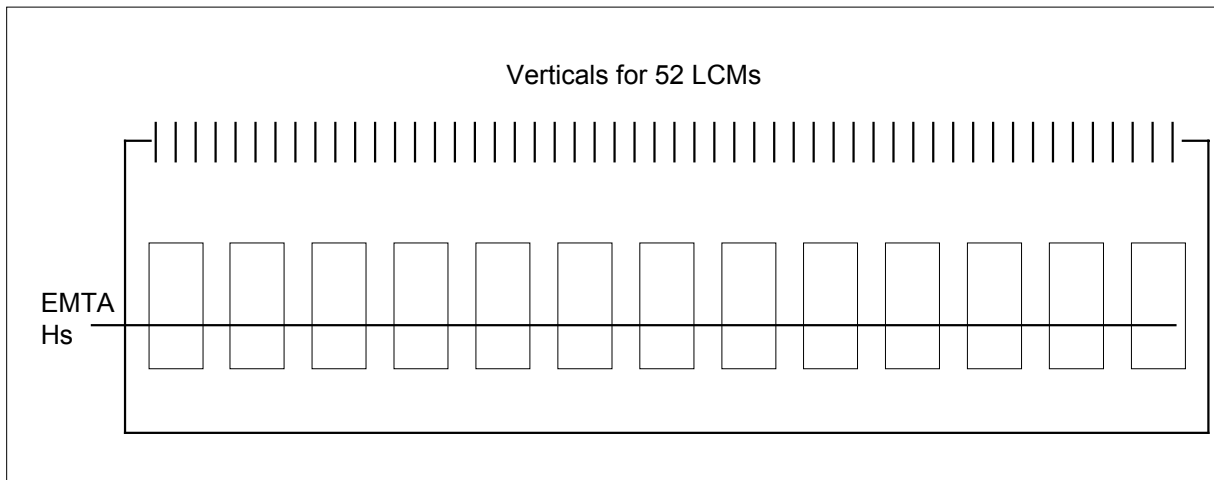
Each LCD group requires connection capability to the test access trunks. Extended MTA capabilities can be used to meet this requirement. Three LCD groups times four test access trunks equals 12 additional verticals for the EMTA verticals. Two MTA drivers are needed.

As the EMTA vertical uses two MTA drivers and the of ce only allo ws 15 MTA drivers to be multiplied, 13 drivers for each of the groups A, B, and C are allowed. This group of 13 drivers has the corresponding EMTA horizontal.

Each LCD group (A, B, and C) of 13 MTA drivers is shown in the following gure.

MTAMDRVE (continued)

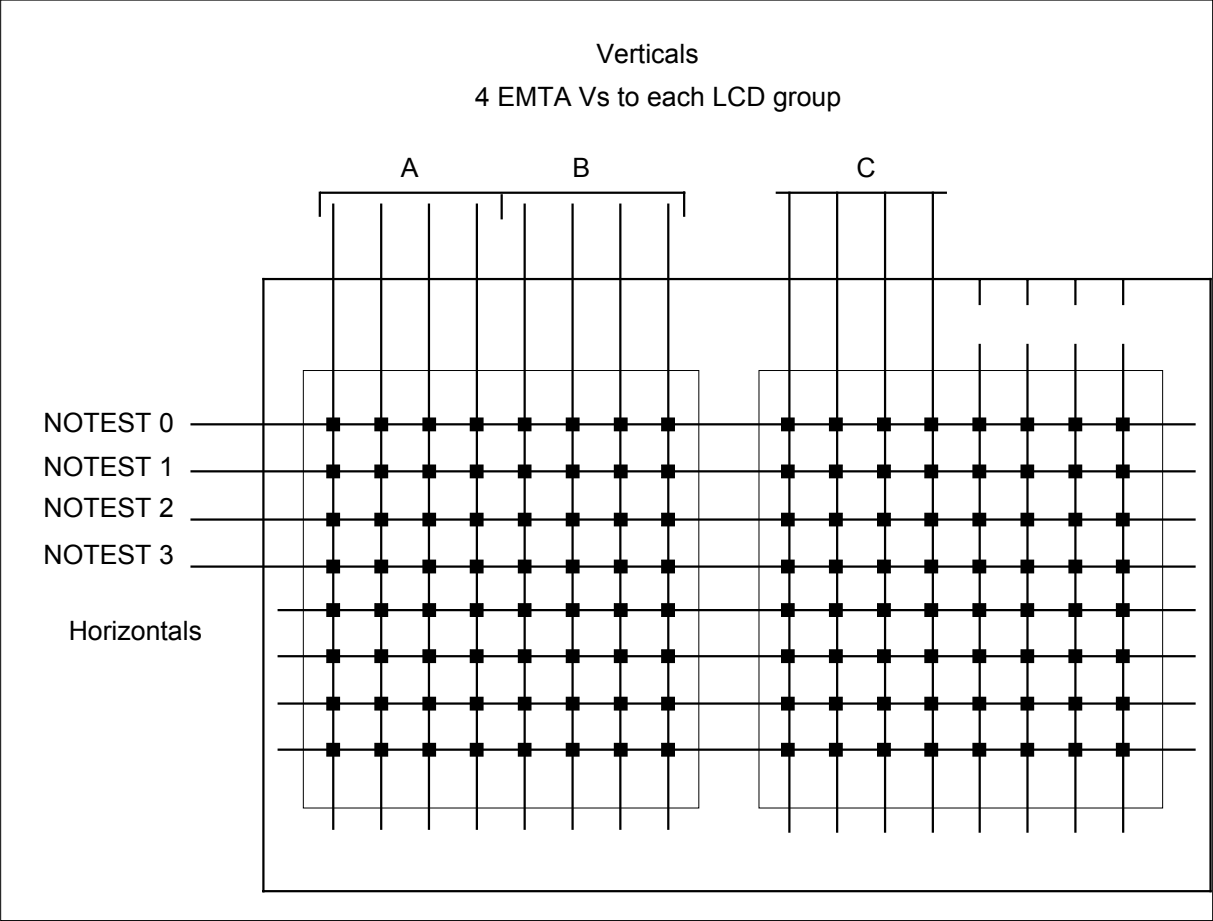
LCD group



An area in the MTA matrix must be dedicated for the EMTA and test access trunk connections, as shown in the following figure.

MTAMDRIVE (continued)

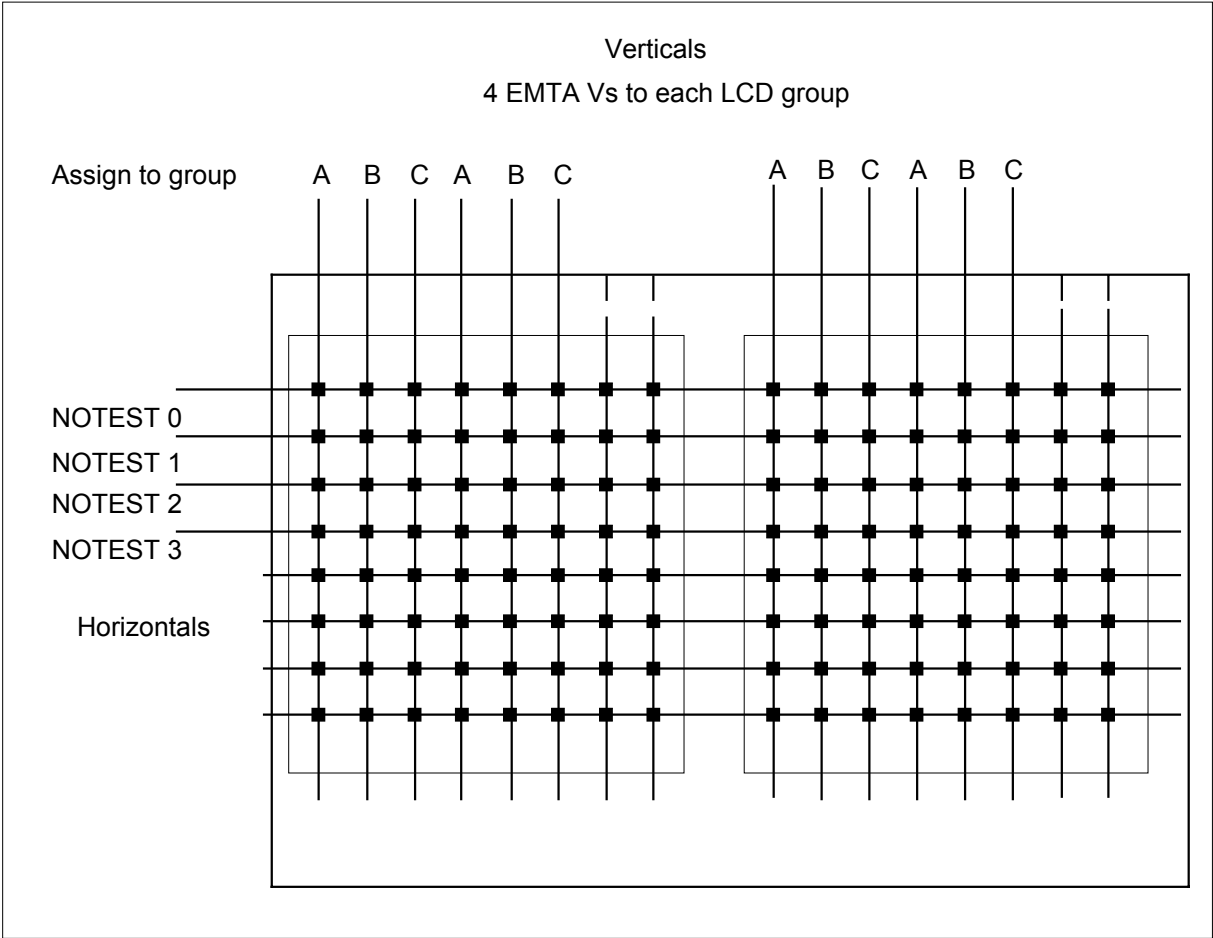
MTA matrix area for EMTA and test access trunk connections



For better access reliability, distribute the EMTA verticals so that they are not concentrated on a particular MTA driver. In the event that an MTA driver is unavailable, access using the other driver or drivers is possible. See the following figure.

MTAMDRIVE (continued)

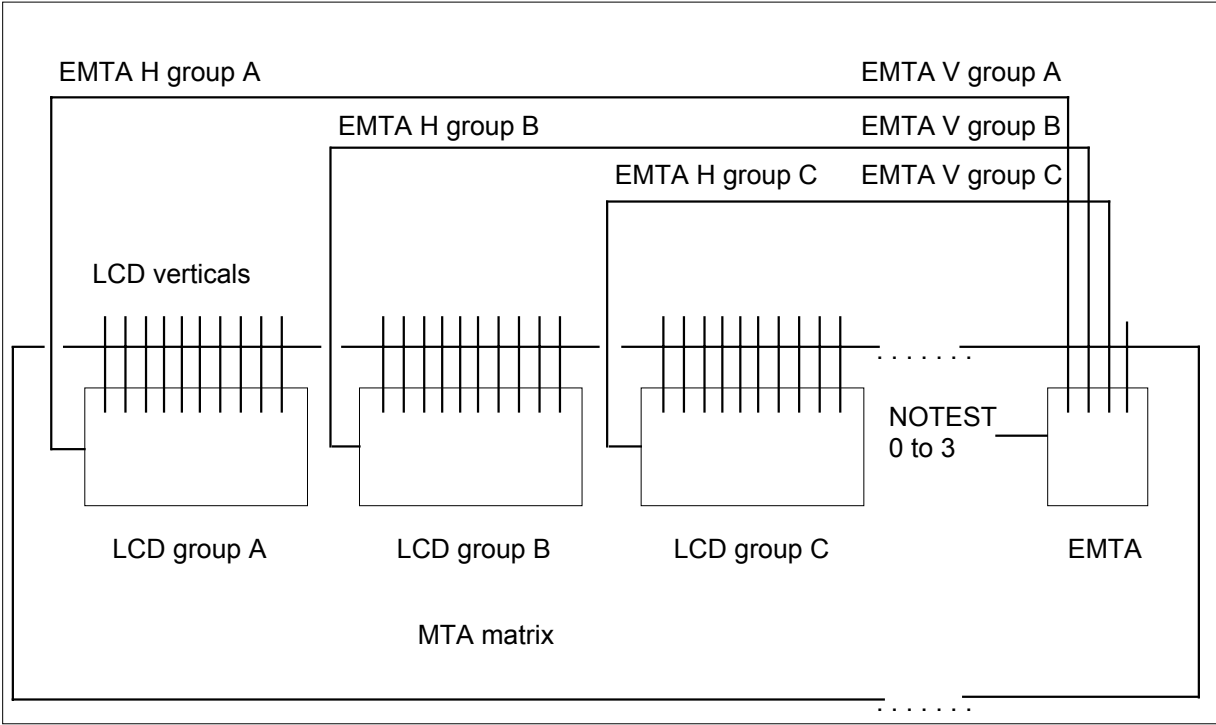
Distributed approach for better access reliability



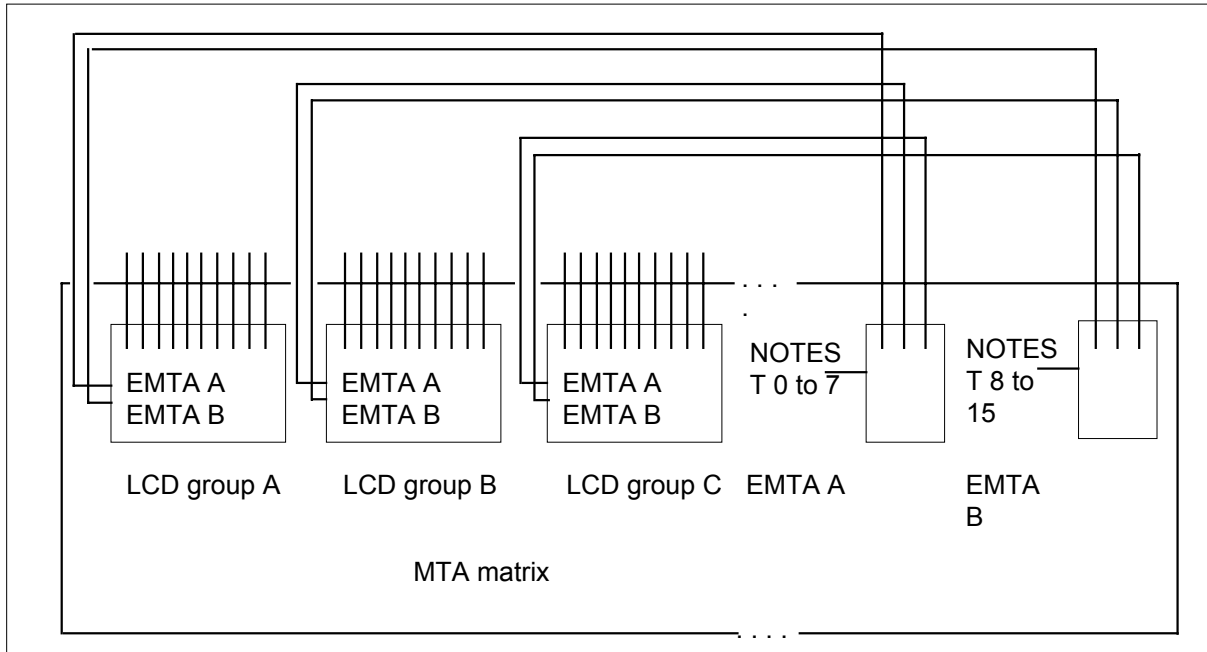
The following figure shows how the LCD group MTA drivers, the EMTA connections, and the MTA drivers interconnect.

MTAMDRIVE (continued)

LCD connections to EMTA



If there are a large number of test access trunks, the previous solution could result in a large number of MTA drivers being needed for the EMTA set up. Breaking the EMTA up into groups reduces the number of MTA drivers required. See the following figure.

MTAMDRVE (continued)**MTA driver reduction through grouping**

By grouping the EMTAs, the number of MTA drivers involved in multiple connections is reduced also.

Further consideration must also be given to reducing the number of MTA drivers required for the LCD groups. If all test access trunks are required to have complete access to the LCD groups, the number of MTA drivers cannot be reduced. For example, if complete access requires EMTA and MTA connections for 16 test access trunks to interconnect with 16 verticals of a single LCD group, then 16 EMTA verticals and EMTA horizontals are needed for each LCD group.

Reducing the number of MTA drivers in the LCD groups entails calculating the expected access required to verticals (lines) in the LCD group. For example, if 16 test access trunks are allowed access to eight EMTA verticals and EMTA horizontals in LCD group A, the remaining eight can have access to LCD groups B and C. The eight EMTA verticals and EMTA horizontals connected to LCD group A represent the percentage of the total lines in the of ce that are in LCD group A.

Functional description

Table MTAMDRVE specifies the type of the minibar driver assigned to the minibar switch and the physical location of this driver. The NT2X50AB driver is part of NT2X46 minibar switch, while the NT3X09 driver (whose relays are

MTAMDRVE (continued)

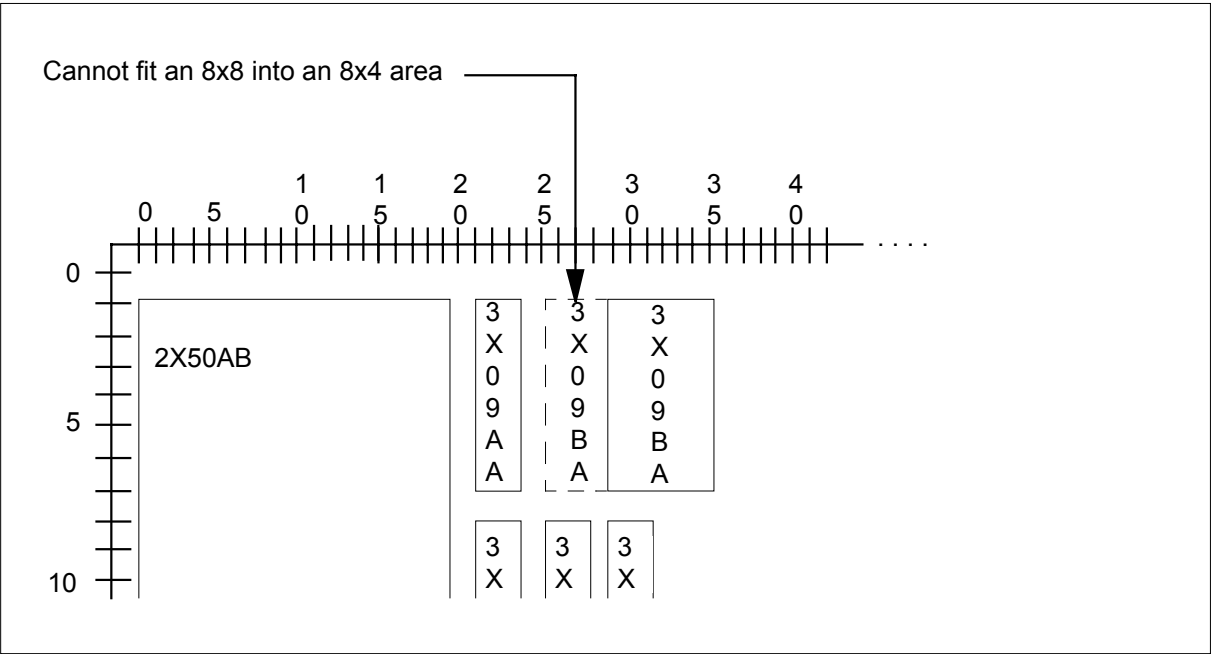
on the card itself) does not require an associated minibar switch. Each minibar switch is identified by its horizontal and vertical location in the grid.

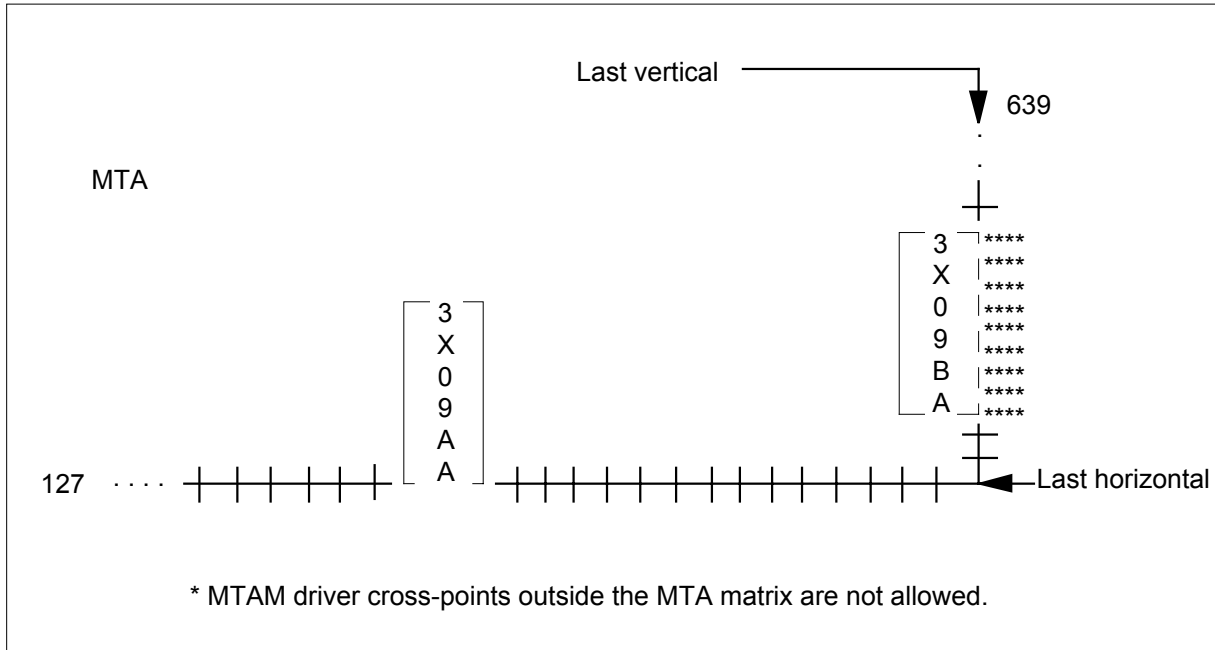
The MTAM drivers can be located anywhere within the MTA matrix. Using MTA matrix vertical and horizontal start points, the MTAM driver is located in the matrix using its 0,0 cross-point. The number of MTA verticals or horizontals that the driver is associated with depends on its size.

The following restrictions exist when data lling MT AM drivers in table MTAMDRVE:

- No cross-point of an MTAM driver can overlap an MTA matrix cross-point that is already in use, as shown in the following gure.
- No cross-point of an MTAM driver can exist outside of the MTA matrix, as shown in the second gure.
- The MTAM driver member numbers must be within a speci c range. The range depends on the entry in eld TRKGRSIZ, of x ed CLLI name MTADRIVER, in table CLLI. See the “Table size” section.

MTA MTAM overlapping not allowed



MTAMDRVE (continued)**MTAM driver outside MTA matrix****Data II sequence and implications**

The following tables must be data lled before table MT AMDRVE:

- TMINV
- RMMINV
- RSM

Table size

0 to 512 tuples

Table MTAMDRVE is extended by changing the value in eld TRKGRSIZ specified in table CLLI for the pseudo-CLLI code MTADRIER. A restart is not required for this extension.

MTAMDRVE (continued)**Data II**

The following table lists data II for table MT AMDRVE.

Field descriptions (Sheet 1 of 2)

Field	Subfield	Entry	Explanation and action
MTAMEM		see subfield	<i>Metallic test access minibar driver member</i> This field consists of subfield MTAMEM. This is the key to the table.
	MTAMEM	0 to 511	<i>Metallic test access minibar driver member</i> Enter the metallic test access minibar (MTAM) driver member number.
VERT		0 to 1023	<i>Mtam driver vertical start location</i> Enter the vertical start location for the MTAM driver. The MTAM driver is located using its 0,0 cross-point. See the "Datafill example" section in this description.
HORIZ		0 to 127	<i>MTAM driver horizontal start location</i> Enter the horizontal start location for the MTAM driver. The MTAM driver is located using its 0,0 cross-point. See the "Datafill example" section in this description.

MTAMDRVE (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
TMTYPE		MTM, PTM, RMM, RSM	<i>Trunk module type</i> Enter the type of trunk module on which the minibar driver is mounted: • If the minibar switch is located at the host and mounted on a maintenance trunk module, enter MTM. • If the minibar switch is located at a cabinetized Meridian SL-100 and mounted on a packaged trunk module, enter PTM. • If the minibar switch is located at an RLCM location and mounted on a remote maintenance module, enter RMM. (Only used if the MTA driver is 3X09AA or BA.) • If the minibar switch is located at an RLM location and mounted on a remote service module, enter RSM. Any entry outside the range indicated for this field is invalid.
TMNO		0 to 2047	<i>Trunk module number</i> Enter the number assigned to the MTM, PTM, RMM, or RSM on which the minibar driver is mounted.
TMCKTNO		0 to 28(even numbers only)	<i>Trunk module circuit number</i> Enter the trunk module circuit number on the MTM, PTM, RMM, or RSM to which the minibar driver is assigned. Only even numbers within the specified range can be entered. Any entry outside the range indicated for this field is invalid.
MTACARD		2X50AB 3X09AA 3X09BA	<i>Metallic test access minibar driver card</i> Enter the card code of the MTAM driver card. Any entry outside the range indicated for this field is invalid.

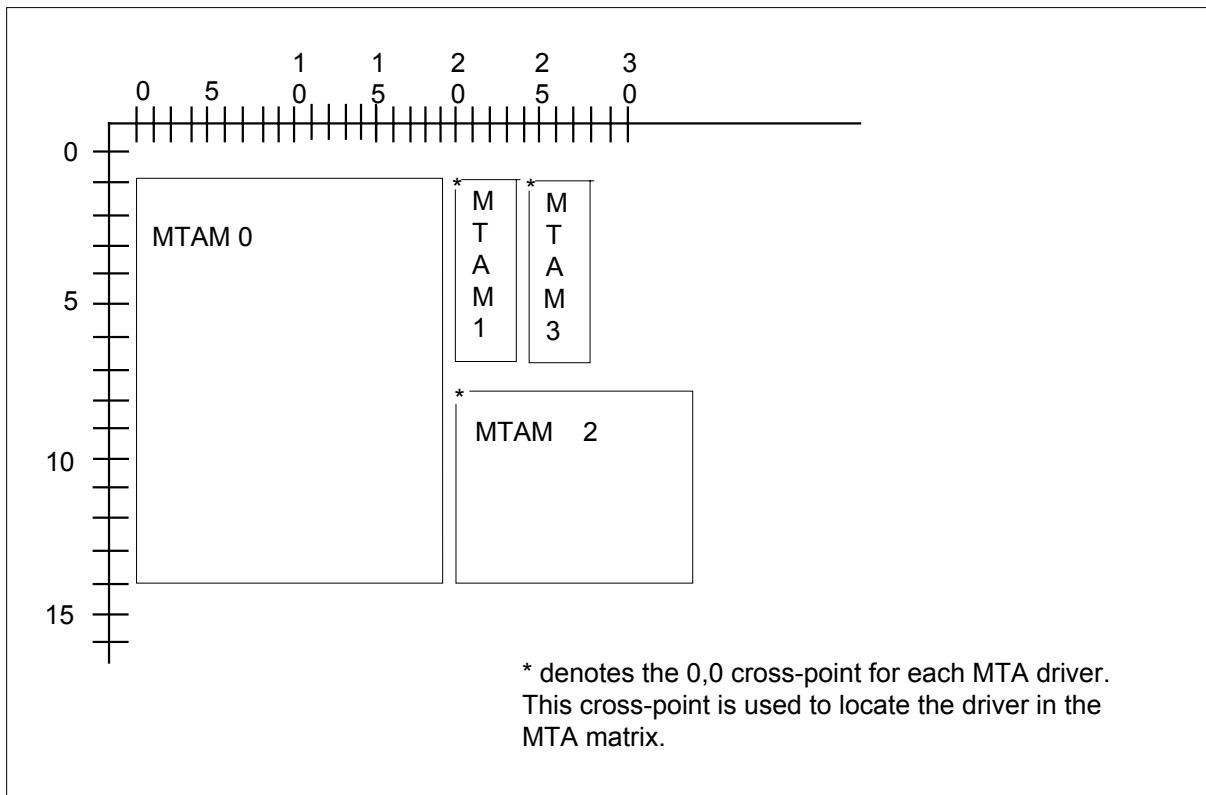
MTAMDRVE (end)**Data l l e x a m p l e**

An example of data l l for table MT AMDRVE follows.

The example lists the physical locations of the four minibar drivers, as shown in the following gure. The e x a m p l e shows the positioning of the MTAM driver on the vertical and horizontal locations.

MAP display example for table MTAMDRVE

MTAMEM	VERT	HORIZ	TMTYPE	TMNO	TMCKTNO	MTACARD
0	0	0	MTM	4	9	2X50AA
1	20	0	MTM	2	18	3X09AA
2	20	8	MTM	1	16	3X09BA
3	24	0	MTM	10	22	3X09AA

Physical locations of four minibar drivers

MTAVERT

Table name

Metallic Test Access Vertical Connection Table

Functional description

Table MTAVERT identifies the vertical connectivity to the metallic test access (MTA) matrix. Two types of vertical connections are allowed, as described below.

Single

A single connection is defined using selectors L, E, T, and O. Selector L requires the assignment of two vertical connections for the line concentrating devices (LCD). One is for the first 320 lines; the other is for the remaining lines. The data ll automatically takes the two vertical connections; one vertical connection is taken as the primary and the other is taken as its mate. Any attempt to data ll on a vertical that is a mate is denied. Mate verticals cannot be displayed in table control.

Selectors E, T, and O require the assignment of a single vertical connection for use. Selector E defines an extended vertical; the MTA minibar drivers (MTAM) on this vertical must all be located at the host (field SITE). Selector T specifies that the vertical is connected to a trunk module (TM) peripheral module (PM). Selector O is for LCDs that require only one vertical for test access.

Note: Selector T is reserved for a special market segment (Austria) and is not available for general usage.

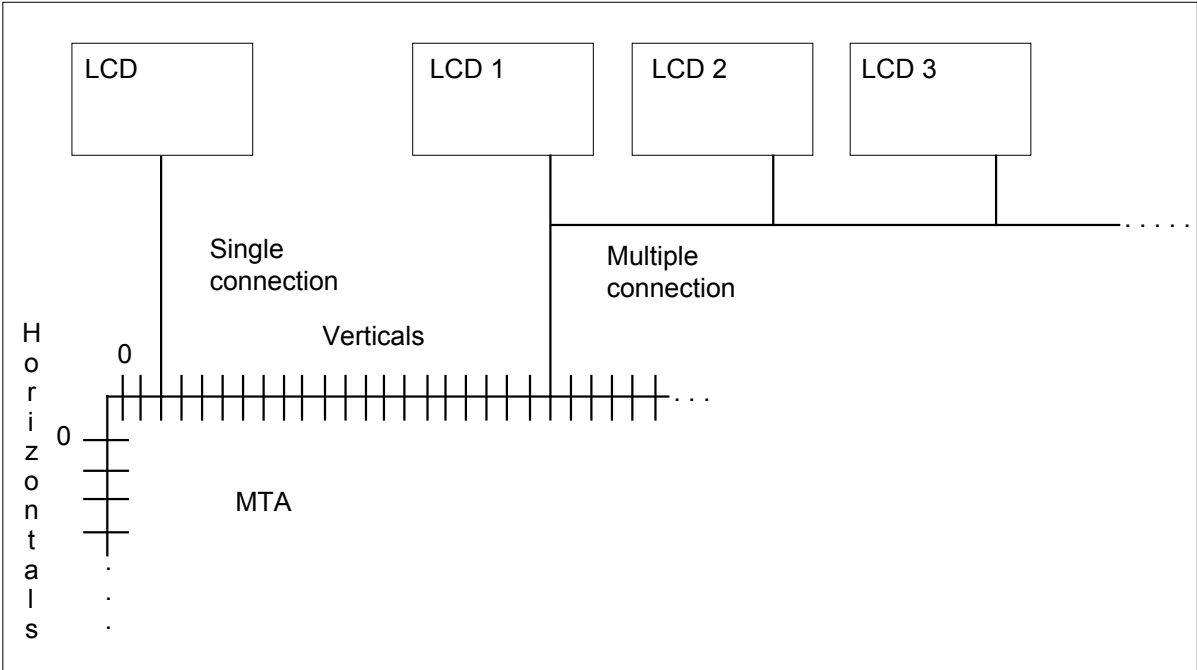
Multiple

The vertical connection is connected to a remote LCD that does not reside on a subscriber carrier module (SCM) and can have multiple or shared appearances of LCDs. Only selector O can be used, and a maximum of 32 LCDs for each vertical are allowed.

The following figure illustrates single and multiple vertical connections.

MTAVERT (continued)

Single and multiple vertical connections



For related information, refer to table MTAMDRVE.

Data II sequence and implications

Table MTAMDRVE must be data lled before table MT AVERT.

Table size

0 to 1024 tuples

Store for table MTAVERT is dynamically allocated.

MTAVERT (continued)

Data II

The following table lists data II for table MT AVERT.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
VERT		0 to 1023	<i>Vertical</i> Enter the metallic test access (MTA) vertical connection number. If subfield SELECTOR has value L, and the entry in field MTACARD has value 2X50AB (in table MTAMDRVE), the entry in field VERT must be an even number. Each line module (LM) requires two vertical connections that must be adjacent. The second connection is made internally to vertical VERT + 1. The odd numbered vertical can only be used internally.
VERTCONN		see subfield	<i>Vertical connection</i> This field consists of subfield VERTSEL.

MTAVERT (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	VERTSEL	M or S	<i>Vertical connection type selector</i> Enter one of the two types of vertical connections. For multiple LCD connections to the vertical connection, enter M and datafill refinement VERTAREA. This entry can be used only if the vertical is connected to a remote LCD that does not reside on a subscriber carrier module (SCM), namely remote carrier DMS-1 rural (RCT), remote concentrator SLC-96 (RCS), remote carrier DMS-1 urban (RCU), and remote digital terminal (RDT). Multiple connections are allowed and a vector of up to 32 selectors plus their refinements can be input. If less than 32 selectors are required, end the list with a \$ (dollar sign). If subfield VERTSEL is set to M, subfield SELECTOR can only have a value of O. For a single line concentrating device (LCD) connection to the vertical connection, enter S and datafill refinement VERTITEM. Only a single connection is allowed and only one selector and its refinements can be input for any tuple. Any selector and its refinements can be used in this case.
	VERTITEM	see subfield	<i>Vertical item</i> If the entry in subfield VERSEL is S, datafill this refinement. This field consists of subfield SELECTOR.

MTAVERT (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	VERTAREA	see subfield	<i>Vertical area</i> If the entry in field VERTSEL is M, datafill this refinement. This field consists of subfield SELECTOR.
	SELECTOR	E, L, O, or T	<i>Selector</i> Enter one of the four selector types. If the vertical connection is used for an extended connection, enter E and datafill refinements EHORIZ and EHORIZGRP in section "SELECTOR = E". If the vertical connection is used for a line module, enter L and datafill refinement LINEMOD in section "SELECTOR = L". Selector L requires that two verticals be used. The datafill automatically takes the two verticals, one as the primary and other as its mate. If the vertical connection is used for an RCT or RCS, enter O and datafill refinement LINEMOD in section "SELECTOR = L". If the vertical connection is used for an RTD, enter either L or O and datafill refinement LINEMOD in section "SELECTOR = L". Up to two vertical assignments can be made for one or more RTDs. If the vertical connection is connected to a trunk module (TM) peripheral module (PM), enter T and datafill refinements TMTYPES and TMNO (for licensee use only) in section "SELECTOR = T".

MTAVERT (continued)**SELECTOR = E**

If the entry in sub eld SELECT OR is E, data ll re nements EHORIZ and EHORIZGRP as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	EHORIZ	0 to 127	<i>Extended metallic test access horizontal connection</i> Enter the horizontal connection on the MTA to which the vertical connection is connected.
	EHORIZGRP	0 to 159	<i>Extended metallic test access horizontal group</i> Enter the horizontal group on the MTA to which the vertical connection is connected.

SELECTOR = L or O

If the entry in sub eld SELECT OR is L or O, data ll re nement LINEMOD as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	LINEMOD	see subfields	<i>Line module</i> This field is identical to field LEN that is datafilled in other tables. Field LINEMOD (and field LEN) defines the physical location of the equipment that is connected to a specific telephone line. Refer to section "Common entry field LEN" for a complete description of field LEN and associated subfields. Field LINEMOD (and field LEN) consists of subfields SITE, FRAME, UNIT, DRAWER or LSG, SHELF, SLOT, and CIRCUIT. If the entry in field SELECTOR is O, the field LINEMOD subfields must be set for RCS, RCT, or RDT only.

MTAVERT (continued)**SELECTOR = T**

If the entry in sub eld SELECT OR is T (for licensee use only), data ll re nements TMTYPES and TMNO as described belo w.

Field descriptions for conditional data ll

Field	Subfield or refinement	Entry	Explanation and action
	TMTYPES	alphanumeric (1 to 3 characters)	<i>Trunk module types</i> Enter the TM type. This field is for licensee use only.
	TMNO	0 to 511	Trunk module number Enter the number of the TM. This field is for licensee use only.

Data ll e xample

The following example shows sample data ll for table MT AVERT.

The example is data lled for the follo wing attributes:

- vertical 0 with single LCD connection to LCM 00, unit 0
- vertical 4 with single LCD connection to remote MTAM 10 (extended connection)
- vertical 5 with single LCD connection to RCS 00
- vertical 10 with multiple connection to three REMs
- vertical 17 with multiple connection to two RDTs

MAP display example for table MTAVERT

VERT	VERTCONN
0	S L HOST 00 0
4	S E 10 0
5	S O RCS 00 0
10	M (O REM1 00 0) (O REM1 00 1) (O REM1 01 0)
\$	
17	M (O RDT1 00 0) (O RDT1 01 0)
\$	

MTAVERT (end)

Supplementary information

This section provides information on error messages that can be displayed when data lling table MT AVERT.

Error messages

Only LCD types RCS, RCT, RCU, and RDT can share a vertical connection. If an attempt is made to data ll any other type on a shared vertical connection, the data ll is rejected and the follo wing message displayed at the MAP (maintenance and administration position) terminal:

```
DEVICE(S) SPECIFIED NOT OF TYPE ALLOWED TO SHARE VERTICAL
```

All devices sharing a vertical connection must be of the same type; the devices must either be all RCUs, all RCTs, all RCSs, or all RDTs. If an attempt is made to data ll a shared vertical with multiple types, the data ll is rejected and the following message displayed at the MAP terminal:

```
DEVICES SHARING VERTICAL MUST BE OF THE SAME TYPE
```

The SLT mode of RCTs must be SLTA in order for them to be assigned to a vertical. If an attempt is made to assign an RCT to a vertical connection and that RCT's SLT mode is not SLTA, the data ll is rejected and the follo wing message displayed at the MAP terminal:

```
RCT MUST HAVE SLTMODE OF SLTA TO USE VERTICAL
```

MTCFAIL

Table name

Maintenance Failure Messages Table

Functional description

Table MTCFAIL clarifies the reason for the failure of an operator position. If during an attempt to return to service (RTS) a position fails, an error code value is sent to central control (CC) in the result field of the incoming solicited maintenance message from the position. Likewise, when the CC receives an incoming unsolicited maintenance message from an operator position requesting to be busied, the result field of the message contains an error code value defining the error condition that occurred at the position that prompted the request.

Table MTCFAIL is indexed by a numeric value in the range of 0 (zero) to 255. A text string of up to 63 characters is data fielded against each numeric value. Each numeric value represents an error code, and the text string defines the meaning of that error code. This table provides the ability to receive an error code value and use it to index into the table and locate the corresponding text string. This text string is then contained in the Traffic Operator Position System (TOPS) 115 multipurpose (MP) maintenance log output unless the RTS attempt is manually initiated. If this is the case, the text string is printed at the MAP terminals.

Table MTCFAIL allows an operator position vendor to define a text string message corresponding to an error code value sent by its position in response to the failure of a maintenance process. Since many possible operator position vendors exist, this table can be divided into numeric ranges, each corresponding to a different position vendor. An office using operator positions from different vendors has the ability to receive error codes from any position and locate the corresponding text string defining the received error code value.

The first 50 (0 to 49) error code values are reserved for Northern Telecom's TOPS MP operator positions and cannot be changed. The following error message is displayed when an attempt is made to change or delete a tuple when the entry in field ERRCODE is a value within the range from 0 (zero) to 49:

ERRCODE VALUES LESS THAN 50 ARE RESERVED FOR NORTHERN TELECOM
AND ARE UNCHANGEABLE.

The following default tuples are created with table MTCFAIL:

- 0—Reserved
- 1—Reserved

MTCFAIL (continued)

- 2—Diagnostics_in_Progress
- 3—Mtce_in_Progress_in_the_TPC
- 4—Data ll_in_Progress_at_T AMI
- 5—No_HSLI_Card
- 6—Failed_to_Enable_MP_-_Check_Logs_in_the_TPC
- 7 thru 49—Reserved

Data ll sequence and implications

There is no requirement to data ll other tables prior to table MTCF AIL.

Table size

50 to 256 tuples

Data ll

The following table lists data ll for table MTCF AIL.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
ERRCODE		0 to 255	<i>Error code</i> This is the key field of the table. Enter a numeric value from 0 (zero) to 255 corresponding to the value sent in an incoming maintenance message.
CONTMARK		+	<i>Continuation mark</i> Enter + to indicate that additional information for this tuple is contained in the next record.
ERRTEXT		alphabetic (vector of up to 63 characters)	<i>Error text</i> Enter a text string defining the meaning of the error code value with which it is associated.

Data ll e xample

The following example shows sample data ll for table MTCF AIL.

MTCFAIL (end)

MAP display example for table MTCFAIL

ERRCODE	ERRTEXT
0	Reserved
1	Reserved
2	Diagnostics_in_Progress
3	Mtce_in_progress_in_the_TPC
4	Datafill_in_Progress_at_TAMI
5	No_HSLI_Card
6	Failed_to_Enable_MP_-_check_logs_in_the_TPC
7	Reserved

Table history
BCS35

Table MTCFAIL was introduced.

MTCTEST

Table name

Maintenance Test Failure Messages Table

Functional description

Table MTCTEST clarifies the reason for the failure of a maintenance test process, for example, a keyboard test. If a maintenance test process fails, an error code value is sent to central control (CC) in the incoming solicited maintenance message sent from the position. This error code value varies depending upon why the test failed.

Table MTCTEST is indexed by a numeric value in the range of 0 to 511. A text string of up to 63 characters is data lled against each numeric value. Each numeric value represents an error code, and the text string defines the meaning of that error code. This table provides the ability to receive an error code value and use it to index into the table and locate the corresponding text string. This text string is then contained in the AUDT 131 multipurpose (MP) position diagnostic log output unless the return to service (RTS) attempt that failed is manually initiated. If this is the case, the text string is printed at the MAP terminal.

This table allows an operator position vendor to define a text string message corresponding to an error code value sent by its position in response to the failure of a maintenance test process. Since many possible operator position vendors exist, table MTCTEST can be divided into numeric ranges, each corresponding to a different position vendor. An office using operator positions from different vendors has the ability to receive error codes from any position and locate the corresponding text string defining the received error code value.

Error code values 101, 201 to 306, and 401 to 411 are reserved for Northern Telecom's Traffic Operator Position System (T OPS) MP operator positions and cannot be changed. The following error message is displayed when an attempt is made to change or delete a tuple if the entry in field ERRCODE is in one of the following ranges: 101, 201 to 306, 401 to 411.

ERRCODE VALUES 101, 201-306, AND 401-411 ARE RESERVED FOR NORTHERN TELECOM AND ARE UNCHANGEABLE.

The following default tuples are created with table MTCTEST:

- 101—Diag_software_error_in_TPC
- 201—Diag_software_error_in_TPC_tasking_err_in_HSLI_diags
- 202—Diag_software_error_in_TPC_tasking_with_diag_server_code

MTCTEST (continued)

- 203—HSLI_card_not_present_unable_to_run_diags
- 204—Position_unavailable_for_diags
- 205—Diag_software_error_in_TPC_MP_not_registered_with_server
- 206—HSLI_card_diags_failed-training_port_(CBT)_register_test
- 207—HSLI_card_diags_failed-CC_register_test
- 208—HSLI_card_diags_failed-setting_the_mode_register
- 209—HSLI_card_diags_failed-setting_the_baud_rate
- 210—HSLI_card_diags_failed-initializing_the_USARTS
- 211—HSLI_card_diags_failed-HSLI_port_register_test
- 212—HSLI_card_diags_failed-HSLI_RAM_test
- 213—Diag_software_error_in_TPC-CBT:diags_run_task_times_out
- 214—Diag_software_error_in_TPC-CC:diags_run_task_times_out
- 215—HSLI_card_diags_failed-CBT:diags_server_times_out
- 216—HSLI_card_diags_failed-CC:diags_server_times_out
- 217—HSLI_card_diags_failed-CBT:unexpected_interrupt
- 218—HSLI_card_diags_failed-CC:unexpected_interrupt
- 219—HSLI_card_diags_failed-CBT:parity_error
- 220—HSLI_card_diags_failed-CC:parity_error
- 221—HSLI_card_diags_failed-CBT:overflow_error
- 222—HSLI_card_diags_failed-CC:overflow_error
- 223—HSLI_card_diags_failed-CBT:framing_error
- 224—HSLI_card_diags_failed-CC:framing_error
- 225—HSLI_card_diags_failed-CBT:extra_receive_char_interrupt
- 226—HSLI_card_diags_failed-CC:extra_receive_char_interrupt
- 227—HSLI_card_diags_failed-CBT:data_lost_during_test
- 228—HSLI_card_diags_failed-CC:data_lost_during_test
- 229—HSLI_card_diags_failed-CBT:corrupt_data
- 230—HSLI_card_diags_failed-CC:corrupt_data
- 231 to 300—Reserved
- 301—Diag_software_error_in_TPC-registering_with_HSLI_server

MTCTEST (continued)

- 302—Diag_software_error_in_TPC-setting_ack_types_with_HSLI_server
- 303—Error_communicating_with_MP_terminal-downloading_alpha
- 304—Error_communicating_with_MP_terminal-HSLI_server-I/O_error
- 305—Diag_software_error_in_TPC-could_not_load_TCD_downloadable
- 306—Diag_software_error_in_TPC-error_found_by_MP_terminal
- 401—Diag_software_error_in_TPC-tasking_err_in_TCD_diags_task
- 402—Diag_software_error_in_TPC-TCD_diags_task_times_out
- 403—MP_terminal_component_diag_failed-CPU_test
- 404—MP_terminal_component_diag_failed-ROM_test
- 405—MP_terminal_component_diag_failed-RAM_test
- 406—MP_terminal_component_diag_failed-exception_processing_test
- 407—MP_terminal_component_diag_failed-video_display_controller
- 408—MP_terminal_component_diag_failed-peripheral_test
- 409—MP_terminal_component_diag_failed-HSLI_test
- 410—MP_terminal_component_diag_failed-telephony_board_test
- 411—MP_terminal_component_diag_failed-keyboard_test

Data ll sequence and implications

There is no requirement to data ll other tables prior to table MTCTEST .

Table size

118 to 512 tuples

MTCTEST (continued)

Data II

The following table lists data II for table MTCTEST .

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
ERRCODE		0 to 511	<i>Error code</i> This is the key field of the table. Enter a numeric value from 0 (zero) to 511 corresponding to the value sent in an incoming maintenance message.
ERRTEXT		alphabetic (vector of up to 63 characters)	<i>Error text</i> Enter a text string of up to 63 characters defining the meaning of the error code value with which it is associated.

Data II e xample

The following example shows sample data II for table MTCTEST .

MTCTEST (end)**MAP display example for table MTCTEST**

ERRCODE	ERRTEXT
300	Reserved
301	Diag_software_error_in_TPC-registering_with_HSLI_server
302	Diag_software_error_in_TPC-setting_ack_types_with_HSLI_server
303	Error_communicating_with_MP_terminal-downloading_alpha
304	Error_communicating_with_MP_terminal-HSLI_server_I/O_error
305	Diag_software_error_in_TPC-could_not_find_TCD_download_file
306	Diag_software_error_in_TPC-error_found_by_MP_terminal
401	Diag_software_error_in_TPC-tasking_err_in_TCD_diags_task
402	Diag_software_error_in_TPC-TCD_diags_task_times_out
403	MP_terminal_component_diag_failed-CPU_test
404	MP_terminal_component_diag_failed-ROM_test
405	MP_terminal_component_diag_failed-RAM_test
406	MP_terminal_component_diag_failed-exception_processing_test
407	MP_terminal_component_diag_failed-video_display_controller
408	MP_terminal_component_diag_failed-peripheral_test
409	MP_terminal_component_diag_failed-HSLI_test
410	MP_terminal_component_diag_failed-telephony_board_test
411	MP_terminal_component_diag_failed-keyboard_test

Table history**BCS35**

Table MTCTEST was introduced.

MTD

Table name

Magnetic Tape Device Table

Overview

The input/output device (IOD) tables appears in the following table. These tables identify the hardware position assignments for many of the possible IOD devices in the DMS-100 switch.

IOD table assignments

Table name	Table title
MTD	MTDMagnetic Tape Device Table
TERMDEV	TERMDEVTerminal Device Table
DDU	Disk Drive Unit Table
DPACDEV	DATAPAC Device Table
DLCDEV	Data Link Controller Device Table

Input/output controller x ed assignments

The input/output controller (IOC) x ed assignments appear in the following tables.

Con guration 1

The arrangement for switching units equipped with magnetic tape drives (MTD) appear in the following table. These switching units do not have disk drive units (DDU).

Con guration (Sheet 1 of 2)

Card slot and base CKT number on shelf PEC								
NT1X61AA		NT1X61AB		NT2X76BA		Fixed assigned devices on module		
SLT	CKT	SLT	CKT	SLT	CKT	IOC:00	IOC:01	Note
12	16	04	00	21	00	MTD:00	MTD:01	1, 2
04	00	06	04	19	04	MTD:02	MTD:03	1, 3
14	20	08	08	17	08	MAP:00	PORT.VDU	1, 4

MTD (continued)**Con guration (Sheet 2 of 2)**

Card slot and base CKT number on shelf PEC							
06	04	10	12	15	12	Other devices	1, 6
16	24	12	16	--	--	Other devices	1, 6
08	08	14	20	--	--	Other devices	1, 6
18	28	16	24	--	--	Other devices	1, 6
10	12	18	28	--	--	Other devices	1, 6
20	32	20	32	--	--	Other devices	1, 6

Con guration 2

The arrangement for switching units with one MTD and a minimum of one DDU appears in the following table.

Con guration

Card slot and base CKT number on shelf PEC								
NT1X61AA		NT1X61AB		NT2X76BA		Fixed assigned devices on module		
SLT	CKT	SLT	CKT	SLT	CKT	IOC:00	IOC:01	Note
12	16	04	00	21	00	DDU:00	DDU:01	1, 7
04	00	06	04	19	04	DDU:02	MTD:00	1, 8
14	20	08	08	17	08	MAP:00	PORT.VDU	1, 4
14	23	08	11	17	11	ETAS	ETAS	1, 5
06	04	10	12	15	12	Other devices		1, 11
16	24	12	16	--	--	Other devices		1, 11
08	08	14	20	--	--	Other devices		1, 11
18	28	16	24	--	--	Other devices		1, 11
10	12	18	28	--	--	Other devices		1, 11
20	32	20	32	--	--	Other devices		1, 11

MTD (continued)**Con guration 3**

The arrangement for switching units with a minimum of two MTDs and a minimum of two DDU appears in the following tables.

Con guration

Card slot and base CKT number on shelf PEC								
NT1X61AA		NT1X61AB		NT2X76BA		Fixed assigned devices on module		
SLT	CKT	SLT	CKT	SLT	CKT	IOC:00	IOC:01	Note
12	16	04	00	21	00	DDU:00	DDU:01	1, 7
04	00	06	04	19	04	MTD:01	MTD:03	1, 10
14	20	08	08	17	08	MAP:00	PORT.VDU	1, 4
14	23	08	11	17	11	ETAS	ETAS	1, 5
06	04	10	12	15	12	Other devices		1, 12
16	24	12	16	--	--	Other devices		1, 12
08	08	14	20	--	--	Other devices		1, 12
18	28	16	24	--	--	Other devices		1, 12
10	12	18	28	--	--	Other devices		1, 12
20	32	20	32	--	--	Other devices		1, 12

Con guration 4

The arrangement for switching units with a minimum of one MTD and one DDU appears in the following table.

Con guration (Sheet 1 of 2)

Card slot and base CKT number on shelf PEC								
NT1X61AA		NT1X61AB		NT2X76BA		Fixed assigned devices on module		
SLT	CKT	SLT	CKT	SLT	CKT	IOC:00	IOC:01	Note
12	16	04	00	21	00	DDU:00	MTD:02	1, 10
04	00	06	04	19	04	MTD:01	MTD:00	1, 10

MTD (continued)**Con guration (Sheet 2 of 2)**

Card slot and base CKT number on shelf PEC								
NT1X61AA		NT1X61AB		NT2X76BA		Fixed assigned devices on module		
SLT	CKT	SLT	CKT	SLT	CKT	IOC:00	IOC:01	Note
14	20	08	08	17	08	MAP:00	PORT.VDU	1, 4
14	23	08	11	17	11	ETAS	ETAS	1, 5
06	04	10	12	15	12	Other devices		1, 13
16	24	12	16	--	--	Other devices		1, 13
08	08	14	20	--	--	Other devices		1, 13
18	28	16	24	--	--	Other devices		1, 13
10	12	18	28	--	--	Other devices		1, 13
20	32	20	32	--	--	Other devices		1, 13

Notes:

The con guration tables reference the follo wing notes:

1. The old type IOC has product engineering code (PEC) 1X61AA. The new type IOC has PEC 1X61AB. The combined IOC/CMC has PEC 2X76BA.
 - SLT = slot number on the IOC
 - CKT = circuit number in tables TERMDEV and MTD
 - CMC = central message controller
 - NT1X61AA restrictions: Fixed assignments impose these restrictions. The assignment of cards to slots on the shelf occur in the same order as in con gurations 1, 2, 3, or 4. The assignment of a maximum of three cards to the following group of slots: 04, 06, 08, and 10 occurs. The assignment of a maximum of four cards to the group of slots: 12, 14, 16, 18, and 20 occurs. This assignment must satisfy power loading requirements of NT1X61AA. In NT1X61AA,

MTD (continued)

a converter feeds slots 12, 14, 16, 18, and 20 and another converter feeds slots 04, 06, 08, and 10.

- The assignment of extended-assignment devices to the lowest numbered circuit that associates with the slot occurs. The assignment of circuits that the system does not use for other functions occurs.
2. The MTD:00 and MTD:01 are available for each DMS. The assignment of MTD:00 and MTD:01 appears in the tables in this document.
 3. If the MTD:02 and MTD:03 is available for assignment, the assignment appears in the second table in this document. If MTD:02 and MTD:03 are not available, the assignment of the other devices to these locations occurs. The user can reserve the slots for future MTD additions.
 4. The MAP:00 is the office primary general maintenance position. The MAP:00 is the same as TTP:00. This device is always available. The PORT.VDU is the portable visual display unit (VDU) available for maintenance use in the main equipment aisles. This device is always available.
 5. Emergency Technical Assistance Service (ETAS) assignments for the VDU and printer are IOC:00 VDU and IOC:01 printer. The assignment of ETAS devices appear in configuration tables. Name the Dial-up facilities that ETAS and field service engineering (FSE) use DIAL1, DIAL2 and follow in sequence.
 6. Assign additional MTDs or terminals as necessary.
 7. The DMS requires a minimum of one DDU. The assignment of DDU:00 and DDU:01 appears in the configuration tables.
 8. If the DDU:02 is available for assignment, the assignment appears in the third table in this document. If the DDU:02 is not available for assignment, the assignment of other devices to this location occurs. The user can reserve the slot for a future DDU addition.
 - The DMS requires a minimum of one MTD. The assignment of MTD:00 occurs as indicated.
 9. The DMS requires a minimum of one DDU. The assignment of DDU:00 occurs as indicated.
 - If MTD:02 is available for assignment, the assignment of MTD:02 occurs as indicated. If the MTD:02 is not available for assignment, the assignment of other devices to this location occurs. The user can reserve the slot for a future MTD addition.
 10. The DMS requires a minimum of one MTD. The assignment of MTD:00 and MTD:01 occurs as indicated.

MTD (continued)

11. The assignment of additional DDUs, distributed processing peripherals (DPP), billing medial converters (BMC), or terminals occurs as necessary.
12. The assignment of additional MTDs, DDUs, DPPs, BMCs, or terminals occurs as necessary.
13. The assignment of additional MTDs, DPPs, BMCs, or terminals occurs as necessary.

Functional description

Table MTD lists the assignments for each of the MTDs. The maximum number of assignments is 16.

The system can only boot an image from MTDs with IOC assignments that appear in the following table.

IOC assignments

Card slot and base CKT number of shelf PEC						
NT1X61AA						
IOC number	Slot	CKT	Slot	CKT	Slot	CKT
0	12	16	04	00	21	00
0	04	00	06	04	19	04
1	12	16	04	00	21	00
1	04	00	06	04	19	04

See the following table for magnetic tape drives 0 to 3 with x ed assignments on the IOC.

Data II sequence and meaning

Enter data into table IOC before you enter data into table MTD.

Enter data into the following tables after enter data into table MTD.

- DIRPPool
- FTRANDEV

Table size

The system automatically allocates memory for 16 magnetic tape drives.

MTD (end)**Data II**

Data II for table MTD appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
MTDNO		0 to 15	<i>Magnetic tape drive number.</i> Enter the number assigned to the MTD.
IOCNO		0 to 19	<i>Input/output controller number.</i> Enter the input/output controller number to which the system assigns the MTD. See the second table in this document.
IOCKTNO		0 to 35	<i>Input/output controller circuit number.</i> Enter the input/output controller circuit number (slot) to which the system assigns the MTD. See the second table in this document.
EQPEC		alphanumeric (6 characters)	<i>Product engineering code.</i> Enter the PEC of the MTC circuit card. Use PECs 1X68AA, 1X68AB, and 1X68BB with Hewlett-Packard tape drives. Use PECs 1X68AC and 1X68BC with Cook Electric tape drives.
IOENDIAN		BIG or LITTLE	<i>Input/output ENDIAN.</i> Select the ENDIAN format for the Input Output Module (IOM) DAT. The only format for a nine track tape drive is BIG.

Data II example

Sample data II for table MTD appears in the following example.

MAP example for table MTD

MTDNO	IOCNO	IOCKTNO	EQPEC
0	0	0	1X68AA
1	1	0	1X68AA

MTSIGSYS

Table name

Hardware Metering for Trunks Signaling System Table

Functional description

Table MTSIGSYS provides a customer interface that specifies meter pulse signaling on the DMS-100 family of switches. To generate hardware meter pulses over digital trunks, define the physical characteristics of a meter pulse. Use table MTSIGSYS to specify these attributes.

Signaling on digital trunks

Waveform patterns on four-channel supervision bits perform signaling on digital trunk. Another name for the supervision bits is the A-, B-, C-, and D-bits. Each bit can take the value of 0 or 1. To send signals, manipulate the value of these bits according to a standard protocol. Use the A- and B-bits for call control signaling. Use the C-bit for meter pulse signaling.

To generate meter pulse, specify the following attributes:

- the bits used to transmit the meter pulse
- the idle state of these signaling bits when the system does not transmit pulses
- the width of the meter pulse
- the interpulse gap
- the delay time after answer before transmission of pulses begins
- the actions to take on clear-back signals, clear-forward signals, and reanswer signals
- the type of calls on which to generate meter pulses

Enter the information for physical trunk pulses in table MTSIGSYS. Table TRKSGRP contains an index in table MTSIGSYS (field MTICSSI). The index maps the signaling attributes to specified trunk subgroup types.

Limits

The following limits apply:

- Incoming trunks with a signaling type of SIGSYS can reference tuples in table MTSIGSYS. Field SIGDATA in table TRKSGRP has value SIGSYS. The trunks must reference tuples in table MTSIGSYS that have the value GENERATION in field FUNCTION.
- You cannot delete a tuple in table MTSIGSYS if references to the tuple are present in table TRKSGRP.

MTSIGSYS (continued)

- The generation of a clear-back signal has priority over the generation of meter pulses. If metering stops on a clear-back signal while the system generates a meter pulse, the pulse truncates, and the clear-back signal applies.
- Reception of a clear-forward signal has priority over meter pulses. Metering can stop on a clear-forward signal while the system generates a meter pulse. In this occurrence, the pulse truncates and the clear-forward actions start.
- The system does not support reception of pulses from an outgoing trunk.
- Table MTSIGSYS can contain a maximum of 64 tuples to limit the memory requirements of the international digital trunk controller (IDTC). A change to this limit requires a formal request from the operating company or Northern Telecom.
- You cannot distinguish some signals. You cannot distinguish operator ringback, from a meter pulse if the system transmits signals on the same bit. The administration must enter hardware trunk metering to prevent signaling errors that this incompatibility causes.
- C1 trunks support the DEMAND value in eld CALLSET of table MTSIGSYS. Other line signaling systems treat the DEMAND value in the same way as the ALLCALLS value.

The following limits are present:

- The real time consumed in the IDTC for generating hardware meter pulses is equal to the frequency of the pulses.
- An IDTC warm switch of activity (SWACT) can corrupt a physical pulse. The pulse width or inter-pulse gap can be zero to two times the length that you enter. Other signals that the system carries on the same bit as the meter pulses must have a minimum recognition length. The minimum recognition length must be twice the meter pulse length.

Data II sequence and meaning

Enter data in table TRKSGRP after you enter data in table MTSIGSYS.

Table size

0 to 64 tuples

MTSIGSYS (continued)**Data II**

Data II for table MTSIGSYS appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Description
MTSIGSYS		see subfield	<i>Metering for trunks signaling system key.</i> This field contains subfield MTSIGIDX. This field is the key field to table MTSIGSYS.
	MTSIGIDX	alphanumeric (1 to 16 characters)	<i>Metering for digital trunks signaling system index.</i> Enter a user-defined character string that identifies each tuple.
MTVAR		see subfield	<i>Metering for digital trunks signaling system variable area.</i> This field contains subfield FUNCTION.
	FUNCTION	GENERATION or RECEPTION	<i>Signaling function.</i> Enter the signaling function that indicates the correct application. If the entry is GENERATION, enter data in refinements SUPVBITS, CALLSET, CLGCLB, CLGRAN, CLDCLF, CLDRAN, PLSWIDTH, IPLSGAP, and ANSDELAY. Start on this page.. If the entry is RECEPTION, enter data in refinements SUPVBITS, BIT, IDLSTATE, CALLSET, CLGCLB, CLGRAN, CLDCLF, CLDRAN, MINPLSWD, MAXPLSWD, MINIPGAP, GUARDTIM, ANSREQD. Start with refinement LOGZERO in Section "FUNCTION = RECEPTION".. The entry NIL is not correct for datafill. The use of NIL allows you to create a nil tuple for table initialization. If you enter NIL, the system outputs the following message: THE NIL FUNCTION ALREADY EXISTS AND CANNOT BE USED The default value is GENERATION.

MTSIGSYS (continued)

FUNCTION = GENERATION

If the entry in sub eld FUNCTION is GENERA TION, enter data in re nements PLSWIDTH, IPLSGAP, and ANSDELAY as the following table describes.

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 1 of 9)**

Field	Subfield or refinement	Entry	Description
	SUPVBITS	see subfields	<i>Supervisory bits and idle states.</i> This subfield is a vector of a maximum of four multiples of subfields BIT and IDLSTATE. If less than four multiples are required, end the list with a \$ (dollar sign). Separate each subfield with a single space. This datafill indicates which bits that the system uses to generate meter pulses. This field indicates the states of these bits when the system does not generate pulses.
	CALLSET	ALLCALLS or DEMAND	<i>Call type setting.</i> Enter the type of calls for which the system generates meter pulses: Enter ALLCALLS if additional screening conditions are not a requirement. Enter ALLCALLS if the system generates meter pulses for all calls. Enter DEMAND if demand calls, as the signaling system defines, generate physical pulses. In some signaling systems this value does not have a meaning. The default value is ALLCALLS.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 2 of 9)**

Field	Subfield or refinement	Entry	Description
	CLGCLB	NOCHANGE STOPHARD or STOPMTR	<i>Calling party control send clear back.</i> Enter the action to take when the calling party has control of the call and the system sends a clear-back signal. For example, the terminating party is on hook. Note that under called party control, a clear-back signal ends metering. Enter NOCHANGE to indicate that metering continues without changes. Enter STOPHARD to indicate that hardware metering stops. Software metering pulse count incrementing continues but physical pulse generation stops. Note that clear-back signals have priority over meter pulse. If the system generates a partial meter pulse, the clear-back signal overrides the pulse. The partial meter pulse indicates that the pulse is not complete.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 3 of 9)**

Field	Subfield or refinement	Entry	Description
			Enter STOPMTR to indicate that metering stops. Metering includes software pulse count incrementing and hardware physical pulse generation metering. Clear-back signals have priority over meter pulse if the system partially generates a meter pulse (not complete). The clear-back signal overrides the pulse. The default value is NOCHANGE.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 4 of 9)**

Field	Subfield or refinement	Entry	Description
	CLGRAN	NOCHANGE or RESUME	<i>Calling party control send reanswer.</i> Enter the action to take when the calling party has control of the call. Enter the action to take when the system sends a reanswer signal after the clear-back signal. For example, the terminating party is back off hook. Enter NOCHANGE to indicate that metering continues without changes. Enter RESUME to indicate that metering resumes after the system generates a clear-back signal. If hardware and software metering stop, the two processes start again. If hardware metering stops, hardware metering starts again. The default value is NOCHANGE.
	CLDCLF	NOCHANGE STOPHARD or STOPMTR	<i>Called party control receive clear forward.</i> Enter the action to take when the called party has control of the call and the system receives a clear-forward signal. For example, the originating party is on hook. Under calling party control, a clear-forward signal stops metering.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 5 of 9)**

Field	Subfield or refinement	Entry	Description
			Enter NOCHANGE to indicate that metering continues without changes. Enter STOPHARD to indicate that hardware metering stops. Software metering pulse count incrementing continues but physical pulse generation stops. If you send a meter pulse when the system receives a clear-forward signal, the meter pulse does not complete. Enter STOPMTR to indicate that metering stops. The metering that stops include both software pulse count incrementing and hardware physical pulse generation metering. If you send a meter pulse when the system receives a clear-forward signal, the meter pulse does not complete. The default value is NOCHANGE.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 6 of 9)**

Field	Subfield or refinement	Entry	Description
	CLDRAN	NOCHANGE or RESUME	<i>Called party control return to answered state.</i> This field indicates the action to take when the called party has control of the call. This field indicates the action you must take when the call returns to an answered state after the clear-forward signal. For example, the originating party is back off hook. Enter NOCHANGE to indicate that metering continues without changes. Enter RESUME to indicate that metering resumes. The metering resumes when the system cannot continue to detect clear-forward signal. If hardware and software metering stop, the two start again. If hardware metering stops, hardware metering starts again. The default value is NOCHANGE.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 7 of 9)**

Field	Subfield or refinement	Entry	Description
	PLSWIDTH	0 to 1000	<i>Pulse width.</i> Enter the length of time, in 10-ms increments, that the signaling bits are not idle. This time indicates that the system generates a meter pulse. International extended multiprocessor system (XMS)-based peripheral module (XPM) restrictions require that this value be in multiples of 50 ms and non-zero. Additional restrictions require that this value, added with the value in field IPLSGAP, must total a multiple of 100 ms. The default value is 1 000.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 8 of 9)**

Field	Subfield or refinement	Entry	Description
	IPLSGAP	0 to 1000	<i>Idle pulse gap.</i> Enter the length of time, in 10-ms increments, that the signaling bits are not idle. This time indicates that the system generates a meter pulse. International XPM restrictions require that this value be in multiples of 50 ms and non-zero. Additional restrictions require that this value, added with the value in field PLSWIDTH, must total to a multiple of 100 ms. The default value is 1 000.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			
Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 9 of 9)**

Field	Subfield or refinement	Entry	Description
	ANSDELAY	0 to 1000	<i>Answer delay.</i> Enter the length of time, in 10-ms increments, for the metering delay after answer or reanswer occurs. International XPM restrictions require that this value be in multiples of 100 ms. This field allows the answer or reanswer signal to settle at the originating exchange before meter pulses are expected. The delay of the first meter pulse can be a maximum of 300 ms. This delay occurs because the international XPM metering system uses a timer. This timer does not depend on the call process signaling timer. The default value is 1000. Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timer for metering. The timer does not change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse. The system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal. Line signaling has priority over meter pulsing. The originating office continues to recognize the partial pulse. This process depends on the amount of the pulse that the system generates. This process also depends on the state the signal bit and the reception parameters of the outgoing trunk.

FUNCTION = RECEPTION

If the entry in sub eld FUNCTION is RECEPTION, enter data in the following re nements as described in the follo wing table:

- SUPVBITS
- BITS
- IDLSTATE
- CALLSET

MTSIGSYS (continued)

- CLLGCLB
- CLGRAN
- CLDCLF
- CLDRAN
- PLSWIDTH
- IPLSGAP
- ANSDELAY

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 1 of 8)**

Field	Subfield or refinement	Entry	Description
	SUPVBITS	see subfields	<i>Supervisory bits and idle states.</i> This subfield is a vector of a maximum of four multiples of subfields BIT and IDLSTATE. If you require less than four multiples are a requirement, end the list with a \$ (dollar sign). Separate each subfield with a single space. This datafill indicates which bits are used in meter pulse generation. This datafill indicates the states of these bits when the system does not generate pulses.
	BIT	A, B, C, or D	<i>Supervision bit.</i> Enter a trunk signaling bit that the system uses for the transmission of meter pulses. Note: At the present time, the system supports one bit. The system denies more than one bit. The default value is C.
	DLSTATE	0 or 1	<i>Idle state of the bit.</i> Enter the state of the bit when the system does not generate pulses 0 (zero) or 1. The default value is 1.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 2 of 8)**

Field	Subfield or refinement	Entry	Description
	CALLSET	ALLCALLS or DEMAND	<i>Call type setting.</i> Enter the type of calls for which the system generates meter pulses: Enter ALLCALLS if additional screening requirements are not necessary and the system generates meter pulses for all calls. Enter DEMAND if the system only generates physical for demand calls. The signaling system defines which calls are demand calls. In some signaling systems, this value does not have a meaning. The default value is ALLCALLS.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 3 of 8)**

Field	Subfield or refinement	Entry	Description
	CLGCLB	NOCHANGE STOPHARD or STOPMTR	<i>Calling party control send clear back.</i> Enter the action to take when the calling party has control of the call and the system must send a clear-back signal. For example, the terminating party is on hook. With called party control, a clear-back signal stops metering. Enter NOCHANGE to indicate that metering continues without changes. Enter STOPHARD to indicate that hardware metering stops. Software metering pulse count incrementing continues but physical pulse generation stops. Clear-back signals have priority over meter pulses. If the system generates a partial meter pulse (not complete), the clear-back signal overrides the pulse. Enter STOPMTR to indicate that metering stops. This process includes software pulse count incrementing and hardware physical pulse generation metering. Clear-back signals have priority over meter pulse. If the system generates a partial meter pulse generated (not complete), the clear-back signal overrides the pulse. The default value is NOCHANGE.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 4 of 8)**

Field	Subfield or refinement	Entry	Description
	CLGRAN	NOCHANGE or RESUME	<i>Calling party control send reanswer.</i> Enter the action to take when the calling party has control of the call and the system must send the reanswer signal after the clear-back signal. For example, the terminating party is back off hook. Enter NOCHANGE to indicate that metering continues without changes. Enter RESUME to indicate that metering resumes after the system generates clear-back signal. If hardware and software metering stop, the two processes resume. If only hardware metering stops, hardware metering resumes. The default value is NOCHANGE.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 5 of 8)**

Field	Subfield or refinement	Entry	Description
	CLDCLF	NOCHANGE STOPHARD or STOPMTR	<i>Called party control receive clear forward.</i> Enter the action to take when the called party has control of the call and the system receives a clear-forward signal. For example, the originating party is on hook. Note that under calling party control, a clear-forward signal automatically stops metering. Enter NOCHANGE to indicate that metering continues without changes. Enter STOPHARD to indicate that hardware metering stops. Software metering pulse count incrementing continues but physical pulse generation stops. If the system sends a meter pulse when the system receives a clear-forward signal, the meter pulse does not complete. Enter STOPMTR to indicate that metering stops. This process includes both software (pulse count incrementing) and hardware (physical pulse generation) metering. If the system sends a meter pulse when the system receives a clear-forward signal, the meter pulse does not complete. The default value is NOCHANGE.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 6 of 8)**

Field	Subfield or refinement	Entry	Description
	CLDRAN	NOCHANGE or RESUME	<i>Called party control return to answered state.</i> This field indicates the action to take when the called party has control of the call and the call returns to an answered state after the clear-forward signal. For example, the originating party is back off hook. Enter NOCHANGE to indicate that metering continues without changes. Enter RESUME to indicate that metering resumes after the system cannot continue to clear-forward signal. If hardware and software metering stop, the two processes resume. If only hardware metering stops, hardware metering resumes. The default value is NOCHANGE.
	MINPLSWD (BCS33-)	10 to 1000	<i>Minimum pulse duration.</i> Enter the minimum duration, in 10-ms increments. Enter the duration of a signal change to the non-idle state of a metering bit. Enter the duration of a change that occurs before the system recognizes the bit as a potential meter pulse. The default value is 1000.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 7 of 8)**

Field	Subfield or refinement	Entry	Description
	MAXPLSWD (BCS33-)	10 to 1000	<i>Maximum pulse duration.</i> Enter the maximum duration, in 10-ms increments. Enter the duration of a signal change to the non-idle state of a metering bit. Enter the duration of a change that occurs before the system recognizes the bit as a potential meter pulse. The default value is 1000.
	GUARDTIM (BCS33-)	10 to 1000	<i>Guard timer.</i> If the entry in field CLDCLF is STOPMTR, enter data in this refinement. Enter the duration, in 10-ms increments. Enter the duration that scanning suppresses the metering bit after the outgoing trunk sends a clear forward signal. The system can confuse the superfluous incoming meter pulses with other signals. This process minimizes the confusion of the system that can occur after the originator goes on hook, like operator ringback. The default value is 1000.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

MTSIGSYS (continued)**Field descriptions for conditional data II (Sheet 8 of 8)**

Field	Subfield or refinement	Entry	Description
	ANSREQD (BCS33-)	Y or N	<i>Answer required.</i> Enter Y (yes) to indicate that an answer signal is a requirement before a scan for meter pulses begins. N (no) is not a correct entry.
	LOGZERO (BCS33-)	Y or N	<i>Log zero.</i> Enter Y to indicate that central control (CC) must generate a log. The CC must generate a log if a call has data entries to receive meter pulses but did not receive pulses. If this condition does not occur, enter N. The default value is N.
Note 1: If the system suspends hardware metering, the timing of pulses resumes the pattern used before the clear-back signal. The system does not stop pulsing on pulses that can register. Recovery of these pulses cannot occur. The call tariff determines the internal timing for metering. The internal metering cannot change. Note 2: If the system suspends hardware and software metering, the timing resumes at the point where the system stops the metering. Metering continues as though an interruption did not occur. Pulses are not lost but a delay in pulses occurs. Note 3: If the system cannot account for partial pulses, metering resumes when the system generates the next pulse after the reanswer signal. Note 4: The system immediately applies the answer delay timing. The system applies the delay timing after the change from the clear-back state. The system applies the delay timing before metering resumes. This process allows the system to settle the reanswer signal.			

Data II example

Sample data II for table MTSIGSYS appears in the following example.

MTSIGSYS (continued)

MAP example for table MTSIGSYS

MTSIGSYS

C1MTRSIG
GENERATION (C 1) \$ DEMAND STOPHARD RESUME STOPMTR NOCHANGE 15 15 20

Additional information

This section provides an example of how timing elds in table MTSIGSYS apply to a trunk.

Example of timing elds

The way in which timing elds in table MTSIGSYS apply to a C1 NTLS20 signaling trunk appear Figure 1. Assume that the system suspends the calling party control and hardware pulsing during the clear-back signal.

MTSIGSYS (end)

Timing elds on a C1 NTL20 signaling trunk



MULTITM

Table name

Multi Time Zone Support

Functional description

Table MULTITM is used to contain the data for different timezones where customer lines are located. It contains offsets from the CM clock time, taking into account variations in Daylight Savings Time.

Datafill sequence and implications

There is no requirement to datafill tables in a specific order.

Table size

Memory is allocated as required to allow a maximum of 100 tuples.

Datafill

The following table lists the datafill for table MULTITM.

Field descriptions

Field	Subfield	Entry	Explanation and action
MTZNAME		MULTITM_KEY Alphanumeric (1 to 4 characters)	Key
	TMSENSE	MODIFY {POS, NEG}	Is offset positive or negative?
	MINUTES	MTZMINSTYPE {0 TO 1560}	Minutes to offset from CM clock
	DST	YES_NO {NO, YES}	Does timezone have DST?
	DSTSENSE	MODIFY {POS, NEG}	Is DST offset positive or negative?
	DSTMINS	DSTMINSTYPE {0 TO 120}	Extra minutes to offset from DST
	STRTYEAR	MTZYEARSTYPE {2000 TO 3000}	Year when DST period starts
	STRTMON	MONTHS {jan, feb, mar, ...}	Month when DST period starts

MULTITM (end)**Field descriptions**

Field	Subfield	Entry	Explanation and action
	STRTDAY	DAYS {1 TO 31}	Day when DST period starts
	STRTHOUR	HOURS {0 TO 23}	Hour when DST period starts
	STRTMIN	MINUTES {0 TO 59}	Minute when DST period starts
	ENDYEAR	MTZYEARTYPE {2000 TO 3000}	Month when DST period ends
	ENDMON	MONTHS {jan, feb, mar, ...}	Month when DST period ends
	ENDDAY	DAYS {1 TO 31}	Day when DST period ends
	ENDHOUR	HOURS {0 TO 23}	Hour when DST period ends
	ENDMIN	MINUTES {0 To 59}	Minute when DST period ends

Datafill example

The following example shows sample datafill for table MULTITM

Table MULTITM

```
BERL POS 60 Y POS 60 2002 MAR 31 2 0 2002 OCT 27 3 0
TOKY POS 540 N POS 0 2002 JAN 1 0 0 2002 JAN 1 0 0
```

Table history**SN07 (DMS)**

Table name MULTITZ corrected to MULTITM according to CR Q00952633.

SN05 (DMS)

Feature A59038784 introduced this table into SN05 (DMS).

MUMRMBI**Table name**

Multiunit Message Rate Message Billing Index Table

Functional description

Table MUMRMBI holds all information relating to message billing indexes (MBI).

For related information, refer to table MRSANAME.

Data II sequence and implications

Table MUMRTAB must be data lled before table MUMRMBI.

Table size

0 to 63 tuples

Data II

The following table lists data II for table MUMRMBI.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
MUMRKEY		0 to 255	<i>Multiunit message rate key</i> Enter the key indexed from table MUMRTAB, field MUMRMBI.
DETAILED		Y or N	<i>Detailed entries on AMA tape</i> Enter Y to record the called number on the automatic message accounting (AMA) tape. Otherwise, enter N.
TIMED		Y or N	<i>Timed calls</i> Enter Y to record timing call data on the AMA tape. Otherwise, enter N.

MUMRMBI (end)

Field descriptions (Sheet 2 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RECRDMBI		Y or N	<i>Record message billing index</i> Enter Y to record the message billing index (MBI) on the AMA tape. Otherwise, enter N.
MBI		0 to 999	<i>Message billing index</i> Enter the MBI, 1 to 999, to record it on the AMA tape. Enter 0 (zero) to record a NO BILLING entry. Note: After 63 tuples, this field defaults to 0 (zero).

Data ll e xample

The following example shows sample data ll for table MUMRMBI.

MAP display example for table MUMRMBI

MUMRKEY	DETAILED	TIMED	RECRDMBI	MBI
20	N	N	Y	1

Table history

BCS36

Added note to eld MBI.

MUMRTAB

Table name

Multiunit Message Rate Screening

Functional description

Table MUMRTAB is used to determine the index into table MUMRMBI (Multiunit Message Rate Message Billing Index). A unique index is specified for each combination of Multiunit Message Rate (MUMR) area name and dialed digits for the destination office code or numbering plan area (NPA) plus the office code.

The key to table MUMRTAB has the following three subfields:

- MUMRNAME is the MUMR area name assigned to the particular originator in table LINEATTR, field MRSA (message rate serving area) or in table TRKGRP, field GRPINF0.MRSA for trunk group type P2.
- MUMRCDTP is the assigned context of the dialed digits that is specified in each tuple so that two tuples can exist with the same MRSANAME and dialed digits but with different MUMRMBI indices. The refinements of this key subfield are described as follows:
 - ANY indicates that any dialed number beginning the table MUMRTAB digits will match. When two tuples appear in table MUMRTAB with the same dialed digits and MRSANAME, the 'ANY' tuple will be selected by call processing prior to tuples with either of the other code types.
 - NPA indicates that the digits dialed must consist of at least 10 digits after any prefix digit(s) in order for the tuple to match.
 - OFC indicates that the dialed digits must consist of less than 10 digits (that is, must be a 7-digit number) in order for the tuple to match.
- DGLIDX is the digits dialed, starting with the office code of the destination or with the NPA plus the office code of the destination.

For related information, refer to table MRSANAME.

Datafill sequence and implications

The following tables must be datafilled before table MUMRTAB:

- MRSANAME
- MUMRMBI

Table size

0 to 4095 tuples

MUMRTAB (continued)**Datafill**

The following table lists datafill for table MUMRTAB.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
KEY		(see subfields)	<i>Key</i> This field consists of subfields MUMRNAME, MUMRCDTP, and DGLIDX.
	MUMRNAME	alphanumeric (up to 8 characters)	<i>Multiunit message rate area name</i> Enter the name of a Multiunit Message Rate (MUMR) area. This name must appear in table MRSANAME, field MRSA. The total number of MUMR area names must not exceed 127.
	MUMRCDTP	ANY, NPA, or OFC	<i>Multiunit message rate codetype</i> To assign a MUMRMBI index for an NPA-NXX digit string which begins with the same three digits as an office code in the same MRSA, perform the following steps: 1. Create a new tuple with the `NPA' code type and specify the NPA-NXX digit string as the dialed digits.</li> <li>2. Create a tuple with the `OFC' code type and specify the NXX, which consists of the same digits as the NPA above, as the dialed digits. 3. If an `ANY' tuple is present with the same digits as the NPA, delete it. Note: Datafill example of this sequence follows.

MUMRTAB (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	DGLIDX	numeric (up to 18 digits)	<i>Dialed digits</i> Enter the leading digits of the destination numbers within the MUMR area defined in subfield MUMRNAME. If the destination office code is within the originator's serving NPA, the leading digits are the office code digits NXX (N is a digit from 2 to 9; X is a digit from 0 to 9). Otherwise, the leading digits are NPA plus NXX of the destination office code. Note: If the call encounters AIN, and metered rate billing is applicable to the call, the full NPA-NXX digit string must be datafilled in subfield DGLIDX.
MUMRMBI		0 to 255	<i>Multiunit message rate message billing index</i> Enter the index into table MUMRMBI.
ECSDENY		Y or N	<i>Extended Calling Service denied</i> Enter Y to block Extended Calling Service (ECS) and Extended Rate Area calls, or enter N to allow such calls.

Datafill example

The following example of datafill for table MUMRTAB shows the sequence involved in assigning a MUMRMBI index for an NPA-NXX digit string beginning with the same three digits as an office code in the same MRSA.

Initial: MAP display example for table MUMRTAB

TABLE: MUMRTAB

KEY

MUMRMBI

ECSDENY

MRSA2	ANY	562	1	N
MRSA2	ANY	563	5	Y

MUMRTAB (continued)**Step 1: MAP display example for table MUMRTAB**

TABLE: MUMRTAB				
KEY			MUMRMBI	ECS_DENY

MRSA2	ANY	562	1	Y
MRSA2	NPA	562223	2	N
MRSA2	ANY	563	5	N

Step 2: MAP display example for table MUMRTAB

TABLE: MUMRTAB				
KEY			MUMRMBI	ECS_DENY

MRSA2	ANY	562	1	Y
MRSA2	NPA	562223	2	N
MRSA2	OFC	562	1	Y
MRSA2	ANY	563	5	N

Step 3: MAP display example for table MUMRTAB

TABLE: MUMRTAB				
KEY			MUMRMBI	ECS_DENY

MRSA2	NPA	562223	2	N
MRSA2	OFC	562	1	Y
MRSA2	ANY	563	5	N

MUMRTAB (end)

Additional information

Error and warning messages

Error and warning messages are as follows.

Notification, warning, and error messages for table MUMRTAB

Message	Description
WARNING::Digit blocks over 95% capacity. Allocated 32766 Used XXXX	When the digilator block size for table MUMRTAB reaches 95% of 32,766 capacity, the system displays this warning message. 'XXXX' represents the current number of digit blocks in use.
ERROR::This tuple will exceed the allocated digit block size.	If an attempt is made to datafill a tuple which extends beyond the allocated block size of 32,766 digit blocks, the system displays this error message and does not add the tuple.

Table history

SN07 (DMS)

Added new warning and error messages, with descriptions, to resolve CR Q00880685-01.

NA016

Feature A59029045 added subfield ESCDENY to allow for blocking of Extended Calling Service (ECS) and Extended Rate Area calls for the following types of originating agents:

- 1MR lines
- P2/PX trunks

NA008

Added subfield MUMRCDTP to the table key and added the subfield refinements ANY, NPA, and OFC.

MWDATA

Table name

Milliwatt Data Table

Functional description

Table MWDATA provides different milliwatt (mW) values for the of ce. Table MWDATA can have a maximum of ten different milliwatt values set for the of ce. Milliwatt values are the level in decibels (dB) and frequency in hertz (Hz). The of ce uses table MWD ATA when the of ce requires a milliwatt reference value. Table CLLIMTCE provides a milliwatt index number that indexes table MWDATA.

The trunk group determines the milliwatt level required. You can use standard table control aspects to change table MWDATA. Add, change, and delete the milliwatt values in positions 1 to 9, eld IDXKEY , as required. You can change the value in position 0. You cannot delete the value in position 0. Position 0 must contain the standard milliwatt value for the of ce.

For a specified cp_id of a circuit, an update of the milliwatt level and frequency elds occurs. The system indicates if the information is correct. If the information is not correct, the system uses the standard milliwatt value assigned for the of ce. Position 0 in table MWDATA always has the standard value assigned.

Note: Position 0 of eld IDXKEY in table MWDATA must always contain data ll.

Data ll sequence and meaning

You do not need to enter data in other tables before you enter data in table MWDATA.

Table size

1 to 10 tuples

Data ll

Field names, sub eld names, and correct data ranges for table MWD ATA appear in the following table.

MWDATA (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
IDXKEY		0 to 9	<i>Milliwatt index key.</i> Enter the milliwatt (mW) index. This field is the key to the table. The index 0 must contain data. You cannot delete index 0. You can change the values in field MWDATA. You can add, change or delete all other indexes.
MWDATA		see subfields	<i>Milliwatt data.</i> This field contains subfields LEVEL and FREQ.
LEVEL		1000 to 1000	<i>Decibel level.</i> Enter the decibel level in 0.1-dB steps. An entry of 10 equals a decibel gain of 1 dB. An entry of -10 equals a loss of 1 dB. Note: You can only change values against index 0.
FREQ		0 to 16 000	<i>Milliwatt frequency.</i> Enter the milliwatt frequency in Hertz. Any entry outside the range indicated for this field is not correct. Note: You can only change values against index 0.

Data ll e xample

Data ll for table MWD ATA appears in the following example.

The example contains the assignment of index 0. The index 0 contains a standard North American level of 0 dB and a frequency of 1004 Hz.

MWDATA (end)

MAP example for table MWDATA

IDXKEY	MWDATA
0	0 1004

N7CLLDGT

Table name

N7 (CCITT No.7) Called Global Title Table

Functional description

Table N7CLLDGT is available on DMS-300 Gateway switches that support the signaling connection control point (SCCP) gateway function.

Table N7CLLDGT maps the 30 general global titles, GT1 to GT30. The general global titles index the called global titles (GT) in operational measurement (OM) group C7SCCPA1 to called GTs.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table N7CLLDGT.

Table size

0 to 30 tuples

The number of user entries determines the table size.

Data II

Data II for table N7CLLDGT appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
GTKEY		see subfield	<i>Gateway key.</i> This field is the key to the table and contains subfield CALLEDGT.
	CALLEDGT	0 to 9 (1 to 5 digits)	<i>Correct called global title.</i> Enter the general global title (GT) identifier.
GENGTID		GT1 to GT30	<i>General global title identifier.</i> Enter the general GT identifier. This field maps the key field to the operational measurement (OM) registers in OM C7SCCPA1.

Data II example

Sample data II for table N7CLLDGT appears in the following example.

N7CLLDGT (end)

GTKEY	GENGTID
12345	GT24

Additional information

Information on error messages that can appear when you enter data in table N7CLLDGT appears in this section.

Error messages

The following error message appears when you attempt to add a general GT that is already present in a table.

This general global title is already in use.

When you attempt to add a key, part of which is mapped to another general GT, the following error message appears. For example, part of 123 appears in 1234.

Part of the key is already datafilled.

N7CLLGGT

Table name

N7 (CCITT No.7) Calling Global Title Table

Functional description

Table N7CLLGGT is available on DMS-300 Gateway switches that support the service connection control point (SCCP) gateway function.

Table N7CLLGGT maps the 30 general global titles (GT1 to GT30). The general global titles index called global titles (GT) in operational measurement (OM) groups C7SCCPA1 and C7SCCPA2 to calling global titles.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table N7CLLGGT.

Table size

0 to 30 tuples

The number of user entries determines the table size.

Data II

Data II for table N7CLLGGT appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
GTKEY		see subfield	<i>Gateway key.</i> This field is the key to the table and contains subfield CALLNGGT.
	CALLNGGT	0 to 9 (1 to 5 digits)	<i>Correct calling global title.</i> Enter the correct calling global title (GT) to map to the general GT identifier.
GENGTID		GT1 to GT30	<i>General global title identifier.</i> Enter the general GT identifier. This field maps the key field to the OM registers in C7SCCPA1.

Data II example

Sample data II for table N7CLLGGT appears in the following example.

N7CLLGGT (end)

GTKEY	GENGTID
23456	GT24

Additional information

This section provides information on error messages that can appear when you enter data in table N7CLLGGT.

Error messages

The following error message appears when you try to add a general GT that is already present in a table.

This general global title is already in use.

If you try to add a key, part of which is mapped to another general GT, the following error message appears. For example, part of 123 appears in 1234.

Part of the key is already datafilled.

NACDGRP

Table name

Network Automatic Call Distribution Group

Functional description

Table NACDGRP provides a means of determining which Automatic Call Distribution (ACD) group a call is presented. This is accomplished by providing a means of communication or networking between ACD groups.

Table NACDGRP designates an ACD group as a networked ACD group and provides additional information on networking capabilities.

Call queue threshold, wait time threshold, preference weighting factors, and associated network group information are defined in this table.

For related information, refer to table ACDGRP.

Data II sequence and implications

The following tables must be data lled before table N ACDGRP.

- ACDGRP
- REMNACD

Table size

Not applicable

Data II

The following table lists data II for table N ACDGRP.

Field descriptions (Sheet 1 of 5)

Field	Subfield or refinement	Entry	Explanation and action
ACDGRP		alphanumeric (1 to 16 characters)	<i>Automatic Call Distribution group</i> Enter the name assigned to the ACD group.
QTHRESH		0 to 511	<i>Queue threshold size</i> Enter the maximum number of calls treated as nodal calls. After this number is reached, all subsequent calls are deflected to the network for treatment. A value of 0 (zero) means that the ACD group does not have call queuing capability.

NACDGRP (continued)**Field descriptions (Sheet 2 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
WTHRESH		0 to 1800	<i>Wait threshold time</i> Enter the maximum time (in seconds) that a call has to wait in the incoming call queue. After this number is reached, all subsequent calls are deflected to the network for treatment. A value of 0 (zero) means that the ACD group does not have call queuing capability.
PWF		0 to 31	<i>Preference weighting factor</i> Enter the preference weighting factor (PWF) associated with the specified network ACD (NACD) group. A high PWF indicates that calls must be answered by the source NACD group and not overflowed to the network. Any entry outside the range indicated for this field is invalid.
BESTGRP		Y or N	<i>Best group</i> Enter Y (yes) if the source group is considered when determining the best group. Otherwise, enter N (no).
SRVRATE		0 to 600	<i>Service rate</i> Enter the number of seconds it takes to service a typical NACD call. This field is used in the calculation of the resource index (RI) for each NACD group if there are no idle agents.
NUMIDLE		0 to 255	<i>Number of idle agents</i> This field indicates the level of sensitivity of the number of idle agents for each NACD. It does this by calculating the RI. As the NUMIDLE factor is increased, the calculated RI also increases.
TIMEIDLE		0 to 600	<i>Time idle</i> This field indicates the level of sensitivity of the idle time of the most idle agent for each NACD. This is done through the calculation of the RI. As the TIMEIDLE factor decreases, the RI calculated increases as the idle time for the most idle agent increases.
NTWKGRPS		see subfield	<i>Network groups</i> This field consists of subfield NACDSEL.

NACDGRP (continued)**Field descriptions (Sheet 3 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	NACDSEL	LCL or REM	<i>Network ACD selector</i> Enter LCL (local) if calls are overflowed to a local ACD group. Datafill refinements LCLGRP and PWF. Enter REM (remote) if calls are overflowed to a remote ACD group. Datafill refinements REMGRP and PWF.
	LCLGRP	alphanumeric (1 to 16 characters)	<i>Local Automatic Call Distribution group</i> If the entry in subfield NACDSEL is LCL, datafill this refinement. Enter the name assigned to the associated local ACD group.
	REMGRP	alphanumeric (0 to 16 characters)	<i>Remote Automatic Call Distribution group</i> If the entry in subfield NACDSEL is REM, datafill this refinement. Enter the name assigned to the associated remote ACD group.
	PWF	0 to 31	<i>Preference weighting factor</i> If the entry in field NACDSEL is LCL or REM, datafill this refinement. Enter the preference weighting factor associated with the specified NACD group. A high PWF indicates that calls must be answered by the specified NACD group and not overflowed to the network. Any entry outside the range indicated for this field is invalid.
OPTIONS		see subfield	<i>Options</i> This field consists of subfield OPTION.
	OPTION	NETOVFL or \$	<i>Option</i> The NETOVFL option enables NACD calls to receive nodal ACD threshold treatment instead of network treatment if threshold fields MAXCQSIZ or MAXWAIT in table ACDGRP are exceeded for the NACD group. This option is software dependent. Up to two options can be datafilled. If fewer than two options are required, end the list with a \$(dollar sign). The default value for this field is \$.

NACDGRP (continued)**Field descriptions (Sheet 4 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
		BSYTMT	This option lets callers receive the BUSY treatment if they call a NACD group which is in Night Service when other NACD groups in the network are still taking calls but have no available agents or queue slots. If BUSY treatment was not applied, the caller would assume the NACD group was available for taking calls and would continue calling.
		NACDPEG	<i>NACD pegging</i> Datafilling this option specifies the NACD group as a peg group. NACD peg groups are used for pegging operational measurements (OM) to poll the status of other groups in the network. A peg group does not broadcast its RI to any other group. The NACDPEG option cannot be assigned to any tuple that has ACD agents assigned. No agents can be assigned to a tuple that uses the NACDPEG option. Note: NACDPEG applies only to Multi-market Platform (MMP) switches. Do not attempt to use on North American (NA) switches.
		NBI	Option Enter NBI if the NACD Broadcast Interval option is required. The NBI option allows the RI broadcast interval for a particular ACD group to be specified separately for remote and local broadcasts. Note: NBI applies only to Multi-market Platform (MMP) switches. Do not attempt to use on North American (NA) switches. Complete refinements LOCAL_BROADCAST_INTERVAL and REMOTE_BROADCAST_INTERVAL. Without the NBI option, the process that broadcasts the RI to ACD groups operates at the same frequency for both local and remote broadcasts. Frequent remote broadcasts can cause network problems at busy times.

NACDGRP (end)

Field descriptions (Sheet 5 of 5)

Field	Subfield or refinement	Entry	Explanation and action
	LOCAL_ BROADCAST_ INTERVAL	numeric (1 to 1800)	<i>Local Broadcast Interval</i> Enter a value for the local interval.
	REMOTE_ BROADCAST_ INTERVAL	numeric (1 to 1800)	<i>Remote Broadcast Interval</i> Enter a value for the remote interval. The interval value for the remote broadcast is controlled by Software Optionality Control (SOC). If the SOC password has not been entered, the range of values you can enter for the remote interval varies from 10 to 1800. Values of 1 to 9 are not allowed.

Data ll e xample

The following example shows sample data ll for table N ACDGRP.

MAP display example for table NACDGRP

ACDGRP	QTHRESH	WTHRESH	PWF	BESTGRP	SRVRATE	NUMIDLE	TIMEIDLE	NTWKGRPS
OPTIONS								
ACDGRP1	5	5	10	N	1	5	1	5)
(LCL ACDGRP2) \$								
(BSYTMT) \$								

NARDATA**Table name**

Network Access Registers Data Table

Functional description

Network access registers (NAR) are used to control the ability of incoming and outgoing calls to terminate (throttling) on Meridian Digital Centrex (MDC) groups. Each MDC group can be assigned a NAR name. If the maximum number of simultaneous calls for a NAR are in progress, additional calls cannot be completed using that NAR.

Table NARDATA acts as a look-up table for all NARs. Table NARDATA can be data lled with the size of NARs and the over o w routes or treatments that apply if access is not available through the NAR name. The key eld is NARNAME.

Data ll sequence and implications

There is no requirement to data ll other tables prior to table N ARDATA.

Table size

0 to 8192 tuples

Data ll

The following table lists data ll for table N ARDATA.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
NARNAME		alphanumeric(up to 16 characters)	<i>Network access register name</i> Enter a network access register (NAR) name. This is the key field to table NARDATA. Note: NILNAR is not a valid entry for this field. NILNAR is used in other tables to route calls to default network class of service (NCOS) or customer group NAR names.
SIZE		0 to 2047	<i>Size</i> Enter the size assigned to the NAR name. This field indicates the maximum number of simultaneous calls that can be in progress for the NAR name. An entry of 0 (zero) blocks access.

NARDATA (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
OVFLRTE		see subfields	<i>Overflow route</i> This field is used to specify an alternative route if the maximum number of simultaneous calls are in progress. This field consists of subfields NARTRMT, NARNAME, and IBNTRMT.
	NARTRMT	NAR or OUTTRMT	<i>Network access register treatment</i> Enter NAR to specify another NAR name as the overflow route and datafill subfield NARNAME. Enter OUTTRMT to specify the IBN treatment applicable to outgoing calls only, and datafill subfield IBNTRMT.
	NARNAME	alphanumeric(up to 16 characters)	<i>Overflow network access register name</i> Enter an alternative NAR name for the overflow route. The NAR name entered cannot be the same NAR name entered in key field NARNAME for this tuple. Note: Do not create a loop of alternative NAR names. For example, if NAR name NARGRP1 overflows to NAR name NARGRP2, NARGRP2 must not overflow back to NARGRP1.
	BNTRMT	0 to 63	<i>Integrated Business Network treatment</i> Enter an Integrated Business Network (IBN) treatment number from field IBNTRMNT in table IBNTREAT to specify the overflow IBN treatment.

Data ll e xample

The following example shows sample data ll for table N ARDATA.

MAP display example for table NARDATA

NARNAME	SIZE	OVFLRTE
NARGRP1	5	OUTTRMT 6
NARGRP2	10	NAR NARGRP1

NARDATA (end)

Table history
BCS36

Table NARDATA was introduced

NATDGTAN

Table name

National Digit Analyser Table

Functional description

Table NATDGTAN provides extended multiprocessor system (XMS)-based peripheral module (XPM) digit analysis. Table NATDGTAN provides this analysis for the multifrequency compelled (MFC) CCITT signaling system R2 (MFC-R2) protocol. Table NATDGTAN improves register signaling through digit analysis in the XPM. Table NATDGTAN uses digit analysis in the XPM to save protocol time and reduce central control (CC) to XPM messages. The DMS-300 and international DMS-100/200 switches that support R2 signaling include table NATDGTAN.

You must report some digits before the end of in-pulsing to support end-to-end protocol. The system sends the number of digits in this `rst-digits` message to the XPM. Table NATDGTAN defines this digit analysis for national codes. Table NATDGTAN functions as a pre-translation reference table for terminating calls.

The system downloads the entries in table NATDGTAN to XPMs. The system downloads the entries during a system or manual return to service (RTS) as part of the static data. Use the RTS command at a MAP terminal to perform a manual RTS. Changes to the data in table NATDGTAN do not affect the XPM until the return to service completes.

Over o w

Table NTDGTAN contains ranges of national codes with a maximum of 64 tuples. When the system downloads a table to the XPM, a table over o w can occur. The table over o w causes an XPM software error message (log PM180) to appear. In this event, the examination of the ranges occurs. Delete tuples with very large ranges. Enter only the necessary codes. You cannot add new tuples until you correct the over o w condition.

Data ll sequence and meaning

You do not need to enter data in other tables before you enter data in table NATDGTAN.

Table size

Maximum table size is 64 tuples.

NATDGTAN (continued)**Data II**

Data II for table N ATDGTAN appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
INDEX		0 to 63	<i>Table index.</i> Enter the table index value.
FROMDIGS		0 to 9 and B to F (a maximum of 4 digits)	<i>Start of range.</i> Enter the digits that define the beginning of the code range. Enter hexadecimal values B to F only in the first digit of a code.
TODIGS		0 to 9 and B to F (a maximum of 4 digits)	<i>End of range.</i> Enter the digits that define the end of the code range. Enter hexadecimal values B to F only in the first digit of a code.
MINDIGS		0 to 24	<i>Minimum digits.</i> Enter the number of non-optional digits when the first message requires all digits. Use a shorter inter-digit time out when you reach the minimum digits value.
MAXDIGS		0 to 24	<i>Maximum digits.</i> Enter the maximum number of digits required for the first message. If the first message requires all digits, enter the maximum expected number.

Data II e xample

Sample data II for table N ATDGTAN appears in the following example.

MAP example for table NATDGTAN

INDEX	FROMDIGS	TODIGS	MINDIGS	MAXDIGS
1	14	18	2	2

NATDGTAN (end)

Table history

BCS34

Table NATDGTAN was introduced in BCS34.

NBECCODE

Table name

Non-Bell Exchange Company Code Table

Functional description

Table NBECCODE provides the NBEC codes for non-Bell companies for whom the operating company is providing either Toll and Assist or Directory Assistance service or both.

This table uses the calling number to determine the company involved in the call for whom the operating company is providing service. The operating company assigns each NBEC a unique four-digit code in the range 1000 to 9999. The NBEC code data lled in table NBECCODE is used to access table BRANDANN for NBECs.

This table is accessed only if the incoming trunk group is data lled in table BRANDOPT and eld NBECLOOK is set to Y (yes).

With feature AN0410 in TOPS03, this table is accessed in cases other than branding. Table NBECCODE is also accessed during DA calls for trunks that need to pass NBEC codes to the DAS for announcement customizations and for ADACC screening.

There is no default data ll for this table. The table can remain empty until data is added to provide the company code for whom the operating company is providing operator services.

For related information, refer to table BRANDOPT.

Data ll sequence and implications

There is no requirement to data ll other tables prior to table NBECCODE.

Table size

The maximum number of tuples that can be added depends on how many digits of the calling number are used for each entry, since there is a limit on the number of digilator blocks that can be consumed. The total digilator blocks available for eld CLGDIGS is 32 767.

NBECCODE (end)**Data II**

The following table lists data II for table NBECCODE.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
CLGDIGS		up to 18 digits of the calling number	<i>Calling digits</i> Up to eighteen digits of the calling number beginning with the numbering plan area (NPA).
NBEC		1000 to 9999	<i>Non-Bell exchange company code</i> The code assigned to an NBEC by the operating company which uniquely identifies the company to the switch.

Data II example

The following example shows sample data II for table NBECCODE.

MAP display example for table NBECCODE

CLGDIGS	NBEC
512	1158
9157	1142
9153	2083

Table history**TOPS03**

Feature AN0410 in Cellular/IXC/LEC ADACC, OSDA0005:

- Added new use for table: during DA calls to pass NBEC to DAS.

NCOS

Table name

Network Class of Service

Functional description

Table NCOS consists of network class of service (NCOS) numbers that are assigned to attendant consoles (AC), Integrated Business Network (IBN), or Residential Enhanced Services (RES) stations, incoming or incoming side of two-way IBN trunk groups, authorization codes, and customer groups.

Each NCOS number without the Off-hook Queuing feature can be shared by one or many ACs, IBN stations, or an incoming side of a two-way IBN trunk group belonging to the customer group.

Each customer group can have a maximum of 512 NCOS numbers.

For examples of data ll, refer to the Data ll e xample section.

If the Partitioned Table Editor feature is present, the ownership of each tuple in table NCOS is defined in tables DATAOWNER and OWNTAB. The entries in table DATAOWNER that apply to table NCOS are those with field TABNAME set to CUSTGRP and field CUSTNAME set the same as the value of field CUSTGRP in table NCOS. If the entry in field TABNAME of table OWNTAB is set to NCOS, it applies to table NCOS.

The number of NCOS numbers assigned for each customer group depends on the value of option NONCOS assigned to the customer group in table CUSTENG.

Options

You can assign the following options to each NCOS number.

Account or authorization code last (ACR)

This option can be assigned to an NCOS number to indicate the stations have feature ACR. The ACR feature can be assigned only if the option ACR is assigned in table CUSTHEAD.

Specify if the optional announcement is applied to the station in order to prompt for the ACR feature. The announcement can be assigned only if option ACRANN is assigned in table CUSTHEAD.

NCOS (continued)

Advanced intelligent network local access and transport area (AINLATA)

This option supports LATA parameter population for an AIN 0.1 query when a centrex agent is triggering in the private environment. Use this option for customer groups that span over a number of LATAs.

Attendant NCOS (ATT)

This option is assigned if a different NCOS number is used when a caller with a line that is assigned to the NCOS number is being assisted by the AC. The NCOS number, which is applicable when being assisted by the AC, is required as supplementary information.

If the ATT option is not assigned the default, NCOS number of the AC is used when being assisted.

Category routing (CATRTE)

Assign this option to allow charge category routing in IBN translations.

Call Back Queuing (CBQ)

This option can be assigned to an NCOS number if feature CBQ is required. This option is not recommended for two-way trunk groups.

If a station with option CBQ encounters an all trunk busy condition, it is notified when a trunk becomes idle and automatically re-accesses the same number using the CBQ feature.

The following supplementary information is required with option CBQ.

The CBQ specifies whether cheap (option 1) or cheap and expensive (option 2) routes are searched before activation of the CBQ feature.

The CBQ starting priority (field CBQSP) can be one of four levels, 0 to 3; level 0 (zero) is the lowest and level 3 is the highest.

The placement of a station on a CBQ is based on its CBQSP priority. The CBQ maximum priority (field CBQMP) is the highest level the station can achieve in the priority ordered queue.

If the call is still queuing after a specified length of time, the station's request is dequeued and requeued at the end of the next highest level. This continues until the CBQ priority is equal to CBQMP. CBQMP cannot be less than CBQSP.

If the CBQ route advance (field CBQRA) is set to Y (yes), only cheap routes are available to serve the station's request.

NCOS (continued)

If the CBQ route advance timer expires, the station's request can be served by both cheap and expensive routes as they become available, if these routes permit CBQ.

Of ce parameters NUMOHCQBQTRANSBLKS and AVG_NUM_TGS_PER_OHCQBQCALL in table OFCENG are applicable to this option.

Called number parameter routing (CDNRTE)

This option activates table CDNIXLA to route the translation according to the CDNNAME (called number name) provided by table CDNCHAR.

If this option is added, it provides the routing functionality only to this specific combination of customer group and NCOS.

This option is also available in table CUSTHEAD, where the option activates the functionality for the entire customer group.

See *Called Num Parameter Translation* for more information on this facility.

Calling party category (CPC RTE)

This option enables routing according to the CPCNAME (calling party category name) provided by table CPCIXLA. The option applies to the combination of customer group and NCOS.

Code restriction level (CRL)

This option can be assigned to an NCOS number if code restriction is required. If the CRL option is not assigned, the default is no code restriction.

Code restriction level group (CRL_GRP)

This option can be assigned to an NCOS number to permit sharing of CODEBLK entries across customer groups.

Default logical network (DFLTNET)

This option is required for the Directory Number Network feature and specifies the default logical network for the customer group and NCOS. This feature is not supported by call processing software and must not be used as data ll.

DPNSS feature transparency (DFT)

This option indicates that the agent can use the Digital Private Network Signaling System (DPNSS) feature transparency (DFT) option, if the DMS-100 nodes are connected using IBN7.

NCOS (continued)

Expensive route warning tone (ERWT)

The option is assigned if the stations or incoming or incoming part of two-way IBN trunks receive an ERWT. This is when a call, which has not been queued, encounters a route marked as expensive in the route list.

Flash translator (FLSHXLA)

Option FLSHXLA provides a mechanism to specify a set of up to three ash translators for * (star), # (octothorpe), and digits. These ash translators are used before the normal NCOS and customer group translators are used.

If operating company personnel data ll ash feature translators, these translation results override any speed call cells in which numbers match the ash feature translators after a ash has occurred.

For example, assume that digit 0 for ash feature translator FLSHFEA T has been routed to the switchboard. If a user dials *0 on the second leg of a three-way call, the call goes to the switching unit rather than to the contents of speed call cell 0.

Flash translators apply to the following features that use ashes in their operation:

- Authorization Code
- Call Hold
- Call Park
- Call Transfer
- Dial Call Waiting
- Executive Busy Override
- Make Set Busy
- Message Waiting
- Multiple Appearance Directory Number (MADN) Hold
- Privacy Release
- Station Conference
- Uniform Call Distribution

Note: For some of these features, the only ash interaction is to dial an access code while involved in another call. To the switch, this appears as a three-way call (TWC) until the access code is dialed.

On a business set, pressing the CONF3 key is considered the same as a ash.

NCOS (continued)

International direct distance dialing through automatic route selection (IDDDARS)

This option makes it possible for calls to proceed from Meridian Digital Centrex (MDC) translations, through international partitioned translations, and maintain customer group partitioning of translations.

Option IDDDARS has a code restriction level no pre x (CRLNOPFX) suboption. If eld CRLNOPFX is set to N (no), only the digits after the pre x fence are screened. If eld CRLNOPFX is set to Y (yes), all the dialed digits are screened.

International pretranslator (INPRXLA)

This option is used only on the DMS-300 switching unit.

Mechanized Calling Card Service (MCCS)

Mechanized Calling Card Service allows a caller on the Public Switched Telephone Network (PSTN) to access the carrier network and use a calling card to make national or international public calls according to regulatory requirements. The calling card number is validated using a database within the switch. The AMA billing record generated allows the carrier to charge against the calling card number.

Network Access Registers (NARS)

Network Access Registers provides a streamlined method for throttling MDC calls. Throttling, in this instance, means to regulate a call's ability to terminate. The NARS feature must be present in table CUSTENG before this option can be added.

Octothorpe translator (OCTXLA)

This option can be assigned to an NCOS number if the NCOS number requires its own octothorpe (#) translator in table IBNXLA.

Off-hook Queuing (OHQ)

This option is assigned if placed by the IBN stations or incoming or incoming side of a two-way IBN trunk are queued if the call cannot be completed because an idle trunk is not available.

The OHQ priority for trunks (priority 1) is higher than for stations (priority 0).

The calling party is given either OHQ tone, announcement, or silence, and is then placed in an off-hook queue for an outgoing trunk.

When a trunk becomes available, the call is completed.

NCOS (continued)

Of ce parameters NUMOHCQBQTRANSBLKS and AVG_NUM_TGS_PER_OHCQBQCALL in table OFCENG are applicable to this option.

Public network access (PUB_NET_ACC)

This option supports the provisioning of a line attribute index and public network access digits for the AIN response translation simplification feature.

The line attribute index is used in the digit conversion process for national calls. The public network access code is pre x ed to enable reuse of existing public network access data ll in table IBNXLA.

Option PUB_NET_ACC activates AIN response translation simplification when both of the following occur:

- SOC AIN0026 is ON
- no tuples are present in table XLAMAP for the customer group

Public network barring (PNB)

This option is required for a switching unit in the United Kingdom that has the Public Network Barring feature. This option allows the operating company to classify a group of lines as having no access to the public network. This classification does not stop the subscriber from dialing into the public network from the SL-100 when the standard method using translations is used.

The information is used only when sending out calling or called line category (CLC) information in digital private network signaling system (DPNSS) messages.

Private virtual network (PVN)

This option is assigned to an NCOS number that is used for dedicated IBN PVN lines or dedicated IBN PVN trunks (IBNT1 trunks or the incoming part of IBNT2 trunks).

This option must have its own preliminary translator in table IBNXLA.

If the XLAS option PRELMXLA is not speci ed for the PVN NCOS, the following error message is printed:

```
XLAS-PRELIMINARY TRANSLATOR NOT SPECIFIED FOR PVN
```

The PVN option is ignored in this case.

The operating company can specify the dialing plan used for each PVN NCOS.

NCOS (continued)

The uniform dialing plan for PVN calls is as follows:

OFF-NET calls:

ON-NET to OFFNET

1+NPA+Nxx+xxxx

IDDD

011+CC+NN

where

CC =

country code

NN =

national number

ON-NET calls:

ON-NET to ON-NET

Rxx+xxxx

ON-NET to PVN attendant 0 or Rxx+xxxx (special attendant number)

where

R = 2 to 9

Route restriction level (RRL)

This option is used to identify the maximum route cost level that can be accessed by a particular agent. Four route restriction levels (0 to 3) are established, providing a one-to-one correspondence to the route cost level. A route restriction level of 0 allows access to a route with a route cost of 0. A route cost restriction level of 3 allows access to routes with route cost levels of 0, 1, 2, or 3.

Translator and digit collection (XLAS)

This option can be assigned to an NCOS number if the NCOS number requires its own preliminary or feature translator in table IBNXLA or its own block of data in table DIGCOL.

An NCOS number requires its own preliminary translator if one or more access codes take a different route from the one assigned to the access code in the

NCOS (continued)

customer group translator, for example, direct outward dial and attendant access codes.

An NCOS number requires its own feature translator if one or more access codes with a star (*) as a leading digit are different from those that are assigned in the customer group feature translator.

An NCOS number requires its own block of data in table DIGCOL if the digit collection for the IBN or RES stations assigned to the NCOS number is not the same as the block of data specified in table CUSTHEAD.

The block of data in table DIGCOL with the name RES is specified for customer groups containing RES or IBN lines having access to a standard POTS dial plan.

If the XLAS option is not specified, the NCOS number reverts by default to the same digit collection feature and preliminary translators that are assigned in table CUSTHEAD.

Data II sequence and implications

The following tables must be data lled before table NCOS.

- CUSTENG
- LATANAME
- NARDATA
- XLANAME

Table size

0 to 1 048 576 tuples

Each assigned NCOS number requires 14 words of memory.

The maximum table size is determined by the following formula:

$$T_m = C_m \times N_m = 4096 \times 512 = 2\,097\,152$$

where

T_m

is the maximum table size

C_m

is the maximum number of customers

NCOS (continued)**Nm**

is the maximum number of NCOS numbers for each customer

Data II

The following table lists data II for table NCOS.

Field descriptions (Sheet 1 of 3)

Field	Subfield	Entry	Explanation and action
CUSTGRP		alphanumeric (1 to 16 characters)	Customer group name. Enter the code assigned to the customer group. This field is the key field to table NCOS.
NCOS		0 to 511	Network class of service number. Enter the network class of service (NCOS) number. Numbering plan areas (NPA) entered in table CODEBLK inhibit the use of table NCOS for providing access to NPAs entered with an NCOS number.
NCOSNAME		A to Z, 0 to 9 (1 to 6 characters) or \$	Network class of service name. Enter the name assigned to the NCOS number for the key and lamp display. The '-' character appears as a blank on the display and on the MAP terminal. The '\$' character appears as a field of blanks on the display and on the MAP terminal.
LSC		0 to 31	Line screening code. Enter the line screening code assigned to the NCOS number. For the test access controller (TAC) to block access to the outgoing trunk, ensure that field LSCFLAGL in table LSCFLAGS associated with field ALTLSCFN in table TRKGRP of the trunk does not include the Line Screening Card (LSC) defined by the NCOS of the originator. LSCs define outgoing or outgoing side of two-way trunk IBN trunk groups to which the NCOS number has access. This field is not used by the DMS-300 switching unit.

NCOS (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield	Entry	Explanation and action
TRAFSNO		10 to 127	Traffic separation number. Enter the traffic separation number assigned to the NCOS number in table TFANINT. If a traffic separation number is not required, enter 0 (zero). If the switching unit has the Traffic Separation Peg Count software package, the range of values for the incoming and outgoing traffic separation numbers depend on the value of parameters TFAN_IN_MAX_NUMBER and TFAN_OUT_MAX_NUMBER in table OFCENG. For switching units without the Traffic Separation Peg Count software package, the range of values for the traffic separation numbers is 0 to 15. It is recommended that incoming and outgoing traffic separation numbers 1 to 9 be reserved for generic traffic separation numbers. See table TFANINT for the assignment of incoming to outgoing traffic separation numbers. With the Traffic Separation feature, a peg count of all calls arranged by type of call-direct dial (DD), operator assisted (OA), or no prefix (NP) can be accumulated between an originating source (incoming or incoming side of two-way trunk, or an originating line attribute, or NCOS number) and a terminating destination (outgoing trunk or outgoing side of a two-way trunk, or a terminating line attribute or NCOS number, tone, or announcement). This field is not used by the DMS-300 switching unit.

NCOS (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield	Entry	Explanation and action
OPTIONS		see subfield	Options. This field is a vector of up to 17 entries of subfield NCOSOPTN and its refinements.
	NCOSOPTN	ACR, AINLATA, ATT, CATRTE, CBQ, CDNRTE, CPCRTE, CRL, CRL_GRP, DFLTNET, DFT, ERWT, FLSHXLA, IDDDARS, INPRXLA, MCCS, NARS, OCTXLA, OHQ, PUB_NET_A CC, PNB, PVN, RRL, or XLAS	Network class of service options. Enter up to 17 option entries for the network class of service (NCOS) number. Use one record for each option. If an option has refinements, leave a blank space between each refinement entry. Use a continuation mark (+) to indicate the end of a record. Enter \$ to indicate the end of the list. See the "Option and refinement list" section for explanations of each option and its refinements. Enter only the options required for the NCOS number.

Option and refinement list

The following list describes each option entry and its refinements. Options are listed in alphabetical order followed by refinements where applicable.

For the descriptions of each option, refer to the "Functional description" section.

Account or authorization code last (ACR)

If ACR is data lled in eld NCOSOPTN, data ll refinement ANNREQD as described in the following table to complete the option record.

Note: Dialed digits are translated before the ACR is entered and cannot be retranslated based on the ACR. Calls route according to the NCOS of the base station and are completed if a valid ACR is entered.

NCOS (continued)**Field descriptions for conditional data II**

Field	Subfield	Entry	Explanation and action
	ANNREQD	Y or N	Announcement required. Enter Y (yes) if an announcement is required to prompt for the ACR option; otherwise, enter N (no).

Advanced Intelligent Network local access and transport area (AINLATA)

If AINLATA is data filled in field NCOSOPTN, data II requirement LATANAME as described in the following table to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	LATANAME	alphanumeric (1 to 16 characters)	LATA name. Enter a LATA name that has been datafilled in table LATANAME.

Attendant NCOS (ATT)

If ATT is data filled in field NCOSOPTN, data II requirement ATTNCOS as described in the following table to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	ATTNCOS	0 to 511	Attendant network class of service number. Enter the NCOS number used when being assisted by an AC.

Category Routing (CATRTE)

Use the category routing option as described in the following table to allow charge category routing in IBN translations.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	CATRTE	CATRTE	Category routing. Enter CATRTE to allow charge category routing in IBN translations.

NCOS (continued)**Call Back Queuing (CBQ)**

If CBQ is data lled in eld NCOSOPTN, data ll re nements CBQSP , CBQMP, CBQRA, and CBQOPTS as described in the following table to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	CBQSP	0 to 3	Call back queue starting priority level. Enter the call back queue (CBQ feature) starting priority level assigned to the NCOS number.
	CBQMP	0 to 3	Call back queue maximum priority level. Enter the CBQ maximum priority level assigned to the NCOS number.
	CBQRA	Y or N	Call back queue route advance. Enter Y if the station is allowed to route advance to expensive route after the call back route advance time-out. Otherwise, enter N.
	CBQOPTS	1 or 2	Call back queuing option. If prior to activating the CBQ option, only inexpensive routes are to be searched, enter 1. If inexpensive and expensive routes are to be searched, enter 2.

NCOS (continued)**Called number parameter routing (CDNRTE)**

To activate this facility, data II sub field NCOSOPTN as shown in the following table.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	NCOSOPTN	CDNRTE	Called number parameter routing. If this is datafilled, table CDNIXLA routes the translation according to the CDNNAME (called number name) provided by table CDNCHAR. If this option is added, it provides the routing functionality for this specific combination of customer group and NCOS. This option is also available in table CUSTHEAD, where it activates the functionality for the entire customer group. See <i>Called Num Parameter Translation</i> for more information on this facility.

Calling party category (CPCRTE)

This option enables routing according to the CPCNAME (calling party category name) provided by table CPCIXLA. No re nements are required to complete the option record. If this option is used, it provides the routing functionality for this combination of customer group and NCOS. The CPCRTE option is also available in table CUSTHEAD, where the option applies to the entire customer group.

Code restriction level (CRL)

If CRL is data lled in eld NCOSOPTN, data II re nements CRL and CRLACT as described in the following table to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	CRL	0 to 15	Code restriction level. Enter the code restriction level (CRL) applicable to the NCOS number. Entries outside this range are invalid.
	CRLACT	ALLOWED or BLOCKED	Code restriction action. If all calls to codes in table CODEBLK with the specified code restriction level are allowed to complete, enter ALLOWED. Otherwise, enter BLOCKED.

NCOS (continued)**Code restriction level group (CRL_GRP)**

If CRL_GRP is data lled in eld NCOSOPTN, data ll re nements CUST_GRP, CRL, and CRLACT as described in the following table to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	CUST_GRP	alphanumeric (1 to 16 characters)	Customer group. Enter the name of the customer group that is the index into table CODEBLK.
	CRL	0 to 15	Code restriction level. Enter the code restriction level (CRL) applicable to the NCOS number.
	CRLACT	ALLOWED or BLOCKED	Code restriction action. If all calls to codes in table CODEBLK with the specified code restriction level are allowed to complete, enter ALLOWED. Otherwise, enter BLOCKED.

Default logical network (DFLTNET)

If DFLTNET is data lled in eld NCOSOPTN, data ll re nement NETNAME as described in the following table to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	NETNAME	alphanumeric (1 to 32 characters)	Network name. Enter the name assigned to the logical network. This name must also be datafilled in table NETNAMES.

DPNSS feature transparency (DFT)

If DFT is data lled in eld NCOSOPTN, no re nements are required to complete the option record.

Expensive route warning tone (ERWT)

If ERWT is data lled in eld NCOSOPTN, no re nements are required to complete the option record.

NCOS (continued)**Flash translator (FLSHXLA)**

If FLSHXLA is data lled in eld NCOSOPTN, data ll re nements PRELMXLA, FEATXLA, and OCTXLA as described in the following table to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	PRELMXLA	alphanumeric (1 to 8 characters) or NXLA	Preliminary translator. If a preliminary flash translator is assigned to the NCOS number, enter the name assigned to the translator. If no preliminary flash translator is assigned to the NCOS number, enter NXLA.
	FEATXLA	alphanumeric (1 to 8 characters) or NXLA	Feature translator. If a feature flash translator is assigned to the NCOS number, enter the name assigned to the translator. If no feature flash translator is assigned to the NCOS number, enter NXLA.
	OCTXLA	alphanumeric (1 to 8 characters) or NXLA	Octothorpe translator. If an octothorpe flash translator is assigned to the NCOS number, enter the name assigned to the translator. If no octothorpe flash translator is assigned to the NCOS number, enter NXLA.

International direct distance dialing through automatic route selection (IDDDARS)

If IDDDARS is data lled in eld NCOSOPTN, data ll re nement CRLNOPFX to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	CRLNOPFX	Y or N	Code restriction level, no prefix. Enter Y to screen all the dialed digits. Enter N to screen only the digits after the prefix fence.

NCOS (continued)**International pretranslator (INPRXLA)**

If INPRXLA is data lled in eld NCOSOPTN, data ll re nement INATLPRT as described in the following table to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	INATLPRT	alphanumeric (4 characters)	International pretranslator name. Enter the name for the international pretranslator. This name must be datafilled in field INATLPRT in table INPRTRNS.

Mechanized Calling Card Service (MCCS)

If MCCS is data lled in eld NCOSOPTN, data ll re nements REORIG, REORGVAL, SNDRPSIG, TSUSR, VPRMPTS and VPIDX.

Field descriptions for conditional data ll (Sheet 1 of 2)

Field	Subfield	Entry	Explanation and action
	REORIG	Manual, Auto, None	Controls activation of reorigination. Manual reorigination allows the caller to manually enter the reorigination digit number. Automatic reorigination allows the switch to reoriginate immediately and automatically. If REORIG has a value of Manual or Auto, the REORGVAL field is datafilled.
	REORGVAL	Y, N	This functionality allows the TCN to be re-validated in-switch during reorigination. The default value is N.
	SNDRPSIG	2 to 30 seconds	Permanent signal timer. This field determines the number of seconds the subscriber has to dial the first DTMF digit. If the subscriber does not dial any digits within this time, the call is taken down. The value of the reorigination timer is also taken from the SNDRPSIG field.
	TSUSR	0 to 254 seconds	Suspend timer value used for interdigit timing.

NCOS (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
	VPROMPTS	Y, N	Determines whether the call is a voice prompt or tone call. If VPROMPTS is set to "Y", the call is voice prompts and the VPIDX field is datafilled. The default value is "N".
	VPIDX	0 to 99	Index into table VPROMPTS.

Network Access Registers (NARS)

If NARS is data lled in eld NCOSOPTN, data ll re nements N ARACT, NARIN, NAROUT, and ALTHROU to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	NARACT	Y or N	Network access registers active. Enter Y to activate the NARS feature for the NCOS group and datafill refinements NARIN, NAROUT, and ALTHROUT. Otherwise, enter N.
	NARIN	alphanumeric (1 to 16 characters)	Network access registers incoming calls. Enter the name of incoming calls through NARS.
	NAROUT	alphanumeric (1 to 16 characters)	Network access registers outgoing calls. Enter the name of outgoing calls through NARS.
	ALTHROUT	Y or N	Throttle all outgoing calls. Enter Y if all outgoing calls are to be throttled. Otherwise, enter N.

Octothorpe translator (OCTXLA)

If OCTXLA is data lled in eld NCOSOPTN, the NCOS number requires an octothorpe translator in table IBNXLA that is different from the one speci ed

NCOS (continued)

in table CUSTHEAD. Data elements OCTXLA as described in the following table to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	OCTXLA	alphanumeric (1 to 8 characters)	Octothorpe translator. Enter the name of the octothorpe translator assigned to the NCOS number.

Off-hook Queuing (OHQ)

If OHQ is data field in field NCOSOPTN, data elements OHQPRI and OHQNOTICE as described in the following table to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	OHQPRI	0 or 1	Off-hook queuing priority. Enter 0 (zero) if NCOS is assigned to lines. Enter 1 if NCOS is assigned to trunks.
	OHQNOTICE	TONE_OHQ, ANNMENT, or SILENCE	Off-hook queuing notice. Enter the kind of notice given to a caller when Off-hook Queuing is being offered: TONE_OHQ (OHQ tone), ANNMENT (OHQ announcement), or SILENCE (no notice).

Public network access (PUB_NET_ACC)

If PUB_NET_ACC is data field in field NCOSOPTN, data elements LINEATTR and PFX_DIGS as described in the following table to complete the option record.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield	Entry	Explanation and action
	PFX_DIGS	five digit register (0 to 9)	Prefix digits. Datafill the prefix that is required to reuse the public network access datafill for AIN response processing.

NCOS (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
	LINEATTR_ OPT	LINEATTR	Line attribute index options. Enter LINEATTR to indicate the line attribute index.
	LINEATTR	alphanumeric (1 to 16 characters)	Line attribute index. Datafill the line attribute index used to convert the 10-digit national number to a dialable format.

Public network barring (PNB)

If PNB is data lled in eld NCOSOPTN, no re nements are required to complete the option record.

Private virtual network (PVN)

If PVN is data lled in eld NCOSOPTN, data ll re nement DIALOPT as described in the following table to complete the option record.

Field descriptions for conditional data II

Field	Subfield	Entry	Explanation and action
	DIALOPT	see subfields	Dialing options. This field contains subfields DIALPLAN and DIGCOUNT.
	DIALPLAN	UNIFORM, VAR, FIX, or V_ON NET	Dialing plan. Enter UNIFORM for the uniform dialing plan. Enter VAR for the variable dialing plan and datafill refinement DIGCOUNT. Enter FIX for the fixed dialing plan. Enter V_ON NET for the variable on network dialing plan.
	DIGCOUNT	3 to 15	Digit count. Enter the maximum number of digits collected for the variable dialing plan access code.

NCOS (continued)**Route restriction level (RRL)**

If RRL is data lled in eld NCOSOPTN, data ll re nement RRL as described in the following table to complete the option record.

Field descriptions for conditional data ll

Field	Subfield	Entry	Explanation and action
	RRL	0 to 3	Route restriction level. Enter the route restriction level (RRL) associated with this NCOS.

Translator and digit collection (XLAS)

If the NCOS number requires a block of data in table DIGCOL and a preliminary or feature translator in table IBNXLA that are different from those speci ed in table CUSTHEAD, data ll XLAS in eld NCOSOPTN and data ll re nements PRELMXLA, FEA TXLA, and DGCOLNM as described in the following table to complete the option record.

Field descriptions for conditional data ll (Sheet 1 of 2)

Field	Subfield	Entry	Explanation and action
	PRELMXLA0	alphanumeric (1 to 8 characters) or NXLA	Preliminary translator. If the name of the preliminary translator assigned to the NCOS number is not the same as the one assigned in table CUSTHEAD, enter the name of the preliminary translator assigned to the NCOS number. If the preliminary translator is the same as that defined in table CUSTHEAD, enter NXLA.

NCOS (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
	FEATXLA	alphanumeric (1 to 8 characters) or NXLA	Feature translator. If the name of the feature translator assigned to the NCOS number is not the same as the one assigned in table CUSTHEAD, enter the name of the feature translator assigned to the NCOS number. If the feature translator is the same as that defined in table CUSTHEAD, enter NXLA.
	DGCOLNM	alphanumeric (1 to 8 characters) or NDGT	Digit collection name. If digit collection for IBN stations is not the same as defined in table CUSTHEAD, enter the name assigned to the block of data in table DIGCOL for digit collection for IBN stations assigned to the NCOS number. If digit collection is the same as defined in table CUSTHEAD, enter NDGT.

Data II example

The following example shows sample data II for table NCOS.

The first tuple is the default entry in table NCOS for switching units with plain ordinary telephone service (POTS) data lines.

The second and third tuples are examples of data II for CUSTGRP COMKODAK.

MAP display example for table NCOS

CUSTGRP	NCOS	NCOSNAME	LSC	TRAFSNO	OPTIONS
POTSDATA	0	PDATA	0	0	\$
COMKODAK	23	PVKNKD	0	0	(XLAS PVNXL3 NXLA POTS) (PVN UNIFORM) \$
COMKODAK	0	KDKO	0	0	(CBQ 0 3 N 2) \$

Table history**MMP13**

Added option CATRTE.

NA012

Development activity 59007050 introduces changes to field LN_ATT_IDX in table NCOS, NCOS option PUB_NET_ACC. This field now accepts an alphanumeric string instead of an integer string.

EUR010

Added option CPCRTE.

EUR008

Added option CDNRTE. Added option MCCS and its refinements.

NA009

Added option PUB_NET_ACC and its refinements.

EUR006

Option CRLGRP renamed to CRL_GRP to support backward software release compatibility.

APC006

Added option CRLGRP and its refinements.

NA006

Updated values fields ATTNCOS and NCOS in accordance with the Intra-LATA PIC Enhancements and the TL Changes for LINEATTR, NCOS, and LTG Table Expansion features.

Added the AINLATA option.

NA004

Added an additional tuple for option CBQ to the MAP display example.

BCS36

Added the Network Access Registers (NARS) option.

NCSADDR

Table name

Network Control System Address Table

Functional description

Table NCSADDR contains the information required to set up an X.25 connection from the DMS switch to the Network Control System (NCS) interface on the packet handler (PH).

The following information is specified in table NCSADDR:

- the name and address of the NCS application to be accessed
- the ASCII mnemonic for the NCS operation center
- the multiprotocol controller (MPC) card on which to place the X.25 call
- the link on the specified MPC card on which to place the X.25 call

Data II sequence and implications

The following tables must be datafilled before table NCSADDR.

- MPC
- MPCLINK

Table size

0 to 16 tuples

Data II

The following table lists datafill for table NCSADDR.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
DEST		alphanumeric (up to 12 characters)	<i>Destination</i> Enter the destination mnemonic that identifies the Network Control System (NCS) application to access.
DNA		vector of up to 15 digits (0 to 9)	<i>Dialing number address</i> Enter the address of the NCS interface application. This field supports international addresses.

NCSADDR (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
CUG		00 to 99 or 0000 to 9999	<i>Closed user group</i> Enter 00. This field is not needed presently but may be required in the future for added security.
OCMNEM		alphanumeric (up to 12 characters)	<i>Operation center mnemonic</i> Enter the ASCII mnemonic for the NCS operation center.
LKPATH		see subfields	<i>Multiprotocol link path</i> This field consists of subfields M and L.
	M	0 to 255	<i>Multiprotocol controller number</i> Enter the multiprotocol controller (MPC) card number on which the X.25 call goes out.
	L	0 to 3	<i>Link number</i> Enter the link number on the specified MPC card on which the X.25 call goes out.

Data II e xample

The following example shows sample datafill for table NCSADDR.

MAP display example for table NCSADDR

	DEST	DNA	CUG	OCMNEM	LKPATH
NCSIF1	088899334455000		00	OA1	1 2
NCSIF2	088899334455001		00	OA2	2 2

NCSAPPL

Table name

Network Control System Application Table

Functional description

This table contains the information required for the interface with NCSCOMS to set up the X.25 link. NCSCOMS is the utility that enables applications to communicate with the network control system (NCS) on the packet handler (PH). This table is also needed to enhance the robustness of the X.25 link between the DMS system and the PH.

The following information is contained in this table:

- APPL (application)
- DEST (destination mnemonic)
- BDESTMN (backup destination mnemonic)
- USERID (user identification)
- PASSWD (identification password)

Data II sequence and implications

Table NCSADDR must be datafilled before table NCSAPPL.

Table size

0 to 10 tuples

NCSAPPL (continued)**Data II**

The following table lists datafill for table NCSAPPL.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
APPL		PHLOG	<i>Application</i> Enter PHLOG to specify the name of the application software.
DESTMN		alphanumeric	<i>Destination mnemonic</i> Enter a mnemonic corresponding to the destination (see note). This mnemonic is the key used to access a tuple in table NCSADDR. It specifies where the X.25 link is connected. Note: To modify fields DESTMN and BDESTMN, delete the entire existing tuple and add the new tuple.
BDESTMN		alphanumeric	<i>Backup destination mnemonic</i> Enter a mnemonic corresponding to the backup destination (see note). This mnemonic is the key used to access a tuple in table NCSADDR; it specifies a backup link that ensures the robustness of the link setup between the DMS switch and the NCS. If the application does not require a backup, enter the same value as DESTMN. Note: To modify fields DESTMN and BDESTMN, delete the entire existing tuple and add the new tuple.
USERID		alphanumeric (1 to 12 characters)	<i>User ID</i> Enter the user ID of the remote PH port.
PASSWD		alphanumeric (1 to 12 characters)	<i>Password</i> Enter the password of the remote PH port. This is a write-only field; the actual value cannot be displayed.

Data II e xample

The following example shows sample datafill for table NCSAPPL.

NCSAPPL (end)

MAP display example for table NCSAPPL

APPL	DESTMN	BDESTMN	USERID	PASSWD
PHLOG	NCSIF1	NCSIF2	LOGUSER	

NETATTR**Table name**

Network Attributes Table

Functional description

Table NETATTR contains translation data and optional features associated with a network. The trunk group table and the network attributes table can specify the translation data. Translation data entered in the trunk group table does not provide the features available in the network attribute table.

The line or trunk data can reference table NETATTR.

The translation data selector in a tuple of table NETATTR cannot change. The translation data that follows the selector can change.

Data II sequence and meaning

You do not need to enter data in other tables that appear before you enter data in table NETATTR.

Table size

Table SYSDATA specifies memory. You can increase memory only in increases greater than 100 tuples to a maximum of 1024.

Data II

Datafill for table NETATTR appears in the following table.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
NETINDX		0 to 1023	<i>Network index.</i> Enter the index referenced by the trunk group table.
XLAVAR		see subfield	<i>Variable translation data.</i> This field contains subfield XLADSEL and the refinements for this subfield.
	XLADSEL	NALT or UNIV	<i>Translation selector.</i> If the North American translation system is in use, enter NALT. Enter data in refinements PRTNM, SCRNL, SNPA and ORIGSRC. If the universal translation is in use, enter UNIV. Enter data in refinements XLASYS and XLNAME.

NETATTR (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	PRTNM	alphanumeric or NPRT	<i>Standard pretranslator table name.</i> If standard pretranslation is a requirement, enter the name of the standard pretranslator table. The standard pretranslator table is the table where the system digit translation after the receipt of one digit. If pretranslation is not a requirement, enter NPRT. The Y (yes) setting can occur for TRK_OOS_CHK_ON in table OFCVAR. If this setting occurs, trunks in the group must be in use to change the value of this field by data modification order (DMO).
	SCRNCL	alphanumeric or NSCR	<i>Class of service screening table name.</i> Digit translation routes to a class of service screening table. If screening by class of service is a requirement, enter the name of this class of service screening table. This table is where the system routes digit translation. If class of service screening is not a requirement, enter NSCR.
	SNPA	numeric (three digits)	<i>Serving numbering plan area.</i> Enter the serving NPA code to which a trunk group belongs. The Y (yes) setting can occur for TRK_OOS_CHK_ON in table OFCVAR. If this setting occurs, trunks in the group must be in use to change the value of this field by data modification order (DMO).
	ORIGSCR	LCL or NLCL	<i>Originating source.</i> Enter the originating source, LCL (local) or NLCL (non-local). Go to field NETVAR.
	XLASYS	AC, AM, CT, DN, FA, FT, NIL, NSC, OFC, or PX	<i>Translation system.</i> Enter the head table name where translations begin.
	XLANAME	alphanumeric (one to eight characters)	<i>Translation name.</i> Enter an entry in the code table belonging to the head table that field XLASYS references.

NETATTR (end)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
NETVAR		see subfield	<i>Network variables.</i> This field contains subfield OPTDSEL.
	OPTDSEL	NIL	<i>Option selector.</i> Enter NIL.

Data example

Datafill for table NETATTR appears in the following example.

An incoming trunk group references the input data for a network index of 1. This example contains the following input data for a network index of 1:

- The network index is 1.
- The trunk group uses the universal translator.
- The translation starts in the prefix translation table.
- The translation name for the incoming trunk group is ICTOLL.
- The network options are NIL.

MAP example for table NETATTR

NETATTR	XLAVAR NETVAR			
1	UNIV	PX	ICTOLL	NIL

NETJUNCT

Table name

Network Junctor Group Table

Functional description

The two network ports and network module pairs assigned to the junctor groups appear in table NETJUNCT lists .

For the dual shelf network equipment (DSNE), the definition of a strict junctor pattern occurs. The network hardware limits the assignment of junctors on the DSNE. The definition of four junctor groups occurs. Each junctor group must be identical. The junctor groups are 0 to 15, 16 to 31, 32 to 47, and 48 to 63. Each group must contain only serial junctors or only parallel junctors. To keep the same junctor pattern, the software imposes additional restrictions on junctor assignments as follows:

- In a single network configuration, the assignment of all four junctor groups as parallel intranetwork junctors must occur. All four junctor groups are 0 to 15, 16 to 31, 32 to 47, and 48 to 63.
- In a two-network configuration, the assignment of the first two junctor groups on the DSNE as serial internetwork junctors must occur. The first two junctor groups are 0 to 15 and 16 to 31. The assignment of the second two junctor groups as parallel intranetwork junctors must occur. The second two junctor groups are 32 to 47 and 48 to 63.
- In a configuration of three or more networks, the assignment of all four junctor groups on the DSNE as serial internetwork or intranetwork junctors must occur. All four junctor groups are 0 to 15, 16 to 31, 32 to 47, 48 to 63.

Data II sequence and meaning

You must enter data for table NETWORK before you enter data for table NETJUNCT.

Table size

Table size is 0 to 1024 tuples.

The system automatically allocates memory for 32 junctor groups for each network module pair. The memory allocated for table NETWORK contains the memory for this table.

NETJUNCT (continued)**Data II**

Datafill for table NETJUNCT appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
JUNCTNO		see subfields	<i>Junctor number.</i> This field contains subfields GRP and FLD.
	GRP	0 to 31	<i>Group.</i> Enter the junctor group number.
	FLD	0 to 31	<i>Field.</i> Enter the junctor field number.
FROMNM		0 to 31	<i>From network pair.</i> Enter the number of the network module pair assigned to the from side of the junctor group.
FROMPORT		0 to 63	<i>From network port.</i> Enter the number of the network port of the network module pair assigned to the from side of the junctor group.
TONM		0 to 31	<i>To network pair.</i> Enter the number of the network module pair assigned to the to side of the junctor group.
TOPORT		0 to 63	<i>To network port.</i> Enter the number of the network port of the network module pair assigned to the to side of the junctor group.

Data II e xample

Sample datafill for table NETJUNCT appears in the following example.

The network assignments for junctor group 0 field 31 appear in this example.

NETJUNCT (end)

MAP example for table NETJUNCT

JUNCTNO	FROMNM	FROMPORT	TONM	TOPORT

0	31	0	35	1	27

NETNAMES

Table name

Internal Logical Network Names Table

Overview

Tables NETNAMES, DNGRPS and DNATTRS, together with tables NCOS and IBNXLA, enable an operating company to datafill station information against a directory number (DN) on a logical network basis.

The following information is required for each DN:

- the address employed within the network to identify the station
- the number of digits in the network
- an indication of whether the DN is unique
- an associated name for use with display terminals
- a suppression parameter indicating whether the display of line identification information is enabled
- an indication of whether the facility reject message must be sent to the originator if the facility message cannot be properly routed to the destination
- an indication of whether the network can route its Network Ring Again (NRAG) connectionless SS7 messages to the NRAG subsystem
- an indication of whether the network can route its NRAG connectionless SS7 messages through the digits and the point code (PC) returned in the integrated services digital network user part (ISUP) release message instead of using table MSGRTE
- an indication of whether transaction capability application part (TCAP) messages are routed by table MSGRTE or through the Network Message Service (NMS) subsystem

Table NETNAMES associates logical network names with external global network identifiers.

Table DNGRPS stores attributes for blocks of DNs, normally corresponding to customer groups. The key to the table consists of a digit range for a block of DNs.

Table DNATTRS stores attributes for individual DNs. The key to the table is a specific DN.

NETNAMES (continued)

Calls that can be completed within a single office have access to data that describes the parties involved in the call. This information is essential for invoking many customer features, such as Line Identification Display and Ring Again. When a call is routed interoffice, the necessary information is unavailable and these features are disabled.

With the advent of high-level signaling protocols, such as Common Channel Signaling 7 (CCS7) and ISDN primary rate access (PRA), it has become both desirable and feasible to exchange this sort of information between offices, providing access to these features network wide.

Station identification

The identity of a station involved in a call is given by that station's DN. This DN can be a public number associated with the station, or any one of a number of private DNs used to address the station within the private networks accessible to the station. Ideally this DN uniquely identifies the station for remote feature (for example, NRAG) activation. Because this is not always possible (as in the case of stations without a unique DN), it is necessary to store information about a station's identity and characteristics on a logical network basis within each office.

Network types

Physically, a telephony network consists of wires and switches connecting various pieces of communication equipment. Logically, a telephone network consists of a set of virtual connections between end points. The term "station" refers to these end points.

Each logical network employs its own particular addressing scheme, or numbering plan, for identifying the stations in its network. The logical network is actually defined by its numbering plan.

A single station is often identifiable by different addresses, corresponding to different numbering plans. In such cases, the station can be viewed as being an element of several different logical networks. A call to or from that station can either remain within that station's own default logical network, or cross a network boundary to enter another logical network.

Address exchange between stations in a logical network

Stations must agree on their addressing scheme when communicating. An individual's internal company mailing address is not sufficient to identify that individual outside the logical company network. The same is true of telephony addresses.

NETNAMES (continued)

The choice of addressing scheme for station identification must be agreed upon during call set-up through appropriate information elements contained in high-level protocol setup messages.

A station can have a preferred or default address associated with it, and can be considered part of a primary logical network. The default address is used in a communication unless a different one is explicitly selected.

If a station is not directly addressable within a network, then the station address of the closest access point, such as an attendant console, can be used for address exchange. An indication that the station does not have a unique DN is also given once this information element is defined within all appropriate high-level signaling protocols.

Network selection during call origination

It is usually the originating station that determines the choice of the logical network. In telephony, this is either the originating station's default network, or a specific network selected through dialed access codes and translation schemes in accordance with the originator's dial plan.

The choice of logical network also determines the address by which the originating station must identify itself to the intended destination station. It need not be the station address used for billing or other purposes.

Communicating logical network to the terminator

The destination station requires knowledge of the originator's logical network in order to establish a proper context for address exchange. This means that the originator's logical network must be included as part of the originating station's address in the call set-up message.

Network selection by the terminator

The destination station identifies itself to the originator using the originator's network numbering plan where possible. If the terminating office does not have information about the originator's network, or if call diversion features (such as Call Forward, Call Transfer, and Call Pickup) are used, the final destination station can be different from that intended by the originator. In such circumstances, there is a possibility that the terminating station cannot be identified by an address in the originator's selected numbering plan.

In these cases, a public network address must be communicated. The address must also be accompanied by the corresponding public network identifier. Public network addresses must be employed in any further communications between the stations.

NETNAMES (continued)

The associated physical network

The logical network connection does not necessarily correspond to the physical network connection. For example, private network calls can be routed over public facilities and public calls can be routed over private facilities. For station identification between the originating and terminating parties, the physical connection is irrelevant.

Directory attributes

For each station capable of initiating outgoing calls or receiving incoming calls on multiple public or private networks, the following information is required for each logical network accessible:

- the address of the station within the network
- whether the DN of the station is unique
- whether the display of DN information is enabled
- two names optionally associated with the station display

Assign the station address to reflect as closely as possible the address within the network by which the station can be accessed for identification and feature activation. For stations without Direct Inward Dialing (DID) on that network, use the DN of the access point (for example, an attendant console).

Standard defaults for DN attributes

The following default values are assumed whenever specific data for a particular DN is absent:

- The address of the station within the network is the same as the internal DN assigned to the station.
- The station DN is UNIQUE (option NONUNIQUE does not appear in the table).
- No name is associated with the station display.
- Information display is enabled.

Only data that differs from these standard defaults is explicitly datafilled.

Since the majority of DNs are published, all DNs are enabled for display by default. The operating company must ensure that any unpublished numbers are explicitly datafilled in order to suppress the display of these numbers.

Attributes for customer groups

In the vast majority of cases, network attributes for individual stations within a customer group are identical. Only attributes that differ from these defaults must be explicitly stored for a particular DN.

NETNAMES (continued)

Attributes can be datafilled for blocks of DNs (which usually correspond to different customer groups). Only the data that is unique for a particular DN must be explicitly stored against that DN.

Accessing the network attribute tables

When applications such as call processing need to determine network attributes for a given DN, data specific to the DN is accessed first. In the absence of specific DN data, data for the range of DNs in which the given DN falls is accessed next. In the absence of both, the standard defaults are assumed.

Network identifiers

Information concerning a station is stored for each logical network. This requires network identifiers for identifying specific logical networks. These network identifiers must be unique across all networks if they require inclusion in information elements for call set-up (and other) messages.

Within each office, accessible networks are identified by a network name. These names are mapped to the appropriate global external network identifiers for transmission in interoffice high-level protocol messages.

Logical table NETNAMES

Network names and associated external network identifiers are datafilled for each office in table NETNAMES. These names are used in tables that store DN attributes for the network.

The first entry, corresponding to the public telephone network, is added automatically by the system and cannot be deleted. This is the default network.

Default logical networks

The default logical network is defined as the public network. Plain ordinary telephone service (POTS) lines always belong to this network.

For Integrated Business Network (IBN) lines, option DFLTNET is added to table NCOS to indicate the default numbering plan or logical network for stations within that customer group and network class of service. In the absence of the NCOS option, the public network is assumed.

This default can be overridden by dialing specific network access codes.

Selected logical networks

For IBN lines, option LOGNET (GEN refinement of the NETWORK_AREA field for the NET selector) in table IBNXL indicates the logical network name resulting from translations.

NETNAMES (continued)

Station identification

Each station in an office capable of initiating or receiving calls is identifiable by a specific logical address, or DN, within that office. Attendant consoles, which are usually identified by a common language location identifier (CLLI), must also be assigned a DN for station identification.

Station addresses

The station address stored against the DN for each accessible network is in the standard North American fixed format.

Control of directory number suppression in table NETNAMES

By default, all DNs and names assigned in a switching unit are displayable. Suppression of the DN on an office level is really suppression on a network basis. The network option SUPPRESS exists in table NETNAMES for the suppression of DNs and names associated with physical DNs, not software-only DNs such as Automatic Call Distribution (ACD) and uniform call distribution (UCD) group numbers. (Names and numbers for ACD and UCD DNs should be suppressed in tables DNATTRS and DNGRPS.) The refinement for this option indicates whether the suppression is required internally (suppress presentation of the name or DN within the switching unit) or externally (suppress presentation of the name or DN outside the switching unit).

Logical table DNGRPS

Customer groups are normally assigned blocks of DNs, usually in thousand block groups (THOUGROUPS), and attributes are defined against these DN blocks.

Table DNGRPS stores this data. The key to the table consists of a digit range corresponding to a block of DNs.

Up to two network names can be datafilled in each range. The network names datafilled for a range correspond to entries in table NETNAMES. The data for each accessible network includes station address, associated station name, whether the DN is unique, and whether the DN or name displayed must be suppressed. Values for fields that are absent are taken from standard defaults.

The station address field allows substitution of digits in DN identification parameters within high-level protocol messages between logical networks.

The station address field consists of a full network DN (as for an attendant console), or portions of the full DN with indications that corresponding internal DN digits must be used (as in table DN). For example, an entry such

NETNAMES (continued)

as 613-72N-NNNN indicates that the digits 613-72 replace the first five digits of the DN in the key, while the remaining digits remain unaltered.

Logical table DNATTRS

Table DNATTRS contains entries for attributes associated with a particular DN. The key to the table is a specific DN.

For each DN, specific data can be stored for up to two network names from table NETNAMES. The data stored consists of the station name, whether the display is suppressed, whether the DN is unique, and whether the DN is a multiple appearance DN (MADN). Values for fields that are absent are taken from table DNGRPS for the range in which the DN falls.

While it is possible to datafill the above data (along with all other DN-specific information) for individual DNs in table DNGRPS, a separate table is desirable for storage efficiency and packaging reasons. This is especially true for POTS lines, for which customer groups and their associated attributes are not an issue.

MADN member display a g

The identity of all MADN members can be associated with two names: a MADN group name and a MADN member name. If a member name is not datafilled, then the group name is used (if datafilled). The MADN member names are stored in table MDNMEM and can be used for any datafilled network.

A MADN member display flag determines whether MADN member names are used for particular networks. This applies to any MADN DN of any network. The information is stored in table DNATTRS.

Table DNATTRS has options NAME, SUPPRESS, MEMDISP, and NONUNIQUE. The NAME option is used for assigning names to the MADN group. The SUPPRESS option applies only to the suppression of the DN or name display on network calls. The MEMDISP option is used for assigning MADN member names. The NONUNIQUE option is added automatically by the switching unit.

The MADN group name can also be datafilled in table DNGRPS. The difference between tables DNATTRS and DNGRPS is that a name is assigned against a DN in table DNATTRS, and is assigned against a range of DNs in table DNGRPS. If both tables are datafilled for the same DN, the name from table DNATTRS overrides.

NETNAMES (continued)

Definition of DN uniqueness

The term DN uniqueness is defined below as it applies to tables DNATTRS and DNGRPS.

A unique DN can be thought of as a subscriber number that has a single DN and a single line equipment number (LEN) associated with it. The two classes of non-unique DNs are described below:

- A DN that has several LENs associated with it (for example, an MADN) is non-unique.
- A LEN that has several DNs associated with it (for example, a party line) is non-unique.

Another class of calls exists for which uniqueness cannot be determined:

- A position that has neither a DN nor LEN associated with it (for example, operator calls that arrive and terminate on trunks) can be non-unique.

Calls such as these are assigned unknown uniqueness.

The definition of a unique DN used in this document is: "A unique DN is the only number that can reach a single, specific LEN".

Note that since Custom Local Area Signaling Service (CLASS) features are used within the public network, DN uniqueness exists with respect to a particular network.

Storage and determination of DN uniqueness

A DN can be non-unique because of its line class code (for example, 8FR) or because of a particular line option assigned to it (for example, MDN). A DN can also be non-unique if it is substituted for another when outgoing calls are made.

The boolean field NONUNIQUE in table DNATTRS is used to show that a DN is non-unique because of an assigned attribute. When a line is given a line class code or assigned a line option that makes the DN non-unique, the NONUNIQUE option is automatically assigned to the DN in table DNATTRS.

This option is assigned to all networks present in the table at the time. If a value of PUBLIC for field NETNAME in table DNATTRS is not present, it is added with the option NONUNIQUE. If no entry exists for that DN, then one is created with the network of PUBLIC having the option NONUNIQUE.

If the non-unique line class code is changed to a unique line class code and no non-unique options are assigned, or the last non-unique line option has been

NETNAMES (continued)

removed, the NONUNIQUE option is removed from each network datafiled against the DN in table DNATTRS. Also, if the maximum number of networks is present and the public network is not among them, then the addition of the NONUNIQUE option fails and is not added to any networks.

The boolean field NONUNIQUE in table DNGRPS is used to indicate that DN substitution has occurred and the substituted DN is not unique. An example of this situation occurring is when the main switchboard number is substituted for all outgoing calls from an office. The substituted DN is a valid DN, but it cannot be used to uniquely reach the particular originator.

Non-uniqueness due to line class code

Four-, eight-, and ten-party lines are non-unique because a single LEN is associated with multiple DNs.

Two party lines are unique because although a single LEN is associated with two DNs, the DNs can be differentiated using the tip and ring lines. When a call is made to one party, the other is not rung.

Lines with a line class code of PBX or PBM are non-unique if a key set or PBX is behind the line into the central office.

The following is a summary of line class codes (LCC) that have non-unique properties:

- 4FR
- 8FR
- 10FR
- PBX
- PBM

Non-uniqueness due to line options

The following line options make a DN non-unique:

- *ACD* The Automatic Call Distribution (ACD) line option associates a single DN with multiple LENs.
- *BNN* The Bridged Night Number (BNN) line option assigns a LEN to two different DNs.
- *DLH* Distributed Line Hunt (DLH) groups associate a single DN with more than one LEN.
- *MADN* The three types of multiple appearance directory number (MADN) groups, Single Call Arrangement (SCA), Multiple Call Arrangement

NETNAMES (continued)

(MCA), and Extension Bridging (EXB), all associate a single DN with more than one LEN.

- *MLH* Multiline Hunt (MLH) groups associate a single DN with more than one LEN

Note: Hunt groups do not always make a line non-unique. In a Directory Number Hunt (DNH) group, each member has an associated DN. If the members of a DNH group are unique, placing them in a DNH group does not make them non-unique.

- *MPB* Although each member of a POTS Multiparty Bridging (MPB) group has its own DN and LEN, if any one of them is called, all are alerted and any one of them can join in any call.
- *SDN* The Secondary DN (SDN) line option associates a primary DN and several secondary DNs with a particular LEN. Note that all secondary DNs are also made non-unique.
- *UCD* The Uniform Call Distribution (UCD) line option associates a single DN with several LENs.

Non-uniqueness due to implementation

Calls that are neither line calls nor trunk calls are assigned unknown uniqueness since they do not have a DN associated with them. These include operator calls and attendant console calls. The uniqueness of a DN is with respect to a particular network.

Restrictions and limitations

Tables NETNAMES, DNGRPS, and DNATTRS do not provide the means for associating a DN with an attendant console for line identification, nor do they provide the complete set of modifications to translations necessary in order to uniquely determine the logical network in every case. Instead, the logical network is determined from prefix digits alone.

Protocol modifications required to include network identification along with station address, and an indication as to whether these addresses are directly accessible, are not implemented. The numbering plan area (NPA) portion of the address field is used to distinguish between public and private network addresses. If this field does not contain a recognized private serving translation scheme (STS), then a public network address is assumed.

Access to tables NETNAMES, DNGRPS, and DNATTRS through operating company service orders is not supported.

NETNAMES (continued)

Service order and Partitioned Table Editor (PTE) access to tables DNGRPS and DNATTRS is not supported for customers subscribing to the Customers Data Change (CDC) feature.

In order to support suppression of address display for unpublished numbers in POTS-only (non-IBN) switching units, the only table made available in these switching units is DNATTRS. Only PUBLIC, which is the default NETNAME, is acceptable for input to table DNATTRS.

Determination of DN attributes

The following algorithm traverses the DN attribute tables in order to determine a complete set of attributes for a given DN and specific NETNAME.

1. Access table DNATTRS for a given DN and NETNAME, recording values for attributes present.
2. For attributes not present in table DNATTRS, access table DNGRPS for the range in which the DN falls, and the specific NETNAME. Record values for attributes present.
3. For attributes not present in either table DNATTRS or DNGRPS, record values for the standard defaults.

As an example, consider the problem of determining the attributes for DN 001-366-5678 in the PUBLIC network. The sample datafill shown in the examples for tables DNGRPS and DNATTRS is used for this purpose.

Accessing table DNATTRS for NETNAME PUBLIC yields that the display of the DN and name is suppressed and the DN is unique (options NONUNIQUE, NAME, and MEMDISP do not appear in the table). Upon exiting from this table, only the suppression and uniqueness attributes are known.

Table DNGRPS is then accessed for the range 001-366-2000 to 001-366-7999 wherein the DN 001-366-5678 falls. The entry corresponding to NETNAME PUBLIC yields a station address of 613-726-5678, and a station name of BNR.

The final attribute set is shown below.

- ADDRESS: 613-726-5678
- NAME: BNR
- NONUNIQUE: NO
- SUPPRESS: YES (DN) YES (NAME)

NETNAMES (continued)

Functional description

Table NETNAMES defines internal logical network names. These names are used in tables storing DN attributes corresponding to that network.

Information that is required for each network name is listed below:

- An external global network identifier used in interoffice high-level protocol messages must be specified.
- The number of digits in the network must be specified.
- Whether the presentation of the DN or name is suppressed, and whether this suppression is internal or external to the switching unit, must be specified.
- Which of two methods is used to convey the name information across the CCS7 network must be specified. In method one, the name information of the calling party is included in the initial address message (IAM). In method two, an indicator for the availability of the calling party name information is included in the IAM. In both methods, a request for the connected party name information is also included in the IAM if necessary.

Note: The actions at the terminating switching office are dependent on the method that is used to exchange the name information. When the terminating switching unit receives an IAM that contains the name information in the party information parameter, the switching unit passes the information to the connected party (if applicable) and continues to complete the call set-up phase. When method two is used, the terminating switching unit determines if the connected party needs the name information, and sends the request to the originating switching unit using either the address complete message (ACM) or an information request message (INR). The call continues without waiting for the name information from the originating switching unit. The option NMDSP and its refinements are provided in table NETNAMES to indicate which method is used.

- Whether the PRA Facility Reject message is sent to the originator when the PRA Facility message cannot be properly routed to the destination must be specified.
- Whether a network can route its NRAG connectionless SS7 messages to the NRAG subsystem, and whether such messages can be routed through the digits and the point code (PC) returned in the ISUP release message (instead of using table MSGRTE) must be specified.
- Whether TCAP messages are routed by the MSGRTE table or through the NMS subsystem must be specified.

NETNAMES (continued)

The first entry in table NETNAMES is PUBLIC 0, which corresponds to the public telephone network. This entry is added automatically by the system and cannot be deleted.

The following warning message appears when deleting a NETNAME in this table. Before deleting a particular NETNAME, check that the NETNAME is not datafilled in tables NCOS, IBNXLA, DNGRPS, and DNATTRS.

**CAUTION****Possible unde ned data in tab les**

This NETNAME may be referred by the following tables: NCOS, IBNXLA, DNGRPS and DNATTRS. Please check and delete them; otherwise these tables will contain undefined data.

Facility reject message on ISDN primary rate access (PRA)

The feature Facility Reject Message on PRA implements the PRA Facility Reject message, which is sent back to the originator of the PRA Facility message when it is not possible to route the Facility message. The PRA Facility Reject message identifies the originator and indicates the reason that the message could not be routed to the destination. The reason for return information element in this message indicates the cause of the rejection. Operational Measurements are incremented for the PRA Facility Reject message.

The PRA Facility Reject message is returned to the originator only if the PRA Facility message contains the option for receiving this message. This option is specified in the PRA Facility message only if the indication for this option was specified for the current network. The options for each network are contained in table NETNAMES, and include an option for specifying that the PRA Facility Reject message is requested.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NETNAMES.

Table size

1 to 4095 tuples

The maximum of 4095 tuples is only specified if the operating company has the Software Option Control feature. The maximum tuples without Software Option Control is 512. The default NETNAME (PUBLIC) and its associated

NETNAMES (continued)

external network identifier (0) are automatically added by the system and cannot be deleted.

Data II

The following table lists datafill for table NETNAMES.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
NETNAME		alphanumeric (1 to 32 characters)	<i>Logical network name</i> Enter a unique character string for the logical network name. The network name is used to access tables DNGRPS and DNATTRS.
DMS_SLC		numeric (1 to 7 digits)	<i>DMS Site Location Code</i> Enter the steering code digits for the network to route calls with the site location code (SLC) to the DMS-100E switch. This steering code is sent as the Node Number in the DA parameter of the route optimization (ROP) request. The terminating node uses this DA (and hence this SLC) to route the optimized call back to the originating DMS-100E switch.
EXTNETID		numeric(0 to 32 600)	<i>External network identifier</i> Enter a unique number for the external network identifier. This number is used externally to identify logical networks. All switching units must agree on the values used. The external network identifier 0 (zero) is automatically added for NETNAME PUBLIC, and is therefore not available for other tuples.
NETDIGS		numeric(0 to 10)	<i>Network digit</i> Enter a value that represents the number of digits in the logical network. The value in this field is used to extract the correct number of digits from the stored DN.
NETOPTS		see subfields	<i>Network options</i> This field consists of subfield OPTION and refinements.

NETNAMES (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	OPTION	FACREJ NINTNRAG NMDSP NMRTNRAG NMSTBRTE or SUPPRESS	NETWORK OPTION enter a network option in accordance with the following conditions: • If the Facility Reject message must be sent to the originator when the Facility message cannot be properly routed to the destination, enter FACREJ. • If TCAP messages sent for the network NWI must be routed through the use of the MSGRTE table (as opposed to using the SCCP NMS subsystem), enter NMSTBRTE. • If the original call was made over an SS7 trunk, and the network can route its Network Ring Again (NRAG) connectionless SS7 messages to the NRAG subsystem, enter NINTNRAG (Non-interworking NRAG). • If name exchange is required, enter NMDSP and datafill field NMXCHG. • If the original call was made over an SS7 trunk, and the network can route its NRAG connectionless SS7 messages through the digits and the point code (PC) returned in the ISUP release message instead of using table MSGRTE, enter NMRTNRAG (No MSGRTE NRAG). Note: A tuple is rejected if option NINTNRAG is datafilled without option NMRTNRAG also being datafilled. If suppression of the DN or name is required, enter SUPPRESS and datafill fields INTRNLDN, EXTRNLDN, INTRNLNM, and EXTRNLNM.
	INTRNLDN	Y or N	<i>Internal suppression of DN</i> Enter Y to mark intraoffice/intranetwork numbers as private or enter N to allow number delivery on intraoffice/intranetwork calls.

NETNAMES (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	EXTRNLDN	Y or N	External suppression of dn Enter Y to mark interoffice/intranetwork numbers as private or N to allow number delivery on interoffice/intranetwork calls.
	INTRNLNM	Y or N	<i>Internal suppression of name</i> Enter Y to mark intraoffice/intranetwork calls as private or enter N to allow name delivery on intraoffice/intranetwork calls.
	EXTRNLNM	Y or N	<i>External suppression of name</i> Enter Y to mark interoffice/intranetwork calls as private or enter N to allow name delivery on interoffice/intranetwork calls.
	NMXCHG	SETUP or QUERY	<i>Name exchange method</i> If the name exchange method that appends the name of the calling party in the set-up message is required, enter SETUP. If the name exchange method that sends the name of the connected party only if a request is received is required, enter QUERY.
CONTMARK		+ or \$	<i>Continuation mark</i> Enter + if additional information for this tuple is contained in the next record. Otherwise enter \$ to indicate the end of the tuple.

Data I l e x a m p l e

The following example shows sample datafill for table NETNAMES. This example shows two tuples, the first of which is the default tuple present in the table at load time. The second tuple defines a network named BNR, which has an external identifier of 4, uses 5 of the DN digits, and has suppressed external name and number identification on a network basis. It sends the name information only when requested and can route its NRAG connectionless SS7 messages through the digit and point code (PC) returned in the ISUP release message.

NETNAMES (continued)**MAP display example for table NETNAMES**

NETNAMES	EXRNETID	NETDIGS	NETOPTS
PUBLIC	0	0	\$
BNR	4	5	(SUPPRESS N N Y Y) (NMXCHG QUERY) (NMRTNRAG) \$

Limitations and restrictions

The following limitations and restrictions apply to the determination of the network identifier for a call.

- If the call is a trunk call, the network of the originating line and trunk are compared to verify if the call is a private or public network call. If the trunk does not have a network name, the call is assumed to be a public network call.
- If the originator of the call is a POTS line, the public network identifier is used.
- If the customer group of either the originator or the terminator is not datafilled in table CUSTNTWK, the public network identifier is used.
- If the customer groups for both the originator and the terminator are datafilled in table CUSTNTWK, but are associated with different networks, the public network identifier is used.
- If the customer groups of both the originator and the terminator are datafilled in table CUSTNTWK and are associated with the same network, the network identifier in table CUSTNTWK is used.

Table history
NA008

The following changes were made as a result of a customer service request.

- Reworded the subfields INTRNLDN, EXTRNLDN, INTRNLNM, and EXTRNLM to add clarity.
- Revised the datafill example for table NETNAMES.
- Added list of limitations and restrictions that apply to the determination of the network identifier for a call.

NETNAMES (end)

EUR010

Added option DMS_SLC for activity AJ5366.

NA004

NA004 increased the table size to 4095 tuples for operating companies with the Software Control Option.

NETTOPRT**Table name**

NETINFO to Partition Number Mapping Table

Functional description

Table NETTOPRT maps network information (NETINFO) to partition numbers for international virtual private network (IVPN) calls.

Data II sequence and meaning

You must enter data in table NETNAMES before you enter data in table NETTOPRT.

Table size

0 to 4 189 185 tuples

You can increase table size without a restart.

Data II

Datafill for table NETTOPRT appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>NETTOPRT key.</i> This field is the key to the table. This field contains subfields NETNAME, NETCGID, and NCOS.
	NETNAME	alphanumeric (a maximum of 32 characters)	<i>Network name.</i> Enter a character string corresponding to a network name as entered in table NETNAMES.
	NETCGID	0 to 4095	<i>Network customer group ID.</i> Enter a number to identify the external customer group. Entry values outside the range indicated for this field are not correct.
	NCOS	0 to 511	<i>Network class of service.</i> Enter a number to specify the network class of service.
PRT		0 to 9 (3 digits)	<i>Partition number.</i> Enter a partition number.

NETTOPRT (end)

Data l l e x a m p l e

Datafill for table NETTOPRT appears in the following example.

The first datafill required for the following NETINFO to partition number mapping appears in the following example:

- The NETWK1 external customer group 50, with class of service 25, associates with partition digits 601.
- The NETWK2 external customer group 100, with class of service 60, associates with partition digits 602.
- The NETWK3 external customer group 100, with class of service 70, associates with partition digits 603.

MAP example for table NETTOPRT

KEY		PRT	
NETWK1	50	25	601
NETWK2	100	60	602
NETWK3	100	70	603

Table history
BCS34

Table NETTOPRT was introduced in BCS34.

NETTOSTS-Canada only**Table name**

Network Information Table

Functional description

Table NETTOSTS maps between network information (NETINFO) parameter fields, network identification (ID), network class of service (NCOS), and a serving translation scheme (STS).

Data II sequence and meaning

You must enter data in the following tables before you enter data in table NETTOSTS-Canada only:

- HNPACONT
- NETNAMES

Table size

0 to 4 100 000 tuples

Data II

Datafill for table NETTOSTS-Canada only appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NETNAME		alphanumeric (a maximum of 32 characters)	<i>Network name.</i> Enter the network name entered in table NETNAMES to identify an external network identification (ID).
NETCGID		1 to 4096	<i>Network customer group ID.</i> Enter the predefined number that identifies an external customer group on a Meridian SL-100. The value 0 is not a correct entry.
NCOS		0 to 511	<i>Network class of service.</i> Enter the network class of service (NCOS). See table NCOS.
STS		000 to 999	<i>Serving translation scheme.</i> Enter the serving translation scheme (STS) number entered in table HNPACONT. The STS number is always a three-digit number.

NETTOSTS-Canada only (end)

Data I l e x a m p l e

Datafill for table NETTOSTS-Canada only appears in the following example.

In the example, the network name is NETWKD. The ID is 100. The NCOS is 60. The STS is 600.

MAP example for table NETTOSTS-Canada only

NETNAME	NETCGID	NCOS	STS
NDTWKD	100	60	600

NETWORK

Table name

Network Assignment Table

Functional description

Table NETWORK lists the following assignment data for each network frame:

- floor, row on floor, frame position in row, and shelf position on frame of each network module
- central message controller card and port assigned to each network module of an NT40 or a message switch card and port assigned to each network module of a SuperNode.
- size of network. The size can be full, half, or quarter.
- product engineering code of network

Data II sequence and meaning

You do not need to enter data into other tables before you enter data in table NETWORK.

Table size

Table is from 0 to 64 tuples.

The system allocates memory continuously.

Data II

Datafill for table NETWORK appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
NETNUM		see subfields	<i>Network number.</i> This field contains subfields PAIR and PLANE.
	PAIR	0 to 31	<i>Network.</i> Enter the number assigned to the network pair.
	PLANE	0 or 1	<i>Plane.</i> Enter the plane number of the network pair.
SHPOS		0 to 77	<i>Shelf position.</i> Enter the base mounting position of the network module.

NETWORK (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
FLOOR		0 to 99	<i>Floor.</i> Enter the remote location or the floor that contains the network module.
ROW		A to H J to N P to Z AA to HH JJ to NN PP to ZZ	<i>Row.</i> Enter the row on the floor that contains the trunk module equipment frame.
FRPOS		0 to 99	<i>Frame position.</i> Enter the bay position in the row that contains the network module.

NT40 switch

If the switch is an NT40, enter data into fields CMCCARD and CMCPORT.
An explanation of this process appears in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
CMCCARD		0 to 13	<i>Central message controller card</i> Enter the central message controller card number assigned to the network module.
CMCPORT		0 to 4	<i>Central message controller port.</i> Enter the central message controller port number assigned to the network module.

NETWORK (continued)**SuperNode switch**

If the switch is a SuperNode, enter data into fields MSCARD, MSPORT, NETSIZE, and EQPEC. An explanation of this process appears in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
MSCARD		6 to 23	<i>Message switch controller card.</i> Enter the message switch controller card number. Entries outside of this range are not correct.
MSPORT		0 to 15	<i>Message switch controller port.</i> Enter the message switch controller port number.
NETSIZE		FSIZE HSIZE or QSIZE	<i>Network size.</i> Enter the network size. The network size can be FSIZE (full), HSIZE (half), or QSIZE (quarter). The size refers to the number of incoming and outgoing ports. A full size network contains 64 incoming and 64 outgoing ports. A half size network contains 32 incoming and 32 outgoing ports. A quarter size network contains 16 incoming and 16 outgoing ports.
EQPEC		0X48AA 5X13AA 5X13AB 5X13BA 5X13LS 7X27AA 7X27AB 8X11AA 8X11BA or 8X1101	<i>Product engineering code.</i> Enter the product engineering code (PEC) of the network. Enter 0X48AA if the PEC is 0X48AB, AC, AG, AH, or AJ. Enter 5X13AA or 5X13BA for the 5X13 network. Enter 5X13LS for the large system configuration (LSC) network simulator. Enter 7X27AA for the 7X27 network. Enter 5X13AB or 7X27AB for the 5X13 or 7X27 networks. These 5X13 or 7X27 networks contain per-channel digital gain pads on the A-side crosspoint cards. Enter 8X11AA or 8X11BA for the double shelf network equipment (DSNE). Enter 8X1101 for the cabinetized Meridian SL-100 network.

Data II e xample

Two examples of datafill for table NETWORK appear in the following examples.

The assignments associated with network modules 0 and 1 for an NT40 switch appear appear in the first example.

NETWORK (end)

The datafill example provides one record for each network module to a maximum of 32 modules.

MAP example for table NETWORK

NETNUM	SHPOS	FLOOR	ROW	FRPOS	MSCARD	MSPORT	NETSIZE	EQPEC
0	0	0	5	C	0	0	1	FSIZE 0X48AA
1	1	0	5	C	1	0	2	FSIZE 0X48AA

The assignments associated with network module 0 for a SuperNode switch appear in the second example.

MAP example for table NETWORK

NETNUM	SHPOS	FLOOR	ROW	FRPOS	MSCARD	MSPORT	NETSIZE	EQPEC
0	0	0	5	C	0	0	1	FSIZE 8X1101

NIUINV

Table name

Network Interface Unit Inventory Table

Functional description

Table NIUINV contains one tuple for each network interface unit (NIU). The tuple describes the following:

- location of the NIU
- default load
- cards used for each unit
- links to the network

Data II sequence and meaning

To add a tuple to table NIUINV, you must enter data into tables SUSHELF, PMLOADS, and NETWORK correctly. Specified requirements appear in the following list:

- If the host is a link interface module (LIM), you must enter the LIM in table LIMINV and LIMPTINV.
- If the host is a fiberized link interface shelf (FLIS) NIU, you must enter data into table MSCDINV.
- You must enter the shelf in table SUSHELF. The product engineering code (PEC) of the F-bus repeaters for the shelf must be NT9X74DA.
- You must enter the load name in table PMLOADS. You must enter the network in table NETWORK.
- For a junctured network (JNET), enter tables NETWORK, and table ENCDINV (ENET only). For an enhanced network (ENET), enter tables NETWORK, and table ENCDINV (ENET only).
- In table LIUINV, you cannot enter another peripheral module (PM) in slots 18 to 21. This condition applies to a two-slot shelf. In table LIUINV, you cannot enter another PM in slots 17 to 22. This condition applies to a three-slot shelf.
- The maximum number of NIUs is 18.

Table size

0 to 29 tuples

NIUINV (continued)**Data II**

Datafill for table NIUINV appears in the following table.

Field descriptions (Sheet 1 of 4)

Field	Subfield or refinement	Entry	Explanation and action
NUMBER		0 to 29	<i>Network interface unit number</i> This is the key field for the table. Enter the NIU number.
LOCATION		see subfields	<i>Location</i> This field contains subfields CONTROL and SHELF.
	CONTROL	LIM or MS	<i>Control</i> If the host is an LIM, enter LIM. Enter refinement LIMNUM. If the host is the message switch (MS), enter MS. Enter refinements MSCARD and MSPORT.
	LIMNUM	0 to 16	<i>Link interface module number</i> Enter the LIM number.
	MSCARD	5 to 23	<i>Message switch card</i> Enter the MS card number.
	MSPORT	0 to 3	<i>Message switch port</i> Enter the MS port number.
	SHELF	1 to 3	<i>Shelf</i> If the host is a LIM, enter the shelf number. If the host is a MS, enter 1 for a fiberized link interface shelf (FLIS). If the host is a MS, enter 1 or 2 for a rate adapter (RA).
LOAD		alphanumeric (vector of a maximum of eight characters)	<i>Default loadfile</i> Enter the name of the default loadfile as entered in table PMLOADS.

NIUINV (continued)**Field descriptions (Sheet 2 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
U0INFO		see subfields	<i>Network interface unit 0 information</i> This field contains the PEC information for NIU 0. Enter subfields PROCPEC, CBCPEC, and PBPEC.
UN1INFO		see subfields	<i>Network interface unit 1 information</i> This field contains the PEC for NIU unit 1. Datafill subfields PROCPEC, CBCPEC, and PBPEC.
	PROCPEC	NTEX22BB, NTEX22CA, NTEX22DA, NTEX22EA, or NTEX22FA	<i>Processor PEC</i> Enter NTEX22BB to specify the integrated processor and F-bus interface card PEC. Enter NTEX22CA to specify the 32-Mbyte integrated processor and F-Bus interface card. Enter NTEX22DA to specify the 64-Mbyte integrated processor and F-Bus interface card. Enter NTEX22EA to specify the 96-Mbyte integrated processor and F-Bus interface card. Enter NTEX22FA to specify the 128-Mbyte integrated processor and F-Bus interface card. Note: NTEX22DA and NTEX22EA are reserved in the software for future use. NTEX22FA is available for the Global System for Mobile Communications release 11 (GSM11) CCS7 server (SVR7) peripheral only.
	CBCPEC	NTEX25AA NTEX25BA	<i>Channel bus controller PEC</i> Enter NTEX25AA to specify the NIU CBC card PEC for field NIU_UNIT0_INFO. Enter NTEX25BA to specify the NIU CBC card PEC for field NIU_UNIT1_INFO.

NIUINV (continued)**Field descriptions (Sheet 3 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
NETLINKS	PBPEC	NTEX28AA	<i>Paddle board PEC</i> Enter NTEX28AA to specify the NIU DS30 link interface paddle board PEC.
		vector of a maximum of four multiples	<i>Network links</i> For junctored network (JNET) offices, enter a vector of a maximum of four multiples of subfields NMPAIR and NMPORT. These vector entries specify the network links. For enhanced network (ENET) offices, enter a vector of a maximum of four multiples of subfields ENSHELF, ENSLOT, ENLINK, and ENDS30. These vector entries specify the network links. A blank space must separate each entry. Enter + to indicate that the vector continues in the next record. Enter \$ to indicate the end of the vector.
	NMPAIR	0 to 31	<i>Network module pair</i> Enter a number to specify the network module (NM) pair.
	NMPORT	0 to 63	<i>Network module port</i> Enter a number to specify the NM port.
	ENSHELF (BCS35-)	0 to 7	<i>Enhanced network shelf</i> Enter a number to specify the ENET shelf. For a 16K-byte ENET, 0 is the only correct entry. For a 128K-byte ENET, the correct entry range is 0 to 3. Only Northern Telecom can use values 4 to 7.
	ENSLOT (BCS35-)	10 to 19 25 to 32	<i>Enhanced network slot</i> Enter a number to specify the ENET slot. For a 16K-byte ENET, the entry range is 13 to 19. For a 128K-byte ENET, the entry range is 10 to 16 and 25 to 32.

NIUINV (continued)**Field descriptions (Sheet 4 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	ENLINK (BCS35-)	0 to 18	<i>Enhanced network link</i> Enter the ENET link number.
	ENDS30 (BCS35-)	0 to 15	<i>DS30 or fiber link</i> Enter a number to specify the DS30 on the fiber link. For DS30 links, the only correct entry is 0. The NIU only uses DS30 links.

Data file example

Datafile for table NIUINV appears in the following example. This example contains the following information:

- A LIM host uses LIM number 3, shelf number 1, and default loadfile NRS34AA. A LIM uses PEC NTEX22BB for the processor, NTEX25AA for the CBC, and NTEX28AA for the netlink paddle board. These PECs apply to NIU units 1 and 2. Two network links are defined with NMPAIR and NMPORT values 1, 2 and 1, 3.
- The MS host uses MS card number 5, MS port number 1, shelf number 1, and default load file NRS34AA. The MS host uses PEC NTEX22BB for the processor, NTEX25AA for the CBC, and NTEX28AA for the netlink paddle board. These PECs apply to NIU units 1 and 2. Two network links are defined with NMPAIR and NMPORT values 2, 2 and 2, 3 in sequence.

MAP example for table NIUINV

NUMBER	LOCATION	LOAD	UN1 INFO	U0 INFO NETLINKS
1	LIM 3 1	NRS34AA NTEX22BB NTEX25AA NTEX28AA +		
	NTEX22BB NTEX25AA NTEX28AA	1 2 1 3 \$		
2	MS 5 1 1	NRS34AA NTEX22BB NTEX25AA NTEX28AA +		
	NTEX22BB NTEX25AA NTEX28AA	2 2 2 3 \$		
3	LIM 2 2	NWS11?? NTEX22FA NTEX25AA NTEX28AA		
	NTEX22FA NTEX25BA NTEX28AA	(0 32 1 0) (0 32 2 0) (0 32 3 0) (0 32 4 0) \$		

Table history**TL14**

Maximum number of NIUs increased to 18.

NIUINV (end)

TL11

The following PECs were added under PROCPEC subfield:

- NTEX22FA
- NTEX22DA
- NTEX22EA

TL06

The NTEX22CA was added to subfield PROCPEC.

BCS35

Subfields ENSHELF, ENSLOT, ENLINK, and ENDS30 were added in BCS35.

BCS34

Table NIUINV was introduced in BCS34.

NLUPCLLI

Table name

Nailed-up Connection (NLUP) common language location identifier (CLLI) Table

Functional description

A switching unit can provide table NLUPCLLI. This switching unit must have feature package NTX802AA (Toll Features II), or feature package NTX902AA (Local Features II).

The incoming side of the nailed-up connection pair does not require a hard-wire supervision off-hook to be available. The system supports in-band and standard supervision signals in both directions.

Trunks for the nailed-up connection trunk group have trunk group type NU in table TRKGRP.

The maximum number of nailed-up connections is 801 or 0 to 800. For each of the connections, the following requirements apply:

- Data entry of the CLLI and external trunk number of the incoming and outgoing trunks must occur. You must connect this CLLI and the external trunk number of the incoming and outgoing trunks.
- The value of field CONNECT must be specified.

If field CONNECT is set to Y (yes), the two trunk circuits connect. The state of these trunk circuits change from idle, inhibit, lockout, or remote make busy. The state of these trunk circuits change to seized on the trunk test position (TTP).

If field CONNECT is set to N (no), a release of the connection occurs. The trunks return to the idle state.

For the first datafill, field CONNECT must be N.

Data II sequence and meaning

Enter data in the following tables before you enter data in table NLUPCLLI:

- CLLI
- TRKMEM

Table size

0 to 801 tuples

NLUPCLLI (continued)

Additional table size information for junctored network (JNET) and enhanced network (ENET) offices appears in the following paragraphs.

Junctored Network of ces

For JNET offices, parameter MAXNUCS in table OFCENG allocates memory for table NLUPCLLI.

Enhanced Network of ces

For ENET offices, parameter MAXNUCS in table OFCENG does not use allocate memory for table NLUPCLLI. For ENET offices, parameter MAXNUCS in table OFCENG must be 0.

Data II

Datafill for table NLUPCLLI appears in the following table:

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
INDX		numeric (0 to 800)	<i>Index.</i> Enter the index for the entry. the assignment of the index must be in order and start from 0.
NUPI		see subfields	<i>Nailed-up incoming connection.</i> This field contains subfields CLLI and EXTRKNM.
	CLLI	alphanumeric (a maximum of 16 characters)	<i>Incoming common language location identifier.</i> Enter the CLLI code assigned to the incoming trunk in table CLLI.
	EXTRKNM	numeric (0 to 9999)	<i>Incoming external trunk number.</i> Enter the external trunk number for the incoming trunk.
NUPO		see subfields	<i>Nailed-up outgoing connection.</i> This field contains subfields CLLI and EXTRKNM.
	CLLI	alphanumeric (a maximum of 16 characters)	<i>Outgoing common language location identifier.</i> Enter the CLLI code for the outgoing trunk in table CLLI.
	EXTRKNM	numeric (0 to 9999)	<i>Outgoing external trunk number.</i> Enter the external trunk number for the outgoing trunk.
	CONNECT	Y or N	<i>Connect.</i> Enter Y if the two trunks are to connect. For other conditions enter N.

NLUPCLLI (end)

Data example

Datafill for table NLUPCLLI appears in the following example:

MAP example for table NLUPCLLI

INDX	NUPI	NUPO	CONNECT
10	OTWAON52CG02 15	HULLPQ1077X0 17	Y

Table history
CSP04

The following changes, occur in CSP04.

- References to table DATASIZE are deleted because table NLUPCLLI is now self-sizing and does not appear in table DATASIZE.
- The reference to the cold restart requirement is deleted when changes occur to field SIZE in table DATASIZE for nailed-up connection CLLIs.

NMSDATA

Table name

Network Message Service Data Table

Functional description

Message Waiting allows messages for busy or unavailable clients to be stored and retrieved at a time convenient to the client. When a message is left at the message center through a simplified message desk interface (SMDI), the message waiting indicator (MWI) is activated at the client's set. The MWI is either a stuttered dial tone, or a lit lamp.

The network message service (NMS) allows a message center connected to one switch to activate or deactivate the MWIs of clients on another switch. Meridian-1 switches and DMS switches have different NMSs.

Table NMSDATA allows a message center on a Meridian-1 switch to deactivate or deactivate MWIs for subscribers on the DMS, and similarly, for a message center on a DMS switch to deactivate or deactivate MWIs for subscribers on the Meridian-1.

Option NMSPVT must be datafilled in table SLLNKDEV.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NMSDATA.

Table size

0 to 1048 tuples

NMSDATA (continued)**Data II**

The following table lists datafill for table NMSDATA.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfield	<i>Table key</i> This field is the key to the table and consists of subfield DNKEY.
	DNKEY	see subfields	<i>Directory number key</i> This field consists of subfields XVGNPAS, NNX, and DEFGDIGS which together identify the seven-digit private or ten-digit public destination directory number (DN). Separate each subfield with a single space.
	SVGNPA	0 to 9 (3 digits)	<i>Serving numbering plan area</i> Enter the first three digits of the DN for the serving numbering plan area (SNPA).
	NNX	0 to 9, A to F, N (3 digits)	<i>Office code</i> Enter the second three digits of the DN for the office code.
	DEFDIGS	0 to 9, A to F, N (4 digits)	<i>Defining digits</i> Enter the final four digits of the DN.
NETNAME		alphanumeric (1 to 8 characters)	<i>Network name</i> Enter the name of the network message service (NMS).
NMSID		0 to 9 (up to 10 digits)	<i>Network message service identifier</i> Enter the number that identifies the NMS.

Data II e xample

The following example shows sample datafill for table NMSDATA.

NMSDATA (end)

MAP display example for table NMSDATA

KEY NETNAME				NMSID
819	263	8961	PUBLIC	68293348

Table history
BCS36

Table NMSDATA was introduced.

Supplementary information

This section provides information on dump and restore procedures for table NMSDATA.

Dump and restore

Normal dump and restore procedures apply.

NNASST

Table name

Node Number Assignment Table

Functional description

A dump and restore occurs for table NNASST when the building of a new load occurs. Other controls of the table are not a requirement.

Table NNASST contains information which was dumped from the old load. This information does not change when building the new load. This information is for information and reloading purposes only.

A new load is built. When this event occurs, table NNASST makes sure that the node number assignments are compatible with the assignments in the old load. When the addition, deletion, or relocation of nodes occurs, the switch updates table NNASST automatically.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table NNASST.

Table size

0 to 4096 tuples.

Data II

Datafill for table NNASST appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NODENO		0 to 4095	<i>Node number.</i> Entry is equal to the node number of a node in the system.
CSLINK0		0 to 4095	<i>C-side link 0.</i> Entry is equal to the C-side link 0 of the node.

Data II e xample

Sample datafill for table NNASST appears in the following example.

NNASST (end)

MAP example for table NNASST

NODENO		CSLINK0	
102	0	004	0

NO6BDXLA

Table name

CCITT No.6 Band Translation Table

Functional description

Table NO6BDXLA allows the data entry of the band translation from local band to external band number. A reconfiguration of the local to external band mapping can occur without a deletion of all the users of these local bands. To perform this reconfiguration, the system accepts a nil external band, 128, as a correct input to table NO6BDXLA. This acceptance of the nil external band allows the change of external bands without a deletion of the trunks in table NO6TKMEM. The process now requires the change of the external band to nil external band, 128. In the next step, the band changes to a new external band not in use in another position.

Data II sequence and meaning

You must enter data in table NO6BDXLA before you enter data in the following tables.

- CLLI
- NO6RTSET
- NO6LKSET

Table size

The system automatically allocates memory for 2 056 320 (63 x 255 x 128) tuples.

NO6BDXLA (continued)**Data II**

Datafill for table NO6BDXLA appears in the following table:

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>Key.</i> This field is the key to the table. This field contains subfields ROUTESET, LINKSET, and CBAND.
	ROUTESET	alphanumeric (1 to 16 characters)	<i>Route set identifier.</i> Enter the common language location identifier (CLLI) code that represents the route set. The assignment of the CLLI code occurred earlier in table CLLI. Table NO6RTSET must define this CLLI code.
	LINKSET	alphanumeric (1 to 16 characters)	<i>Link set identifier.</i> Enter the CLLI code that represents the link set. The assignment of the CLLI code occurred earlier in table CLLI. Table NO6LKSET must define this CLLI name.
	CBAND	0 to 127	<i>Local band number.</i> Enter the local band of the of the route set that determines a group of 16 circuits. The route set and local band identifies these 16 circuits in a different way. See table NO6TKMEM.
EXTBAND		0 to 128	<i>External band number.</i> Enter the external band number signaling messages use on a specified route by a route set and local band. The external band number is in the range 0 to 127. Entry 128 is the nil external band (nil_external_band).

Data II e xample

An example of datafill for table NO6BDXLA appears in the following example.

NO6BDXLA (end)

The following appear in the example:

- For route set PRM1BBBAUS, link set BBBPRM1AUS, the local bands are 0, 10, 20 and 25. The external bands are 0, 10, 20, and 30, in this order. This route is an associated route. See table NO6RTSET.
- For route set PRM1BBBAUS, link set BBBPRM1LONSBAUS, the local bands are 0, 10, 20 and 25. The external bands are 0, 10, 20, and 30, in this order. This route is a quasi route. See table NO6RTSET.

MAP example for table NO6BDXLA

		KEY EXTBAND
PRM1BBBAUS	BBBPRM1AUS	0 0
PRM1BBBAUS	BBBPRM1AUS	10 10
PRM1BBBAUS	BBBPRM1AUS	20 20
PRM1BBBAUS	BBBPRM1AUS	25 30
PRM1BBBAUS	BBBPRM1LONSBAUS	0 0
PRM1BBBAUS	BBBPRM1LONSBAUS	10 10
PRM1BBBAUS	BBBPRM1LONSBAUS	20 20
PRM1BBBAUS	BBBPRM1LONSBAUS	25 30

NO6LINKS

Table name

CCITT No.6 Signaling Links Table

Functional description

A single signaling channel is a link. The CCITT No.6 signaling system defines two categories of signaling links. The first category contains the following:

- a dedicated No.6 signaling terminal controller (STC)
- a No.6 transmission link (TL) circuit card
- the network connection between the controller and the card

The name of this mode of operation is primary, load sharing, or synchronized reserved signaling links. The second category of signaling link contains a No.6-TL circuit card. The second category does not have a No.6 STC. The second category does not have a network connection with the transmission link. The second category functions as a backup facility in the occurrence of the failure of an active signaling link. This name of this mode of operation of the signaling link is non-synchronized reserved or nominated speech circuit signaling links.

The user must meet the following conditions before the data entry of table NO6LINKS occurs.

- The addition of the common language location identifier (CLLI) name to table NO6LKSET must occur.
- Signaling mode ordering:
 - The entry of data for primary and synchronized reserve signaling links must occur. After this process is complete, the user can enter data. The user can enter data in the non-synchronized reserved or the nominated speech circuit signaling links. A link set cannot contain more than one primary or synchronized reserve signaling link.
 - The entry of data for load sharing pair signaling links must occur. After this process is complete, the user can enter data. The user can enter data in the non-synchronized reserved or the nominated speech circuit signaling links. The data entry of the first load sharing signaling link is complete. Data entry of the second load sharing signaling link must occur immediately. The addition of the second load sharing signaling link to the table is complete. Data entry of the load sharing algorithm must occur immediately.
 - A link set can contain a maximum of two synchronized links. The link set can have one of two pairs of links. One pair is a load sharing pair of signaling links. The other pair is a primary link with a full time

NO6LINKS (continued)

synchronized reserve link. A group of different security arrangements must not occur.

- A link set can contain one signaling link (primary) in the link set without reserved links.
- A link set can have more than one nominated speech circuit signaling link as a reserve signaling link. A link set can have a maximum of seven speech circuit signaling links in the link set. The first signaling link must be a primary or load sharing link.

Note: When the signaling link mode is not in the order that appears in the preceding list, a warning appears.

- Table STINV must contain data for the STC. The STC must be available.
- Table STPOOLS (field POOLID) must contain the pool identification.
- All the STC numbers or pool identifications must associate with the same message switch buffer (MSB). This association must occur for all the signaling links entered in the link set.
- The user must add the transmission link to table TRKMEM. The transmission link must be available.
- The signaling link must be in offline state to change or delete this tuple.
- The route set and the link set must be in the offline state to reconfigure the node of the signaling link.

Note: One of two conditions must apply to change, add, or delete the posted link set. The first condition is that the link set on the MAP must be posted again. The second condition is that the user must enter the common channel signaling (CCS), CCITT6, and N6 link set (N6LKSET) levels again. When one of these conditions does not occur, the system updates data that is not compatible on the MAP.

Data II sequence and meaning

Data entry for the following tables must occur before the user enters data in table NO6LINKS.

- TRKMEM
- STINV
- STPOOLS

Table size

The system allocates memory automatically for 255 tuples.

NO6LINKS (continued)

Data II

Datafill for table NO6LINKS appears in the following table.

Field descriptions (Sheet 1 of 4)

Field	Subfield or refinement	Entry	Explanation and action
LINKNAME		see subfields	<i>CCITT No.6 link name.</i> This field contains subfields CLLI and LINK.
	CLLI	alphanumeric 1 to 16 characters	<i>Common language location identifier.</i> Enter a CCITT No.6 common language location identifier (CLLI). This CLLI is for the code that represents the link set. Table CLLI already contains an assignment for this code. This code represents the link set. Table NO6LKSET must contain a definition of this CLLI.
	LINK	0 to 6	<i>Signaling link external name.</i> Enter the secondary key of the signaling link. The user can define a maximum of seven signaling links in a link set.

NO6LINKS (continued)**Field descriptions (Sheet 2 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
MODE		LOADSHAR NOMSPECH NONSYRES PRIMARY or SYNCRESV	<i>Signaling link mode.</i> Enter the link mode. The LOADSHAR means that two signaling links share the total signaling load on the link set. Each link is the reserve for another load sharing link. The system assigns the circuit identical labels on both links. The system assigns each circuit to one of the parallel signaling links as the normal link. The exchange must be able to accept signaling traffic for the labels over either link at all times. The NOMSPECH means that a nominated speech circuits link is nominated as a backup for a primary or load sharing link. The NOMSPECH normally functions as a speech circuit. When all signaling links are busy, the NOMSPECH can function as a signaling link. When signaling requires the transmission link, the transmission link must connect through the network to a No.6 signaling terminal (ST). A nominated speech circuit is the least preferred selection of backup. A nominated speech circuit only functions in emergency conditions when the primary and all reserved links fail. The NONSYRES means that a non-synchronized reserved link is reserved as a backup for a primary or load sharing link. The NONSYRES is not synchronized with the far end. A pool ST does not connect to the transmission link (TL). The selection of an ST occurs from a pool. When the system requires the link, the system connects the ST to the idle TL. The synchronization of the NONSYRES with the distant office requires a long period of time. This synchronization occurs before the NONSYRES can take over for a failed active link. The NONSYRES is a less preferred type of signaling route because of this attribute.

NO6LINKS (continued)**Field descriptions (Sheet 3 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
SELINFO		see subfield	The PRIMARY means that the designated active link in the normal operation of the signaling link is the active link. The active link carries the full signaling load. The SYNCRESV means that the system provides a synchronized reserved link as backup in the event of primary link failure. When a link failure is corrected, the system automatically transfers the signaling load to the primary link.
	STCSEL	POOLSTC or STDSTC	<i>Selector information.</i> This field contains subfield STCSEL. <i>Signaling terminal selector.</i> Enter the ST selector. The POOLSTC indicates that the selection of the ST controller occurs from table STPOOLS. Enter data in refinement POOLNO. The STDSTC indicates that the selection of the ST controller (STC) occurs from table STINV directly. Enter data in refinement STNO.
	STNO	0 to 1023	<i>External signaling terminal number.</i> If the entry in subfield STCSEL is STDSTC, enter data in this refinement. Enter a number to identify the external ST to use. Table STINV must contain a definition for the external ST number. The user must fill the primary, load sharing, and synchronized reserved signaling link in the STC number. Proceed to field TLTRUNK.
	POOLNO	0 to 14 N or	<i>Pool identifier.</i> If the entry in subfield STCSEL is POOLSTC, enter data in this refinement. The selection of an ST occurs from a pool in Table STPOOL. When this event occurs, enter a number to indicate which message switch buffer (MSB) to use.

NO6LINKS (continued)**Field descriptions (Sheet 4 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
TLTRUNK		see subfields	<i>Transmission link trunk.</i> This field identifies the transmission link trunk. Table TRKMEM must define this field. This field contains subfields CLLI and EXTRKNM.
	CLLI	alphanumeric (1 to 16 characters)	<i>Transmission link trunk common language location identifier.</i> Enter the code that represents the transmission link. Tables CLLI and TRKMEM contain this code.
	EXTRKNM	0 to 9999	<i>External trunk number.</i> Enter the external trunk number assigned to the trunk.
	DRIDX	0 to 255	<i>Dump and restore index.</i> This field preserves internal table indexes that are exported and stored in MSB6. This field preserves STs across a MOVEBCS function. The maintenance of the internal index of each tuple in the table must occur. This maintenance allows the computing module (CM), MSB6, to use a common index to reference an ST and transmission link set. This maintenance also allows the ST to use a common index to reference a ST and transmission link set. This field can place the tuple in a position during a MOVEBCS. The field can place the tuple in a position when the DUMP_RESTORE_IN_PROGRESS office parameter in table OFCSTD is Y (yes).

Data I l e x a m p l e

An example of datafill for table NO6LINKS follows.

Four signaling links to and from Australia are present:

- Link name BBBPRM1AUS 0 is a primary link that obtains a signaling terminal from the STINV table. The transmission link trunk is BAP1VFL 0.
- Link name BBBPRM1AUS 1 is a synchronized reserve link that obtains a signaling terminal from the STINV table. The transmission link trunk is BAP1VFL 1.

NO6LINKS (end)

- Link name BBBPRM1AUS 2 is a non-synchronized reserve link that obtains a signaling terminal from signaling pool 0. The transmission link trunk is BAP1VFL 2.
- Link name BBBPRM1AUS 3 is a nominated speech circuit link that obtains a signaling terminal from signaling pool 0. The transmission link trunk is NO6830BAN 0.

There are two signaling links to and from London (an STP):

- Link name BBBPRM1LONSBAUS 0 is a primary link. Link name BBBPRM1LONSBAUS 0 obtains a signaling terminal from table STINV. The transmission link trunk is BLP1VFL 0.
- Link BBBPRM1LONSBAUS 2 is a non-synchronized reserved link. Link BBBPRM1LONSBAUS 2 obtains a signaling terminal from signaling pool 2. The transmission link trunk is BLP1VFL 1.

MAP example for table NO6LINKS

LINKNAME	MODE	SELINFO		TLTRUNK DRIDX	
BBBPRM1AUS 0	PRIMARY	STDSTC	0	BAP1VFL	0
BBBPRM1AUS 1	SYNCRESV	STDSTC	1	BAP1VFL	1
BBBPRM1AUS 2	NONSYRES	POOLSTC	0	BAP1VFL	2
BBBPRM1AUS 3	NOMSPECH	POOLSTC	0	NO6830BAN	0
BBBPRM1LONSBAUS 0	PRIMARY	STDSTC	44	BLP1VFL	0
BBBPRM1LONSBAUS 2	NONSYRES	POOLSTC	2	BLP1VFL	1

NO6LKSET

Table name

CCITT No.6 Link Set Table

Functional description

A link set contains all the CCITT No.6 signaling links. These CCITT No. 6 signaling links connect directly to the same two switching exchanges or signaling transfer points (STP). The system can send a signaling message associated with a given speech circuit. The system can send this message over a No.6 signaling link in a link set. This link has the same address label to identify the speech circuits. The name of this label is the signaling network identifier (SNID) in the DMS system. For the purpose of routing signaling information, a link set is a single entity. All messages that the link set carries have the same description.

The following conditions must occur before you enter data in table NO6LKSET:

- Add the common language location identifier (CLLI) name to table CLLI.
- You can change field CONTRLNG without removal of the link set from service.
- To change the link set configuration, the link set must be in the offline state.
- To delete a tuple, the link set must be in the offline state. To delete a tuple, the user must delete all signaling links that this link set defines.

Note: To change, add or delete the posted link set, one of the following occurs. The link set is reposted on the MAP. The CCS (Common Channel Signalling), CCITT6, and N6LKSET levels are entered again. If these conditions do not apply, the system updates inconsistent data on the MAP.

Data II sequence and meaning

Enter data in table CLLI before the user enters data in table NO6RTESET.

Table size

The system allocates memory for 255 tuples.

NO6LKSET (continued)**Data II**

Datafill for table NO6LKSET appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
LKSETID		alphanumeric (a maximum of 16 characters)	<i>CCITT No.6 linkset identifier.</i> Enter the code that represents the link set. Table CLLI contains this code.
CONTRLNG		CONTROL or NONCNTRL	<i>Emergency proving controlling exchange.</i> Enter CONTROL if the exchange is the controlling exchange for emergency proving. If the exchange is not the controlling exchange, enter NONCNTRL.
CONFINFO		see subfields	<i>Configuration information.</i> This field contains subfields CONFIG and ALGOR.
	CONFIG	DEDICATE or LOADSHAR	<i>Configuration.</i> This field defines the security arrangement used for a given link set. Enter DEDICATE to indicate that the link set uses the primary and synchronize reserve links method. Refinements do not require datafill. Proceed to field DRIDX. Enter LOADSHAR to indicate that the link set uses the load sharing links method. Enter data in refinement ALGOR.

NO6LKSET (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	ALGOR	EVENBAND EVENCKT ODDBAND ODDCKT	<i>Load sharing algorithm.</i> If the entry in subfield CONFIG is LOADSHAR, enter data this refinement. Enter EVENBAND to indicate that the system sends all even band signaling messages on the first load sharing link. Enter EVENCKT to indicate that the system sends all even circuit signaling messages on the first load sharing link. Enter ODDBAND to indicate that the system sends all odd band signaling messages on the first load sharing link. Enter ODDCKT to indicate that the system sends all odd circuit signaling messages on the first load sharing link.
DRIDX		0 to 255	<i>Dump and restore index.</i> Enter the internal table index that the message switch and buffer (MSB6) exports and stores. The signaling terminal (ST) across a MOVEBCS also exports and stores this internal table index. Maintenance of the internal index of each tuple in the table must occur. This maintenance allows the computing module (CM), MSB6, to use a common index to reference an ST and transmission link set. This maintenance also allows the ST to use a common index to reference an ST and transmission link set. This field places the tuple in a position in the table during the MOVEBCS process. The field places the tuple in a position in the table when parameter DUMP_RESTORE_IN_PROGRESS in table OFCSTD is Y (yes).

Data I l e x a m p l e

Datafill for table NO6LKSET appears in the following example.

NO6LKSET (end)

Link set BBBPRM1AUS connects directly to Australia. This link set uses the primary and synchronize reserve links method. The exchange is controlling for emergency proving.

Link set BBBPRM1LONSBAUS connects to the STP in London with the final destination Australia. This link set uses the primary and synchronize reserve links method. The exchange is controlling for emergency proving.

MAP example for table NO6LKSET

LNKSETID	CONTRLNG	CONFINFO	DRIDX
BBBPRM1AUS	CONTROL	DEDICATE	0
BBBPRM1LONSAUS	CONTROL	DEDICATE	
AAAPRM1CAN	NONCNTRL	DEDICATE	1

NO6RTSET

Table name

CCITT No.6 Route Set Table

Functional description

A route set is an ordered set of link sets. A route set indicates ways for a signaling message to get to a specified destination.

The user must meet the following conditions before data entry of the route set table occurs.

- Enter the common language location identifier (CLLI) name in table CLLI.
- Enter the route CLLI (RTE_CLLI) in table NO6LKSET.
- Enter data in associated signaling route before you enter data in the quasi-associated signaling route. When the quasi route contains data, the associated mode cannot appear after that quasi route.
- All the signaling routes that the route set defines must associate with the same message switch buffer (MSB). This association must occur because buffer retrieval occurs in the MSB and buffer retrieval requirements do not span across MSBs.
- The user must take the route set offline to reconfigure routes in route set.
- Before deletion of this tuple occurs, the route set must be in the offline state. Before deletion of this tuple occurs, band translation for the route set must not be present. The route set must not be part of a signaling transfer point (STP) operation. Table NO6TKMEM or NO6STPBD must not contain entries that refer to the route set.

Note: The route set is an ordered set of routes. The first route in the list is the most preferred route. The last route in the list is the least preferred route.

Data II sequence and meaning

Enter data in table CLLI before you enter data in table NO6RTESET.

Table size

The system allocates memory for 63 tuples.

NO6RTSET (continued)**Data II**

Datafill for table NO6RTSET appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
ROUTESET		alphanumeric (a maximum of 16 characters)	<i>CCITT No.6 route set identifier.</i> Enter the code that represents the route set. Table CLLI contains this code.
MAXBANDS		0 to 128	<i>Maximum bands.</i> Enter the number that represents the maximum local band number. The route set uses this maximum local band. To change this entry, you must reload MSB static data.
ROUTES		see subfields	<i>Signaling route identifier.</i> This field contains subfields RTECLLI and MODE. The system supports a maximum of four signaling routes for each route set. The signaling routes are link sets.
	RTECLLI	alphanumeric (a maximum of 16 characters)	<i>Signaling route common language location identifier.</i> Enter the code CLLI that represents the link set. Table CLLI contains this code. Table NOO6LKSET defines this CLLI. The system supports a maximum of four signaling route CLLIs for each route set. If the system requires less than four CLLIs, end the list with a \$ (dollar sign).

NO6RTSET (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	MODE	ASSOCIATED or QUASI	<i>Signaling route mode.</i> Enter ASSOCIATED. This entry indicates that the far end of the signaling route in the route set is not an STP for these bands. This entry indicates that the far end of the signaling route is an associated route. Enter QUASI to indicate that the far end of the signaling route in the route set works. This end of the route set works as an STP for these bands.
DRIDX		0 to 63	<i>Dump and restore index.</i> This field preserves internal table indexes. The CCITT No.6 MSB (MSB6) and signaling terminals (ST) across a MOVEBCS export and store these indexes. The user must maintain the internal index of each tuple in the table. This maintenance allows the computing module (CM), MSB6, and ST to all use a common index. These features use the common index to reference a specified ST and transmission link set. This field places the tuple in a specified position in the table during a MOVEBCS process. The field places the tuple in a specified position in the table when parameter DUMP_RESTORE_IN_PROGRESS in table OFCSTD is Y (yes).

Data I l e x a m p l e

Datafill for table NO6RTSET appears in the following example.

The route set PRM1BBBAUS has a maximum number of 30 local bands. This route set contains link set BBBPRM1AUS. Link set BBBRPM1AUS terminates in Australia. Link set BBBPRM1LONSBAUS terminates at an STP (London).

NO6RTSET (end)

MAP example for table NO6RTSET

ROUTESET		MAXBANDS		DRIDX		ROUTES
PRM1BBBAUS		30		(BBBPRM1AUS ASSOCIATED)		(BBBPRM1LONSBAUS QUASI) \$
						0
PRM1AAACAN		30		(AAAPRM1CAN ASSOCIATED)		(AAAPRM1LONSACAN QUASI) \$
						1

NO6TKMEM**Table name**

CCITT No.6 Trunk Member Table

Functional description

Table NO6TKMEM associates each CCITT No.6 (N6) trunk with a signaling network identifier (SNID).

The system assigns a different label to each N6 trunk. A label is an SNID. Different labels are assigned to allow the offices to route a trunk at either end of that trunk. The SNID contains the routeset number, the local band, and the circuit.

Fields CLLI and MEMNAME index table NO6TKMEM, as in table TRKMEM.

Data II sequence and meaning

You must enter data in the following tables before you enter data in table NO6TKMEM.

- NO6RTSET
- TRKMEM

Table size

The system allocates memory according to the value of field SIZE in table SYSDATA for the field SDKEY value of NO6TKMEM.

Data II

Datafill for table NO6TKMEM appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
MEMKEY		see subfields	<i>Member key</i> This field contains subfields CLLI and MEMNAME.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code of the trunk group of which the trunk is a member. Table CLLI contains the code.
	MEMNAME	numeric (0 to 9999)	<i>Member number</i> Enter the external trunk number assigned to the member of the trunk group.

NO6TKMEM (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
ROUTESET		alphanumeric (1 to 16 characters)	<i>Route set</i> Enter the code assigned to table ROUTESET that represents the route set the trunk member uses.
BAND		numeric (0 to 127)	<i>Local band</i> Enter a numeric value to indicate the customer local band in this routeset. The local band determines a group of 16 circuits. Refer to table NO6BDXLA for additional information.
CKT		numeric (0 to 15)	<i>Circuit in band</i> Enter the circuit in the local band assigned to the trunk group member.

Data II e xample

Sample datafill for table NO6TKMEM appears in the following example.

The example contains the following:

- three members of a trunk group, the CLLI of which is NO6811BA
- two members of a trunk group, the CLLI of which is NO6821BA

MAP example for table NO6TKMEM

MEMKEY	ROUTESET	BAND	CKT
NO6811BA 0	PRM1BBBAUS	0	0
NO6811BA 1	PRM1BBBAUS	0	1
NO6811BA 2	PRM1BBBAUS	0	2
NO6821BA 0	PRM1BBBAUS	10	4
NO6821BA 1	PRM1BBBAUS	10	5

NOPADDR**Table name**

Network Operations Protocol Address Table

Functional description

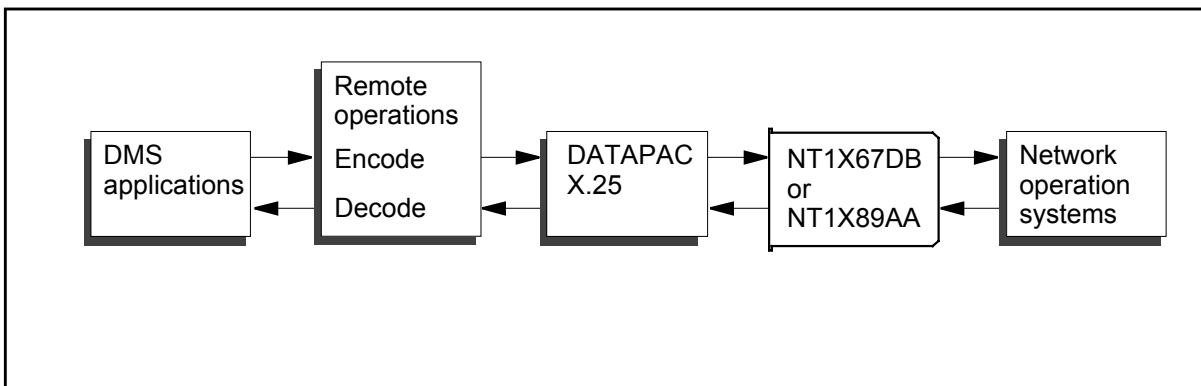
Network Operations Protocol (NOP) is the protocol by which the DMS switch communicates with a Network Operation Systems (NOS) product. Communication occurs with remote operations (RO). An RO is a task one processor requests but another processor performs.

The RO service:

- implements remote operations buffering to minimize transmitted and received data blocking
- provides an interface for an application to receive data from the RO service when the user needs the information
- performs X.409 encoding and decoding
- implements a part of the application procedures the ROs requires to interface with X.25 protocols

The following figure illustrates the data flow between a DMS switch and an NOS product.

Figure Data o w between a DMS and an NOS product



The 1X67DB DATAPAC controller card can operate as the communication interface between the DMS-100 switch and the NOS product. The 1X89AA multiprotocol controller (MPC) card can operate as the communication interface.

Table GDLADEV determines the use of the data packet controller (DPC) or the MPC.

NOPADDR (continued)

Table NOPADDR contains the addresses the NOP can accept calls from. Information contained in table NOPADDR follows:

- the index (0 to 127) of the originating address
- the eight-digit address the DATAPAC carrier provides
- the MPC or the DPC unit number
- the MPC port number
- a four-number protocol identifier

Data II sequence and meaning

You must enter data into table GDLADEV before you enter data into table NOPADDR.

Operating company personnel first enters data in table NOPADDR at installation. The user can use the table editor to modify table NOPADDR. Refer to the *Basic Translations Tools Guide* for an explanation of table editor commands.

Note: Table NOPADDR and table XFERADDR cannot contain datafill at the same time unless the switch allows for more than one 1X67DB.

Table size

The system allocates the size of table NOPADDR for 128 tuples.

NOPADDR (continued)**Data II**

Datafill for table NOPADDR appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
INDEX		0 to 127	Virtual channel index. Enter an integer to identify the position of the generic datalink in this table and the associated range of value. This field does not have a default value.
UNIT		0 to 255 (for MPC) 0 to 15 (for DPC)	Unit number. Enter the unit number of the multiprotocol controller (MPC) or data packet controller (DPC). The range for the MPC is 0 to 255. The range for the DPC is 0 to 15. Any entry outside the range indicated for this field is not correct. This field does not contain a default value.
LINK		2 or 3 (for MPC) -1 (for DPC)	Link number. Enter the port number of the 1X89 (MPC) card. If a DPC is present, the value is -1. Any entry outside the range indicated for this field is not correct. This field does not contain a default value.
ADDRESS		numeric (a maximum of 15 digits)	Network operations system address. Enter a digit string that corresponds to the Network Operations System address that the DATAPAC carrier provides. This field does not contain a default value.
PROTOCOL		numeric 0 to 255 (4 digits) (see note)	Protocol identifier. Enter four digits that correspond to the protocol used to communicate with the DMS. Separate each number from the next with a single space. Note: The only correct entry is 0 0 0 0.

Data II e xample

Sample datafill for table NOPADDR appears in the following example.

NOPADDR (end)

In the first example, field INDEX contains the following:

- a virtual channel index number of 1
- a Network Operations System (NOS) address of 88888888 that uses the DPC unit 15 with a value of -1
- a protocol of 0 0 0

In the second example, field INDEX contains the following:

- a virtual channel index number of 2
- a Network Operations System (NOS) address of 88888889, that uses the MPC unit 222 with a value of 2
- a protocol of 0 0 0 0

MAP example for table NOPADDR

INDEX	UNIT	LINK	ADDRESS	PROTOCOL			
1	15	-1	88888888	0	0	0	0
2	222	2	88888889	0	0	0	0

Table history
BCS36

A note was added that 0 0 0 0 is the only valid entry in field PROTOCOL.

NOPAPPLN**Table name**

Network Operations Protocol Applications Table

Functional description

The remote operation (RO) service uses table NOPAPPLN to determine which applications a remote data network address (DNA) can access. With this information, remote operation security can limit access to applications.

A DNA not defined in table NOPAPPLN cannot access any network operations protocol (NOP) applications on the DMS switch. To access an NOP application, the remote DNA must appear in table NOPAPPLN. The descriptions of the DNA applications must appear in table NOPAPPLN.

Adding or deleting tuples in table NOPAPPLN

The administration personnel of the unit that switches is responsible for updating table NOPAPPLN. Personnel must update table NOPAPPLN each time you add a new DNA in table NOPADDR. Add a new DNA in order to secure the RO service.

Data II sequence and meaning

You must enter the DNAs in table NOPADDR before you enter data in table NOPAPPLN.

Table size

The number of tuples in table NOPADDR determines the size of table NOPAPPLN. The maximum number of tuples is 128.

Data II

Datafill for table NOPAPPLN appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
DNAKEY		numeric (1 to 15 digits)	<i>Data network address key.</i> Enter the DNA defined in table NOPADDR. This field is the key to the table.
APPLNS		see subfields	<i>Applications.</i> This field contains subfields CHOICE and APPLICATION_ID.

NOPAPPLN (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	CHOICE	ALL or ONLY	<i>Choice of applications.</i> Enter ALL if the remote DNA can access all applications. This field does not require more information after this selection. Enter ONLY when the remote DNA and datafill refinement APPLICATION_ID can access only certain applications.
	APPLICATION_ID	a vector of a maximum of 30 different application names	<i>Application names.</i> If the entry in field CHOICE is ONLY, enter this refinement. Enter a vector of a maximum of 30 different application names the DNA can access. The correct entries are: • FT • TRAN • PADN • SOCCOM • FTRAN • PTAE • APPL • TOCCHOST • TOCCREM • CALM • DCR • ACDMIS_APPL TABCHGS • EXNDMAP • FBS • PHMAPMMI • PHS Separate each application name from the next with a blank space. Indicate the end of the vector with a single space and \$.

NOPAPPLN (end)

Data l l e xample

Sample datafill for table NOPAPPLN appears in the following example.

MAP example for table NOPAPPLN

DNAKEY	APPLNS
01101360	ONLY (FTRAN) (PTAE_APPL) (SOCCOM) \$

Table history
CSP06

The SOC Communication Protocol (SOCCOM) was added to correct NOP applications in CSP06.

NOPDEST

Table name

Network Operations Protocol Destination Table

Functional description

Applications that use network operation protocol (NOP) remote operations (RO) services on the DMS switch use table NOPDEST. The applications use the table to start outgoing calls over the X.25 protocol. The system only supports outgoing calls on the multiprotocol controller (MPC) 1X89 cards. The system maintains support for the data packet controller (DPC) 1X67 cards for incoming calls only.

Table NOPDEST contains a mapping between accessible remote nodes and local symbolic names. Each remote location requires the following information:

- the node name, a 1- to 16-character name that identifies the tuple in the table
- the MPC unit and link, the DMS port address through which the network connection occurs
- the data network address of the remote node
- the protocol, a value passed to the remote node that identifies the network services user

Data II sequence and meaning

You must enter data into the following tables before you enter data into table NOPDEST.

- MPC
- MPCLINK

Table size

The system allocates a maximum of 50 tuples for this table.

NOPDEST (continued)**Data II**

Datafill for table NOPDEST appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
NODENAME		see subfield	<i>Node name.</i> This field contains subfield K.
K		alphanumeric (1 to 16 characters)	<i>Key.</i> Enter an alphanumeric name to identify the tuple in table NOPDEST. The name can range from 1 to 16 characters. Application software uses this name if the system requests a remote connection. The system does not store the character string entry internally with the table. The system uses the name to calculate a symbolic range as an index to the table. Applications that use the network operation protocol (NOP) outgoing call capability use this field to identify the remote destination.
MPCLINK		see subfields	<i>Multiprotocol controller link path.</i> This field identifies the DMS port address through which the network connects. This field contains subfields M and L.
	M	0 to 255	<i>Multiprotocol controller unit.</i> Enter the multiprotocol controller (MPC) unit number that indexes into table MPC. This entry identifies the exact DMS equipment card over which the system tries the outgoing call.
	L	0 to 3	<i>Link.</i> Enter the number of the link on the selected MPC card over which the system tries the outgoing call.

NOPDEST (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
ADDRESS		0 to 9	<i>Data network address.</i> Enter a maximum of 15 X.25 data network addresses of remote nodes.
PROTOCOL		0 to 255 (table of 4 entries)	<i>Protocol identifier.</i> Enter the protocol identifier that the remote node uses to identify the network services user of the connection attempt. For the NOP, the network services user is always the remote operation service. The correct entries in this field are: • 00 00 00 00 (represents in NOP the NULL transport layer) • 03 01 80 00 (represents in OSI the NULL transport layer) The default value for this field is 03 01 80 00.

Data example

Sample datafill for table NOPDEST appears in the following example.

This example contains three node names to which outgoing calls are to be made. The three tuples contain the following:

- MPC card and link for an outgoing call
- data network address of the remote node
- protocol identifier the remote node uses to identify the network services connection user

MAP example for table NOPDEST

NODENAME	MPCLINK	ADDRESS	PROTOCOL
SAT_OFFICE1	2 3	01090210 00 00 00 00	
SAT_OFFICE2	1 3	01090220 03 01 80 00	
SAT_OFFICE3	3 3	01104302 03 01 80 00	

NOPUSERS

Table name

Network Operations Protocol Users Table.

Functional description

The remote operations (RO) service uses table NOPUSERS to determine which applications a user at a remote data network address (DNA) can access. A DNA can have different users. Table NOPAPPLN defines the applications the DNA can access. Table NOPUSERS adds limits to each user when this table defines the applications the user can access.

Adding or deleting tuples in table NOPUSERS

The system does not check if user names (USERKEY) are correct before it adds a tuple to table NOPUSERS. The administration personnel of the unit that switches makes sure user names are correct.

If the user does not have a correct user name, the user cannot access applications on the DMS-100E switch. The correct user names appear in table NOPUSERS. The system generates a hidden log when an access attempt does not succeed.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table NOPUSERS.

Table size

This table can contain a maximum of 1024 tuples.

Data II

Datafill for table NOPUSERS appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
USERKEY		alphanumeric (1 to 16 characters)	<i>User name key.</i> Use the command interpreter (CI) command PERMIT to define user names. This field is the key to the table. Enter the name of the user.
APPLNS		see subfield	<i>Applications.</i> This field contains subfield CHOICE and refinement APPLICATION_ID.

NOPUSERS (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	CHOICE	ALL or ONLY	<i>Choice of applications.</i> Enter ALL to allow the user at the remote DNA to access an application. This field does not require other entries. Enter ONLY to limit access for the user at the remote DNA. This entry limits access to all applications and datafill refinement APPLICATION_ID.
	APPLICATION_ID	vector of a maximum of 20 different application names	<i>Application names.</i> Enter a vector of a maximum of 20 different application names that the user can access at the remote DNA. Separate each application name with a single space. Indicate the end of the vector with a single space followed by a \$. The correct entries are: • FT • TRAN • PADN • SOCCOM • SOCCOM • FTRAN • PTAE_APPL • TOCCHOST • TOCCREM • CALM • DCR • ACDMIS_APPL • TABCHGS • EXNDMAP • FBS • PHMAPMM • PHS

NOPUSERS (end)

Data l l e x a m p l e

Sample datafill for table NOPUSERS appears in the following example.

MAP example for table NOPUSERS

USERKEY	APPLNS
1	ONLY (FTRAN) (PADN) (SOCCOM) \$

Table history**EUR006**

Table NOPUSERS increases in size from 360 tuples to a new maximum of 1024 tuples.

CSP06

The SOC Communication Protocol (SOCCOM) was added to correct NOP applications in CSP06.

NPACAT

Table name

Serving NPA Category Digit Table

Functional description

Table NPACAT is required in local switching units that interface with North Electric TSD for handling of automatic message accounting (AMA) and operator assisted calls.

The following switching unit dependent data is required for each serving NPA:

- Specify if numbering plan area (NPA) is home NPA (NPA0), first adjacent NPA (NPA1), or second adjacent NPA (NPA2).
- Specify the tens digit associated with the serving NPA (SNPA).

Data II

The following table lists datafill for table NPACAT.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
SNPAKEYS		numeric (0 to 910 digits)	<i>Serving numbering plan area key</i> Enter the serving numbering plan area (SNPA).
NPATYPE		NPA0, NPA1, or NPA2	<i>Numbering plan area type</i> Enter the type of numbering plan area (NPA), home (NPA0), first adjacent NPA (NPA1), or second adjacent NPA (NPA2).
TENSDIG		0 to 9	<i>Tens digit</i> Enter the category tens digit assigned to the SNPA.

Data II e xample

The following example shows sample datafill for table NPACAT.

SNPA 613 is the home NPA and SNPA 819 is the first adjacent NPA.

For a definition of commands, see the *Basic Translations Tools Guide*, 297-1001-360.

NPACAT (end)

MAP display example for table NPACAT

SNPAKEYS	NPATYPE	TENSDIG
613	NPA0	5
819	NPA1	6

NPACHECK

Table name

TOPS NPA Check Table

Functional description

Table NPACHECK is used in conjunction with tables RAOCHECK and CHKDIGIT to perform special digit checks on credit cards. All credit card numbers beginning with a three-digit numbering plan area (NPA) code found in table NPACHECK are checked by table CHKDIGIT.

Note: It is recommended that table NPACHECK be empty if database validation is performed, for example, when using external calling card checks.

For related information, refer to table HOTLIST.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NPACHECK.

Table size

0 to 800 tuples

Data II

The following table lists datafill for table NPACHECK.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NPACODE		200 to 999 (3 digits)	<i>Numbering plan area code</i> Enter the numbering plan area (NPA) code. All 14-digit credit card numbers beginning with a 3-digit NPA found in table NPACHECK have their last 4 digits checked using table CHKDIGIT. Other credit cards, beginning with an NPA, are not checked and are displayed and followed by VFY for verify.

Data II e xample

The following example shows sample datafill for table NPACHECK.

NPACHECK (end)

MAP display example for table NPACHECK

NPACODE
212

Table history
BCS36

Range of field NPACODE was changed. New range is 200 to 999.

NPASPLIT

Table name

Numbering Plan Area Split Management Table

Functional description

Table NPASPLIT allows the following Custom Local Area Signaling Service (CLASS) features to operate successfully during the permissive dialing period of a numbering plan area (NPA) split:

- Automatic Call Back (ACB)
- Automatic Recall (AR)
- Screening List Editing (SLE)
- Selective Call Rejection (SCRJ)
- Selective Call Forwarding (SCF)
- Selective Call Acceptance (SCA)
- Distinctive Ringing/Call Waiting (DRCW)

The NPASPLIT management function recognizes that old and new NPAs are interchangeable. Table NPASPLIT provides four options for each assigned NPA split pair (old NPA, new NPA):

- transaction capabilities application part (TCAP) validation
- screening
- SLE delete
- SLE duplicate or change

The TCAP validation (TCAPVAL) option supports validation of a directory number (DN) when a customer activates the ACB or AR feature toward that number, or when a customer adds that number to a screening list.

The screening (SCREEN) option supports screening list services when a customer receives a call attempt.

The SLE delete (SLEDEL) option supports deleting directory numbers from screening lists.

The SLE addition (SLEADD) option supports the detection of a customer attempt to add a duplicate directory number to a screening list.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NPASPLIT.

NPASPLIT (continued)

At least one option (field TCAPVAL, SCREEN, SLEDEL, or SLEADD) must be datafilled as Y (yes) to make the NPASPLIT management function operational.

Table size

0 to 64 tuples

Table NPASPLIT is a fixed size table, that is, the size of the table cannot be increased without software modifications.

Data II

The following table lists datafill for table NPASPLIT.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
NPA		000 to 999 (3 digits)	<i>Numbering plan area</i> Enter a numbering plan area (NPA) involved in the NPA split.
SUBNPA		000 to 999 (3 digits)	<i>Substitute numbering plan area</i> Enter an NPA involved in the NPA split that can be used interchangeably with the value datafilled in field NPA. Note 1: An NPA split pair consists of the NPA and the SUBNPA. Note 2: A minimum of one SUBNPA must be datafilled for each NPA datafilled. A maximum of four SUBNPAs can be datafilled for each NPA datafilled.

NPASPLIT (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
TCAPVAL		Y or N	<i>Transaction capabilities application part validation</i> Enter Y (yes) to activate option TCAPVAL. Otherwise, enter N (no.) If field TCAPVAL is set to Y, the Automatic Call Back (ACB) and Automatic Recall (AR) feature customers can activate ACB or AR toward a directory number using the old or new dialing arrangement. A Y datafill also allows the Screening List Editing (SLE) feature customers to conform to either the old or new dialing arrangement when adding directory numbers to screening lists.
SCREEN		Y or N	<i>Screening</i> Enter Y to activate option SCREEN. Otherwise enter N. If field SCREEN is set to Y, customers' screening list services conform to both the old and new dialing arrangements, even if their screening lists do not conform to both arrangements.

NPASPLIT (end)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
SLEDEL		Y or N	<i>Screening list editing delete</i> Enter Y to activate option SLEDEL; otherwise, enter N. If field SLEDEL is set to Y, SLE customers can use either the old or the new dialing arrangements to delete list entries that are affected by the NPA split.
SLEADD		Y or N	<i>Screening list editing addition</i> Enter Y to activate option SLEADD, otherwise, enter N. If field SLEADD is set to Y, SLE customers cannot add list entries that duplicate directory numbers of existing list entries. If a customer attempts to add a duplicate of a directory number that is already on the list, the NPA of the entry is changed to the NPA of the duplicate number.

Data file example

The following example shows sample datafill for table NPASPLIT.

MAP display example for table NPASPLIT

NPA	SUBNPA	TCAPVAL	SCREEN	SLEDEL	SLEADD
213	310	Y	Y	Y	Y

Table history
BCS35

Table NPASPLIT was introduced.

NPDIGMAP

Table name

Number Portability Digit Mapping

Functional description

Table NPDIGMAP maps the NPANXX of the GAP to a new area code and office code combination, when the original GAP is nonresident.

LNP translations uses table NPDIGMAP when a call over an ISUP trunk contains the following Initial Address Message (IAM) information:

- the Home Location Routing Number (HLRN) of the switch
- the forward call indicator (FCI) parameter with the Translated Called Number Indicator (TCNI) set to Number Translated
- a Generic Address Parameter (GAP) that contains a directory number (DN) that does not exist on the switch

If LNP uses table NPDIGMAP to translate the call, the NPANXX of the GAP indexes table NPDIGMAP.

If LNP translations finds a tuple, the AREACODE and OFCCODE fields replace the NPANXX of the GAP.

A DN residency check on the modified GAP determines if the call exists on the switch. If the call exists on the switch, LNP translations terminates the call. If the DN residency check fails, the call routes to LNP Misrouted Call (LNPM) treatment.

Data II sequence and implications

Datafill table TOFCNAME before table NPDIGMAP.

Any table indexed after table NPDIGMAP uses the mapped CalledPartyID.

Table NPDIGMAP should only be datafilled during the permissive dialing period of an NPA split. Provisioning table NPDIGMAP outside the permissive dial period may result in incorrect call terminations and the corruption of data in tables LNPCODE, NPRESERV, and HOMELRN.

Table size

0 to 32 000 tuples

NPDIGMAP (continued)**Data II**

The following table lists datafill for table NPDIGMAP.

Field descriptions

Field	Subfield	Entry	Explanation and action
NPANXX		numeric (six digits)	<i>Serving Numbering Plan Area</i> Enter an NPANXX.
AREACODE		numeric (three digits)	<i>Area code</i> Enter an area code. Note: Table TOFCNAME must index the same area code.
OFCCODE		numeric (three digits)	<i>Office code</i> Enter an office code.
UPD4GAP		Y or N	Setting the field to YES triggers the automatic update of table NPRESERV and LNPCODE to reflect the digits in the AREACODE and OFCCODE fields. Note: Field can only be set to YES if the NPE00005 SOC is active.
UPD4LRN		Y or N	Setting the field to YES triggers the automatic update of table HOMELRN to reflect the digits in the AREACODE and OFCCODE fields. This tuple can be used to map LRN digits during the permissive dialing period of an NPA split. Note: Field can only be set to YES if the NPE00005 SOC is active.

Data II e xample

The following example shows sample datafill for table NPDIGMAP.

NPDIGMAP (end)**MAP display example for table NPDIGMAP**

NPANXX	AREACODE	OFCCODE	UPD4GAP	UPD4LRN
519313	613	663	Y	N

Table history**NA013**

Fields UPD4GAP and UPD4LRN are introduced by feature 59013762.

NA010

LNP introduces table NPDIGMAP.

Supplementary information

The following table explains error messages that can occur when you try to datafill table TOFCNAME.

Error messages

Message	Explanation	User action
NPANXX must be 6 digits.	The number of digits entered for the NPANXX does not equal six.	Enter the tuple again. Use a six-digit NPANXX.
OFCCODE must be 3 digits.	The number of digits entered for the office code does not equal three.	Enter the tuple again. Use a three-digit office code.
AREACODE-OFCCODE not found in table TOFCNAME	The digits entered for the area code-office code do not map to table TOFCNAME.	Enter an NPANXX that maps to table TOFCNAME.
Key error tuple already exists.	Another tuple uses that NPANXX.	Enter an NPANXX not used by another tuple.
ERROR: Failed to read the tuple.	The LIST or POS position on a tuple failed.	Enter the tuple again.

NPENDING

Table name

Number Pending Table

Functional description

Table NPENDING identifies the order files for the customer data change (CDC) users found in table CDCLOGON.

Data ll sequence and meaning

You must enter data in the following tables before you enter data in table NPENDING.

- OWNER
- CDCLOGON

Enter the owners in field OWNER in table CDCLOGON before you enter the owners in table NPENDING.

Enter data in table CDCLOGON to associate the logon identification (ID) of the CDC user with the owner. This association enforces the ownership of data and records in the pending service order file (PSOF).

Enter owners with Y in field POF of table CDCLOGON before you enter the owners in table NPENDING.

Table size

0 to 2048 tuples

NPENDING (continued)**Data II**

Datafill for table NPENDING appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
POFID		vector of a maximum of 16 characters	<i>Pending order file identification.</i> Enter the pending order file identification.
OWNER		NIOWNER	<i>Owner.</i> Enter the owner identification of the pending service order (PSO) in the PSOF. This field partitions the PSOF. The partition makes this field match field OWNER for a CDC user in table CDCLOGON. When these fields match, the PSO becomes visible to the CDC user. The default value is NIOWNER.
DUE		see subfields	<i>Due.</i> This field contains subfields Y, M, D, and H. Separate each subfield with a single space.
	Y	1990 to 2999	<i>Year.</i> Enter the year deadline for the pending order file (POF).
	M	JAN, FEB, MAR, APR, MAY, JUN, JUL, AUG, SEP, OCT, NOV, DEC	<i>Month.</i> Enter the month deadline for the POF.
	D	1 to 31	<i>Day.</i> Enter the day deadline for the POF.
	H	0 to 2359	<i>Hour.</i> Enter the hour and minute deadlines for the POF.
PROMPT		0 to 366	<i>Prompt.</i> Enter a number between 0 and 366 that represents the POF prompt.
LOGMESST		table of 2 Y or Ns	<i>Log message status.</i> Enter Y if the user requires a log message status. If the user does not require a log message, enter N.

NPENDING (end)

Data l l e x a m p l e

Sample datafill for table CDCLOGON appears in the following example.

Note: Use the data that table CDCLOGON compiled to make the entries for table NPENDING.

MAP example for table NPENDING

POFID		OWNER		DUE		PROMPT	LOGMESST	
CDC	NILOWNER	1990	JAN 22	2300		355		YY

NPRESERV

Table name

Number Pooling Reserved Number Marking table

Functional description

The NPRESERV table identifies directory numbers (DN) or defines blocks of DNs as “Number Pool Reserved” (NP-Reserved).

A DN is an NP-Reserved number when it meets both of the following requirements:

- the DN is in table NPRESERV
- The blank directory number treatment (BLDN) represents the DN in table DNINV.

The NP-Reserved numbers do not receive the local number portability misrouted (LNPM) treatment and do not release back with an error cause code of 26. The NP-Reserved numbers receive the BLDN treatment. The system does not generate an LNP303 error log or other indications of a network error.

Data II sequence and meaning

There is no requirement to enter datafill into other tables before the NPRESERV table. This table is empty and cannot receive datafill in NA012. Call processing does not perform any operations requiring this table.

Table size

The system dynamically allocates memory for 0 to 29 486 tuples.

Data II

The table that follows lists datafill for the NPRESERV table.

Field descriptions

Field	Subfield	Entry	Explanation and action
FROMDIGS		7 to 10 digit integer	<i>From Digits.</i> Enter the reserved DN or the starting DN of the block.
TODIGS		7 to 10 digit integer	<i>To Digits.</i> Enter the reserved DN or the ending DN of the block.

Data II e xample

The figure that follows shows sample datafill for table NPRESERV.

NPRESERV (end)

MAP display example for table NPRESERV

FROMDIGS	TODIGS
6136631	6136631
6136639	6136639

Table history**NA013**

Feature 59012182, Number Pooling Servord Interface, introduces an interface to access table NPRESERV to add or delete blocks of DNs.

NA012

Feature 59007321, Reserved Number Marking Prep, introduces this feature.

NSCANNS

Table name

Number Service Code Announcement Table

Functional description

Table NSCANNS provides the capability to map 255 terminating (TERM) and 255 non-terminating (NTERM) announcement identifiers (ANNID) on an number service code (NSCCODE) basis. For example, private virtual network (PVN) is an NSCODE-related feature.

One set of default announcements can be used to map the TERM and NTERM calls that are not associated with a customer group. For example, plain ordinary telephone service (POTS) calls.

The default announcement set belongs to a virtual customer group. There is one virtual customer group for each number service code (NSC) office. The virtual group members are all NSCODE calls that do not have a customer group specified during a call.

The key in table NSCANNS consists of the NSC, announcement type, and announcement identifier. With this key structure, the table can support the mapping of up to 255 TERM ANNIDs and 255 NTERM ANNIDs to 510 distinct announcements.

NSCCODE supports the following services:

- AIN (advanced intelligent network)
- 800P (800+)
- E008 (enhanced 008)
- E800 (enhanced 800)
- MAP_HLR (mobile application part home location register)
- MAP_MSC (mobile application part mobile switching center)
- MAP_VLR (mobile application part visitor location register)
- PVN (private virtual network)
- REPLDIGS (replace digits)
- VPN (Australian virtual private network)

NSCANNS only supports the number service code (NSC) feature PVN. If a tuple is entered with an NSC feature that requires NSC announcements in table NSCANNS, but is not PVN, the table editor rejects the datafill, displaying an

NSCANNNS (continued)

error message on the MAP (maintenance and administration position) video display terminal (VDU).

Data II sequence and implications

The following tables must be datafilled before table NSCANNNS.

- CLLI
- ANNS
- ANNMEMS
- CUSTENG
- DRMUSERS
- NSCDEFS

All entries for field NSCODE must first be datafilled in table NSCDEFS, field NSCODE.

Table size

1 to 510 tuples

Memory is dynamically allocated for each tuple in table NSCANNNS.

Data II

The following table lists datafill for table NSCANNNS.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
NSCANN		see subfields	<i>Number service code announcement</i> This field consists of subfields NSCODE, ANNTYPE and ANNID.
	NSCODE	PVN	<i>Number service code feature type</i> Enter PVN for private virtual network. PVN is the only supported number service code (NSC) announcement feature. All entries for field NSCODE must first be datafilled in table NSCDEFS, field NSCODE.

NSCANNS (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
ANNCMENT	ANNTYPE	NTERMorTERM	<i>Announcement type</i> Enter the announcement type. Enter NTERM for an announcement that does not terminate the call. Enter TERM for an announcement that terminates the call.
	ANNID	1 to 255	<i>Announcement identifier</i> Enter the announcement value that is sent on the user interface. Exclusion of specific announcement identifiers are handled during call processing. Entries outside the indicated range are invalid.
		see subfields	<i>Announcement</i> This field consists of subfields CLLI and ANNNUM.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the common language location identifier (CLLI) associated with the announcement. This CLLI must be datafilled in tables CLLI, ANNS, and DRMUSERS.
	ANNNUM	1 to 255	<i>Announcement number</i> Enter the announcement number for the announcement. This number must be datafilled in table DRMUSERS before it can be used in this table.

Data II e xample

The following example shows sample datafill for table NSCANNS.

NSCANNS (end)**MAP display example for table NSCANNS**

NSCANN			ANNCMNT	
PVN	NTERM	7	GMANNS	1
PVN	NTERM	8	POTSANNS	1
PVN	NTERM	9	POTSANNS	2
PVN	NTERM	10	POTSANNS	3
PVN	NTERM	253	TERMANNS	31
PVN	NTERM	253	POTSANNS	245
PVN	TERM	254	TERMANNS	37
PVN	NTERM	254	POTSANNS	246
PVN	NTERM	255	POTSANNS	247

Table history
BCS34

Table NSCANNS was introduced.

NSCCARR

Table name

Number Service Code 800 Plus Southbound Carrier ID Validation Table

Functional description

Table NSCCARR is used to validate the carrier identification (ID) returned in the database response message. The carrier ID is valid if it is datafilled in table NSCCARR. The first field is the carrier name and the second field is the carrier ID.

Table NSCCARR is datafilled with carriers that the service switching point (SSP) or the service switching point gateway (SSPGW) office has direct access to. If the SSP does not have direct access to the carrier, but another SSP or SSPGW does, then datafill that carrier in table NSCCARR.

For related information, refer to table NSCDEFS.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NSCCARR.

Table size

0 to 32 tuples

The size of this table cannot be extended.

Data II

The following table lists datafill for table NSCCARR.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
CARRNAME		alphanumeric (up to 16 characters)	<i>Carrier name</i> Enter a carrier name.
CARRID		numeric (0 to 9)	<i>Carrier identification</i> Enter the three-digit carrier identification.

Data II e xample

The following example shows sample datafill for table NSCCARR.

NSCCARR (end)

MAP display example for table NSCCARR

CARRNAME	CARRID

ATT	288
ITT	488
MCI	120

NSCCODE

Table name

Number Service Code Code Table

Functional description

Table NSCCODE is one of a group of tables used to implement the Number Service feature. Number Services provide inward call management features that require the dialing of special numbers.

Mobile Application Part (MAP) service and Enhanced 800 (E800) service are examples of Number Services that require access to a database for call processing information.

Number services are provided using Northern Telecom's Service Switching Point (SSP) and Service Control Point (SCP) systems. The SSP and SCP use common channel signaling 7 (CCS7) protocols. CCS7 allows calls to be held while requests are sent to a database for call processing information.

For the option selector CAMA, which is used in translation selectors CONT, DNRTE, and RTE, set office parameter ICAMA_REQUESTED in table OFCVAR to Y (yes) if ICAMA detailed call recording is required.

An IAA record can be generated by selecting existing office parameter IAA_REQUESTED in table OFCVAR, or the CAMA selector.

Only ANI and MTR trunk group originations currently support the option selector CAMA. All other call types ignore this translation option.

Office parameter IMEI_ACCEPTABLE_FOR_EMRG_CALL in table OFCVAR provides an option for the network operator to accept emergency call set ups from mobile stations that transmit the IMEI instead of the IMSI or TMSI. The default value allows emergency call setups with IMEI as the identifier if, for example, no SIM is present.

For emergency calls translation, class EMRG must be datafilled. This can be done before or after translation selector DMOD with option select or COODM. This requirement differentiates between normal mobile originated calls and emergency calls set up by a conventional SETUP message.

Data II sequence and implications

Enter data in the following tables before entering data in table NSCCODE:

- PCIXLA
- PCITRK

NSCCODE (continued)

- IAACTRL
- CDNUXLA
- CPCUXLA
- CLISERV
- CLISRVPF

Enter data in table NSCCODE before you enter data in the following tables:

- ACHEAD
- CTHEAD
- FAHEAD
- FTHEAD
- NSCHEAD
- OCFHEAD
- PXHEAD
- AMHEAD
- MDESTIDX
- BCDEF
- CDNCHAR
- CLISERV

Office parameters

The following office parameters interact with table NSCCODE:

- ICAMA_REQUESTED in table OFCVAR
- IAA_REQUESTED in table OFCVAR
- IMEI_ACCEPTABLE_FOR_EMRG_CALL in table OFCVAR

Table size

The size is altered dynamically as tuples are added or deleted. There is a maximum of 32 768 entries per table, with a maximum of 32 768 tuples per subtable. Memory is allocated when XLANAME is datafilled into the head table.

Note: The maximum number of tuples may vary due to compression and expansion of tuples.

NSCCODE (continued)

Tuple compression

Starting in release TL006, the CONSUME option is always datafilled. If it is not datafilled by the operating company personnel, the universal translation (UXLA) system's write procedure automatically adds the datafill and sets it to the original key length. This action is taken for the following reasons:

- The UXLA system only has access to the key length in the write procedure for table xxCODE. It is done at this time so the key length is available if required during call processing.
- If tuple compression or expansion changes the key length, the consume value cannot be updated to reflect these changes. The result is that translations consume the original key length, not the current key length, during call processing. CONSUME is forced to be datafilled to make the operating company personnel aware of the number of digits that are consumed. Therefore, the default option (DFOP) CONSUME is not used.

When a tuple is initially added to table xxCODE, the key length is stored. If the tuple is then split, the new tuple's length is stored for that tuple. At this point, there are three tuples, two of one length, and a third of a different length. If the tuple that is now out of the first range of digits is changed to the original value, it will not compress because the original length of the three tuples is different. See the following examples. (The consume option is not on for any of the tuples in these examples.) The entry "exp_tuple" represents the XLANAME table entry.

Original tuple: add exp_tuple 0181 0181 feat...

The tuple is split: rep exp_tuple 0181810 0181810 dnrte...

Resulting tuples:

exp_tuple 0181 0181809 feat... (hidden consume = 4)

exp_tuple 0181810 0181810 dnrte... (hidden consume = 7)

exp_tuple 0181811 0181811 feat... (hidden consume = 4)

If the middle tuple is changed back to the original value the result is as follows:

rep exp_tuple 0181810 0181810

Resulting tuples:

exp_tuple 0181 0181809 feat... (hidden consume = 4)

NSCCODE (continued)

exp_tuple 081810 0181810 feat... (hidden consume = 7)

exp_tuple 0181811 0181 feat... (hidden consume = 4)

The tuples did not compress because the tuples must be identical in content and key length. To compress the tuple see the following:

Enter:

rep exp_tuple 0181000 018809 feat...

rep exp_tuple 0181811 0181999 feat...

Resulting tuple:

exp_tuple 0181 0181 feat...

If a tuple is added, for example:

add exp_tuple 0182 0182 feat...

Resulting tuples:

exp_tuple 0181 0181 feat... (hidden consume = 7)

exp_tuple 0182 0182 feat... (hidden consume = 4)

To compress these tuples

Enter:

rep exp_tuple 0182000 0182999 feat...

Resulting tuple:

exp_tuple 0181 0182 feat... (hidden consume = 7)

NSCCODE (continued)**Data II**

The following table lists datafill for table NSCCODE.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
XLANAME		alphanumeric (1 to 8 characters)	<i>Translation name</i> Enter the name from the corresponding head table.
FROMD		numeric (1 to 11 digits)	<i>From digits</i> Enter the digit or digits that represent a single number or the first in a block of consecutive numbers that have the same result given in field XLADATA. See Notes 1 and 2.
TOD		numeric (1 to 11 digits)	<i>To digits</i> If field FROMD represents a single number, enter the number that is equal to the number in field FROMD. If field FROMD represents the first number of a block of consecutive numbers, enter the last number in the block. See Notes 1 and 2.
Note 1: Adding or changing a tuple affects all digit combinations between FROMD and TOD. However, DELETE only deletes the tuple at FROMD. Note 2: Because of the way the FROM and TO digit key is implemented, the operation of table control requires additional explanation. Suppose that a tuple is datafilled such that TOD is greater than FROMD; (for example FROMD is 3 and TOD is 8). If a user positions on a tuple with FROMD and TOD within the datafilled range, the tuple is displayed as if only those digits are datafilled as the key. In this example, the user positions on the tuple with FROMD and TOD both equal to 5. The tuple is displayed with both fields equal to 5. The information is being requested for the given key. If the user then displays the previous tuple, the FROMD and TOD fields contain the digits originally datafilled before the current FROMD digit. In this example, the FROMD and TOD digits are 3 and 8. If the user now displays the next tuple, the digits following the currently displayed TOD field are displayed, 5 and 8 in this example.			
XLADATA		see subfields	<i>Universal translation datats</i> This field is a vector consisting of subfield XLASEL plus a set of options (refinements) dependent on the entry in XLASEL. Subfield XLASEL and its refinements are described on the following pages.

NSCCODE (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASEL	CONT, DBQ, DMOD, DNRTE, FEAT, FEATINFO, HRC, IAC, RTE, or TRMT,	<i>Translation selector</i> Enter one of the following: Enter CONT and datafill subfield OPT, if further translation is required. Enter DBQ and datafill subfield OPT to perform a database query. Enter DMOD and datafill subfield OPT, if the input digit stream requires modification. Enter DNRTE and datafill subfield OPT, if the input digits are routed. Enter FEAT and datafill subfield OPT, if access to a feature is required. Enter FEATINFO and datafill subfield FTR, to trigger the screening function. Enter HRC and datafill the subfields if the system requires the home routing code selector for local number portability applications. Enter IAC and datafill subfield OPT, if the insertion of own area code is required when an ambiguous area code is found through translations. Enter RTE and datafill subfield OPT, if a translation result is found, and translation terminates. Enter TRMT and datafill subfield OPT, if a call is routed to a treatment. The following tables describe each entry in XLASEL together with its options.

XLASEL = CONT

The following table lists the datafill for table NSCCODE where the translator selection field has been set to continued (CONT).

This selector is used when further translation is required. The next table to use is given by the XLT option. The CONT option in the head table entry for the

NSCCODE (continued)

current XLANAME determines whether the digits that were used to index the current table are to be consumed (that is, ignored by the next table). For example, in a pretranslator, the digits are not usually consumed, but they are consumed when continuing from the office code table to table DNINV. Note that the consumed digits are NOT deleted from the digit register (they are ignored for the moment).

Note: If translation continues and no next translation table is specified (with the XLT option), UXLA reenters the same table it is currently in. If the CON option is set in the head table, a new translation results since different digits are used. If no next translation table is specified and the NOCON option is set, UXLA reenters the same table with the same digits, gets the same result, and continues looping through the table.

It is possible to datafill the tables so that the same table is explicitly reentered, but it is not recommended because it makes the sequence very difficult to follow and prone to error. (The same table refers to the same subtable in the same translation system. It is correct to enter a different subtable in the same translation system, but if the XLT option is not used, this is not the case.) If the same table is entered, it is datafilled explicitly.

If the CONT selector is used, the XLT option must be present in the code table tuple or in the default options (DFOP) of the corresponding head table. If the CONT selector is used in the default tuple (DFLT), the XLT option must be present there as well. The DMOD selector does not use the default options from the head table, so the XLT option must be datafilled in the code table tuple as well.

NSCCODE (continued)

Table AMAXLAID must be datafilled prior to selecting option AMAXLAID.

Field descriptions for conditional data II (Sheet 1 of 14)

Field	Subfield or refinement	Entry	Explanation and action
	OPT	see subfield	<i>Options</i> This subfield is a vector consisting of up to 10 options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, then the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	ACF, AMAXLAID, CALLCTRL, CAMA, CDN, CDNRTE, CLASS, CLIOVRD, CONSUME, CPCRTE, CPMCALL, DDIDX, DEST, EXTCIC, IAA, LNET, MM, MZONE, NETSRV, OSS, PCC, PF, PNRF, PRESEL, PRIVL, QFT, SETCDN, TELETAXE, TOC, VPN, or XLT	<i>Option selector</i> The following options can be selected: Enter ACF, followed by a space, and datafill subfield ACF, if the area code fence is defined. Enter AMAXLAID, followed by a space, and datafill subfield XLAID, to specify an Automatic Message Accounting identity from within table AMAXLAID. Enter CALLCTRL, followed by a space, and datafill subfield CALLCTRL. The entry in subfield CALLCTRL indicates who has control of the call: the calling party, the called party, or both. Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the ICAMA record is generated with the originally-signaled DN or the final public switched telephone network (PSTN) number.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CDN, followed by a space, and datafill subfields NOA, STOPRTMR, or PFXAMA to select the Nature of Address field. This field is used to identify the called party of the initial address message (IAM). It is used for Australian ISDN user part (AISUP) call translations. Enter CDNRTE to route a call using the called number name (CDNNAME) from table CDNCHAR. If the CDNNAME is present on the incoming call or is set by the SETCDN option, translation proceeds to table CDNUXLA. The CDNRTE option does not apply to table AMCODE. The CDNRTE option does not have suboptions. Enter CLASS, followed by a space, and datafill subfield CLASS, if the class of the dialed digits can be determined. Enter CLIOVRD, followed by a space, and enter datafill datafill in refinement CLIOVRD. This field allows operating company personnel to block or allow the delivery of a calling line identity (CLI) for each call. The entry in refinement CLIOVRD is CNB (calling number blocked) or CNA (calling number allowed). Enter CONSUME, followed by a space, and datafill subfield CONDIGS, to specify the number of digits that are consumed during translation. Enter CPCRTE to route a call using the calling party category (CPCNAME) from table CPCCHAR. If the CPCNAME is present on the incoming call, translation proceeds to table CPCUXLA. The CPCRTE option does not apply to table AMCODE. The CPCRTE option does not have subfields.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 3 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CPMCALL, followed by a space, and datafill subfield CPMCALL, to specify call billing against the called party instead of the calling party for intra-office calls. Enter DDIDX, followed by a space, and enter data for subfield DDIDX. Operating company personnel can enter data in this field to specify the destination discount index in the discount database. Enter DEST, followed by a space, and datafill subfield DEST, if the destination is known. Enter EXTCIC, followed by a space, and datafill refinements SOURCE, SKIPDIGS, and CICSIZE. EXTCIC is the external carrier identification code that indicates a long distance carrier in the global environment. This option is only supported for TOPS calls. For further information, refer to functionality Global Competitive Access, GOS00006. Enter IAA and the datafill refinement IAA_INDEX to generate or modify IAA message parameters based on datafill in table IAACtrl. Enter LNET, followed by a space, and datafill subfield LNET, if a logical network is required for metering. Enter MM, followed by a space, and datafill subfields MIN and MAX, if the minimum and maximum dialed digits are known. Enter MZONE, followed by a space, and datafill subfield MZONE if metering of the call is required. Enter NETSRV and datafill refinement NETSRV_NAME to indicate a Japan network service.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 4 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter OSS, followed by a space, if determining the appropriate IFAM format for an indirect BTUP call to Operator Service System. Enter PCC, followed by a space, and datafill subfield PCCDR if a pseudo country code is required. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter PNRF to invoke the ported number recognition function. LNP applications for the German market use PNRF. The PNRF option does not have subfields. Enter PRESEL, followed by a space, if the call is to be treated as a preselected carrier case. Enter PRIVL, followed by a space, and datafill subfield PRIVL if the user is a privileged user (for example, operators). Enter QFT followed by ON or OFF to determine if an outgoing route is capable of QSIG feature transparency. Enter SETCDN, followed by a space, and enter datafill in refinement CDNNAME. The SETCDN field allows operating company personnel to set the outgoing called party characteristics. Enter TELETAXE. The TELETAXE field does not have subfields. Enter TOC, followed by a space, and datafill subfield CHG for the type of charge if the type of charge messaging is to be selected.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 5 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter VPN, followed by a space, and datafill subfields ONNET and BILLABLE, if the call routes through a service switching point (SSP) and the Australian VPN - SSP software package (NTXH49AA or NTXH49AB) is in the switching unit.
			Enter XLT, followed by a space, and datafill subfield XLASYS, if the call proceeds to another translation system.
	ACF	0 to 29	<i>Area code fence</i> If the value of subfield OSEL is ACF, enter the number of digits between the beginning of the digits to currently index the table and the end of the area code.
	BILLABLE	Y or N	<i>Virtual private network billable call</i> If the value of subfield OSEL is VPN, enter Y (yes) if an automatic message accounting (AMA) record is required for each VPN call. Otherwise enter N (no). The system does not generate an AMA record if an address complete message (ACM) of address complete, no charge is returned, or if the call terminates in the SSP on a line with the free number terminating (FNT) option.
	CALLCLASS	PRESELECT OVERRIDE, CSN,TRUNK	Call class. If the entry in subfield OSEL is PRESEL, enter PRESELECT to treat the DN as a preselected call. Enter OVERRIDE to permit the DN to use override codes. Enter CSN to treat the DN as a carrier specific number. Enter TRUNK to permit access to trunk originated calls.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 6 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CALLCTRL	CALLING, CALLED, or MUTUAL	<i>Call control</i> If the value of subfield OSEL is CALLCTRL, enter one of the following three values to specify the party that has control of the call. If the entry is CALLING and the calling party goes on-hook first, the call is released immediately. If the called party goes on hook first, the called party is allowed to reanswer within a datafilled reanswer time out or until the calling party goes on-hook. If the time out expires or if the calling party goes on-hook, the calling party releases the call and the called party is set to idle. If the entry is CALLED and the called party goes on-hook first, the call is released immediately. If the calling party goes on- hook first and does not reanswer, the connection is not released until the called party goes on-hook. There are no time outs, and the calling party is allowed to reanswer until the called party goes on- hook. If the entry is MUTUAL and either party goes on-hook the call is released immediately. Note 1: Calls to lines with the ESG option must have CALLCTRL(CALLED). Note 2: Calls terminating on an ITOPS position must have CALLCTRL(CALLED).
	CDNNAME	CDNTEST	Called Number Name. If the value of subfield OSEL is SETCDN, enter refinement CDNNAME. This option assigns the CDNNAME from table CDNCHAR to the call.
	CHG	SEND_CHARGE or SEND_NO_CHARGE	<i>Charge</i> If the value of subfield OSEL is TOC, enter SEND_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_CHARGE. Enter SEND_NO_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_NO_CHARGE.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 7 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field indicates how many digits are in the CIC. This field operates on the B (called) number, so it is assumed that the CIC is signalled as part of the B number. The MAP display indicates the range is 0 to 4; however, the system does not allow 0.
	CLASS	ATT, CNTL, COLL, DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, or UNKW	<i>Translation class</i> If the value of subfield OSEL is CLASS, enter the translation class determined by the dialed digits. This can be used for screening or billing as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • IAGRP (inter-agent group) • ICNTL (inter-continental) • INTL (international) • IOPRA (international operator assisted) • LCL (local) • NATL (national) • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 8 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CLDFMT	CURRENT or POSTXLA	<i>Called format</i> If the value of subfield OSEL is CAMA, enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation). If the entry is POSTXLA, an ICAMA record is produced with public switched telephone network (PSTN) number resulting from translations.
	CLIOVRD	CNB, CNA	Calling line identity override. If the entry in subfield OSEL is CLIOVRD, enter CNB to block the CLI for each call. Enter CNA to allow the CLI.
	CONDIGS	numeric (0 to 29 digits)	<i>Consumed digits</i> If the value of subfield OSEL is CONSUME, enter a number to explicitly define the number of digits consumed during call processing.
	CONTINUE	CONT, NOCONT	Continue. If the entry in subfield OSEL is PRESEL, enter CONT to continue translations through UXLA. Enter NOCONT to immediately route translations through PCIXLA or PCITRK.
	CPMCALL	Y or N	<i>Called party metering</i> If the value of subfield OSEL is CPMCALL, enter Y (yes) if calls are billed against the called party for intra-office calls. Enter N (no) for the default value of billing against the calling party for intra-office calls.
	DDIDX	1 to 63 or DEFAULT	Destination discount index. If the entry in subfield OSEL is DDIDX, enter the destination discount index number.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 9 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	DEST	0 to 1023	<i>Destination route list index</i> If the value of subfield OSEL is DEST, enter the number in the route list of the same translation system to which the call is routed.
	IAA_INDEX	0 to 1024	Interadministration accounting index. If the entry in subfield OSEL is IAA, datafill this refinement. Enter the value that indexes the corresponding tuple in table IAACtrl.
	LNET	alphanumeric (1 to 16 characters)	<i>Logical network</i> If the value of subfield OSEL is LNET, enter the logical network name that the call is on. The logical network name must have been previously datafilled in table LNETWORK. The entry in this field is used by the international metering system to determine a tariff for the call.
	MAX	0 to 30	<i>Maximum digits</i> If the value of subfield OSEL is MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	<i>Minimum digits</i> If the value of subfield OSEL is MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MZONE	0 to 63	<i>Metering zone</i> If the value of subfield OSEL is MZONE, enter the metering zone of the call in the logical network as defined by selector LNET. The entry in this field is used by the international metering system to determine a tariff for the call.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 10 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	NETSRV_ NAME	IPHS, DPHS, MOBILE, DA, TELEGRAM, or NCC	Network service name. If the entry in subfield OSEL is NETSRV, datafill this refinement. The entry in this field determines the parameters in an outgoing IAM message. Enter IPHS to indicate a call to an independent personal handyphone system subscriber. Enter DPHS to indicate a call to a dependent personal handyphone system subscriber. Enter MOBILE to indicate a call to a mobile subscriber. Enter DA to indicate a call to the directory assistance operator. Enter TELEGRAM to indicate a call to the Telegram office. Enter NCC to indicate a call routed to one of the following networks: • New Common Carrier serving international toll traffic • New Common Carrier serving national toll traffic
	NOA	INTL, LOCAL, NATL, or NET	<i>Nature of address</i> If the entry in subfield OSEL is CDN, enter the required called party nature of address as listed below: • INTL (international) • LOCAL (local) • NATL (national) • NET (Intelligent Network Services)

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 11 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	ONNET	Y or N	<i>Call on virtual private network</i> If the value of subfield OSEL is VPN, enter Y if the call stays within the defined virtual private network. Otherwise enter N (no). Overlapped outpulsing is only supported on off-network calls. Calls processed without the ONNET subfield set to Y are off-network calls. Meridian digital centrex (MDC) calls are treated as off-network calls, and therefore overlapped outpulsing is supported for MDC calls.
	PCCDR	000 to 999	<i>Pseudo country code digits</i> If the value of subfield OSEL is PCC, enter the three-digit pseudo country code. If a two-digit PCC is required, it must be padded by a leading zero.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of subfield OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table. Note: If refinements PF and CONSUME are both datafilled for the same tuple, only the entry for the greater of the two values is processed; the other entry is ignored.
	PFXAMA	0 to 4 digits, or N	<i>Called party number prefix in AMA</i> If the entry in subfield is OSEL is CDN, and refinement NOA is set to NATL, datafill PFXAMA with 0011. If NOA is set to NATL, datafill PFXAMA with 0. If NOA is set to LOCAL or NET, datafill PFXAMA with N.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 12 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	PRIVL	Y or N	<i>Privileged user</i> If the value of subfield OSEL is PRIVL, enter Y (yes), if the user is a privileged user (for example, operator). Otherwise, enter N (no). If the originator is a privileged user, then no action is taken. If the originator is not privileged, translation AH01.2294 acts as if this code had not been found in this table, and the default value from the head table is used. This allows two classes of originator to use the same translation tables if the privileged user can dial all the same codes as a non-privileged user as well as some other privileged codes. The privileged user is allowed full access to all the codes, while the ordinary subscriber is prevented from using the privileged codes.
	QFT	OFF or ON	If the entry in subfield OSEL is QFT and the outgoing trunk is capable of QSIG feature transparency, enter ON. Operating company personnel must not add the QFT ON option to a route unless the far-end node is QFT-capable. The default is OFF.
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field indicates how many digits to skip before extracting the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the CIC is signalled as part of the B number.
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field specifies the source of the CIC as follows: • PRESUB - presubscribed, the CIC is defined in table TRKGRP • DIALED - dialed, the CIC is entered by the subscriber when dialing a call

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 13 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	STOPRTMR	Y or N	<i>Stop remote timer</i> If the entry in subfield OSEL is CDN, enter Y (yes) to disable the address complete message (ACM) timer of the remote switch. Default is N (no).
	XLAIID	FREE, GENERIC1, GENERIC2, or GENERIC3	<i>AMA translation identifier</i> If the value of subfield OSEL is AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 14 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASYS	AC, AM, CT, DN, FA, FT, NIL, NSC, OFC, or PX	<i>Translation system</i> If the value of subfield OSEL is XLT, enter the next translation system to use, followed by a space, then datafill subfield XLANAME (the instance of the translation system). The choice of translation systems is • AC (access) • AM (ambiguous) • CT (country) • DN (directory number) • FA (foreign area) • FT (utility) • NIL • NSC (number service code) • OFC (office) • PX (prefix) Note: The XLASYS value NIL must not be datafilled by the operating company. NIL is only used to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	<i>Translation name</i> If the value of subfield OSEL is XLT, enter the translation name of the table instance within the XLASYS to which the call is routed.

NSCCODE (continued)**XLASEL = DBQ**

If the value of subfield XLASEL is DBQ, datafill refinement OPT as described below.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	<i>Options</i> This subfield is a vector consisting of up to ten options. Each option consists of subfield OSEL and refinements that depend on the entry in subfield OSEL. For each option specify OSEL, followed by a space, then the refinements, each separated by a space. The entry is terminated by a \$.
	OSEL	MM, NSC, or PF	<i>Option selector</i> The following options can be selected: Enter MM, followed by a space, and datafill subfields MIN and MAX, if the minimum and maximum dialed digits are known. Enter NSC, followed by a space, and datafill subfield NSCCODE, if a number service code operation is to be performed on a call. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream.
	MAX	0 to 30	<i>Maximum digits</i> If the value of subfield OSEL is MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	<i>Minimum digits</i> If the value of subfield OSEL is MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	NSCODE	AIN, 800P, E008, E800, MAP_HLR, MAP_MSC, MAP_VLR, PVN, MAPHLR, REPLDIGS, or VPN	<i>Number service code</i> If the value of subfield OSEL is NSC, enter one of the following required number service operations to be performed on the call: • AIN is for advanced intelligent network service. • 800P is for the 800+ service. • E008 is for the enhanced 008 service. • E800 is for the enhanced 800 service. • MAP_HLR is for Mobile Application Part Home Location Register. • MAP_MSC is for Mobile Application Part Mobile service Switching Center. • MAP_VLR is for Mobile Application Part Visitor Location Register. • MAPHLR appears only if the package for MAP HLR Database Query service is on the switch. • PVN is for private virtual network service. • REPLDIGS is for replace digits service. • VPN is for Australian virtual private network service. All entries for field NSCODE must first be datafilled in table NSCDEFS, field NSCODE.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of subfield OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table.

NSCCODE (continued)**XLASEL = DMOD**

If the value of subfield XLASEL is DMOD, datafill refinement subfield OPT as described below.

Field descriptions for conditional data II (Sheet 1 of 8)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	<i>Options</i> This subfield is a vector consisting of up to five options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, then the refinements, each separated by a space. The entry is terminated by a \$.
	OSEL	AFTER, CDNRTE, CGNDM, CHGIND, CONSUME, COODM, CPCRTE, DEL, EXTCIC, INSRT, PF, RBP, REPL, SETCDN, VPNREPL, VPNXLT, XLT	<i>Option selector</i> The following options can be selected: Enter AFTER, followed by a space, and datafill subfield AFTER, if a certain number of digits must be skipped before modifying the digit stream. Enter CDNRTE to route a call using the called number name (CDNNAME). IF the CDNNAME is present on the incoming call or is set by the SETCDN option, translation proceeds to table CDNUXLA. The CDNRTE option does not apply to table AMCODE. The CDNRTE option does not have subfields. Enter CGNDM, followed by a space, and datafill subfields PREFXCLI and INSRTCLI to remove digits from the CLI and insert a datafilled digit in the prefix string. The total length of the string can be up to 18 digits. A modified CLI and digit string greater than 18 digits routes the call to treatment. Enter CHGIND, followed by a space, and datafill refinement CHGIND to specify that the call will either be charged or not charged.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CONSUME, followed by a space, and datafill subfield CONDIGS, to specify the number of digits that are consumed during translation. Enter COODM, followed by a space, and datafill subfield SERVICE, to replace the dialed emergency code by the emergency number stored in table LAC. Option selector COODM must be combined with the XLT option to guarantee translation continues with the modified number. Selector COODM cannot be combined with any other option. Enter CPCRTE to route a call using the calling party category (CPCNAME). IF the CPCNAME is present on the call, translation proceeds the table CPCUXLA. The CPCRTE option does not apply to table AMCODE. The CPCRTE option does not have subfields. Enter DEL, followed by a space, and datafill subfield DELDIGS. Further digits are accepted from the agent, and overlapped outpulsing is not affected. Digits being deleted are processed before those being inserted. Enter EXTCIC, followed by a space, and datafill refinements SOURCE, SKIPDIGS, and CICSIZE. EXTCIC is the external carrier identification code that indicates a long distance carrier in the global environment. This option is only supported for TOPS calls. For further information, refer to functionality Global Competitive Access, GOS00006.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 3 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter INSRT, followed by a space, and datafill subfield INSRDIGS. Further digits are accepted from the agent, and overlapped outpulsing is not affected. Digits being deleted are processed before those being inserted. Note: Digit insertion is done in the actual digit stream, and the changes are reflected in call detail records. Replacement and insertion cannot be datafilled in the same tuple. If both options are datafilled, the second option in the tuple is used. Enter PF, followed by a space, and datafill subfield PFDIGS, if there are prefix digits in the digit stream. Enter RBP without refinements. The entry RBP is used when a call is to be marked as Ringback Price. The RBP entry in table NSCCODE suffixes a hexadecimal E to the calling digits for a call that translates using a tuple with the RBP option. Enter REPL, and datafill subfield REPLDIGS. Overlapped outpulsing is disabled, and all digits are collected before continuing. Note: Digit replacement occurs in the actual digit stream, and the changes are reflected in call detail records. Replacement and insertion cannot be datafilled in the same tuple. If both options are datafilled, the second option in the tuple is used. Enter SETCDN, followed by a space, and enter data in refinement CDNNAME to allow CDN routing.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 4 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter VPNREPL to replace the called party digits with the VPN called party digits. The QSIG feature transparency mechanism sends the VPN digits across the public network. This option does not have subfields. Enter VPNXLT to replace the current translation system and translator name with the values in table BGIDMAP. The VPNXLT and XLT options cannot be present in the same place. The VPNXLT option does not have subfields. Enter XLT, followed by a space, and datafill subfield XLASYS, if the call proceeds to another translation system.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 5 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	AFTER	0 to 29	<i>After</i> If the value of subfield OSEL is AFTER, enter the number of digits to skip before doing the modification. The default case is to calculate the new prefix fence, and then replace, insert or delete digits after the fence (for example, starting at the next digit). Option after is an additional number of digits to skip, before doing the modification. Option after refers to the option datafilled immediately before it. For example: DMOD DEL 3 AFTER 2 INSRT 11 skips two digits, deletes the next three and inserts digits 11 at the beginning of the digit string. The result when applied to 234567 is 23117. Note: Datafilling this refinement with 0 (the default value) displays the following error message: Too few digits for AFTER option UNSUPPORTED OPTION AT: # PROCESSING ERROR UNEXPECTED ERROR CONDITION
	CDNNAME	CDNTEST	Called Number Name. If the value of subfield OSEL is SETCDN, enter refinement CDNNAME. This option assigns the CDNNAME from table CDNCHAR to the call.
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field indicates how many digits are in the CIC. This field operates on the B (called) number, so it is assumed that the CIC is signalled as part of the B number. The MAP display indicates the range is 0 to 4; however, the system does not allow 0.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 6 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	CONDIGS	numeric(0 to 29 digits)	<i>Consumed digits</i> If the value of subfield OSEL is CONSUME, enter a number to explicitly define the number of digits consumed during call processing.
	DELDIGS	0 to 29	<i>Delete digits</i> If the value of subfield OSEL is DEL, enter the number of digits requiring deletion. Refer to the description of subfield AFTER.
	INSRDIGS	0 to 29 digits	<i>Insert digits</i> If the value of subfield OSEL is INSRT, enter the number of digits requiring insertion. Refer to the description of subfield AFTER.
	INSRTCLI	numeric (1 to 5 digits) or \$	<i>Insert CLI</i> If the value of subfield OSEL is CGNDM, enter the new string to insert as the prefix onto the CLI. Enter \$ to specify no digit string is inserted.
	PREFXCLI	0 to 18	<i>Prefix CLI</i> If the value of subfield OSEL is CGNDM, enter the number of prefix digits to delete.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of subfield OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table. Note: If refinements PF and CONSUME are both datafilled for the same tuple, only the entry for the greater of the two values is processed; the other entry is ignored.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 7 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	REPLDIGS	0 to 30 digits	<i>Replace digits</i> If the value of subfield OSEL is REPL, enter the digits that replace the existing digits.
	SERVICE	alphanumeric (1 to 8 characters)	<i>Coodm service</i> If the value of subfield OSEL is COODM, enter the emergency service name. Emergency service names are listed in field EMRGSERV in table LAC.
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field indicates how many digits to skip before extracting the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the CIC is signalled as part of the B number.
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field specifies the source of the CIC as follows: • PRESUB - presubscribed, the CIC is defined in table TRKGRP • DIALED - dialed, the CIC is entered by the subscriber when dialing a call

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 8 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASYS	AC, AM, CT, DN, FA, FT, NIL, NSC, OFC, or PX	<i>Translation system</i> If the value of subfield OSEL is XLT, enter the next translation system to use, followed by a space, and datafill subfield XLANAME (the instance of the translation system). The choice of translation systems are • AC (access) • AM (ambiguous) • CT (country) • DN (directory number) • FA (foreign area) • FT (utility) • NIL • NSC (number service code) • OFC (office) • PX (prefix) Note: The XLASYS value NIL must not be datafilled by the operating company. NIL is only used to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	<i>Translation name</i> If the value of subfield OSEL is XLT enter the translation name of the table instance within the XLASYS to which the call is routed.

XLASEL = DNRTE

The DNRTE selector allows translation to continue in table DNINV. Through this translation, calls can be terminated at directory numbers datafilled in table DNINV.

Table DNINV must be datafilled before the DNRTE selector is datafilled in table NSCCODE.

Table AMAXLAID must be datafilled prior to selecting option AMAXLAID.

NSCCODE (continued)

If the value of subfield XLASEL is DNRTE, datafill refinement subfield OPT as described below.

Field descriptions for conditional data II (Sheet 1 of 5)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	<i>Options</i> This subfield is a list consisting of up to ten options. Each option consists of subfield OSEL and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, then the refinements, each separated by a space.
	OSEL	ALLOWOVLP, AMAXLAID, CAMA, CLASS, DN, MM, PF, SF	<i>Option selector</i> The following options can be selected: Enter ALLOWOVLP. The ALLOWOVLP does not have subfields. Enter AMAXLAID, followed by a space, and datafill subfield XLAID, to specify an Automatic Message Accounting identity from within table AMAXLAID. Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the ICAMA record is generated with either the originally-signaled DN or the final public switched telephone network (PSTN) number. Enter CLASS, followed by a space, and datafill subfield CLASS, if the class of the dialed digits is determined. Enter DN, followed by a space, and datafill subfield SNPA and OFC for the directory number that the call is routed to. Enter MM, followed by a space, and datafill subfields MIN and MAX, if the minimum and maximum dialed digits are known. Enter PF, followed by a space, and datafill subfield PFDIGS, if there are prefix digits in the digit stream.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	CLDFMT	CURRENT or POSTXLA	Enter SF, followed by a space, and datafill refinement SFDIGS to indicate the beginning of the station code digits. <i>Called format</i> If the value of subfield OSEL is CAMA, enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation). If the entry is POSTXLA, an ICAMA record is produced with public switched telephone network (PSTN) number resulting from translations.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 3 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	CLASS	ATT, CNTL, DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, COLL, or UNKW	<i>Translation class</i> If the value of subfield OSEL is CLASS, enter the translation class determined by the digits dialed. This can be used for screening or billing as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • IAGRP (inter-agent group) • ICNTL (inter-continental) • INTL (international) • IOPRA (international operator assisted) • LCL (local) • NATL (national) • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)
	MAX	0 to 30	<i>Maximum digits</i> If the value of subfield OSEL is MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 4 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	MAX	0 to 30	<i>Maximum digits</i> If the value of subfield OSEL is MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	<i>Minimum digits</i> If the value of subfield OSEL is MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	OFC	numeric (1 to 7 digits)	<i>Seven-digit office code</i> If the value of subfield OSEL is DN, enter the office code for the DN that the call is routed to.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of subfield OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table.
	SFDIGS	0 to 29	Station fence digits. If the entry in subfield OSEL is SF, datafill this refinement. Enter a number to indicate how many digits to advance past the start of the digits that index into the tuple. (During call processing, the station code digits consist of all digits beyond this indicator to the end of the dialled digits. If option SF is not datafilled, then the last four digits comprise the station code.)

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 5 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	SNPA	000 to 999	<i>Serving number plan area</i> If the value of subfield OSEL is DN, enter the required SNPA. This number must be in table HNPACONT or in table SNPANAME. This field must be three digits in length.
	XLAIID	FREE, GENERIC1, GENERIC2, or GENERIC3	<i>AMA translation identifier</i> If the value of subfield OSEL is AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

NSCCODE (continued)**XLASEL = FEAT**

If the value of subfield XLASEL is FEAT, datafill refinement subfield OPT as described below.

Field descriptions for conditional data II (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	<i>Options</i> This subfield is a vector consisting of up to 10 options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, then the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	FTR, FUNC, MM or PF	<i>Option selector</i> The following options can be selected: Enter FTR, followed by a space, and a feature code (FTR described below) to identify the international line feature. Enter FUNC, followed by a space, and a feature function code (FUNC described below) to identify the international line feature function. Enter MM, followed by a space, and datafill subfields MIN and MAX, if the minimum and maximum dialed digits are known. Enter PF, followed by a space, and datafill subfield PFDIGS, if there are prefix digits in the digit stream.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	FTR	CALLBACK, CALLCHAR, CLCTDIGS, JES, NTC, VMWI, VSC or VALIDATE	Feature name. If the entry in subfield OSEL is FTR, enter the refinement name shown below: • CALLBACK (call back) • CALLCHAR (call characters) • CLCTDIGS (collect digits) • JES (Japan emergency services) • NTC (Notify Time Charges) • TLC (trunk logic circuit) • VMWI (voice mail waiting indication) • VSC (vertical service code) • VALIDATE (not used in GL03)
	FUNC	ACT, DEACT, INTER, USAGE, PROG, or DELETE	<i>Feature function code</i> If the value of subfield OSEL is FUNC, enter one of the international line feature function codes listed below: • ACT (Activate) • DEACT (Deactivate) • INTER (Interrogate) • USAGE (Usage) • PROG (Programming) • DELETE (Delete)
	MAX	0 to 30	<i>Maximum digits</i> If the value of subfield OSEL is MM, enter the maximum number of digits expected following MIN entry and a space. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	MIN	0 to 30	<i>Minimum digits</i> If the value of subfield OSEL is MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of subfield OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table.

XLASEL = FEATINFO

If the entry in subfield XLASEL is FEATINFO, datafill the following refinements. Selector FEATINFO makes use of table DNSCRN to store information against DNs, which is used during call processing to determine how to proceed with the call. The screening function is triggered by selector FEATINFO in the universal translation tables. The options available with this selector are shown below.

Field descriptions for conditional data II (Sheet 1 of 10)

Field	Subfield or refinement	Entry	Explanation and action
	FTR	CALLBACK, CALLCHAR, CLCTDIGS, JES, NTC, TLC, or VALIDATE	Feature name. Enter CALLBACK to enable originator callback during translations. Datafill subfield CALLBACK_OPTION and its refinements, then datafill subfields PFDIGS, MINDIGS, MAXDIGS, and TABREF. Enter CALLCHAR to modify all signaling characteristics. Datafill subfields CLLCHROP, PFDIGS, MINDIGS, MAXDIGS, and TABREF.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CLCTDIGS to collect digits from the call originator and add them to the called digits stream for translation. Datafill subfields CLDGMIN, CLDGMAX, CLCTDIGS_OPTION, PFDIGS, MINDIGS, MAXDIGS, and TABREF. Enter JES to activate the Japan Emergency Service feature. Datafill refinements PFDIGS and TABREF. Enter NTC to notify the originating subscriber of applicable time and charges after the call terminates. Datafill subfield SUBOPT_NAME and its refinement, then datafill subfields PFDIGS, MINDIGS, MAXDIGS, and TABREF. Enter TLC to enable the test line call feature, which provides audible ringback tone followed by dial tone after specified durations. Datafill subfields RING_BACK_TONE_DUR, DIAL_TONE_DUR, TLC_PREFIX_DIGS, TLC_NUM_DIGS, and TLC_CHARGE. Enter VALIDATE, and datafill subfield VALATOP and its refinements. Datafill subfields PFDIGS, MINDIGS, MAXDIGS, and TABREF.
	CALLBACK_OPTION	CLCTDEST or NIL	Callback option. If the entry in field FTR is CALLBACK, datafill this option. Enter CLCTDEST to call back the subscriber and collect destination digits. Datafill subfields CLDGMIN, CLDGMAX, DISC_ANNC_TRK, PROMPT_ANNC_TRK, and SEND_ANM. Otherwise, enter NIL.
	CLDGMIN	1 to 24	Minimum collected digits. Enter the minimum number of digits to be collected and entered into the called digit stream.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 3 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	CLDGMAX	1 to 24	Maximum collected digits. Enter maximum number of digits to be collected and written into the called digit stream. The value cannot be less than CLDGMIN.
	DISC_ANNC_TRK	alphanumeric (1 to 16 characters)	Disconnect announcement trunk. Enter trunk common language location identifier (CLLI).
	PROMPT_ANNC_TRK	alphanumeric (1 to 16 characters)	Prompt announcement trunk. Enter trunk the common language location identifier (CLLI).
	SEND_ANM	Y or N	Send answer message. Enter Y (yes) or N (no).
	CLLCHROP	NOCHGMSG or EARLYCPG	Call characteristics. If the entry in field FTR is CALLCHAR, datafill this option. Enter NOCHGMSG to block backward CHG message. Enter EARLYCPG to specify that a call progress (CPG) message is issued in the backwards direction before an address complete message (ACM) is sent. The CPG message is permitted before an ACM in certain ISDN user part (ISUP) variants to establish a bidirectional speech path and to stop the T7 timer.
	CLCTDIGS_OPTION	NIL or \$	Collect digits option. If the entry in field FTR is CLCTDIGS, datafill this option. Enter NIL or enter \$ to proceed to the next option.
	SUBOPT_NAME	DUR_ADJ	Suboption name. If the entry in field FTR is NTC, datafill this option. Enter DUR_ADJ to specify the duration adjustment for NTC and datafill subfield DURATION_ADJ.
	DURATION_ADJ	0 to 99	Duration adjustment. Enter the time in seconds.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 4 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	RING_BACK_TONE_DUR	1 to 255	Ringback tone duration. If the entry in field FTR is TLC, datafill this option. Enter the time, in seconds, that ringback tone is provided to the originator.
	DIAL_TONE_DUR	1 to 255	Dial tone duration. If the entry in field FTR is TLC, datafill this option. Enter the time, in seconds, that dial tone is provided to the originator.
	TLC_PREFIX_DIGS	0 to 18	Prefix digits in called number. If the entry in field FTR is TLC, datafill this option. Enter the number of digits to advance the prefix fence to detect the charge message digits when CPC = PAYPHONE.
	TLC_NUM_DIGS	numeric(3 or 4) Japan only	Test line call number of digits. Enter the number of dialed digits to be transferred to the NCCI#7 CHG message. This is also the number of digits stored in the LMNNUM field of the SMDR #DE record.
	TLC_CHARGE	Y or N	Test line call charge indicator. The TLC_CHARGE field indicates the billing status of an ISUP test call. Enter Y if the call is billable. Enter N if the call is not billable. The default value for this field is N.
	OPT	see subfield VALDATOP	Options. If the entry in field FTR is VALIDATE, datafill this option. This field is a vector consisting of up to five options. Each option consists of subfield VALDATOP, and refinements that depend on the entry in subfield VALDATOP. For each option, specify VALDATOP, followed by a space, then the refinements, each separated by a space. The entry is concluded by a \$ and datafill continues with field DFOP.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 5 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	VALDATOP	BCSCRN, CALLED, CLDTOCLG, CLISERV, CUSTMOD, LCASCRN, NOCHARGE, PRESEL, SCRNLNTH, SUBSCRN, TCNOTSCR, THIRDPTY, VERDEST, V3PTYBIL	Validate option. Enter a list of up to five options. The options specify what characteristics are to be considered when screening the call. Enter \$ to signify the end of the list. Note: Selector VALIDATE is traversed only once for each call. Enter BCSCRN and datafill refinement BCOPTS to identify the bearer capability name. Enter CALLED to indicate the number to be used for screening. The SUBSCRN options are used to specify the subscriber types allowed to receive the call. Note: When using option CALLED, there must be no further digit manipulation after selector VALIDATE is encountered in translations. If option CALLED is not entered, then the calling party number is used for screening and the SUBSCRN options are used to specify the subscriber types allowed to make the call. Note: Pay phone subscribers are treated as general subscribers if option CALLED is specified. Enter CLDTOCLG, followed by a space, to copy digits from the called to the calling digit stream, and datafill options OFFSET and COUNT. Enter CLISERV, followed by a space, and enter data in subfield SERVNAME to add the name of the service provider.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 6 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CUSTMOD, followed by a space, to alter the internal network class of service (NCOS) and customer group to new value for a given directory number (DN) based on the CUSTINFO attribute in table DNSCRN. The source of the DN used as an index into table DNSCRN is determined by the VALIDATE datafill. Datafill refinement CUSTSCRN. Enter LCASCRN, followed by a space, to enable local calling area screening. The called and calling numbers are checked against tables LCARNAME and LCASCRCN to determine if the numbers are local to each other, and whether the call should be denied or allowed to continue routing. Enter NOCHARGE, followed by a space, to indicate that the call is nonbillable. Note: If both NOCHARGE and THIRDPTY options are specified, NOCHARGE takes precedence. Enter PRESEL to allow screening for the PRESEL attribute in table DNSCRN. Enter SCRNLNTH, followed by a space, and datafill refinement MINLNGTH to specify the minimum length of the number being screened. Enter SUBSCRN, followed by a space, and datafill up to three multiples of the following subscriber types: GENERAL, PAYPHONE, PERSONAL, and MOBILE. Enter \$ after entering SUBSCRN to indicate that no subscriber types are permitted to make or receive the call. Enter TCNOTSCR to indicate that calls with CPC set to Test Call are not screened.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 7 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter THIRDPY to indicate that automatic third party billing is used. Table DNSCRN is checked for attribute UNPAID. Note: If both NOCHARGE and THIRDPY options are specified, NOCHARGE takes precedence. Note: Payphone subscribers are treated as general subscribers if option CALLED is specified. Enter VERDEST to verify the destination of a call. Called digits are checked against ADDCODE entries in table DNSCRN. Note: NIL appears on the switch range but is not a valid entry. The value NIL is used only to satisfy internal software requirements.
	BCOPTS	alphanumeric (1 to 8 characters)	Bearer capability option. If the entry in field VALDATOP is BCSCRN, datafill this refinement. Enter up to four bearer capability names.
	COUNT	0 to 30	If the entry in field VALDATOP is CLDTCGLG, enter subfield count to count the digits from the called stream to the calling stream.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 8 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	CUSTSCRN	Y or N	Customer screen. Enter Y to block calls that are not subscribed to the switched on-net services if attempting a switched on-net call. If the DN being screened is not present in table DNSCRN, the call is rejected with the Call Not Allowed (CNAD) treatment. The internal NCOS and CUSTGRP associated with the call are altered to the values found in the CUSTINFO attribute if present for the given DN in table DNSCRN. The DN used to index table DNSCRN can be the subscriber calling line identification (CLI) or the dialed number. The source of the DN is determined by the datafill of field VALIDATE. Enter N if no screening is performed. Note: The FEATINFO values CCANN, CCARD, CCSDT, DAFOP, FAXSUP, FAXTEST, INBFAX, INBFD, INTLFD, ISD, ISDTST, ISDVRE, OUTBFAX, OUTBFD, PB3RDPTY, PBCALL, PBISD, PBISDVRE, and PBTST are valid only in DMS-250 switching offices. Additional DMS-250 parameters are listed in the DMS-250 specific data schema NTPs.
	MINLNTH	0 to 18values from 0 to 30 are possible in APC software loads	Minimum length. If the entry in field VALDATOP is SCRNLNTH, enter the minimum number of digits required in number being screened.
	OFFSET	0 to 30	If the entry in field VALDATOP is CLDTCGLG, enter subfield OFFSET to offset the digits from the called stream to the calling stream.
	SERVNAME	alphanumeric string	Service Provider name. If the entry in field VALDATOP is CLISERV, enter the name of the service provider in this refinement.
	SUBSCTYP	GENERAL, PAYPHONE, PERSONAL, or MOBILE	Subscriber type. Enter subscriber type, followed by a space, and datafill refinements WHITLIST, CHKBLKCL, CHKUNPD, and CHKCCR. This option allows you to specify which subscriber types are permitted to make or receive a call and whether the subscriber's standing is important for a call.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 9 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	WHITLIST	Y or N	Whether it list. Enter Y (yes) to indicate that the subscriber's directory number must be datafilled in table DNSCRN. Otherwise, enter N (no).
	CHKUNPD	Y or N	Check unpaid. Enter Y to check if the subscriber has paid his bills. Otherwise, enter N.
	CHKBLKCL	Y or N	Check block call. Enter Y to check if the subscriber has subscribed to all services for which this tuple is being used (BLKCALL attribute in table DNSCRN). Otherwise, enter N.
	CHKCCR	Y or N	Check cumulative call restriction. Enter Y to check the subscriber's cumulative charge limit. Otherwise, enter N.
	PFDIGS	0 to 24	Prefix digits. Enter the number of prefix digits present at this point in the call. Prefix digits are not used to index any further translation tables and are not outpulsed, but they remain stored in call detail records (CDR).
	MINDIGS	0 to 30	Minimum digits. Enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MAXDIGS	0 to 30	Maximum digits. Enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	TABREF	see subfields	Table reference. This field consists of subfields XLASYS and XLANAME.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 10 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASYS	AC, AM, CT, FA, FT, NSC, OFC, or PX	Translation system. Enter the next translation system to use, followed by a space, and datafill subfield XLANAME (the instance of the translation system). The choice of translation systems is as follows: • AC (access) • AM (ambiguous) • CT (country) • FA (foreign area) • FT (utility) • NSC (number service code) • OFC (office) • PX (prefix) Note: NIL is not a valid entry. NIL is used only to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. Enter the translation name of the table instance within the XLASYS to which the call is routed.

NSCCODE (continued)**XLASEL = HRC**

If the entry in subfield XLASEL is HRC, enter datafill for the following refinements.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	OPT	see subfield	Options. This field contains subfield OSEL, and refinements that depend upon the entry in subfield OSEL. The entry is concluded by a \$ and datafill continues with field DFOP.
	OSEL	XLT, PFBILL	Option selector. If the call proceeds to another translation system, enter XLT, followed by a space, and datafill refinement XLASYS. Enter option selector PFBILL.
	XLASYS	AC, AM, CT, FA, FT, NSC, OFC, PX	Translation system. If the entry in subfield OSEL is XLT, enter data for this refinement. Enter the next translation system to use, followed by a space, and enter data in refinement XLANAME. Enter one of the following: • AC (access) • AM (ambiguous) • CT (country) • FA (foreign area) • FT (utility) • NSC (number service code) • OFC (office) • PX (prefix) Note: NIL is not a valid entry. Operating company personnel use NIL only to satisfy internal software functionality. NSC is not used in GL03.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. If the entry in subfield OSEL is XLT, enter data for this refinement. Enter the translation name of the table in XLASYS to which the system routes the call.
	PFBILL	Y or N	Prefix billing option. Enter PFBILL, followed by a space, and enter either Y or N. If the entry is Y, billing record includes the home routing code specified in the tuple. If the entry is N, the billing record does not include the home routing code.

XLASEL = IAC

If the value of subfield XLASEL is IAC, datafill refinement subfield OPT as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	<i>Options</i> This subfield is a vector list consisting of up to ten options and terminated by \$. Each option consists of subfield OSEL, and refinement subfields that depend on the entry in OSEL.
	OSEL	PF	<i>Option selector</i> Enter PF, followed by a space, and datafill subfield PFDIGS, if there are prefix digits in the digit stream.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table.

XLASEL = RTE

Table AMAXLAID must be datafilled prior to selecting option AMAXLAID.

NSCCODE (continued)

If the value of subfield XLASEL is RTE, datafill refinement subfield OPT as described below.

Field descriptions for conditional data II (Sheet 1 of 13)

Field	Subfield or refinement	Entry	Explanation and action
OPT		see subfield	<i>Options</i> This subfield is a list consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. The refinements are described in subfield OSEL. For each option, specify OSEL, followed by a space, then the refinements, each separated by a space.
	OSEL	ACF, AMAXLAID, BLKOVLP, CALLCTRL, CAMA, CDN, CDNRTE, CLASS, CONSUME, CPCRTE, CPMCALL, DDIDX, DEST, EXTCIC, IAA, LNET, MM, MZONE, NETSRV, OSS, PCC, PF, PIP, PNRF, PRESEL, PRESEL RTE, PRIVL, SETCDN, TELETAXE, TOC, VPN, or XLT	<i>Option selector</i> The following options can be selected: Enter ACF, followed by a space, and datafill subfield ACF, if the area code fence is defined. Enter AMAXLAID, followed by a space, and datafill subfield XLAID, to specify an Automatic Message Accounting identity from within table AMAXLAID. Enter BLKOVLP, followed by a space, and enter data in refinement XLADATA to prevent the system from outpulsing calls until all CDN digits are collected. Enter CALLCTRL, followed by a space, and datafill subfield CALLCTRL. The entry in subfield CALLCTRL indicates who has control of the call: the calling party, the called party, or both. Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the ICAMA record is generated with either the originally-signaled DN or the final public switched telephone network (PSTN) number.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 2 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CDN, followed by a space, and datafill subfields NOA, PFXAMA, or STOPRTMR to select the nature of address field. This field is used to identify the called party of the initial address message (IAM). It is used for Australian ISDN user part (AISUP) call translations. Enter CDNRTE to route a call using the called number name (CDNNAME) from table CDNCHAR. If the CDNNAME is present on the incoming call, or is set in the SETCDN option, translation proceeds to table CDNUXLA. The CDNRTE option does not apply to table AMCODE. The CDNRTE option does not have subfields. Enter CLASS, followed by a space, and datafill subfield CLASS, if the class of the dialed digits is determined. Enter CONSUME, followed by a space, and datafill subfield CONDIGS, to specify the number of digits that are consumed during translation. Enter CPCRTE to route a call using the calling party category (CPCNAME) from table CPCCHAR. If the CPCNAME is present on the incoming call, translation proceeds to table CPCUXLA. The CPCRTE option does not apply to table AMCODE. The CPCRTE option does not have subfields. Enter CPMCALL, followed by a space, and datafill subfield CPMCALL, to specify call billing against the called party instead of the calling party for intra-office calls. Enter DDIDX, followed by a space, and enter data for subfield DDIDX. Operating company personnel can enter data in this field to specify the destination discount index in the discount database.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 3 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter DEST, followed by a space, and datafill subfield DEST, if the destination is known. Enter EXTCIC, followed by a space, and datafill refinements SOURCE, SKIPDIGS, and CICSIZE. EXTCIC is the external carrier identification code that indicates a long distance carrier in the global environment. This option is only supported for TOPS calls. For further information, refer to functionality Global Competitive Access, GOS00006. Enter IAA and the datafill refinement IAA_INDEX to generate or modify IAA message parameters based on datafill in table IAACTRL. Enter LNET, followed by a space, and datafill subfield LNET, the index into table LNETWORK, to find the International Metering System tariff for the call. Enter MM, followed by a space, and datafill subfields MIN and MAX, if the minimum and maximum number of expected digits dialed are known. These values include the digits used to index the current tuple and must also include the prefix digits specified in the current tuple. Note: For fast interdigital timing to function properly, MM should only be used with the RTE selector whenever MIN is not equal to MAX. In other words, if MIN = MAX, MM can be used with the CONT selector in PXC CODE; if MIN is not equal to MAX, MM should not be used until the RTE selector is used (which is usually in either table FACODE or OFCCODE). If MIN and MAX are set in PXC CODE when they are not equal to each other, partial dial timing is used after MIN digits are dialed in order to determine the end of dialing.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 4 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter MZONE, followed by a space, and datafill subfield MZONE, if metering is done on the call. Enter NETSRV and datafill refinement NETSRV_NAME to indicate a Japan network service. Enter OSS, followed by a space, if determining the appropriate IFAM format for an indirect BTUP call to Operator Service System. Enter PCC, followed by a space, and datafill subfield PCCDR, if a pseudo country code is required. Enter PF, followed by a space, and datafill subfield PFDIGS, the prefix fence. This is the number of prefix digits associated with this tuple (that is, if some prefix digits were identified in a previous table, then the number here is added to the existing value). Prefix digits are not stored in call detail records, are not outpulsed, and are not used to index any further translation tables. Enter PIP to perform a residency check for the digits the system is translating. The local number portability feature uses the residency check to make sure that the system does not route calls which were ported in the office, out of the office. The PIP option does not have subfields. Enter PNRF to invoke the ported number recognition feature. LNP applications in Germany use the PNRF feature. The PNRF option does not have subfields. Enter PRESEL, followed by a space, if the call is to be treated as a preselected carrier case.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 5 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter PRESEL RTE, followed by a space, and datafill refinement PRESEL RTE, the index into the route table of the current XLASYS and XLANAME. Enter PRIVL, followed by a space, and datafill subfield PRIVL, if the user is a privileged user (for example, operators). Enter SETCDN, followed by a space, and enter data in refinement CDNNAME, to allow CDN routing for a call. Use this option when incoming agents are not available in table CDNCHAR. Enter TOC, followed by a space, and datafill subfield CHG, for the type of charge where the type of charge messaging is to be selected. Enter VPN, followed by a space, and datafill subfields ONNET and BILLABLE, if the call routes through a service switching point (SSP) and the Australian VPN - SSP software package (NTXH49AA or NTXH49AB) is in the switching unit. Enter XLT, followed by a space, and datafill subfield XLASYS, if the call proceeds to another translation system.
	ACF	0 to 29	<i>Area code fence</i> If the value of subfield OSEL is ACF, enter the number of digits between the beginning of the digits to currently index the table, and the end of the area code.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 6 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	BILLABLE	Y or N	<i>Virtual private network billable call</i> If the value of subfield OSEL is VPN, enter Y (yes) if an automatic message accounting (AMA) record is required for each VPN call. Otherwise enter N (no). An AMA record is not generated if an address complete message (ACM) of address complete, no charge is returned, or if the call terminates in the SSP on a line with the free number terminating (FNT) option.
	CALLCLASS	PRESELECT OVERRIDE, CSN,TRUNK	Call class. If the entry in subfield OSEL is PRESEL, enter PRESELECT to treat the DN as a preselected call. Enter OVERRIDE to permit the DN to use override codes. Enter CSN to treat the DN as a carrier specific number. Enter TRUNK to permit access to trunk originated calls.
	CALLCTRL	CALLING, CALLED, MUTUAL	<i>Call control</i> If the value of subfield OSEL is CALLCTRL, enter one of the following values to specify the party who has control of the call: • CALLING • CALLED • MUTUAL If the entry is CALLING and the calling party goes on-hook first, the call is released immediately. If the called party goes on-hook first, the called party is allowed to reanswer within a datafilled reanswer time out or until the calling party goes on-hook. If the time out expires or if the calling party goes on-hook, the calling party releases the call and the called party is set to idle.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 7 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			If the entry is CALLED and the called party goes on-hook first, the call is released immediately. If the calling party goes on-hook first and does not reanswer, the connection is not released until the called party goes on-hook. There are no time outs, and the calling party is allowed to reanswer until the called party goes on-hook. Note 1: Calls to lines with the ESG option must have CALLCTRL (CALLED). Note 2: Calls terminating on an ITOPS position must have CALLCTRL(CALLED). If the entry is MUTUAL and either party goes on-hook the call is released immediately.
	CDNNAME	alphanumeric string	Called Number Name. If the value of subfield OSEL is SETCDN, enter refinement CDNNAME. This option assigns the CDNNAME from table CDNCHAR to the call.
	CHG	SEND_CHARGE or SEND_NO_CHARGE	<i>Charge</i> If the value of subfield OSEL is TOC, enter SEND_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_CHARGE. Enter SEND_NO_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_NO_CHARGE.
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field indicates how many digits are in the CIC. This field operates on the B (called) number, so it is assumed that the CIC is signalled as part of the B number. The MAP display indicates the range is 0 to 4; however, the system does not allow 0.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 8 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	CLASS	ATT, CNTL, COLL DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, or UNKW	<i>Translation class</i> If the value of OSEL is CLASS, enter the translation class determined by the dialed digits. This may be used for screening or billing as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • IAGRP (inter-agent group) • ICNTL (inter-continental) • INTL (international) • IOPRA (international operator assisted) • LCL (local) • NATL (national) • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)
	CLDFMT	CURRENT, POSTXLA	<i>Called format</i> If the value of subfield OSEL is CAMA, enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation).

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 9 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			If the entry is POSTXLA, an ICAMA record is produced with public switched telephone network (PSTN) number resulting from translations.
	CONDIGS	numeric (0 to 29 digits)	<i>Consumed digits</i> If the value of subfield OSEL is CONSUME, enter a number to explicitly define the number of digits consumed during call processing.
	CONTINUE	CONT, NOCONT	Continue. If the entry in subfield OSEL is PRESEL, enter CONT to continue translations through UXLA. Enter NOCONT to immediately route translations through PCIXLA or PCITRK.
	CPMCALL	Y or N	<i>Called party metering</i> If the value of subfield OSEL is CPMCALL, enter Y (yes) if calls are billed against the called party for intra-office calls. Enter N (no) for the default value of billing against the calling party for intra-office calls.
	DDIDX	1 to 63 or DEFAULT	Destination discount index. If the entry in subfield OSEL is DDIDX, enter the destination discount index number.
	DEST	0 to 1023	<i>Destination route list index</i> If the value of subfield OSEL is DEST, enter the number in the route list of the same translation system to which the call is routed.
	IAA_INDEX	0 to 1024	Interadministration accounting index. If the entry in subfield OSEL is IAA, datafill this refinement. Enter the value that indexes the corresponding tuple in table IAACTRL.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 10 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	LNET	alphanumeric (1 to 16 characters)	<i>Logical network</i> If the value of subfield OSEL is LNET, enter the logical network name that the call is on. The logical network name must be datafilled in table LNETWORK. The entry in this field is used by the international metering system to determine a tariff for the call.
	MAX	0 to 30	<i>Maximum digits</i> If the value of subfield OSEL is MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	<i>Minimum digits</i> If the value of subfield OSEL is MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MZONE	0 to 63	<i>Metering zone</i> If the value of subfield OSEL is MZONE, enter the metering zone of the call, in the logical network as defined by selector LNET. The entry in this field is used by the international metering system to determine a tariff for the call.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 11 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	NETSRV_ NAME	IPHS, DPHS, MOBILE, DA, TELEGRAM or NCC	Network service name. If the entry in subfield OSEL is NETSRV, datafill this refinement. The entry in this field determines the parameters in an outgoing IAM message. Enter IPHS to indicate a call to an independent personal handyphone system subscriber. Enter DPHS to indicate a call to a dependent personal handyphone system subscriber. Enter MOBILE to indicate a call to a mobile subscriber. Enter DA to indicate a call to the directory assistance operator. Enter TELEGRAM to indicate a call to the Telegram office. Enter NCC to indicate a call routed to one of the following networks: • New Common Carrier serving international toll traffic • New Common Carrier serving national toll traffic
	NOA	INTL, LOCAL, NATL, or NET	<i>Nature of address</i> Enter the required called party nature of address as follows: • INTL (international) • LOCAL (local) • NATL (national) • NET (Intelligent Network Services)

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 12 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	ONNET	Y, N	<i>Call on virtual private network</i> If the value of subfield OSEL is VPN, enter Y if the call stays within the defined virtual private network. Otherwise enter N (no). Overlapped outpulsing is only supported on off-network calls. Calls processed without the ONNET subfield set to Y are off-network calls. Meridian digital centrex (MDC) calls are treated as off-network calls, and therefore overlapped outpusling is supported for MDC calls.
	PCCDR	000 to 999	<i>Pseudo country code digits</i> If the value of subfield OSEL is PCC, enter the three-digit pseudo country code. If a two-digit PCC is required, it must be padded by a leading zero.
	PFDIGS	0 to 24	<i>Number of prefix digits</i> If the value of subfield OSEL is PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table. Note: If refinements PF and CONSUME are both datafilled for the same tuple, only the entry for the greater of the two values is processed; the other entry is ignored.
	PFXAMA	0 to 4 digits, or N	<i>Called party number prefix in AM</i> If NOA is set to NATL, datafill PFXAMA with 0011. If NOA is set to NATL, datafill PFXAMA with 0. If NOA is set to LOCAL or NET, datafill PFXAMA with N.

NSCCODE (continued)**Field descriptions for conditional data II (Sheet 13 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	PRIVL	Y or N	<i>Privileged user</i> If the value of subfield OSEL is PRIVL, enter Y (yes), if the user is a privileged user (for example, operator). Otherwise, enter N (no).
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field indicates how many digits to skip before extracting the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the CIC is signalled as part of the B number.
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, datafill this refinement. This field specifies the source of the CIC as follows: • PRESUB - presubscribed, the CIC is defined in table TRKGRP • DIALED - dialed, the CIC is entered by the subscriber when dialing a call
	STOPRTMR	Y or N	<i>Stop remote timer</i> Enter Y (yes) to disable the address complete message (ACM) timer of the remote switch. Default is N (no).
	XLAID	FREE, GENERIC1, GENERIC2, or GENERIC3	<i>AMA translation identifier</i> If the value of subfield OSEL is AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

XLASEL = TRMT

Route to specified treatment. A treatment is a known exception or failure condition. The action taken terminates translation, returning an indication that a treatment has been encountered and decoded into a route.

NSCCODE (continued)

If the value of subfield XLASEL is TRMT, datafill refinement subfield OPT as described below.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	<i>Options</i> This subfield is a list consisting of up to ten options. Each option consists of subfield OSEL. For each option, specify OSEL, followed by a space.
	OSEL	OFC	<i>Option selector</i> Enter OFC, followed by a space, and datafill subfield OFC, if a treatment name is required.
	OFC	alphanumeric (4 characters)	<i>Office treatment</i> Enter a treatment name that is contained in the office treatment subtable, TMTCNTL.TREAT.

Data II e xample

Refer to examples in the description of table ACHEAD.

Table history**MMP13**

Added entry CHGIND and explanation to selector DMOD for feature AU3510. Corrected weight of table line rules and removed double spaces in text throughout.

Increased maximum table size from 16 384 to 32 768 tuples.

APC010

Added field CHGIND to option TLC in the FEATINFO selector.

LET010

Added option EXTCIC to selectors CONT, DMOD, and RTE.

APC009

Added option NETSRV to selectors CONT and RTE.

Added option JES to selector FEATINFO.

NSCCODE (continued)

GL04.0

The field XLADATA was added for Japan CableTV trunks.

APC008.1

The following updates were introduced in APC008.1 to table AMHEAD:

- Field CHKCCR was added to all subscriber types (SUBSCTYP) that are part of the SUBSCRN option of selector FEATINFO VALIDATE.
- Field EARLYCPG was added to selector FEATINFO.
- Option IAA was added to selectors ROUTE and CONT.

GL04

The options CHGIND, ISUPPREF, and FLEXCHG were added to the RTE and CONT selectors.

Note: The FLEXCHG and ISUPPREF indicators are obsolete, and have been removed from the tables.

APC008

The following updates were introduced in APC007 to table ACCODE:

- option TRUNK was added to field CALLCLASS of option PRESEL of selector RTE
- option TRUNK was added to field CALLCLASS of option PRESEL of selector CONT
- option PRESEL was added to field VALDATOP in selector FEATINFO

APC007

The following updates were introduced to table AMHEAD in APC07:

- option PRESEL was added to selector RTE
- option PRESEL was added to selector CONT

APC006

Subscriber type PERSONAL added to option SUBSCRN of FEATINFO VALIDATE.

NSCCODE (continued)

NA005

The following updates were introduced to table AMHEAD in NA005:

- increased the number for universal translations support to 30 digits, affecting the following options, subfields or selectors:
 - ACF
 - AFTER
 - CONSUME
 - DEL
 - DMOD
 - DNRTE
 - INSRT
 - MAX
 - MIN
 - PF
 - REPL
- added option SF and its refinement SFDIGS to selector DNRTE
- added note about potential conflict with refinements CONSUME and PFDIGS

APC004

Features CALLBACK, CALLCHAR, CLCTDIGS, NTC, and TLC were added to the FTR field of selector FEATINFO.

Options CLDTOCLG, LCASCRN, TCNOTSCR, VERDEST, and V3PTYBIL were added to the VALDATOP subfield of selector FEATINFO.

Subfield CDN of selectors CONT and RTE was modified to incorporate subfields NOA, STOPRTMR, and PFXAMA.

BCS36

Option CUSTMOD was added to refinement VALDATOP for XLASEL set to FEATINFO.

NSCCODE (end)

BCS35

The following information was added:

- CGNDM to option selector OSEL and refinements PRDFXCLI and INSRTCLI
- field CONSUME
- CPMCALL to XLASEL set to CONT, RTE

NSCDEFS

Table name

Number Service Code Database Response Time-outs Table

Overview

The number service code (NSC) provides inward call management features requiring access to operating telephone company databases. The current implementations of the NSC are as follows:

- Enhanced 800 Service (E800) in a switch with feature package NTX554AA (CCS7—E800/SSP)
- 800 Plus Service (800+) in a switch with feature package NTX555AB (800 Plus)
- Private virtual network (PVN) service in a switch with any of the PVN packages
- Feature AG1247 (800+ Southbound Enhancements) in a switch with feature package NTX163BA (800 Plus Southbound)
- Enhanced 008 Service in a switch with feature package NTXH84AA (Enhanced 008 for Australia)

Note: An NSC (field NSCCODE) or an option (subfield OPTION) cannot be datafilled in table NSCDEFS unless the feature package supporting the NSC is installed.

Enhanced 800 Service

E800 is provided on a service switching point (SSP) office that communicates with operating company databases using Signaling System 7 (SS7). An SSP is a node in the SS7 network that launches queries to a database located at a service control point (SCP). An SSP can be either an access tandem (AT) or equal access end office (EAEO) in the equal access network.

Refer to figure 1 for details.

Number service code call translation

The call is recognized as an SSP E800 call during the translation stage by checking one or more of the following tables:

- STDPRTCT.STDPRT
- HNPACONT.HNPACODE
- NSCSCRN

NSCDEFS (continued)

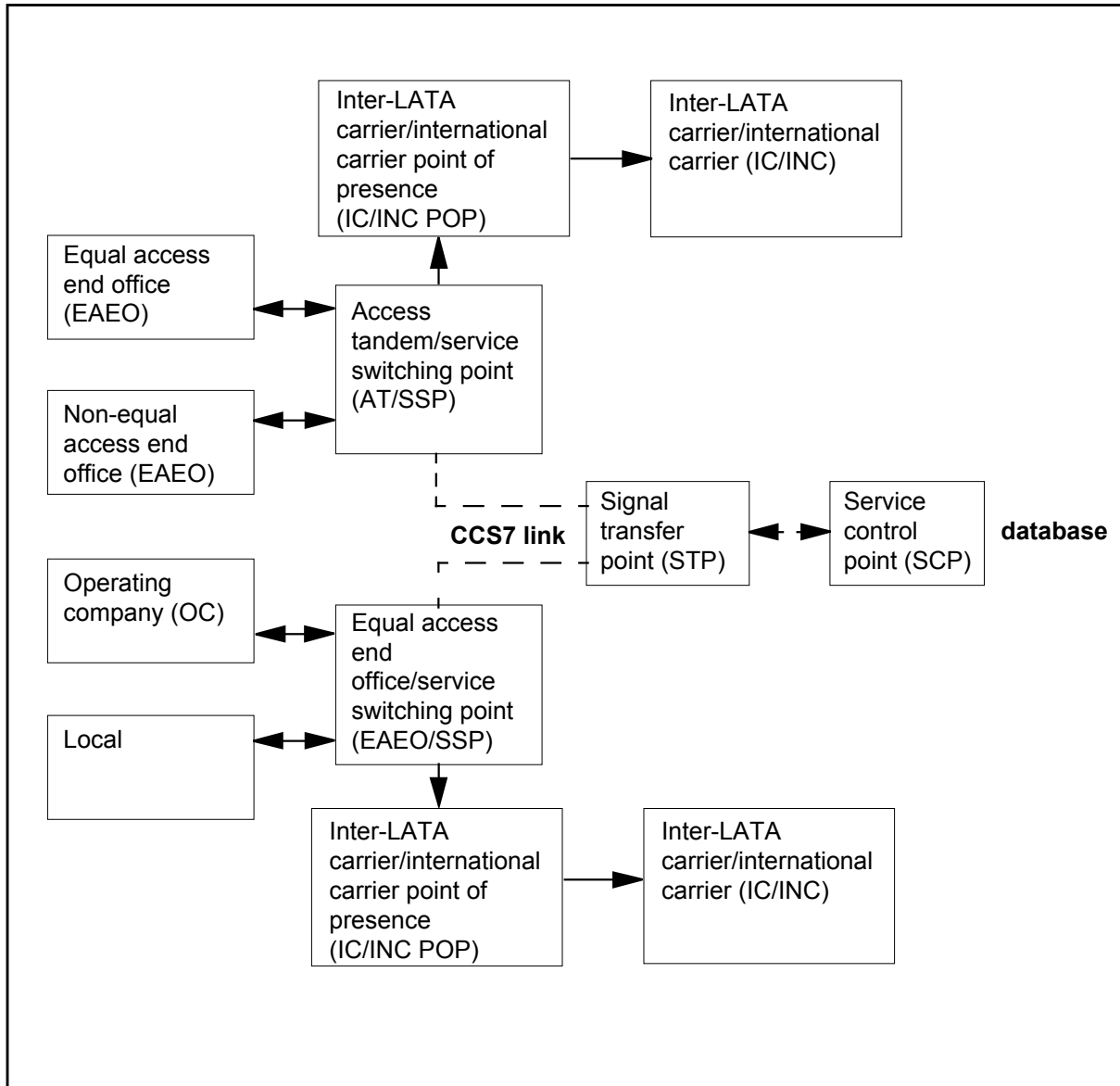
E800 calls dialed with a 10XXX prefix are blocked in an EAEO SSP if 800 is datafilled in table EASAC.

At the DMS Traffic Operator Position System (TOPS) AT SSP office, a 0-prefix NSC call is routed by TOPS using a loop-around intertoll (IT) trunk as a separate call. It is then treated as an E800 call.

At the DMS AT SSP office, operator identification is not provided on 800 calls from a non-EAEO over a centralized automatic message accounting (CAMA) trunk (SuperCAMA [SC or TOPS) if a multiparty indication (that is, information digit equals 1 or 4) or an automatic number identification (ANI) failure indication (that is, ANI information digit equals 2 or 5) is received. Operator identification is not provided on 800 calls received over an operator number identification (ONI) type CAMA trunk (SC or TOPS) from a non-EAEO.

800+ Southbound Enhancements

The 800 Plus Southbound feature package allows a U.S. customer to purchase 800 Service zone coverage in Canada and provides multiple carrier routing capability.

NSCDEFS (continued)**Number services architecture**

Note: STP and SCP cannot be in the same local access and transport area (LATA) as SSP.

Private virtual network (PVN) service

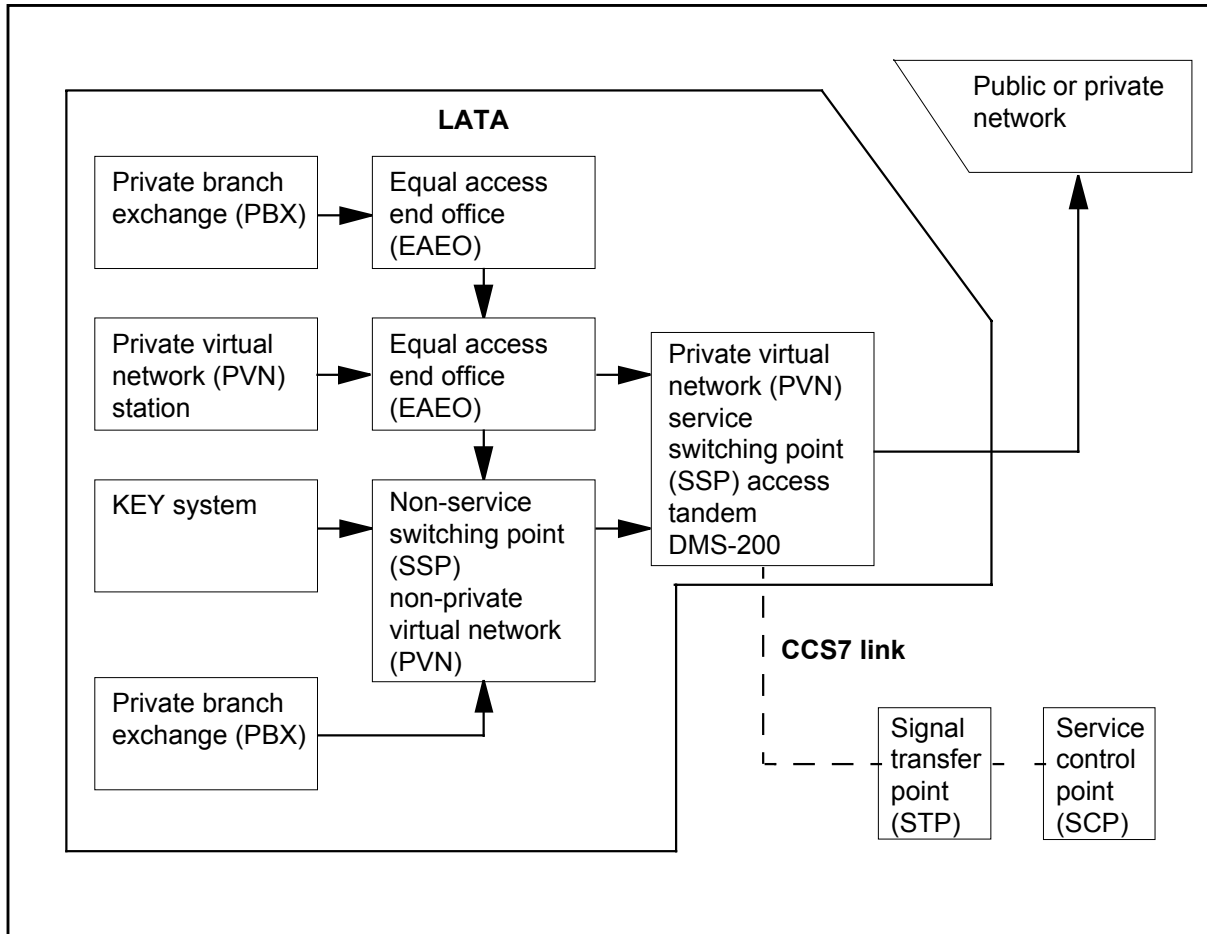
Private virtual network (PVN) service uses the public and private switched network to provide private network features and capabilities. It provides connections to subscribers within a LATA, and through inter-LATA carrier (IC) connections to subscribers in other LATAs.

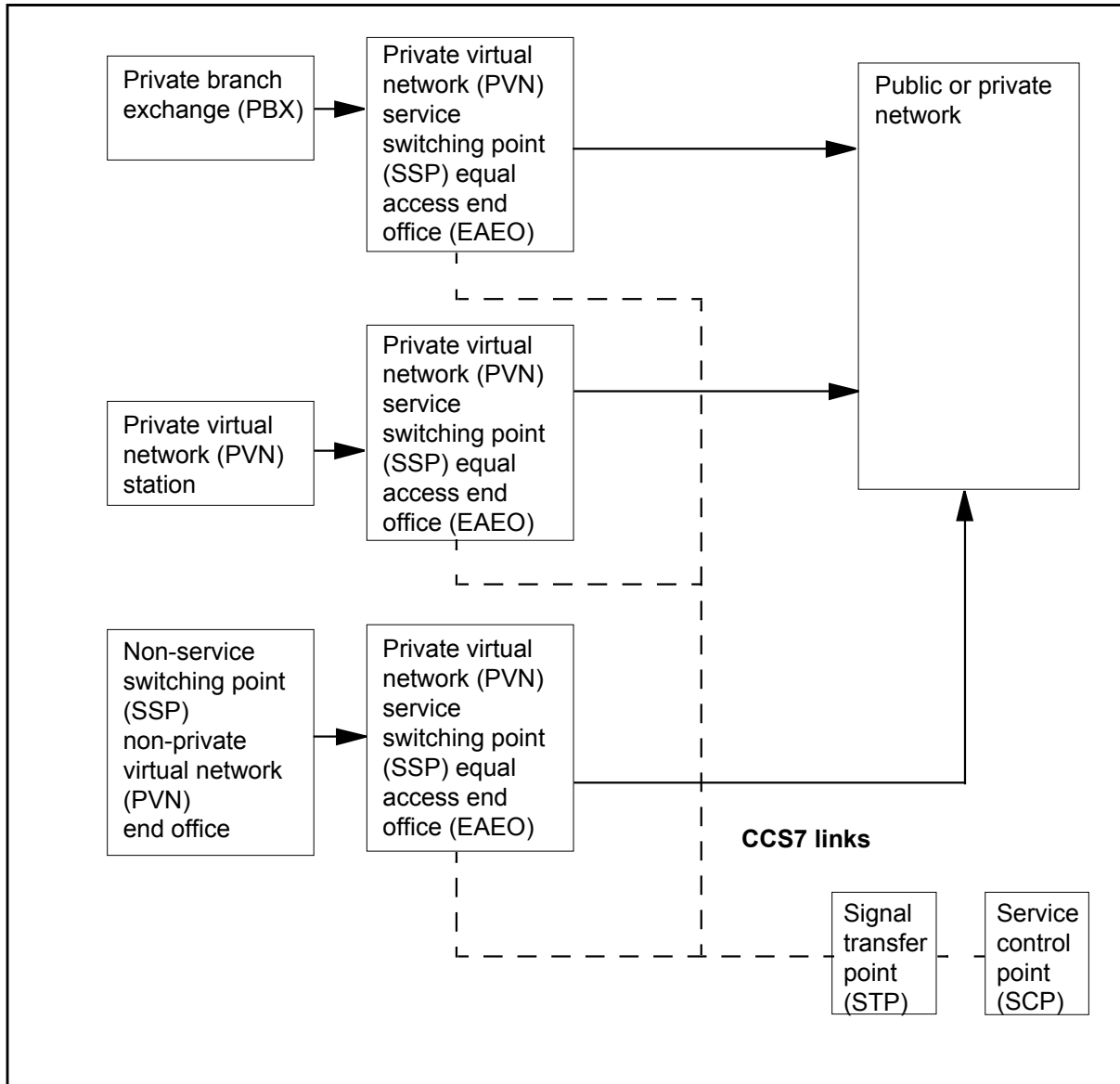
NSCDEFS (continued)

PVN service is implemented by means of operating company provided business services databases (BSDB) located at SCPs. A query is made on all PVN calls to one of these databases from a switch that is equipped with feature package NTX983AB (Service Switching Point Private Virtual Networking). Queries and responses between the PVN SSP and the SCP use the Common Channel Signaling 7 (CCS7) protocol. The response message from the BSDB indicates whether the call is completed, how it is routed, and what information is included in the automatic message accounting (AMA) record for the call. The response can also instruct the PVN SSP to obtain additional input from the caller such as an authorization code.

PVN is either applied to an access tandem (AT) or to an equal access end office (EAEO). If applied to the AT, it serves to concentrate PVN traffic. The CCS7 link is only from the AT to the SCP or STP as shown in figure 2. The PVN connection is actually an intra-LATA connection.

It is also possible to put the connections to the public or private network and the CCS7 link directly from the EAEO. In this case, the configuration is as shown in figure 3. The LATA border was removed because it does not have any effect on the network.

NSCDEFS (continued)**PVN through an access tandem**

NSCDEFS (continued)**PVN through an equal access end office (EAEO)****PVN SSP access types**

The PVN SSP supports access to PVN call translation from the following trunk groups as shown in figure 4:

- SuperCAMA (SC) trunk groups signaling feature group D
- IT trunk groups signaling feature group D
- Integrated Business Network (IBN) trunks
- IBN business group stations

NSCDEFS (continued)

- IBN attendant consoles
- dedicated IBN stations
- remote access lines or trunks

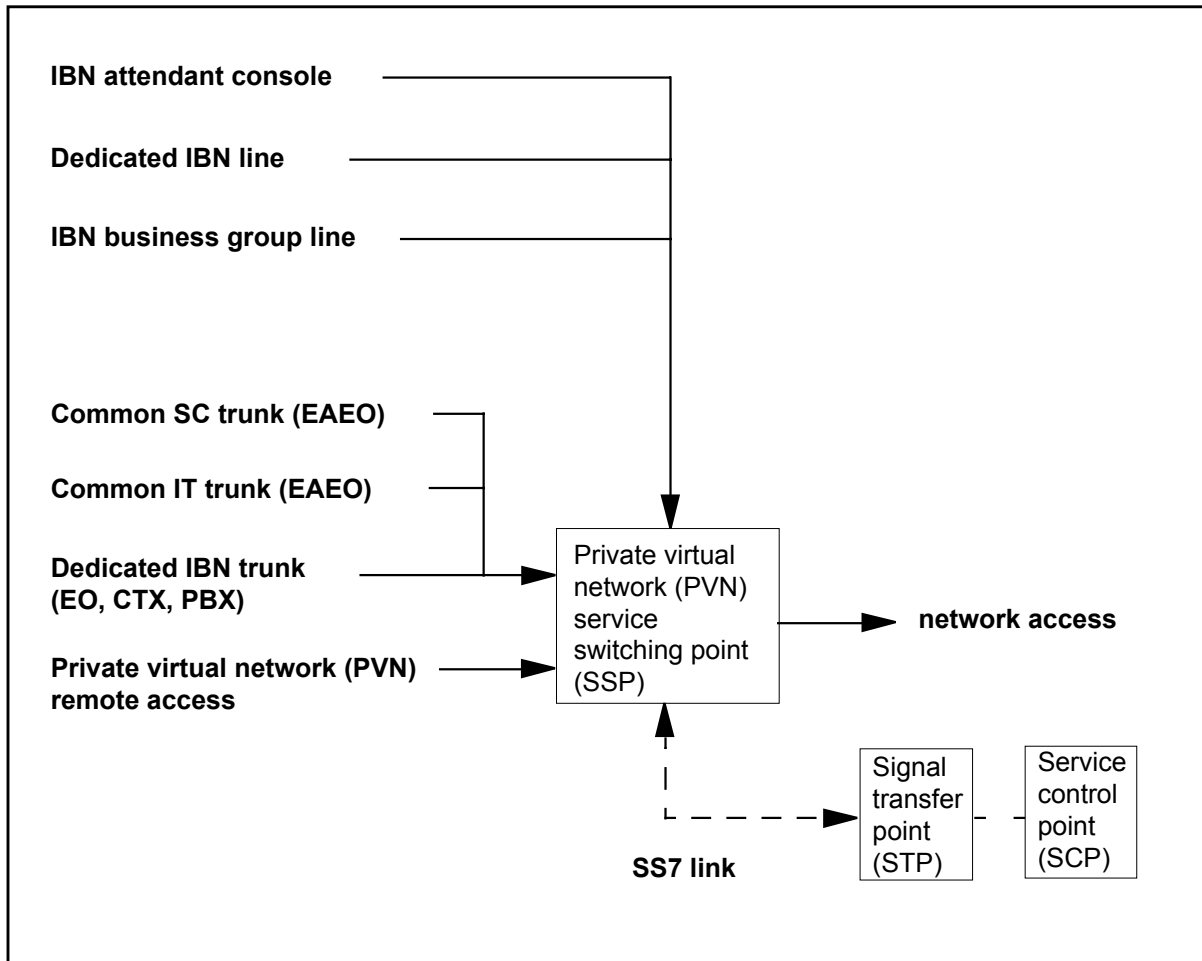
PVN SSP access types**Functional description**

Table NSCDEFS lists the SSP options assigned to each NSC service.

NSCDEFS (continued)

Data II sequence and implications

The following tables must be datafilled before table NSCDEFS:

- HNPACONT
- ANNS
- IBNRTE
- OFRT
- COSMAP
- STDPRTCT

If the tuple E008 is deleted from table NSCDEFS, all tuples using the NSCODE in tables NSCSCRN, STDPRT, or HNPACODE, or in international translation tables, are automatically deleted.

If option 4DGTCIC is added or deleted from table NSCDEFS, the E800 subsystem must be busied (BSY) and then returned to service (RTS) at the SCCPLOC (signaling connection control part location) level of the MAP (maintenance and administration position).

Table size

0 to 16 tuples

NSCDEFS (continued)**Data II**

The following table lists datafill for table NSCDEFS.

Field descriptions (Sheet 1 of 11)

Field	Subfield or refinement	Entry	Explanation and action
NSCODE		AIN, E008, E800, 800P, MAPHLR, PVN, REPLDIGS, VPN	<i>Number service code</i> Enter the NSC, the key into this table and table NSCSCRN referenced from subtable HNPACONT.HNPACODE.CD.NSCCODE or subtable STDPRTCT.STDPRT.PRERTSEL. NSCCODE as follows: Enter AIN for the Advanced Intelligent Network service in a switch with any of the AIN packages. Enter E008 for the Enhanced 008 Service in a switch with feature package NTXH84AA (Enhanced 008 for Australia). Enter E800 for the Enhanced 800 Service in a switch with feature package NTX554AA (CCS7—E800/SSP). Enter 800P for 800 Plus (800+) Service in a switch with feature package NTX555AB (800 Plus). Enter MAPHLR for the mobile application part home location register in a switch with feature package NTXU20AA (MAP Interworking to UK Signaling Systems). Enter PVN for private virtual network service in a switch with ay of the PVN packages. Enter REPLDIGS for the option of replacing dialed digits. Enter VPN for virtual private network service in a switch with feature package NTX554AA (CCS7—E800/SSP).

NSCDEFS (continued)**Field descriptions (Sheet 2 of 11)**

TIMEOUT	0 to 600	<i>Service switching point database response time-out</i> Enter the time, in seconds, to wait for a response from the service switching point (SSP) database. The default value is 3. Note 1: If the entry in field NSCODE is E800, the recommended value for field TIMEOUT is 3. Note 2: Any entry outside the range indicated for this field is invalid.
OPTIONS	see subfield	<i>Options</i> This field is a vector of up to 12 multiples of subfield OPTION and its refinements.
OPTION	10DGTRTG 4DGTCIC ALARMTIM AUTH CFCDA COMFORT CONATIM COSMAP INFO INTLACC NADDR NETWORK NSCALARM NSC0ZZ NSCOP0ZZ NSC1NX NSCNUM NSCOP1NX PRETRAN PVNANI- PVNSSP911 REPLACE RETMET SSPT2 STDACC VOLUNT-	<i>Option</i> Separate each subfield OPTION entry with a single space. If less than 12 options are required, end the list with a \$ (dollar sign). For E800 or PVN (AIN0.0) service only, enter 10DGTRTG to indicate that ten-digit routing is desired for all E800 and 800+ calls. If the option 10DGTRTG is not present, then all routing for E800 and 800+ or PVN (AIN0.0) calls is on a seven-digit basis. For PVN (AIN0.0), in the absence of ten-digit routing, routing is done on seven digits (excluding the numbering plan area [NPA]) if the NPA returned by the service control point (SCP) is the same as the home NPA of the calling party. This option is only valid on E800 or PVN (AIN0.0) service and results in an error if it is added to any other service. No further datafill is required. For E800 or PVN services only, enter 4DGTCIC to indicate that four-digit routing is desired. The E800 and PVN SSP can request four-digit carrier identification codes (CIC) to be returned from the SCP. No further datafill is required. For the Call Forwarding Conditional (CFC) feature for German operating companies using E008 service only, enter CFCDA (CFC Don't Answer) and datafill refinement CFCDA.

NSCDEFS (continued)**Field descriptions (Sheet 3 of 11)**

OPTION(continued)	Enter COMFORT if the office has the Comfort Tone feature for the NSC service (field NSCODE is set to E800, 800P, or PVN) to have comfort tone applied to the originating agent during database queries. If the entry in field NSCODE is PVN, and the agent is an Integrated Business Network (IBN) station or trunk and the customer group has the comfort tone exclusion option COMFEXCL datafilled in table CUSTHEAD, then the comfort tone is not applied. No further datafill is required. For E008 service in Australia only, enter CONATIM and datafill refinement CONATIM for a Call Overflow on No Answer condition. Enter COSMAP if the network class of service (NCOS) of a replace digits (REPLDIGS) call is to be sent with the dialed digits for a remote database query and datafill refinements COSMIN and COSMOUT. Option COSMAP does not work if field SEARCH is set to INSWITCH. It only works if field SEARCH is set to REMOTE or if field SEARCH is set to BOTH. If the entry in field NSCODE is E008, enter INTLACC (international access code) and datafill refinement INTLACC. If the entry in field NSCODE is MAPHLR, enter NADDR (nature of address) and datafill refinement NADDR.

NSCDEFS (continued)**Field descriptions (Sheet 4 of 11)**

OPTION (continued)	For E008 service in Australia only, enter NETWORK and datafill refinement NETWORK to specify if messages destined from the SSP to the SCP are to be encoded in the ANSI TCAP or in the ITU TCAP format. Enter NSC0ZZ (three-digit code starting with 0 [zero]) and datafill refinement NSC0ZZ. Enter NSCOP0ZZ for Number Service Code for Operator Assist for 0ZZ digits and datafill refinement NSCOP0ZZ. This specifies the 0ZZ digits for national operator assist calls. The datafill is a three-digit code starting with 0 (zero). The remaining digits can be in the 0-9 range. Note: Entry NSCOP0ZZ is only allowed when key NSCCODE is datafilled with AIN. Enter NSC1NX (three-digit code starting with 1) and datafill refinement NSC1NX. Enter NSCOP1NX for Number Service Code for Operator Assist for 1NX Digits and datafill refinement NSCOP1NX. This specifies the 1NX for international operator assist calls. The datafill is a three-digit code starting with 1. The second digit can be in the 2-9 range. The third digit can be in the 0-9 range. Note: Entry NSCOP1NX is only allowed when key NSCCODE is datafilled with AIN. If the entry in field NSCODE is E800 or 800P, enter NSCNUM (three-digit service code number) and datafill refinement NSCNUM. Option PRETRAN applies only to line originated E800 calls. This option controls the pretranslator used in translating the routing number received from the SCP in the response message, and also controls the types of calls to which the PRETRAN option applies. Datafill refinement PRETRAN. If the entry in field NSCODE is PVN, enter PVNANIINFO and datafill refinement ANIINFO.

NSCDEFS (continued)**Field descriptions (Sheet 5 of 11)**

OPTION (continued)	If the entry in field NSCODE is PVN, enter PVNSSP911 to route PVN calls with dialed digits equal to 911 at the SSP as if they were not PVN calls. If this option is not present, PVN calls with dialed number of 911 are routed by the service control point (SCP). No further datafill is required. If the entry in field NSCODE is VPN, enter RETMET and datafill refinement METER to decide if the metering indication field that is set in the ACM is set to TRUE or FALSE for VPN standard access calls. If the entry in field NSCODE is REPLDIGS, enter REPLACE and datafill refinements FAILRTE and SEARCH for the translation path required for the REPLDIGS option. If the entry in field NSCODE is PVN, enter SSPT2 and datafill refinement TIMEOUT. If the entry in field NSCODE is VPN, enter STDACC for VPN standard access code and datafill refinement CODE. If the entry in field NSCODE is PVN and the business services data base (DSDB) has the capability to handle unsolicited authorization (AUTH) codes, for the PVN voluntary (unsolicited) AUTH code to be entered by the PVN attendant upon caller's request, enter VOLUNTAUTH. No further datafill is required.
CFCDA 15 to 120	<i>Call forwarding conditional don't answer</i> If the entry in subfield OPTION is CFCDA, datafill this refinement. Enter the time, in seconds, that the CFC feature waits for an answer message.
CONATIM 1 to 120 (NA003-) seconds	<i>Call overflow on no answer timeouts</i> If the entry in subfield OPTION is CONATIM, datafill this refinement. Enter the length of time, between 1 and 120 seconds, for the Call Overflow on No Answer condition. Default value is 20.

NSCDEFS (continued)**Field descriptions (Sheet 6 of 11)**

COSMIN	alphanumeric (1 to 16 characters)	<i>Class of service map in</i> If the entry in subfield OPTION is COSMAP, datafill this refinement. Enter the class of service mapping used as an index into table COSDATA to get the local NCOS that corresponds to the network NCOS received in the database control point (DBCP).
COSMOUT	alphanumeric (1 to 16 characters)	<i>Class of service map out</i> If the entry in subfield OPTION is COSMAP, datafill this refinement. Enter the class of service mapping used as an index into table COSDATA to get the network NCOS that corresponds to the current local NCOS for the call.
INTLACC	numeric (1 to 5 digits)	<i>International access code</i> If the entry in subfield OPTION is INTLACC, datafill this refinement. This refinement is only applicable to the E008 Service. Enter a vector of one to five digits to define the NSC INTLACC register.
NADDR	INTL or NATL	<i>Nature of address</i> If the entry in subfield OPTION is NADDR, datafill this refinement. Enter the format of the number sent to home location register (HLR) database for query, INTL (international) or NATL (national). The default value is INTL.
NETWORK	ANSI7 CCITT7	<i>Network</i> If the entry in subfield OPTION is NETWORK, datafill this refinement to determine whether messages destined from the SSP to the SCP are to be encoded in the ANSI TCAP (ANSI7) or in the ITU TCAP (CCITT7) format. The default value is ANSI7.
NSCALARM	ON or OFF	<i>NSC alarm</i> If the entry in subfield OPTION is NSCALARM, datafill this refinement as ON or OFF. This refinement is only valid for E800, 800P, and E008 services. This refinement acts as a switch for the Freephone Alarm feature. The default value is ON.

NSCDEFS (continued)**Field descriptions (Sheet 7 of 11)**

ALARMTIM	1 to 1440	<i>NSC alarm</i> If the entry in subfield OPTION is ALARMTIM, datafill this refinement. This refinement is only valid for E800, 800P, and E008 services. This refinement indicates the duration of time, in minutes, between two SCP query timeouts that must occur in order for the Freephone Alarm feature to trigger the alarm. Enter a number of minutes from 1 to 1440. The default value is 10.
NSC0ZZ	numeric (0 to 9) (3 digits)	<i>Three-digit 0ZZ code</i> If the entry in subfield OPTION is NSC0ZZ, datafill this refinement. This refinement allows an operating company to customize the NSC code. Enter a three-digit code starting with 0 (zero). The second and third numbers can be any number between 0 and 9.
NSC1NX	numeric (2 to 9 or 0 to 9) (3 digits)	<i>Three digit-1NX code</i> If the entry in subfield OPTION is NSC1ZZ, datafill this refinement. This refinement allows an operating company to customize the NSC code. Enter a three-digit code starting with 1. The second digit must be in the range of 2 to 9. The third digit can be any number between 0 and 9.
NSCNUM	000 to 999 (3 digits)	<i>Three-digit service code number</i> If the entry in subfield OPTION is NSCNUM, datafill this refinement. Enter a three-digit service code number (for example, 800).
OCRTIME (-NA002)	1 to 10	<i>Overflow call routing time-out interval</i> If the entry in subfield OPTION is OCRTIME, datafill this refinement. Enter the OCRTIME time-out value, in seconds. Note: Canada only.
PRETRAN	see subfields	<i>E800 pretranslator</i> If the entry in subfield OPTION is PRETRAN, datafill this refinement. This refinement consists of subfields PERXLA, and CALLS.

NSCDEFS (continued)**Field descriptions (Sheet 8 of 11)**

PERXLA	NPRT, TOLL, or GWAY	<i>Pretranslator name</i> If the entry in subfield OPTION is PRETRAN, datafill this refinement. Enter the name of the pretranslator to be used by E800 to translate the routing number obtained from the database in response to a query.
CALLS	ALL, COIN, or GWAY	<i>Coin or all</i> If the entry in subfield OPTION is PRETRAN, datafill this refinement. Enter whether the pretranslator is to be used for coin originated calls, gateway calls, or all calls.
ANIINFO	00 to 99	<i>ANI information digits</i> If the entry in subfield OPTION is PVANIINFO, datafill this refinement. Enter 64, the hexadecimal code assigned to the ANI II digits for PVN. Note: Any entry outside the range indicated for this field is invalid.
FAILRTE	see subfields	<i>Replace dialed digits failure route</i> If the entry in subfield OPTION is REPLACE, datafill this refinement. This refinement consists of subfields TABNAME and SEARCH and specifies the replace-dialed-digits failure route identifier and its refinements. The route specified in this field is used if the database response does not contain a valid ten-digit called number. The corresponding routing reference must have a valid entry in subtable HNPACONT.RTEREF for the home numbering plan area (HNPA) code associated with the subtable.
TABNAME	AVTDATA, IBNRTE, IRTE, OFRT, SERVICE OVR0 to 9	<i>Routing table names</i> If the entry in subfield OPTION is REPLACE, datafill this refinement. Enter the route used for replacing dialed digits. If the entry in refinement TABNAME is IRTE, datafill refinements XLASYS, XLANAME, and RTEREF. If the entry in refinement TABNAME is OFRT or IBNRTE, datafill refinement INDEX. Note: Any entry outside the range indicated for this field is invalid.

NSCDEFS (continued)**Field descriptions (Sheet 9 of 11)**

INDEX	0 to 1023	<i>Routing index</i> If the entry in subfield OPTION is REPLACE, and the entry in refinement TABNAME is OFRT or IBNRTE, datafill this refinement. Enter the routing index for replacing dialed digits.
XLASYS	AC, AM, CT, FA, FT, NIL, NSC, OFC, PX	<i>Translation system</i> If the entry in subfield OPTION is REPLACE, and the entry in refinement TABNAME is IRTE, datafill this refinement. Enter the translation system (XLASYS) that the replacement of dialed digits process is routed to. Datafill refinements XLANAME and RTEREF. • AC (access) • AM (ambiguous) • CT (country) • FA (foreign area) • FT (utility) • NIL • NSC (number service code) • OFC (office) • PX (prefix)
XLANAME	alphanumeric (1 to 8 characters) or NIL	<i>Translation name</i> If the entry in subfield OPTION is REPLACE, and the entry in refinement TABNAME is IRTE, datafill this refinement. Enter the replace-dialed-digits translation name. This XLANAME must be datafilled in table NSCHEAD.
RTEREF	0 to 1023	<i>Routing index</i> If the entry in subfield OPTION is REPLACE, and the entry in refinement TABNAME is IRTE, datafill this refinement. Enter the route reference index for replacing dialed digits.

NSCDEFS (continued)**Field descriptions (Sheet 10 of 11)**

SEARCH	BOTH INSWITCH or REMOTE	<i>Replace dialed digits database search parameters</i> If the entry in subfield OPTION is REPLACE, datafill this refinement. Enter the database search parameters with refinements. For REMOTE and BOTH database searching, datafill refinements CLNGADDR and CLDADDR. For INSWITCH searching, no further datafill is required.
CLNGADDR	0 to 9 (up to 10 digits)	<i>Calling address</i> If the entry in subfield OPTION is REPLACE, and the entry in refinement SEARCH is BOTH or REMOTE, datafill this refinement. Enter the calling address of the remote database. This address is used by the signaling connection control part (SCCP) portion of the database query sent by the SSP. The address represent the SCCP addresses if transaction capability application part (TCAP) messages are sent across the network.
CLDADDR	0 to 9 (up to 10 digits)	<i>Called address</i> If the entry in subfield OPTION is REPLACE, and the entry in refinement SEARCH is BOTH ore REMOTE, datafill this refinement. Enter the called address of the remote database. This address is used by the SCCP portion of the database query sent by the SSP. The address represent the SCCP addresses if TCAP messages are sent across the network.
METER	CHG or NOCHG	<i>Metering indication</i> If the entry in subfield OPTION is RETMET, datafill this refinement. For standard access calls only, enter CHG for the adjunct call module (ACM) returned to the previous switch to have the metering indication field set to TRUE. Otherwise, enter NOCHG.

NSCDEFS (continued)**Field descriptions (Sheet 11 of 11)**

TIMEOUT	numeric (0 to 32 767)	<i>Private virtual network T2 time-out</i> If the entry in subfield OPTION is SSPT2, datafill this refinement. Enter the PVN T2 time-out value, in seconds.
CODE	numeric (0 to 11 digits) or \$	<i>VPN standard access code</i> If the entry in subfield OPTION is STDACC, datafill this refinement. Enter the digit string to be in front of the dialed digits in the initial address message (IAM/IAI) of all standard access calls. Enter \$, for a NIL digit string, for all calls that come in on Integrated Business Network (IBN) Australian telephone user part (ATUP) trunks with the field OFFNTAC in table TRKGRP set to VPN to be translated as VPN standard access calls.

Data example

The following example shows sample datafill for table NSCDEFS.

MAP display example for table NSCDEFS

NSCODE TIMEOUT		OPTIONS	
VPN	0	(STDACC 99) (RETMET CHG) \$	

Table history**NA007**

Added options NSCOP0ZZ and NSCOP1NX and their refinements.

NA006

The following changes were implemented:

- Option NSCALARM was added. This option indicates whether the Freephone Alarm feature is set ON or OFF. This option is only valid for E800, 800P, and E008 services.
- Option ALARMTIM was added. This option indicates the duration of time between two SCP query timeouts that must occur for the Freephone

NSCDEFS (end)

Alarm feature to trigger the alarm. This option is only valid for E800, 800P, and E008 services.

NA005

Added option NETWORK to specify which network the E008 service is to use to send queries to the SCP in accordance with SSP E008 Support for CCITT TCAP.

NA003

The following changes were implemented:

- Option OCRTIME was deleted.
- Option CONATIM was added.

BCS36

The following changes were implemented:

- Recommended default value for field TIMEOUT if field NSCODE is set to E800 was added.
- Options 4DGTCIC and CFDA were added.
- Explanations of options NSC0ZZ, NSC1NX, and PRETRAN were added.
- Refinement ANNCLLI for options PVNANNA, PVNANNB, PVNANNC, and PVNANND (removed in BCS35) was removed.
- Reference to table TRKGRP in refinement CODE for option STDACC was added.
- Entries in refinement XLASYS were clarified.
- Refinement REPLACE was removed and replaced with refinement FAILRTE for option REPLACE.
- Reference to PVN (AIN0.0) for E800 services for option 10DGTRTG was added.
- Refinements COSMIN and COSMOUT for option COSMAP were added.

NSCHEAD

Table name

Number Service Code Head Table

Functional description

Table NSCHEAD is one of a group of tables used to implement the Number Service feature. Number services provide inward call management features that require the dialing of special numbers.

Mobile Application Part Service (MAP) and Enhanced 800 Service (E800) are examples of number services requiring access to a database for call processing information.

Number services are provided using Northern Telecom service switching Point (SSP) and service control point (SCP) systems. The SSP and SCP use Common Channel Signaling 7 protocols (CCS7). CCS7 allows calls to be held while requests are sent to a database for call processing information.

For option selector CAMA, used in translation selectors CONT, DNRTE, and RTE, set office parameter ICAMA_REQUESTED in table OFCVAR to Y (yes) if ICAMA detailed call recording is required.

An IAA record can be generated by selecting office parameter IAA_REQUESTED in table OFCVAR, and the CAMA selector.

Only ANI and MTR trunk group originations currently support the option selector CAMA. All other call types ignore this translation option.

Office parameter IMEI_ACCEPTABLE_FOR_EMRG_CALL in table OFCVAR provides an option for the network operator to accept emergency call setups from mobile stations that transmit the IMEI instead of the IMSI or TMSI. The default value allows emergency call set ups with IMEI as the identifier if for example, no SIM is present.

For emergency call translation, class EMRG must be datafilled. The datafilling of class EMRG can be done before or after translation selector DMOD with option selector COODM. This requirement differentiates between normal mobile originated calls and emergency calls set up by a conventional SETUP message.

Data II sequence and implications

Table NSCDEFS must be datafilled before table NSCHEAD.

NSCHEAD (continued)**Table size**

There is a maximum of 28 671 entries for each table, with a maximum of 2047 tuples for each subtable. Memory is allocated when XLANAME is datafilled into the head table. The size is altered dynamically as tuples are added or deleted.

The head tables define the instances of code and route tables and their characteristics. All head tables, described in this section, have an identical format for the options they contain.

A tuple in a head table consists of the name of the code, the route table instance, and some or all of the options listed below:

- DFLT <a code table tuple>
- DFOP <code table options>
- CON
- MAXIDX <hex digit>

Data II

The following table lists datafill for table NSCHEAD.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
XLANAME		alphanumeric (1 to 8 characters)	Translation name. Enter the name assigned to the universal translator.
CONTMARK		+	Continuation mark. Enter + to indicate that additional information for this tuple is contained in the next record.
DFLT		see subfield	Default translations data. This is the result that translation uses if the dialed digits are not datafilled in the code table associated with table NSCHEAD. This field consists of subfield DFLTSEL and refinements dependent on the entry in field DFLTSEL.

NSCHEAD (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	DFLTSEL	SDFLT or DFLT	Default selector. Enter the default selector. Enter SDFLT if a standard default is required for dialed digits not found in the code table. The standard default is TRMT OFC VACT. That is if dialed digits are not found in the code table, the call is routed to vacant code treatment. No additional subfields are required. Enter DFLT and datafill subfield XLASEL and refinements if the standard default is not correct.
	XLASEL	CONT, DBQ, DMOD, DNRTE, FEAT, FEATINFO, HRC, IAC, RTE, or TRMT	Translation selector. Enter one of the following values and datafill field OPT (field OPT is a vector and must be ended by a \$): Enter CONT and datafill subfield OPT if further translation is required. Enter DBQ and datafill subfield OPT to perform a database query. Enter DMOD and datafill subfield OPT if input digit stream modification is required. Enter DNRTE and datafill subfield OPT if input digit routing is required. Enter FEAT and datafill subfield OPT if access to a feature is required. Enter FEATINFO and datafill subfield FTR to trigger the screening function. Enter HRC and datafill its refinements if the home routing code selector is required for local number portability applications. Enter IAC and datafill subfield OPT if the insertion of own area code is required when an ambiguous area code is found through translations.

NSCHEAD (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	DFOP	DFOP or NODFOP	Enter RTE and datafill subfield OPT if a translation result has been found, and translation is to terminate. Enter TRMT and datafill subfield OPT if a call is routed to a treatment. Each entry in XLASEL together with its options is described below. Default options. Enter DFOP and datafill subfield OSEL and its refinements. The default options apply only if a tuple with field XLASEL set to RTE or CONT is chosen in the CODE table. If the entry in field DFOP is equal to DFOP, this field is a vector that consists of a number of options. Each option, consisting of subfield OSEL and refinements dependent on the entry in subfield OSEL, is separated from the next by a space. The various refinements are identical to the refinements described in field DFLT, selector CONT, subfield OSEL. For each option, specify the option selector, followed by a space, and the refinements, with each refinement separated from the next by a space. The entry is concluded by a \$ and datafill continues with field CON.

XLASEL = CONT

If the entry in field XLASEL is CONT, datafill the following subfields.

NSCHEAD (continued)

Table AMAXLAID must be datafilled prior to selecting option AMAXLAID.

Field descriptions for conditional data II (Sheet 1 of 13)

Field	Subfield or refinement	Entry	Explanation and action
OPT		see subfields	Options. This field is a vector consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, and the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	ACF, AMAXLAID, CALLCTRL, CAMA, CDN, CDNRTE, CHGIND, CLASS, CLIOVRD, CONSUME, CPCRTE, CPMCALL, DDIDX, DEST, EXTCIC, IAA, LNET, MM, MZONE, NETSRV, OSS, PCC, PF, PRESEL, PRIVL, QFT, SETCDN, TOC, VPN, or XLT	Option selector. The following options can be selected: Enter ACF, followed by a space, and datafill subfield ACF if the area code fence is defined. Enter AMAXLAID, followed by a space, and datafill subfield XLAID to specify an automatic message accounting (AMA) identity from within table AMAXLAID. Enter CALLCTRL, followed by a space, and datafill subfield CALLCTRL. The entry in subfield CALLCTRL indicates who has control of the call: the calling party, the called party, or both.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the International automatic message accounting (ICAMA) record is generated with the the originally-signaled directory number (DN) or the final Public Switched Telephone Network (PSTN) number. Enter CDN, followed by a space, and datafill subfield CDN to select the nature of address field. This field is used to identify the called party of the initial address message (IAM). It is used for Australian ISDN user part (AISUP) call translations. Enter CDN RTE to route using the called number name (CDNNAME) from table CDNCHAR. If the CDNNAME is present on the incoming call or is set by the SETCDN option, translation proceeds to table CDNUXLA. CHGIND indicates whether to override the value of the charge indicator in the Backward Call indicators. The CHGIND option applies only to JCTV loads. Enter CLASS, followed by a space, and datafill subfield CLASS if the class of the dialed digits can be determined. Enter CONSUME, followed by a space, and datafill subfield CONDIGS to specify the number of digits that are consumed during translation. Enter CPC RTE to route using the calling party category (CPCNAME) from table CPCCHAR. If the CPCNAME is present on the incoming call, translation proceeds to table CPCUXLA.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CPMCALL, followed by a space, and datafill subfield CPMCALL to specify call billing against the called party instead of the calling party for intra-office calls. Enter DDIDX, followed by a space, and enter data for refinement DDIDX. Enter data for this subfield for the destination discount index. Enter DEST, followed by a space, and datafill subfield DEST if the destination is known. Enter EXTCIC, followed by a space, and enter data for refinements CICSIZE, SKIPDIGS, or SOURCE. Enter EXTCIC for the external carrier identification code Enter IAA and the datafill refinement IAA_INDEX to generate or modify IAA message parameters based on datafill in table IAACTRL. Enter LNET, followed by a space, and datafill subfield LNET if a logical network is required, for metering. Enter MM, followed by a space, and datafill subfields MIN and MAX if the minimum and maximum dialed digits are known. Enter MZONE, followed by a space, and datafill subfield MZONE if metering is to be done on the call. Enter NETSRV and datafill refinement NETSRV_NAME to indicate a Japan network service. Enter OSS for the operator signaling service. The OSS subfield does not have refinements. Enter PCC, followed by a space, and datafill subfield PCCDR if a pseudo country code is required.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 4 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter PNRF to invoke the ported number recognition function, which is used for LNP applications in Germany. The PNRF option does not require any subfields. Enter PRESEL, followed by a space, if the call is to be treated as a preselected carrier case. Enter PRIVL, followed by a space, and datafill subfield PRIVL if the user is a privileged user (for example, operators). Enter QFT followed by ON or OFF to indicate if an outgoing route is capable of QSIG Feature Transparency. Note: The QFT ON option must not be added to a route unless the far-end node is QFT-capable. Enter SETCDN to trigger the setting of outgoing called party characteristics. This option assigns the called number name (CDNNAME) from table CDNCHAR to the call. If the CDNRTE option is subsequently encountered, the CDNNAME is used to route the call. You can use the SETCDN option to allow CDN routing when incoming agents such as DPNSS or BTUP are not available in table CDNCHAR. Enter TELETAXE. This subfield does not have refinements. Enter TOC, followed by a space, and datafill subfield CHG, for the type of charge if the type of charge messaging is selected.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 5 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter VPN, followed by a space, and datafill subfields ONNET and BILLABLE if the call routes through a service switching point (SSP) and the Australian VPN - SSP software package (NTXH49AA or NTXH49AB) is in the switching unit.
			Enter XLT, followed by a space, and datafill subfield XLASYS if the call is to proceed to another translation system.
	ACF	0 to 29	Area code fence. If OSEL = ACF, enter the number of digits between the beginning of the digits to currently index the table, and the end of the area code.
	BILLABLE	Y or N	Virtual private network billable call. If OSEL = VPN, enter Y (yes) if an automatic message accounting (AMA) record is required for each VPN call. Otherwise enter N (no). An AMA record is not generated if an address complete message (ACM) of address complete, no charge is returned, or if the call terminates in the SSP on a line with the free number terminating (FNT) option.
	CALLCLASS	PRESELECT, OVERRIDE, CSN, TRUNK	Preselection call processing. If the entry in subfield OSEL is PRESEL, datafill this refinement. Enter the preselection call class type that is associated with the call. Note: Calltype CSN and TRUNK are available under the PRESEL option. These call classes are not needed for German Carrier Selection, and are not supported. The same applies to the Continue option of CONT. For the German market only NOCONT is supported.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 6 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	CALLCTRL	CALLING, CALLED, or MUTUAL	Call control. If OSEL = CALLCTRL, enter one of the three following values to specify the party who has control of the call. If the entry is CALLING and the calling party goes onhook first, the call is released immediately. If the called party goes onhook first, the called party is allowed to reanswer within a datafilled reanswer time out or until the calling party goes onhook. If the time out expires or if the calling party goes onhook, the calling party releases the call and the called party is set to idle. If the entry is CALLED and the called party goes onhook first, the call is released immediately. If the calling party goes onhook first and does not reanswer, the connection is not released until the called party goes onhook. There are no time outs, and the calling party is allowed to reanswer until the called party goes onhook. If the entry is MUTUAL and either party goes onhook the call is released immediately. Note 1: Calls to lines with the ESG option must have CALLCTRL(CALLED). Note 2: Calls terminating on an International Traffic Operator Position System (ITOPS) must have CALLCTRL(CALLED).
	CDNNAME	alphanumeric string	If the entry in subfield OSEL is SETCDN, enter data for refinement CDNNAME. Enter CDNNAME to route the call using a called number name from table CDNCHAR.
	CHG	SEND_CHARGE or SEND_NO_CHARGE	Charge. If OSEL = TOC, enter SEND_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_CHARGE. Enter SEND_NO_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_NO_CHARGE.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 7 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	CHGIND	ASIS, CHG, NOCHG	Datafill the CHGIND field with the following values: • ASIS-treat charge indicator as is • CHG-treat charge indicator as charge • NOCHG-treat charge indicator as no charge
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits in the CIC. This field operates on the B (called) number, so it is assumed that the switch signals the CIC as part of the B number. The MAP display indicates the range is 0 to 4. The system does not allow a 0 entry.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 8 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	CLASS	ATT, CNTL, COLL, DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, or UNKW	Translation class. If OSEL = CLASS, enter the translation class determined by the dialed digits. This can be used for screening or billing purposes as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • AGRP (inter-agent group) • CNTL (inter-continental) • INTL (international) • OPRA (international operator assisted) • LCL (local) • NATL (national) • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)
	CLDFMT	CURRENT or POSTXLA	Called format. If OSEL = CAMA, enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation). If the entry is POSTXLA, an ICAMA record is produced with PSTN number resulting from translations.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 9 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	CLIOVRD	CNA, CNB	Calling line identity override. If the entry in subfield OSEL is CLIOVRD, enter data for this refinement. Enter CNA to allow the calling number for each call. Enter CNB to block the calling number for each call.
	CONDIGS	numeric (0 to 29 digits)	Consumed digit. If OSEL = CONSUME, enter a 0- to 11-digit number to explicitly define the number of digits consumed during call processing.
	CONTINUE	CONT, NOCONT	Continue. If the entry in subfield OSEL is PRESEL, enter data for this refinement. Enter CONT to continue translations through UXLA. Enter NOCONT to route translations through PCIXLA or PCITRK.
	CPMCALL	Y or N	Called party metering. If OSEL = CPMCALL, enter Y (yes) if calls are billed against the called party for intra-office calls. Enter N (no) for the default value of billing against the calling party for intra-office calls.
	DDIDX	1 to 63 or DEFAULT	Destination discount index. If the entry in subfield OSEL is DDIDX, enter data for this refinement. Enter the destination discount index number from table ACOPT.
	DEST	0 to 1023	Destination route. If OSEL = DEST, enter the number in the route list, of the same translation system, that the call is routed to.
	IAA_INDEX	0 to 1024	Interadministration accounting index. If the entry in subfield OSEL is IAA, datafill this refinement. Enter the value that indexes the corresponding tuple in table IAACTRL.
	LNET	alphanumeric (1 to 16 characters)	Logical network. If OSEL = LNET, enter the logical network name that the call is on. The logical network name must have been previously datafilled in table LNETWORK. The entry in this field is used by the international metering system to determine a tariff for the call.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 10 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	MAX	0 to 30	Maximum digits. If OSEL = MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	Minimum digits. If OSEL = MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MZONE	0 to 63	Metering zone. If OSEL = MZONE, enter the metering zone of the call, in the logical network as defined by selector LNET. The entry in this field is used by the international metering system to determine a tariff for the call.
	NETSRV_ NAME	IPHS, DPHS, MOBILE, DA, TELEGRAM, or NCC	Network service name. If the entry in subfield OSEL is NETSRV, datafill this refinement. The entry in this field determines the parameters in an outgoing IAM message. Enter IPHS to indicate a call to an independent personal handyphone system subscriber. Enter DPHS to indicate a call to a dependent personal handyphone system subscriber. Enter MOBILE to indicate a call to a mobile subscriber. Enter DA to indicate a call to the directory assistance operator. Enter TELEGRAM to indicate a call to the Telegram office. Enter NCC to indicate a call routed to one of the following networks: • New Common Carrier serving international toll traffic • New Common Carrier serving national toll traffic

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 11 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	NOA	INTL, LOCAL, NATL or NET	Nature of address. Enter the required called party nature of address. • INTL (international) • LOCAL (local) • NATL (national) • NET (Intelligent Network Services)
	ONNET	Y or N	Call on virtual private network. If OSEL = VPN, enter Y if the call stays within the defined virtual private network. Otherwise enter N (no). Overlapped outpulsing is only supported on off-network calls. Calls processed without the ONNET subfield set to Y are off-network calls. Meridian digital centrex (MDC) calls are treated as off-network calls, and therefore overlapped outpulsing is supported for MDC calls.
	PCCDR	000 to 999	Pseudo country code digits. If OSEL = PCC, enter the three-digit pseudo country code (PCC). If a two-digit PCC is required, it must be padded by a leading zero. Note: The pseudo country code is used to record a particular pseudo country code. This can be extracted for use by system logic later, for example, two-stage outpulsing.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table. Note: If refinements PF and CONSUME are both datafilled for the same tuple, only the entry for the greater of the two values is processed; the other entry is ignored.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 12 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	PFXAMA	0 to 4 digits, or N	Called party number prefix in AMA. If NOA is set to NTL, datafill PFXAMA with 0011. If NOA is set to NATL, datafill PFXAMA with 0. If NOA is set to LOCAL or NET, datafill PFXAMA with N.
	PRIVL	Y or N	Privileged user. If OSEL = PRIVL, enter Y (yes) if the user is a privileged user (for example, operator). Otherwise enter N (no).
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits to skip before removing the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the system signals the CIC as part of the B number.
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field specifies the source of the CIC as follows: - PRESUB - presubscribed. Table TRKGRP contains the definition of the CIC. - DIALED - dialed. The subscriber enters the CIC when dialing a call.
	STOPRTMR	Y or N	Stop remote timer. Enter Y (yes) to disable the address complete message (ACM) timer of the remote switch. Default is N (no).
	XLAIID	FREE, GENERIC1, GENERIC2, or GENERIC3	AMA translation identifier. If OSEL = AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 13 of 13)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASYS	AC, AM, CT, DN, FA, FT, NIL, NSC, OFC, or PX	Translation system. If OSEL = XLT, enter the next translation system to use, followed by a space, and datafill subfield XLANAME (the instance of the translation system). The choice of translation systems are: • AC access • AM ambiguous • CT country • DN directory number • FA foreign area • FT utility • NIL • NSC number service code • OFC office • PX prefix Note: The XLASYS value NIL must not be datafilled by the operating company. NIL is only used to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. If OSEL = XLT, enter the translation name of the table instance within the XLASYS that the call is routed to.

NSCHEAD (continued)**XLASEL = DBQ**

If the entry in field XLASEL is DBQ, datafill the following subfields.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	Options. This subfield is a vector consisting of up to 10 options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, then the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	MM, NSC, or PF	Option selector. The following options can be selected: Enter MM, followed by a space, and datafill subfields MIN and MAX if the minimum and maximum dialed digits are known. Enter NSC, followed by a space, and datafill subfield NSCODE if a number service code operation is to be performed on a call. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream.
	MAX	0 to 30	Maximum digits. If OSEL = MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	Minimum digits. If OSEL = MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	NSCODE	AIN, 800P, E008, E800, MAP_HLR, MAP_MSC, MAP_VLR, MAPHLR, PVN, REPLDIGS, or VPN	If OSEL = NSC, enter the required number service operation to be performed on the call. • AIN is for advanced intelligent network service. • 800P is for the 800+ service. • E008 is for the enhanced 008 service. • E800 is for the enhanced 800 service. • MAP_HLR is for Mobile Application Part Home Location Register. • MAP_MSC is for Mobile Application Part Mobile service Switching Center. • MAP_VLR is for Mobile Application Part Visitor Location Register. • MAPHLR appears only if the package for MAP HLR Database Query service is on the switch. • PVN is for private virtual network service. • REPLDIGS is for replace digits service. • VPN is for Australian virtual private network service. All entries for field NSCODE must first be datafilled in table NSCDEFS, field NSCODE.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table.

NSCHEAD (continued)**XLASEL = DMOD**

If the entry in field XLASEL is DMOD, datafill the following subfields.

Field descriptions for conditional data II (Sheet 1 of 6)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	Option. This subfield is a vector consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, and the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	AFTER, CDNRTE, CGNDM, CONSUME, COODM, CPCRTE, DEL, EXTCIC, INSRT, PF, RBP, REPL, SETCDN, VPNREPL, VPNXLT, or XLT	Option selector. The following options can be selected: Enter AFTER, followed by a space, and datafill subfield AFTER if a certain number of digits must be skipped before modifying the digit stream. Enter CDNRTE to route using the called number name (CDNNAME) from table CDNCHAR. If the CDNNAME is present on the incoming call or is set by the SETCDN option, translation proceeds to table CDNUXLA. Enter CGNDM, followed by a space, and datafill subfields PREFXCLI and INSRTCLI to remove digits from the Calling Line Identifier (CLI) and insert a datafilled digit in the prefix string. The total length of the string can be up to 18 digits. A modified CLI and digit string greater than 18 digits routes the call to treatment. Enter CONSUME, followed by a space, and datafill subfield CONDIGS to specify the number of digits that are consumed during translation.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 6)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter COODM, followed by a space, and datafill subfield SERVICE to replace the dialed emergency code by the emergency number stored in table LAC. Option selector COODM must be combined with the XLT option to guarantee that translation continues with the modified number. Selector COODM cannot be combined with any other option. Enter CPCRTE to route using the calling party category (CPCNAME) from table CPCCHAR. If the CPCNAME is present on the incoming call, translation proceeds to table CPCUXLA. Enter DEL, followed by a space, and datafill subfield DELDIGS if digits are to be deleted, after skipping over digits to be left unprocessed. Enter EXTCIC, followed by a space, and enter data for refinements CICSIZE, SKIPDIGS, and SOURCE. The EXTCIC subfield is the external carrier identification code that indicates a long distance carrier in the global environment. This option is supported for TOPS calls. Enter INSRT, followed by a space, and datafill subfield INSRDIGS if digits are to be inserted, after skipping over digits to be left unprocessed. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter RBP without refinements. The entry RBP is used when a call is to be marked as Ringback Price. The RBP entry in table ACCODE suffixes a hexadecimal E to the calling digits for a call that translates using a tuple with the RBP option.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 6)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter REPL, and datafill subfield REPLDIGS if the whole digit stream, after skipping over digits to be left alone, is to be replaced. Enter SETCDN to trigger the setting of outgoing called party characteristics. This option assigns the called number name (CDNNAME) from table CDNCHAR to the call. If the CDNRTE option is subsequently encountered, the CDNNAME is used to route the call. You can use the SETCDN option to allow CDN routing when incoming agents such as DPNSS or BTUP are not available in table CDNCHAR. Enter VPNREPL to replace the called party digits with the VPN called party digits conveyed across the public network by the QSIG Feature Transparency mechanism. Enter VPNXLT to replace the current translation system and translation name with the values stored in table BGIDMAP. The entry to table BGIDMAP is addressed by the NNI BGID and SIGNIFICANCE information received in the originating signaling for the call. Note: The VPNXLT and XLT options must not both exist in the same tuple. Enter XLT, followed by a space, and datafill subfield XLASYS if the call is to proceed to another translation system.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 4 of 6)**

Field	Subfield or refinement	Entry	Explanation and action
	AFTER	0 to 18	After. If OSEL = AFTER, enter the number of digits to skip before doing the modification. The default case is to calculate the new prefix fence, and replace, insert or delete digits after the fence (for example, starting at the next digit). Option after is an additional number of digits to skip before doing the modification. Option after refers to the option datafilled immediately before it. For example: DMOD DEL 3 AFTER 2 INSRT 11 skips two digits, deletes the next three and inserts digits 11 at the beginning of the digit string. The result when applied to 234567 is 23117. Note: Datafilling this refinement with 0 (the default value) displays the following error message: <pre>Too few digits for AFTER option UNSUPPORTED OPTION AT: # PROCESSING ERROR UNEXPECTED ERROR CONDITION</pre>
	CDNNAME	alphanumeric string	Called number name. If the entry in subfield OSEL is SETCDN, enter data for this refinement. Enter data for this refinement to
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits in the CIC. This field operates on the B (called) number, so it is assumed that the switch signals the CIC as part of the B number. The MAP display indicates the range is 0 to 4. The system does not allow a 0 entry.
	CONDIGS	numeric (0 to 29 digits)	Consumed digits. If OSEL = CONSUME, enter a 0- to 11-digit number to explicitly define the number of digits consumed during call processing.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 5 of 6)**

Field	Subfield or refinement	Entry	Explanation and action
	DELDIGS	0 to 29	Delete digits. If OSEL = DEL, enter the number of digits to be deleted, after skipping digits to be left unprocessed.
	INSRDIGS	numeric (1 to 29 digits)	Insert digits. If OSEL = INSRT, enter the digits to be left unprocessed.
	INSRTCLI	numeric (1 to 5 digits) \$	Insert CLI. If OSEL = CGNDM, enter the new string to insert as the prefix onto the CLI. Enter \$ to specify no digit string is inserted.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table.
	PREFXCLI	numeric (0 to 18)	Prefix CLI. If OSEL = CGNDM, enter the number of prefix digits to delete.
	REPLDIGS	numeric (1 to 30 digits)	Replace digits. If OSEL = REPL, enter the digits that replace the existing digits, after skipping digits to be left unprocessed.
	SERVICE	alphanumeric (1 to 8 characters)	COODM service. If OSEL = COODM, enter the emergency service name. Emergency service names are listed in field EMRGSERV in table LAC.
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits to skip before removing the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the system signals the CIC as part of the B number.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 6 of 6)**

Field	Subfield or refinement	Entry	Explanation and action
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field specifies the source of the CIC as follows: - PRESUB - presubscribed. Table TRKGRP contains the definition of the CIC. - DIALED - dialed. The subscriber enters the CIC when dialing a call.
	XLASYS	AC, AM, CT, DN, FA, FT, NIL, NSC, OFC, or PX	Translation system. If OSEL = XLT, enter the next translation system to use, followed by a space, and datafill subfield XLANAME (the instance of the translation system). The choice of translation systems is: - AC (access) - AM (ambiguous) - CT (country) - DN (directory number) - FA (foreign area) - FT (utility) - NIL - NSC (number service code) - OFC (office) - PX (prefix) Note: The XLASYS value NIL must not be datafilled by the operating company. NIL is only used to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. If OSEL = XLT, enter the translation name of the table instance within the XLASYS that the call is routed to.

NSCHEAD (continued)**XLASEL = DNRTE**

The DNRTE selector allows translation to continue in table DNINV. Through this translation, calls can be terminated at directory numbers datafilled in table DNINV.

Table DNINV must be datafilled before the DNRTE selector is datafilled in table ACCODE.

Table AMAXLAID must be datafilled prior to selecting option AMAXLAID.

Field descriptions for conditional data II (Sheet 1 of 4)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	Options. This subfield is a vector consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, and the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	ALLOWOVLP, AMAXLAID, CAMA, CLASS, DN, MM, PF, or SF	Option selector. The following options can be selected: Enter ALLOWOVLP to allow overlap. This subfield does not have refinements. Enter AMAXLAID, followed by a space, and datafill subfield XLAID to specify an automatic message accounting identity from within table AMAXLAID. Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the ICAMA record is generated with the the originally-signaled DN or the final PSTN number. Enter CLASS, followed by a space, and datafill subfield CLASS if the class of the dialed digits can be determined. Enter DN, followed by a space, and datafill subfield SNPA and NXX for the directory number that the call is to route.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter MM, followed by a space, and datafill subfields MIN and MAX if the minimum and maximum dialed digits are known. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter SF, followed by a space, and datafill subfield SFDIGS to indicate the beginning of the station code digits.
	CLASS	ATT, CNTL, COLL, DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, or UNKW	Translation class. If OSEL = CLASS, enter the translation class determined by the dialed digits. This can be used for screening or billing purposes as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • AGRP (inter-agent group) • CNTL (inter-continental) • INTL (international) • OPRA (international operator assisted) • LCL (local) NATL (national) • NATL national • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	CLDFMT	CURRENT or POSTXLA	Called format. If OSEL = CAMA, enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation). If the entry is POSTXLA, an ICAMA record is produced with PSTN number resulting from translations.
	MAX	0 to 30	Maximum digits. If OSEL = MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	Minimum digits. If OSEL = MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	OFC	000 to 999	Three-digit area code. If OSEL = DN, enter the three-digit area code for the DN being routed to.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table.
	SFDIGS	0 to 29	Station fence digits. If the entry in subfield OSEL is SF, datafill this refinement. Enter a number to indicate how many digits to advance past the start of the digits that index into the tuple. (During call processing, the station code digits consist of all digits beyond this indicator to the end of the dialed digits. If option SF is not datafilled, then the last four digits comprise the station code.)

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 4 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	SNPA	000 to 999	Serving number plan area. If OSEL = DN, enter the required Serving number plan area (SNPA). This number must be datafilled in table HNPACONT or in table SNPANAME. This field must be three digits in length.
	XLAID	FREE, GENERIC1, GENERIC2, or GENERIC3	AMA translation . If OSEL = AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

NSCHEAD (continued)**XLASEL = FEAT**

If the entry in field XLASEL is FEAT, datafill the following subfields.

Field descriptions for conditional data II (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	Options. This field is a vector consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, and the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	FTR, FUNC, MM, PF, or XLT	Option selector. The following options can be selected: Enter FTR, followed by a space, and a feature code (FTR described below) to identify the international line feature. Enter FUNC, followed by a space, and feature function code (FUNC described below) to identify the international line feature function. Enter MM, followed by a space, and datafill subfields MIN and MAX if the minimum and maximum dialed digits are known. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter XLT, followed by a space, and datafill refinement XLANAME if the translation name of the translation system is known.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	FTR	CALLBACK, CALLCHAR, CLCTDIGS, JES, NTC, VMWI, VSC or VALIDATE	Feature name. If the entry in subfield OSEL is FTR, enter the refinement name shown below: • CALLBACK (call back) • CALLCHAR (call characters) • CLCTDIGS (collect digits) • JES (Japan emergency services) • NTC (Notify Time Charges) • TLC (trunk logic circuit) • VMWI (voice mail waiting indication) • VSC (vertical service code) • VALIDATE (not used in GL03)
	FUNC	ACT, DEACT, DELETE, INTER, PROG, or USAGE	Feature function code. If OSEL = FUNC, enter one of the international line feature function codes listed below: • ACT (activate) • DEACT (deactivate) • DELETE (delete) • INTER (interrogate) • PROG (programming) • USAGE (usage)
	MAX	0 to 30	Maximum digits. If OSEL = MM, enter the maximum number of digits expected following MIN entry and a space. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	MIN	0 to 30	Minimum digits. If OSEL = MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table.

XLASEL = FEATINFO

If the entry in subfield XLASEL is FEATINFO, datafill the following refinements. Selector FEATINFO makes use of table DNSCRN to store information against DNs, which is used during call processing to determine how to proceed with the call. The screening function is triggered by selector FEATINFO in the universal translation tables. The options available with this selector are shown below.

Field descriptions for conditional data II (Sheet 1 of 10)

Field	Subfield or refinement	Entry	Explanation and action
	FTR	CALLBACK, CALLCHAR, CLCTDIGS, JES, NTC, TLC, or VALIDATE	Feature name. Enter CALLBACK to enable originator callback during translations. Datafill subfield CALLBACK_OPTION and its refinements, then datafill subfields PFDIGS, MINDIGS, MAXDIGS, and TABREF. Enter CALLCHAR to modify all signaling characteristics. Datafill subfields CLLCHROP, PFDIGS, MINDIGS, MAXDIGS, and TABREF.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CLCTDIGS to collect digits from the call originator and add them to the called digits stream for translation. Datafill subfields CLDGMIN, CLDGMAX, CLCTDIGS_OPTION, PFDIGS, MINDIGS, MAXDIGS, and TABREF. Enter JES to activate the Japan Emergency Service feature. Datafill refinements PFDIGS and TABREF. Enter NTC to notify the originating subscriber of applicable time and charges after the call terminates. Datafill subfield SUBOPT_NAME and its refinement, then datafill subfields PFDIGS, MINDIGS, MAXDIGS, and TABREF. Enter TLC to enable the test line call feature, which provides audible ringback tone followed by dial tone after specified durations. Datafill subfields RING_BACK_TONE_DUR, DIAL_TONE_DUR, TLC_PREFIX_DIGS, TLC_NUM_DIGS, and TLC_CHARGE. Enter VALIDATE, and datafill subfield VALDATOP and its refinements. Datafill subfields PFDIGS, MINDIGS, MAXDIGS, and TABREF.
	CALLBACK_OPTION	CLCTDEST or NIL	Callback option. If the entry in field FTR is CALLBACK, datafill this option. Enter CLCTDEST to call back the subscriber and collect destination digits. Datafill subfields CLDGMIN, CLDGMAX, DISC_ANNC_TRK, PROMPT_ANNC_TRK, and SEND_ANM. Otherwise, enter NIL.
	CLDGMIN	1 to 24	Minimum collected digits. Enter the minimum number of digits to be collected and entered into the called digit stream.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	CLDGMAX	1 to 24	Maximum collected digits. Enter maximum number of digits to be collected and written into the called digit stream. The value cannot be less than CLDGMIN.
	DISC_ANNC_TRK	alphanumeric (1 to 16 characters)	Disconnect announcement trunk. Enter trunk common language location identifier (CLLI).
	PROMPT_ANNC_TRK	alphanumeric (1 to 16 characters)	Prompt announcement trunk. Enter trunk the common language location identifier (CLLI).
	SEND_ANM	Y or N	Send answer message. Enter Y (yes) or N (no).
	CLLCHROP	NOCHGMSG or EARLYCPG	Call characteristics. If the entry in field FTR is CALLCHAR, datafill this option. Enter NOCHGMSG to block backward CHG message. Enter EARLYCPG to specify that a call progress (CPG) message is issued in the backwards direction before an address complete message (ACM) is sent. The CPG message is permitted before an ACM in certain ISDN user part (ISUP) variants to establish a bidirectional speech path and to stop the T7 timer.
	CLCTDIGS_OPTION	NIL or \$	Collect digits option. If the entry in field FTR is CLCTDIGS, datafill this option. Enter NIL or enter \$ to proceed to the next option.
	SUBOPT_NAME	DUR_ADJ	Suboption name. If the entry in field FTR is NTC, datafill this option. Enter DUR_ADJ to specify the duration adjustment for NTC and datafill subfield DURATION_ADJ.
	DURATION_ADJ	0 to 99	Duration adjustment. Enter the time in seconds.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 4 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	RING_BACK_TONE_DUR	1 to 255	Ringback tone duration. If the entry in field FTR is TLC, datafill this option. Enter the time, in seconds, that ringback tone is provided to the originator.
	DIAL_TONE_DUR	1 to 255	Dial tone duration. If the entry in field FTR is TLC, datafill this option. Enter the time, in seconds, that dial tone is provided to the originator.
	TLC_PREFIX_DIGS	0 to 18	Prefix digits in called number. If the entry in field FTR is TLC, datafill this option. Enter the number of digits to advance the prefix fence to detect the charge message digits when CPC = PAYPHONE.
	TLC_NUM_DIGS	numeric(3 or 4) Japan only	Test line call number of digits. Enter the number of dialed digits to be transferred to the NCCI#7 CHG message. This is also the number of digits stored in the LMNNUM field of the SMDR #DE record.
	TLC_CHARGE	Y or N	Test line call charge indicator. The TLC_CHARGE field indicates the billing status of an ISUP test call. Enter Y if the call is billable. Enter N if the call is not billable. The default value for this field is N.
	OPT	see subfield VALDATOP	Options. If the entry in field FTR is VALIDATE, datafill this option. This field is a vector consisting of up to five options. Each option consists of subfield VALDATOP, and refinements that depend on the entry in subfield VALDATOP. For each option, specify VALDATOP, followed by a space, then the refinements, each separated by a space. The entry is concluded by a \$ and datafill continues with field DFOP.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 5 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	VALDATOP	BCSCRN, CALLED, CLDTOCLG, CLISERV, CUSTMOD, LCASCRN, NOCHARGE, PRESEL, SCRNLNTH, SUBSCRN, TCNOTSCR, THIRDPTY, VERDEST, V3PTYBIL	Validate option. Enter a list of up to five options. The options specify what characteristics are to be considered when screening the call. Enter \$ to signify the end of the list. Note: Selector VALIDATE is traversed only once for each call. Enter BCSCRN and datafill refinement BCOPTS to identify the bearer capability name. Enter CALLED to indicate the number to be used for screening. The SUBSCRN options are used to specify the subscriber types allowed to receive the call. Note: When using option CALLED, there must be no further digit manipulation after selector VALIDATE is encountered in translations. If option CALLED is not entered, then the calling party number is used for screening and the SUBSCRN options are used to specify the subscriber types allowed to make the call. Note: Pay phone subscribers are treated as general subscribers if option CALLED is specified. Enter CLDTOCLG, followed by a space, to copy digits from the called to the calling digit stream, and datafill options OFFSET and COUNT. Enter CLISERV, followed by a space, and enter data for refinement SERVNAME to add the name of the service provider.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 6 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CUSTMOD, followed by a space, to alter the internal network class of service (NCOS) and customer group to new value for a given directory number (DN) based on the CUSTINFO attribute in table DNSCRN. The source of the DN used as an index into table DNSCRN is determined by the VALIDATE datafill. Datafill refinement CUSTSCRN. Enter LCASCRN, followed by a space, to enable local calling area screening. The called and calling numbers are checked against tables LCARNAME and LCASCRN to determine if the numbers are local to each other, and whether the call should be denied or allowed to continue routing. Enter NOCHARGE, followed by a space, to indicate that the call is nonbillable. Note: If both NOCHARGE and THIRDPTY options are specified, NOCHARGE takes precedence. Enter PRESEL to allow screening for the PRESEL attribute in table DNSCRN. Enter SCRNLNTH, followed by a space, and datafill refinement MINLNGTH to specify the minimum length of the number being screened. Enter SUBSCRN, followed by a space, and datafill up to three multiples of the following subscriber types: GENERAL, PAYPHONE, PERSONAL, and MOBILE. Enter \$ after entering SUBSCRN to indicate that no subscriber types are permitted to make or receive the call. Enter TCNOTSCR to indicate that calls with CPC set to Test Call are not screened.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 7 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter THIRDPY to indicate that automatic third party billing is used. Table DNSCRN is checked for attribute UNPAID. Note: If both NOCHARGE and THIRDPY options are specified, NOCHARGE takes precedence. Note: Payphone subscribers are treated as general subscribers if option CALLED is specified. Enter VERDEST to verify the destination of a call. Called digits are checked against ADDCODE entries in table DNSCRN. Note: NIL appears on the switch range but is not a valid entry. The value NIL is used only to satisfy internal software requirements.
	BCOPTS	alphanumeric (1 to 8 characters)	Bearer capability option. If the entry in field VALDATOP is BCSCRN, datafill this refinement. Enter up to four bearer capability names.
	COUNT	0 to 30	If the entry in field VALDATOP is CLDTCGLG, enter subfield COUNT to count the digits from the called stream to the calling stream.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 8 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	CUSTSCRN	Y or N	Customer screen. Enter Y to block calls that are not subscribed to the switched on-net services if attempting a switched on-net call. If the DN being screened is not present in table DNSCRN, the call is rejected with the Call Not Allowed (CNAD) treatment. The internal NCOS and CUSTGRP associated with the call are altered to the values found in the CUSTINFO attribute if present for the given DN in table DNSCRN. The DN used to index table DNSCRN can be the subscriber calling line identification (CLI) or the dialed number. The source of the DN is determined by the datafill of field VALIDATE. Enter N if no screening is performed. Note: The FEATINFO values CCANN, CCARD, CCSDT, DAFOP, FAXSUP, FAXTEST, INBFAX, INBFD, INTLFD, ISD, ISDTST, ISDVRE, OUTBFAX, OUTBFD, PB3RDPTY, PBCALL, PBISD, PBISDVRE, and PBTST are valid only in DMS-250 switching offices. Additional DMS-250 parameters are listed in the DMS-250 specific data schema NTPs.
	MINLNTH	0 to 18values from 0 to 30 are possible in APC software loads	Minimum length. If the entry in field VALDATOP is SCRNLNTH, enter the minimum number of digits required in number being screened.
	OFFSET	0 to 30	If the entry in field VALDATOP is CLDTCGLG, enter subfield OFFSET to offset the digits from the called stream to the calling stream.
	SERVNAME	alphanumeric string	Service provider name. If the entry in field VALDATOP is CLISERV, enter the name of the service provider in this refinement.
	SUBSCTYP	GENERAL, PAYPHONE, PERSONAL, or MOBILE	Subscriber type. Enter subscriber type, followed by a space, and datafill refinements WHITLIST, CHKBLKCL, CHKUNPD, and CHKCCR. This option allows you to specify which subscriber types are permitted to make or receive a call and whether the subscriber's standing is important for a call.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 9 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	WHITLIST	Y or N	Whether it list. Enter Y (yes) to indicate that the subscriber's directory number must be datafilled in table DNSCRN. Otherwise, enter N (no).
	CHKBLKCL	Y or N	Check block call. Enter Y to check if the subscriber has subscribed to all services for which this tuple is being used (BLKCALL attribute in table DNSCRN). Otherwise, enter N.
	CHKUNPD	Y or N	Check unpaid. Enter Y to check if the subscriber has paid his bills. Otherwise, enter N.
	CHKCCR	Y or N	Check cumulative call restriction. Enter Y to check the subscriber's cumulative charge limit. Otherwise, enter N.
	PFDIGS	0 to 24	Prefix digits. Enter the number of prefix digits present at this point in the call. Prefix digits are not used to index any further translation tables and are not outpulsed, but they remain stored in call detail records (CDR).
	MINDIGS	0 to 30	Minimum digits. Enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MAXDIGS	0 to 30	Maximum digits. Enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	TABREF	see subfields	Table reference. This field consists of subfields XLASYS and XLANAME.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 10 of 10)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASYS	AC, AM, CT, FA, FT, NSC, OFC, or PX	Translation system. Enter the next translation system to use, followed by a space, and datafill subfield XLANAME (the instance of the translation system). The choice of translation systems is as follows: • AC (access) • AM (ambiguous) • CT (country) • FA (foreign area) • FT (utility) • NSC (number service code) • OFC (office) • PX (prefix) Note: NIL is not a valid entry. NIL is used only to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. Enter the translation name of the table instance within the XLASYS to which the call is routed.

XLASEL = HRC

If the entry in subfield XLASEL is HRC, datafill the following refinements.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield	Entry	Explanation and action
	OPT	see subfield	Options. This field contains subfield OSEL, and refinements that depend on the entry in subfield OSEL. The entry is concluded by a \$ and datafill continues with field DFOP.
	OSEL	PFBILL, XLT	Option selector. If the call proceeds to another translation system, enter XLT, followed by a space, and datafill refinement XLASYS. Also complete an entry for option selector PFBILL.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
	XLASYS	AC, AM, CT, FA, FT, NSC, OFC, PX	Translation system. If option selector XLT is entered in subfield OSEL, datafill this refinement. Enter the next translation system to use, followed by a space, then datafill refinement XLANAME. Enter one of the following: • AC (access) • AM (ambiguous) • CT (country) • FA (foreign area) • FT (utility) • NSC (number service code) • OFC (office) • PX (prefix) Note: NIL is not a valid entry. NIL is used only to satisfy internal software functionality. NSC is not used in GL03.
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. If XLT is entered in subfield OSEL, datafill this refinement. Enter the translation name of the table within the XLASYS to which the call is routed.
	PFBILL	Y or N	Prefix billing option. Enter PFBILL, followed by a space, and then enter either Y or N. If "Y" is entered, the home routing code specified in the tuple is included in the billing record. If "N" is entered, the home routing code is not included in billing records.

NSCHEAD (continued)**XLASEL = IAC**

If the entry in field XLASEL is IAC, datafill the following subfields.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	Options. This subfield is a vector list consisting of up to 10 options and terminated by \$. Each option consists of subfield OSEL, and refinement subfields that depend on the entry in OSEL.
	OSEL	PF	Option selector. The following options can be selected: Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table.

NSCHEAD (continued)**XLASEL = RTE**

If the entry in field XLASEL is RTE, datafill the following subfields.

Field descriptions for conditional data II (Sheet 1 of 12)

Field	Subfield or refinement	Entry	Explanation and action
OPT		see subfield	Options. This subfield is a vector consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, and the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	ACF, AMAXLAID, BLKOVLP, CALLCTRL, CAMA, CDN, CDNRTE, CHGIND, CLASS, CONSUME, CPCRTE, CPMCALL, DIDDX, DEST, EXTCIC, IAA, LNET, MM, MZONE, NETSRV, PCC, PF, PIP, PNRF, PRESEL, PRESLERTE, PRIVL, QFT, SETCDN, TOC, VPN, or VPNPAN	Option selector. The following options can be selected: Enter ACF, followed by a space, and datafill subfield ACF if the area code fence is defined. Enter AMAXLAID, followed by a space, and datafill subfield XLAID to specify an automatic message accounting identity from within table AMAXLAID. Enter BLKOVLP to prevent calls from being outpulsed until all CDN digits are collected. This subfield does not have refinements. Enter CALLCTRL, followed by a space, and datafill subfield CALLCTRL. The entry in subfield CALLCTRL indicates who has control of the call: the calling party, the called party, or both. Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the ICAMA record is generated with the the originally-signalied DN or the final PSTN number.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CDN, followed by a space, and datafill subfield CDN to select the nature of address field. This field is used to identify the called party of the initial address message (IAM). It is used for Australian ISDN user part (AISUP) call translations. Enter CDN RTE to route using the called number name (CDNNAME) from table CDNCHAR. If the CDNNAME is present on the incoming call or is set by the SETCDN option, translation proceeds to table CDNUXLA. CHGIND indicates whether to override the value of the charge indicator in the Backward Call indicators. The CHGIND option applies only to JCTV loads. Enter CLASS, followed by a space, and datafill subfield CLASS if the class of the dialed digits can be determined. Enter CONSUME, followed by a space, and datafill subfield CONDIGS to specify the number of digits that are consumed during translation. Enter CPC RTE to route using the calling party category (CPCNAME) from table CPCCHAR. If the CPCNAME is present on the incoming call, translation proceeds to table CPCUXLA. Enter CPMCALL, followed by a space, and datafill subfield CPMCALL to specify call billing against the called party instead of the calling party for intra-office calls. Enter DDIDX, followed by a space, and enter data for refinement DDIDX. Enter data for this subfield if a destination discount applies to the call.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter DEST, followed by a space, and datafill subfield DEST if the destination is known. Enter EXTCIC, followed by a space, and enter data for refinements CICSIZE, SKIPDIGS, and SOURCE. This subfield indicates the external carrier identification code. Enter IAA and the datafill refinement IAA_INDEX to generate or modify IAA message parameters based on datafill in table IAACTRL. Enter LNET, followed by a space, and datafill subfield LNET if a logical network is required, for metering. Enter MM, followed by a space, and datafill subfields MIN and MAX if the minimum and maximum dialed digits are known. Note: For fast interdigital timing to function properly, MM can only be used with the RTE selector whenever the value in refinement MIN is not equal to the value in refinement MAX. In other words, if MIN=MAX, MM can be used with the CONT selector in table PXCODE; if the value in refinement MIN is not equal to the value in refinement MAX, MM cannot be used until the RTE selector is used (which is usually in either table FACODE or table OFCCODE). If refinements MIN and MAX are set in table PXCODE when they are not equal to each other, partial dial timing is used after MIN digits are dialed in order to determine the end of dialing. Enter MZONE, followed by a space, and datafill subfield MZONE if metering is to be done on the call. Enter NETSRV and datafill refinement NETSRV_NAME to indicate a Japan network service.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 4 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter PCC, followed by a space, and datafill subfield PCCDR if a pseudo country code is required. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter PIP, followed by a space, to perform a residency check for the digits being translated. The residency check is used by the local number portability feature to ensure that calls to DNs that have been ported into the office are not routed out of the office. Note: You must complete entries in fields MIN and MAX before entering the PIP option. Enter PNRF to invoke the ported number recognition function, which is used for LNP applications in Germany. The PNRF option does not require any subfields. Enter PRESEL, followed by a space, if the call is to be treated as a preselected carrier case. Enter PRESEL RTE, followed by a space, and datafill refinement PRESEL RTE, the index into the route table of the current XLASYS and XLANAME. Enter PRIVL, followed by a space, and datafill subfield PRIVL if the user is a privileged user (for example, operators). Enter QFT followed by ON or OFF to indicate if an outgoing route is capable of QSIG Feature Transparency. Note: The QFT ON option must not be added to a route unless the far-end node is QFT-capable.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 5 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter SETCDN to trigger the setting of outgoing called party characteristics. This option assigns the called number name (CDNNAME) from table CDNCHAR to the call. If the CDNRTE option is subsequently encountered, the CDNNAME is used to route the call. You can use the SETCDN option to allow CDN routing when incoming agents such as DPNSS or BTUP are not available in table CDNCHAR. Enter TOC, followed by a space, and datafill subfield CHG, for the type of charge if the type of charge messaging is selected. Enter VPN, followed by a space, and datafill subfields ONNET and BILLABLE if the call routes through a service switching point (SSP) and the Australian VPN - SSP software package (NTXH49AA or NTXH49AB) is in the switching unit. Enter VPNPAN to indicate that the PINX is to act as the PAN for an outgoing route. Note: If VPNREPL or VPNXLT have been entered in the DMOD selector, the VPNPAN option is redundant.
	ACF	0 to 29	Area code fence. If OSEL = ACF, enter the number of digits between the beginning of the digits to currently index the table, and the end of the area code.
	BILLABLE	Y or N	Virtual private network billable call. If OSEL = VPN, enter Y (yes) if an automatic message accounting (AMA) record is required for each VPN call. Otherwise enter N (no). An AMA record is not generated if an address complete message (ACM) of address complete, no charge is returned, or if the call terminates in the SSP on a line with the free number terminating (FNT) option.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 6 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	CALLCLASS	PRESELECTOV ERRIDE, CSN, or TRUNK	Preselection call processing. If the entry in subfield OSEL is PRESEL, datafill this refinement. Enter the preselection call class type that is associated with the call. Note: Calltype CSN and TRUNK are available under the PRESEL option. These call classes are not needed for German Carrier Selection, and are not supported. The same applies to the Continue option of CONT. For the German market, only NOCONT is supported.
	CALLCTRL	CALLING, CALLED, or MUTUAL	Call control. If OSEL = CALLCTRL, enter one of the following values to specify the party who has control of the call. If the entry is CALLING and the calling party goes onhook first, the call is released immediately. If the called party goes onhook first, the called party is allowed to reanswer within a datafilled reanswer time out or until the calling party goes onhook. If the time out expires or if the calling party goes onhook, the calling party releases the call and the called party is set to idle. If the entry is CALLED and the called party goes onhook first, the call is released immediately. If the calling party goes onhook first and does not reanswer, the connection is not released until the called party goes onhook. There are no time outs, and the calling party is allowed to reanswer until the called party goes onhook. If the entry is MUTUAL and either party goes onhook the call is released immediately. Note 1: Calls to lines with the ESG option must have CALLCTRL(CALLED). Note 2: Calls terminating on an ITOPS position must have CALLCTRL(CALLED).

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 7 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	CDNNAME	alphanumeric string	Called number name. If the entry in subfield OSEL is SETCDN, enter data for this refinement to route the call using the called number name from table CDNCHAR.
	CHG	SEND_CHARGE or SEND_NO_CHARGE	Charge. If OSEL = TOC, enter SEND_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_CHARGE. Enter SEND_NO_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_NO_CHARGE.
	CHGIND	ASIS, CHG, NOCHG	Datafill the CHGIND field with the following values: • ASIS-treat charge indicator as is • CHG-treat charge indicator as charge • NOCHG-treat charge indicator as no charge
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits in the CIC. This field operates on the B (called) number, so it is assumed that the switch signals the CIC as part of the B number. The MAP display indicates the range is 0 to 4. The system does not allow a 0 entry.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 8 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	CLASS	ATT, CNTL, COLL, DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, or UNKW	Translation class. If OSEL = CLASS, enter the translation class determined by the dialed digits. This can be used for screening or billing purposes as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • AGRP (inter-agent group) • CNTL (inter-continental) • INTL (international) • OPRA (international operator assisted) • LCL (local) • NATL (national) • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)
	CLDFMT	CURRENT or POSTXLA	Called format. If OSEL = CAMA enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation). If the entry is POSTXLA, an ICAMA record is produced with PSTN number resulting from translations.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 9 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	CONDIGS	numeric (0 to 29 digits)	Consumed digits. If OSEL = CONSUME, enter a 0- to 11-digit number to explicitly define the number of digits consumed during call processing.
	CONTINUE	CONT, NOCONT	Continue. If the entry in subfield OSEL is PRESEL, enter data for this refinement. Enter CONT to continue with the current translations system. Enter NOCONT to stop translations.
	CPMCALL	Y or N	Called party metering. If OSEL = CPMCALL, enter Y (yes) if calls are billed against the called party for intra-office calls. Enter N (no) for the default value of billing against the calling party for intra-office calls.
	DDIDX	1 to 63 or DEFAULT	Destination discount index. If the entry in subfield OSEL is DDIDX, enter data for this refinement to apply the destination discount to the call.
	DEST	0 to 1023	Destination route list index. If OSEL = DEST, enter the number in the route list, of the same translation system, that the call is routed to.
	IAA_INDEX	0 to 1024	Interadministration accounting index. If the entry in subfield OSEL is IAA, datafill this refinement. Enter the value that indexes the corresponding tuple in IAACTRL.
	LNET	alphanumeric (1 to 16 characters)	Logical network. If OSEL = LNET, enter the logical network name that the call is on. The logical network name must have been previously datafilled in table LNETWORK. The entry in this field is used by the international metering system to determine a tariff for the call.
	MAX	0 to 30	Maximum digits. If OSEL = MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 10 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	MIN	0 to 30	Minimum digits. If OSEL = MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MZONE	0 to 63	Metering zone. If OSEL = MZONE, enter the metering zone of the call, in the logical network as defined by selector LNET. The entry in this field is used by the international metering system to determine a tariff for the call.
	NETSRV_ NAME	IPHS, DPHS, MOBILE, DA, TELEGRAM, or NCC	Network service name. If the entry in subfield OSEL is NETSRV, datafill this refinement. The entry in this field determines the parameters in an outgoing IAM message. Enter IPHS to indicate a call to an independent personal handyphone system subscriber. Enter DPHS to indicate a call to a dependent personal handyphone system subscriber. Enter MOBILE to indicate a call to a mobile subscriber. Enter DA to indicate a call to the directory assistance operator. Enter TELEGRAM to indicate a call to the Telegram office. Enter NCC to indicate a call routed to one of the following networks: • New Common Carrier serving international toll traffic • New Common Carrier serving national toll traffic

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 11 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	NOA	INTL, LOCAL, NATL, or NET	Nature of address. Enter the required called party nature of address. • INTL (international) • LOCAL (local) • NATL (national) • NET (Intelligent Network Services)
	ONNET	Y or N	Call on virtual private network. If OSEL = VPN, enter Y if the call stays within the defined virtual private network. Otherwise enter N (no). Overlapped outpulsing is only supported on off-network calls. Calls processed without the ONNET subfield set to Y are off-network calls. Meridian digital centrex (MDC) calls are treated as off-network calls, and therefore overlapped outpulsing is supported for MDC calls.
	PCCDR	000 to 999	Pseudo country code digits. If OSEL = PCC, enter the three-digit pseudo country code (PCC). If a two-digit PCC is required, it must be padded by a leading zero. The pseudo country code is used to record a particular pseudo country code. This can be extracted for use by system logic later, for example, two-stage outpulsing.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, this number is added to the existing value. Prefix digits are not stored in call detail records, outpulsed or used to index the next translation table. Note: If refinements PF and CONSUME are both datafilled for the same tuple, only the entry for the greater of the two values is processed; the other entry is ignored.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 12 of 12)**

Field	Subfield or refinement	Entry	Explanation and action
	PFXAMA	0 to 4 digits, or N	Called party number prefix in AMA. If NOA is set to NTL, datafill PFXAMA with 0011. If NOA is set to NATL, datafill PFXAMA with 0. If NOA is set to LOCAL or NET, datafill PFXAMA with N.
	PRIVL	Y or N	Privileged user. If OSEL = PRIVL, enter Y (yes) if the user is a privileged user (for example, operator). Otherwise, enter N (no).
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits to skip before removing the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the system signals the CIC as part of the B number.
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field specifies the source of the CIC as follows: - PRESUB - presubscribed. Table TRKGRP contains the definition of the CIC. - DIALED - dialed. The subscriber enters the CIC when dialing a call.
	STOPRTMR	Y or N	Stop remote timer. Enter Y (yes) to disable the address complete message (ACM) timer of the remote switch. The default value is N (no).
	XLAIID	FREE, GENERIC1, GENERIC2, or GENERIC3	AMA translation identifier. If OSEL = AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

NSCHEAD (continued)

XLASEL = TRMT

If the entry in field XLASEL is TRMT, datafill the following subfields.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
OPT		vector (see subfields)	Options. This subfield is a vector consisting of up to ten options. Each option consists of subfield OSEL, and refinements that depend on the entry in subfield OSEL. For each option, specify OSEL, followed by a space, and the refinements, each separated by a space. The entry is concluded by a \$.
	OSEL	OFC	Enter OFC, followed by a space, and datafill subfield OFC if a treatment name is required.
	OFC	see subtable	Enter a treatment name that is contained in the office treatment subtable, TMTCNTL.TREAT.

Data II e xample

Refer to examples in the description of table ACHEAD.

NSCHEAD (continued)

XLASEL = all entries

Table AMAXLAID must be datafilled prior to selecting option AMAXLAID.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 1 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	DFOP	NODFOP or DFOP	Default options. Enter NODFOP if there are no default options. Enter DFOP, and datafill subfield OSEL and its refinements. The default options only apply if a tuple with XLASEL equal to RTE or CONT is chosen in the CODE table. If the entry in field DFOP is equal to DFOP, this field is a vector that consists of a number of options and must be ended by \$. Each option, consisting of subfield OSEL and refinements dependent on the entry in subfield OSEL, is separated from the next by a space. The various refinements are described in subfield OSEL. For each option, specify the option selector, followed by a space, and the refinements, with each refinement separated from the next by a space.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 2 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	OSEL	ACF, AMAXLAID, CALLCTRL, CAMA, CDN, CDNRTE, CLASS, CLIOVRD, CONSUME, CPCRTE, CPMCALL, DDIDX, DEST, EXTCIC, IAA, LNET, MM, MZONE, NETSRV, OSS, PCC, PF, PNRF, PRESEL, PRIVL, QFT, SETCDN, TELETAXE, TOC, VPN, or XLT	Option selector. The following options can be selected: Enter ACF, followed by a space, and datafill subfield ACF if the area code fence is defined. Enter AMAXLAID, followed by a space, and datafill subfield XLAID to specify an automatic message accounting (AMA) identity from within table AMAXLAID. Enter CALLCTRL, followed by a space, and datafill subfield CALLCTRL. The entry in subfield CALLCTRL indicates who has control of the call: the calling party, the called party, or both. Enter CAMA, followed by a space, and datafill subfield CLDFMT. The entry in CLDFMT indicates whether the International automatic message accounting (ICAMA) record is generated with the the originally-signaled directory number (DN) or the final Public Switched Telephone Network (PSTN) number. Enter CDN, followed by a space, and datafill subfield CDN to select the nature of address field. This field is used to identify the called party of the Initial Address message (IAM). It is used for Australian ISDN user part (AISUP) call translations.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 3 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter CDNRTE to route a call using the called number name (CDNNAME) from table CDNCHAR. If the CDNNAME is present on the incoming call or is set by the SETCDN option, translation proceeds to table CDNUXLA. The CDNRTE option does not have refinements. Enter CLASS, followed by a space, and datafill subfield CLASS if the class of the dialed digits can be determined. Enter CLIOVRD, followed by a space, and enter data for refinement CLIOVRD. This subfield indicates calling line identity override. Enter CONSUME, followed by a space, and datafill subfield CONDIGS to specify the number of digits that are consumed during translation. Enter CPC RTE to route the call using the calling party category (CPCNAME) from table CPCCHAR. If the CPCNAME is present on the incoming call, translation proceeds to table CPCUXLA. The CPC RTE option does not have refinements. Enter CPMCALL, followed by a space, and datafill subfield CPMCALL to specify call billing against the called party instead of the calling party for intra-office calls. Enter DDIDX, followed by a space, and enter data for refinement DDIDX. This option indicates a destination discount applies to the call. Enter DEST, followed by a space, and datafill subfield DEST if the destination is known. Enter EXTCIC, followed by a space, and enter data for refinements CICSIZE, SKIPDIGS, and SOURCE. The EXTCIC option indicates the external carrier identification code. This option is supported for TOPS calls.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 4 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter IAA, followed by a space, and enter data for refinement IAA_INDEX. The IAA option generates or modifies IAA message parameters based on datafill in table IAACtrl. Enter LNET, followed by a space, and datafill subfield LNET if a logical network is required, for metering. Enter MM, followed by a space, and datafill subfields MIN and MAX if the minimum and maximum dialed digits are known. Enter MZONE, followed by a space, and datafill subfield MZONE if metering is to be done on the call. Enter NETSRV and datafill refinement NETSRV_NAME to indicate a Japan network service. Enter OSS to indicate operator signaling services. This subfield does not have refinements. Enter PCC, followed by a space, and datafill subfield PCCDR if a pseudo country code is required. Enter PF, followed by a space, and datafill subfield PFDIGS if there are prefix digits in the digit stream. Enter PNRF to invoke the ported number recognition function. LNP applications in Germany use the PRNF. The PNRF option does not have refinements. Enter PRESEL, followed by a space, and datafill refinement PRESEL to provide the necessary information used to index into the PCIXLA table. Enter PRIVL, followed by a space, and datafill subfield PRIVL if the user is a privileged user (for example, operators).

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 5 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Enter QFT followed by ON or OFF to indicate if an outgoing route is capable of QSIG feature transparency. Note: Operating company personnel must not add the QFT ON option to a route unless the far-end node is QFT-capable. Enter SETCDN, followed by a space, and enter data for refinement CDNNAME. The SETCDN option assigns the called number name (CDNNAME) from table CDNCHAR to the call. Enter TELETAXE. This option does not have refinements. Enter TOC, followed by a space, and datafill subfield CHG, for the type of charge if the type of charge messaging is selected. Enter VPN, followed by a space, and datafill subfields ONNET and BILLABLE if the call routes through a service switching point (SSP) and the Australian VPN - SSP software package (NTXH49AA or NTXH49AB) is in the switching unit. Enter XLT, followed by a space, and datafill subfield XLASYS if the call is to proceed to another translation system.
	ACF	0 to 29	Area code fence. If OSEL = ACF, enter the number of digits between the beginning of the digits to currently index the table, and the end of the area code.
	BILLABLE	Y or N	Virtual private network billable call. If OSEL = VPN, enter Y (yes) if an automatic message accounting (AMA) record is required for each VPN call. Otherwise enter N (no). An AMA record is not generated if an address complete message (ACM) of address complete, no charge is returned, or if the call terminates in the SSP on a line with the free number terminating (FNT) option.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 6 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CALLCLASS	PRESELECT OVERRIDE, CSN, or TRUNK	Preselection call processing. If the entry in subfield OSEL is PRESEL, datafill this refinement. Enter the preselection call class type that is associated with the call. Note: Calltype CSN and TRUNK are available under the PRESEL option. These call classes are not needed for German Carrier Selection, and are not supported. The same applies to the Continue option of CONT. For the German market, only NOCONT is supported.
	CALLCTRL	CALLING, CALLED, or MUTUAL	Call control. If OSEL = CALLCTRL, enter one of the three following values to specify the party who has control of the call. If the entry is CALLING and the calling party goes onhook first, the call is released immediately. If the called party goes onhook first, the called party is allowed to reanswer within a datafilled reanswer time out or until the calling party goes onhook. If the time out expires or if the calling party goes onhook, the calling party releases the call and the called party is set to idle. If the entry is CALLED and the called party goes onhook first, the call is released immediately. If the calling party goes onhook first and does not reanswer, the connection is not released until the called party goes onhook. There are no time outs, and the calling party is allowed to reanswer until the called party goes onhook. If the entry is MUTUAL and either party goes onhook the call is released immediately. Note 1: Calls to lines with the ESG option must have CALLCTRL(CALLED). Note 2: Calls terminating on an International Traffic Operator Position System (ITOPS) must have CALLCTRL(CALLED).
	CDNNAME	alphanumeric string	Called number name. If the entry in subfield OSEL is SETCDN, enter data for refinement CDNNAME.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 7 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CHG	SEND_ CHARGE or SEND_NO_ CHARGE	Charge. If OSEL = TOC, enter SEND_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_CHARGE. Enter SEND_NO_CHARGE to set the answer message (BTUP ANM) type of answer (TOA) string sent out from a node to SEND_NO_CHARGE.
	CICSIZE	1 to 4	CIC size. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits in the CIC. This field operates on the B (called) number, so it is assumed that the system signals the CIC as part of the B number. The MAP display indicates the range is 0 to 4. The system does not allow an entry of 0.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 8 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CLASS	ATT, CNTL, COLL, DATT, EMRG, IAGRP, ICNTL, INTL, IOPRA, LCL, NATL, OPRA, RURAL, SPEC, or UNKW	Translation class. If OSEL = CLASS, enter the translation class determined by the dialed digits. This can be used for screening or billing purposes as described under CLASS in screening and charging options. The translation classes are defined as follows: • ATT (attendant console) • CNTL (continental) • COLL (collect) • DATT (dial attendant) • EMRG (emergency) • AGRP (inter-agent group) • CNTL (inter-continental) • INTL (international) • OPRA (international operator assisted) • LCL (local) • NATL (national) • OPRA (operator assisted) • RURAL (rural) • SPEC (special) • UNKW (unknown)
	CLDFMT	CURRENT or POSTXLA	Called format. If OSEL = CAMA, enter either CURRENT or POSTXLA to produce the required ICAMA record format. If the entry is CURRENT, an ICAMA record is produced with the signaled DN (without translation). If the entry is POSTXLA, an ICAMA record is produced with PSTN number resulting from translations.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 9 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CLIOVRD	CNA, CNB	Calling line identity override. If the entry in subfield OSEL is CLIOVRD, enter data for refinement CLIOVRD. Enter CNA to allow the calling number for each call. Enter CNB to block the calling number for each call.
	CONDIGS	numeric (0 to 29 digits)	Consumed digits. If OSEL = CONSUME, enter a 0- to 11-digit number to explicitly define the number of digits consumed during call processing.
	CONTINUE	CON or NOCON	Consume digits. The default options apply if a tuple with field XLASEL set to CONT or DMOD is chosen in the CODE tables. The default case is not to consume digits (that is, the next table is indexed using the same digits as the current table, except for ignoring prefix digits). However, under certain conditions, the next table is indexed starting with the digits following the index to the current table (in other words, translations absorb or consume the current index digits). An example of this is when an area code is found in table FACODE. Table OFCCODE is indexed with the digits following the area code (the office code), so the digits used to index table FACODE are consumed. This does not mean that the digits are deleted from the digit register. They remain there and are outputted unless explicitly deleted in the CODE or RTE tables. The CON option only means that the digits are not used to index the next table. Enter CON and translation consumes the current index digits, if the next table is indexed starting with the digits following the index to the current table. Enter NOCON if digits are not to be consumed (the next table is indexed using the same digits as the current table, except the prefix digits).
	CPMCALL	Y or N	Called party metering. If OSEL = CPMCALL, enter Y (yes) if calls are billed against the called party for intra-office calls. Enter N (no) for the default value of billing against the calling party for intra-office calls.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 10 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	DDIDX	1 to 63 or DEFAULT	Destination discount index. If the entry in subfield OSEL is DDIDX, enter data for this refinement. Enter the destination discount index number.
	DEST	0 to 1023	Destination route list index. If OSEL = DEST, enter the number in the route list, of the same translation system, that the call is routed to.
	IAA_INDEX	0 to 1024	Interadmission accounting index. If the entry in subfield OSEL is IAA, enter data for this refinement. Enter the value that indexes the corresponding tuple in table IAACtrl.
	LNET	alphanumeric (1 to 16 characters)	Logical network. If OSEL = LNET, enter the logical network name the call is on. The logical network name must have been previously datafilled in table LNETWORK. The entry in this field is used by the international metering system to determine a tariff for the call.
	MAXIDX	C, F, 9, or STD	Maximum index. Enter C if the translation tables are to be indexed by dialed digits hexadecimal B (*) and hexadecimal C (#) in addition to digits in the range 0 to 9. Enter F if the translation tables are to be indexed by dialed digits in the range 0 to 9, and hex digits B, C, D, E, and F. Enter STD or 9 if the translation tables are to be indexed by dialed digits in the range 0 to 9. The default entry is 9.
	MAX	0 to 30	Maximum digits. If OSEL = MM, enter the maximum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.
	MIN	0 to 30	Minimum digits. If OSEL = MM, enter the minimum number of digits expected. This value includes the digits used to index the current tuple and must also include the prefix digits specified in the current tuple.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 11 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	MZONE	0 to 63	Metering zone. If OSEL = MZONE, enter the metering zone of the call in the logical network as defined by selector LNET. The entry in this field is used by the international metering system to determine a tariff for the call.
	NETSRV_N AME	IPHS, DPHS, MOBILE, DA, TELEGRAM, or NCC	Network service name. If the entry in subfield OSEL is NETSRV, datafill this refinement. The entry in this field determines the parameters in an outgoing IAM message. Enter IPHS to indicate a call to an independent personal handyphone system subscriber. Enter DPHS to indicate a call to a dependent personal handyphone system subscriber. Enter MOBILE to indicate a call to a mobile subscriber. Enter DA to indicate a call to the directory assistance operator. Enter TELEGRAM to indicate a call to the Telegram office. Enter NCC to indicate a call routed to one of the following networks: • New Common Carrier serving international toll traffic • New Common Carrier serving national toll traffic
	NOA	INTL, LOCAL, NATL or NET	Nature of address. Enter the required called party nature of address. • INTL (international) • LOCAL (local) • NATL (national) • NET (Intelligent Network Services)

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 12 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	ONNET	Y or N	Call on virtual private network. If OSEL = VPN, enter Y if the call stays within the defined virtual private network. Otherwise enter N (no). Overlapped outpulsing is only supported on off-network calls. Calls processed without the ONNET subfield set to Y are off-network calls. Meridian digital centrex (MDC) calls are treated as off-network calls, and therefore overlapped outpulsing is supported for MDC calls.
	PCCDR	000 to 999	Pseudo country code digits. If OSEL = PCC, enter the three-digit pseudo country code (PCC). If a two-digit PCC is required, it must be padded by a leading zero. The pseudo country code is used to record a particular pseudo country code. This can be extracted for use by system logic later, for example, two-stage outpulsing.
	PFDIGS	0 to 24	Number of prefix digits. If OSEL = PF, enter the number of prefix digits. If prefix digits have been identified in a previous table, then this number is added to the existing value. prefix digits are not stored in call detail records, outpulsed, or used to index the next translation table. Note: If refinements PF and CONSUME are both datafilled for the same tuple, only the entry for the greater of the two values is processed; the other entry is ignored.
	PFXAMA	0 to 4 digits, or N	Called party number prefix in AMA. If NOA is set to NTL, datafill PFXAMA with 0011. If NOA is set to NATL, datafill PFXAMA with 0. If NOA is set to LOCAL or NET, datafill PFXAMA with N.
	PRIVL	Y or N	Privileged user. If OSEL = PRIVL, enter Y (yes) if the user is a privileged user (for example, operator). Otherwise, enter N (no).

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 13 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	SKIPDIGS	0 to 24	Skip digits. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field indicates the number of digits to skip before removing the carrier digits from the digit stream. This field operates on the B (called) number, so it is assumed that the system signals the CIC as part of the B number.
	SOURCE	PRESUB or DIALED	Carrier identification code source. If the entry in subfield OSEL is EXTCIC, enter data for this refinement. This field specifies the source of the CIC as follows: • PRESUB - presubscribed. Table TRKGRP defines the CIC. • DIALED - dialed. The subscriber enters the CIC when dialing a call.
	STOPRTMR	Y or N	Stop remote timer. Enter Y (yes) to disable the address complete message (ACM) timer of the remote switch. Default is N (no).
	XLAID	FREE, GENERIC1, GENERIC2, or GENERIC3	AMA translation identifier. If OSEL = AMAXLAID, enter the AMA translation identifier to be used against table AMAXLAID.

NSCHEAD (continued)**Field descriptions for conditional data II (Sheet 14 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	XLASYS	AC, AM, CT, DN, FA, FT, NIL, NSC, OFC, or PX	Translation system. If OSEL = XLT, enter the next translation system to use, followed by a space, and datafill subfield XLANAME (the instance of the translation system). The choice of translation systems are: • AC (access) • AM (ambiguous) • CT (country) • DN (directory number) • FA (foreign area) • FT (utility) • NIL • NSC (number service code) • OFC (office) PX (prefix) Note: The XLASYS value NIL must not be datafilled by the operating company. NIL is only used to satisfy internal software functionality.
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. If OSEL = XLT, enter the translation name of the table instance within the XLASYS that the call is routed to.

Table history**APC010**

Added field TLC_CHARGE to option TLC in the FEATINFO selector.

APC009

Added option NETSRV to selectors CONT and RTE.

Added option JES to selector FEATINFO.

NSCHEAD (continued)

APC008.1

The following updates were introduced in APC008.1 to table AMHEAD:

- Field CHKCCR was added to all subscriber types (SUBSCTYP) that are part of the SUBSCRN option of selector FEATINFO VALIDATE.
- Field EARLYCPG was added to selector FEATINFO.
- Option IAA was added to selectors ROUTE and CONT.

GL04

Added FLEXCHG option to the CONT and RTE selectors. Added CHGIND option to the CONT and RTE selectors. Added ISUPPREF option to the CONT and RTE selectors.

APC006

PERSONAL subscriber type added to SUBSCRN option of FEATINFO VALIDATE.

NA005

The following updates were introduced to table AMHEAD in NA005:

- increased the number for universal translations support to 30 digits, affecting the following options, subfields or selectors:
 - ACF
 - AFTER
 - CONSUME
 - DEL
 - DMOD
 - DNRTE
 - INSRT
 - MAX
 - MIN
 - PF
 - REPL
- added option SF and its refinement SFDIGS to selector DNRTE.
- added note about potential conflict with refinements PFIGS and CONSUME.

NSCHEAD (end)

APC04

Subfield CDN of selectors CONT and RTE was modified to incorporate subfields NOA, STOPRTMR, and PFXAMA.

BCS35

Add CGNDN and refinements PRDFXCLI and INSRTCLI.

Add CPMCALL to CONT and RTE selectors.

Change range of values for MAXIDX.

Supplementary information

This section provides information on datafilling table NSCHEAD for specific applications, and product descriptive information related to table NSCHEAD.

Direct interaction with office parameters:

- ICAMA_REQUESTED in table OFCVAR
- IAA_REQUESTED in table OFCVAR
- IMEI_ACCEPTABLE_FOR_EMRG_CALL in table OFCVAR

NSCRTE

Table name

Number Service Code Route Table

Functional description

Table NSCRTE is a member of the universal translation tables. The universal translation tables are organized to translate the incoming digit string in segments. Table NSCRTE translates the number service code digit segment, together with tables NSCHEAD and NSCCODE.

For related information, refer to table ACRTE. For a description of the universal translation tables, see table ACHEAD.

Datafill sequence and implications

Table NSCHEAD must be datafilled before tables NSCRTE and NSCCODE.

Table size

Refer to table ACRTE.

Datafill

Field names, subfield names, and valid data ranges for table NSCRTE are described in table ACRTE.

Datafill example

Refer to table ACRTE.

Table history

NA017

Feature 59035336 introduces the Supergroup (SG) option.

BCS35

Table NSCRTE created.

NSCSCRN

Table name

Number Service Code Screening Table

Functional description

Table NSCSCRN provides six-digit (NSC-NXX) screening for service switching point (SSP) number service code (NSC) calls.

NSC Enhanced 800 Service (E800) or 800 Plus Service (800P) calls with NXX datafilled in table NSCSCRN are translated using the datafilled translation selector. If there is an equal access (EA) route datafilled in table STDPRTCT.STDPRT in an equal access end office with an SSP, then the datafilled translation selector in table NSCSCRN is ignored and the EA route is used to route the call to an originating screening office (OSO).

NSC E800 or 800P calls without an NXX datafilled in table NSCSCRN are translated using the SSP E800 or 800P method.

Note: 800P is the Canadian version of CCS7 800 Service (800 Plus). 800P is provided if package NTX555AB (800 Plus) is in the switching unit, otherwise, E800 is provided.

For related information, refer to table NSCDEFS.

Data II sequence and implications

The following tables must be datafilled before table NSCSCRN:

- HNPACONT.HNPACODE
- HNPACONT.RTEREF
- NSCDEFS
- STDPRTCT.STDPRT

Table size

0 to 16 000 tuples

NSCSCRN (continued)**Data II**

The following table lists datafill for table NSCSCRN.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
NSCODE		800P, AIN, E800, PVN, REPLDIGS, or VPN	<i>Number services code</i> Enter 800P for 800 Plus Service. Enter AIN for advanced intelligent network. Enter E800 for Enhanced 800 Service. Enter PVN for private virtual network service. Enter REPLDIGS for network services software (NSS) DBCP replace dialed digits application. Enter VPN for virtual private network service.
FROMNXX		vector of up to 18 digits from 000 to 999	<i>From three-digit code</i> Enter a three-digit code that represents a single code, or the first in a block of consecutive codes.
TONXX		000 to 999	<i>To three-digit code</i> If the entry in field FROMNXX represents a single code, enter the same three-digit code as in field FROMNXX. If the entry in field FROMNXX represents the first three-digit code in a block of consecutive three-digit codes, enter the last three-digit code in the block.

NSCSCRN (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
XLADATA		see subfield	<i>Code type, route reference</i> This field consists of subfield NSCCD.
	NSCCD	AMBI, ATV, CONT, CRSC, DN, FNPA, FRTD, FRTE, HNPA, HRTE, INWC, INWO, INWS, INWT, LRTE, MOC_RNG, MTR, NPOSDN, NSC, OPC3, OPC4, OPC5, SACNWM, SCD3, SCD4, SLRTE, SRNG, STRG, TERM, TTC, or VCT	<i>Code type</i> If the call is to a treatment, enter VCT. Otherwise, enter one of the other code types. Refer to subtable HNPACONT.HNPACODE for a description of code types.

NSCSCRN (end)**NSCCD = VCT**

If the entry in field NSCCD is VCT, datafill refinement TMT.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	TMT	alphanumeric (4 characters)	<i>Treatment</i> Enter the treatment that indexes into the appropriate subtable of table TMTCTL.

NSCCD VCT

If the entry in field NSCCD is anything other than VCT, datafill refinement RR.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	RR	0 to 1023	<i>Route reference index</i> Enter the route reference index of the route list in subtable HNPACONT.RTEREF to which translation proceeds.

Data II e xample

The following example shows sample datafill for table NSCSCRN.

MAP display example for table NSCSCRN

NSCODE	FROMXXX	TONXX	XLADATA	
E800	011	022	VCT	MSCA
800P	122	123	INWO	0
E800	200	300	INWO	0
E800	400	500	INWC	0

NSCSNPA

Table name

Number Service Code Special Area Codes Table

Functional description

Table NSCSNPA maps special routing codes (SRC) to the originating numbering plan area (NPA).

For Enhanced 800 Service (E800), 800 Plus Service (800+), and 800+ Southbound the SRC range is 000 to 009 (00Y).

Note: Special Area Code (SAC) 00Y is used to indicate the originating NPA or to indicate NSC call from a coin station.

If feature package NTX169BA (800 Plus Southbound) is in the office, the SRC range is extended from 000 to 199.

If the SRC is not found in table NSCSNPA, the call is given vacant code treatment.

Table NSCSNPA is datafilled at the service switching point (SSP) or service switching point gateway (SSPGW) that launches the database query. Only the SRCs serviced in the zone of the SSP or SSPGW are datafilled.

For related information, refer to table NSCDEFS.

Data II sequence and implications

Table HNPACONT must be datafilled before table NSCSNPA.

Table size

0 to 200 tuples

NSCSNPA (end)**Data II**

The following table lists datafill for table NSCSNPA.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
SRC		000 to 009 or 000 to 199	<i>Special routing code</i> For E800, 800+, and 800+ Southbound, enter the special routing code in the range of 000 to 009 (00Y). If the 800 Plus Southbound package is present, enter the special routing code in the range of 000 to 199 (see note).
SNPA		000 to 999	<i>Originating serving NPA</i> Enter the originating SNPA.
COINCALL		Y or N	<i>Coin station call</i> Enter Y (yes) if the 00Y indicates calls from coin stations; otherwise, enter N (no).
Note: Canada only.			

Data II e xample

The following example shows sample datafill for table NSCSNPA.

MAP display example for table NSCSNPA

SRC	SNPA	COINCALL
000	613	Y
001	613	N
009	819	N
126	519	N

NSTAFAS

Table name

Night Service Trunk Answer From Any Station Table

Functional description

Night service provides for the handling of calls, normally directed to the attendant, during his or her absence. Night service is usually activated after normal working hours and on weekends.

TAFAS feature allows any station in the customer group to answer an incoming call type by dialing a code to answer the call when the TAFAS alerting device sounds.

The system is switched into night service mode either manually by the last working attendant, or automatically when all headsets and handsets have been unplugged.

This feature allows any station in a customer group to answer by dialing a code when ringing occurs or a TAFAS alerting device sounds (for example, chimes, bells, gongs). There can be a maximum of eight TAFAS devices for each customer group.

The TAFAS devices are numbered consecutively from 0 to 7. The lowest numbered idle device is assigned to the call.

The access code for the TAFAS feature is defined in table IBNXLA.

To answer the call from the station, the procedure is to go offhook, wait for dial tone, and then dial an access code. The audible signals are silenced and the answering station is connected to the calling party. The answering station can complete the call using Call Transfer.

If the station user timesout either before or during dialing, the user receives permanent signal treatment. If the answering station is restricted from incoming calls, it receives the overflow tone. Audible signals continue to sound.

If another station has already answered the call and no other calls are waiting to be answered, the answering station receives overflow tone. If another call is waiting to be answered, the answering station is connected to the call.

Dialing the TAFAS code when night service is not activated results in intercept treatment.

NSTAFAS (continued)

Line cards NT2X17 and NT6X17 provide the DMS interface for TAFAS. The ringing from the line card is used to sound a bell or chime directly or to activate an ac relay (85 Vrms, 20 Hz) that sounds a horn.

The directory number assigned to the TAFAS device is assigned to its associated line card in table IBNLINES.

Each customer with the feature must have the TAFAS option assigned in table CUSTSTN.

Data II sequence and implications

The following tables must be datafilled before table NSTAFAS:

- CUSTSTN
- IBNLINES

Table size

1 to 32 768 tuples

For each customer group that has the TAFAS option assigned, memory is allocated in this table for eight TAFAS devices.

Data II

The following table lists datafill for table NSTAFAS.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NSNOKEY		see subfields	<i>Night service number key</i> This field consists of subfields CUSTGRP and NSTABIDX.
	CUSTGRP	alphanumeric (1 to 16 characters)	<i>Customer group name</i> Enter the name assigned to the customer group.
	NSTABIDX	numeric (0 to 7)	<i>Night service table index</i> Enter the number assigned to the TAFAS number.
DN		numeric (7- or 10-digits)	<i>Directory number</i> Enter the 7- or 10-digit directory number assigned to the TAFAS device. Call forwarding is not supported on lines assigned in table NSTAFAS.

NSTAFAS (end)

Data example

The following example shows sample datafill for table NSTAFAS.

MAP display example for table NSTAFAS

NSNOKEY	DN
BNRMC 0	2265238

NUMBFMT

Table name

ITOPS Position Display Number Formatting Table

Functional description

Table NUMBFMT provides the operating company with the ability to define the formatting of the numbers displayed on the International Traffic Operator Position System (ITOPS) screen, on the ITOPS devices, and on the International centralized automatic message accounting (ICAMA) log generated by ITOPS.

The applicable formatting is selected by the type of number (calling, called, third, special, or credit card) as well as by the leading digits of the number to display.

If an entry is not found in table NUMBFMT, then the number is displayed without any formatting.

If the number is longer than the format string, then the excess digits are displayed without any formatting.

For related information, refer to table ITOPS.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NUMBFMT.

Table size

0 to 3999 tuples

NUMBFMT (continued)**Data II**

The following table lists datafill for table NUMBFMT.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>Key into table NUMBFMT</i> This field is the key into table NUMBFMT and consists of fields TYPE and DIGITS.
	TYPE	CC, CLD, CLG, SPL, or THIRD	<i>Type of number to display</i> Enter the type of number to display as follows: Enter CC for Credit Card number. Enter CLD for called number. Enter CLG for calling number. Enter SPL for special number. Enter THIRD for third number.
	DIGITS	digit string	<i>Leading digits of number to display</i> Enter the leading digits of the number to display.
FORMAT		string of 25 X's and -'s	<i>Displayed format of number to display</i> Enter a string of up to 22 X s and - s (dashes) enclosed by quotes. The format string must contain at least one - (dash).

Data II e xample**Example 1:**

The following example shows sample datafill for table NUMBFMT.

NUMBFMT (continued)

MAP display example for table NUMBFMT

KEY		FORMAT
CLG	50	XX-XXXX
CLG	71	XX-XXXX
CLG	23	XX-XXXX-XX-XX
CLD	50	X-XXXX
CLD	71	XX-XXXX
CLD	23	XX-XX
THIRD	50	X-XXXX
THIRD	71	XX-XXXX
THIRD	23	XX-XXXX-XX-XX
SPL	50	X-XXXX
SPL	71	XX-XXXX
SPL	23	XX-XXXX-XX-XX
CC	50	X-XXXX
CC	71	XX-XXXX
CC	23	XX-XXXX-XX-XX

Example 2: Data II sample f or Caribbean of ces

The following example shows sample datafill for table NUMBFMT.

NUMBFMT (continued)**MAP display example for table NUMBFMT**

KEY		FORMAT
CLG	0	XXX-XXX-XXXX
CLG	1	XXX-XXX-XXXX
CLG	2	XXX-XXX-XXXX
CLG	3	XXX-XXX-XXXX
CLG	4	XXX-XXX-XXXX
CLG	5	XXX-XXX-XXXX
CLG	6	XXX-XXX-XXXX
CLG	7	XXX-XXX-XXXX
CLG	8	XXX-XXX-XXXX
CLG	9	XXX-XXX-XXXX
CLD	0	XXX-XXX-XXXX
CLD	1	XXX-XXX-XXXX
CLD	2	XXX-XXX-XXXX
CLD	3	XXX-XXX-XXXX
CLD	4	XXX-XXX-XXXX
CLD	5	XXX-XXX-XXXX
CLD	6	XXX-XXX-XXXX
CLD	7	XXX-XXX-XXXX
CLD	8	XXX-XXX-XXXX
CLD	9	XXX-XXX-XXXX
THIRD	0	XXX-XXX-XXXX
THIRD	1	XXX-XXX-XXXX
THIRD	2	XXX-XXX-XXXX
THIRD	3	XXX-XXX-XXXX
THIRD	4	XXX-XXX-XXXX
THIRD	5	XXX-XXX-XXXX
THIRD	6	XXX-XXX-XXXX
THIRD	7	XXX-XXX-XXXX
THIRD	8	XXX-XXX-XXXX
THIRD	9	XXX-XXX-XXXX
SPL	0	XXX-XXX-XXXX
SPL	1	XXX-XXX-XXXX
SPL	2	XXX-XXX-XXXX
SPL	3	XXX-XXX-XXXX
SPL	4	XXX-XXX-XXXX
SPL	5	XXX-XXX-XXXX
SPL	6	XXX-XXX-XXXX

NUMBFMT (continued)

MAP display example for table NUMBFMT (continued)

SPL	7	XXX-XXX-XXXX
SPL	8	XXX-XXX-XXXX
SPL	9	XXX-XXX-XXXX
CC	0	XXX-XXX-XXXX-XXXX
CC	1	XXX-XXX-XXXX-XXXX
CC	2	XXX-XXX-XXXX-XXXX
CC	3	XXX-XXX-XXXX-XXXX
CC	4	XXX-XXX-XXXX-XXXX
CC	5	XXX-XXX-XXXX-XXXX
CC	6	XXX-XXX-XXXX-XXXX
CC	7	XXX-XXX-XXXX-XXXX
CC	8	XXX-XXX-XXXX-XXXX
CC	9	XXX-XXX-XXXX-XXXX

NUMBFMT (continued)**Example 3: Data II sample f or Belize of ces****MAP display example for table NUMBFMT**

	KEY	FORMAT
CLG	022	XXX-XXXX
CLG	023	XXX-XXXX
CLG	024	XXX-XXXX
CLG	025	XXX-XXXX
CLG	026	XXX-XXXX
CLG	027	XXX-XXXX
CLG	028	XXX-XXXX
CLG	032	XXX-XXXX
CLG	042	XXX-XXXX
CLG	052	XXX-XXXX
CLG	062	XXX-XXXX
CLG	072	XXX-XXXX
CLG	082	XXX-XXXX
CLG	092	XXX-XXXX
CLG	093	XXX-XXXX
CLG	22	XXX-XXXX
CLG	23	XXX-XXXX
CLG	24	XXX-XXXX
CLG	25	XXX-XXXX
CLG	26	XXX-XXXX
CLG	27	XXX-XXXX
CLG	28	XXX-XXXX
CLG	32	XXX-XXXX
CLG	42	XXX-XXXX
CLG	52	XXX-XXXX
CLG	62	XXX-XXXX
CLG	72	XXX-XXXX
CLG	82	XXX-XXXX
CLG	92	XXX-XXXX
CLG	93	XXX-XXXX
CLD	022	XXX-XXXX
CLD	023	XXX-XXXX
CLD	024	XXX-XXXX
CLD	025	XXX-XXXX
CLD	026	XXX-XXXX

NUMBFMT (continued)**MAP display example for table NUMBFMT (continued)**

CLD	027	XXX-XXXX
CLD	028	XXX-XXXX
CLD	032	XXX-XXXX
CLD	042	XXX-XXXX
CLD	052	XXX-XXXX
CLD	062	XXX-XXXX
CLD	072	XXX-XXXX
CLD	082	XXX-XXXX
CLD	092	XXX-XXXX
CLD	093	XXX-XXXX
CLD	22	XXX-XXXX
CLD	23	XXX-XXXX
CLD	24	XXX-XXXX
CLD	25	XXX-XXXX
CLD	26	XXX-XXXX
CLD	27	XXX-XXXX
CLD	28	XXX-XXXX
CLD	32	XXX-XXXX
CLD	42	XXX-XXXX
CLD	52	XXX-XXXX
CLD	62	XXX-XXXX
CLD	72	XXX-XXXX
CLD	82	XXX-XXXX
CLD	92	XXX-XXXX
CLD	93	XXX-XXXX
THIRD	022	XXX-XXXX
THIRD	023	XXX-XXXX
THIRD	024	XXX-XXXX
THIRD	025	XXX-XXXX
THIRD	026	XXX-XXXX
THIRD	027	XXX-XXXX
THIRD	028	XXX-XXXX
THIRD	032	XXX-XXXX
THIRD	042	XXX-XXXX
THIRD	052	XXX-XXXX
THIRD	062	XXX-XXXX

NUMBFMT (continued)**MAP display example for table NUMBFMT(continued)**

THIRD	072	XXX-XXXX
THIRD	082	XXX-XXXX
THIRD	092	XXX-XXXX
THIRD	093	XXX-XXXX
THIRD	22	XXX-XXXX
THIRD	23	XXX-XXXX
THIRD	24	XXX-XXXX
THIRD	25	XXX-XXXX
THIRD	26	XXX-XXXX
THIRD	27	XXX-XXXX
THIRD	28	XXX-XXXX
THIRD	32	XXX-XXXX
THIRD	42	XXX-XXXX
THIRD	52	XXX-XXXX
THIRD	62	XXX-XXXX
THIRD	72	XXX-XXXX
THIRD	82	XXX-XXXX
THIRD	92	XXX-XXXX
THIRD	93	XXX-XXXX
SPL	0	XXX-XXX-XXXX
SPL	1	XXX-XXX-XXXX
SPL	2	XXX-XXX-XXXX
SPL	3	XXX-XXX-XXXX
SPL	4	XXX-XXX-XXXX
SPL	5	XXX-XXX-XXXX
SPL	6	XXX-XXX-XXXX
SPL	7	XXX-XXX-XXXX
SPL	8	XXX-XXX-XXXX
SPL	9	XXX-XXX-XXXX
CC	0	XXX-XXX-XXXX-XXXX
CC	1	XXX-XXX-XXXX-XXXX
CC	2	XXX-XXX-XXXX-XXXX
CC	3	XXX-XXX-XXXX-XXXX
CC	4	XXX-XXX-XXXX-XXXX
CC	5	XXX-XXX-XXXX-XXXX
CC	6	XXX-XXX-XXXX-XXXX
CC	7	XXX-XXX-XXXX-XXXX
CC	8	XXX-XXX-XXXX-XXXX
CC	9	XXX-XXX-XXXX-XXXX

Example 4: Data II sample f or China of ces

NUMBFMT (continued)**MAP display example for table NUMBFMT**

KEY		FORMAT
CLG	1	X-
CLG	2	XX-
CLG	30	XXXX-
CLG	31	XXX-
CLG	32	XXXX-
CLG	33	XXX-
CLG	34	XXXX-
CLG	35	XXX-
CLG	36	XXXX-
CLG	37	XXX-
CLG	38	XXXX-
CLG	39	XXX-
CLG	40	XXXX-
CLG	41	XXX-
CLG	42	XXXX-
CLG	43	XXX-
CLG	44	XXXX-
CLG	45	XXX-
CLG	46	XXXX-
CLG	47	XXX-
CLG	48	XXXX-
CLG	49	XXX-
CLG	50	XXXX-
CLG	51	XXX-
CLG	52	XXXX-
CLG	53	XXX-
CLG	54	XXXX-
CLG	55	XXX-
CLG	56	XXXX-
CLG	57	XXX-
CLG	58	XXXX-
CLG	59	XXX-
CLG	60	XXXX-
CLG	61	XXX-
CLG	62	XXXX-

NUMBFMT (continued)**MAP display example for table NUMBFMT (continued)**

CLD	1	X-
CLD	2	XX-
CLD	30	XXXX-
CLD	31	XXX-
CLD	32	XXXX-
CLD	33	XXX-
CLD	34	XXXX-
CLD	35	XXX-
CLD	36	XXXX-
CLD	37	XXX-
CLD	38	XXXX-
CLD	39	XXX-
CLD	40	XXXX-
CLD	41	XXX-
CLD	42	XXXX-
CLD	43	XXX-
CLD	44	XXXX-
CLD	45	XXX-
CLD	46	XXXX-
CLD	47	XXX-
CLD	48	XXXX-
CLD	49	XXX-
CLD	50	XXXX-
CLD	51	XXX-
CLD	52	XXXX-
CLD	53	XXX-
CLD	54	XXXX-
CLD	55	XXX-
CLD	56	XXXX-
CLD	57	XXX-
CLD	58	XXXX-
CLD	59	XXX-
CLD	60	XXXX-
CLD	61	XXX-
CLD	62	XXXX-

NUMBFMT (continued)**MAP display example for table NUMBFMT (continued)**

CLD	63	XXX-
CLD	64	XXXX-
CLD	65	XXX-
CLD	66	XXXX-
CLD	67	XXX-
CLD	68	XXXX-
CLD	69	XXX-
CLD	70	XXXX-
CLD	71	XXX-
CLD	72	XXXX-
CLD	73	XXX-
CLD	74	XXXX-
CLD	75	XXX-
CLD	76	XXXX-
CLD	77	XXX-
CLD	78	XXXX-
CLD	79	XXX-
CLD	80	XXXX-
CLD	81	XXX-
CLD	82	XXXX-
CLD	83	XXX-
CLD	84	XXXX-
CLD	85	XXX-
CLD	86	XXXX-
CLD	87	XXX-
CLD	88	XXXX
CLD	89	XXX-
CLD	90	XXXX-
CLD	91	XXX-
CLD	92	XXXX-
CLD	93	XXX-
CLD	94	XXXX-
CLD	95	XXX-
CLD	96	XXXX-
CLD	97	XXX-
CLD	98	XXXX-
CLD	99	XXX-

NUMBFMT (continued)**MAP display example for table NUMBFMT (continued)**

THIRD 1	X-
THIRD 2	XX-
THIRD 30	XXXX-
THIRD 31	XXX-
THIRD 32	XXXX-
THIRD 33	XXX-
THIRD 34	XXXX-
THIRD 35	XXX-
THIRD 36	XXXX-
THIRD 37	XXX-
THIRD 38	XXXX-
THIRD 39	XXX-
THIRD 40	XXXX-
THIRD 41	XXX-
THIRD 42	XXXX-
THIRD 43	XXX-
THIRD 44	XXXX-
THIRD 45	XXX-
THIRD 46	XXXX-
THIRD 47	XXX-
THIRD 48	XXXX-
THIRD 49	XXX-
THIRD 50	XXXX-
THIRD 51	XXX-
THIRD 52	XXXX-
THIRD 53	XXX-
THIRD 54	XXXX-
THIRD 55	XXX-
THIRD 56	XXXX-
THIRD 57	XXX-
THIRD 58	XXXX-
THIRD 59	XXX-
THIRD 60	XXXX-
THIRD 61	XXX-
THIRD 62	XXXX-
THIRD 63	XXX-
THIRD 64	XXXX-

NUMBFMT (end)**MAP display example for table NUMBFMT (continued)**

THIRD 65	XXX-
THIRD 66	XXXX-
THIRD 67	XXX-
THIRD 68	XXXX-
THIRD 69	XXX-
THIRD 70	XXXX-
THIRD 71	XXX-
THIRD 72	XXXX-
THIRD 73	XXX-
THIRD 74	XXXX-
THIRD 75	XXX-
THIRD 76	XXXX-
THIRD 77	XXX-
THIRD 78	XXXX-
THIRD 79	XXX-
THIRD 80	XXXX-
THIRD 81	XXX-
THIRD 82	XXXX-
THIRD 83	XXX-
THIRD 84	XXXX-
THIRD 85	XXX-
THIRD 86	XXXX-
THIRD 87	XXX-
THIRD 88	XXXX-
THIRD 89	XXX-
THIRD 90	XXXX-
THIRD 91	XXX-
THIRD 92	XXXX-
THIRD 93	XXX-
THIRD 94	XXXX-
THIRD 95	XXX-
THIRD 96	XXXX-
THIRD 97	XXX-
THIRD 98	XXXX-
THIRD 99	XXX-

NUMDIGS

Table name

Number of Digits

Functional description

The number of digits (NUMDIGS) table stores information needed for Star Remote Hub emergency stand-alone (ESA) support. Table NUMDIGS is an extension of table LINEATTR since both tables use the same line attribute index. In addition, the real serving numbering plan area (SNPA) and the real number of digits belong to a subscriber that is connected to the Star Remote Hub.

Data II sequence and implications

Table LINEATTR must be datafilled before table NUMDIGS.

Table size

0 to 1024 tuples

Data II

The following table lists datafill for table NUMDIGS.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
LATTR		0 to 31999	Line attribute. Index number like the value in table LINEATTR.
AREACODE		Vector of 1 to 5 digits, in the range of 0 to 9	The real SNPA that belongs to the group that have the same line attribute index. Up to five digits. The default is 0.
DIGSINDN		3 to 7	Digits in directory number. The real number of digits in the directory number of all the subscribers belonging to that LATTR. The default is 7.

Data II e xample

The following example shows sample datafill for table NUMDIGS.

NUMDIGS (end)

MAP display example for table NUMDIGS

TABLE : NUMDIGS		
LATTR	AREACODE	DIGSINDN
34	02	4
45	070	5

Table history NA0010

New table NUMDIGS to support ESA in the Star Remote Hub.

NWMAOCR

Table name

Network Management Automatic Out-of-Chain Reroute Table

Functional description

Table NWMAOCR lists the following information for up to a maximum of 64 (0 to 63) automatic out-of-chain reroutes:

- the route subtable number that is assigned to automatic out-of-chain routing (AOCR)
- the index activated in the reroute subtable
- the activating common language location identifier (CLLI) that is used to activate the control
- the percent overflow threshold of the activating CLLI that is exceeded before the control is activated
- overflow CLLI of the group to which traffic is rerouted (if there is a group control on this CLLI, it is removed)
- the overflow percentage on the CLLI that is used to deactivate the reroute if it is active

The AOCR control is activated when the percent overflow on the activating CLLI is greater than its threshold and the percent overflow on the overflow CLLI is less than or equal to its threshold. The AOCR control is deactivated when the percent overflow on the activating CLLI is less than or equal to its threshold or the percent overflow on the overflow CLLI is greater than its threshold.

Every 5 min an automatic check is done to activate or deactivate the control.

Table size

0 to 64 tuples

Memory for table NWMAOCR is allocated by field SIZE table DATASIZE for the entry with field SDKEY equal to NWMAOCR.

To allocate additional memory for table NWMAOCR, increase field SIZE in table DATASIZE and perform a cold restart.

NWMAOCR (continued)**Data II**

The following table lists datafill for table NWMAOCR.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
AOCR		0 to 63	<i>Automatic out-of-chain reroute number</i> Entry for this field is equal to the number that is assigned to the automatic out-of-chain reroute by the operating company.
RRTNO		0 to 255	<i>Reroute subtable number</i> Entry for this field is equal to the reroute number of table NWMRROUT to which the automatic out-of-chain reroute number is assigned. An entry outside of this range is not valid.
RRTSUB		0 to 15	<i>Reroute subtable index</i> Entry for this field is equal to the index into subtable NWMRROUT to which the automatic out-of-chain reroute number is assigned.
ACTCLLI		alphanumeric	<i>Activate CLLI</i> Entry for this field is equal to the CLLI that is exceeded to activate the control.
ACTPCT		0 to 100	<i>Active percentage</i> Enter the percentage overflow threshold on the active CLLI that has to be exceeded to activate the control.
OVFLCLLI		alphanumeric	<i>Overflow CLLI</i> Enter the CLLI of the group to which traffic is to be rerouted. If a group control is active on the CLLI, the automatic out-of-chain routing (AOCR) control is not activated.
OVFLPCT		0 to 100	<i>Overflow percentage</i> Enter the percentage overflow threshold on the overflow CLLI that has to be exceeded to deactivate the reroute, if it is active.

NWMAOCR (end)

Data l l e xample

The following example shows sample datafill for table NWMAOCR.

MAP display example for table NWMAOCR

AOCR	RRTNO	RRTSUB	ACTCLLI	ACTPCT	OVFLCLLI	OVFLPCT
0	0	0	TERMBX01	50	HULLPQ1077X0	30

NWMCLLI

Table name

Network Management CLLI Table

Functional description

Table NWMCLLI specifies the following information for each common language location identifier (CLLI):

- whether the trunk group a final route
- two values for the percentage of overflow for the trunk group that initiates a system printout
- two values for the connections per circuit per hour for the trunk group that initiates a system printout
- two values for the attempts per circuit per hour for the trunk group that initiates a system printout

The above set of values is used by table OMPRT.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NWMCLLI.

Table size

0 to 8191 tuples

The size of table NWMCLLI is controlled by the entry for field DATASIZE in table TRKGRP.

NWMCLLI (continued)**Data II**

The following table lists datafill for table NWMCLLI.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
CLLI		alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the CLLI of the trunk group to which the data entry applies.
FINAL		Y or N	<i>Final route</i> Enter Y (yes) to indicate that the trunk group is a final route; otherwise, enter N (no). An entry of Y in this field can be used for any trunk group, whether or not it is a final route. When command DISPLAY FINALS is input from the network management MAP level, all trunk groups with this field equal to Y are displayed.
PC01		numeric(1 to 100)	<i>First percentage of overflow</i> Enter the first value of the percentage of overflow on the trunk group that initiates a system printout. An entry outside of this range is not valid.
PC02		numeric(1 to 100)	<i>Second percentage of overflow</i> Enter the second value of overflow on the trunk group that initiates a system printout. An entry outside this range is not valid.
CCH1		numeric(1 to 255)	<i>First connections per circuit per hour</i> Enter the first value of connections per circuit per hour that initiates a system printout. An entry outside this range is not valid.
CCH2		numeric(1 to 255)	<i>Second connections per circuit per hour</i> Enter the second value of connections per circuit per hour that initiates a system printout. An entry outside this range is not valid.

NWMCLLI (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
ACH1		numeric(1 to 255)	<i>First attempts per circuit per hour</i> Enter the first value of attempts per circuit per hour that initiates a system printout. An entry outside this range is not valid.
ACH2		numeric(1 to 255)	<i>Second attempts per circuit per hour</i> Enter the second value of attempts per circuit per hour that initiates a system printout. An entry outside this range is not valid.

Data l l e x a m p l e

The following example shows sample of initial datafill for table NWMCLLI.

The example consists of two trunk groups: OTWAON2301T0, which is a final route, and OTWAON23DAO0, which is not a final route. Each trunk group has the same percentages of overflow, the same number of connections per circuit per hour and the same number of attempts per circuit per hour, to cause a system printout.

MAP display example for table NWMCLLI

CLLI	FINAL	PCO1	PCO2	CCH1	CCH2	ACH1	ACH2	
OTWAON2301T0		Y	10	10	10	0	0	0
OTWAON23DAO0		N	10	10	10	0	0	0

NWMIDOC

Table name

Network Management Internal Dynamic Overload Control Table

Functional description

Table NWMIDOC lists the following information for each of the two levels of Dynamic Overload Control, called machine congestion levels 1 and 2 (MC1 and MC2):

- signal distribution (SD) group and point assignments
- ON threshold and the length of time the threshold is exceeded before the control is activated
- OFF threshold and the length of time the threshold is exceeded before the control is deactivated

Dynamic Overload Control levels are triggered by the machine. Levels MC1 and MC2 are triggered by either the length of the multifrequency (MF) receiver wait queue, or from CPU usage percentage for call processing.

Dynamic Overload Control level MC3 is triggered if the office has lost call processing ability. For additional information on Internal Dynamic Overload Control (IDOC) level 3, see office parameter SDOC3_ENABLE in table OFCOPT and alarm SD point SDOC3CUTOFF in table ALMSD.

Data II sequence and implications

Tables NWMSD and NWMSDPT need to be datafilled prior to table NWMIDOC for the implementation of IDOC controls.

This change is needed since NWMIDOC is also used for NWMSILC (Network Management Selective Incoming Load Controls) controls. For implementing SILC control, in the DMS 250, the datafill sequence is not important.

Table size

0 to 3 tuples

NWMIDOC (continued)**Data II**

The following table lists datafill for table NWMIDOC.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
IDOCLEV		1 to 3	<i>Internal dynamic overload control level</i> Enter the Internal Dynamic Overload Control (IDOC) level.
MFONTHLD		0 to 100	<i>Multifrequency ON threshold</i> Enter the threshold that activates the control. For levels 1 and 2, the range is 0 to 100. For level 3, enter 1 to satisfy the table editor. An entry outside this range is invalid. There is no default value for this field.
MFONFILT		0 to 15	<i>Multifrequency ON filter</i> Enter the number of 1-min intervals the ON threshold value must exceed before the control is activated. For levels 1 and 2, the range is 0 to 15. For level 3, enter 1 to satisfy the table editor. There is no default value for this field.
MFOFTHLD		0 to 100	<i>Multifrequency OFF threshold</i> Enter the threshold that deactivates the control. For levels 1 and 2, the range is 0 to 100. For level 3, enter 1 to satisfy the table editor. An entry outside this range is invalid.
MFOFFILT		0 to 15	<i>Multifrequency OFF filter</i> Enter the number of 1-min intervals the OFF threshold value reaches before the control is deactivated. For levels 1 and 2, the range is 0 to 15. For level 3, enter 1 to satisfy the table editor.
CPONTHLD		0 to 100	<i>CPU ON threshold</i> Enter the threshold that activates the control. For levels 1 and 2, the range is 0 to 100. For level 3, enter 1 to satisfy the table editor. An entry outside this range is invalid.

NWMIDOC (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
CPONFILT		0 to 15	<i>CPU ON filter</i> Enter the number of 1-min intervals the ON threshold value must exceed before the control is activated. For levels 1 and 2, the range is 0 to 15. For level 3, enter 1 to satisfy the table editor. There is no default.
CPOFTHLD		0 to 100	<i>CPU OFF threshold</i> Enter the threshold that deactivates the control. For levels 1 and 2, the range is 0 to 100. For level 3, enter 1 to satisfy the table editor. An entry outside this range is invalid.
CPOFFILT		0 to 15	<i>CPU OFF filter</i> Enter the number of 1-min intervals the OFF threshold value is reached before the control is deactivated. For levels 1 and 2, the range is 0 to 15. For level 3, enter 1 to satisfy the table editor.
SDGROUP		0 to 511	<i>Signal distribution group</i> Enter the signal distribution (SD) group, in table NWMSD, of the SD point assigned to the IDOC.
SDPT		0 to 6	<i>Signal distribution point</i> Enter the SD point in table NWMSDPT, assigned to the IDOC.

Data I l e x a m p l e

The following example shows sample datafill for table NWMIDOC.

NWMIDOC (end)

MAP display example for table NWMIDOC

IDOCLEV	MFONTHLD	MFONFILT	MFOFTHLD	MFOFFILT	CPONTHLD	CPONFILT	
CPOFTHLD							
CPOFFILT	SDGROUP	SDPT					
4	1	2	2	2	2	4	2
	2	0	4				
4	2	3	2	2	2	5	2
	2	0	5				
1	3	1	1	1	1	1	1
	1	0	6				

NWMPPLN**Table name**

Network Management Preplan Control Table

Functional description

Table NWMPPLN lists the maximum number of trunk groups that are assigned to each preplan in the table. Table NWMPPLN specifies whether the preplan is referenced by entries in table CCSDOC or table NWMSCPT.

Table size

0 to 256 tuples

The sizing of this table is controlled by field SIZE in table DATASIZE.

Data II

The following table lists datafill for table NWMPPLN.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
PPLN		0 to 255	<i>Preplan number</i> Enter the preplan number.
NCTRLS		1 to 32	<i>Number of preplan controls</i> Enter the maximum number of trunk group controls that can be assigned to the preplan number. Any entry outside this range is not valid.
CCS		Y or N	<i>Common channel signaling</i> Enter Y (yes) if the entry in table CCSDOC refers to a control in this preplan. Enter N (no) if an entry in table NWMSCPT refers to this preplan.

Data II e xample

The following example shows sample datafill for table NWMPPLN.

NWMPPLN (end)

MAP display example for table NWMPPLN

PPLN	NCTRLS	CCS
0	8	N

NWMSC

Table name

Network Management Scan Group Table

Overview

Network management scan groups are required in switches arranged for key reroute, key operated route transfers, key-activated preplanned network management control, and key-operated trunk network management busy functions.

Each miscellaneous scan card with product engineering code (PEC) NT0X10AA provides 14 single-lead scan points. The card is further subdivided into two scan groups, each scan group consisting of seven scan points (0 to 6). Each scan group is assigned to a trunk module circuit number. There can be a maximum of 256 network management scan groups (128 miscellaneous scan cards).

The function performed by each of the assigned scan points in the network management scan groups is identified in table NWMSCPT.

Functional description

Table NWMSC contains the switch dependent data for each of the network management scan groups. The data consists of the PEC of the scan card and its physical location.

Note: If the NORESTARTSWACT utility is available on your switch, you can activate data changes without interrupting service. Refer to the *NORESTARTSWACT User Guide*, 297-1001-546.

Data II sequence and implications

The following tables must be datafilled before table NWMSC.

- CLLI
- DATASIZE

Table NWMSC has a pseudo fixed common language location identifier (CLLI) code of the network management scan group. If NWMSC is not datafilled in table CLLI, additions to table NWMSC are not possible. For information on the pseudo fixed CLLI of NWMSC, see table CLLI.

Table size

Prior to CSP02, memory size can be increased by changing the value of field SIZE in table DATASIZE if NWMSC is entered in field DATSKEY. To activate the increase in field SIZE, do a cold restart.

NWMSC (continued)

For CSP02 and up, a restart is no longer required to increase the table size.
Tuple NWMSC is no longer required in table DATASIZE.

Data II

The following table lists datafill for table NWMSC.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
SCGROUP		0 to 255	<i>Scan group</i> Enter the scan group number.
TMTYPE		ATM, CTM, DTM, MMA, MTM, OAU, PTM, RMM, RSM, STM, TAN, TMA, TM2, TM4, TM8, or T8A	<i>Trunk module type</i> Enter the type of trunk module on which the circuit is mounted. ATM CTM (carrier trunk module) DTM (digital trunk module) MMA (Austrian maintenance trunk module) MTM (maintenance trunk module) OAU (office alarm unit) PTM (package trunk module) Note: PTM is manufacturer discontinued, enter MTM instead.

NWMSC (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
TMTYPE			RMM (remote maintenance module) RSM (remote service module) STM (service trunk module) TAN (test access network) TMA (trunk module access) TM2 (trunk module with 30 pairs [two-wire circuits] of conductors) TM4 (trunk module with 60 pairs [four-wire circuits] of conductors) TM8 (trunk module with 120 pairs [eight-wire circuits] of conductors) T8A (trunk module with 120 pairs [eight-wire circuits] of conductors with a metallic test access [MTA] bus)
TMNO		0 to 2047	<i>Trunk module number</i> Enter the number assigned to the trunk module on which the circuit is mounted.
TMCCTNO		0 to 29	<i>Trunk module circuit number</i> Enter the trunk module circuit number to which the circuit is assigned.
CARDCODE		0X10AA	<i>Card code</i> Enter the Northern Telecom product engineering code (PEC) for the scan card. Any entries outside the range indicated for this field are invalid.

Data file example

The following example shows sample datafill for table NWMSC.

NWMSC (end)

MAP display example for table NWMSC

SCGROUP	TMTYPE	TMNO	TMCCTNO	CARDCODE
0	MTM	2	5	0X10AA

Table history

CSP02

A restart is no longer required to increase table size. An entry for table NWMSC is no longer required in table DATASIZE.

BCS36

Reference to the NORESTARTSWACT utility was added.

NWMSCPT**Table name**

Network Management Scan Point Table

Functional description

Table NWMSCPT identifies the function performed by each of the assigned scan points in the network management scan groups.

For related information, refer to table NWMSC.

Data II sequence and implications

The following tables must be datafilled before table NWMSCPT:

- CLLI
- NWMSC
- NWMPPLN
- TMINV

Table size

0 to 256 tuples

Memory is automatically allocated for seven scan points for each of the scan groups specified in table DATASIZE by field SIZE with field DATSKEY is set to NWMSC.

Data II

The following table lists datafill for table NWMSCPT.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
SCGRPPT		see subfields	<i>Scan group and point</i> This field is the key to the table and consists of subfields SCGROUP and SCPT.
	SCGROUP	0 to 255	<i>Scan group</i> Enter the scan group to which the scan point belongs. This entry corresponds to field SCGROUP in table NWMSC.

NWMSCTP (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
NORMST	SCPT	0 to 6	<i>Scan point</i> Enter the scan point number.
		0 or 1	<i>Normal state</i> This entry specifies the normal state of the scan point. Enter 0 (zero) if the scan point is normally off or open. Enter 1 if the scan point is normally on or closed.
	SCDATA	see subfield	<i>Scan data</i> This field consists of subfield SCPTTYP and its refinements.
	SCPTTYP	PPLNRRTEor TKNMB	<i>Scan point type</i> Specify the scan point type. Enter PPLN for preplanned control and datafill refinement at PPLNNO. Enter RRTE for key reroute and datafill refinements RRTNO and RRTSUB. Enter TKNMB for trunk network management busy if the scan point is associated with a trunk network management busy (which allows the operating company to select any outgoing or two-way trunk circuit or group of trunk circuits and remove them from or return them to service). Datafill refinement TDATA.
	PPLNNO	0 to 255	<i>Preplanned control number</i> If the entry in subfield SCPTTYP is PPLN, datafill this refinement. Enter the preplanned control number with which the scan point is associated. See tables NWMPPLN and PREPLANS.
	RRTNO	0 to 1023	<i>Reroute number</i> If the entry in subfield SCPTTYP is RRTE, datafill this refinement. Enter the reroute number of table REROUTE with which the scan point is associated.

NWMSCPT (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	RRTSUB	0 to 15	<i>Reroute subtable index</i> If the entry in subfield SCPTTYP is RRTE, datafill this refinement. Enter the index into subtable REROUTE.NWMRROUT with which the scan point is associated.
	TDATA	see subfields	<i>Trunk data</i> If the entry in subfield SCPTTYP is TKNMB, datafill this refinement. This field consists of subfield CTRLTYP.
	CTRLTYP	CKT or GRP	<i>Control type</i> If only one circuit of a trunk group is to be busied, enter CKT and datafill refinements CLLI and CKTNO as explained below. If a complete trunk group is to be busied, enter GRP and datafill refinement CLLI only.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the common language location identifier (CLLI) assigned to the trunk group for which one circuit or the entire trunk group is to be busied. The CLLI must appear in table CLLI.
	CKTNO	0 to 9999	<i>Circuit number</i> If the entry in refinement CTRLTYP is CKT, datafill this refinement. Enter the external trunk circuit number that is to be busied.

Data I l e x a m p l e

The following example shows sample datafill for table NWMSCPT.

NWMSCPT (end)

MAP display example for table NWMSCPT

SCGRPPT NORMST			SCDATA	
0	0	0	PPLN	0

NWMSD

Table name

Network Management Signal Distributor Group Table

Functional description

Table NWMSD identifies the signal distributor (SD) circuit location and the type of card for each signal distributor group that is assigned to network management.

An SD group consists of seven SD points numbered from 0 to 6. Each SD card consists of 14 SD points that make up two SD groups. Each SD group is assigned an arbitrary network management SD group number (0 to 511).

Data II sequence and implications

Table CLLI must be datafilled before table NWMSD.

Table NWMSD has a pseudo fixed common language location identifier (CLLI) code of NWMSD. If NWMSD is not datafilled in table CLLI, additions to table NWMSD are not possible.

Table size

Prior to CSP02, memory size can be increased by changing the value of field SIZE in table DATASIZE if NWMSD is entered in field DATSKEY. To activate the increase in field SIZE, do a cold restart.

For CSP02 and up, a restart is no longer required to increase the table size. Tuple NWMSD is no longer required in table DATASIZE.

Subtable NWMSD.NWMSDPT is replaced by table NWMSDPT, but it is still controlled by table NWMSD. Memory can be dynamically allocated so that the table size is affected by the number of tuples entered. Data store for seven SD points is automatically allocated in table NWMSDPT for each SD group entered in NWMSD. The points can then be added, changed, or deleted from table NWMSDPT as needed.

NWMSD (continued)**Data II**

The following table lists datafill for table NWMSD.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NWMSDGRP		0 to 511	<i>Network management signal distributor group</i> Enter the network management signal distributor (SD) group number assigned to the SD group.
Note: Fields TMTYPE, TMNO, and TMCCTNO are updated by first deleting the entries, then adding them again to the table. Changes to these fields are not valid unless the old values are first removed.			
TMTYPE		MTM	<i>Trunk module type</i> Enter the type of trunk module on which the SD card is located. An entry outside this range is invalid.
TMNO		0 to 255	<i>Trunk module number</i> Enter the trunk module number assigned to the miscellaneous trunk module on which the SD card is located. An entry outside this range is invalid.
TMCCTNO		0 to 29	<i>Trunk module circuit number</i> Enter the trunk module circuit number to which the network management SD group is assigned.
CARDCODE		2X57AA	<i>Card code</i> Enter the card code to which the network management SD group is assigned.

Data II e xample

The following example shows sample datafill for table NWMSD.

NWMSD (end)

MAP display example for table NWMSD

NWMSDGRP	TMTYPE	TMNO	TMCC'TNO	CARDCODE
0	MTM	0	18	2X57AA

Table history
CSP02

A restart is no longer required to increase table size. An entry for table NWMSD is no longer required in table DATASIZE.

NWMSDPT

Table name

Network Management Signal Distributor Point Table

Functional description

Table NWMSDPT is controlled by table NWMSD. Entries to table NWMSDPT are not added as free points with a normal state (NORMST) equal to 0 (zero). Points must be added to the table as they are assigned.

The POS command has two parameters: signal distribution (SD) group and SD point. Once positioned on a table entry, a point can be assigned to the following types of network management functions.

Trunk Group Busy (TGB)

If the SD point is assigned to the Trunk Group Busy (TGB) feature, the SD point can be assigned a maximum of 32 common language location identifiers (CLLI). If all trunks assigned to the CLLIs are busy, the SD point is activated, which in turn lights a trunk group busy lamp.

Internal Dynamic Overload Control (IDOC)

A SD point can be assigned to each of the network management Dynamic Overload Control (DOC) levels 1 and 2. When DOC is activated, the assigned SD point distributes signals to a subtending office.

To assign Internal DOC (IDOC) level 3, see office parameter SDOC3_ENABLE in the table OFCOPT and alarm SD point SDOC3CUTOFF in table ALMSD.

Data II sequence and implications

There is no requirement to datafill other tables prior to table NWMSDPT.

Table size

0 to 512 tuples

Memory is dynamically allocated in table DATASIZE in field SIZE with field DATSKEY set to NWMSDPT.

NWMSDPT (continued)**Data II**

The following table lists datafill for table NWMSDPT.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
SDGRPPT		see subfields	<i>Signal distributor group point</i> This is the key field that uniquely identifies each entry. The field consists of subfields SDGROUP and SDPOINT.
	SDGROUP	0 to 511	<i>Network management signal distributor group point</i> This is the signal distributor group of the point being defined. It must be an element of table NWMSD.
	SDPOINT	0 to 6	<i>Signal distributor point</i> Enter the number of the signal distributor (SD) point.
NORMST		0 or 1	<i>Normal state</i> Enter the number of the normal state of the SD point (0 [zero] if the normal state is off or open, 1 if the normal state is on or closed).
SDDATA		see subfield	<i>Signal distributor data</i> This field consists of subfield SDPTTYP.
	SDPTTYP	IDOC or TGB	<i>Signal distributor point type</i> If the SD point is assigned to Internal Dynamic Overload Control (IDOC), enter IDOC and datafill refinement IDOCLEV. If the SD point is assigned to feature Trunk Group Busy and the entry is first for the SD point, enter TGB and datafill refinement TGB_CLLIST. If the entry is not first for the SD point, leave this field blank.

NWMSDPT (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	IDOCLEV	1, 2, or 3	<i>Internal Dynamic Overload Control level</i> If the entry in subfield SDPTTYP is IDOC, datafill this refinement. Enter the IDOC level assigned to the SD point.
	TGB_CLLILIST	alphanumeric (up to 16 characters)	<i>Trunk group busy common language location identifier</i> If the entry in subfield SDPTTYP is TGB, datafill this refinement. Enter up to 32 common language location identifier (CLLI) codes that are assigned to each of the trunk groups in table CLLI. If less than 32 codes are required, end the list with a \$ (dollar sign).

Data I l e x a m p l e

An example of datafill is shown below for the seven SD points in network management SD group 0 for table NWMSDPT.

SD points 0 to 2 are assigned to individual trunk groups for the Trunk Group Busy feature.

SD point 3 is assigned to more than one trunk group for the Trunk Group Busy feature.

SD points 4 and 5 are assigned to IDOC levels 1 and 2 respectively.

NWMSDPT (end)**MAP display example for table NWMSDPT**

SDGRPPT NORMST		SDDATA
0 0	0	
TGB (OTWAON23CG00) \$		
0 1	0	
TGB (SMFLON1801T0) \$		
0 2	0	
TGB (TOROON0101T0) \$		
0 3	0	
TGB (TOROON0101T0) (VANCBC0104T0) (WNDSON1201T0) \$		
0 4	0	IDOC 1
0 5	0	IDOC 2

NX64MEM

Table name

NX64 Member Table

Functional description

Table NX64MEM specifies the physical location of NX64 trunks in the same way that table TRKMEM specifies other analog or digital trunks. An NX64 trunk is a grouping of N ($N = 2$ to 31) next to 64 kbit/s time slots on a 2048 kbit/s PCM30 carrier. The use of NX64 trunks is for $(N \times 64)$ kbit/s nailed-up connections. For each NX64 trunk member, table NX64MEM specifies the trunk group common language location identifier (CLLI), the N time slots, and the equipment location.

Data II sequence and meaning

You must enter data in the following tables before you enter data in table NX64MEM:

- CLLI
- LTCINV
- LTCPSINV
- TRKGRP
- TRKSGRP

You must enter data in table TRKMEM after you enter data in table NX64MEM. Both tables write to the same physical store.

In table LTCINV, the field OPTATTR setting is NX64 for the PCM30 digital trunk controller (PDTC) peripheral module (PM).

In table TRKGRP, the trunk group is type NU (nailed-up).

In table TRKSGRP, the field SIGDATA setting is STDTL (standard transmission line) for the trunk group. If the field SIGDATA setting is not STDTL, the rejection of datafill occurs.

You can read the first time slot of an NX64 trunk in table TRKMEM. Deletion or change of the first time slot of an NX64 trunk in table TRKMEM cannot occur.

You must enter data in the following tables after you enter data in table NX64MEM.

NX64MEM (continued)**Table size**

0 to 500 tuples

Data II

Datafill for table NX64MEM appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
CLLI		alphanumeric (1 to 16 characters)	<i>Common language location identifier.</i> Enter the code assigned to the trunk group to which the NX64 trunk member belongs. First enter this code in table CLLI.
EXTRKNM		0 to 9999	<i>External trunk number.</i> Enter the number assigned to the NX64 trunk in the trunk group.
SGRP		0 to 1	<i>Subgroup.</i> Enter the subgroup number of the NX64 trunk.
NX64VAR		see subfields	<i>NX64 variable.</i> This field specifies the NX64 variable area and contains subfields PMTYPE, DEQNO, DEQCKTNO, DEQCKTTS, and NX64BW.
	PMTYPE	PDTC	<i>Peripheral module type.</i> Enter PDTC to specify the type of PM on which the trunk resides. The system does not support other PM types.
	DEQNO	0 to 511	<i>Digital equipment number.</i> Enter the digital equipment number of the PDTC as entered in table LTCINV.
	DEQCKTNO	0 to 15	<i>Digital equipment circuit number.</i> Enter the PDTC peripheral side (P-side) port number. Entries outside this range are not correct.
	DEQCKTTS	1 to 31	<i>Digital equipment circuit time slot.</i> Enter the time slot number of the first time slot in the NX64 trunk.
	NX64BW	2 to 31	<i>NX64 bandwidth.</i> Enter the number of time slots in the NX64 trunk. This number is the value of <i>N</i> .

NX64MEM (end)

Data I l e x a m p l e

Datafill for table NX64MEM appears in the following example.

MAP example for table NX64MEM

CLLI	EXTRKNM	SGRP	NX64VAR
NX64_A_TO_B2	1	0	PDTC 45 106

OACAUPRF

Table name

Operator Services System Advanced Intelligent Network Cause Profile

Functional description

Table OACAUPRF selects services according to ISUP cause codes while a call is being connected. This period only occurs during call float. Only services provided by an OSSAIN node can be selected; that is, a TOPS operator or TOPS automated system cannot be selected.

Data II sequence and implications

Tables OAFUNDEF and OACTLDEF must be datafilled before table OACAUPRF.

This table must be datafilled prior to datafilling a cause index into table OACNNPRF.

Table size

0 to 100 tuples

Data II

The following table lists datafill for table OACAUPRF.

Field descriptions (Sheet 1 of 5)

Field	Subfield or refinement	Entry	Explanation and action
IDX		0 to 2046	Index. Index into table from table OACNNPRF.
PROFILE		see subfield RELCLASS	Profile. This field consists of subfield RELCLASS.

OACAUPRF (continued)**Field descriptions (Sheet 2 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	RELCLASS	NORM, CL2, CL3, CL4, CL5, CL6, CL7	ISUP release class. • NORM - Normal Event Class - Cause codes 1-31 • CL2 - Resource Unavailable Class - Cause codes 34-47 • CL3 - Service Option Not Available Class - Cause codes 52-63 • CL4 - Service Option Not Implemented Class - Cause codes 65-79 • CL5 - Invalid Message Class - Cause codes 81-95 • CL6 - Protocol Error Class - Cause codes 97-111 • CL7 - Interworking Class - Cause code 127 If RELCLASS = NORM, datafill refinements RELCAUSE, RFLTONFL, and ACTSEL. If RELCLASS = CL2 through CL7, datafill refinement ACTSEL.

OACAUPRF (continued)**Field descriptions (Sheet 3 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	RELCAUSE	1 to 31	ISUP release cause code. If RELCLASS = NORM, datafill this refinement. For calls not terminating to ISUP trunks, the cause code is not applicable. If a cause code occurs but is not selected for triggering, the call is routed to an appropriate treatment for that cause code. Or, if the cause code occurs and is selected for triggering, the call is instead routed to an OSSAIN node. Following are the codes: • 1 - Unallocated Number • 2 - No Route to Transit Network • 3 - No Route to Destination • 4 - Send Special Info Tone • 5 - Misdialed Trunk Prefix • 16 - Normal Clearing • 17 - User Busy • 18 - No User Responding • 19 - No Answer From User • 21 - Call Rejected • 22 - Number Changed • 25 - Translations Fail • 26 - Call Returns • 27 - Destination out of Service • 28 - Address Incomplete • 29 - Facility Rejected • 30 - Apply Locally • 31 - Normal Unspecified Note: This list contains the current known ISUP release cause codes. However, any release cause in the range 1-31 can be datafilled.

OACAUPRF (continued)**Field descriptions (Sheet 4 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	RFLTONFL	Y or N	Refloat on failure. This field indicates if a call should refloat when a trigger event leads to a failure. A failure is when the call cannot be presented to a SN or operator, or cannot be queued for a SN or operator and queueing is active. The values are Y (refloat) and N (do not refloat). Failures are due to the following: • Presentation failure to a SN occurs when a session cannot be obtained with the SN. If RFLTONFL = N, disposition routing is used from table OAFNDISP. • Queue failure occurs from queue overflow or deflection. If RFLTONFL = N, the call is sent to treatment. The exceptions and restrictions on this field are as follows: • If a call triggers, that trigger has RFLTONFL = Y, and the switch is attempting to obtain a session with a service node, field RFLTONFL is ignored. • A refloat is only attempted if RFLTONFL = Y, the calling party is attached, and the called party is either connecting or already connected.
	ACTSEL	see subfield ACCTYPE	Action select. This refinement is datafilled for all values of field RELCLASS. This field consists of subfield ACTTYPE.
	ACTTYPE	CTRLLIST or FUNCTION	Action type. Select either a list of services (CTRLLIST) or a single service (FUNCTION) to be performed if the the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.

OACAUPRF (continued)**Field descriptions (Sheet 5 of 5)**

Field	Subfield or refinement	Entry	Explanation and action
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.

Data example

The following example shows sample datafill for table OACAUPRF.

MAP display example for table OACAUPRF

```

IDX    PROFILE
-----
0      (NORM 17 Y FUNCTION MDS_NODE)
      (NORM 18 Y FUNCTION MDS_NODE)
      (NORM 19 Y FUNCTION MDS_NODE)
      (CL2 FUNCTION MDS_NODE)

```

Table history**TOPS11**

Subfield RFLTONFL is added by feature AF7712 in functionality OSSAIN 11 Enhancements, OSAN0006.

TOPS09

Fields CTRLLIST and FUNCTION can now use the name of an SN or TOPS operator function provider. That is, the entered name's function provider is defined in table OAFUNDEF field FUNCTYPE as either SN or TOPSOPER.

OACAUPRF (end)

Before this release, only an SN function provider was allowed. This change is added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN00004.

TOP08

Tthe range of field IDX is expanded to 0-2046 by PRSDOC BY65801 in functionalities OSSAIN (ENSV0014) and OSSAIN Enhancements (ENSV0020).

NA006

Table OACAUPRF was created by functionality Operator Services, ENSV0014.

OACNNPRF

Table name

Operator Services System Advanced Intelligent Network Connecting Profile

Functional description

Table OACNNPRF selects services according to types of trigger events while a call is being connected. Trigger events only occur during call float. Only services provided by an OSSAIN node can be selected; that is, a TOPS operator or TOPS automated system cannot be selected.

Data II sequence and implications

Tables OAFUNDEF, OACTLDEF, OADTFPRF, and OACAUPRF must be datafilled before table OACNNPRF.

Table size

0 to 255

Data II

The following table lists datafill for table OACNNPRF.

Field descriptions (Sheet 1 of 7)

Field	Subfield or refinement	Entry	Explanation and action
CONNIDX		0 to 254	Connect index. Index into table from table OATPRFIX.
PROFILE		see subfields	Profile. This field consists of subfields TRIGGER, SNCONTROL, RFLTONFL and ACTSEL.

OACNNPRF (continued)**Field descriptions (Sheet 2 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	TRIGGER	OPLSF, NOANS, FLASH, CLGD, ANS, TRMT, RING	Trigger. A list of trigger events during call connection (end with '\$'). If no events are entered, no further refinements of PROFILE must be datafilled. Note, the MAP display also shows values NTFY, and PTYD; however, these are not valid trigger events. Following are the valid events: OPLSF - Outpulsing failure. Outpulsing may fail due to glare or an inoperable trunk in the terminating office. To account for these conditions the DMS switch automatically makes another attempt at routing the call to the terminating party. This event occurs after the second attempt fails. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, the call is taken down.

OACNNPRF (continued)**Field descriptions (Sheet 3 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
			NOANS - No answer. The call is not answered. No answer occurs when the no answer timer expires before answer. The no answer timer is only started if the no answer event is datafilled in table OACNNPRF. Then, the no answer timer is started upon successful outpulsing of all digits on an MF or DP trunk. And, the no answer timer is started upon receiving an Address Complete Message (ACM) on an ISUP trunk. The no answer time is initially specified by the NOANS_TIMER in table OAINPARM. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, the no answer timer is not started and eventually the calling party goes on-hook. FLASH - The calling party hook flashes. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, this event is ignored. Note, OSSAIN trigger processing is not supported for automatic coin toll service (ACTS) floated calls. Calls floated by ACTS are routed to an operator. CLGD - Calling disconnect. The calling party goes on-hook. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, the call is taken down. Then, the call may be routed to ACTS or an operator for time and charges. Note, OSSAIN trigger processing is not supported for calls requiring time and charges. These calls are routed to ACTS or an operator.

OACNNPRF (continued)**Field descriptions (Sheet 4 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
			ANS - Answer. The terminating party answers. If this event occurs and is selected, the call begins, a connection timestamp is taken, and routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, the call begins and a connection timestamp is taken. TRMT - Treatment. The call receives a local DMS switch treatment for conditions such as all trunks busy or vacant code. If this event occurs and is selected, the call is routed to an OSSAIN node. Calls floated to treatment cannot trigger to treatment. RING - Ringing. The call has terminated to an ISUP trunk. The terminating office indicates ringing by sending an ACM message, with the Called Party Status field set to 'Subscriber Free' or 'Connect When Free', back to the TOPS office. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, ringing is supplied to the originator by the terminating office.
	SNCONTRL	Y or N	Service node control. Indicates whether or not the service node acquires control of the call for this trigger event. A Y indicates that the service node acquires control. An N indicates that the service node is informed of the trigger event but call control remains at the TOPS switch. When set to N, the service node is given a minimum of information, mainly the session begin message. When set to Y, all event information is sent to the service node for it to determine processing. And, trigger processing is not performed, rather the node is informed of the events so that the node can determine the course of action. Therefore, this table (OACNNPRF) is only valid if SNCONTRL = N.

OACNNPRF (continued)**Field descriptions (Sheet 5 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	RFLTONFL	Y or N	Refloat on failure. This field indicates if a call should refloat when a trigger event leads to a failure. A failure is when the call cannot be presented to a SN or operator, or cannot be queued for a SN or operator and queueing is active. The values are Y (refloat) and N (do not refloat). Failures are due to the following: • Presentation failure to a SN occurs when a session cannot be obtained with the SN. If RFLTONFL = N, disposition routing is used from table OAFNDISP. • Queue failure occurs from queue overflow or deflection. If RFLTONFL = N, the call is sent to treatment.

OACNNPRF (continued)**Field descriptions (Sheet 6 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
			The exceptions and restrictions on this field are as follows: • If a call triggers, that trigger has RFLTONFL = Y, and the switch is attempting to obtain a session with a service node, field RFLTONFL is ignored. • A refloat is only attempted if RFLTONFL = Y, the calling party is attached, and the called party is either connecting or already connected. • If a call is queued for an OSSAIN session, the notify timer expires, and that trigger tuple has RFLTONFL = N, field RFLTONFL is ignored. • The RFLTONFL value is applicable if the call triggers to an operator and fails. However, if the call triggers to a service node, fails, and subfield SNCONTRL = N, the call remains floated regardless of the RFLTONFL setting. • If the switch is performing a refloat on failure in the connecting phase, a trigger event from the no answer timer can be lost, the service node is not be informed. The no answer trigger is selected with field TRIGGER = NOANS. The timer is set by table OAINPARAM parameter NOANS_TIMER.
	ACTSEL	see subfield ACCTYPE	Action select. This field consists of subfield ACTTYPE.
	ACTTYPE	FUNCTION or CTRLLIST	Action type. Select either a single service (FUNCTION) or list of services (CTRLLIST) to be performed if the the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.

OACNNPRF (continued)**Field descriptions (Sheet 7 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
DTMFPRF		see subfield DTMFSEL	DTMF select. This field consists of subfield DTMFSEL.
	DTMFSEL	Y or N	DTMF profile. Enter Y for DTMF trigger processing of the call and datafill subfield DTMFIDX. Otherwise, enter N.
	DTMFIDX	0 to 2046	DTMF index. Datafill this field only if DTMFSEL = Y. Enter an index into table OADTFPRF.
CAUSEPRF		see subfield CAUSESEL	Cause profile. This field consists of subfield CAUSESEL.
	CAUSESEL	Y or N	Cause select. Enter Y to trigger for ISUP cause events and datafill subfield CAUSEIDX. Otherwise, enter N.
	CAUSEIDX	0 to 2046	CAUSE index. Datafill this field only if CAUSESEL = Y. Enter an index into table OACAUPRF.

Data I l e x a m p l e

The following example shows sample datafill for table OACNNPRF.

OACNNPRF (continued)**MAP display example for table OACNNPRF**

CONNIDX	PROFILE	DTMFPRF	CAUSEPRF
0	(NOANS Y Y FUNCTION ROUTE_NODE)	Y 7	Y 3
1	(NOANS Y Y CTRLLIST Y_PAGES)	N	Y 3

Error messages

The following error messages apply to table OACNNPRF.

Error messages for table OACNNPRF

Error message	Explanation and action
NOT A VALID CONNECTION TRIGGER	This message is displayed if an attempt is made to datafill an invalid value in field TRIGGER. Valid values are TRMT, OPLSF, NOANS, FLASH CLGD, and ANS.
Only one action assignment allowed per trigger	This message is displayed if an attempt is made to add or change a tuple with more than one action assigned to the same trigger.
DTMF index is not in table OADTFPRF	This message is displayed if an attempt is made to datafill field DTMFIDX with a value not in table OADTFPRF.
CAUSE index is not in table OACAUPRF	This message is displayed if an attempt is made to datafill field CAUSEIDX with a value not in table OACAUPRF.

Table history**TOPS11**

Subfield RFLTONFL is added by feature AF7712 in functionality OSSAIN 11 Enhancements, OSAN0006.

TOPS09

Fields CTRLLIST and FUNCTION can now use the name of an SN or TOPS operator function provider. That is, the entered name's function provider is defined in table OAFUNDEF field FUNCTYPE as either SN or TOPSOPER. Before this release, only an SN function provider was allowed. This change is added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN00004.

OACNNPRF (end)

TOP08

The ranges of fields DTMFIDX and CAUSEIDX are expanded to 0-2046 by PRSDOC BY65801 in functionalities OSSAIN (ENSV0014) and OSSAIN Enhancements (ENSV0020).

NA006

Table OACNNPRF was created by functionality Operator Services, ENSV0014.

OACTLDEF

Table name

Operator Services System Advanced Intelligent Network Control List
Definition

Functional description

Table OACTLDEF defines control lists for processing OSSAIN calls. A control list is a list of OSSAIN functions (services) provided by service nodes, existing TOPS operators, and existing TOPS automated services.

Data II sequence and implications

Table OAFUNDEF must be datafilled before table OACTLDEF.

The following tables must be datafilled after table OACTLDEF:

- OACNNPRF
- OATLKPRF
- OADSCPRF
- OACAUPRF
- OADTFPRF
- OAFNDISP
- OAINCTLA

Table size

0 to 4095 tuples

Data II

The following table lists datafill for table OACTLDEF.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OACTLNUM		0 to 4094	OSSAIN control number. Index into table from tables OACNNPRF, OATLKPRF, OADSCPRF, OACAUPRF, OADTFPRF, OAFNDISP, and OAINCTLA.
OACTLNAM		1 to 16 characters	OSSAIN control list name. This name is used by tables OACNNPRF, OACAUPRF, OADTFPRF, OADSCPRF, OATLKPRF, OAFNDISP, and OAINCTLA.

OACTLDEF (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
NETWRKID		0 to 32767	Network service ID. A unique identifier for a service throughout the network for billing purposes.
OAFUNCTS		from table OAFUNDEF	OSSAIN functions. A list of function names from table OAFUNDEF. These functions (services) are performed sequentially. For the TOPS06 initial release, only 1 function is allowed.

Data l l e x a m p l e

The following example shows sample datafill for table OACTLDEF.

MAP display example for table OACTLDEF

OACTLNUM	OACTLNAM	NETWRKID	OAFUNCTS
0	0+AABS	3	NEW_AABS\$
1	0+DA_SERV	7	OSSAIN_DA\$
2	ROUTER	2	ROUTE_NODE\$

OACTLDEF (end)

Error messages

The following error messages apply to table OACTLDEF.

Error messages for table OACTLDEF

Error message	Explanation and action
This control list name is in use in table XXXXXXXX. You must remove all references to this control list name before you can delete it.	This message is displayed if an attempt is made to delete a tuple from table OACTLDEF that has a control list name used in one of the tables: OACNNPRF, OATLKPRF, OADSCPRF, OACAUPRF, OADTFPRF, OAFNDISP, and OAINCTLA. Tuples may not be deleted from table OACTLDEF until all datafill references to that control list name are deleted from tables OACNNPRF, OATLKPRF, OADSCPRF, OACAUPRF, OADTFPRF, OAFNDISP, and OAINCTLA.
A control list must have at least 1 function datafilled.	One function must be datafilled. This message is displayed if an attempt is made to datafill field OAFUNCTS with zero or more than one function.

Table history**NA006**

Table OACTLDEF was created by functionality Operator Services, ENSV0014.

OADSCPRF

Table name

Operator Services System Advanced Intelligent Network Post Disconnect Profile

Functional description

Table OADSCPRF selects services according to types of events during post call disconnect. Trigger events only occur during call float. Only services provided by an OSSAIN node can be selected; that is, a TOPS operator or TOPS automated system cannot be selected.

Data II sequence and implications

Tables OAFUNDEF, OACTLDEF, and OADTFPRF must be datafilled before table OADSCPRF.

Table size

0 to 255 tuples

Data II

The following table lists datafill for table OADSCPRF.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
DISCIDX		0 to 2046	Post disconnect index. Index into table from table OATPRFIX
PROFILE		see subfields	Profile. This field consists of subfields TRIGGER, SNCONTROL and ACTSEL.

OADSCPRF (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	TRIGGER	FLASH, CLGD	Trigger. A list of trigger events during post call disconnect (end with '\$'). If no events are entered, no further refinements of PROFILE must be datafilled. Note, the MAP display also shows values RING, NTFY, TRMT, OPLSF, NOANS, ANS, and PTYD; however, these are not valid trigger events. Following are the valid events: FLASH - The calling party hook flashes. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, this event is ignored. Note, OSSAIN trigger processing is not supported for ACTS floated calls. Calls floated by ACTS are routed to an operator. CLGD - Calling disconnect. The calling party goes on-hook. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, the call is taken down. Note, OSSAIN trigger processing is not supported for calls requiring Time and Charges. These calls are routed to ACTS or an operator.
	SNCONTRL	Y or N	Service node control. Indicates whether or not the service node acquires control of the call for this trigger event. A Y indicates that the service node acquires control. An N indicates that the service node is informed of the trigger event but call control remains at the TOPS switch. When set to N, the service node is given a minimum of information, mainly the session begin message. When set to Y, all event information is sent to the service node for it to determine processing. And, trigger processing is not performed, rather the node is informed of the events so that the node can determine the course of action. Therefore, this table (OADSCPRF) is only valid if SNCONTRL = N.

OADSCPRF (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	ACTSEL	see subfield ACCTYPE	Action select. This field consists of subfield ACTTYPE.
	ACTTYPE	CTRLLIST or FUNCTION	Action type. Select either a list of services (CTRLLIST) or a single service (FUNCTION) to be performed if the the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
DTMFPRF		see subfield DTMFSEL	DTMF profile. This field consists of subfield DTMFSEL.
	DTMFSEL	Y or N	DTMF select. Enter Y for DTMF trigger processing of the call and datafill subfield DTMFIDX. Otherwise, enter N and no further refinements require datafilled.
	DTMFIDX	0 to 2046	DTMF index. Datafill this field if DTMFSEL = Y. Enter an index into table OADTFPRF.

OADSCPRF (continued)**Data example**

The following example shows sample datafill for table OADSCPRF.

MAP display example for table OADSCPRF

DISCIDX	PROFILE	DTMFPRF
0	(PTYD Y FUNCTION ROUTE_NODE)	Y 7
1	\$	Y 4

Error messages

The following error messages apply to table OADSCPRF.

Error messages for table OADSCPRF

Error message	Explanation and action
NOT A VALID DISCONNECT TRIGGER	Table OACNNPRF can only be datafilled with the following triggers: FLASH and CLGD. If an attempt is made to add or change the TRIGGER field to a value not in the above list, this error message is displayed.
Only one action assignment allowed per trigger	An attempt was made to add or change a tuple with more than one action assigned to the same trigger.
DTMF index is not in table OADTFPRF	An attempt was made to add or change a tuple to utilize a DTMF profile index not yet datafilled in table OADTFRPF.

Table history**TOPS09**

Fields CTRLLIST and FUNCTION can now use the name of an SN or TOPS operator function provider. That is, the entered name's function provider is defined in table OAFUNDEF field FUNCTYPE as either SN or TOPSOPER. Before this release, only an SN function provider was allowed. This change is added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN00004.

TOP08

The ranges of fields DISCIDX and DTMFIDX are expanded to 0-2046 by PRSDOC BY65801 in functionalities OSSAIN (ENSV0014) and OSSAIN Enhancements (ENSV0020).

OADSCPRF (end)

NA006

Table OADSCPRF was created by functionality Operator Services, ENSV0014.

OADTFPRF

Table name

Operator Services System Advanced Intelligent Network Dualtone Multifrequency Profile

Functional description

Table OADTFPRF selects services according to DTMF digits while a call is being connected or disconnected. These periods only occur during call float. Only services provided by an OSSAIN node can be selected; that is, a TOPS operator or TOPS automated system cannot be selected.

Data II sequence and implications

Table OAFUNDEF and OACTLDEF must be datafilled before table OADTFPRF.

This table must be datafilled prior to datafilling a dtmf index into tables OACNNPRF and OADSCPRF.

Table size

0 to 102 tuples

Data II

The following table lists datafill for table OADTFPRF.

Field descriptions (Sheet 1 of 4)

Field	Subfield or refinement	Entry	Explanation and action
DTMFIDX		0 to 2046	DTMF index. Index into table from either table OADSCPRF or OACNNPRF.
PROFILE		see subfields	Profile. This field consists of subfields DIGITS, GENAMA, RLSFWD, RFLTONFL, and ACTSEL.

OADTFPRF (continued)**Field descriptions (Sheet 2 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	DIGIT	a numeric DTMF digit (0 to 9), STAR, OCTO	DTMF digit. If this event occurs and is selected, the call is routed to an OSSAIN node based on the received DTMF digit. Otherwise, if this event occurs but is not selected, the DTMF input is ignored. Calls floated by AABS or MCCS use DTMF digit # to initiate a sequence call. Value OCTO in this field overrides this processing and routes the call to an OSSAIN node. Calls floated by AABS or MCCS use DTMF digit * to initiate pre-OSSAIN message delivery service (MDS). Value STAR in this field overrides this processing and routes the call to an OSSAIN node.
	GENAMA	Y or N	Generate AMA record. Enter Y to generate an AMA record when processing a DTMF digit event. Otherwise, enter N.
	RLSFWD	Y or N	Release forward party. Enter Y to release the forward party when processing a DTMF digit event. Otherwise, enter N.

OADTFPRF (continued)**Field descriptions (Sheet 3 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	RFLTONFL	Y or N	Refloat on failure. This field indicates if a call should refloat when a trigger event leads to a failure. A failure is when the call cannot be presented to a SN or operator, or cannot be queued for a SN or operator and queueing is active. The values are Y (refloat) and N (do not refloat). Failures are due to the following: • Presentation failure to a SN occurs when a session cannot be obtained with the SN. If RFLTONFL = N, disposition routing is used from table OAFNDISP. • Queue failure occurs from queue overflow or deflection. If RFLTONFL = N, the call is sent to treatment. The exceptions and restrictions on this field are as follows: • If a call triggers, that trigger has RFLTONFL = Y, and the switch is attempting to obtain a session with a service node, field RFLTONFL is ignored. • A refloat is only attempted if RFLTONFL = Y, the calling party is attached, and the called party is either connecting or already connected. • Field RLSFWD must set to Y in order to set RFLTONFL to N.
	ACTSEL	see subfield ACCTYPE	Action select. This field consists of subfield ACTTYPE.
	ACTTYPE	CTRLLIST or FUNCTION	Action type. Select either a list of services (CTRLLIST) or a single service (FUNCTION) to be performed if the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.

Field	Subfield or refinement	Entry	Explanation and action
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
HOLDRCVR		Y or N	Hold receiver. Enter Y to retain the DTMF receiver when transitioning to a service node. Otherwise, enter N.

The following example shows sample datafill for table OADTFPRF.

DTMFIDX	PROFILE	HOLDRCVR
0	(0 N N N FUNCTION TOLL_OPR) (STAR N N N FUNCTION MDS_NODE) \$	N

OADTFPRF (end)

Error messages

The following error messages apply to table OADTFPRF.

Error messages for table OADTFPRF

Error message	Explanation and action
RLSFWD MUST BE SET TO Y WHEN GENAMA IS SET TO Y.	When setting the GENAMA field to Y, the RLSFWD field must also be set to Y. If an attempt is made to set GENAMA to Y while setting RLSFWD to N, this error message is displayed.
RLSFWD MUST BE N TO PERMIT RFLTONFL SETTING OF Y.	Field RLSFWD must set to Y in order to set RFLTONFL to N. If this requirement is not followed, the attempt to set RFLTONFL is denied and this error message is displayed.

Table history**TOPS11**

Subfield RFLTONFL is added by feature AF7712 in functionality OSSAIN 11 Enhancements, OSAN0006.

TOPS09

Fields CTRLLIST and FUNCTION can now use the name of an SN or TOPS operator function provider. That is, the entered name's function provider is defined in table OAFUNDEF field FUNCTYPE as either SN or TOPSOPER. Before this release, only an SN function provider was allowed. This change is added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN00004.

TOPS07

The range for field DTMFIDX is increased from 0-99 to 0-2047 by functionality OSSAIN Enhancements, ENSV0020.

TOPS06

Table OADTFPRF was created by functionality Operator Services, ENSV0014.

OAFNDISP**Table name**

Operator Services System Advanced Intelligent Network Function Disposition

Functional description

Table OAFNDISP defines the actions when an OSSAIN call is deflected or overflowed by the Queue Management System (QMS), a function is blocked, or a failure is encountered when attempting to send an OAP Session Begin message to a service node once an agent has been selected for the call. The OSSAIN call can be routed to treatment, transferred to another function, or transferred to a control list when a disposition is required.

Data II sequence and implications

Tables OACTLDEF and OAFUNDEF must be datafilled before table OAFNDISP.

Table size

0 to 1023 tuples

Data II

The following table lists datafill for table OAFNDISP.

Field descriptions (Sheet 1 of 14)

Field	Subfield or refinement	Entry	Explanation and action
FUNCNAME		name from table OAFUNDEF	Function name. Enter a function name defined in table OAFUNDEF.
IDFLACTN		see subfield IDFLDISP	Initial call deflection action. This field consists of subfield IDFLDISP. This field only applies to calls during initial call setup. Initial calls have passed through CT4Q refinement and reached a final CT4Q that is marked for OSSAIN by table CT4QNAMS. Also, the associated control list in table OAINCTLA routes to a function provided by a service node.

OAFNDISP (continued)**Field descriptions (Sheet 2 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	IDFLDISP	TREAT, GOTOCTL, GOTOFN, or CLDOUTP	Initial call deflection disposition. This action is taken for the following reasons: - An OSSAIN call is deflected from an OSSAIN queue. Queue deflection occurs if deflection is enabled for the queue and the predicted wait time before the call is connected to an agent exceeds the limit set in table QMSCQDEF for that call queue. This deflection criteria is determined by the QMS CAM the same way as for TOPS operator calls. - Communication is down between the host and remote, preventing the remote from requesting a session from the host. Following are the actions: - TREAT - Route to treatment. Datafill refinement TREATMENT. - GOTOCTL - Route to another control list. Datafill refinement CTLLIST. - GOTOFN - Route to another function. Datafill refinement FUNCTION. - CLDOUTP - Called outpulsed. Route the call out of the office. Datafill refinements USE0PLUS, DNAREA, and ALLOWTRG.
	TREATMENT	name from table TMTCNTL	Treatment. If field IDFLDISP=TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field IDFLDISP = GOTOCTL, datafill this refinement with a control list name defined in table OACTLDEF.
	FUNCTION	name from table OAFUNDEF	Function. If field IDFLDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.

OAFNDISP (continued)**Field descriptions (Sheet 3 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	USE0PLUS	N or Y	Use 0 plus. If field IDFLDISP = CLDOUTP, datafill this refinement. This value indicates whether to use the called party number if it is available from call details. Enter Y to use this number. Enter N to not use this number. If Y is entered, this number is always used if available, regardless of the value of field DIRECTDN.
	DNAREA	see subfield	Directory number area. If field IDFLDISP = CLDOUTP, datafill this refinement. Field DNAREA consists of subfield DIRECTDN.
	DIRECTDN	N or Y	Direct directory number. Indicate if a DN is specified in field CLDDN for the called party number. Enter Y for a specified DN and datafill subfield CLDDN. Otherwise, enter N. When CLDDN is specified, it is used if USE0PLUS = Y and no called party number is available or if USE0PLUS = N. If DIRECTDN = N, USE0PLUS = Y, and no called party number is available, the call is routed to treatment. The system does not allow USE0PLUS = N and DIRECTDN = N at the same time.
	CLDDN	up to 18 digits	Called directory number. Datafill this field if field DIRECTDN = Y. Enter a directory number for the called number. When the CLDDN is outpulsed, the following occurs: • AMA is updated for the new CLDDN value. The overwritten number module contains the original called party number. • LATA screening applies to the new DN.
	ALLOWTRG	N or Y	Allow trigger. If field IDFLDISP = CLDOUTP, datafill this refinement. Enter Y to use the trigger profile index before outpulsing. Enter N to not use the index before outpulsing. Value N is effective only during outpulsing.

OAFNDISP (continued)**Field descriptions (Sheet 4 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
IOVFACTN		see subfield IOVFDISP	Initial call overflow action. This field consists of subfield OVFLDISP. This field only applies to calls during initial call setup. Refer to field IDFLACTN for a description of this phase. Note, this field does not apply to functions with FUNCTYPE = TOPSOPR or TOPSAUTO in table OAFUNDEF.
	IOVFDISP	TREAT, GOTOCTL, GOTOFN, or CLDOUTP	Initial call overflow disposition. This action is taken for the following reasons: - The QMS CAM indicates that the OSSAIN queue for this call is in an overflow state. Queue overflow occurs when no agents are available for an OSSAIN call queue and the call queue would exceed its maximum size in table QMSCQDEF if this call were queued. This overflow criteria is determined by the QMS CAM the same way as for TOPS operator calls. - A host-remote session is not available at the remote to request a SN session for an active service node. Following are the actions: - TREAT - Route to treatment. Datafill refinement TREATMENT. - GOTOCTL - Route to another control list. Datafill refinement CTLLIST. - GOTOFN - Route to another function. Datafill refinement FUNCTION. - CLDOUTP - Called outpulsed. Route the call out of the office. Datafill refinements USE0PLUS, DNAREA, and ALLOWTRG.
	TREATMENT	name from table TMTCNTL.	Treatment. If field IOVFDISP = TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field IOVFDISP = GOTOCTL, datafill this refinement with a control list name defined in table OACTLDEF.

OAFNDISP (continued)**Field descriptions (Sheet 5 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	FUNCTION	name from table OAFUNDEF	Function. If field IOVFDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.
	USE0PLUS	N or Y	Use 0 plus. If field IOVFDISP = CLDOUTP, datafill this refinement. This value indicates whether to use the called party number if it is available from call details. Enter Y to use this number. Enter N to not use this number. If Y is entered, this number is always used if available, regardless of the value of field DIRECTDN.
	DNAREA	see subfield	Directory number area. If field IOVFDISP = CLDOUTP, datafill this refinement. Field DNAREA consists of subfield DIRECTDN.
	DIRECTDN	N or Y	Direct directory number. Indicate if a DN is specified in field CLDDN for the called party number. Enter Y for a specified DN and datafill subfield CLDDN. Otherwise, enter N. When CLDDN is specified, it is used if USE0PLUS = Y and no called party number is available or if USE0PLUS = N. If DIRECTDN = N, USE0PLUS = Y, and no called party number is available, the call is routed to treatment. The system does not allow USE0PLUS = N and DIRECTDN = N at the same time.
	CLDDN	up to 18 digits	Called directory number. Datafill this field if field DIRECTDN = Y. Enter a directory number for the called number. When the CLDDN is outpulsed, the following occurs: • AMA is updated for the new CLDDN value. The overwritten number module contains the original called party number. • LATA screening applies to the new DN.

OAFNDISP (continued)**Field descriptions (Sheet 6 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
IBLKACTN	ALLOWTRG	N or Y	Allow trigger. If field IOVFDISP = CLDOUTP, datafill this refinement. Enter Y to use the trigger profile index before outpulsing. Enter N to not use the index before outpulsing. Value N is effective only during outpulsing.
		see subfield IBLKDISP	Initial blocked function action. This field consists of subfield IBLKDISP. This field only applies to calls during initial call setup. Refer to field IDFLACTN for a description of this phase.
	IBLKDISP	TREAT, GOTOFN, GOTOCTL, or CLDOUTP	Initial call blocked function disposition. This action is taken if an OSSAIN call is blocked from the requested function. Following are the actions: • TREAT - Route to treatment. Datafill refinement TREATMENT. • GOTOCTL - Route to another control list. Datafill refinement CTLLIST. • GOTOFN - Route to another function. Datafill refinement FUNCTION. • CLDOUTP - Called outpulsed. Route the call out of the office. Datafill refinements USE0PLUS, DNAREA, and ALLOWTRG.
	TREATMENT	name from table TMTCNTL.	Treatment. If field IBLKDISP = TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field IBLKDISP = GOTOCTL, datafill this refinement with a control list name defined in table OACTLDEF.
	FUNCTION	name from table OAFUNDEF	Function. If field IBLKDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.

OAFNDISP (continued)**Field descriptions (Sheet 7 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	USE0PLUS	N or Y	Use 0 plus. If field IBLKDISP = CLDOUTP, datafill this refinement. This value indicates whether to use the called party number if it is available from call details. Enter Y to use this number. Enter N to not use this number. If Y is entered, this number is always used if available, regardless of the value of field DIRECTDN.
	DNAREA	see subfield	Directory number area. If field IBLKDISP = CLDOUTP, datafill this refinement. Field DNAREA consists of subfield DIRECTDN.
	DIRECTDN	N or Y	Direct directory number. Indicate if a DN is specified in field CLDDN for the called party number. Enter Y for a specified DN and datafill subfield CLDDN. Otherwise, enter N. When CLDDN is specified, it is used if USE0PLUS = Y and no called party number is available or if USE0PLUS = N. If DIRECTDN = N, USE0PLUS = Y, and no called party number is available, the call is routed to treatment. The system does not allow USE0PLUS = N and DIRECTDN = N at the same time.
	CLDDN	up to 18 digits	Called directory number. Datafill this field if field DIRECTDN = Y. Enter a directory number for the called number. When the CLDDN is outpulsed, the following occurs: • AMA is updated for the new CLDDN value. The overwritten number module contains the original called party number. • LATA screening applies to the new DN.
	ALLOWTRG	N or Y	Allow trigger. If field IBLKDISP = CLDOUTP, datafill this refinement. Enter Y to use the trigger profile index before outpulsing. Enter N to not use the index before outpulsing. Value N is effective only during outpulsing.

OAFNDISP (continued)**Field descriptions (Sheet 8 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
IOFLACTN		see subfield IOFLDISP	Initial origination failure action. This field consists of subfield IOFLDISP. This field only applies to calls during initial call setup. Refer to field IDFLACTN for a description of this phase. Note, this field does not apply to functions with FUNCTYPE = TOPSOPR or TOPSAUTO in table OAFUNDEF.
	IOFLDISP	TREAT, GOTOFN, GOTOCTL, or CLDOUTP	Initial OAP routing failure disposition. This action is taken for the following reasons: • A failure when sending the OAP Session Begin message to the service node after the session for the call has already been selected. • The OSAC host returns a service node session to the remote for a subscriber originated call but the session cannot be used by the remote. The remote may not use the session due to any of the following reasons: — invalid service node state — invalid session pool state — invalid session id — OAP protocol version not negotiable • A returned service node session pool id or session id returned from the host to the remote is not valid. That is, the origination type is not valid. • If the remote times out waiting for a response to a session request for an active service node.

OAFNDISP (continued)**Field descriptions (Sheet 9 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
			Following are the actions: • TREAT - Route to treatment. Datafill refinement TREATMENT. • GOTOCTL - Route to another control list. Datafill refinement CTLLIST. • GOTOFN - Route to another function. Datafill refinement FUNCTION. • CLDOUTP - Called outpulsed. Route the call out of the office. Datafill refinements USE0PLUS, DNAREA, and ALLOWTRG.
	TREATMENT	name from table TMTCNTL	Treatment. If field IOFLDISP = TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field IOFLDISP = GOTOCTL, datafill this refinement with a control list name defined in table OACTLDEF.
	FUNCTION	name from table OAFUNDEF	Function. If field IOFLDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.
	USE0PLUS	N or Y	Use 0 plus. If field IOFLDISP = CLDOUTP, datafill this refinement. This value indicates whether to use the called party number if it is available from call details. Enter Y to use this number. Enter N to not use this number. If Y is entered, this number is always used if available, regardless of the value of field DIRECTDN.
	DNAREA	see subfield	Directory number area. If field IOFLDISP = CLDOUTP, datafill this refinement. Field DNAREA consists of subfield DIRECTDN.

OAFNDISP (continued)**Field descriptions (Sheet 10 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	DIRECTDN	N or Y	Direct directory number. Indicate if a DN is specified in field CLDDN for the called party number. Enter Y for a specified DN and datafill subfield CLDDN. Otherwise, enter N. When CLDDN is specified, it is used if USE0PLUS = Y and no called party number is available or if USE0PLUS = N. If DIRECTDN = N, USE0PLUS = Y, and no called party number is available, the call is routed to treatment. The system does not allow USE0PLUS = N and DIRECTDN = N at the same time.
	CLDDN	up to 18 digits	Called directory number. Datafill this field if field DIRECTDN = Y. Enter a directory number for the called number. When the CLDDN is outpulsed, the following occurs: • AMA is updated for the new CLDDN value. The overwritten number module contains the original called party number. • LATA screening applies to the new DN.
	ALLOWTRG	N or Y	Allow trigger. If field IOFLDISP = CLDOUTP, datafill this refinement. Enter Y to use the trigger profile index before outpulsing. Enter N to not use the index before outpulsing. Value N is effective only during outpulsing.
TDFLACTN		see subfield TDFLDISP	Transition call deflection action. This field consists of subfield TDFLDISP. Note, this field does not apply to functions with field FUNCTYPE = TOPSOPR or TOPSAUTO in table OAFUNDEF. Transition calls apply to transfer and trigger calls, which are being routed to a service node. Examples are a transfer from an operator to a service node, a service node transfer to another service node, and a trigger to a service node.

OAFNDISP (continued)**Field descriptions (Sheet 11 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	TDFLDISP	TREAT, GOTOFN, or GOTOCTL	Transition call deflection disposition. This action is taken for the following reasons: - An OSSAIN call is deflected from an OSSAIN queue. Queue deflection occurs if deflection is enabled for the queue and the predicted wait time before the call is connected to an agent exceeds the limit set in table QMSCQDEF for that call queue. This deflection criteria is determined by the QMS CAM the same way as for TOPS operator calls. - Communication is down between the host and remote, preventing the remote from requesting a session from the host. Following are the actions: - TREAT - Route to treatment. Datafill refinement TREATMENT. - GOTOCTL - Route to another control list. Datafill refinement CTLLIST. - GOTOFN - Route to another function. Datafill refinement FUNCTION.
	TREATMENT	name from table TMTCNTL	Treatment. If field TDFLDISP=TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field TDFLDISP = CTLLIST, datafill this refinement with a control list name defined in table OACTLDEF.
	FUNCTION	name from table OAFUNDEF	Function. If field TDFLDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.
TOVFACTN		see subfield TOVFDISP	Transition call overflow action. This field consists of subfield TOVFDISP. Note, this field does not apply to functions with FUNCTYPE = TOPSOPR or TOPSAUTO in table OAFUNDEF. For a description of a transition call, refer to field TDFLACTN.

OAFNDISP (continued)**Field descriptions (Sheet 12 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
TBLKACTN	TOVFDISP	TREAT, GOTOFN, or GOTOCTL	Call overflow disposition. This action is taken for the following reasons: - The QMS CAM indicates that the OSSAIN queue for this call is in an overflow state. Queue overflow occurs when no agents are available for an OSSAIN call queue and the call queue would exceed its maximum size in table QMSCQDEF if this call were queued. This overflow criteria is determined by the QMS CAM the same way as for TOPS operator calls. - A host-remote session is not available at the remote to request a SN session for an active service node.
	TREATMENT	name from table TMTCNTL.	Treatment. If field TOVFDISP = TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field TOVFDISP = CTLLIST, datafill this refinement with a control list name defined in table OACTLDEF.
	FUNCTION	name from table OAFUNDEF	Function. If field TOVFDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.
		see subfield TBLKDISP	Transition blocked function action. This field consists of subfield TBLKDISP. For a description of a transition call, refer to field TDFLACTN.
	TBLKDISP	TREAT, GOTOFN, or GOTOCTL	Transition blocked function disposition. This action is taken if an OSSAIN call is blocked from the requested function.
	TREATMENT	name from table TMTCNTL.	Treatment. If field TBLKDISP = TREAT, datafill this refinement with a name defined in table TMTCNTL.
	CTLLIST	name from table OACTLDEF	Control list. If field TBLKDISP = CTLLIST, datafill this refinement with a control list name defined in table OACTLDEF.

OAFNDISP (continued)**Field descriptions (Sheet 13 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
TOFLACTN	FUNCTION	name from table OAFUNDEF	Function. If field TBLKDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.
		see subfield TOFLDISP	Transition origination failure action. This field consists of subfield TOFLDISP. Note, this field does not apply to functions with FUNCTYPE = TOPSOPR or TOPSAUTO in table OAFUNDEF. For a description of a transition call, refer to field TDFLACTN.
	TOFLDISP	TREAT, GOTOFN, or GOTOCTL	Transition OAP routing failure disposition. This action is taken for the following reasons: • A failure when sending the OAP Session Begin message to the service node after the session for the call has already been selected. • The OSAC host returns a service node session to the remote for a subscriber originated call but the session cannot be used by the remote. The remote may not use the session due to any of the following reasons: — invalid service node state — invalid session pool state — invalid session id — OAP protocol version not negotiable • A returned service node session pool id or session id returned from the host to the remote is not valid. That is, the origination type is not valid. • If the remote times out waiting for a response to a session request for an active service node.
	TREATMENT	name from table TMTCNTL	Treatment. If field TOFLDISP = TREAT, datafill this refinement with a name defined in table TMTCNTL.

OAFNDISP (continued)**Field descriptions (Sheet 14 of 14)**

Field	Subfield or refinement	Entry	Explanation and action
	CTLLIST	name from table OACTLDEF	Control list. If field TOFLDISP = CTLLIST, datafill this refinement with a control list name defined in table OACTLDEF.
	FUNCTION	name from table OAFUNDEF	Function. If field TOFLDISP = FUNCTION, datafill this refinement with a function name defined in table OAFUNDEF.

Data example

The following example shows sample datafill for table OAFNDISP.

MAP display example for table OAFNDISP

FUNCNAME	IDFLACTN		IOVFACTN
	IBLKACTN	IOFLACTN	
	TDFLACTN		TOVFACTN
	TBLKACTN	TOFLACTN	

BRANDING	CLDOUTP Y Y 9191234567 Y	CLDOUTP Y N N	
	GOTOFN ALT_NODE	CLDOUTP N Y 9191234567 Y	
	GOTOCTL CTLLIST2	GOTOFN LIVE_OPER	
	GOTOFN ALT_NODE	GOTOFN ALT_NODE	

For the above datafill, the initial fields with CLDOUTP have the following meanings:

- IDFLACTN: (CLDOUTP Y Y 9191234567 Y) - Output the called number if available; otherwise, use the DIRECTDN value for outputting.
- IOVFACTN: (CLDOUTP Y N N) - Output the called number if available; otherwise, route the call to treatment.
- IOFLACTN: (CLDOUTP N Y 9191234567 Y) - Output the DIRECTDN value and override the called number if present.

Note, the combination of (N N) in (CLDOUTP N N Y) is not allowed, it is blocked by datafill.

OAFNDISP (end)

Table history**TOPS11**

The following changes are made by feature AF7712 in functionality OSSAIN 11 Enhancements, OSAN0006.

- Fields DEFLACTN, OVRFACNTN, BLCACNTN, and ORFLACTN are renamed for use with calls in initial setup. The new names are IDFLACTN, IOVFACTN, IBLKACTN, and IOFLACTN.
- Disposition value CLDOUTP is added to the above fields.
- New fields TDEFLACT, TOVRFACNT, TBLCACT, and TORFLACT are added for transition calls, which is after initial setup. Note, these fields do not have the new DIRECTDN disposition.

TOPS07

Fields ORFLDISP and DEFLACTN are used for additional types of errors.

TOPS06

Table OAFNDISP was created by functionality Operator Services, ENSV0014.

OAFUNBLK

Table name

Operator Services System Advanced Intelligent Network Function Blocking

Functional description

Table OAFUNBLK defines the available set of functions for an originating directory number (DN). The DN is mapped in table TOPSDB to an index into table OAFUNBLK. Each entry in table OAFUNBLK specifies a list of functions to be included in the available set or excluded from the available set.

Data II sequence and implications

Table OAFUNDEF must be datafilled before table OAFUNBLK.

Table TOPSDB must be datafilled after table OAFUNBLK.

Table size

0 to 1023 tuples

Data II

The following table lists datafill for table OAFUNBLK.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
IDX		0 to 1022	Index. An index from table TOPSDB.
FNBLKSEL		INCLUDE or EXCLUDE	Function block select. This field determines which functions are included or excluded. Excluded means that all functions in table OAFUNDEF are allowed for this index (associated DN) except for the ones datafilled in this list. Included means that only the functions in this list are allowed for this index (associated DN).
OAFUNCTS		A list of 0 to 5 functions from table OAFUNDEF.	OSSAIN functions. A list of sequentially performed functions. The function names are defined in field FUNCNAME of table OAFUNDEF.

Data II e xample

The following example shows sample datafill for table OAFUNBLK.

OAFUNBLK (end)**MAP display example for table OAFUNBLK**

IDX	FNBLKSEL	OAFUNCTS
0	EXCLUDE	\$
1	INCLUDE	BRANDING NODE_AABS YELLOW_PAGES\$
2	INCLUDE	TOPS_BRANDING TOPS_AABS\$
3	EXCLUDE	YELLOW_PAGES\$

In the above example, tuple 0 is the default tuple that indicates there are no functions excluded for the current DN (that is, every function is allowed).

Error messages

The following error messages apply to table OAFUNBLK.

Error messages for table OAFUNBLK

Error message	Explanation and action
TUPLE REFERRED TO BY ANOTHER TABLE - USE TABREF TO GET POTENTIAL TABLE LIST.	This message is displayed if an attempt is made to delete a tuple from table OAFUNBLK that has an index in table TOPSDB. Tuples may not be deleted from table OAFUNBLK if the index value is defined in table TOPSDB. Table OAFUNBLK must be datafilled before table TOPSDB.

Table history**NA006**

Table OAFUNBLK was created by functionality Operator Services, ENSV0014.

OAFUNDEF

Table name

Operator Services System Advanced Intelligent Network Function Definition

Functional description

Table OAFUNDEF defines the functions (services) used in processing OSSAIN calls. A function is a service or portion of a service provided by a service node, live operator, or an existing TOPS automated system.

Datafill sequence and implications

Tables OANODINV, OASESNPL, and CT4QNAMS must be datafilled before table OAFUNDEF.

Table OAFUNDEF must be datafilled before tables OAFNDISP, OAFUNBLK, OACNNPRF, OATLKPRF, OADTFPRF, OACAUPRF, OADSCPRF, OACTLDEF, and SNVLGRP.

Table size

0 to 1023 tuples

Datafill

The following table lists datafill for table OAFUNDEF.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
FUNCID		0 to 1022	Function identification. This is the key into the table. This number must match between the host, remote (if OSAC), and service node.
FUNCNAME		1 to 16 characters	Function name. This value is used by other OSSAIN tables.
FUNCAREA		see subfield FUNCTYPE	Function area. This field consists of subfield FUNCTYPE and refinements.

OAFUNDEF (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	FUNCTYPE	SN, TOPSAUTO, TOPSOPER	Function type. The function provider. Following are the values: • SN - service node. Datafill refinements ORIGSERV, TRIGGER_AREA, SBTIMER_AREA, ISAUTOSN_AREA, ANSONVLC, and CAMHERE. • TOPSAUTO - existing TOPS automated system. Datafill refinements AUTOSYS and its corresponding refinements. • TOPSOPER - a live operator. Datafill refinements OPRCT4Q and QMS_AREA. Note, if a function has FUNCTYPE = TOPSOPER and that FUNCNAME is datafilled in field NEWFUNC, then FUNCTYPE cannot be changed to SN or TOPSAUTO.
	ORIGSERV	TASERV, DASERV, INTCSERV	Originating service. If FUNCTYPE = SN, datafill this refinement. This field is used to apply a base service to an OSSAIN call originating on the DMS switch and routed to an OSSAIN service node. Calls receiving DA or Intercept service are in a restricted mode while at the service node. DA and Intercept calls should only be routed to a service node to determine billing for the call prior to transferring the call to an operator. The service from the ORIGSERV field is not applied to calls originated by the service node and the service not applied to calls transferred by the service node or operator. Enter TASERV (for toll and assistance), DASERV (for directory assistance), or INTCSERV (for intercept).
	TRIGGER_AREA	see subfield	Trigger area. If FUNCTYPE = SN, datafill this refinement. This field consists of refinement TRIGEVNT.
	TRIGEVNT	N or Y	Trigger event. Enter Y if a specific trigger event session pool is to be used for trigger event informs and datafill refinement TRIGPOOL. Otherwise, enter N.

OAFUNDEF (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	TRIGPOOL	name from table OASESNPL	Trigger event session pool name. Datafill this field if field TRIGEVNT = Y. Enter a session pool name defined in table OASESNPL with TRIGEVNT=Y.
	SBTIMER_ AREA	see subfield SBTIMOUT	Session begin timer area. If FUNCTYPE = SN, datafill this refinement. This field consists of subfield SBTIMOUT and refinement.
	SBTIMOUT	Y or N	Session begin time out. This new field only appears if FUNCTYPE = SN. This field enables a timer when an OSSAIN call is routed to the function. If the SN does not respond in the timer period, the call is routed to an alternate function in table OAFNDISP field ORFLACTN. The values are: - Y - Enable timer. Datafill refinement SBTIMER. - N - Do not start timer. The DMS switch assumes the SN has received the Session Begin message and has control of the call. If the SN has not received the message, the call remains connected to the SN session. This connection continues until OSSAIN onhook and call sanity timers take effect. Or, the connection continues until the SN goes out of service. The default is N.
	SBTIMER	1 to 7	Session begin timer period. Datafill this field if SBTIMOUT = Y. Enter the time in seconds the switch waits for a reply from a SN before the call is routed to an alternate function.
	ISAUTOFN_ AREA	see subfields	Is auto function area. If FUNCTYPE = SN, datafill this refinement. This field consists of subfield ISAUTOFN.

OAFUNDEF (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	ISAUTOFN	Y or N	Is auto function. Indicate if this function should be reassigned for a no automation service call. Enter Y for reassignment and datafill subfield NEWFUNC. Otherwise, enter N for no reassignment. The default is N. Originating line number service (OLNS) indicates if the subscriber has requested service from an operator instead of an automated system.
	NEWFUNC	name from table OAFUNDEF	New function. Datafill this field if field ISAUTOFN = Y. Enter a TOPS operator function defined in table OAFUNDEF.
	ANSONVLC	N or Y	Answer on voice link connection. This field indicates whether to return answer on connection of a voice link. Enter Y to return answer or N to not return answer. The default is Y.
	CAMHERE	N or Y	QMS CAM here. If FUNCTYPE = SN, datafill this refinement. This field indicates the location of the QMS CAM. The values are: - N (no) - QMS CAM is centralized at an OSAC host switch, not in this switch. Datafill refinement HRSESNPL. - Y (yes) - QMS CAM is located in this switch. Datafill refinement CALLQ and VOICE_AREA.
	HRSESNPL	node name from table OANODINV	Host-remote session pool name. If CAMHERE=N, datafill this field with a session pool for OSAC messaging between the OSAC remote and OSAC host. This session pool is used by the remote to request the host for a service node session to a centralized service node that has the function for the call. The session pool name must be datafilled in table OASESNPL with ORIGTYPE = OSACORIG.
	CALLQ	call queue from table QMSCQDEF	Call queue. If CAMHERE=Y, datafill this field with a call queue defined in table QMSCQDEF.

OAFUNDEF (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	VOICE_ AREA	see subfield	Voice connection area. This area only appears if CAMHERE = Y. This area consists of subfield CONVOICE.
	CONVOICE	Y or N	Connect voice link. This field indicates if the switch should select and connect a voice link for an SN before routing the call to the SN. Enter Y to enable this capability. The default is N.
	DISPROUT	Y or N	Disposition routing. Datafill this field if field CONVOICE = Y. This field indicates if the switch should perform disposition routing when the voice link connection attempt fails. Enter Y to enable this capability.
	AUTOSYS	AABS, DAS	TOPS automated system. If FUNCTYPE = TOPSAUTO, datafill this refinement. This field indicates the existing TOPS automated system providing this function. The MAP display also shows values DAS, MCCS, ACTS, and BRANDING; however, only AABS and DAS is currently supported.
	OPRONFL	from field CT4QNAME in table CT4QNAMS	Operator on failure. If FUNCTYPE = TOPSAUTO and AUTOSYS = AABS, datafill this refinement. This field indicates the CT4Q for QMS POSTAUTO refinement ordering if live operator backup is required for the existing TOPS automated system specified in field AUTOSYS. This value is defined in field CT4QNAME of table CT4QNAMS.
	DASCT4Q	from field CT4QNAME in table CT4QNAMS	DAS CT4Q. If FUNCTYPE = TOPSAUTO and AUTOSYS = DAS, datafill this refinement. This field indicates the CT4Q used for QMS queueing. It can be refined if the QMS_AREA is setup for refinements. This value is defined in field CT4QNAME of table CT4QNAMS.
	OPRCT4Q	from field CT4QNAME in table CT4QNAMS	Operator call type for queue. If FUNCTYPE = TOPSOPER, datafill this refinement. This field indicates the CT4Q for the final call queue assignment when obtaining a live operator for this function. This value is defined in field CT4QNAME of table CT4QNAMS.

OAFUNDEF (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	QMS_AREA	see subfield	QMS refinement area. If FUNCTYPE = TOPSOPER or TOPSAUTO with a DAS AUTOSYS, datafill this refinement. This field consists of subfield QREFINMT.
	QREFINMT	Y or N	QMS refinement. This field indicates if the switch should apply QMS refinements to the CT4Q before routing the call to the operator. Enter Y to enable this capability. The default is N. If Y, datafill CQORDER.
	CQORDER	PREOPR, POSTAUTO, RECALL, or ASST	Call queue refinement order. Datafill this field if field QREFINMT = Y. Indicate the order of call queue refinement. The values refer to the fields in tables TQORDERA and TQORDERB, which are the following: • PREOPR - pre-operator • POSTAUTO - post automated service • RECALL - recall or transfer to an operator • ASST - a QMS Customer Assistance Service Expert (CASE) operator

Datafill example

The following example shows sample datafill for table OAFUNDEF.

MAP display example for table OAFUNDEF

FUNCNUM	FUNCNAME	FUNCAREA
1	BRANDING	SN TASERV N N N Y Y CQ1 Y Y
2	BRANDING_CSN1	SN TASERV N N N N N HOST1_SP
3	YELLOW_PAGES	SN TASERV Y TRIG_3_PL N N N Y CQ3 Y Y
4	AABS_CSN2	SN TASERV N N N N N HOST2_SP
5	0_MINUS_OPER	TOPSOPER 0_MINUS N
6	TOPS_AABS	TOPSAUTO AABS 0_PLUS N
7	DA_OPR	TOPSOPER DA_CT4Q Y PREOPR
8	DAS_NO_OPER	TOPSAUTO DAS_DAS_ONLY N
9	DAS_OPER	TOPSOPER DAS_OPER N
10	AABS	TOPSAUTO AABS AABS_CT4Q
11	DA_SN	SN DASERV N N N N Y CQ17 N

OAFUNDEF (continued)**Error messages**

The following error messages apply to table OAFUNDEF.

Error messages for table OAFUNDEF

Error message	Explanation and action
OSSAIN function names must be unique.	This message is displayed if an attempt is made to add two tuples with the same function name.
AABS is the only TOPS automated system that is currently supported for OSSAIN.	This message is displayed if an attempt is made to datafill field AUTOSYS with a TOPS automated system other than AABS. AABS is the only TOPS automated system supported in the initial release (TOPS06) of OSSAIN.
Only session pools with ORIGTYPE OSACORIG may be datafilled in field HRSESNPL.	If the session pool for field HRSESNPL is not datafilled as an OSACORIG session pool in table OASESNP, this error message is displayed.
Only nodes of PM type OSAC may be datafilled in field NODENAME.	This message is displayed if an attempt is made to datafill a node name in table OAFUNDEF that is not of type OSAC. Table OANODINV allows nodes to be one of three types: OSN, OSNM, and OSAC. Only OSAC type nodes can be datafilled in table OAFUNDEF when CAMHERE = N.
This CT4Q is in use in table OAFUNDEF. You must remove all references to this CT4Q before you can delete it.	This message is displayed if an attempt is made to delete a CT4Q from table CT4QNAMS that is in use in table OAFUNDEF. Tuples may not be deleted from table CT4QNAMS until all references to that CT4Q are removed from table OAFUNDEF.
Field <field name> must be datafilled with a CT4Q from table CT4QNAMS that has a SYSTEM value of TOPSOPR.	This message is displayed if an attempt is made to datafill field OPRCT4Q or OPRONFL with a CT4Q that is not defined in table CT4QNAMS with field SYSTEM, MCCS, ACTS, BRANDING = TOPSOPR.
This function is datafilled in table XXXXXXXX. Since field FUNCTYPE is being changed from SN, you must remove any references to this function from the OSSAIN trigger tables.	This message is displayed if an attempt is made to change the FUNCTYPE field from SN to TOPSOPER or TOPSAUTO and the function is referenced in any OSSAIN trigger table. The trigger tables may only redirect to a node.

OAFUNDEF (continued)**Error messages for table OAFUNDEF**

Error message	Explanation and action
This function name is in use in table XXXXXXXX. You must remove all references to this function name before you can delete it.	This message is displayed if an attempt is made to delete a tuple from table OAFUNDEF that has a function name used in one of the following tables: OAFNDISP, OAFUNBLK, OACNNPRF, OATLKPRF, OADTFPRF, OACAUPRF, OADSCPRF, or OACTLDEF. Tuples may not be deleted from table OAFUNDEF until all datafill references to that function name are deleted from all of the above tables. Table OAFUNDEF must be datafilled before the above tables. Standard table control error messages are displayed if an attempt is made to datafill those tables with a function name that has not been defined in table OAFUNDEF.
Only session pools with TRIGEVNT=Y may be datafilled in field TRIGPOOL.	If the trigger event inform pool is not datafilled as a trigger event session pool, this error message is displayed.
TYPE OF HRSESNPL IS SR_SESSION_POOL_RANGE	Tables OANODINV and OASESNPL must be datafilled before host-remote session pools can be used in table OAFUNDEF. A standard table control message is displayed if an attempt is made to datafill a session pool in field H_R_SNPL that is not datafilled in table OASESNPL.
This function name is in use in table XXXXXXXX. You must remove all references to this function name before you can delete it.	This message is displayed if an attempt is made to delete a tuple from table OAFUNDEF that has a function name used in one of the following tables: OAFNDISP, OAFUNBLK, OACNNPRF, OATLKPRF, OADTFPRF, OACAUPRF, OADSCPRF, OACTLDEF, or SNVLGRP. Tuples may not be deleted from table OAFUNDEF until all datafill references to that function name are deleted from all of the above tables. Table OAFUNDEF must be datafilled before the above tables. Standard table control error messages are displayed if an attempt is made to datafill those tables with a function name that has not been defined in table OAFUNDEF.

OAFUNDEF (continued)**Error messages for table OAFUNDEF**

Error message	Explanation and action
Field NEWFUNC must be datafilled with a function from table OAFUNDEF that has a functype value of TOPSOPER.	This error message is displayed if an attempt is made to enter a value in field NEWFUNC that does not meet the following requirements: • A function must already be present in table OAFUNDEF before it can be assigned to NEWFUNC. • Only functions of type TOPSOPER can be assigned to NEWFUNC.
This function name is in use in NEWFUNC field of table OAFUNDEF. You must remove all references to this function name before you can delete it.	A tuple cannot be deleted if its function name is assigned to a NEWFUNC field. If an attempt is made to delete the tuple this message is displayed.
This function is datafilled in table OAFUNDEF. Since field FUNCTYPE is being changed from TOPSOPER, you must remove any references to this function from the NEWFUNC field in table OAFUNDEF.	TOPS operator functions that are assigned as NEWFUNC cannot be changed to an OSSAIN SN or TOPS Automated System type function. If an attempt is made to change the function, this message is displayed.

Table history**SN07 (DMS)**

Table OAFUNDEF is enhanced in the TOP20 (SN07) release to include the TOPSAUTO:DAS option to route a call to the DAS for service without attaching an operator. Refer to feature A00003704.

TOPS12

Subfield ANSONVLC is added by feature 59007166 in functionality OSSAIN 12 Enhancements, OSAN0007.

TOPS11

The following changes are provided by feature AF7714 in functionality OSSAIN 11 Enhancements, OSAN0006:

- For subfield FUNCTYPE = SN and refinement CAMHERE = Y, a new area is VOICE_AREA.
- For subfield FUNCTYPE = TOPSOPER, a new area is QMS_AREA.

OAFUNDEF (end)

Subfield ISAUTOSN_AREA is added for SNs by feature AF7727 in functionality OLNS Support of No Automation, ENSV0022.

TOPS09

Subfield SBIMOUT and refinement SBTIMER are added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN0004.

TOPS07

Table OAFUNDEF is modified to allow host-remote session pools to be specified if the function is provided by a centralized service node. That is, field HOSTNAME is replaced with field H_R_SNPL. This change is made by feature AN1536 in functionality OSSAIN, ENSV0014.

TOPS06

Table OAFUNDEF was created by functionality OSSAIN, ENSV0014.

OAINCTLA

Table name

Operator Services System Advanced Intelligent Network Control List Assignment

Functional description

Table OAINCTLA defines the OSSAIN control list and call trigger profile index for each CT4Q name utilized by OSSAIN. Each CT4Q datafilled in this table must first be assigned in table CT4QNAMS with the SYSTEM selector set to OSSAIN. The control list names must be datafilled in table OACTLDEF. The profile index must be datafilled in table OATPRFIX.

Data II sequence and implications

Tables CT4QNAMS, OACTLDEF, and OATPRFIX must be datafilled before table OAINCTLA.

Table size

0 to 100 tuples

Data II

The following table lists datafill for table OAINCTLA.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
CT4Q		name from table CT4QNAMS	Call type for queueing name. Index into table from table CT4QNAMS. Each CT4Q datafilled in this table must first be assigned in table CT4QNAMS with the SYSTEM selector set to OSSAIN.
OALISTNM		control list name from table OACTLDEF.	OSSAIN list name. A control list is a list of services that are applied sequentially.

Data II e xample

The following example shows sample datafill for table OAINCTLA.

OAINCTLA (end)

MAP display example for table OAINCTLA

CT4Q	OALISTNM
0+YELLOW	YEL_PAGE
OSS_DA	DA_SYSTEM

Table history**TOPS12**

Field OATPREFIX is removed by feature 59006766 in functionality OSSAIN 12 Enhancements.

TOPS06

Table OAINCTLA was created by functionality Operator Services, ENSV0014.

OAINPARM

Table name

Operator Services System Advanced Intelligent Network Parameters

Functional description

Table OAINPARM contains OSSAIN specific parameters.

Data II sequence and implications

The profile index must be datafilled in table OATPRFIX prior to datafilling in table OAINPARM.

Table size

0 to 14 tuples

Data II

The following table lists datafill for table OAINPARM.

Field descriptions (Sheet 1 of 5)

Parameter name	Explanation and action
ADACC_ALT_BILL_INDEX	This parameter indicates if an ADACC call requiring alternate billing can be routed to an OSSAIN service node by a Control List for billing verification. The values are: N - No, do not attempt to route to OSSAIN. Then, ADACC alternate billing calls are sent to AABS. This is the same handling as prior to OSSAIN. Y <number> - Yes, attempt to route to OSSAIN using the specified control list number previously datafilled in table OACTLDEF. The call will fail to route to OSSAIN due to any one of the following conditions: • The call is not sent to a control list that routes to a service node. • OSSAIN is not available due to lack of software resources. • OSSAIN is not SOCed on. • The call is not using the QMS queuing system. If any of the above conditions occur, the call is treated as if ADACC_ALT_BILL_INDEX was set to N.

OAINPARM (continued)**Field descriptions (Sheet 2 of 5)**

Parameter name	Explanation and action
ALT_BILL_HANDOFF_METHOD	This parameter specifies handling of operator handoff calls. The values are the following: - AABS - Calls are sent to the existing TOPS AABS system for billing acceptance, provided the call passes various checks that verify the call's eligibility for handoff. This functionality does not change the checks that are done for AABS handoff, nor any operator displays. This is the default value. With an AABS handoff, VSNOPT parameter NUM_HANDOFFS_ALLOWED specifies the maximum number of handoffs that a single call can undertake. This parameter continues to apply to handoffs to AABS, but not OSSAIN service nodes. - OSSAIN <ct4q> - Calls are placed in the specified CT4Q and then routed to an OSSAIN service node. The CT4Q must be datafilled in table CT4QNAMS with field SYSTEM set to OSSAIN. For more information on how the call is routed to an OSSAIN service node using a CT4Q, refer to section "Transitions" where transfers are discussed for an operator to an OSSAIN service node. When the operator marks a call for handoff, eligibility checks are the same for AABS and OSSAIN service nodes. In particular, it should be noted that VSNOPT parameter NUM_AUTO_LANGS_REQD_FOR_HANDOFF applies equally to operator handoffs for AABS and OSSAIN service nodes. If any of the eligibility checks fail, the operator receives the same error displays for the failed AABS or OSSAIN handoff mark.

OAINPARM (continued)**Field descriptions (Sheet 3 of 5)**

Parameter name	Explanation and action
CALL_SANITY_TIMER_DURATION	This is a timer to ensure that service node connections (data and/or voice), subscriber connections, and switch related call resources such as extension blocks are not left connected to a dead call. The timer is set when no parties (calling and called) are present (either disconnected or the on-hook timer has expired). The timer is cleared if the subscriber is subsequently connected to the call. The duration of the timer is determined by this parameter, but can be overridden by field CALLTMR in table OASESNPL. If set to USEDEFLT, parameter CALL_SANITY_TIMER_DURATION determines the timer duration. If CALLTMR = OVERRIDE, the value after this field gives the duration of the timer. When the timer expires, the call is taken down by the switch and an OAIN601 log is generated. The switch informs the node that the call has been taken down, releases the data and voice connections to the node, releases all subscriber connections involved in the call, cancels any outstanding requests, and frees all switch related call resources (for example, extension blocks, and so forth). The range of parameter CALL_SANITY_TIMER_DURATION is 1 to 3600 seconds. The default is 60.
DEFAULT_TREATMENT	This parameter indicates the treatment name from table TMTCNTL to route the call to if a default treatment is required for an OSSAIN call.
MAX_ALLOWED_TRANSITIONS	This parameter indicates the maximum number of allowed successful transitions which consist of direct transfers to control lists. When the number of transitions reaches the value of this parameter, the call is routed to the treatment specified in parameter DEFAULT_TREATMENT of this table (OAINPARM). There is a counter for each call which is zeroed at the beginning of the call and at any time that call is floated. The counter is incremented each time a successful direct transfer to a control list occurs. The purpose of this parameter is to prevent the call from going into an endless number of cycles. The range of this parameter is 0 to 20. The default is 5.
MAX_NUM_TRIGGERS	This parameter determines the maximum number of times a call is allowed to trigger during call float. This prevents the call from going into an endless number of cycles. The range is 0 to 100.

OAINPARM (continued)**Field descriptions (Sheet 4 of 5)**

Parameter name	Explanation and action
MAX_TRANSFERS_BEFORE_CONNECT	This parameter indicates the maximum number of transfers that can occur while attempting to connect a call to a service node for a particular function. Transfers in the switch can result from a QMS deflection or overflow, a blocked function, and, or a failure to send an OAP Session Begin message to a node after the session for the call has already been selected. When the number of transfers reaches the value of this parameter, the call is routed to the treatment specified in DEFAULT_TREATMENT. Once a successful connection to a service node is made, the switch resets its internal transfer counter. The range of values is 0 to 5.
NOANS_TIMER	The amount of time to wait for an answer to a call before the No Answer trigger occurs. The range is 1 to 120 (seconds).
NOTIFY_TIMER	The amount of time a call must spend in the talking state for the Notification trigger event to occur. The range is 0 to 32400 (seconds).
ON_HOOK_TIMER_DURATION	This is a timer to ensure that a call does not remain connected forever after a subscriber goes on-hook or is released. This timer may not apply to standard ISUP since ISUP facilities can automatically be cleared upon disconnect. The timer is set when the subscriber goes on-hook and cannot be reset. The timer is cleared if the subscriber's facility is released or the call is taken down for any reason. The duration of the timer is determined by this parameter, but can be overridden by field ONHKTMR in table OASESNPL. If set to USEDEFLT, parameter ON_HOOK_TIMER_DURATION determines the timer duration. If ONHKTMR = OVERRIDE, the value after this field gives the duration of the timer. If the timer expires, an OAIN600 log is generated and the call sanity timer is initiated if appropriate. Refer to the CALL_SANITY_TIMER_DURATION parameter in this table (OAINPARM) for further details. The range of parameter ON_HOOK_TIMER_DURATION is 1 to 3600 (seconds). The default is 60.

OAINPARM (continued)**Field descriptions (Sheet 5 of 5)**

Parameter name	Explanation and action
QMS_MIS_OAIN_CALL_IN_Q_THRESH	This parameter indicates if an OSSAIN OAP MIS data block is encoded, buffered, and sent to the MIS system for calls placed in queue. The range is 0 to 32,767. For 0, all calls placed in queue generate an MIS queue event data block. For values above 0, the entry is the number of calls must be sequentially placed in queue, with no calls exiting the queue, to generate the MIS queue event data block. The range is 0 to 32,767 and the default is 5.
QMS_MIS_OAIN_CAM_ON	This parameter indicates if OSSAIN OAP MIS data blocks are encoded, buffered, and sent to the MIS system. The values are Y (send) and N (do not send). The default is N.
QMS_MIS_OAIN_REMOTE_SEND	This parameter indicates if OSSAIN MIS data is encoded and sent from the OSAC Remote switch to the OSAC Host switch. The range is Y (send) and N (do not send). The default is N.
QMS_MIS_OAIN_XMIT_TIMEOUT	This parameter indicates the maximum amount of time to accumulate data blocks in an OSSAIN OAP MIS buffer. The timer starts during periods of low traffic volume when an MIS buffer could take a significant amount of time to fill. When this timer ends, the accumulated data blocks in the buffer are sent. An information data block is always sent regardless of whether any queue or session data blocks are accumulated. The range is 0 to 255 seconds and the default is 10.
SEND_BILLSPID_W_CLASS_CHG	This parameter enables/disables the SPID datablocks for the billing party to be sent with the Class Charge Success Response in OAP version 8. This parameter has no effect on other OAP versions. The values are as follows: - Y - If the Account Owner SPID and/or the Billing Service Provider SPID for the billing party are available and the OAP protocol version is 8, the SPID datablock(s) are included with the Class Charge Success Response. - N - The SPID datablocks are not sent.

Data II e xample

The following example shows sample datafill for table OAINPARM.

OAINPARM (continued)**MAP display example for table OAINPARM**

PARMNAME	PARMVAL
ADACC_ALT_BILL_INDEX	Y 100
ALT_BILL_HANDOFF_METHOD	OSSAIN DA_411
CALL_SANITY_TIMER_DURATION	432
DEFAULT_TREATMENT	TREAT VACT
MAX_ALLOWED_TRANSITIONS	15
MAX_NUM_TRIGGERS	15
MAX_TRANSFERS_BEFORE_CONNECT	5
NOANS_TIMER	20
NOTIFY_TIMER	180
ON_HOOK_TIMER_DURATION	368
QMS_MIS_OAIN_CALL_IN_Q_THRESH	5
QMS_MIS_OAIN_CAM_ON	Y
QMS_MIS_OAIN_REMOTE_SEND	Y
QMS_MIS_OAIN_XMIT_TIMEOUT	10
SEND_BILLSPID_W_CLASSCHG	Y

Table history**TOPS14**

Parameter SEND_BILLSPID_W_CLASSCHG is added by feature 50319574 in functionality OSSAIN 12 Enhancements, OSAN0103.

TOPS12

Parameters AUTO_ALT_BILL_TRIG_PROFILE_INDX, OPR_TRIGGER_PROFILE_INDEX, and STR_PARTY are deleted by feature 59006766 in functionality OSSAIN 12 Enhancements, OSAN0007. These capabilities of these parameters are moved to table CT4QNAMS new field ITRIGIDX and table OATLKPRF subfields STRPARTY (under fields STAR and OCTO).

TOPS11

Parameter STR_PARTY added by feature AF7714 in functionality OSSAIN 11 Enhancements, OSAN0006.

OAINPARM (end)

TOPS10

Feature AF7439 in functionality OSSAIN 10 Enhancements adds the following parameters:

- QMS_MIS_OAIN_CALL_IN_Q_THRESH
- QMS_MIS_OAIN_CAM_ON
- QMS_MIS_OAIN_REMOTE_SEND
- QMS_MIS_OAIN_XMIT_TIMEOUT

TOPS07

Feature AF6493 in functionality OSSAIN 07 Enhancements, OSAN0003, made the following changes:

- NOTIFY_TIMER range is changed from 0-3600 to 0-32400.
- ALT_BILL_HANDOFF_METHOD is added

TOPS06

Table OAINPARM was created by functionality OSSAIN, ENSV0014.

OAINPRE**Table name**

Operator Services Systems Advanced Intelligent Network (OSSAIN)
Preprocessing

Functional description

Table OAINPRE defines the OSSAIN function for each CT4Q name utilized by TOPS calls receiving OSSAIN preprocessing. Each CT4Q datafilled in this table must first be assigned in table CT4QNAMS.

Calls assigned to a TOPS operator or automated system (AABS, ACTS, or MCCS) are eligible to receive OSSAIN preprocessing from a service node (SN). OSSAIN preprocessing allows for services such as SN branding of ACTS and MCCS calls. This processing occurs prior to connection to the operator or automated system. At completion of the session, the call resumes its predetermined course to the TOPS system.

Data II sequence and implications

The following tables must be datafilled before table OAINPRE.

- CT4QNAMS
- OAFUNDEF

Table size

0 to 2046 tuples

Data II

The following table lists datafill for table OAINPRE.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
CT4Q		name from CT4QNAMS	Call type for queueing. This value must be defined in table CT4QNAMS with field SYSAREA = Y and field OAINPRE = Y. This requirement selects OSSAIN preprocessing for this call.
NETWRKID		0 to 32766	Network service ID. A unique identifier for a service throughout the network for billing purposes.

OAINPRE (end)

Data l l e x a m p l e

The following example shows sample datafill for table OAINPRE.

MAP display example for table OAINPRE

CT4Q	NETWRKID	OAFUNCNM
1_PLUS_COIN	200	SN_TOLL_BRAND
1_PLUS_HOTEL	201	HOTEL_OAINPRE

Error messages

The following error messages apply to table OAINPRE..

Error messages for table

Error message	Explanation and action
CT4Q does not receive OSSAIN Preprocessing	If an attempt is made to add or change a tuple to utilize a CT4Q not datafilled with the OAINPRE field set to Y in table CT4QNAMS, this warning message is displayed.

Table history
TOPS07

Table OAINPRE was introduced by feature AF6493 in functionality OSSAIN Enhancements, ENSV0020.

OAINRTE**Table name**

Operator Services System Advanced Intelligent Network Route

Functional description

Table OAINRTE points to a route in one of the OFRx tables (OFRT, OFR2, OFR3, or OFR4). OAINRTE is used by an OSSAIN service node to change the route of a call, but not the outpulsed number, for support of a route dependent service. The table is indexed by a route index sent by the service node.

Table OAINRTE datafill must match with the service node, but OFRx datafill have no requirements. The SN service developer must inform the operating company of what a given routing index should do so that the operating company can map it to the appropriate office route.

Data II sequence and meaning

Enter datafill into table OFRT, OFR2, OFR3, or OFR4 (as indicated in field RTETABID) before table OAINRTE.

Table size

0 to 2047 tuples

Data II

The table that follows lists datafill for table OAINRTE.

Field descriptions

Field	Subfield	Entry	Explanation and action
RTEIDX		0 to 2045	Route index. This field is the key field. This index is specified by the service node.
RTETABID		OFRT, OFR2, OFR3, or OFR4	Route table identifier. This field indicates the table with the required route.
OFRTIDX		0 to 1023	Office route index. This field indicates an index into the table indicated by field RTETABID. This route must previously be defined in the indicated table.

Data II e xample

The figure that follows shows sample datafill for table OAINRTE.

OAINRTE (continued)**MAP display example for table OAINRTE**

RTEIDX	RTETABID	OFRTIDX
0	OFRT	32
3	OFRT	1000
78	OFR2	50
1234	OFR2	50

The above example shows indexes 78 and 1234 pointing to the same office route, which could be a temporary condition during changes in the service node. Therefore, the table can provide as much or as little support to the SN as necessary.

MAP display example for table OFRT

RTE	RTELIST
5	(N D ISUP2WATC11 15 D088 N) \$
7	(S D T120) \$
32	(N D ISUP2WIT 0 N N) \$
1000	(S D VCA) \$
1005	(N D ISUP2WIT 0 N N) (N D MF2WIT 0 N N) \$

In order to show how the switch handles different RIs sent by the service node, assume the following:

- Table OFRT route 1000 routes to treatment.
- The default route for all calls is table OFRT route 5.
- Table OFRT routes 5 and 32 are valid routes.
- Table OFR2 has no datafill (empty table).

The following indicates the result of RIs sent by the service node:

- RI = 0 : The switch replaces the route with OFRT 32.
- RI = 5 : The switch sends an error message to the SN since the index is not present in table OAINRTE.
- RI = 1234 : The switch sends an error message to the SN since the index points to table OFR2, which does not have the route index.
- RI = 3 : The switch replaces the route with OFRT 1000, which routes to treatment.

OAINRTE (end)

Note: The next TABAUDIT on the switch would flag the two OAINRTE tuples pointing to the two non-existent OFR2 tuples.

Error messages for table OAINRTE

The following error messages apply to table OAINRTE.

Error messages for table OAINRTE

Error message	Explanation and action
ERROR: OFRTIDX not in specified office routing table.	This message is given if an attempt is made to enter a value in field OFRTIDX that is not a previously defined index into the table defined in field RTETABID. That is, table OAINRTE must point to a previously defined route in table OFRT, OFR2, OFR3, or OFR4.

Table history**TOPS11**

Table created by feature AF7631 in functionality OSSAIN 11 Enhancements, OSAN0006.

OANODINV

Table name

Operator Services System Advanced Intelligent Network Node Inventory

Functional description

This table maps an OSSAIN node identifier to a unique node name. Table OANODINV defines the transport layer protocol used for messaging to the given node and specifies protocol related network address information. This table also alllows datafilling OSSAIN node specific information.

Datafill sequence and implications

The following tables must be datafilled before OANODINV.

- ENSITES
- ENTYPES
- OANODNAM
- CMIPADDR, for OANODINV tuples with field DATAPATH = XAETHR

The following tables are datafilled after table OANODINV.

- OAFUNDEF
- OASESNPL
- OAVLMAP
- QMSMIS

NODENAMES in the above tables must be deleted before the corresponding tuples can be deleted in table OANODINV.

Table size

0 to 768 tuples, approximately 1038 bytes per tuple.

Note: The amount of store used by table OANODINV depends on the NODEID values that are datafilled in table OANODNAM. To avoid wasting store, avoid datafilling higher NODEID values than needed.

OANODINV (continued)

Datafill

The following table lists datafill for table OANODINV.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NODENAME		name from table OANODNAM	Node Name. This is the key field. Enter a name defined in table OANODNAM. This name defines a unique node name. Datafill a tuple for each node that this switch (with this this table) communicates. Also, for an OSAC configuration, datafill a tuple for this switch It is recommended that the same node name be used when datafilling a service node in different switches.

OANODINV (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
NODEAREA		see subfield ONPMTYPE	Node area. This field consists of subfield ONPMTYPE and refinements.
	ONPMTYPE	OSN, OSAC, or OSNM	OSSAIN node peripheral module type. The values are defined as follows: • OSN - OSSAIN node not maintained. This value is assigned to service nodes that are not maintained by the switch with this datafill. This value is assigned in a remote switch to all service nodes that the remote uses since only hosts maintain service nodes. Also, this value is assigned in a host switch to service nodes that the host uses but are maintained by another host switch. Datafill refinements ENNODENO, PROTOCOL_AREA, HOSTNAME, FAIL_DET, ONODTYPE, ONODLOC, ONODSITE, and ONODINFO. • OSAC - OSSAIN centralization. This value is assigned to switch nodes (hosts or remotes). Datafill RELATION_AREA and refinements. • OSNM - OSSAIN node maintained. This value is assigned in a host switch to service nodes that are maintained by this host switch. Nodes used for OSSAIN MIS messaging must be of ONPMTYPE of OSNM. Refer to functionality OSSAIN 10 Enhancements, OSAN0005. Datafill refinements ENNODENO, PROTOCOL_AREA, FAIL_DET, TSTTIME, RTSTIME, ONODTYPE, ONODLOC, ONODSITE, and ONODINFO.

OANODINV (continued)

If the entry in subfield ONPMTYPE is OSN, datafill refinements as shown in the following table.

Datafilling table OANODINV (ONPMTYPE = OSN)

Field	Subfield or refinement	Entry	Explanation and action
	ENNODENO	0 to 255	External node number. This field uniquely identifies the external node number of the external node peripheral module type. It is recommended to use the same number when datafilling a host in different remotes to avoid potential confusion.
	PROTOCOL_ AREA	see subfield PROTOCOL	Protocol area. This field consists of subfield PROTOCOL.
	PROTOCOL	UDP	Protocol. The protocol for transport layer messaging. UDP is the only valid entry. Datafill subfield ADDRESS_ AREA and refinements.
	ADDRESS_ AREA	see subfield ADDRTYPE	Address area. This field consists of subfield ADDRTYPE.
	ADDRTYPE	IPV4	Internet protocol address type. The only valid entry is IPV4 (IP version 4). Datafill refinement IPV4ADDR.
	IPV4ADDR	4 numbers, each 0-255	Internet protocol version 4 address. Enter the IP address for this node.
	DATAPATH_ AREA	see subfield DATAPATH	Datapath area. This field consists of subfield DATAPATH and refinements
	DATAPATH	EIU or XAETHR	Data path. This is a selector field. Enter EIU if the data path for this OSN is to use Ethernet Interface Unit Enter XAETHR if the data path for this OSN is to use XA-Core Ethernet interface cards, and also datafill refinement field CMIPADDR.

OANODINV (continued)**Datafilling table OANODINV (ONPMTYPE = OSN)**

Field	Subfield or refinement	Entry	Explanation and action
	CMIPADDR	four numbers, each 0 to 255	Computing Module Internet Protocol Address. This is a refinement field, present only if selector DATAPATH = XAETHR. Enter an IP address from the ACTIVEIP field of a CMHOST tuple in table CMIPADDR. To distribute messaging over the physical links, datafill one ACTIVEIP address for half of the nodes and the other ACTIVEIP address for the other half.
	HOSTNAME	alphanumeric (up to 12 characters)	Host name. This field is the node name of the OSAC node that maintains this service node being datafilled.
	FAIL_DET	see subfield FDETECT	Failed message detection. This field consists of subfield FDETECT.
	FDETECT	Y or N	Failed message detection. This field indicates that failed message detection is enabled (Y) or not (N). If set to Y, the count is checked periodically according to field AUDFREQ. The default is N. If FDETECT = Y, datafill subfield FTHRESH.
	FTHRESH	0 to 100	Failed message threshold. If FDETECT = Y, datafill this field. Enter the maximum percent of failed messages (do not meet OAP specifications) received from an external node before the DMS switch takes action. For ONPMTYPE = OSN, the connection to the external node is system busied.
	ONODTYPE	name from table ENTYPES	OSSAIN node type. This field describes the type of node being datafilled. The value must be previously datafilled in table ENTYPES.
	ONODLOC	see subfields	OSSAIN node location. This field consists of subfields FLOOR, ROW, and POSITION. These subfields identify the exact location of the node at the site.
	FLOOR	0 to 99	Floor number where the node is located.

OANODINV (continued)

Datafilling table OANODINV (ONPMTYPE = OSN)

Field	Subfield or refinement	Entry	Explanation and action
	ROW	alphanumeric (up to 2 characters)	Row number on the floor where the node is located.
	POSITION	0 to 99	Bay position number in the row where the node is located.
	ONODSITE	name from table ENSITES	OSSAIN node site. This field describes the site where the node being datafilled is located. The value must be previously datafilled in table ENSITES.
	ONODINFO	alphanumeric (up to 20 characters)	OSSAIN node information. This field is used for describing the node being datafilled. This information is displayed on the node maintenance MAP display when this node is posted. This field is used for documentation purposes only.

OANODINV (continued)

If the entry in subfield ONPMTYPE is OSAC, datafill refinements as shown in the following table.

Datafilling table OANODINV (ONPMTYPE = OSAC)

Field	Subfield or refinement	Entry	Explanation and action
	RELATION_AREA	see subfields	Relationship area. This field consists of subfield RELATION and refinements.
	RELATION	SELF or OTHER	Relationship of node in this tuple to the switch that contains this datafill. The values are defined as follows: - SELF - The node in this tuple is the same switch that contains this datafill. No further datafill is required in this table. Only one tuple with ONPMTYPE of OSAC and RELATION of SELF may be datafilled per OSAC switch. - OTHER - The node in this tuple is a different switch than the switch that contains this datafill. Datafill subfields ENNODENO, PROTOCOL_AREA, ADDRESS_AREA, DATAPATH_AREA, ONODTYPE, ONODLOC, ONODSITE, and ONODINFO
	ENNODENO	0 to 255	External node number. If RELATION = OTHER, datafill this field. This field uniquely identifies the external node number of the external node peripheral module type.
	PROTOCOL_AREA	see subfield PROTOCOL	Protocol area. If RELATION = OTHER, datafill this field. This field consists of subfield PROTOCOL.
	PROTOCOL	UDP	Protocol. The protocol for transport layer messaging. UDP is the only valid entry. Datafill refinement ADDRESS_AREA.
	ADDRESS_AREA	see subfield ADDRTYPE	Address area. This field consists of subfield ADDRTYPE.
	ADDRTYPE	IPV4	Internet protocol address type. The only valid entry is IPV4 (IP version 4). Datafill refinement IPV4ADDR.

OANODINV (continued)**Datafilling table OANODINV (ONPMTYPE = OSAC)**

Field	Subfield or refinement	Entry	Explanation and action
	IPV4ADDR	4 numbers, each 0-255	Internet protocol version 4 address. Enter the IP address for the node.
	DATAPATH_AREA	see subfield DATAPATH	Datapath area. This field consists of subfield DATAPATH and refinements
	DATAPATH	EIU or XAETHR	Data path. This is a selector field. Enter EIU if the data path for this OSAC node is to use Ethernet Interface Unit Enter XAETHR if the data path for this OSAC node is to use XA-Core Ethernet interface cards, and also datafill refinement field CMIPADDR.
	CMIPADDR	four numbers, each 0 to 255	Computing Module Internet Protocol Address. This is a refinement field, present only if selector DATAPATH = XAETHR. Enter an IP address from the ACTIVEIP field of a CMHOST tuple in table CMIPADDR. To distribute messaging over the physical links, datafill one ACTIVEIP address for half of the nodes and the other ACTIVEIP address for the other half.
	ONODTYPE	name from table ENTYPES	OSSAIN node type. If RELATION = OTHER, datafill this field. This field describes the type of node being datafilled. The value must be previously datafilled in table ENTYPES.
	ONODLOC	see subfields	OSSAIN node location. If RELATION = OTHER, datafill this field. This field consists of subfields FLOOR, ROW, and POSITION. These subfields identify the exact location of the node at the site.
	FLOOR	0 to 99	Floor number where the node is located.
	ROW	alphanumeric (up to 2 characters)	Row number on the floor where the node is located.
	POSITION	0 to 99	Bay position number in the row where the node is located.

OANODINV (continued)**Datafilling table OANODINV (ONPMTYPE = OSAC)**

Field	Subfield or refinement	Entry	Explanation and action
	ONODSITE	name from table ENSITES	OSSAIN node site. If RELATION = OTHER, datafill this field. This field describes the site where the node being datafilled is located. The value must be previously datafilled in table ENSITES.
	ONODINFO	alphanumeric (up to 20 characters)	OSSAIN node information. This field is used for describing the node being datafilled. This information is displayed on the node maintenance MAP display when this node is posted. This field is used for documentation purposes only.

If the entry in subfield ONPMTYPE is OSNM, datafill refinements as shown in the following table.

Datafilling table OANODINV (ONPMTYPE = OSNM)

Field	Subfield or refinement	Entry	Explanation and action
	ENNODENO	0 to 255	External node number. This field uniquely identifies the external node number of the external node peripheral module type.
	PROTOCOL_AREA	see subfield PROTOCOL	Protocol area. This field consists of subfield PROTOCOL.
	PROTOCOL	UDP	Protocol. The protocol for transport layer messaging. UDP is the only valid entry. Datafill refinements ADDRESS_AREA and NMTCPROT.
	ADDRESS_AREA	see subfield ADDRTYPE	Address area. This field consists of subfield ADDRTYPE.
	ADDRTYPE	IPV4	Internet protocol address type. The only valid entry is IPV4 (IP version 4). Datafill refinement IPV4ADDR.
	IPV4ADDR	4 numbers, each 0-255	Internet protocol version 4 address. Enter the IP address for the node.

OANODINV (continued)

Datafilling table OANODINV (ONPMTYPE = OSNM)

Field	Subfield or refinement	Entry	Explanation and action
	NMTCPORT	1024 to 32767	Node maintenance processing port. This field is the port number for sending a node class message to the service node. Call processing and session pool ports are datafilled in table OASESNPL. Refer to service node documentation or the developer for port number assignment.
	DATAPATH_AREA	see subfield DATAPATH	Datapath area. This field consists of subfield DATAPATH and refinements
	DATAPATH	EIU or XAETHR	Data path. This is a selector field. Enter EIU if the data path for this OSNM is to use Ethernet Interface Unit Enter XAETHR if the data path for this OSNM is to use XA-Core Ethernet interface cards, and also datafill refinement field CMIPADDR.
	CMIPADDR	four numbers, each 0 to 255	Computing Module Internet Protocol Address. This is a refinement field, present only if selector DATAPATH = XAETHR. Enter an IP address from the ACTIVEIP field of a CMHOST tuple in table CMIPADDR. To distribute messaging over the physical links, datafill one ACTIVEIP address for half of the nodes and the other ACTIVEIP address for the other half.
	FAIL_DET	see subfield FDETECT	Failed message detection. This field consists of subfield FDETECT.
	FDETECT	Y or N	Failed message detection. Indicates whether failed message detection is enabled (Y) or not (N). If set to Y, the count is checked periodically according to field AUDFREQ. The default is N. If FDETECT = Y, datafill subfield FTHRESH.

OANODINV (continued)**Datafilling table OANODINV (ONPMTYPE = OSNM)**

Field	Subfield or refinement	Entry	Explanation and action
	FTHRESH	0 to 100	Failed message threshold. If FDETECT = Y, datafill this field. Enter the maximum percent of failed messages (do not meet OAP specifications) received from an external node before the DMS switch takes action. If ONPMTYPE = OSNM, the external node is system busied by the DMS switch. If ONPMTYPE = OSN, the connection to the external node is system busied.
	TSTTIME	20 to 600	Test message time. This is the number of seconds that the DMS switch waits for a response after sending a TST message to a node or one of its session pools. If this time expires and no reply is received, the TST attempt fails. The default is 20.
	RTSTIME	20 to 600	Return to service time. This is the number of seconds that the DMS switch waits for a response after sending an RTS message to a node or one of its session pools. If this time expires and no reply is received, the RTS attempt fails. The default is 20.
	ONODTYPE	name from table ENTYPES	OSSAIN node type. This field describes the type of node being datafilled. The value must be previously datafilled in table ENTYPES.
	ONODLOC	see subfields	OSSAIN node location. This field consists of subfields FLOOR, ROW, and POSITION. These subfields identify the exact location of the node at the site.
	FLOOR	0 to 99	Floor number where the node is located.
	ROW	alphanumeric (up to 2 characters)	Row number on the floor where the node is located.
	POSITION	0 to 99	Bay position number in the row where the node is located.

OANODINV (continued)**Datafilling table OANODINV (ONPMTYPE = OSNM)**

Field	Subfield or refinement	Entry	Explanation and action
	ONODSITE	name from table ENSITES	OSSAIN node site. This field describes the site where the node being datafilled is located. The value must be previously datafilled in table ENSITES.
	ONODINFO	alphanumeric (up to 20 characters)	OSSAIN node information. This field is used for describing the node being datafilled. This information is displayed on the node maintenance MAP display when this node is posted. This field is used for documentation purposes only.

For all values of ONPMTYPE, datafill fields AUDTRIES, AUDRTIMR, and AUDFREQ.

Datafilling table OANODINV

Field	Subfield or refinement	Entry	Explanation and action
AUDTRIES		2 to 255	Audit tries. This field indicates how many times an SN fails to respond to an OSSAIN audit. Then, the session pool or node becomes system busy (SYSB). This field applies to all OSSAIN node types and session pools they contain. For a one night process (ONP), this field is set to 8.
AUDRTIMR		1 to 600	Audit reply timer. This field indicates how long the switch waits in seconds for a reply from an SN after an audit request. When the timer ends, the correct node or session pools on the node are made SYSB. For a one night process (ONP), this field is set to 6.
AUDFREQ		1 to 600	Audit frequency. This field indicates how often the session pool and node audits occur for the node and session pools on this node. For a one night process (ONP) on OSAC nodes, this field is set to 30.

OANODINV (continued)**Datafill example**

The following example shows sample datafill for table OANODINV.

MAP display example for table OANODINV

NODENAME	NODEAREA										AUDTRIES	AUDRTIMR	AUDFREQ		
SWITCH_A	OSAC	SELF											4	5	30
SWITCH_B	OSAC	OTHER	0	UDP	IPV4	172	16	10	2	XAETHR	172	16	1	108	
			SWITCH	3	B	11	CITYB	REMOTE	OSAC	4			5	30	
SWITCH_C	OSAC	OTHER	1	UDP	IPV4	172	16	20	5	EIU					
			SWITCH	1	A	12	CITYC	HOST	OSAC	4			5	30	
BRAND_01	OSNM	0	UDP	IPV4	172	16	1	200	7000	EIU					
		Y	2	240	60	SN	2	BB	3	CITYA	BRAND	ING	1	4	60
DEBIT_01	OSNM	1	UDP	IPV4	172	16	1	210	7001	XAETHR	172	16	1	109	
		Y	2	240	30	SN	2	BB	8	CITYA	DEBIT	1	4	60	
DAA_01	OSN	1	UDP	IPV4	172	16	20	205	7000	XAETHR	172	16	1	108	
			SWITCH_C	Y	2	SN	1	DD	33	CITYC	DAA1	4		5	60
DAA_02	OSN	0	UDP	IPV4	172	16	20	206	7000	EIU					
			SWITCH	C	Y	2	SN	1	DD	34	CITYC	DAA2	4		60

Error messages for table OANODINV

The following error messages apply to table OANODINV.

Error messages for table OANODINV

Error message	Explanation and action
The specified onpmttype and ennodeno combination is currently in use by another node. The onpmttype and ennodeno combination must be unique in table OANODINV.	Each node datafilled in table OANODINV must have a unique combination of ONPMTYPE and ENNODENO. If a node is datafilled specifying an ONPMTYPE / ENNODENO combination that is already in use by another OSSAIN node, this message is displayed.
The OSSAIN node PM type, ONPMTYPE, can not be modified. This node must be deleted and reentered if an ONPMTYPE change is desired.	The OSSAIN node PM type of a node datafilled in table OANODINV cannot be changed. If an attempt is made to change the ONPMTYPE, this message is displayed.
OSSAIN node names must be unique.	The node name (NODENAME) datafilled in OANODINV must be unique. If it is not, this message is displayed.

OANODINV (continued)**Error messages for table OANODINV**

Error message	Explanation and action
This node name is in use in table XXXXXXXX. You must remove all references to this node before you can delete it. Where XXXXXXXX is the name of the table using the node name. The specified IP address is currently in use by another node. IP addresses must be unique. You have not requested that failed message detection be enabled for this node. It is recommended that FDETECT be set to Y to enable failed message detection. This node must be off-line before its entry in table OANODINV can be modified. The change will not be performed. This node must be off-line before it can be deleted from table OANODINV. The deletion will not be performed. An OSAC node with a relation of OTHER cannot be datafilled until the OSAC node with a relation of SELF is datafilled. Only one OSAC node with a relation of SELF may be datafilled.	Tuples may not be deleted from table OANODINV until all references to that node name are removed from tables OASESNPL, OAVLMAP, and OSCVLGRP. This error message is displayed if an attempt is made to delete a node name from OANODINV that is in use by any of these tables. IP addresses datafilled in table OANODINV must be unique. If a duplicate IP address is datafilled, this message is displayed. If failed message detection is not requested (FDETECT = N) this message is displayed. Note, this is a warning, not an error. This datafill is still allowed. A node must be in an off-line state in order to change its entry in table OANODINV. If an attempt is made to change a node's entry and the node is not off-line, the error message is displayed. A node must be in an off-line state before it can be deleted from table OANODINV. If an attempt is made to delete a node and the node is not off-line, the error message is displayed. A node with ONPMTYPE of OSAC and RELATION of SELF must be datafilled before a node with ONPMTYPE of OSAC and RELATION of OTHER. If an attempt is made to datafill an OSAC OTHER node prior to datafilling the OSAC SELF node, this message is displayed. Only one node with an ONPMTYPE of OSAC and RELATION of SELF can be datafilled. If an attempt is made to datafill more than one node with this specification, this message is displayed.

OANODINV (continued)**Error messages for table OANODINV**

Error message	Explanation and action
The node name specified in field HOSTNAME has not been datafilled in table OANODINV.	When datafilling a HOSTNAME for an OSN node, the node name must be previously datafilled as an OSAC node with a RELATION of OTHER. If the node name has not been datafilled in OANODINV, this message is displayed.
The node name specified in field HOSTNAME has not been datafilled with ONPMTYPE of OSAC or the RELATION has not been datafilled as OTHER.	When datafilling a HOSTNAME for an OSN node, the node name must be previously datafilled as an OSAC node with a RELATION of OTHER. If the node name does not meet this criteria, this message is displayed.
Node type in field ONODTYPE has not been datafilled in table ENTYPES.	The node type datafilled in field ONODTYPE must be previously datafilled in table ENTYPES. If an attempt is made to datafill field ONODTYPE with a node type that has not been datafilled in table ENTYPES, this message is displayed.
Node site in field ONODSITE has not been datafilled in table ENSITES.	The site name datafilled in field ONODSITE must be previously datafilled in table ENSITES. If an attempt is made to datafill field ONODSITE with a site name not datafilled in table ENSITES, this message is displayed.
This OSAC node is referenced by an OSN node. All OSN references must be removed before this tuple can be deleted.	All OSN nodes that specify an OSAC node as their host must be deleted before that OSAC node can be deleted. If an attempt is made to delete an OSAC node that is specified as the host of any OSN node, this message is displayed.
The OSAC SELF tuple may not be deleted until all OSAC OTHER tuples are deleted.	All nodes with an ONPMTYPE of OSAC and RELATION of OTHER must be removed before the OSAC SELF tuple can be deleted. If an attempt is made to delete the OSAC SELF tuple while OSAC OTHER nodes are datafilled, this message is displayed.
This node name is in use in table XXXXXXXX.	Tuples may not be deleted from table OANODINV until all references to that node name are removed from tables OAFUNDEF, OASESNPL, OAVLMAP, and QMSMIS. This error message is displayed if an attempt is made to delete a node name from OANODINV that is in use by any of these tables.
You must remove all references to this node name before you can delete it.	

OANODINV (continued)**Error messages for table OANODINV**

Error message	Explanation and action
This node name is in use in table XXXXXXXX. You must remove all references to this node before you can delete it.	Before a node name can be used in table SNVLGRP, it must be datafilled in table OANODINV. Once the node name is used in table SNVLGRP, it cannot be deleted from table OANODINV. When attempting to delete a tuple from OANODINV that is referenced by table SNVLGRP, this error message is displayed. This is an existing error message. The XXXXXXXX is the name of the table using the node name; in this case, table SNVLGRP.
The CMIPADDR entry in OANODINV must match an ACTIVEIP entry in a CMHOST tuple in table CMIPADDR.	The XAETHR data path cannot be datafilled in table OANODINV unless the IP address in refinement field CMIPADDR has been previously added to table CMIPADDR, as the ACTIVEIP entry in a CMHOST tuple. If an attempt is made to violate this restriction, this error message is displayed.
This node is datafilled in table QSMIS. DATAPATH XAETHR is not supported for an OSSAIN QMS MIS server.	The XAETHR data path cannot be datafilled in table OANODINV if the node is identified in table QSMIS as a server for OSSAIN QMS MIS. If an attempt is made to change the OSSAIN QMS MIS server's data path to XAETHR, this error message is displayed.

Additional information

When XAETHR is entered as the data path, the IP address in the OANODINV CMIPADDR refinement field must be used by the far-end node as the destination address for OSSAIN messages. This same IP address will be the source IP address for OSSAIN messages sent to the far-end node.

Translation verification tool

Table OANODINV does not use translation verification tools.

Table history**SN07 (DMS)**

The DATAPATH_AREA field, with selector subfield DATAPATH and refinement CMIPADDR, is added for OSN, OSNM, and OSAC OTHER tuples. The CMIPADDR refinement field is present only if DATAPATH = XAETHR. Feature A00005160.

OANODINV (end)

TOPS11

Error message added for dependency with table SNVLGRP.

TOPS10

Table QMSMIS is added to the list of tables datafilled after table OANODINV. A corresponding error message about table QMSMIS is added. Also, added note in field ONPMTYPE about OSSAIN MIS messaging. These changes are added by feature AF7439 in functionality OSSAIN 10 Enhancements, OSAN0005.

TOPS09

The following changes were made by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN0004.

- Fields AUDTRIES and AUDRTIMR are new.
- Field AUDFREQ only used to appear for ONPMTYPE = OSN or OSNM. Now, this field appears for all values of ONPMTYPE. Also, the range is expanded from 20-600 to 1-600.

TOPS07

The following changes were made by feature AN1536 in functionality OSSAIN Enhancements, ENSV0020.

- Field NODEID is moved to table OANODNAM.
- New node types OSN and OSAC are added.
- All node information from table EXNDINV is moved into table OANODINV. Therefore, table EXNDINV no longer requires datafill.
- The number of OSNM nodes that can be datafilled is increased from 32 to 256.

NA006

Table OANODINV was created by feature AN1527 in functionality OSSAIN, ENSV0014.

OANODNAM**Table name**

Operator Services Systems Advanced Intelligent Network (OSSAIN) Node Name

Functional description

Table OANODNAM contains the network wide node identifiers and associated node name of each node known by the switch where the datafill is taking place.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OANODNAM.

Table OANODINV must be datafilled after table OANODNAM.

Table size

0 to 768 tuples

Data II

The following table lists datafill for table OANODNAM.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
NODEID		0 to 767	Node identifier. This is the key field that is the OSSAIN node identifier. Identifiers must be unique. Datafill a tuple for each node that this switch (with this table) communicates. Also, for an OSAC configuration, datafill a tuple for this switch This field must correlate between the switches. For example, if service nodes SN_01 and SN_02 are values 3 and 4 in the host, then these nodes must be the same values in all remotes.
NODENAME		alphanumeric (up to 12 characters)	Node Name. This field defines a unique node name associated with the node identifier. This name is used by other tables. It is recommended that the same node name be used when datafilling a service node in different switches.

OANODNAM (end)

Data I l e x a m p l e

The following example shows sample datafill for table OANODNAM.

MAP display example for table OANODNAM

NODEID	NODENAME
0	HOST1
1	REMOTE1
2	REMOTE2
3	BRAND_01
4	DEBIT_01
5	AABS_01

Table history

TOPS07

Table OANODNAM was created by feature AN1536 in functionality OSSAIN Enhancements, ENSV0020.

OASESNPL**Table name**

Operator Services System Advanced Intelligent Network Session Pool

Functional description

Table OASESNPL defines the attributes of session pools for OSSAIN calls. A session pool is a grouping of sessions (OSSAIN operators) on a particular service node that all serve the same function (service) or functions.

Data II sequence and implications

Table OANODINV must be datafilled before table OASESNPL.

Table size

0 to 4095 tuples

Data II

The following table lists datafill for table OASESNPL.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
SESNPLID		0 to 4094	Session pool identification. Key to table.
SESNPLNM		1 to 16 characters	Session pool name. Enter a unique name that describes the session pool.
MAXSESN		0 to 1023	Maximum sessions. This number indicates the maximum number of simultaneous calls that can be handled by the node for this session pool.
NODENAME		from table OANODINV	Node name. Enter a node name from table OANODINV. A NODENAME cannot be entered that is datafilled in table QMSMIS.
ORIGAREA		see subfield ORIGTYPE	Origination type area. This field consists of subfield ORIGTYPE and refinements.

OASESNPL (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	ORIGTYPE	SUBSCRIBER SN, OSACORIG, OSACTERM	Origination type. This field identifies how the sessions in the session pool are selected. Following are descriptions of the values: SUBSCRIBER - This session is selected by the switch for communication with a service node. This value is used for OSSAIN calls originated by a subscriber. Datafill subfield SWCHTYP_AREA and refinements. The NODENAME must be datafilled in table OANODINV with field ONPMTYPE as OSN or OSNM. SN - This value is used for calls originated by a service node. This is useful for Message Delivery where a service node would spin up a call in the switch in order to deliver a message to the subscriber, much like an operator delay call. Datafill subfields ONHKTMR_SEL, CALLTMR_SEL, and PROTAREA. The NODENAME must be datafilled in table OANODINV with field ONPMTYPE as OSN or OSNM. OSACORIG - This switch uses the session pool to originate host-remote sessions. For example, this switch is an OSAC remote and uses the session pool to initiate a host-remote session with an OSAC host. No further datafill is required. Fields SESNPLID and MAXSESN must match between the host and remote. The NODENAME must be datafilled in table OANODINV with field ONPMTYPE as OSAC.

OASESNPL (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	ORIGTYPE (continued)		OSACTERM - This switch uses the session pool to respond to another switch that initiated a host-remote session with this switch. For example, this switch is an OSAC host and an OSAC remote initiated a session with this host using this session pool. No further datafill is required. Fields SESNPLID and MAXSESN must match between the host and remote. The NODENAME must be datafilled in table OANODINV with field ONPMTYPE as OSAC.

If ORIGTYPE = SUBSCRIBER, datafill subfield SWCHTYP_AREA and refinements.

Data filling table OASESNPL (ORIGTYPE = SUBSCRIBER)

Field	Subfield or refinement	Entry	Explanation and action
	SWCHTYP_AREA	see subfield SWCHTYP	Switch type area. This field consists of subfield SWCHTYP.
	SWCHTYP	S, SH, R	Switch type. If ORIGTYPE = SUBSCRIBER, datafill this field and refinements. This field is the role of the TOPS switch in routing and queuing for this session pool, defined as follows: - S - The switch is acting as a stand-alone for this session pool. Datafill subfields ONHKTMR_SEL, CALLTMR_SEL, TRIGGER_AREA, and PROTAREA. - SH - The switch is acting as either a stand-alone or OSAC host for this session pool. Datafill subfields ONHKTMR_SEL, CALLTMR_SEL, TRIGGER_AREA, and PROTAREA. - R - The switch is acting as an OSAC remote for this session pool. Datafill subfields ONHKTMR_SEL, CALLTMR_SEL, TRIGEVNT, and PROTAREA.

OASESNPL (continued)

If ORIGTYPE = SUBSCRIBER and SWCHTYP = S or SH, datafill subfields ONHKTMR_SEL, CALLTMR_SEL, TRIGGER_AREA, and PROTAREA.

Data filling table OASESNPL (ORIGTYPE=SUBSCRIBER and SWCHTYP=S or SH) (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	ONHKTMR_SEL	see subfield ONHKTMR	On-hook sanity timer selector. This field consists of subfield ONHKTMR.
	ONHKTMR	USEDEFLT or OVERRIDE	On-hook sanity timer for this session pool. This sanity timer is initiated when the switch detects that a subscriber has gone on-hook. The values are defined as follows: • USEDEFLT - The on-hook sanity timer value is in table OAINPARM parameter CALL_SANITY_TIMER_DURATION. • OVERRIDE - The on-hook sanity timer value is specified in following field TIMerval. Datafill refinement TIMerval.
	TIMerval	1 to 3600	Timer value. Datafill this field if field ONHKTMR = OVERRIDE. Enter the on-hook sanity timer value.
	CALLTMR_SEL	see subfield CALLTMR	Call sanity timer selector. This field consists of subfield CALLTMR.
	CALLTMR	USEDEFLT or OVERRIDE	Call sanity timer for this session pool. This sanity timer is initiated when no subscribers are connected to the call. The values are defined as follows: • USEDEFLT - The call sanity timer value is from table OAINPARM parameter CALL_SANITY_TIMER_DURATION. • OVERRIDE - The call sanity timer value is specified in following field TIMerval. Datafill refinement TIMerval.
	TIMerval	1 to 3600	Timer value. Datafill this field if field CALLTMR = OVERRIDE. Enter the call sanity timer value.
	TRIGGER_AREA	see subfield	Trigger area. This field consists of subfield TRIGEVNT

OASESNPL (continued)**Data lling tab le OASESNPL (ORIGTYPE=SUBSCRIBER and SWCHTYP=S or SH) (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	TRIGEVNT	Y or N	Trigger event. The value are defined in the following: - Y - This session pool is only used for trigger event inform messages. No agent data is allocated. Datafill this session pool name in table OAFUNDEF, field TRIGPOOL. - N - This session pool is used for subscriber originations and trigger event information. Datafill refinement OCQPROF.
	OCQPROF	from table OQCQPROF	OSSAIN call queue profile number. Datafill this field if field TRIGEVNT = N. This is an index into table OQCQPROF that must be previously defined in table OQCQPROF.
	PROTAREA	see subfield PROTOCOL	Protocol area. This field consists of subfield PROTOCOL.
	PROTOCOL	UDP	Protocol. This field specifies the transport protocol to communicate between the switch and service node or between OSAC switches using this session pool. The only valid value is UDP. Datafill refinement fields CPPOINT and MTCPOINT.
	CPPOINT	1024 to 32767	Call processing port. This is the UDP port number that the service node uses to receive call processing messages for this session pool. Refer to service node documentation or the developer for port number assignment.
	MTCPOINT	1024 to 32767	Session pool maintenance port. This field is the UDP port number that the service node uses to receive maintenance messages for this session pool. Refer to service node documentation or the developer for port number assignment.

OASESNPL (continued)

If ORIGTYPE = SUBSCRIBER and SWTCHTYP = R, datafill subfields ONHKTMR_SEL, CALLTMR_SEL, TRIGEVNT, and PROTAREA.

Data filling table OASESNPL (ORIGTYPE = SUBSCRIBER and SWTCHTYP = R) (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	ONHKTMR_SEL	see subfield ONHKTMR	On-hook sanity timer selector. This field consists of subfield ONHKTMR.
	ONHKTMR	USEDEFLT or OVERRIDE	On-hook sanity timer for this session pool. This sanity timer is initiated when the switch detects that a subscriber has gone on-hook. The values are defined as follows: • USEDEFLT - The on-hook sanity timer value is in table OAINPARM parameter CALL_SANITY_TIMER_DURATION. • OVERRIDE - The on-hook sanity timer value is specified in following field TIMERVAL. Datafill refinement TIMERVAL.
	TIMERVAL	1 to 3600	Timer value. Datafill this field if field ONHKTMR = OVERRIDE. Enter the on-hook sanity timer value.
	CALLTMR_SEL	see subfield CALLTMR	Call sanity timer selector. This field consists of subfield CALLTMR.
	CALLTMR	USEDEFLT or OVERRIDE	Call sanity timer for this session pool. This sanity timer is initiated when no subscribers are connected to the call. The values are defined as follows: • USEDEFLT - The call sanity timer value is from table OAINPARM parameter CALL_SANITY_TIMER_DURATION. • OVERRIDE - The call sanity timer value is specified in following field TIMERVAL. Datafill refinement TIMERVAL.
	TIMERVAL	1 to 3600	Timer value. Datafill this field if field CALLTMR = OVERRIDE. Enter the call sanity timer value.

OASESNPL (continued)**Data lling tab le OASESNPL (ORIGTYPE = SUBSCRIBER and SWCHTYP = R) (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	TRIGEVNT	Y or N	Trigger event. The value are defined in the following: - Y - This session pool is only used for trigger event information. No agent data is allocated. Datafill this session pool name in table OAFUNDEF, field TRIGPOOL. - N - This session pool is used for subscriber originations and trigger event information.
	PROTAREA	see subfield PROTOCOL	Protocol area. This field consists of subfield PROTOCOL.
	PROTOCOL	UDP	Protocol. This field specifies the transport protocol to communicate between the switch and service node or between OSAC switches using this session pool. The only valid value is UDP. Datafill refinement field CPPORT.
	CPPORT	1024 to 32767	Call processing port. This is the UDP port number that the service node uses to receive call processing messages for this session pool. Refer to service node documentation or the developer for port number assignment.

OASESNPL (continued)

If ORIGTYPE = SN, datafill subfields ONHKTMR_SEL, CALLTMR_SEL, and PROTAREA.

Data filling table OASESNPL (ORIGTYPE = SN) (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	ONHKTMR_SEL	see subfield ONHKTMR	On-hook sanity timer selector. This field consists of subfield ONHKTMR.
	ONHKTMR	USEDEFLT or OVERRIDE	On-hook sanity timer for this session pool. This sanity timer is initiated when the switch detects that a subscriber has gone on-hook. The values are defined as follows: • USEDEFLT - The on-hook sanity timer value is in table OAINPARM parameter CALL_SANITY_TIMER_DURATION. • OVERRIDE - The on-hook sanity timer value is specified in following field TIMerval. Datafill refinement TIMerval.
	TIMerval	1 to 3600	Timer value. Datafill this field if field ONHKTMR = OVERRIDE. Enter the on-hook sanity timer value.
	CALLTMR_SEL	see subfield CALLTMR	Call sanity timer selector. This field consists of subfield CALLTMR.
	CALLTMR	USEDEFLT or OVERRIDE	Call sanity timer for this session pool. This sanity timer is initiated when no subscribers are connected to the call. The values are defined as follows: • USEDEFLT - The call sanity timer value is from table OAINPARM parameter CALL_SANITY_TIMER_DURATION. • OVERRIDE - The call sanity timer value is specified in following field TIMerval. Datafill refinement TIMerval.
	TIMerval	1 to 3600	Timer value. Datafill this field if field CALLTMR = OVERRIDE. Enter the call sanity timer value.
	PROTAREA	see subfield PROTOCOL	Protocol area. This field consists of subfield PROTOCOL.

OASESNPL (continued)**Data table OASESNPL (ORIGTYPE = SN) (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	PROTOCOL	UDP	Protocol. This field specifies the transport protocol to communicate between the switch and service node or between OSAC switches using this session pool. The only valid value is UDP. Datafill refinement fields CPPORT and MTCPORT.
	CPPORT	1024 to 32767	Call processing port. This is the UDP port number that the service node uses to receive call processing messages for this session pool. Refer to service node documentation or the developer for port number assignment.
	MTCPORT	1024 to 32767	Session pool maintenance port. This field is the UDP port number that the service node uses to receive maintenance messages for this session pool. Refer to service node documentation or the developer for port number assignment. This field only appears if this table is in a host (standalone or OSAC), not in an OSAC remote.

Data example

The following example shows sample datafill for table OASESNPL in switch OSAC_0 that acts as a standalone and host.

MAP display example for table OASESNPL in host (OSAC_0)

```

SESNPLID SESNPLNM MAXSESN NODENAME ORIGAREA
-----
1      BRAND1_H  10      BRAND_01  SUBSCRIBER SH USEDEFLT USEDEFLT
                                N 9 UDP 7001 7002
2      DEBIT_01  10      NODE2     SUBSCRIBER S  USEDEFLT USEDEFLT
                                N 5 UDP 8001 8002
3      3WCLG_01  10      NODE3     SN USEDEFLT USEDEFLT UDP 9001 9002
4      REMOTE_1   20      OSAC_1    OSACTERM
5      REMOTE_2   20      OSAC_2    OSACTERM

```

The above tuples are described as follows:

- Tuple 1 - This is a service node session that the host uses in either a standalone or host configuration (SH). When used as a host, one of the remotes (OSAC_1 or OSAC_2) is the direct user of this service node. The

OASESNPL (continued)

specific remote is determined by OASESNPL datafill in the remote. When used as a standalone, OSAC_0 is the direct user of this service node.

- Tuple 2 - This is a service node session that is only used by the OSAC_0 in a standalone (S) configuration, That is, a remote does not use this service node.
- Tuple 3 - This is a service node session that the service node initiates to spin up a call in one of the remotes (OSAC_1 or OSAC_2). The particular remote is determined by OASESNPL datafill in the remote.
- Tuples 4 and 5 - These are host-remote sessions with remotes OSAC_1 and OSAC_2, respectively. These sessions are initiated by the remotes to request sessions with service nodes defined in prior tuples.

The following example shows sample datafill for table OASESNPL in remote switch OSAC_1.

MAP display example for table OASESNPL in remote (OSAC_1)

SESNPLID	SESNPLNM	MAXSESN	NODENAME	ORIGAREA
1	BRAND1_H	10	BRAND_01	SUBSCRIBER R USEDEFLT USEDEFLT N UDP 7001
2	HOST_0	20	OSAC_0	OSACORIG
3	3WCLG_01	10	NODE3	SN USEDEFLT USEDEFLT UDP 9001

The above tuples are described as follows:

- Tuple 1 - This is a service node session that is used by this remote.
- Tuple 2 - This is a host-remote session with host OSAC_0. This session is initiated by this remote to request a session with the service node in tuple 1.
- Tuple 3 - This is a service node session that the service node initiates to spin up a call in this remote.

OASESNPL (continued)**Error messages**

The following error messages apply to table OASESNPL..

Error messages for table OASESNPL (Sheet 1 of 2)

Error message	Explanation and action
OSSAIN session pool names must be unique.	This message is displayed if an attempt is made to datafill field SESNPLNM with the same session pool name of another tuple.
The session pool associated with this tuple must first be OFFLINE before this tuple can be changed.	This message is displayed if an attempt is made to change a tuple while the session pool associated with that tuple is not OFFLINE
The session pool associated with this tuple must first be OFFLINE before this tuple can be deleted.	This message is displayed if an attempt is made to delete a tuple while the session pool associated with that tuple is not OFFLINE
Field ORIGTYPE cannot be changed. You must delete this tuple first and then re-add with the new value.	This message is displayed if an attempt is made to change field ORIGTYPE.
Field SWCHTYP cannot be changed. You must delete this tuple first and then re-add with the new value.	This message is displayed if an attempt is made to change field SWCHTYP.
Field NODENAME cannot be changed. You must delete this tuple first and then re-add with the new value.	This message is displayed if an attempt is made to change field NODENAME.
You must datafill the call queue profile in table OQCQPROF before the index can be datafilled in this table.	This message is displayed if an attempt is made to datafill field OCQPROF with a call queue profile not defined in table OQCQPROF.
This session pool name is in use in Table OAFUNDEF.	Tuples may not be deleted from table OASESNPL until all references to that session pool name are removed from table OAFUNDEF. This error message is displayed if an attempt is made to delete a session pool from OASESNPL that is in use by table OAFUNDEF.
You must remove all references to this session pool before you can delete it.	

OASESNPL (end)

Error messages for table OASESNPL (Sheet 2 of 2)

Error message	Explanation and action
Field TRIGEVNT cannot be changed. Delete this tuple first and re-add with the new value.	The TRIGEVNT field cannot be changed without first deleting the tuple and re-adding it with the correct TRIGEVNT value. This error message is displayed if an attempt is made to change the TRIGEVNT field.
The node name specified is already in use in Table QMSMIS.	Tuples may not be added that specify a NODENAME already in use by the MIS application in table QMSMIS. If an attempt is made to add a tuple specifying a nodename already in use in table QMSMIS, this error message is displayed.

Table history**TOPS10**

A restriction about table QMSMIS is added to field NODENAME and an error message by feature AF7439 in functionality OSSAIN 10 Enhancements, OSAN0005.

TOPS07

This table is modified to define host-remote session pools. Field ORIGTYPE can now be datafilled with OSACORIG or OSACTERM. Field SWCHTYP can now be datafilled with H or SH. These changes are provided by feature AN1536 in functionality Operator Services AIN, ENSV0014.

TOPS06

Table OASESNPL was created by functionality OSSAIN, ENSV0014.

OATLKPRF**Table name**

Operator Services System Advanced Intelligent Network Talking Profile

Functional description

Table OATLKPRF selects services according to types of events during the talking part of the call. Trigger events only occur during call float. Only services provided by an OSSAIN node can be selected; that is, a TOPS operator or TOPS automated system cannot be selected.

Data II sequence and implications

Tables OAFUNDEF and OACTLDEF must be datafilled before table OATLKPRF.

Table size

0 to 233

Data II

The following table lists datafill for table OATLKPRF.

Field descriptions (Sheet 1 of 8)

Field	Subfield or refinement	Entry	Explanation and action
TALKIDX		0 to 2046	Talking index. Index into table from table OATPRFIX
PROFILE		see subfields	Profile. This field consists of subfields TRIGGER, SNCONTROL, STOPCNVT, GENAMA, RLSFWD, RFLTONFL, and ACTSEL.
	TRIGGER	NTFY, FLASH, CLGD, PTYD	Trigger. A list of trigger events during the talking part of the call (end with '\$'). If no events are entered, no further refinements of PROFILE must be datafilled. Note, the MAP display also shows values TRMT, RING, OPLSF, NOANS, and ANS; however, these are not valid trigger events. Following are the valid events:

OATLKPRF (continued)**Field descriptions (Sheet 2 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
			NTFY - Notify. The notification event occurs when the notification timer expires prior to disconnect. The notification timer is only started if the notification event is datafilled in Table OATLKPRF. Then, the notification timer is started when answer is detected. Notification timers started by ACTS for coin notification take precedence over those specified by Table OATLKPRF. The notification time is initially specified by the NOTIFY_TIMER in table OAINPARAM. If the NTFY event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, notification for a coin call is routed to ACTS. Note, trigger processing is not supported for calls floated by ACTS. FLASH - The calling party hook flashes. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, this event is ignored. Note, OSSAIN trigger processing is not supported for ACTS floated calls. Calls floated by ACTS are routed to an operator. CLGD - Calling disconnect. The calling party goes on-hook. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, trigger processing transitions to post disconnect processing. Note, OSSAIN trigger processing is not supported for calls requiring Time and Charges. These calls are routed to ACTS or an operator. PTYD - Party disconnect. Any party, other than the calling party, that goes on-hook. If this event occurs and is selected, the call is routed to an OSSAIN node. Otherwise, if this event occurs but is not selected, trigger processing transitions to post disconnect processing. Note, OSSAIN trigger processing is not supported for calls requiring Time and Charges. These calls are routed to ACTS or an operator.

OATLKPRF (continued)**Field descriptions (Sheet 3 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	SNCONTRL	Y or N	Service node control. Indicates whether or not the service node acquires control of the call for this trigger event. A Y indicates that the service node acquires control. An N indicates that the service node is informed of the trigger event but call control remains at the TOPS switch. When set to N, the service node is given a minimum of information, mainly the session begin message. When set to Y, all event information is sent to the service node for it to determine processing. And, trigger processing is not performed, rather the node is informed of the events so that the node can determine the course of action. Therefore, this table (OATLKPRF) is only valid if SNCONTRL = N.
	STOPCNVT	Y or N	Stop conversation timing when processing the trigger event. Enter Y to stop timing. Otherwise, enter N. The default is N. Conversation timing is used for prepaid calling card service and controlled by OFCENG parameter MINIMUM_CHARGE_DURATION. For further information, refer to section "Prepaid calling card".
	GENAMA	Y or N	Generate an AMA record when processing the trigger event. Enter Y to generate the record. Otherwise, enter N. The default is N.
	RLSFWD	Y or N	Release the forward party when processing the trigger event. Enter Y to release the party. Otherwise, enter N. The default is N.

OATLKPRF (continued)**Field descriptions (Sheet 4 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	RFLTONFL	Y or N	Refloat on failure. This field indicates if a call should refloat when a trigger leads to a failure. A failure is when the call cannot be presented to a SN or operator, or cannot be queued for a SN or operator and queueing is active. The values are Y (refloat) and N (do not refloat). Failures are due to the following: • Presentation failure to a SN occurs when a session cannot be obtained with the SN. If RFLTONFL = N, disposition routing is used from table OAFNDISP. • Queue failure occurs from queue overflow or deflection. If RFLTONFL = N, the call is sent to treatment. The exceptions and restrictions on this field are as follows: • If a call triggers, that trigger has RFLTONFL = Y, and the switch is attempting to obtain a session with a service node, field RFLTONFL is ignored. • A refloat is only attempted if RFLTONFL = Y, the calling party is attached, and the called party is either connecting or already connected. • Field RLSFWD must set to Y in order to set RFLTONFL to N. • The RFLTONFL value is applicable if the call triggers to an operator and fails. However, if the call triggers to a service node, fails, and subfield SNCONTRL = N, the call remains floated regardless of the RFLTONFL setting. • If a call is queued for an OSSAIN session, the notify timer expires, and that trigger tuple has RFLTONFL = N, field RFLTONFL is ignored. The notify trigger is selected with field TRIGGER = NTFY. The timer is set by table OAINPARAM parameter NOTIFY_TIMER.

OATLKPRF (continued)**Field descriptions (Sheet 5 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
STAR	ACTSEL	see subfield ACCTYPE	Action select. This field consists of subfield ACTTYPE.
	ACTTYPE	CTRLLIST or FUNCTION	Action type. Select either a list of services (CTRLLIST) or a single service (FUNCTION) to be performed if the the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node (field FUNCTYPE = SN in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node.
	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node (field FUNCTYPE = SN in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node
		see subfield DIGITSEL	Star key. Service selection associated with DTMF * digit. This field consists of subfield DIGITSEL. This field applies to the calling or called party. Table OAINPARAM parameter STR_PARTY selects the called or calling party.
	DIGITSEL	Y or N	Digit select. Enter Y to enable trigger by DTMF * digit. Otherwise, enter N. If set to Y, datafill subfields STOPCNVT, GENAMA, RLSFWD, and ACTSEL.
	STOPCNVT	Y or N	Stop conversation timing. If DIGITSEL = Y, datafill this refinement. Enter Y to stop conversation timing when processing this trigger event. Otherwise, enter N.

OATLKPRF (continued)**Field descriptions (Sheet 6 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	GENAMA	Y or N	Generate AMA. If DIGITSEL = Y, datafill this refinement. Enter Y to generate AMA when processing a DTMF * digit event. Otherwise, enter N.
	RLSFWD	Y or N	Release forward party. If DIGITSEL = Y, datafill this refinement. Enter Y to release the forward party when processing a DTMF* digit event. Otherwise, enter N.
	RFLTONTFL	Y or N	Refloat on failure. This field indicates if a call should refloat when a trigger leads to a failure. A failure is when the call cannot be presented to an SN or operator, or cannot be queued for an SN or operator and queueing is active. The values are Y (refloat) and N (do not refloat).
	STRPARTY	CALLING or CALLED	Specialized tone receiver party. This field indicates which party to monitor for a * and trigger on it during the talking phase. For a broadcast voice link, table OAVLMAP field STRCLG enables the monitor and selects OCTO or STAR.
	ACTSEL	see subfield ACCTYPE	Action select. If DIGITSEL = Y, datafill this refinement. This field consists of subfield ACTTYPE.
	ACTTYPE	FUNCTION or CTRLLIST	Action type. Select either a single service (FUNCTION) or list of services (CTRLLIST) to be performed if the the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node (field FUNCTYPE = SN in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node.

OATLKPRF (continued)**Field descriptions (Sheet 7 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
OCTO	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node (field FUNCTYPE = SN in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node
		see subfield DIGITSEL	Octothorpe key. Service selection associated with DTMF # digit. This field consists of subfield DIGITSEL. This field applies to the calling or called party. Table OAINPARAM parameter STR_PARTY selects the called or calling party.
	DIGITSEL	Y or N	Digit select. Enter Y to enable trigger by DTMF # digit. Otherwise, enter N. If set to Y, datafill subfields GENAMA, RLSFWD, and ACTSEL.
	STOPCNVT	Y or N	Stop conversation timing. If DIGITSEL = Y, datafill this refinement. Enter Y to stop conversation timing when processing this trigger event. Otherwise, enter N.
	GENAMA	Y or N	Generate AMA. If DIGITSEL = Y, datafill this refinement. Enter Y to generate AMA when processing a DTMF # digit event. Otherwise, enter N.
	RLSFWD	Y or N	Release forward party. If DIGITSEL = Y, datafill this refinement. Enter Y to release the forward party when processing a DTMF# digit event. Otherwise, enter N.
	RFLTONFL	Y or N	Refloat on failure. This field indicates if a call should refloat when a trigger leads to a failure. A failure is when the call cannot be presented to an SN or operator, or cannot be queued for an SN or operator and queueing is active. The values are Y (refloat) and N (do not refloat).
	STRPARTY	CALLING or CALLED	Specialized tone receiver party. This field indicates which party to monitor for a #and trigger on it during the talking phase. For a broadcast voice link, table OAVLMAP field STRCLG enables the monitor and selects OCTO or STAR.

OATLKPRF (continued)**Field descriptions (Sheet 8 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
	ACTSEL	see subfield ACCTYPE	Action select. If DIGITSEL = Y, datafill this refinement. This field consists of subfield ACTTYPE.
	ACTTYPE	FUNCTION or CTRLLIST	Action type. Select either a single service (FUNCTION) or list of services (CTRLLIST) to be performed if the the selected trigger occurs. If ACTTYPE = CTRLLIST, datafill subfield CTRLLIST. If ACTTYPE = FUNCTION, datafill subfield FUNCTION.
	CTRLLIST	name from table OACTLDEF	Control list. If ACTTYPE = CTRLLIST, datafill this refinement. Enter a control list name from table OACTLDEF. A control list is a list of services (defined in table OAFUNDEF) that are applied sequentially. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
	FUNCTION	name from table OAFUNDEF	Function. If ACTTYPE = FUNCTION, datafill this refinement. Enter a function name from table OAFUNDEF. A function is a service. The service provider must be a service node or TOPS operator (field FUNCTYPE = SN or TOPSOPER in table OAFUNDEF). That is, at call float, a trigger event can only redirect a call to a service node or TOPS operator.
HOLDRCVR		Y or N	Hold receiver. Enter Y to retain the DTMF receiver when transitioning to a service node. Otherwise, enter N.

Data I l e x a m p l e

The following example shows sample datafill for table OATLKPRF.

```
TALKIDXR                                     PROFILE
                                     STAR
                                OCTO  HOLDCVR
-----
0
(NTFY Y N Y Y N FUNCTION TRIGGER_FN)
(FLASH Y N Y Y N FUNCTION TRIGGER_FN) $
Y N Y Y N CALLING FUNCTION      TRIGGER_FN
                                     N      Y
```

The following error messages apply to table OATLKPRF..

Error message	Explanation and action
ONLY ONE DIGIT STAR OR OCTO CAN BE DATAFILLED	Only one DTMF digit event, STAR or OCTO, can be datafilled within the same tuple. If an attempt is made to datafill both STAR and OCTO trigger events, this error message is displayed.
RLSFWD MUST BE SET TO Y WHEN GENAMA IS SET TO Y	When setting the GENAMA field to Y, the RLSFWD field must also be set to Y. If an attempt is made to set GENAMA to Y while setting RLSFWD to N, this error message is displayed.
NOT A VALID TALKING TRIGGER	This message is displayed if an attempt is made to datafill an invalid value in field TRIGGER. Valid values are FLASH, CLGD, PTYD and NTFY.
Only one action assignment allowed per trigger	This message is displayed if an attempt is made to add or change a tuple with more than one action assigned to the same trigger.
RLSFWD MUST BE N TO PERMIT RFLTONFL SETTING OF Y.	Field RLSFWD must set to Y in order to set RFLTONFL to N. If this requirement is not followed, the attempt to set RFLTONFL is denied and this error message is displayed.

OATLKPRF (end)

Table history

TOPS12

Subfield STRPARTY is added to fields STAR and OCTO by feature 59006766 in functionality OSSAIN 12 Enhancements, OSAN0007.

TOPS11

Subfield RFLTONFL is added by feature AF7712 in functionality OSSAIN 11 Enhancements, OSAN0006.

Fields STAR and OCTO apply to the calling and called parties. This change is made by feature AF7714 in functionality OSSAIN 11 Enhancements, OSAN0006.

TOPS09

Fields CTRLLIST and FUNCTION can now use the name of an SN or TOPS operator function provider. That is, the entered name's function provider is defined in table OAFUNDEF field FUNCTYPE as either SN or TOPSOPER. Before this release, only an SN function provider was allowed. This change is added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN00004.

TOP08

The range of field TALKIDX is expanded to 0-2046 by PRSDOC BY65801 in functionalities OSSAIN (ENSV0014) and OSSAIN Enhancements (ENSV0020).

TOPS07

Prepaid calling card is supported by adding fields STOPCNVT, GENAMA, and RLSFWD. Also, refinement STOPCNVT is added to fields STAR and OCTO. These changes are provided by feature AF6493 in functionality OSSAIN Enhancements, ENSV0020.

TOPS06

Table OATLKPRF was created by functionality OSSAIN, ENSV0014.

OATPRFIX**Table name**

Operator Services System Advanced Intelligent Network Trigger Profile Index

Functional description

Table OATPRFIX indexes into tables OACNNPRF, OATLKPRF, and OADSCPRF. Table OATPRFIX aggregates the OACNNPRF/OATLKPRF/OADSCPRF profile indices into a single call trigger profile index. This aggregation allows for ease in assigning the initial call trigger profile index in Table OAINCTLA.

Data II sequence and implications

Tables OACNNPRF, OATLKPRF, and OADSCPRF must be datafilled before table OATPRFIX.

Table size

0 to 2047

Data II

The following table lists datafill for table OATPRFIX.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
IDX		0 to 2046	Index. Index into table from table OAINCTLA.
CPROFIDX		See subfield PROFSEL	Connection profile index. This field consists of subfield PROFSEL.
	PROFSEL	N or Y	Connection profile select. Enter Y to index into table OACNNPRF and datafill refinement PROFIDX. Otherwise, enter N.
	PROFIDX	0 to 2046	Connection profile index. If PROFSEL = Y, enter an index into table OACNNPRF.
TPROFIDX		See subfield PROFSEL	Talking profile index. This field consists of subfield PROFSEL.
	PROFSEL	N or Y	Talking profile select. Enter Y to index into table OATLKPRF and datafill refinement PROFIDX. Otherwise, enter N.

OATPRFIX (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
DPROFIDX	PROFIDX	0 to 2046	Talking profile index. If PROFSEL = Y, enter an index into table OATLKPRF.
		See subfield PROFSEL	Disconnect profile index. This field consists of subfield PROFSEL.
	PROFSEL	N or Y	Disconnect profile select. Enter Y to index into table OADSCPRF and datafill refinement PROFIDX. Otherwise, enter N.
	PROFIDX	0 to 2046	Disconnect profile index. If PROFSEL = Y, enter an index into table OADSCPRF.

Data example

The following example shows sample datafill for table OATPRFIX.

MAP display example for table OATPRFIX

IDX	CONNIDX	TALKIDX	DISCIDX
0	Y 4	Y 2	Y 7
1	Y 2	Y 2	Y 3

Error messages

The following error messages apply to table OATPRFIX..

Error messages for table OATPRFIX (Sheet 1 of 2)

Error message	Explanation and action
Connection profile is not in table OACNNPRF	This message is displayed if an attempt is made to datafill field CPROFIDX with a value not in table OACNNPRF

OATPRFIX (end)**Error messages for table OATPRFIX (Sheet 2 of 2)**

Error message	Explanation and action
Talking profile is not in table OATLKPRF	This message is displayed if an attempt is made to datafill field TPROFIDX with a value not in table OATLKPRF
Disconnect profile is not in table OADSCPRF	This message is displayed if an attempt is made to datafill field DPROFIDX with a value not in table OADSCPRF

Table history**TOP08**

For fields CPROFIDX, TPROFIDX, and DPROFIDX the range of subfield PROFIDX is expanded to 0-2046 by PRSDOC BY65801 in functionalities OSSAIN (ENSV0014) and OSSAIN Enhancements (ENSV0020).

NA006

Table OATPRFIX was created by functionality Operator Services, ENSV0014.

OAVLMAP

Table name

Operator Services System Advanced Intelligent Network Voice Link Mapping

Functional description

Table OAVLMAP is used in making voice connections between the TOPS switch and service nodes for OSSAIN calls. Voice connections between the switch and a service node are made at the request of the service node by an OAP message. The service node must supply the logical voice channel number for the voice connection in the OAP message. This table maps the logical voice channel to an index in table TRKMEM.

Data II sequence and implications

Tables TRKMEM and OANODINV must be datafilled before table OAVLMAP.

Table size

0 to 4194K tuples

Data II

The following table lists datafill for table OAVLMAP.

Field descriptions (Sheet 1 of 4)

Field	Subfield or refinement	Entry	Explanation and action
NDANDCH		see subfield NODENAME	Node and voice channel. This field is the key into the table and consists of subfields NODENAME and VOICENUM.
	NODENAME	node name from table OANODINV	Node name. This field is part of the key into the table. This field is the service node name from table OANODINV (field NODENAME) for this voice channel.

OAVLMAP (continued)**Field descriptions (Sheet 2 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	VOICENUM	0 to 8191	Logical voice channel number. This field is part of the key into the table. This field is the logical voice channel number received from the service node. Allocation of broadcast voice link data is one block at a time. A block can store up to 1024 broadcast voice links. Therefore, as a recommendation (in order to save memory), all broadcast voice links assigned to a particular node should have assignment in the same group. The groups are as follows: • Group 0 = VOICENUM 0 - 1023 • Group 1 = VOICENUM 1024 - 2047 • Group 2 = VOICENUM 2048 - 3071 • Group 3 = VOICENUM 3072 - 4095 • Group 4 = VOICENUM 4096 - 5119 • Group 5 = VOICENUM 5120 - 6143 • Group 6 = VOICENUM 6144 - 7167 • Group 7 = VOICENUM 7168 - 8191 Any group is available for use but the most memory savings is if all broadcast voice link assignments are to group 0. This comment is not a restriction, only a recommendation. Table control does not enforce this recommendation in any way. Note, if there is no broadcast voice link assignment to a node, there is no requirement for voice link data. The above only applies to broadcast voice links.
CLLI		from table CLLI	Common language location identifier. This field is the first of the two part key into table TRKMEM. It is the trunk name for the voice connection between the switch and service node.
EXTRKNM		0 to 9999	External trunk number. This field is the second of the two part key into table TRKMEM.

OAVLMAP (continued)**Field descriptions (Sheet 3 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
BCSTAREA		see subfield	Broadcast area. This field consists of subfield BCST_SEL and refinements. Broadcast voice links (BVLs) are used between a service node and either a host or standalone switch. Therefore, in an OSAC environment, BVLs are not allowed between the OSAC host and OSAC remote switches.
	BCST_SEL	Y or N	Broadcast select. This field indicates use of voice links for broadcasting. A BVL only transmits and normally connects to many callers. Example uses are playing music during call hold or playing a branding announcement. The values are: - Y - Use for broadcasting if the trunk does not exceed the maximum number of simultaneous connections allowed in field MAXCONNS for the voice link. Datafill refinements CUTTHRU, MAXCONNS, and STRCLG. - N - Do not use for broadcasting. A two-way link is set up. This value is the default value. No refinements require datafill. In order to change a broadcast voice link tuple, the trunk must be INB at the MAP display.
	CUTTHRU	IMMEDIATE or HKCHG	Cut through. Datafill this field if field BCST_SEL = Y. This field indicates when voice transmission occurs. The values are: - IMMEDIATE - Immediately. Voice transmission is immediate on connection. Use this value for music because music can start at any point in the song. - HKCHG - Hook change. Voice transmission starts when the switch detects an offhook of at least 10 milliseconds on the voice link. Use this value for branding announcements because they must start at the beginning of the message. In order to change a broadcast voice link tuple, the trunk must be INB at the MAP display.

OAVLMAP (continued)**Field descriptions (Sheet 4 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	MAXCONNS	2 -1023 or 2-255	Maximum connections. Datafill this field if field BCST_SEL = Y. Enter the maximum number of simultaneous connections allowed on the broadcasting voice link. The range is one of the following: 2 -1023: Use this range for an enhanced network (ENET) and set field CUTTHRU to IMMEDIATE. 2-255: Use this range if the above conditions are not met. That is, for an ENET and field CUTTHRU = HKCHG; or, for a junctored network (JNET), regardless of the value in field CUTTHRU. In order to change a broadcast voice link tuple, the trunk must be INB at the MAP display.
	STRCLG	see subfields	Specialized tone receiver (STR) supervision digit calling party. This field is present only if field BCST_SEL = Y. Field STRCLG consists of subfield STRSEL.
	STRSEL	Y or N	STR supervision select. This field indicates if STR supervision is used to monitor for a * or # digit by a calling party who is connected to a broadcast voice link. The values are Y (enable) and N (disable). For Y, enter datafill in field STRDIGIT. The default is N.
	STRDIGIT	STAR or OCTO	STR supervision digit. This field is present only when field STRSEL = Y. This field selects the type of digit for supervision. If a digit is detected, the service node is notified. Table OATLKPRF subfield STRPARY under fields STAR and OCTO selects the calling or called party.

Data example

The following example shows sample datafill for table OAVLMAP.

OAVLMAP (continued)**MAP display example for table OAVLMAP**

NDANDCH		CLLI	EXTRKNM	BCSTAREA
BILLING_SN	10	BILLING_VL	1	N
BRANDING_SN	9	BRANDING_VL	0	Y HKCHG 250 Y OCTO
CALL_CENTER_SN	8	CALL_CTR_VL	5	Y IMMED 1023 Y OCTO

Error messages

The following error messages apply to table OAVLMAP.

Error messages for table OAVLMAP (Sheet 1 of 2)

Error message	Explanation and action
This CLLI and external trunk name must be datafilled in table TRKMEM before datafilling this table.	Table TRKMEM must be datafilled before table OAVLMAP. The CLLI and EXTRKNM require deletion in table TRKMEM before using them in table OAVLMAP. This message indicates an attempt to datafill values that are not defined in table TRKMEM.
Trunk group type for CLLI must be TOPSVL.	The CLLI in table OAVLMAP must be of trunk group type TOPSVL. This error message indicates an attempt to enter a CLLI that does not meet this requirement.
Only nodes of PM type OSNM or OSAC may have datafill in this table.	Field NODENAME requires consideration of the node type in table OANODINV. Only OSNM and OSAC node types are allowed for voice link connectivity. This message indicates an attempt to datafill a NODENAME that is not a type OSNM or OSAC.
Only nodes of PM type OSNM can have the BCST field set to Y.	The BCST field cannot be set to Y for the voice link of a node that is a PM type OSAC or OSN. This message indicates an attempt to enter Y with this condition.
The MAXCONNS value cannot exceed 255 in a JNET office.	Field MAXCONNS cannot be set to more than 255 in an office equipped with JNET type Network Modules. This message indicates an attempt to enter a value that does not meet this requirement.

OAVLMAP (continued)**Error messages for table OAVLMAP (Sheet 2 of 2)**

Error message	Explanation and action
Voice link audit in progress – try again later.	The voice link audit is running and an attempt is made to change the MAXCONNS field. This change includes deletion of the tuple. The audit should finish within a few seconds, then retry the command.
The MAXCONNS value cannot exceed 255 when the CUTTHRU field is set to HKCHG.	Field MAXCONNS cannot be set to more than 255 on a voice link with field CUTTHRU = HKCHG in an ENET office. This message indicates an attempted entry that does not meet this requirement.
The CLLI and EXTRKNM is already in use by another voice link. This is not allowed for voice links used for broadcasting.	A logical voice channel set up for broadcasting must map to a physical trunk member that has no duplicate. A logical voice channel is the VOICENUM part of the index in table OAVLMAP. Fields CLLI and EXTRKNM in table OAVLMAP define the physical trunk member. This message indicates an attempt to assign a trunk already in use by another logical channel. This restriction does not apply to non-broadcast voice links, which can have multiple logical channels assigned to the same physical trunk.
The CLLI name is used in table XXXXXXXX, it cannot be reused here.	If a CLLI is referenced in table SNVLGRP, it cannot be datafilled in table OAVLMAP. And, if a CLLI is referenced in table OAVLMAP, it cannot be datafilled in table SNVLGRP. The following error message is displayed when attempting to datafill table OAVLMAP with a CLLI that is used in table SNVLGRP: In the error message, XXXXXXXX is the name of the table containing the CLLI; in this case, SNVLGRP.
CLLI and external trunk name is already datafilled against this node.	This error message is displayed if an attempt is made to datafill a duplicate CLLI and external trunk member against the same node.

Table history

TOPS12

Field STRCLG is added by feature 59006766 in functionality OSSAIN 12 Enhancements, OSAN0007.

OAVLMAP (end)

TOPS11

Error messages are added for dependencies with tables SNVLGRP and CLLI by feature AF7714 in functionality OSSAIN 11 Enhancements, OSAN0006.

TOPS09

Field BCSTAREA and refinements are added by feature AF7155 in functionality OSSAIN 09 Enhancements, OSAN00004.

TOPS07

Error messages were added by feature AN1536 in functionality OSSAIN Enhancements, ENSV0020.

TOPS06

Table OAVLMAP was created by functionality Operator Services, ENSV0014.

OCCINFO**Table name**

Other Common Carrier Information

Functional description

Table OCCINFO defines the attributes for carriers that provide service for the DMS switch and screens calls for carrier compatibility. For example, table OCCINFO permits systems to send international traffic only to carriers that can handle international traffic.

For related information, refer to table OCCRDIG.

Data II sequence and implications

Complete the following tables before table OCCINFO.

- OCCNAME

Table size

0 to 1000 tuples

You can enter attributes in table OCCINFO for up to 999 carriers. One tuple exists for the nil carrier (NILC).

Data II

The following table lists datafill for table OCCINFO.

Field descriptions (Sheet 1 of 8)

Field	Subfield	Entry	Explanation and action
CARRNAME	MAP display example for table AMATKOPT	alphanumeric (1 to 16 characters)	Carrier name. Enter the carrier name or an abbreviation of the carrier name as it appears in table OCCNAME. Note: USE_PREVIOUS is not valid datafill for the CARRNAME field.
CARRNUM		numeric (0000 to 9999)	Carrier number. Enter the carrier access code (CAC). The CAC is equal to the XXXX digits in the equal access (EA) prefixes (10XXXX or 950YXXXX).

OCCINFO (continued)**Field descriptions (Sheet 2 of 8)**

Field	Subfield	Entry	Explanation and action
ACCESS		EAP, FGC, INTERIM, OTC, TRANS, or NONE	Access arrangement. Enter one of the following access types accepted by the carrier to handle a call: - EAP-equal access plan dialing over feature group D (FGD) signaling - FGC-feature group C (FGC) dialing over FGC signaling - INTERIM-interim dialing over FGD signaling - OTC-FGC dialing over FGC signaling (local billing) - TRANS-both interim and EAP dialing over FGD signaling - NONE-no access Note: Wireless calls do not support value OTC.
ORIGCARR		Y or N	Original carrier. Enter Y (yes) to define this carrier name as the original carrier. Otherwise, enter N (no). Define one carrier name as the original carrier for each unique carrier number. If two or more carrier names contain with the same carrier number, define one (and only one) of the duplicate carriers as the original carrier by typing "Y" in this field.
INTER		Y or N	Inter-local access and transport areas (LATA). Enter Y if the carrier can handle traffic between LATAs. Otherwise, enter N.
INTNTL		Y or N	International. Enter Y if the carrier can handle international traffic. Otherwise, enter N.
INTRA		Y or N	Intra-LATA. Enter Y if the carrier can handle traffic within the same LATA. Otherwise, enter N.
ANI		Y or N	Automatic number identification (ANI). Enter Y if the carrier requires that ANI digits be sent with the called number. Otherwise, enter N.

OCCINFO (continued)**Field descriptions (Sheet 3 of 8)**

Field	Subfield	Entry	Explanation and action
FANI		Y or N	Flexible automatic number identification (FANI). FANI II codes can be used to identify line originators. Enter Y if the carrier can receive FANI information digits in the place of ANI information digits from TOPS and end offices. Otherwise, enter N.
ONISCRN		Y or N	Operator number identification (ONI) screening. Enter Y if ONI traffic requires a screen by an operator or centralized automatic message accounting (CAMA) position before outpulsing to the carrier. Otherwise, enter N.
AD1		Y or N	Abbreviated dialing number one. Enter Y if you can access the carrier using abbreviated dialing. Otherwise, enter N.
OVERLAP		Y or N	Overlap. Enter Y if the carrier receives digits from the access tandem (AT) or the equal access end office (EAEO) using overlap outpulsing. Otherwise, enter N.
INTERS		Y or N	Inter-state. Enter Y if the carrier can handle traffic between states. Otherwise, enter N.
INTRAS		Y or N	Intra-state. Enter Y if the carrier can handle traffic within the same state. Otherwise, enter N.

OCCINFO (continued)**Field descriptions (Sheet 4 of 8)**

Field	Subfield	Entry	Explanation and action
TERMREC		LONG or SHORT	Terminating access record. Enter the length of the terminating access record produced for the carrier. The LONG format includes the same informational fields as the SHORT format, plus the following fields: • service observed • operator action • service feature • overseas indicator • carrier connect date • carrier connect time • elapsed time from carrier • inter-LATA or international carrier (IC/INC) call event status If the additional fields are not necessary, enter SHORT for the short format. Refer to the applicable automatic message accounting (AMA) reference guide for a more detailed description of record termination.
OCCSEPNO		numeric (0 to 127)	Other common carrier (OCC) separation number. Enter the OCC separation number used for the carrier in the traffic separation measurement system (TSMS).
CONTMARK		+	Continuation mark. Enter + to indicate that additional information for this tuple exists in the next record.
OPSIG		FGRPC, FGRPD, or NONE	Operator signaling. Enter the type of operator signaling provided by the carrier. The availability of this field eliminates the need to establish two carriers with the same access code in table OCCINFO to enable transitional or EAP carriers for FGC operator signaling.

OCCINFO (continued)**Field descriptions (Sheet 5 of 8)**

Field	Subfield	Entry	Explanation and action
PICIND		Y or N	Presubscription indicator. Enter Y if the carrier receives the presubscription indicator. Otherwise, enter N. Complete this field for every entry in table OCCINFO.
NOA950		Y or N	Nature of address indicator. Enter Y to specify that the nature of address indicator in the calling party number parameter is a binary value of 1111110 (network specific: 950+ call from public station, hotel/motel line, or non-equal access end office [EAEO]). Otherwise, enter N. The default value of N causes no change in the existing operation of the switch.
INCCPN		Y or N	Include calling party number. Enter Y if the existing operation of the switch requires no change. Enter N to indicate that the calling party number parameter is absent from any initial address message (IAM) sent to this carrier. The default value for this field is Y.
DTMFIND		Y or N	Rotary dial or dual-tone multifrequency (DTMF) indicator. Enter Y if the carrier receives the DTMF indicator on operator services calls routed directly to the carrier. Otherwise, enter N. Complete field DTMFIND for every entry in table OCCINFO. Field DTMFIND is active only if feature package NTX888AA (Equal Access Operator Services Signaling [EAOSS]) is present.

OCCINFO (continued)**Field descriptions (Sheet 6 of 8)**

Field	Subfield	Entry	Explanation and action
OPSERV		Y or N	Operator services. Enter Y if the carrier accepts EAOSS and does not require the operating company to process 10XXX+0 and 00 calls to the carrier. Enter N if the carrier does not accept EAOSS and requires the operating company to process 10XXX+0 and 00 calls to the carrier. For example, for feature group C (FGC) carriers that provide their own operator services and do not accept feature group D (FGD) signaling, set field OPSERV to N to indicate that the carrier cannot accept EAOSS. The Traffic Operator Position System (TOPS) access tandem (AT) converts EAOSS signaling to FGC signaling for those carriers. Complete field OPSERV for every entry in table OCCINFO. Field OPSERV is active only if feature package NTX888AA (Equal Access Operator Services Signaling [EAOSS]) is present.
CACBLOCK		Y or N	Carrier access code (CAC) blocking. Enter Y if the carrier blocks all calls dialed with a CAC. Otherwise, enter N. Complete field CACBLOCK for every entry in table OCCINFO. Field CACBLOCK is active only if feature package NTX989AA (Carrier Access Code Blocking for IC/INC) is present.
CTDOA		Y or N	Carrier toll deny operator assisted. Enter Y to block operator assisted (OA) calls to this carrier if the subscriber has the carrier toll denied (CTD) line option enabled for this particular carrier. Otherwise, enter N. The default value for this field is N.
CMCMON		Y or N	Cellular mobile carrier (CMC) monitor. Enter Y to monitor the connection between the CMC and the inter-LATA or international carrier (IC/INC), and to place the called directory number in the originating IC/INC and terminating CMC billing records. Otherwise, enter N.

OCCINFO (continued)**Field descriptions (Sheet 7 of 8)**

Field	Subfield	Entry	Explanation and action
SCRNWATS		Y or N	Enhanced wide area telephone service (WATS) screening. Enter Y if the carrier requires band screening on digits dialed from an enhanced WATS line. Otherwise, enter N. Field SCRNWATS is only applicable if feature package NTXA16AA (Enhanced WATS Operation [POTS]) is present.
CRMCRA		Y or N	Circuit reservation and acknowledgement messages. Enter Y if a circuit reservation message (CRM) is sent out from an access tandem (AT) to an inter-exchange carrier (IXC) on FGD calls outgoing over signaling system 7 (SS7) access-to-carrier (ATC) trunks, and if a subsequent circuit reservation acknowledgement (CRA) message is received at the AT from the IXC on FGD calls incoming to the AT on either multifrequency (MF) intertoll (IT) or superCAMA (SC) trunks. Otherwise, enter N.
ATPINCL		Y or N	Access transport parameter (ATP) included. Enter Y if the ATP is in the outgoing ISDN user part (ISUP) initial address message (IAM). Enter N if the ATP is discarded. This field is only applicable for TR444 calls (basic rate access [BRA] to ISUP calls).
INTRAOPR		Y or N	Intra-LATA operator. Enter Y if the carrier can handle 0- intra-LATA operator calls. Otherwise, enter N. The default value for this field is N.
INCASA		Y or N	In-call service access. This field determines whether Access to Messaging applies to calls handled by the carrier in table OCCINFO.
INTRCOIN		Y or N	Intra-LATA toll coin. Designates if a carrier can handle intra-LATA toll coin traffic. The default value for this field is N.

OCCINFO (continued)**Field descriptions (Sheet 8 of 8)**

Field	Subfield	Entry	Explanation and action
ARBLKPVT	CARRIER	alphanumeric	Intra-LATA toll coin route carrier. Represents the carrier that handles intra-LATA toll coin traffic. If the route carrier can handle intracoin traffic, field INTRCOIN is set to Y. The default value for this field is NILC.
		Y or N	Automatic Recall blocking of private calls. This field indicates whether a carrier can complete AR calls to private numbers. When set to Y (yes), and the applicable office parameter in table OFCENG (AR_BLOCK_PRIVATE_RES or AR_BLOCK_PRIVATE_CTX) is CARSCRN, AR activation attempts routed by the carrier are blocked, and sent to treatment. When set to N (no), the CASOP feature allows AR activation attempts to complete. Note: When the ACCESS field in this table is OTC (operating telephone company), all AR activation attempts to a private DN can complete regardless of the entry specified in field ARBLKPVT.

Data file example

The following example shows sample datafill for table OCCINFO.

The example shows datafill for carrier CARR2 with carrier number 320, inter-LATA traffic, and an EAP access state.

MAP display example for table OCCINFO

```

CARRNAME CARRNUM ACCESS ORIGCARR INTER INTNTL INTRA ANI FANI ONISCRN
AD1 OVERLAP INTERS INTRAS TERMREC OCCSEPNO OPSIG PICIND NA0950
INNCCPN DTMFIND OPSERV CACBLOCK CTDOA CMCMON SCRNWATS CRMCRA ATPINCL
INTRAOPR INCASA INTRCOIN ARBLKPVT

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UNT2 0202 TRANS Y Y Y N Y N N Y Y Y N LONG 61 FGRPD N N Y N N N N N
N N N Y N Y

```

Table history**NA012**

Added FANI II explanation to table OCCINFO.

NA010

Feature Hawaiian Tel Phantom CIC creates table PCIC, which must be datafilled before table OCCINFO.

The meaning of field FANI is changed to include TOPS offices.

NA008

Feature Equal Access for DMS-100 Wireless added access arrangement restrictions for EA on the DMS-100 Wireless switch in release LWW00805 (NA008).

NA007

Added field INCASA.

NA006

Added fields INTRCOIN and CARRIER in accordance with the Intra-LATA PIC Enhancements feature.

Added field ARBLKPVT for CMS AR Screening of private Call (CASOP).

OCCMAP

Table name

Equal Access List Of Other Common Carrier Mapping Table

Functional description

Table OCCMAP is a read-only table that displays the reverse mapping used to convert a four-digit Carrier Identification Code (CIC) into a carrier index for table OCCINFO. The contents of table OCCMAP can be changed by setting field ORIGCARR to Y or N in table OCCINFO.

Table OCCMAP is used by certain services (such as Enhanced 800 Service) to convert a CIC returned from the database into an index into table OCCINFO.

For related information, refer to table OCCINFO.

Data II sequence and implications

Table OCCMAP is read-only. Manual additions, deletions, and changes are not allowed. Because of this, there is no requirement to datafill other tables prior to table OCCMAP.

Table OCCMAP can only be written to through dump and restore procedures. Dump and restore procedures for table OCCINFO must be completed prior to dump and restore procedures for table OCCMAP.

Table size

0 to 1000 tuples

OCCMAP (continued)**Data II**

The following table lists datafill for table OCCMAP.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
CICKEY		numeric(0000 to 9999)	<i>Carrier identification code key</i> This field contains a four-digit numeric value that specifies the Carrier Identification Code (CIC) key. Values outside of the 0000 to 9999 range are not valid and will not appear as entries for this field.
NAME		alphanumeric (1 to 16 characters)	<i>Carrier name</i> This field contains the code assigned to the trunk group member in table CLLI.

Data II e xample

The following example shows sample datafill for table OCCMAP.

MAP display example for table OCCMAP

CICKEY	NAME
0110	SSP
0111	AG1
0120	MCI
0124	BUSY
0222	AG2
0333	AG3
0444	AG4
0488	ITT
0555	AG5
0666	AG6
0777	GTE
0888	TR1
0999	TR2

OCCMAP (end)

Table history

BCS36

Table OCCMAP was introduced.

OCCNAME**Table name**

Equal Access List of Other Common Carrier Names Table

Functional description

Table OCCNAME consists of one field (OCCNAME) and serves two functions for translations:

- It provides a list of connected carriers. There are 1000 tuples to accommodate 999 carriers and 1 null carrier (NILC). The office default carrier is considered the same as any other inter-LATA (local access and transport area) carrier (IC) or international carrier (INC). NILC is added internally as the last carrier of the list.
- It establishes the spelling standard for carrier names. Other tables that require carrier names are OCCINFO, TRKGRP, and STDPRT.

For related information, refer to table OCCRDIG.

Data II sequence and implications

Complete table CLLI before table OCCNAME.

Complete table OCCINFO after table OCCNAME.

Table size

0 to 1000 tuples

Data II

The following table lists datafill for table OCCNAME.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
OCCNAME		alphanumeric (1 to 16 characters)	Other common carrier name. Enter the carrier name or an alphanumeric abbreviation of the carrier name or enter the reserved carrier name USE_PREVIOUS if the generic recursive pretranslator is to be used. If the reserved carrier name USE_PREVIOUS is entered, a screen message appears to inform the operating company personnel that this carrier name has been datafilled.

OCCNAME (end)

Data I l e x a m p l e

The following example shows sample datafill for table OCCNAME.

MAP display example for table OCCNAME

OCCNAME
MCI
NONAME

Table history

NA010

Added entry for table OCCINFO under heading "Datafill sequence and implications."

NA006

Added description of screen message that appears after datafilling USE_PREVIOUS in accordance with the Dial Plan Translations Enhancements feature.

Supplementary information

None

OCCRDIG**Table name**

Equal Access Other Common Carrier R Digit Table

Functional description**Overview**

Equal access was created as a result of the divestiture of AT&T. As the name implies, it allows subscribers equal access to carriers that are equal in type, quality, and transmission, yet not necessarily equal in price.

The former territory of AT&T is divided into nonoverlapping local access and transport areas (LATA). These boundaries are generally based on a breakdown of the densest population areas; they have nothing to do with geographic, state, or city boundaries.

Traffic within a LATA is served by intra-LATA carriers, and traffic between LATAs is served by inter-LATA carriers (IC). International traffic is served by an international carrier (INC) or by an inter-LATA carrier serving as an INC.

Equal access is implemented in feature packages NTX186AA (Equal Access End Office) and NTX386AA (Access Tandem Switch). The Equal Access Other Common Carrier tables and forms are listed in the following table.

Functional description of table OCCRDIG

For calls to a numbering plan area (NPA) in world zone 1 but outside the continental United States, table OCCRDIG provides the regional code to outpulse to the access tandem (AT) or INC. The regional code is a single digit prefixed by 01. The code, written in the generic form 01R, follows the carrier identification digits during the first stage of the outpulsing sequence.

Equal access other common carrier tables

Table name	Form number	Form title
OCCRDIG	2357A, B	Equal Access Other Common Carrier R Digit Table Record
OCCNAME	2356A, B	Equal Access List of Other Common Carrier Names Table Record
OCCINFO	2355A, B	Equal Access Other Common Carrier Information Table Record

OCCRDIG (continued)

The possible values for the R digit follow:

- 0 reserved NPA
- 3 Canada
- 5 Mexico
- 7 Alaska
- 8 Hawaii
- 9 Caribbean

Data II sequence and implications

The following tables must be datafilled before table OCCRDIG:

- CLLI
- OCCNAME
- LATANAME
- TRKGRP
- TRKSGRP
- OFRT
- OCCINFO
- LINEATTR
- LATAXLA

Table size

0 to 1000 tuples

OCCRDIG (continued)**Data II**

The following table lists datafill for table OCCRDIG.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
OCCRSNPA		numeric(200 to 999)	<i>Other common carrier R digit serving numbering plan area</i> Enter a valid NPA within world zone 1, but outside the continental United States.
OCCRDIG		numeric(0 to 9)	<i>Other Common Carrier R digit</i> Enter the R digit value for the region where the NPA defined in field OCCRSNPA is located. The values correspond to regions as follows: • 0 reserved NPA • 3 Canada • 5 Mexico • 7 Alaska • 8 Hawaii • 9 Caribbean The default value is 1.
OUTCNUS		Y or N	<i>Outside continental US</i> Specify whether the region defined in field OCCRDIG is outside the continental United States. Enter Y (yes) if the NPA defined in field OCCRSNPA is not reserved and is within a specific region that is outside the continental United States. Enter N (no) if the NPA defined in OCCRSNPA is reserved (700, 800, or 900) and is not within a specific region.

Data II e xample

The following example shows sample datafill for table OCCRDIG.

OCCRDIG (end)

MAP display example for table OCCRDIG

OCCRSNPA	OCCRDIG	OUTCNUS
213	1	Y
014	4	N

OCCSRV**Table name**

Equal Access Other Common Carrier Service Data Table

Functional description

Table OCCSRV provisions 0ZZ/1NX codes for operator assist and direct dial call types on a carrier by carrier basis. The codes are used by AIN response translation simplification features in an access tandem switch. The table contains carrier data for services or applications. This table contains fields KEY and OPTIONS. Field KEY represents the carrier name taken from table OCCNAME. Field OPTION contains the 0ZZ/1NX codes for FGD translations.

Data II sequence and implications

The following tables must be datafilled before table OCCSRV.

- OCCNAME
- OCCINFO

Table size

The system dynamically allocates table size according to datafill.

Data II

The following table lists datafill for table OCCSRV.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		None	Key. This field requires no datafill. Tuples in table OCCNAME define the key for this table.
	OPTIONS	See subfields	This field consists of subfield NSC0ZZ, NSC1NX, NSCOP0ZZ, NSCOP1NX and their refinements.
	NSC0ZZ	Three character alphanumeric string (N, 1 to 0 B to F)	NSC0ZZ. Datafill the 0ZZ value for FGD translation for national direct dial calls.

OCCSRV (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	NSC1NX	Three character alphanumeric string (N, 1 to 0 B to F)	NSC1NX. Datafill the 1NX value for FGD translation for international direct dial calls.
	NSCOP0ZZ	Three character alphanumeric string (N, 1 to 0, B to F)	NSCOP0ZZ. Datafill the 0ZZ value for FGD translation for national operator assist calls.
	NSCOP1NX	Three character alphanumeric string (N, 1 to 0, B to F)	NSCOP1NX. Datafill the 1NX value for FGD translation for international operator assist calls.

Data file example

The following example shows sample datafill for table OCCSRV.

MAP display example for table OCCSRV

KEY	OPTIONS
MCI	(NSC0ZZ 088) (NSCOP0ZZ 099) (NSC1NX 155) (NSCOP1NX 156)
ATT	(NSC0ZZ 077) (NSCOP0ZZ 066) (NSC1NX 177) (NSCOP1NX 171)

Table history**NA009**

Feature COOR: AIN Response Translation Part 2 introduces table OCCSRV.

Supplementary information

None

OCCTSINT

Table name

Equal Access Other Common Carrier Traffic Separation Intersection Table

Functional description

Table OCCTSINT is used in an equal access end office (EAEO) with the equal access traffic separation measurement system (EATSMS), if there is a need to separate equal access (EA) traffic by local access and transport area (LATA) and state attributes (in addition to separating regular traffic by type of call in table TFANINT). Table OCCTSINT separates EA traffic into the following four categories:

- intra-LATA intrastate (LDSRA)
- intra-LATA interstate (LDSER)
- inter-LATA intrastate (LDIRA)
- inter-LATA interstate (LDIER)

The data used to determine the LATA and state attributes needed to peg the appropriate operational measurements (OM) register is defined in subtable HNPACONT.ATTRIB.

Each entry in table OCCTSINT is indexed by

- the traffic separation number of the carrier selected for the call found in field OCCSEPNO of table OCCINFO
- the traffic separation number of the carrier trunk group selected to carry the call found in field TRAFSNO of table TRKGRP

For each unique instance of carrier separation number and carrier trunk group separation number, table OCCTSINT has four registers corresponding to the four categories shown above. Each of these registers contains an OM register number that is an index into OM group EATSMS.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OCCTSINT.

Table size

0 to 2048 tuples

OCCTSINT (continued)**Data II**

The following table lists datafill for table OCCTSINT.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
INDX		see subfields	<i>Index</i> This field is the table key and consists of subfields CARRIN and TRNKOUT.
	CARRIN	0 to 127	<i>Incoming traffic separation number for equal access</i> Enter the incoming traffic separation number assigned to the equal access (EA) carrier.
	TRNKOUT	0 to 127	<i>Outgoing traffic separation number for equal access</i> Enter the enhanced traffic separation number of the destination in an EA call.
LDSRA		0 to 2047	<i>Register number for intrastate intra-LATA call</i> Enter the register number to peg in operational measurement (OM) group EATSMS if the call is an intrastate intra-LATA (local access and transport area) call. The default range is 0 to 225. This can be extended to 0 to 2047 by office parameter NO_OCCTS_OM_REGISTERS in table OFCENG.
LDIRA		0 to 2047	<i>Register number for interstate intra-LATA call</i> Enter the register number to peg in OM group EATSMS if the call is an interstate intra-LATA call. The default range is 0 to 225. This can be extended to 0 to 2047 by office parameter NO_OCCTS_OM_REGISTERS in table OFCENG.

OCCTSINT (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
LD SER		0 to 2047	<i>Register number for intrastate inter-LATA call</i> Enter the register number to peg in OM group EATSMS if the call is an intrastate inter-LATA call. The default range is 0 to 225. This can be extended to 0 to 2047 by office parameter NO_OCCTS_OM_REGISTERS in table OFCENG.
LD IER		0 to 2047	<i>Register number for interstate inter-LATA call</i> Enter the register number to peg in OM group EATSMS if the call is an interstate inter-LATA call. The default range is 0 to 225. This can be extended to 0 to 2047 by office parameter NO_OCCTS_OM_REGISTERS in table OFCENG.

Data file example

The following example shows sample datafill for table OCCTSINT.

MAP display example for table OCCTSINT

INDX	LDSRA	LDIRA	LD SER	LD IER	
8	12	4	5	6	7

Table history**CSP03**

Deleted reference to office parameters OCCTS_IN_MAX_NUMBER and OCCTS_OUT_MAX_NUMBER which become obsolete for CSP03.

OCDLGRP

Table name

Operator Centralization Data Link Group Table

Functional description

Table OCDLGRP defines the OC data link group names and type of LAPD endpoints for for Operator Centralization via the Enhanced TOPS Message Switch (ETMS OC) data links. This table is datafilled for ETMS OC data link group names instead of table CLLI which is datafilled to define DCM OC data link group names.

There are no default values.

Data II sequence and implications

Datafill table OCDLGRP before table TMSOCDL.

Table size

0 to 32 tuples

Data II

The following table lists datafill for table OCDLGRP.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
INDEX		0 to 31	Index. Index into table.

OCDLGRP (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
GRPNAME		Up to 16 characters.	Group Name. Name of ETMS OC data link group.
LAPDATTR		NT or TE	Link access protocol on the D-channel. This field determines if this set of data links is a network (NT) or terminal (TE) endpoint in the context of LAPD. It is crucial that two OCDLGRP data link sets to be connected have opposite values for this LAPDATTR field. Otherwise, the data links would not be able to communicate, so could not come InSv. A simple strategy would be to use NT for entries associated with HOST tuples in table OCGRP and TE for REMOTE tuples in table OCGRP. This method is not a requirement, but is a possible scheme in setting opposite values.

Data l l e x a m p l e

The following example shows sample datafill for table OCDLGRP.

MAP display example for table OCDLGRP

INDEX	GRPNAME	LAPDATTR
0	CARYDL1	TE
1	RALEIGHDL1	NT
2	DURHAMDL1	TE

Table history**TOPS04**

Table introduced by feature AN1133 in functionality Enhanced TOPS OC and OC Remote Support, ENSV0008 and ENSV0011.

OCGRP

Table name

Operator Centralization Group Table

Functional description

Table OCGRP identifies the remote offices that a host office is communicating with. It also identifies voice and data links between host and remote offices.

A discussion of host voice bypass is given after the datafill example, below.

Refer to table OCOFC for related information.

Data II sequence and implications

The following tables must be datafilled before table OCGRP.

- LTCINV
- LTCPSINV
- OCDLGRP
- TMSOCDL
- CLLI
- TRKGRP
- TRKSGRP
- TRKMEM
- OCOFC
- TOPSHDLC
- TRKOPTS (only for OC IP)
- IPINV (only for OC IP)

Table OCGRP must be datafilled before tables:

- VLMEM
- OCHOST
- OCHOSTQ
- OCIPDL

Table OCGRP must also be datafilled before issuing the OCNCHOST command in the OCNC MAP increment.

OCGRP (continued)

Datafill Restrictions:

- The BCSLEVEL must be at least 48 in order to datafill the DLSEL with the IP option.
- A tuple cannot be deleted from table OCGRP if it is used in table OCIPDL or OCIPVL.
- Verify that the voice link group is datafilled as DYNAMIC in table TRKOPTS when DLSEL = IP
- Verify that when the voice link is associated with a host in table OCGRP, then the trunk group is marked as an outgoing trunk in table TRKSGRP. Verify that if the voice link is associated with a remote in table OCGRP, the trunk group is marked as an incoming trunk in table TRKSGRP

Note: As of release TOPS13, the trunk direction rule above is a change from previous applications for OC. If the above rule is not followed, voice link selection during IP OC call processing will not occur.

- To change a field, the tuple must be deleted and re-added, except for changing fields VLGRP (if for an OC-IP office) and BCSLEVEL.

Table size

0 to 31 tuples

OCGRP (continued)**Data II**

The following table lists datafill for table OCGRP.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
OFFICE		name from table OCOFC	Office name. Enter the office name at the other end of a link. The name must be datafilled in table OCOFC. Tuples are not allowed with an OFFICE in table OCOFC with an illegal value of 0, or in the range of 32-63.
OFCTYPE		HOST or REMOTE	Office type. Enter the type of office in field OFFICE. An operator centralization (OC) host office with feature package NTXA60 (TOPS Closedown) can function as a host or a remote office. When functioning as a host office, offices datafilled as remote offices must be identified to the OC host office as remotes to enable servicing of their operator traffic. When functioning as a remote office, offices datafilled as host offices must be identified to the OC remote as hosts to enable their use as hosts by the OC office. In a host office, the default entry is REMOTE. In a remote office, the default entry is HOST.
VLGRP		name from table TRKGRP	Voice link group. Enter the voice link group common language location identifier (CLLI) associated with a specific office. This CLLI must be datafilled in table TRKGRP. For OC IP, the CLLI must be datafilled in table TRKOPTS. An exception is for host voice bypass. Refer to the discussion after the datafill example. For an OC-IP office, this field can be changed without deleting and re-adding the tuple.
DLOVRLAY		see subfields	Data link overlay. This field consists of subfield DLSEL.

OCGRP (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	DLSEL	HDLC, LAPD, or IP	Data link selector. Enter the data link type: • HDLC: High data link control. This is a DCM data link that must have an office datafilled in table OCOFC with an index in the range of 1 to 15. Datafill refinement DLGRP but not OCDLGRP. • LAPD: Link Access Protocol on the D Channel. This value allows datafilling of LAPD ETMS OC data link groups. The office must be datafilled in table OCOFC with an index in the range 1 to 31. Datafill refinement OCDLGRP but not DLGRP. • IP - Internet protocol. Field BCSLEVEL must be at least 48. The voice link group must be datafilled in table TRKOPTS as DYNAMIC.
	DLGRP	CLLI from table TOPSHDLC	Data link group. Enter the data link group CLLI associated with a specific office. The CLLI must be datafilled in table TOPSHDLC. This subfield only appears when DLSEL = HDLC.

OCGRP (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
BCSLEVEL	OCDLGRP	name from table OCDLGRP	Operator centralization data link group. Enter the ETMS OC data link group datafilled in table OCDLGRP. This subfield only appears when DLSEL = LAPD.
		0 to 99	Batch change supplement level. Enter the batch change supplement (BCS) level (increment). The entry in this field is the lower BCS level of two connected switches. Note: This field must be monitored and maintained at the proper BCS level to ensure correct functionality. Failure to maintain this field entry can affect revenue generation. Maintenance is essential to avoid an error following dump and restore. An error can occur if a difference greater than three BCS levels exists between the entry in this field and the host office's BCS level. In TOPS translations, refer to functionality Host/Remote Networking by Queue Type, ADVQ0005, for information on BCS installation strategy. This field can be changed without deleting and re-adding the tuple.

Data example

The following example shows sample datafill for table OCGRP.

MAP display example for table OCGRP

OFFICE	OFCTYPE	VLGRP	DLOVRLAY	BCSLEVEL
HOSTA	HOST	STRG	HDLC HOSTA	35
HOST1	HOST	HOSTVLOG	IP	48
REMOTE1	REMOTE	REMOTEVLIC	IP	48
BYPASSED_HOST	HOST	HOSTBYPASS1	IP	50
BYPASSING_REMOTE	REMOTE	PLACEHOLDER	IP	50

OCGRP (continued)

In the above example, tuples `BYPASSED_HOST` and `BYPASSING_REMOTE` are used for host voice bypass, discussed in the following paragraphs. The `BYPASSED_HOST` tuple is contained on the remote switch. The `VLGRP HOSTBYPASS1` is the voice link used to connect the remote to the IP position. The `BYPASSING_REMOTE` tuple is contained on the host switch. The `VLGRP PLACEHOLDER` is a placeholder CLI (described below).

With host voice bypass, an OC call establishes a packetized voice connection directly from the remote to the IP position. As a result, the tuple in `OCGRP` (host's entry) on the remote switch no longer indicates the voice link CLI to the host switch. Instead, with host voice bypass, the host's entry in `OCGRP` on the remote switch indicates the voice link CLI from the remote to the IP position.

For host voice bypass, the host does not need to provision voice links to that remote. Since an OC-IP voice link is NOT needed, a placeholder CLI group can be datafilled in table `CLLI` for use in table `OCGRP`. This placeholder CLI is used on the host switch to datafill field `VLGRP` (for the remote's entry in table `OCGRP` with a `BCSLEVEL` of 50 or greater), instead of entering a provisioned OC-IP voice link.

But, if the data link is IP, and the `OFCTYPE` is `HOST` (which means the connection is from the remote switch to a `HOST` switch or an IP position), the voice link must be a dynamic trunk group in table `TRKOPTS` (with the application of OC).

WARNING: PLACEHOLDER CLI IS USED. OC TRAFFIC FROM THIS REMOTE WILL BE ADVERSELY AFFECTED UNLESS ALL OF ITS CALLS TO THIS HOST ROUTE TO IP POSITIONS.

In summary, table `OCGRP` allows entering a CLI name in table `OCGRP` for a remote office (`BCSLEVEL` 50 or greater) which has no associated trunk group and members, if the data link indicates IP.

Supplementary information

This section provides information on dump and restore procedures for table `OCGRP` and possible error messages when datafilling table `OCGRP`.

Dump and restore

Dump and restore of this table to BCS32, 33, or 34 restores the entry in `BCSLEVEL` to the host office BCS level minus three BCS levels. (For example: $BCS33 - 3 = BCS30$.) Dump and restore to BCS35 or higher levels restores the existing BCS level entry (field `BCSLEVEL`) to the new field.

OCGRP (continued)

For TOPS04, all previous tuples that have STUB datafilled for the DLSEL field will fail to be moved. This will also cause VLMEM tuples for this office to drop out during dump and restore.

See field BCSLEVEL.

Error messages

The following error messages apply to table OCGRP.

Error messages for table OCGRP (Sheet 1 of 2)

Error message	Explanation and action
CANNOT DATAFILL THE SAME OFFICE IN OCGRP AND AS SWITCH_NAME IN TABLE OCPARMS	If field OFFICE is datafilled with an entry that is already datafilled with entry SWITCH_NAME in field PARMNAME in table OCPARMS, this error message displays.
OFFICE MUST FIRST BE DELETED FROM TABLE OCPARMS	If an attempt is made to delete a tuple from this table that is datafilled as BVC_HOST in field PARMNAME in table OCPARMS, this error message is displayed.
OFFICE MUST FIRST BE DELETED FROM TABLE OCHOSTQ	If an attempt is made to delete a tuple from this table that is also datafilled in table OCHOSTQ, this error message is displayed.
BCSLEVEL CANNOT BE GREATER THAN THE BCS LEVEL OF THE SWITCH HOUSING THIS TABLE BECAUSE OF OPERATOR CENTRALIZATION COMPATIBILITY RULES	If an attempt is made to datafill field BCSLEVEL with a value greater than the current BCS level of the switch containing this table, this error message is displayed.
THIS ENTRY VIOLATES THE BCS - 3 OC COMPATIBILITY RULES	If an attempt is made to datafill field BCSLEVEL with a value less than three levels below the current BCS level of the switch containing this table, this error message is displayed.
BCSLEVEL INVALID OFFICE PARAMETER TOPS_MAX_OPERATOR_NUM HAS TO BE LESS THAN 3100 TO SUPPORT A BCS LESS THAN 32	If an attempt is made to datafill a remote switch with a BCS less than BCS32 (field BCSLEVEL) and office parameter TOPS_MAX_OPERATOR_NUM is greater than 3099, this error message is displayed.

OCGRP (continued)**Error messages for table OCGRP (Sheet 2 of 2)**

Error message	Explanation and action
WARNING: VOICE LINK CLLI HAS BEEN CHANGED. OC TRAFFIC TO THIS OFFICE WILL NOW USE THE UPDATED VOICE LINK CLLI. WARNING: VOICE LINK CLLI HAS BEEN CHANGED. OC TRAFFIC TO THIS OFFICE MUST NOW USE HOST VOICE BYPASS.	This warning is given for an OC-IP office when field VLGRP is changed. This change immediately affects OC-IP traffic. Therefore, the applicable warning is given. The tuple addition or change is allowed. The second warning is for a placeholder CLLI in field VLGRP. Placeholder CLLIs have no TRKGRP datafill. A placeholder CLLI is employed in a host when no voice links to remotes are needed, since OC-IP Host Voice Bypass is in use.
WARNING: PLACEHOLDER CLLI USED. OC TRAFFIC FROM THIS REMOTE WILL BE ADVERSELY AFFECTED UNLESS ALL ITS CALLS TO THIS HOST ROUTE TO IP POSITIONS.	This warning is given when a placeholder CLLI is datafilled. The tuple addition or change is allowed.
PLACEHOLDER CLLI ONLY VALID FOR REMOTE OFFICE PLACEHOLDER CLLI ONLY VALID WHEN BCSLEVEL GREATER THAN 49	These error messages can appear when attempting to datafill a placeholder CLLI in field VLGRP. Placeholder CLLIs may only be used with a tuple for a remote office, and only if the BCSLEVEL in the tuple is 50 or higher. If these messages appear, the tuple addition or change is not allowed.
WARNING: NO TRUNK MEMBERS EXIST FOR THIS TRUNK GROUP. DATAFILL TABLE IPINV TO DEFINE TRUNK MEMBERS.	The warning message appears when an OC-IP voice link CLLI is datafilled in field VLGRP and the CLLI has table TRKGRP datafill, but no actual members exist because no IPGW in table IPINV is datafilled with the CLLI name. The tuple addition or change is allowed.

Table history

TOPS15

Discussion about host voice bypass (after datafill example) added by feature 59022288, in functionality OPP Over IP, OSB00101.

OCGRP (end)

TOPS13

Field VLGRP has a new message that the voice link must be datafilled in table TRKOPTS for OC IP. Field DLSEL has new value IP. These changes are made by feature A59012723 in functionality TOPS IP Operator Centralization, ENSV0026.

TOPS04

Increased table size range from 0-15 to 0-31. Then in field DLSEL, added value LAPD and note to value HDLC. This is per feature AN1133 in functionality Enhanced TOPS OC and OC Remote Support, ENSV0008 and ENSV0011.

OCHOST**Table name**

Operator Centralization Host Table

Functional description

Table OCHOST is required in remote toll switching units that are configured with the operator centralization feature. Table OCHOST tells the remote office who the host office is. The actual common language location identifier (CLLI) name of the host office must be predefined in table OCOFC.

Table OCHOST only appears in remote offices.

Data II sequence and implications

Table OCOFC must be datafilled before table OCHOST

Data II

The following table lists datafill for table OCHOST

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
OFCTYPE		HOST	Office type. Enter HOST in order to relate an office name as the host office of the remote where it is entered.
HOSTOFC		alphanumeric (1 to 16 characters)	Host office name. Enter the common language location identifier (CLLI) name of the host office used for this remote (name must be predefined in table OCOFC).

Data II e xample

The following example shows sample datafill for table OCHOST.

MAP display example for table OCHOST

```
OFCTYPE HOSTOFC
-----
HOST    OAKVHOST
```

OCHOSTQ

Table name

Operator Centralization Host Queue Table

Functional description

Table OCHOSTQ specifies a primary and alternate host on a queue basis. It is included as an optional enhancement to the remote software package and enables a remote switch to route to more than one host simultaneously and the ability to selectively route calls to an alternate host switch when the primary host switch is unavailable.

Table OCHOSTQ is indexed by queue type and determines which switch will be the host for calls on a given queue. Multiple hosts can be used simultaneously. It is indexed by queue type so that traffic can be segregated on a queue basis. For example, calls can be routed on the CQ0 queue to one switch, and calls on CQ1 queue (XFR1) to another switch.

All queues should have an entry in this table, however this requirement is not enforced. The exception to the requirement that all queues have an entry in table OCHOSTQ is when this feature is first installed on a switch. Calls on queues without an entry in this table are handled through the office parameter TOPS_OC_ENVIRONMENT in table OFCENG and through table OCHOST.

Routing information in table OCHOSTQ does not apply to calls received from a remote. It only applies to trunk originating traffic. Calls received from a remote (by a host) are never rerouted by that host to another host.

Note: Be warned that datafilling this table will cause routing to start on a queue basis, so links should be INSV when datafilling this table.

Datafill restrictions are as follows:

- The voice codec selection field only applies to voice links that are marked as IP voice links in table OCGRP.
- A G729 codec is allowed only for trunks datafilled as IP.
- ONP pre- TOPS13 tuples are transferred with a code value of G711.

Data II sequence and implications

The following tables must be datafilled before table OCHOSTQ.

- OCGRP
- OCOFC
- OCPARMS

OCHOSTQ (continued)**Table size**

Table size is equal to the number of operator queues.

Data II

The following table lists datafill for table OCHOSTQ.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
QTYPE		see subfield	Queue type. This field is made up of subfield OCHQIDX.
	OCHQIDX	CQ0, CQ1, CQ2, CQ3	Operator centralization host queue index. Enter the operator queue. The call queue type CQ0 was previously known as GEN, call type CQ1 was previously called XFR1, call type CQ2 as XFR2, and call type CQ3 as DA.
PRIHOST		alphanumeric (1 to 32 characters)	Primary host. Enter the host to route the call to. The host must exist in table OCGRP or entry SWITCH_NAME must be entered in field PARMNAME of table OCPARMS for the stand-alone case, and can be selectively overridden by OCNC.
RRDATA		see subfield	Reroute data. This field consists of subfield REROUTESEL.
	REROUTESEL	Y or N	Reroute selector data. Enter Y (yes) to allow rerouting to the alternate host when the primary host is unavailable for a reason(s) included in subfield REASONS and datafill refinements ALTHOST and REASONS. Enter N (no) to indicate that rerouting to the alternate host is not allowed. No further datafill is required.
	ALTHOST	alphanumeric (1 to 32 characters) HOST or REMOTE	Alternate host. If the entry in subfield REROUTESEL is Y, datafill this refinement. Enter the second choice of the alternate host to route the call to. The host must exist in table OCGRP (or entry SWITCH_NAME must be entered in field PARMNAME of OCPARMS for the stand-alone case) and may be selectively overridden by OCNC.

OCHOSTQ (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	REASONS	ALL, DFAIL, VLTHROTL, DEFLECT, NONE, QOVFLOW	Reasons. If the entry in subfield REROUTESEL is Y, datafill this refinement. Enter the reason or reasons why the attempt to route to the primary host might fail. If an attempt to route a call to the primary host fails for a reason in this set, the call is rerouted to the alternate host. Enter ALL to specify that all the reasons are included in the set. The call is rerouted to the alternate host if the primary host is unavailable for any entry. Enter DLFAIL if the call is rerouted to the alternate host if the primary host is unavailable because of data link failure. If DLFAIL is not entered and data link failure occurs, the call goes to treatment EMERGENCY 3, 4, 5, or 6 (dependant upon call type) instead of being rerouted to the alternate host. Note: Datafill of VLTHROTL has no affect on the system since OC voice link throttling is not supported. The following description is provided in case this functionality becomes supported. Enter VLTHROTL if the call is rerouted to the alternate host if the primary host is unavailable because of voice link throttling. If VLTHROTL is not entered and voice link throttling occurs, the call goes to treatment EMERGENCY 3, 4, 5 or 6 (depending on the call type) instead of being rerouted to the alternate host. Enter DEFLECT if the call is rerouted to the alternate host if the primary host is unavailable because the queue is too full to add calls or if there is a resource failure at the host switch. If DEFLECT is not entered and deflection occurs, the call goes to treatment EMERGENCY 3, 4, 5 or 6 (depending on call type) instead of being rerouted to the alternate host. Enter NONE if table control does not allow the change or addition of the tuple until one of the above reasons is entered.
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OCHOSTQ (end)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	REASON (continued)		Enter QOVFLOW if the call is rerouted to the alternate host if the primary host is unavailable because of queue overflow. If QOVFLOW is not entered and queue overflow occurs, the call goes to treatment CAMA_QUEUE_QOVFL instead of being rerouted to the alternate host.

Data file example

The figure that follows shows sample datafill for table OCHOSTQ.

MAP display example for table OCHOSTQ

QTYPE	PRIHOST	CODEC	RRDATA
CQ1	HOST1	G711	N
CQ2	HOST2	G729	Y HOSTD G711 QOVFLOW

Table history**TOPS15**

Field CODEC and subfield ALTCODEC are removed by feature 59022288 in functionality OPP Over IP, OSB00101. This information is now retrieved from table PKTVPROF (table OCHOSTQ, field PKTVPROF is index) for every call queue, not just on an OC call queue basis.

TOPS13

Field CODEC and subfield ALTCODEC were added by feature A59012723 in functionality TOPS IP Operator Centralization, ENSV0026.

OCIPDL

Table name

Operator centralization internet protocol data link

Functional description

Table OCIPDL associates a data link with a COMID, IP address, and port number. The COMID identifies a tuple in table IPCOMID, which provides information about the data link's local connectivity. The IP address and port, datafilled in table OCIPDL, specify the socket in the distant office that is used for the far end of the data link.

Datafill restrictions are as follows:

- This table allows up to 248 OC-IP data links to be datafilled.
- Up to 8 data links may be datafilled per OC office in table OCIPDL.
- The OFFICE must be datafilled in table OCGRP with a DLSEL of IP.
- The COMID must be datafilled in table IPCOMID and not used by another application.
- The COMID datafilled in OCIPDL must have the UDP protocol (table IPSVCS PROTOCOL = UDP).
- The port number associated with the COMID cannot be equal to 0.
- The same COMID cannot be datafilled for more than one entry in table OCIPDL.
- Two entries in table OCIPDL cannot have the same IPADDR and the same PORT.
- A tuple cannot be deleted nor changed unless the data link is in the OFFL state.

Data II sequence and meaning

Enter datafill into tables IPSVCS, IPCOMID, and OCGRP before table OCIPDL.

Table size

0 to 248 tuples

OCIPDL (continued)**Data II**

The table that follows lists datafill for table OCIPDL.

Field descriptions

Field	Subfield	Entry	Explanation and action
IPDLKEY		see subfields	Internet protocol data link key. This field is the key to the table. This field consists of subfields OFFICE and DLNUM. The limit for datafill of links per CLLI is 2016.
	OFFICE	name from OCGRP	Office. Enter the name of a local office that is defined in tables OCGRP and OCOFC. The table OCGRP entry must have field DLSEL = IP.
	DLNUM	0 to 7	Data link number. Enter a link number.
COMID		number from IPCOMID	Communication identifier. Enter a number defined in table IPCOMID.
IPADDR		4 numbers (each 0-255)	Internet protocol address. Enter an address for the distant office IP address. Each of the four numbers, in the range 0-255, is separated by a space.
PORT		1024-65535.	Port. Enter the port number of the distant office. The MAP display indicates the range is 0-65535; however, only the indicated range is valid.

Data II e xample

The figure that follows shows sample datafill for table OCIPDL.

OCIPDL (end)

MAP display example for table OCIPDL

IPDLKEY	COMID	IPADDR	PORT
IPHOST 2	71	47 245 1 24	7004
IPREMOTE 0	72	47 245 1 20	7003

Table history
TOPS13

This table was introduced by feature A59012723 in functionality TOPS IP Operator Centralization, ENSV0026.

Additional information

None

OCOFC

Table name

Operator Centralization Office Table

Overview

Operator centralization (OC) is a method of extending operating services provided by DMS-200 Traffic Operator Position System (TOPS) to other toll areas without the need for altering existing routing patterns or backhauling.

In OC, the host office has one or more remote offices (up to 15) associated with it. A method is provided to determine which remote has a call and the means by which both offices select the same data link and voice link.

Information for OC table control is submitted by the operating company in the following tables:

- OCOFC
- OCGRP

These tables exist in both host and remote offices.

Functional description

Table OCOFC is used to match an office name to a numeric so that field OFCNAME can be used as a key for table OCGRP. Each OC office name, including the host name, must be entered before it can be referenced elsewhere.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OCOFC.

Datafill table OCOFC before tables OCGRP and OCPARMS.

Table size

0 to 31 tuples

OCOFC (continued)**Data II**

The following table lists datafill for table OCOFC.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
VALUE		1 to 31 for OC offices using ETMS OC data links. 1 to 15 for for OC offices using DCM OC data links.	Value. Numbers are chosen arbitrarily with the restriction that no two office names can be associated with the same number and no two numbers can be associated with the same office name. This table allows office names to be defined for office numbers 0 to 63. However, only office numbers 1 to 31 can be used in other OC tables. When functionality Host/Remote Networking by Queue Type (ADVQ0005) is present, value 0 is a NIL value for the software and should never be used. If a host office name is datafilled at index 0, this host office is not recognized by the software. If an office has a tuple datafilled in table OCGRP with field DLSEL = HDLC, that office must have a value of 15 or less in field SYMBOL of table OCOFC.
SYMBOL		alphanumeric (up to 32 characters)	Symbol. Enter the specific office name at either end of a link. For example for a host office, the name is the host office name and the remote office names.

Data II e xample

The following example shows sample datafill for table OCOFC.

MAP display example for table OCOFC

VALUE	SYMBOL
1	REMOTE
2	HOST

Table history**TOPS04**

Increased table size range from 1-15 to 0-31. Also, increased range of field VALUE from 1-15 to 1-31. This is per feature AN1133 in functionality Enhanced TOPS OC and OC Remote Support, ENSV0008 and ENSV0011.

TOPS03

Added note on not using value 0 for field VALUE per PRS BC57200, feature NC0152 in Host/Remote Networking by Queue Type (ADVQ0005).

OCPARMS

Table name

Operator Centralization Parameter Table

Functional description

Table OCPARMS provides the ability to specify the name of the switch in which it resides and the name of the switch that handles all mechanized calling card service (BVC queries).

Table OCPARMS is included as an optional enhancement to the remote software package and contains parameters used only by operator centralization.

Table OCPARMS is indexed by field PARNAME.

Data II sequence and implications

The following tables must be datafilled before table OCPARMS.

- OCOFC
- OCGRP

The tuple SWITCH_NAME must be datafilled at all times. This tuple indicates the name of the switch in which this table resides. Other tables rely on information found in this table to function properly.

Table size

0 to 2 tuples

Table size is limited to one tuple for BVC_HOST and one tuple for SWITCH_NAME.

OCPARMS (continued)**Data II**

The following table lists datafill for table OCPARMS.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
PARMNAME		BVC_HOST or SWITCH_NAME	<i>Parameter name</i> Enter the name of the parameter.
OFCNAME		alphanumeric (1 to 32 characters)	<i>Office name</i> The office name corresponds to the parameter name. The name must be datafilled in table OCOFC. If the entry in field PARMNAME is SWITCH_NAME, then the office name being datafilled must not be datafilled in table OCGRP. If the entry in field PARMNAME is BVC_HOST, then the office name being datafilled must be datafilled in table OCGRP. A check is made to ensure that the office name in table OCOFC has an index in the range of 1-31.

Data II e xample

The following example shows sample datafill for table OCPARMS.

MAP display example for table OCPARMS

PARMNAME	OFCNAME
BVC_HOST	HOSTB

Supplementary information

This section provides information possible error messages when datafilling table OCPARMS

OCPARMS (end)

Error messages

If the entry in field PARMNAME is SWITCH_NAME and an attempt is made to datafill field OFCNAME with an office name that is datafilled in table OCGRP, the following error message is displayed:

```
THIS OFFICE NAME CANNOT BE ADDED AS SWITCH_NAME IN OCPARMS WHILE  
DATAFILLED IN TABLE OCGRP.
```

If the entry in field PARMNAME is BVC_HOST and an attempt is made to datafill OFCNAME with an office name that is not datafilled in table OCGRP, the following error message is displayed:

```
THIS OFFICE NAME CANNOT BE ADDED AS BVC_HOST IN OCPARMS WITHOUT  
BEING DATAFILLED IN TABLE OCGRP.
```

If the entry in field PARMNAME is SWITCH_NAME and table OCHOSTQ is datafilled with the same office name that is datafilled as field OFCNAME in table OCPARMS, and an attempt is made to change or delete this office name from table OCPARMS, then the following error message is displayed:

```
MUST FIRST DELETE OFFICE FROM TABLE OCHOSTQ.
```

Table history

TOPS04

Added note to field OFCNAME that check is made of index value in table OCOFC per feature AN1133 in functionality Enhanced TOPS OC and Increased Remote Support, ENSV0008 and ENSV0011.

OFCAUT

Table name

Office Autoprovisioning

Functional description

Table OFCAUT lists the office parameters that can be used with autoprovisioning. For office parameters for which autoprovisioning is active, the switch continuously monitors each parameter for low resources. On detection of a low resource, the switch automatically increases the resource to a safe level so that call processing can continue.

The use of table OFCAUT is optional. Operating companies can choose the office parameters to autoprovision by selecting them in table OFCAUT. Autoprovisioning for each parameter is controlled by the setting of the ACTIVE field. Office parameters that you can select for autoprovisioning are listed in the Table , "Office parameters that the switch can autoprovision," on page 625.

You can select or deselect office parameters for autoprovisioning at any time. When a parameter is activated in table OFCAUT, it is removed from manual provisioning and is monitored and its value is set by the autoprovision facility. If you deactivate a parameter in table OFCAUT, it is removed from autoprovisioning and you can adjust its setting manually in table OFCENG.

Certain parameters exist only in table OFCAUT and cannot be provisioned manually.

The autoprovisioning facility is designed to operate without manual intervention. If a parameter is selected for autoprovisioning, software detects low resources and automatically extends its resource pool. Autoprovisioning is designed so that resources in the "Extend by amount" (field EXTENDBY) are rarely used. Resources in the "Extend by amount" field are typically used only in rare conditions of heavy traffic.

Data II sequence and meaning

There is no requirement to enter datafill into other tables before table OFCAUT.

Table size

Up to 200 tuples

OFCAUT (continued)**Data II**

The following table lists datafill for table OFCAUT.

Field descriptions (Sheet 1 of 2)

Field	Subfield	Entry	Explanation and action
POOLNAME		32 alphanumeric characters maximum	Parameter name. Office parameter or internally set parameter that is allowed to use autoprovisioning. See Table , "Office parameters that the switch can autoprovision," on page 625 for a listing of the available parameters. The parameters that are selected for autoprovisioning are controlled by the setting of field ACTIVE.
ACTIVE		Y or N	Active. Enter Y to activate autoprovisioning for the parameter. If N is entered, the parameter reverts to manual provisioning. The default value is N. If necessary, contact Nortel Networks' Technical Assistance Service for assistance in choosing the parameters to autoprovision.
HWM		0 to 4 294 967 295	High water mark. Enter the maximum number of pool elements ever used by the parameter. This parameter value is set by system software regardless of the parameter activation status. Operating company personnel cannot change the HWM value.
INUSE		0 to 4 294 967 295	In use elements. The total number of elements currently in the INUSE pool. This parameter value is set by system software regardless of the parameter activation status.
ALLOC		0 to 4 294 967 295	Allocated elements. The total number of elements allocated to the parameter pool. This value cannot exceed the MAXSIZE value. This parameter value is set by system software regardless of the parameter activation status.
MEMUSAGE		0 to 4 294 967 295	Memory usage. The amount of memory used by the parameter pool. This parameter value is set by system software regardless of the parameter activation status.

OFCAUT (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
MAXSIZE		0 to 4 294 967 295	Maximum size. The maximum number of elements that can be allocated to the parameter pool. If the ALLOC value and the MAXSIZE value are equal, call derision may occur. This parameter value is set by system software regardless of the parameter activation status.
EXTENDBY		0 to 4 294 967 295	Extend by amount. The amount by which the parameter pool is increased when the system detects a shortage of resources. This parameter value is set by system software regardless of the parameter activation status.
EXTENDAT		0 to 4 294 967 295	Extend point. The value that triggers additional resources to be allocated to the parameter. This point is reached when the EXTENDAT field value is greater than the number of free elements (ALLOC - INUSE). This parameter value is set by system software regardless of the parameter activation status.

The following table lists the office parameters that you can select for autoprovisioning. To select a parameter for autoprovisioning, change the entry in field ACTIVE to Y. To provision a parameter manually, set the entry in field ACTIVE to N. For complete details about each office parameter, refer to its description in the *Office Parameters Reference Manual*.

Of ce parameter s that the switch can autoprovision (Sheet 1 of 4)

Office parameter table	Parameter name
OFCENG	ACD_OVERFLOW_BLOCKS
OFCENG	AIN_NUM_00_PARA_EXT_BLKs
OFCENG	AIN_NUM_01_00_EXT_BLKs
OFCENG	AIN_NUM_EXT_BLKs
OFCENG	AIN_NUM_PROCESSING_EXT_BLKs
OFCENG	AIN_NUM_TERM_NOTIFY_EXT_BLKs
OFCENG	ALLOC_EMERGENCY_EXT_BLK

OFCAUT (continued)**Of ce parameter s that the switch can autoprovision (Sheet 2 of 4)**

Office parameter table	Parameter name
OFCENG	CFD_EXT_BLOCKS
OFCENG	CFW_EXT_BLOCKS
OFCENG	CFZ_EXT_BLOCKS
OFCENG	CRS_PRU_POOL1_SIZE
OFCENG	CRS_PRU_POOL2_SIZE
OFCENG	CRS_PRU_POOL3_SIZE
OFCENG	CRS_SUBRU_POOL1_SIZE
OFCENG	CRS_SUBRU_POOL2_SIZE
OFCENG	CRS_SUBRU_POOL3_SIZE
OFCENG	CRS_SUBRU_POOL4_SIZE
OFCENG	CRS_SUBRU_POOL5_SIZE
OFCENG	EA_MF_SS7_EXT_BLOCK_COUNT
OFCENG	KSHUNT_EXT_BLOCKS
OFCENG	MAX_NUM_WIDEBAND_CALLS
OFCENG	NO_LOCAL_COIN_EXT_BLKs
OFCENG	NO_OF_CRITICAL_FTR_DATA_BLKs
OFCENG	NO_OF_FTR_CONTROL_BLKs
OFCENG	NO_OF_FTR_XLA_BLKs
OFCENG	NO_OF_HIS_CONTROL_BLKs
OFCENG	NO_OF_HIS_DATA_BLKs
OFCENG	NO_OF_HUGE_EXT_BLKs
exists only in table OFCAUT	NO_OF_INAP_LARGE_STORES
exists only in table OFCAUT	NO_OF_INAP_MEDIUM_STORES

OFCAUT (continued)**Of ce parameter s that the switch can autoprovision (Sheet 3 of 4)**

Office parameter table	Parameter name
exists only in table OFCAUT	NO_OF_INAP_SMALL_STORES
OFCENG	NO_OF_LARGE_EXT_BLKs
OFCENG	NO_OF_LARGE_FTR_DATA_BLKs
OFCENG	NO_OF_MEDIUM_EXT_BLKs
OFCENG	NO_OF_MEDIUM_FTR_DATA_BLKs
OFCENG	NO_OF_ORIG_INFO_EXT_BLKs
OFCENG	NO_OF_PVN_EXTBLK
OFCENG	NO_OF_PVN_TERM_EXTBLK
OFCENG	NO_OF_SC_EXT_BLKs
exists only in table OFCAUT	NO_OF_SDS_EXT_BLKs
exists only in table OFCAUT	NO_OF_SIE_SUSP_EXT_BLKs
OFCENG	NO_OF_SMALL_EXT_BLKs
OFCENG	NO_OF_SMALL_FTR_DATA_BLKs
exists only in table OFCAUT	NO_OF_WT_BILL_EXT_BLOCKS
OFCENG	NO_OF_X_LARGE_FTR_DATA_BLKs
OFCENG	NO_OF_XLARGE_EXT_BLKs
OFCENG	NUM_DCR_EXT_BLKs
OFCENG	NUM_IBN_IXLA_EXT_BLOCKS
OFCENG	NUM_INDA_EXT_BLKs
exists only in table OFCAUT	NUM_NAOC_EXT_BLKs
OFCENG	NUM_OF_CCIS_INWATS_BLOCKS
OFCENG	NUM_OF_INWATS_EXT_BLOCKS

OFCAUT (continued)

Of ce parameter s that the switch can autoprovision (Sheet 4 of 4)

Office parameter table	Parameter name
OFCENG	NUM_OF_NSC_EXT_BLK
OFCENG	NUM_OF_NT_RECORDING_UNITS
OFCENG	NUM_OF_RTEB_EXTBLKS
OFCENG	NUM_RC_EXT_BLKs
OFCENG	NUM_XLAS_EXT_BLKs
OFCENG	NUMBER_OF_DITM_EXTENSION_BLOCKS
OFCENG	NUMBER_OF_EBOF_MEDIUM_AUX_BLOCKS
OFCENG	NUMIBNCQEXTBLK
OFCENG	NUMPERMEXT
Note: Some of the parameters listed above exist only in table OFCAUT, which means they do not exist in table OFCENG, OFCOPT, OFCSTD, or OFCVAR. These parameters are autoprovisioned and cannot be made inactive or controlled manually. The resources they control are known as permanent pools.	

Data ll e xample

The following example shows sample datafill for table OFCAUT.

OFCAUT (end)**MAP display example for table OFCAUT**

MEMUSAGE	POOLNAME MAXSIZE	ACTIVE EXTENDBY	HWM	INUSE EXTENDAT	ALLOC
NO_OF_SMALL_EXT_BLKs		Y	0	0	501
14028	32767	1000		500	
NO_OF_MEDIUM_EXT_BLKs		Y	0	0	1501
162108	32767	1000		800	
NO_OF_LARGE_EXT_BLKs		Y	0	0	1501
312208	32767	1000		500	
NO_OF_XLARGE_EXT_BLKs		Y	0	0	501
204408	32767	800		500	
NO_OF_HUGE_EXT_BLKs		Y	0	0	1016
820928	32767	1000		500	
NO_OF_SMALL_FTR_BLKs		Y	0	0	801
25632	32767	1000		800	
NO_OF_MEDIUM_FTR_BLKs		Y	0	0	1001
48048	32767	2000		1000	
NO_OF_LARGE_FTR_BLKs		Y	0	0	801
70488	32767	1200		800	

Table history**TL13**

New parameters added for autoprovisioning.

CSP10

Data schema table OFCAUT was introduced.

Additional information

Even when CRS POOL parameters are autoprovisioned by table OFCAUT, the switch can generate CRS POOL alarms. You can set the CRS POOL alarm threshold using office parameters CRS_ALARM_MAJOR_THRESHOLD and CRS_ALARM_CRITICAL_THRESHOLD. Refer to the *Office Parameters Reference Manual* for instructions.

OFCCODE

Table name

Office Code Table

Functional description

Table OFCCODE is a member of the universal translation tables. The universal translation tables are organized to translate the incoming digit string in segments. Table OFCCODE translates the office code digit segment, together with tables OFCHEAD and OFCRTE.

For related information, refer to table ACCODE. For a description of the universal translation tables, see table ACHEAD.

Data II sequence and implications

Table OFCHEAD must be datafilled before tables OFCCODE and OFCRTE.

Table size

Refer to table ACCODE.

Data II

Field names, subfield names, and valid data ranges for table OFCCODE are described in table ACCODE.

Data II e xample

Refer to table ACCODE.

Table history

Refer to table ACCODE.

OFCHEAD

Table name

Office Code Head Table

Functional description

Table OFCHEAD is a member of the universal translation tables. The universal translation tables are organized to translate the incoming digit string in segments. Table OFCHEAD translates the office code digit segment, together with tables OFCCODE and OFCRTE.

For related information, refer to tables ACCODE and ACRTE. For a description of the universal translation tables, refer to table ACHEAD.

Data II sequence and implications

Refer to table ACHEAD.

Table size

Memory is automatically allocated to a maximum of 2047 tuples. The size is initially set to 64 and the table extends itself automatically.

Data II

Field names, subfield names, and valid data ranges for table OFCHEAD are described in table ACHEAD.

Data II e xample

Refer to table ACHEAD.

Table history

Refer to table ACHEAD.

OFCRTE

Table name

Office Code Route Table

Functional description

Table OFCRTE is a member of the universal translation tables. The universal translation tables are organized to translate the incoming digit string in segments. Table OFCRTE translates the office code digit segment, together with tables OFCHEAD and OFCCODE.

For related information, refer to table ACRTE. For a description of the universal translation tables, see table ACHEAD.

Datafill sequence and implications

Table OFCHEAD must be datafilled before tables OFCRTE and OFCCODE.

Table size

Refer to table ACRTE.

Datafill

Field names, subfield names, and valid data ranges for table OFCRTE are described in table ACRTE.

Datafill example

Refer to table ACRTE.

Table history

NA017

Feature 59035336 introduces the Supergroup (SG) option.

OFCTIID

Table name

Office Trigger Item Identifier Table

Functional description

Table OFCTIID stores assignments to office-wide trigger items. When parameter AIN_OFFICE_TRIGGRP is set to trigger item identifier (TIID) in table OFCTIID, it activates office-wide trigger item assignments. TIID is a reserved name that acts as a datafill selector. When parameter AIN_OFFICE_TRIGGRP is set to a valid trigger group name, trigger group data is in effect.

Note: When parameter AIN_OFFICE_TRIGGRP is set to TIID, agents do not encounter office-wide triggers provisioned using the trigger group provisioning interface.

Note: Use the trigger item provisioning interface to provision triggers before setting the value of parameter AIN_OFFICE_TRIGGRP to TIID.

Note: Switching from one provisioning interface to another does not affect the underlying trigger provisioning data.

Data II sequence and implications

Table TRIGITM must be datafilled before table OFCTIID.

Table size

The minimum table size for table OFCTIID is 0 tuples and the maximum table size is 32K tuples for trigger detection point (TDP) 4, and 16 tuples for TDP 17.

OFCTIID (end)**Data II**

The following table lists datafill for table OFCTIID.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
TIID		NAME TDP (4, 17)	Trigger item identifier. A two-part key with NAME (8 character alphanumeric string), and a trigger detection point (TDP) consisting of a two-digit number.
TRIGACT		ON, OFF	Trigger activation. ON indicates an active trigger item identified by the TIID. OFF indicates a deactivated trigger item.

Data II e xample

The following example shows sample datafill for table OFCTIID.

MAP display example for table OFCTIID

TIID		STATE
N11TRG1	4	ON
LNPtrG1	4	OFF
AFRTRG2	17	ON

Table history**NA009**

AIN Service Administration-Tables (AU2632), introduces table OFCTIID.

Supplementary information

Not applicable

OFR2

Table name

Office Route-2 Table

Functional description

Table OFR2 is an exact duplicate of table OFRT.

Refer to table OFRT for full details of the use and the datafill for table OFR2.

Datafill sequence and implications

Refer to table OFRT.

Table size

0 to 1024 tuples

Datafill

Refer to table OFRT.

Datafill example

Refer to table OFRT.

Release history

NA017

Feature 59035336 introduces the Supergroup (SG) option.

OFR3

Table name

Office Route-3 Table

Functional description

Table OFR3 is an exact duplicate of table OFRT.

Refer to table OFRT for full details of the use and the datafill for table OFR3.

Datafill sequence and implications

Refer to table OFRT.

Table size

0 to 1024 tuples

Datafill

Refer to table OFRT.

Datafill example

Refer to table OFRT.

Release history

NA017

Feature 59035336 introduces the Supergroup (SG) option.

OFR4

Table name

Office Route-4 Table

Functional description

Table OFR4 is an exact duplicate of table OFRT.

Refer to table OFRT for full details of the use and the datafill for table OFR4.

Datafill sequence and implications

Refer to table OFRT.

Table size

0 to 1024 tuples

Datafill

Refer to table OFRT.

Datafill example

Refer to table OFRT.

Release history

NA017

Feature 59035336 introduces the Supergroup (SG) option.

OFRT

Table name

Office Route Table

ATTENTION

Retranslation using the RT or RX selectors begins in the Home Numbering Plan Control (HNPACONT) table. In order to retranslate correctly, appropriate translations must be in place. Retranslated numbers, which would normally require a prefix digit (1 or 0) in order to complete, will not complete if the retranslated number is an ambiguous code requiring a prefix digit. This situation occurs when the retranslated number encounters the AMBI PFX selector in the HNPACODE subtable in table HNPACONT.

Verify translations that use the RT or RX selectors for correct routing prior to implementation. If the RT or RX selector fails to retranslate the call correctly, you must use alternate translations. The alternate translations may include, but are not limited to the following:

- 1 - use of a virtual facility group
- 2 - use of a dedicated translation scheme for retranslated calls (a dedicated SNPA/STS code in table HNPACONT with retranslated numbers broken out in translations and routed correctly).
- 3 - Use of the OPF selector instead of the PRX selector for ambiguous code calls. The OPF selector does not require the presence of a prefix digit to complete a 10-digit call.

Functional description

The following table lists the route reference table and subtables.

OFRT route reference table and subtables

Table name	Title
OFRT	Office Route Table
HNPACONT.RTEREF	Home NPA Route Reference Subtable
FNPACONT.RTEREF	Foreign NPA Route Reference Subtable
FNPACONT.FNPASTS.RTEREF	Foreign NPA STS Route Reference Subtable

Table OFRT is used for routing in all DMS switches except the DMS-300 switch.

OFRT (continued)

For the TL06 release, the following additional selectors are supported:

- SX
- N2

For the NA005.1A release, only the following selectors are supported:

- CND
- N
- S

The route reference table OFRT or subtable RTEREF is used if an originating call is being translated and a preceding stage identifies a route reference index. Refer to the descriptions of table OFRT and subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPAST.RTEREF for more information on the preceding stages of translation that can point to the route reference tables.

A route reference index can point to

- a list of up to eight alternate routes
- a treatment list (in table OFRT only)

List of alternate routes

If translation of the call points to a route reference index in table OFRT, from other than treatment table TMTCNTL.TREAT, or in subtable RTEREF, the route list must be a list of alternate route list elements in order of preference.

A route list is composed of one to eight elements (nine elements for selectors DCRT and NODE only). The DMS switch allows nine elements to be datafilled, but the only time nine routes are valid is if the first selector is DCRT or NODE. If DCRT or NODE is not the first selector, only eight routes are supported. Each element usually contains the identity of a trunk group from which an idle outgoing trunk (if any) is selected. If no idle trunk is available, the system advances to the next element in the list.

ATTENTION

It is possible to create an infinite loop through the datafill, which will cause call deaths and traps.

OFRT (continued)

Unlike line translations, circular hunt configurations should not be set up in trunk routing. The following figure shows an example of the type of datafill to be avoided.

Note: The NA010 ISP Even Call Distribution feature allows use of super-group translations for ISDN primary rate interface (PRI) circular hunting. Refer to “ISP Even Call Distribution” in the ISDN translations section of the *Translations Guide* for more information on this feature.

Example of an infinite loop in table OFRT

RTE	RTELIST
801	(N D TRUNK1 O N N) (T OFRT 802) \$
802	(N D TRUNK2 O N N) (T OFRT 803) (TRMT BUSY) \$
803	(N D TRUNK3 O N N) (T OFRT 801) \$

When route selector TRMT is used, calls are routed directly to treatment. If the end of the list is reached and no idle trunk is found, translation proceeds to subtable TMTCNTL.TREAT.

A route list element defines a combination of the following elements by means of predefined route selectors:

- next stage in call translation, either unconditionally or with conditions
- digit manipulation of the received digits that may already have been manipulated in preceding stages of translation
- redefinition of various factors associated with the originator of the call, such as charging, billing, screening, and type of call
- outpulsing of digits or signals or both, and generation of tones

Refer to table “Office parameters” for route element functions as a guide for the selection of the route selector.

Treatment route list

If translation of the call results in a treatment code and table TMTCNTL.TREAT points to a route reference index in table OFRT, the route list must be a list of tones, announcements, or states applied in the order listed.

Table OFRT in international translations

Table OFRT can be used in international translations only for treatments and standard routes. Nonstandard routing using this table does not work and results in a software error (SWERR) from NADTUI.

OFRT (continued)

If a nonstandard route is required, use the appropriate international translation table (FTRTE, PXRTE, OFCRTE, FARTE, CTRTE, or ACRTE).

Treatment routes

For information on treatment routes, refer to the description of subtable TMTCNTL.TREAT.

Note on Cancel Normal Charges (CANCNORC) eld

Examples of normal charges as interpreted by the DMS switch are described below.

If the call does not result in an abortive treatment and the called party goes off hook, the following occurs:

- If the type of call is NP (no prefix), the DMS switch takes appropriate action depending on where the call originated as follows:
 - For a call incoming on a one-party flat rate (1FR) line, no action for charging is taken.
 - For a call incoming on a one-party message rate (1MR) line, message rate register is pegged.
 - For a call incoming on a coin station (coin first [CCF], coin dial-tone first [CDF], or coin semi-postpay [CSP]) line, appropriate action is taken to collect coin depending on type of coin station.
 - For a call incoming on a trunk group, an off-hook signal is returned.
- If the type of call is DD (direct dial), the DMS switch takes appropriate action depending on where the call originated as follows:
 - For a call incoming on a 1FR or 1MR line, the call is recorded on Local Automatic Message Accounting (LAMA) or Centralized Automatic

OFRT (continued)

Message Accounting (CAMA) tape unless the call goes out on a trunk group type capable of Automatic Number Identification (ANI) spill.

- For a call incoming on a coin station (CCF, CDF, or CSP) line, appropriate action is taken until the operator at the coin collection desk is reached.
- For a call incoming on a trunk group, an off-hook signal is returned.
- If the type of call is OA (operator assisted), the DMS switch takes appropriate action depending on where the call originated as follows:
 - For a call incoming on a 1FR or 1MR line, no special action is taken until the operator is reached.
 - For a call incoming on a coin station (CCF, CDF, or CSP) line, appropriate action is taken until the operator at the coin collection desk is reached.
 - For a call incoming on a trunk group, an off-hook signal is returned.

If the call results in an abortive treatment, the normal procedure is not to charge the caller even if the type of call indicates a chargeable call. Canceling normal charges results in appropriate action to charge the caller even if the type of call indicates a nonchargeable call.

If field CANCELC is set to Y, a nonrevenue call is assumed and is reflected in the call code of the bearer capability (BC) Automatic Message Accounting (AMA) record.

If field CANCELC is set to N, then a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).

Partitioned Table Editor feature

In DMS offices with the Partitioned Table Editor (PTE) feature, non-operating company users can be authorized by the operating company to use the PTE feature to edit all tuples of subtables owned by them as follows:

- subtables HNPACONT.RTEREF: refer to the description of subtable HNPACONT.RTEREF for more information
- subtables FNPACONT.RTEREF: refer to the description of subtable FNPACONT.RTEREF for more information
- subtables FNPACONT.FNPASTS.RTEREF: refer to the description of subtable FNPACONT.FNPASTS.RTEREF for more information

The PTE feature allows the operating company to limit edit access to a table for a specified user to denied, read-only, change-only, or add and delete tuples.

OFRT (continued)

It is recommended that PTE feature access is set for non-operating company users as follows:

- Subtables HNPACONT.RTEREF—add and delete tuples access
- Subtables FNPACONT.RTEREF—denied access
- Subtables FNPACONT.FNPASTS.RTEREF—add and delete tuple access

In subtables FNPACONT.FNPASTS, field COMMON_FNPA is set to N to ensure that a separate FNPACONT.FNPASTS.RTEREF subtable is created for each STS.

Refer to the description of table OWNER for information on the Customer Data Change feature.

Route element functions (Sheet 1 of 3)

Route selector	
	C N D D / C I I M N R D N S E M O T N S A M N N 2 E S D Q H T X S S Q T X T C T S T
Functions performed	N N N P O P O N Q R R S S S T M T N G
<i>Proceed to (unconditionally)</i>	
First free member of CLLI	Y Y Y Y Y Y Y Y Y Y
Tested trunk MEMBER or CLLI	Y
Specified trunk MEMNUM of CLLI	Y
Tested subscriber line LEN	Y
Table TABID at KEY	Y
Table at RTEREF	Y
TOFCNAME at SNPA OFCCODE	Y Y
Retranslate after Digits Change	Y Y
TMTCNTL.TREAT to treatment	Y
Note: The route element selectors listed in this table are described on the following pages.	

OFRT (continued)**Route element functions (Sheet 2 of 3)**

Route selector	
	C N D D / C I I M N R D N S E M N N 2 E S D Q H T X S S Q T X T C T S O T N S A M N N 2 E S D Q H T X S S Q T X T C T S T N G
Functions performed	
<i>Proceed to (with condition)</i>	
Table at RTEREF	Y
List after SKIPNUM	Y
Table TABNAME at INDEX	Y
DESTNODE at DESTNAME	Y Y
<i>Digit manipulation</i>	
Delete DELDIGS leading digits	Y Y Y Y Y Y
Prefix digits PRFXDIGS	Y Y Y Y Y
Prefix signals PRFXDIGS	
Replace with REPLDIGS	Y
Delete Digits Last Stage (DDL S)	Y
Add Digits Last Stage (ADLS)	Y
In table DIGMAN	Y Y
<i>2-stage Out FSTNUM, FSTSTAGE</i>	
<i>Redefine originators</i>	
Normal charges CANCNORC (Y/N)	Y Y Y Y Y Y
NPA as SNPA	Y
NPA as STS	Y
Note: The route element selectors listed in this table are described on the following pages.	

OFRT (continued)**Route element functions (Sheet 3 of 3)**

Route selector	
	C N D D / C I I M N R D N S E M O T N S A M N N 2 E S D Q H T X S S Q T X T C T S T N G
Functions performed	
Billing code as BILLCODE	Y Y
Billing code as BILLDMI	Y
Screening as ORIGSCRE	Y
Type of call TYPCALL	Y Y
CALLTYPE and refinements	Y
Off-hook queuing time OTIME	Y Y
Off-hook queuing OHQ (Y/N)	Y Y Y
Call back queuing CBQ (Y/N)	Y
Expensive route EXP (Y/N)	Y
ANI (Y/N) information required	Y
<i>Tone out CSTHTONE, CSTLTONE</i>	Y
Note: The route element selectors listed in this table are described on the following pages.	

Selector descriptions

The following paragraphs describe the route element selectors listed in the above table “Route element functions”.

Route selector AFR Used as an index to an advanced intelligent network (AIN) identifier in table TRIGINFO. If the AFR trigger is subscribed, and all preceding routes in the route list are busy, and the AFR selector is encountered, a query is sent to an off-board processor.

Route selector CND Used if the call proceeds as specified in this route element only if a specified condition is met. If the condition is not met, the call is routed as specified in the next element of the route list.

OFRT (continued)

Route selector DCRT Used in offices with the Dynamically Controlled Routing (DCR) feature as the first element of a route list. If the DCR destination of the call is one link away from the switch, it blocks the call if the second leg of a DCR tandem recommendation is not available.

Route selector DN Used if digit translation converts the received digits into a seven-digit directory number (DN) that terminates on the switch.

The DN selector allows calls to terminate on the DN described in the DN route element list. Call processing translation assumes the final routing destination is the DN found during translation. Subsequent route selectors are not searched nor advanced to.

Route selector FEAT (DMS-250) Used on a DMS-250 switch for I800 (International 800) service and international virtual private network (IVPN) services.

Note: This description of table OFRT does not cover DMS-250 applications.

Route selector INS Used only while editing a route list to insert a new element into the route list. The new element is inserted immediately ahead of the element that is replaced with INS. The replaced element is restored, and the user is prompted for the inserted route.

Route selector ISA Selector ISA (integrated service access) routes to a primary rate access (PRA) interface.

The ISA service routes different call types (public, private, tie trunk to private branch exchange (PBX), foreign exchange (FX), wide area telephone service (WATS, and inbound WATS [INWATS]) over the same trunk group.

Route selector MEM Used in offices with the Trunk Group Utilization Enhancements feature, if routing to a specified trunk group member is required. A lower and upper range must be supplied. If only one trunk member is used, the same number is supplied for the upper and lower range.

Route selector MN Used if a call is routed to an operator and class of service tone is required.

Route selector N Used if translation requires digit substitution or cancellation of normal charging.

Route selector N2 Used if translation requires the capability to strip off the NPA digits and/or add them back to the outpulsed digits to reach a uniform

OFRT (continued)

outpulsing schema. Route selector N2 is the same as route selector N, with the addition of two fields, Delete Digits Last Stage (DDL) and Add Digits Last Stage (ADL).

Route selector N2 is used as a substitute for the N route selector only when the DELDIGS and PRFXDIGS fields are used for purposes other than modifying the called number.

The DELDIGS field is assumed to be set to 15, because the N2 selector is only used when the OZZ digits are required and the PRFXDIGS field is used to insert the OZZ digits. The DDL field holds the value which determines the number of digits that will be deleted from the front of the called number to be outpulsed. The ADL field holds the actual digits which will be prefixed onto the front of the called number to be outpulsed.

Route selector N2 is specific to Feature Group D (FGD) Equal Access calls and does not support any international call scenario. Use of the N2 selector is limited to IT, MF, and ISUP type trunks.

Because the N2 selector is a clone of the N selector, billing records are produced exactly as if the N selector was used. Digit manipulation done by the N2 selector is not shown in the billing records.

Route selector NIL Used only while editing a route list to delete an element from the route list. The selector that is replaced by selector NIL is removed from the list.

Route selector NODE Used in offices with the DCR feature. If the office is used as a DCR switch, routing proceeds to table DESTNODE, field DESTKEY which is equal to field DESTNAME associated with this selector.

Route selector NOT Used if the call proceeds as specified in this route element only if a specified condition is not met. If the condition is met, the call is routed as specified in the next element of the route list. This selector is the opposite of selector CND.

Route selector NPOS Used to indicate that no calling number identification is required for

- the operator number identification (ONI) from multiparty line, or
- the ANI-failure delay dial (DD)

OFRT (continued)

In the following cases, selector NPOS is equivalent to route selector N:

- calls originated from trunk group types other than SuperCAMA (SC) or Traffic Operator Position System (TOPS) trunk groups
- calls without ONI or ANI-failure indication

Route selector NPOSDN Used to indicate that no calling number identification is required for

- the ONI from multiparty line, or
- ANI-failure DD

In the following cases, selector NPOSDN is equivalent to route selector DN:

- calls originated from trunk group types other than SC or TOPS
- calls without ONI or ANI-failure indication

Route selector NQ Not used.

Route selector QH Used if segregation of low-tariff and high-tariff route elements in the route list is required.

When route selector QH is used in table OFRT, it routes the call to treatment. Due to this routing action, selector QH must only be used in table IBNRTE.

Route selector RT Used if the incoming dialed digits are replaced by the number specified in field REPLDIGS (maximum 11 digits), and the call is retranslated starting from table HNPACONT.HNPACODE for the serving NPA specified in field SNPA.

The RT selector designates retranslation. This selector inserts new digits before retranslation is attempted. The RT route element lists are final if a call advances to a route element in the list during call processing.

Route selector RX Used if retranslation is required and the new digits are listed in table DIGMAN.

The RX selector designates retranslation. This selector inserts new digits before retranslation is attempted. The RX route element lists are final if a call advances to a route element in the list during call processing.

Route selector S Used if the outgoing trunk group type is IT (intertoll) and standard digit manipulation applicable to intertoll trunk groups is required.

OFRT (continued)

This selector can also be used to route the call to a tone or announcement CLLI.

Route selector SG Used to allow even call distribution across a set of trunk groups. Route selector SG allows selection of a trunk group from the groups defined in table SUPERTKG (Super Trunk Group). This table joins up to 220 trunk groups together into super-groups.

Optional DMI entries of 1 to 31,999 in the selector allow manipulation of digits by table DIGMAN. This is an index into table DIGMAN. The DMI option enables the called number characteristics to be manipulated by use of table DIGMAN.

Route selector SQ Not used.

Route selector ST Used if translation routes to another route reference in the same table.

Route selector SX_ROUTE This selector is used if translation routes to an expanded route table. It is used if the outgoing trunk group type is IT (intertoll) and standard digit manipulation applicable to intertoll trunk groups is required. Interpretation and use of the SX_ROUTE selector is product-dependent. By default, this selector does nothing.

Route selector T Used if translation routes to another table or to another route list in table OFRT.

If the T selector is routed to during call processing, the current route list is exhausted. Any subsequent route list elements are not routed to within the list.

For example, assume a T selector is used in a route list before an N selector. In this case, routing advances to the table and the T selector route element list points to the next step in translation. When the table route is exhausted, the table is exited and translation is stopped. The N selector is not advanced to, even though the N selector is in the route element list after the T selector.

Route selector TC Used if the route list can only be accessed from the directory number or trunk defined in the first element of the route list.

Route selector TPBX (DMS-250) Used in a DMS-250 switch to route calls by table DIGMAN to PBXs in a DMS-250 to PBX configuration.

Note: This description of table OFRT does not cover DMS-250 applications.

OFRT (continued)

Route selector TRMT Used if a call is routed to treatment.

Route selector TS Used if two-stage outpulsing to international switching centers is required.

Route selector UOP Use route selector UOP to set uniform outpulsing on calls to direct inward dial (DID), automatic intercept (AI), and PRA trunks. Selector UOP also provides operating company personnel with the capability of common digit replacement.

General

Table OFRT is required for route lists that are pointed to from tables other than HNPACONT and FNPACONT.

The following tables can specify a route list in table OFRT:

- Country Code Translator (CCTRNSL)
- FNPA Control (FNPACONT)
- INWATS Originating Route Reference (INWORIRT)
- INWATS Terminating Route Reference (INWTERTE)
- Position (POSITION)
- Route Reference (OFRTMAP)
- Standard Pretranslator (STDPRTCT.STDPRT)
- Trunk Group (TRKGRP)
- Network Management Reroute (REROUTE.NWMRROUT)
- Directory Number Route (DNROUTE)
- Terminating Office Name Table (TOFCNAME)
- Hunt Group (HUNTGRP)
- AMR Route (AMRROUTE)
- Class of Service Screening Control (CLSVSCRC)

An element in a route list can point to another route list in table OFRT. It can be any route list, except the route list to which the element is assigned.

Routes defined in the HNPACONT and FNPACONT tables have their routes defined in the HNPACONT and FNPACONT subtables.

Memory is allocated dynamically for table OFRT. The maximum number of route lists is 1024.

OFRT (continued)

Route options

The available route option is ATGS (alternate trunk group selection).

Data II sequence and meaning

If the T selector points to table OSNCCAP, table OSNCCAP must be datafilled before table OFRT.

Table size

0 to 1023 tuples

Table history**MMP15**

For the T selector, subfield TABID, tables OVRx can be referenced. Feature 59023454.

NA015

Added subfield OPTIONS and option DMI for the SG selector.

MMP14

Added subfield OPTIONS and option DMI for the SG selector.

NA013

Added subfield STNLEN (station length) to RTELIST field for feature 59011676.

The Alternate Trunk Group Selection feature (59013383) adds the OPTIONS field with the ATGS option as the only value. This option has a MAX_ATMPT subfield with values ranging from 1 to 50.

For the T selector, subfield TABID, table OSNCCAP can be referenced. Feature 59012548.

NA011

Added route selector UOP and associated subfields.

NA010

Added the following trunk group selection algorithms to subfield ALGORITHM for route selector SG for the ISP Even Call Distribution feature:

- CHCL (circular hunt in clockwise direction)
- CHCCL (circular hunt in counterclockwise direction)

OFRT (end)

EUR009

Added route selector SG.

TL06

Added route selectors N2 and SX.

OFRT selector AFR

RTESEL = AFR

Route selector AFR (automatic flexible routing) is used if none of the previous routes listed in the automatic route selection list are available; for example, if they are busy.

ATTENTION

The AFR selector should be used as the last entry in the route list. Any routes datafilled in table OFRT following the AFR selector are never used.

During call processing, if AFR is subscribed to by the agent and the AFR selector is encountered, the system queries the AIN database using the entry in subfield INFONAME. The entry in subfield INFONAME defines the action that is taken when the trigger is encountered and the criteria are met.

Data II

The following table lists the datafill for table OFRT selector AFR.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside this range is invalid.
RTELIST		see subfields	<i>Route list</i> This field consists of subfields RTESEL and INFONAME.
	RTESEL	AFR	<i>Route selector</i> Enter AFR.
	INFONAME	alphanumeric	<i>AIN identifier</i> Enter the name of an AIN identifier previously datafilled as the KEY field in table TRIGINFO.

OFRT selector AFR (end)

Data I l e xample

The following example shows sample datafill for table OFRT selector AFR.

MAP display example for table OFRT selector AFR

RTE	RTELIST
12	(S N N N N OGMF) (S N N Y N OGDG) (AFR INFO2) \$

OFRT selector ATGS

Option ATGS

The Alternate Trunk Group Selection feature adds the OPTIONS field to the OFRT table. This field includes the ATGS (alternate trunk group selection) option. The ATGS option has a MAX_ATMPT subfield with values ranging from 1 to 50.

Data II

The table that follows lists datafill for the OFRT table with the ATGS option.

Field descriptions

Field	Subfield	Entry	Explanation and action
OPTIONS	ATGS	see subfield	<i>Options.</i> The OPTIONS field with the ATGS option enables the Alternate Trunk Group Selection feature.
	MAX_ATMPT	1–50	<i>Maximum attempts.</i> The MAX_ATMPT subfield shows the number of tries allowed to select a route.

Data II e xample

The figure that follows shows sample datafill for the OFRT table with the ATGS option.

MAP display example for table OFRT option ATGS

TABLE: OFRT

RTE

RTELIST
OPTIONS

912 (N D E911OGOP 3 911 N) (N D E911OGES 3 911 N)\$

(ATGS 2) \$

OFRT selector CND

RTESEL = CND

Route selector CND permits the specification of a condition before routing as specified. If the condition is met, then the instructions of this route element are executed. Otherwise, they are skipped and translation searches for instructions in the next route element.

Only the following conditions are supported for GSF Equal Access:

- CAC
- INTNL
- PIC

List of conditions

ALWAYS—ALWAYS: (all types of DMS-100 family) The condition is always met. This is most useful when making temporary changes (that is, change the condition to ALWAYS instead of rewriting the whole element).

CALLCHR—CALL CHARACTERISTIC: (Integrated Business Network [IBN]) The condition is met if the call characteristic specified is assigned in table CALLCHR.

COSMAP—CLASS OF SERVICE MAPPING: (IBN) Table COSMAP is accessed at mMapping nName COSMAP to determine if the condition is met.

EA—EQUAL ACCESS END OFFICE (EAEO): Condition is met if the call is equal access and the call matches the specified subcondition as follows:

CAC—CARRIER ACCESS CODE Condition is met if the call is equal access and the carrier access code 10XXX is dialed.

INTNL—INTERNATIONAL Condition is met if the call is equal-access international.

PIC—PRIMARY INTER-LATA CARRIER: This condition must be used for inter-LATA call routing from an EAEO to an access tandem (AT) that includes the TOPS inter-LATA carrier service (TICS). When the PIC condition is used, table OFRT is set up such that the primary route is taken for non-PIC calls and the secondary route is taken for PIC calls.

PKT—Condition is met if the originator is on the ENET (Enhanced Network) fabric as opposed to a packet network. The selector allows different routes for calls from ENET and packet based originators. It appears only in CS2000.

OFRT selector CND (continued)

Feature 59007393 MSH InterWorking Trunk Selection modified trunk selection so that the fabric of the trunk member chosen would match the fabric of the originator if possible. Succession switches allow arbitrarily mixing of packet based and ENET based trunks within a group. Several trunk selection algorithms were changed so that this optimization would occur automatically.

With the addition of BICC and SIP_T trunk groups additional flexibility is required so that traffic may be sent to SIP_T groups from packet based originators or ENET based TDM groups from ENET originators.

INTERLATA—INTER-LATA (DMS-200 AT): This condition can be used in an office with feature package NTX821AA (Tandem Operator Routing Service). It routes interLATA and intra-LATA traffic to different destinations from the same office route.

The main application is routing of equal access operator traffic to operating telephone company (OTC) operator trunks and interexchange carrier (IEC) operator trunks in a DMS-200 AT.

NRR—NETWORK BLOCKING REROUTE (MARS): This condition may be used in an office with feature AD2641 ((FI) MARS- Meridian Automatic Route Selection). The condition is met if there are no available outgoing trunks at any one of the tandem switches in the path during an ISDN user part (ISUP) or a primary access rate (PRA) call from an originating switch.

Note: The CND NRR option is not supported in GSM offices.

RND—PERCENTAGE OF CALLS SELECTED RANDOMLY: (all types of DMS-100 family switches) The DMS decides that the condition is met on a random basis to ensure that the specified percentage of calls take this route element.

SITE—SITE: This condition can be used in a remote switching center (RSC) where trunks are connected to remotes creating a network of alternate routes for completing a call. The most efficient route for a specific call then depends on the site of the originator.

TOD—TIME OF DAY (IBN): Table TIMEODAY is accessed at fields TODNAME and TIMES to determine if the condition is met.

TOPEAALT—TOPS EQUAL ACCESS ALTERNATE CARRIER (TOPS with the feature AF1781 [Alternate Carrier Selection]): The condition is met if the call is routed to an alternate carrier and the call is not at a TOPS position.

OFRT selector CND (continued)

TOPEACLS—TOPS EQUAL ACCESS CLASS OF SERVICE (TOPS): The condition is met if the class of service of an incoming call matches the entry in field TOP_CND_RTE.

TOPEAXFR—TOPS EQUAL ACCESS CARRIER TRANSFER (TOPS with feature AF1781 [Alternate Carrier Selection]): The condition is met if the call is marked as a carrier transfer call by a TOPS operator (XFR IC indicated on the TOPS operator display prior to the call being released).

SNPA—CONDITIONAL ROUTING BASED ON SNPA (conditional routing based on SNPA): The condition is met if the SNPA for the call is equal to the SNPA datafilled in field SNPA_CND_RTE in table OFRT.

MIGRATE—Identifies lines which are in the process of migrating from a collapsing office into a Call Server Complex (CS2000). The migrating lines are pre-datafilled in the new office, but are blocked from terminations by the existence of the MIGRATE option until the physical move is complete. Terminations to the DN on the CS2000 are avoided by routing to the collapsing site while the DN is still in service. This is accomplished during the routing stage of call processing by using a conditional route selector (CND MIGRATE) in tables HNPACONT:RTEREF, FNPACONT:RTEREF, OFRn and IBNRTn. When the CND MIGRATE conditional selector is encountered, terminating calls are completed to DNs which are not assigned the MIGRATE option. The call is redirected via an office route or trunk CLLI to the collapsing office for DNs which are assigned the MIGRATE option.

List of routing options

- Route to specified table at specified index
- Route to another route list in this table
- SK: Route after skipping specified number of route elements

OFRT selector CND (continued)

Datafill

The following table lists the datafill for table OFRT selector CND.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the entry blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfields RTESEL and refinements CONDITION and CONDRTE.

OFRT selector CND (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	RTESEL	CND	<i>Route selector</i> Enter CND.
	CONDITION	see subfields	<i>Condition</i> This field consists of condition selector CNDSEL and CNDSEL refinement subfields as follows: CNDSEL and Refinements ALWAYS - None CALLCHR - CALLCHR COSMAP - COSMAP EA - EA_CND_RTE INTERLATA - None MIGRATE - None NNR - None PKT - ENET RND - PERCENT SITE - SITE TOD - TODNAME and TIMES TOPEAALT - None TOPEACLS - TOP_CND_RTE TOPEAXFR - None SNPA - SNPA_CND_RTE

CNDSEL = ALWAYS

Use condition ALWAYS if translation proceeds as specified in field CONDRTE unconditionally.

This condition is most useful when making temporary changes (that is, change the condition to ALWAYS instead of rewriting the whole element).

OFRT selector CND (continued)

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	ALWAYS	<i>Condition selector</i> Enter ALWAYS if transfer is always required.

CNDSEL = CALLCHR (IBN)

Use condition CALLCHR (call characteristic) if translation proceeds as specified in field CONDRTE on condition that the call characteristic specified in field CALLCHR is assigned in table CALLCHR. Otherwise, the call proceeds as specified in the next tuple.

Datafill fields CNDSEL and CALLCHR as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	CALLCHR	<i>Condition selector</i> Enter CALLCHR as the type of condition tested.
	CALLCHR	DIGDATA SAT	<i>Call characteristic</i> Enter the name of the entry in table CALLCHR that contains the characteristic upon which the transfer is dependent.

CNDSEL = COSMAP (IBN)

Use condition COSMAP (class of service) if translation proceeds as specified in field CONDRTE on condition that the network class of service (NCOS) assigned to the call passes the class of service screening. Otherwise, the call proceeds as specified in the next tuple.

OFRT selector CND (continued)

Datafill fields CNDSEL and COSMAP as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	COSMAP	<i>Condition selector</i> Enter COSMAP as the type of condition tested.
	COSMAP	alphanumeric	<i>Class of service map</i> Enter the name of the entry in table COSMAP that contains the NCOS mapping upon which the transfer is dependent.

CNDSEL = EA (EAEO)

Use condition EA (equal access) if translation proceeds as specified in field CONDRTE on condition that the EA call matches the characteristics defined in field EA_CND_RTE. Otherwise, the call proceeds as specified in the next tuple.

Datafill fields CNDSEL and EA_CND_RTE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	EA	<i>Condition selector</i> Enter EA as the type of condition tested.
	EA_CND_RTE		<i>Condition sub-selector</i> Enter one of the following:
		CAC	<i>Equal access carrier access code</i> Enter CAC as the condition sub-selector tested for an equal access call where 10XXX was dialed. Note: Condition CAC is supported by GSF Equal Access.

OFRT selector CND (continued)**Field descriptions for conditional datafill**

Field	Subfield or refinement	Entry	Explanation and action
		INTNL	<i>Equal access International</i> Enter INTNL as the condition sub-selector tested for an equal access international call. Note: Condition INTNL is supported by GSF Equal Access.
		PIC	<i>Equal access presubscribed interexchange carrier</i> Enter PIC as the type of condition tested for an equal access call. This condition is used for inter-LATA call routing from an EAEO to an AT that includes the Traffic Operator Position System (TOPS) inter-LATA carrier service (TICS) software. If the PIC condition sub-selector is used, table OFRT is set up such that the primary route is taken for non-PIC calls and the secondary route is taken for PIC calls. Note: Condition PIC is supported by GSF Equal Access.

CNDSEL = INTERLATA (DMS-200 AT)

Condition INTERLATA can be used provided that the following conditions are met:

- The feature package NTX821AA (Tandem Operator Services Routing Package) is present.
- Table TRKLATA contains at least one tuple for each incoming trunk for which this conditional selector is used.
- Table DATAOLA is datafilled.

The condition INTERLATA is true or false as follows:

- INTERLATA condition is true for all international calls. Tables TRKLATA and LATAOLA are not used for international calls.
- INTERLATA condition is false for all 0- calls. Tables TRKLATA and LATAOLA are not used for 0- calls.
- INTERLATA condition is false for all privilege calls.

OFRT selector CND (continued)

- INTERLATA condition is false for all other calls if an entry is not found in either table TRKLATA or table LATAXLA.
- If an entry is found in both tables TRKLATA and LATAXLA, INTERLATA condition is true if table LATAXLA field LATAINTER and INTERLATA condition is false if table LATAXLA field LATAINTRA.

The originating trunk group CLLI and the calling number index into table TRKLATA to obtain the originating local access and transport area (LATA) of the call. For operator number identification (ONI) and automatic number identification (ANI)-fail calls, the digits 000 are the calling digits.

The originating LATA and the called number index into table LATAXLA to determine the inter-LATA or intra-LATA status of the call.

If the above condition is met, translation proceeds as specified in field CONDRTE. Otherwise, the call proceeds as specified in the next tuple.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	INTERLATA	<i>Condition selector</i> Enter INTERLATA as the type of condition tested.

CNDSEL = MIGRATE

Use condition MIGRATE if translation proceeds as specified in field CONDRTE unconditionally.

This condition occurs when the terminator has the MIGRATE option. Translation does not proceed unconditionally.

OFRT selector CND (continued)

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	MIGRATE	Enter MIGRATE if the call is to be transferred to a route list or element based on the assignment of the MIGRATE line option to the terminating DN.

CNDSEL = NRR (MARS)

Use condition NRR (network blocking reroute) is used in an office with feature AD2641 ((FI) MARS-Meridian Automatic Route Selection). The condition is met if there are no available outgoing trunks at any one of the tandem switches in the path on an ISDN user part (ISUP) or a primary access rate (PRA) call from an originating switch.

Note: The CND NRR option is not supported in GSM offices.

In a corporate network with PRA or ISUP facilities, the tandem switch sends a release message back to the originating switch if it has no available outgoing trunks. If the call is over PRA, the release message has the cause of ISDN_NO_CHANNEL_OR_CIRCUIT_AVAILABLE. If the call is over ISUP, the release message has a cause of CI_NO_CIRCUIT_AVAILABLE.

The originating switch upon receiving the release message is programmed using selector CNDSEL(NRR) to re-route the call instead of terminating the call in a treatment to the end user based on the cause.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	NRR	<i>Condition selector</i> Enter NRR as the type of condition tested. Note: The CND NRR option is not supported in GSM offices.

OFRT selector CND (continued)**CNDSEL = PKT**

The PKT ENET CND selector determines the fabric of the originator of the call at the time routing is done to decide which branch to take. The call originator is not always obvious in the case of custom calling features.

In the case of call forwarding, the originator of the call and not the CFW base station is used. For example, if A calls B and B is call forwarded to C then the PKT ENET CND selector will use A's fabric to make it's routing decision.

In the case of 3WC and CXR (call transfer) the agent with the 3WC/CXR is the call originator. For example, if A calls B and then B flashes and calls C, the PKT ENET CND selector will use B's fabric to make it's routing decision. B may in fact talk to C before hanging up and transferring the call.

Note: Traver does not specify the switching fabric of the originator for trunk originated calls. ENET is assumed for TDM trunk groups and the packet network is assumed for DPT (BICC and SIP_T) trunk groups.

The DPT SPM is considered an ENET peripheral.

Datafill fields CNDSEL and CND_PKT_RTE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	PKT	<i>Condition selector</i> Enter PKT as the type of condition tested.
	CND_PKT_RT E	ENET	Condition Sub-selector Enter ENET as the condition sub-selector.

CNDSEL = RND

Use condition RND (percentage of call selected randomly) if translation proceeds as specified in field CONDRTE based on the percentage specified on a random basis. Otherwise, the call proceeds as specified in the next tuple.

OFRT selector CND (continued)

Datafill fields CNDSEL and PERCENT as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	RND	<i>Condition selector</i> Enter RND as the type of condition tested.
	PERCENT	0 to 100	<i>Percent</i> Enter the percentage of calls affected.

CNDSEL = SITE

Use condition SITE in a remote switching center (RSC) where trunks are connected to remotes creating a network of alternate routes for completing a call. The most efficient route for a specific call then depends on the site of the originator.

Translation proceeds as specified in field CONDRTE on condition that the site of the originator of the call matches the entry specified in field SITE. Otherwise, the call proceeds as specified in the next tuple.

To optimize this condition, trunk groups must be unique by site and all the trunk members of that trunk group must belong to that specific site.

Datafill fields CNDSEL and SITE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	SITE	<i>Condition selector</i> Enter SITE as the type of condition tested.
	SITE	HOST or alphanumeric	<i>Site name</i> Enter HOST or a site name datafilled in table SITE.

CNDSEL = TOD (IBN)

Use condition TOD (time of day) if translation proceeds as specified in field CONDRTE on condition that one of the times specified in field TIMES is compatible with one of the times specified in table TIMEODAY. Otherwise, the call proceeds as specified in the next tuple.

OFRT selector CND (continued)

Up to 14 of the times specified in table TIMEODAY are entered. No spaces are left between the times.

Datafill fields CNDSEL, TODNAME, and TIMES as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOD	<i>Condition selector</i> Enter TOD as the type of condition tested.
	TODNAME	alphanumeric	<i>Time of day name</i> Enter the name assigned to the entry in table TIMEODAY to which translation routes.
	TIMES	0 to 9 or A to F	<i>Times</i> Enter the times at which the transfer to another route list or element occurs. An entry outside of this range is invalid.

CNDSEL = TOPEAALT

Use condition TOPEAALT (TOPS equal access alternate carrier) feature AF1781 for TOPS. The call precedes as specified in field CONDRTE on condition that the call has been routed to an alternate carrier and the call is not at a TOPS position. Otherwise, the call proceeds as specified in the next tuple.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOPEAALT	<i>Condition selector</i> Enter TOPEAALT as the type of condition tested.

CNDSEL = TOPEACLS

Use condition TOPEACLS (TOPS equal access class of service) if the call proceeds as specified in field CONDRTE on condition that the class of service of an incoming call matches with field TOP_CND_RTE. Otherwise, the call proceeds as specified in the next tuple.

OFRT selector CND (continued)

There must be as many route list elements as there are classes of service.

Datafill fields CNDSEL and TOP_CND_RTE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOPEACLS	<i>Condition selector</i> Enter TOPEACLS as the type of condition tested.
	TOP_CND_RTE		<i>TOPS equal access class of service</i> Enter one of the following values:
		EACoin	Equal access coin
		EAHOTEL	Equal access hotel
		EARBILL	Equal access restricted billing lines
		EACAMA	Equal access 1+ type calls that do not require operator assistance
		EACAMAFL	Equal access centralized automatic message accounting (CAMA) ANI fail (for example, 1+ CAMA type non-operator calls that are ANI fail)
			Note: This entry is equivalent to the former EANONANI.
		EACAMONI	Equal access CAMA ONI (for example, 1+ CAMA type non-operator calls that are ONI)
		EAOTHOPR	Equal access other operator (for example, all other operator- assisted type calls that have ANI success)
		EAOPANIF	Equal access other operator ANI fail (for example, all other operator assisted type calls that have ANI failure)
		EAOPONI	Equal access other operator ONI (for example, all other operator assisted type calls that are ONI)

OFRT selector CND (continued)**CNDSEL = TOPEAXFR**

Use condition TOPEAXFR (TOPS with the alternate carrier selection feature) if the call proceeds as specified in field CONDRTE on condition that the call is marked as a carrier transfer call by a TOPS operator (XFR IC indicated on the TOPS operator display prior to the call being released). Otherwise, the call proceeds as specified in the next tuple.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOPEAXFR	<i>Condition selector</i> Enter TOPEAXFR as the type of condition tested.

CNDSEL = SNPA

Use condition SNPA (conditional routing based on SNPA feature) if the call proceeds as specified in field CONDRTE on condition that the SNPA for the call is equal to the SNPA datafilled in field SNPA_CND_RTE. Otherwise, the call proceeds as specified in the next tuple.

Datafill fields CNDSEL and SNPA_CND_RTE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	SNPA	<i>Condition selector</i> Enter SNPA as the type of condition tested.
	SNPA_CND_RTE	numeric (3 digits)	<i>Conditional route SNPA</i> Enter the three-digit code for the SNPA.

OFRT selector CND (continued)

Routing options

Each of the above formats with route selector CND have field CONDRTE which is datafilled as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CONDRTE	see subfields	<i>Conditional route</i> This field consists of subfields RTETYPE, RTEREF, SKIPNUM, EXTRTEID, TABNAME, and INDEX.

Route to specified route list in this (same) table

If the call is transferred to another route list in the same table, datafill fields RTETYPE and RTEREF as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	RTETYPE	ST	<i>Route type</i> Enter ST (same table) as the route type.
	RTEREF	1 to 1023	<i>Route reference number</i> Enter the route reference number (must be a higher number in the same table) to which translation transfers if the condition is met. Entries outside the indicated range are invalid.

OFRT selector CND (continued)**Route after skipping specified number of route elements**

If the call skips to another route element within the same route list, datafill fields RTETYPE and SKIPNUM as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	RTETYPE	SK	<i>Route type</i> Enter SK (skip) as the route type.
	SKIPNUM	0 to 7	<i>Skip number</i> Enter the number of elements to skip within the same route list if the condition is met.

Route to specified table at specified index

If the call is transferred to another route list in table OFRT, datafill fields RTETYPE and EXTRTEID as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	RTETYPE	T	<i>Route type</i> Enter T (transfer) as the route type.
	EXTRTEID	see subfields	<i>External route identifier</i> This field consists of subfields TABNAME and INDEX.
	TABNAME	OFRT, OFR2, OFR3, or OFR4	<i>Table name</i> Enter the office route table name that translation transfers to if the condition is met. An entry outside of this range is invalid.
	INDEX	1 to 1023	<i>Route reference index</i> Enter the route reference index number in table OFRT, that translation transfers to if the condition is met. An entry outside of this range is invalid.

OFRT selector CND (continued)

Datafill example

The following examples show sample datafill for table OFRT selector CND.

Example 1

An example of datafill for extending a route list that requires more than eight route elements is shown below. The last element in the route list contains the conditional selector ALWAYS, and transfers to a higher route list in the same table.

MAP display example for table OFRT selector CND

RTE	RTELIST
5	(CND ALWAYS) (ST 25) \$

Example 2

An example of datafill for call passing class of service if the class of service service mapping MAP1 is performed on its NCOS or time-of-day NCOS, skip three elements in the route list, otherwise go to next element in route list is shown below.

MAP display example for table OFRT selector CND

RTE	RTELIST
2	(CND COSMPAP MAP1) (SK 3) \$

Example 3

An example of datafill for a call that has previously been over a satellite link and go to route list 35 in table OFR4, otherwise, go to next element in route list is shown below.

OFRT selector CND (continued)**MAP display example for table OFRT selector CND**

RTE	RTELIST
5	(CND CALLCHR SAT) (T OFR4 35) \$

Example 4

An example of time equal to the times specified in table TIMEODAY for routes 4 and F for time of day name CUST01, skip one element in route list is shown below.

MAP display example for table OFRT selector CND

RTE	RTELIST
28	(CND TOD CUST01 4F) (SK 1) \$

Example 5

An example of a call distributed randomly on a specified percentage basis is shown below.

MAP display example for table OFRT selector CND

RTE	RTELIST
10	(CND RND 25) (SK 1) (S D TRUNK1) (S D TRUNK2) (CND RND 50) (T OFRT 1) \$

This result in 75% of all calls routed to RTEREF 0 attempting to use TRUNK1. All attempts to use TRUNK2, and 50% of any calls that have not terminated yet then try OFRT 1. The remainder get no circuit treatment.

OFRT selector CND (continued)

Example 6

An example of possible datafill for table OFRT is shown below.

MAP display example for table OFRT selector CND

RTE	RTELIST
3	(CND INTERLATA) (SK 2) (S D OTCOPERATOR1) (CND ALWAYS) (SK 1) (S D IECOPERATOR1) \$
4	(CND INTERLATA) (SK 2) (S D OTCOPERTATOR2) (CND ALWAYS) (SK 1) (S D IECOPERATOR1) \$

Example 7

An example of possible datafill for conditional selectors TOPEAALT and TOPEAXFR is shown below.

MAP display example for table OFRT selector CND

RTE	RTELIST
60	(CND TOPEAALT) (SK 1) (T OFRT 62) (T OFR2 61) \$
61	(S D ALT CAR2) (T OFR3 62) \$
62	(S D OGEACAR2) \$
130	(CND TOPEAXFR) (SK 1) (T OFRT 132) (T OFR4 131) \$
131	(S D ALT CAR2) (T OFRT 132) \$
132	(S D OGEACAR2) \$

Example 8

An example of possible datafill for conditional selector SNPA is shown below.

OFRT selector CND (continued)**MAP display example for table OFRT selector CND**

RTE	RTELIST
507	(CND SNPA 619) (ST 508) (T OFRT 509) \$
508	(S D OG619TRK) \$
509	(CND SNPA 407) (ST 510) (T OFRT 511) \$
510	(S D OG407TRK) \$
511	(CND SNPA 613) (ST 512) (S D T120) \$
512	(S D OG613TRK) \$

Example 9

An example of datafill for table OFRT, along with MIGRATE is shown below.

MAP display example for table OFRT selector CND

TABLE OFNRT
520 (CND MIGRATE SK 2) (DN 214 520 4) (CND ALWAYS SK 1) (T OFRT 895) \$

Example 10

An example of possible datafill for conditional selector PKT is shown below.

MAP display example for table OFRT selector CND

TABLE OFRT
POS 888
(CND PKT ENET SK 2)
(S D MYSIPGRP)
(CND ALWAYS SK 1)
(S D MYTDMGRP)
\$

OFRT selector CND (end)

Table history

SN06 (DMS)

Added the PKT condition and related datafill, for CS2000 operation. Feature A89007340.

Added CND and NOT conditional routes to table OFRT selector CND for feature A00001207.

OFRT selector DCRT

RTESEL = DCRT

Route selector DCRT is used in offices with feature BV1534 (Dynamically Controlled Routing [DCR]) as the first element of a route list. The DCR destination of the call is one link away from the switch, so as to block the call if the second leg of a DCR tandem recommendation is not available.

Refer to the description of table DESTKEY for information on the DCR feature tables.

If the office is used as a DCR switch, routing proceeds to table DESTNODE field DESTKEY equal to field DESTNAME associated with this selector.

All route lists that are used for DCR purposes must begin with the DCRT route element unless there is no direct route from the switch to the DCR destination switch.

Route lists referred to by field DIRRTE of table DESTNODE must not contain either the DCRT or the NODE element.

If the product load does not define non-DCR calls, all calls that encounter DCR route elements in the route list will be treated as DCR calls. If the product load defines DCR and non-DCR calls, both DCR selectors (DCRT and NODE) are skipped for non-DCR calls.

OFRT selector DCRT (continued)

Data II

The following table lists the datafill for table OFRT selector DCRT.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> Since this record must be the first in the route list, enter the route reference number assigned to the route list. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field is a vector of route elements. Each route element consists of subfield RTESEL and refinements. If RTESEL equals DCRT, datafill refinements DCR_NETWORK, DESTNAME, and OSID. Enter \$ (dollar sign) to indicate the end of the vector.
	RTESEL	DCRT	<i>Route selector</i> Enter DCRT.
	DCR_NETWORK K	alphanumeric (1 to 12 characters)	<i>Dynamically Controlled Routing network name</i> Enter the DCR network name. The DCR network name must be datafilled in field NETLIST in table DESTKEY.

OFRT selector DCRT (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	DESTNAME	alphanumeric (1 to 16 characters)	<i>Destination node name</i> Enter the DCR destination office name. The destination office name must be datafilled in field DESTKEY, in table DESTKEY.
	OSID	1 to 55	<i>Outpulsing scheme identification</i> Enter the index into field OSID of table DESTNODE to identify the outpulsing scheme defined in table DESTNODE. An entry outside of this range is invalid.

Data l l e x a m p l e

The following example shows sample datafill for table OFRT selector DCRT.

MAP display example for table OFRT selector DCRT

RTE	RTELIST
1	(DCRT MTL05 2) (S D TOROON0101T2) (NODE MTL05 2) (T OFRT 1)\$
2	(DCRT TORO7 1) (S D OTWAON2301T0) (NODE TORO7 1) (S D LNTOPSO)\$

OFRT selector DN

RTESEL = DN

Route selector DN is used if digit translation converts the received digits (4 to 11 digits) into a 7-digit directory number that terminates on the switching unit. The last four digits received must be the DEFG digits of the seven-digit directory number (DN).

Note: These values apply primarily to the North American market, and may vary in others. With the E.164 open numbering plan (ONP) configuration, the range for DN and received digits is 1 to 14; DEFG does not apply.

Selector DN allows calls to terminate on the DN described in the DN route element list. It provides area and office codes; the station code is determined from the dialled digits.

Data II

The following table lists the datafill for table OFRT selector DN.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements SNPA and OFC.
	RTESEL	DN	<i>Route selector</i> Enter DN.

OFRT selector DN (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	SNPA	numeric	<i>Serving NPA</i> Enter the serving numbering plan area (NPA) of the DN to which the call terminates.
	OFC	numeric (up to 7 digits)	<i>Office (nnx) code</i> Enter an office code of up to seven digits that the directory number uses to terminate the call.
	STNLEN	numeric (1 to 8)	Station length. Used to identify the station code length of the terminating agent. Note: The OFRT_DN_RFMT_V0_TO_V1 procedure puts a default value of 4 in the STNLEN field.

Data file example

The following example shows sample datafill for table OFRT selector DN.

MAP display example for table OFRT selector DN

RTE	RTELIST
1	(DN 613 2257865 5) \$

OFRT selector ISA

RTESEL = ISA

Route selector ISA (integrated service access) routes to a primary rate access (PRA) interface.

The ISA feature routes calls of different call types (public, private, tie trunk to private branch exchange [PBX], foreign exchange [FX], wide area telephone service [WATS], and inbound WATS [INWATS]) over the same trunk group.

Datafill

The following table describes field names, subfield names, and valid data ranges for Table IBNRTE, selector ISA with UOP/ISA enhancements.

Field descriptions for Table IBNRTE using the UOP/ISA Enhancement Feature

Field	Subfield or refinement	Entry	Explanation and action
RTELIST		see subfields	Route list. This field consists of subfields IBNRTESEL, OHQ, CBQ, and EXP.
	RTESEL	ISA	IBN route selector. Enter ISA with the line (L) selector only. Or enter ISA with the variable (V) selector and the L (line) route selector. Either route selector scenario must be entered.
	CONNTYPE	D	Connection type. System logic does not use this field. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	Common language location identifier. Enter the code in Table CLLI where translation routes.
	DMI	0 to 32,767	Digit manipulation index. Enter a value that corresponds to the tuple from Table DIGMAN that provides digit manipulation commands.

Field descriptions for Table IBNRTE using the UOP/ISA Enhancement Feature

Field	Subfield or refinement	Entry	Explanation and action
	CANCNORC	Y or N	Cancel normal charge. Enter Y if the type of call is a direct dial (DD) call and the charge is canceled. Otherwise, enter N.
	TENDIG_ REQD	Y or N	Ten digits required. Enter Y, so that the host application can determine if a ten digit DN should be derived for manipulation and outpulsing based on the ten digit DN and not what was dialed. The default is N. TENDIG_REQD can only be used if a DMI value is present. If the DMI value is nil, then the TENDIG_REQD will not be allowed to be set to Y. The ten digit DN is derived by the application software for 7 digit or external dialed calls.

The following table lists the datafill for table OFRT selector ISA.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023, blank	Route reference index. If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the field blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	Route list. This field consists of subfield RTESEL and refinements OHQ, CBQ, EXP, CLLI, and CALLTYPE.
	RTESEL	ISA	Route selector. Enter ISA.
	OHQ	Y or N	Off-hook queuing. Enter Y (yes) if off-hook queuing is allowed on this route. Otherwise, enter N (no).

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
	CBQ	Y or N	Call back queuing. Enter Y if call back queuing is allowed on this route. Otherwise, enter N.
	EXP	Y or N	Expensive. Enter Y if an expensive route and expensive route warning tone is applied. Otherwise, enter N.
	CLLI	alphanumeric	Common language location identifier. Enter the trunk group CLLI (assigned in table CLLI) to where translation routes.
	CALLTYPE	ASDS, FX, INWATS, LDS, PVT, PUB, TIE, or WATS	Call type. Enter one of the types of call and datafill the call type-dependent subfields as shown below. Entries outside the indicated range are invalid.

CALLTYPE = PUB

Datafill subfields OATYPE, TNS, NPOS and DMI as described below.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CALLTYPE	PUB	Call type. Enter PUB for public service call type, where the dialed digits conform to the E.164 standard. Datafill fields OATYPE, TNS, NPOS, and DMI.
	OATYPE	0P, 0M, NONE	Operator access type. Enter 0P for 0+ operator access. Enter 0M for 0- operator access. Enter NONE for no operator access allowed.
	TNS	0 to 999, C, or N	Transit network selector. Enter the transit network number placed in the SETUP message. Otherwise, enter C if the TNS is determined from the call originator. Enter N, if no TNS is required.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	NPOS	Y or N	No calling number identification required. Enter Y (yes) to indicate that calling number identification is not required for operator number identification (ONI) or automatic number identification (ANI)-fail calls incoming on trunk group types SuperCAMA (SC) or Traffic Operator Position System (TOPS). Otherwise, enter N (no) to indicate that calling number identification is required for ONI or ANI-fail calls incoming on trunk group types SC or TOPS.
	DMI	0 to 32 767	Digit manipulation index. Enter the index into table DIGMAN if the called party number is modified before outpulsing. Otherwise, enter 0 (zero) to indicate that digit manipulation in table DIGMAN is not required.

CALLTYPE = ASDS or LDS

Datafill subfields NPI and DMI as described below.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CALLTYPE	ASDS, LDS	Call type. Enter ASDS or LDS and datafill subfields NPI and DMI.
	NPI	E164, PVT, UNKNOWN	<i>Numbering plan identifier</i> Enter one of the following: • E164 for public calls • PVT for private calls UNKNOWN appears in the list of valid values but it cannot be datafilled in this field. If an attempt to datafill UNKNOWN in this field is made, the following error message is displayed: NPI MUST BE E.164 OR PRIVATE
	DMI	0 to 32 767	Digit manipulation index. Enter the index into table DIGMAN if the called party number is modified before outpulsing. Otherwise enter 0 (zero) to indicate that digit manipulation in table DIGMAN is not required.

CALLTYPE = WATS

Datafill subfields ZONE, NPI, and DMI as described below.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CALLTYPE	WATS	Call type. Enter WATS for wide area telecommunications service, and datafill refinement fields ZONE, NPI, and DMI.
	ZONE	0 to 9, A, B, C, or AUTO	Zone. Enter the outward wide area telephone service (OUTWATS) zone number included in selector NSF (network specific facility).
	NPI	E164, PVT, UNKNOWN	Numbering plan identifier. Enter one of the following: • E164 for public calls • PVT for private calls E164 is the typical entry for CALLTYPE. UNKNOWN appears in the list of valid values but it cannot be datafilled in this field. If an attempt to datafill UNKNOWN in this field is made, the following error message is displayed: NPI MUST BE E.164 OR PRIVATE
	DMI	0 to 32 767	Digit manipulation index. Enter the index into table DIGMAN, if the called party number is modified before outpulsing. Otherwise enter 0 (zero) to indicate that digit manipulation in table DIGMAN is not required.
	CARRIER	alphanumeric (1 to 16 characters) or \$	Enter a valid carrier name from table OCCINFO to indicate interLATA OUTWATS or enter \$ to indicate intraLATA OUTWATS.

CALLTYPE = PVT, INWATS, TIE, or FX

Datafill subfields FACNUM, NPI, and DMI as described below.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CALLTYPE	FX, INWATS, PVT, or TIE	Call type. Enter FX for foreign (remote) exchange trunk. Enter INWATS for inward wide area telecommunications service. Enter PVT for private customer-defined service, where the dialed digits do not conform to the E.164 standard. Enter TIE for tie trunk to a private branch exchange (PBX). Datafill subfields FACNUM, NPI and DMI.
	FACNUM	0 to 1023	Facility number. Enter the facility number included in selector NSF.
	NPI	E164, PVT, UNKNOWN	Numbering plan identifier. Enter one of the following values: • E164 for public calls • PVT for private calls PVT is the typical entry for PVT and TIE calltypes. E164 is the typical entry for INWATS and FX calltypes. UNKNOWN appears in the list of valid values but it cannot be datafilled in this field. If an attempt to datafill UNKNOWN in this field is made, the following error message is displayed: NPI MUST BE E.164 OR PRIVATE
	DMI	0 to 32 767	Digit manipulation index. Enter the index into table DIGMAN if the called party number is modified before outpulsing. Otherwise enter 0 (zero) to indicate that digit manipulation in table DIGMAN is not required.

Datafill example

The following example shows sample datafill for table OFRT selector ISA.

MAP display example for table OFRT selector ISA

RTE	RTELIST
1022	(ISA N N N D2AIMTISUP INWATS 12 E164 0)\$

OFRT selector MEM

RTESEL = MEM

Route selector MEM is used in offices with feature AD2236 (Trunk Group Utilization Enhancements) if routing is required to a specified trunk group member identified by the trunk group CLLI, lower trunk member number (MEMNUM) and upper member number (UPPERMEM).

Data II

The following table lists the datafill for table OFRT selector MEM.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of table HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements CLLI, MEMNUM and UPPERMEM.
	RTESEL	MEM	<i>Route selector</i> Enter MEM.
	CLLI	alphanumeric	<i>Common language location identifier</i> Enter the code, assigned to the trunk group in table CLLI.

OFRT selector MEM (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	MEMNUM	0 to 9999	<i>Member number</i> Enter the external trunk number assigned to the trunk.
	UPPERMEM	0 to 9999	<i>Upper member number</i> Enter the upper external trunk number assigned to the trunk group list searched. If only one member is searched, enter the same number as MEMNUM.

Data example

The following example shows sample datafill for table OFRT selector MEM.

MAP display example for table OFRT selector MEM

RTE	RTELIST
1	(MEM UDAL2WTLS91 110 110)\$
2	(MEM BOTSWANAI99 4 9)\$

OFRT selector MN

RTESEL = MN

Route selector MN is used if the trunk group type of the outgoing trunk group is recording completing (RC) and a class of service tone is sent to the operator.

The type of class of service tone that is forwarded to the operator is determined by the value of fields CSTHTONE and CSTLTONE in table OFRT, field COST in table LINEATTR and originator, type of line or trunk.

The resulting tone for each combination of the above fields is as follows:

Tone combinations

Table OFRTCSTHT ONE	CSTLTONE	Type of originator	Table LINEATTRCOST	Resulting tone
N	N	Line or trunk	Don't care	None
N	Y	Line or trunk	Don't care	Low
Y	N	Line or trunk	Don't care	High
Y	Y	Trunk	Not applicable	None
Y	Y	Party lines	Don't care	None
Y	Y	Other lines	NT	None
Y	Y	Other lines	LO	Low
Y	Y	Other lines	HI	High
Note: Other lines means nonparty lines, for example coin lines.				

Charging can be canceled on the direct dial (DD) type calls or if the type of call is no-prefix (NP) and coin is returned to prepay or dial tone first coin lines.

Automatic number identification (ANI) information (the billing number to which call is charged) is required.

OFRT selector MN (continued)**Data II**

The following table lists the datafill for table OFRT selector MN.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the field blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements RTESEL, CONNTYPE, CLLI, DELDIGS, PRFXDIGS, CANCNORC, CSTHTONE, CSTLTONE, ANIREQD, and BILLCODE.
	RTESEL	MN	<i>Route selector</i> Enter MN.
	CONNTYPE	D	<i>Connection type</i> This field is not used by system logic. Enter D to satisfy table editor. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.

OFRT selector MN (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	DELDIGS	0 to 15	<i>Delete digits</i> Enter the number of digits deleted before outpulsing.
	PRFXDIGS	0 to 9, B, C, D, E, F, or N	<i>Prefix digits</i> If digits, control signals, or both are prefixed, enter up to 11 digits or equivalents that are prefixed. The following is a list of control signals and their digit equivalents: C11 = BC12 = CKP = DKP2 = EST3P = BSTP = CSTKP = DST2P = EST = F If no digits are prefixed, enter N (no).
	CANCNORC	Y or N	<i>Cancel normal charge</i> If the type of call is direct dial (DD) and no charge is required for the call, or type of call is no prefix (NP) and coin is returned to prepay or coin-dial-tone-first line, enter Y (yes). Otherwise, enter N (no). If the call is routed to an announcement and the call is billed (coins collected, off-hook returned, message rate pegged), enter Y. Otherwise, enter N. If field CANCNORC is equal to Y, the call is charged. If this field is set to Y, then a nonrevenue call is assumed and reflected in the call code of the bearer capability (BC) AMA record. If this field is set to N, then a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).

OFRT selector MN (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	CSTHTONE	Y or N	<i>Class of service high tone</i> Enter Y for fields CSTHTONE and CSTLTONE if outgoing trunk group type is recording completing (RC) and the type of class of service tone sent to operator for all lines excluding party lines is defined in table LINEATTR. Enter Y for field CSTHTONE and enter N for field CSTLTONE if the outgoing trunk group type is RC and high tone is sent to operator on all calls. Enter N (no) for fields CSTHTONE and CSTLTONE when outgoing trunk group is recording completing and no class-of-service tone is sent to operator.
	CSTLTONE	Y or N	<i>Class of service low tone</i> Enter Y for fields CSTLTONE and CSTHTONE when outgoing trunk group is recording completing and the type of class of service sent for all lines excluding party lines is defined in the line attribute table. Enter Y for field CSTLTONE and enter N (no) for field CSTHTONE when outgoing trunk group is RC and low tone is sent to operator on all calls. Enter N for fields CSTLTONE and CSTHTONE when outgoing trunk group is recording completing and no class of service tone is sent to operator.
	ANIREQD	Y or N	<i>ANI required</i> Enter Y if ANI information is required. Otherwise, enter N (no).
	BILLCODE	numeric (up to 11 digits) or N	<i>Billing code</i> If a billing number is required, enter up to 11 digits to which the call is charged. If a billing number is not required, enter N.

OFRT selector MN (end)

Data I l e xample

The following example shows sample datafill for table OFRT selector MN.

MAP display example for table OFRT selector MN

RTE	RTESEL
4	(MN D RT3 3 N N N N N N)

OFRT selector N

RTESEL = N

Route selector N is used in the following circumstances:

- If the outgoing or two-way trunk group is intertoll and the digit deletion and prefixing required cannot be performed by the standard digit manipulation logic, or the type of call is direct dial (DD) and the charge is canceled.
- If the outgoing and two-way trunk group is other than intertoll, the type of call is DD and the charge is canceled or digits are deleted or prefixed.
- If the type of call is no prefix (NP) and the coin is returned to a prepaid or dial-tone-first coin line.
- If the trunk group type is access tandem to carrier (ATC), digits are deleted, but only 1NX is prefixed to indicate an international call. Any other scenario is invalid. The only time that digits are prefixed on international calls is if the CND EA INTNL selector is true.
- If distinct treatments are required for Remote Message Indicator (RMI).

If route selector N is used, standard digit manipulation is automatically canceled and the required digit deletion and prefixing must be specified.

OFRT selector N (continued)**Data II**

The following table lists the datafill for table OFRT selector N.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the entry blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements RTESEL, CONNTYPE, CLLI, DELDIGS, PRFXDIGS, CANCEL, and OPTIONS.
	RTESEL	N	<i>Route selector</i> Enter N.
	CONNTYPE	D	<i>Connection type</i> This field is not used by the system logic. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.
	DELDIGS	0 to 15	<i>Delete digits</i> Enter the number of digits deleted before outpulsing.

OFRT selector N (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	PRFXDIGS	0 to 9, B, C, D, E, F, or N	<i>Prefix digits</i> If digits or control signals, or both are prefixed, enter up to 11 prefix digits or equivalents. The following is a list of control signals and their digit equivalents: C11 = BC12 = CKP = DKP2 = EST3P = BSTP = CSTKP = DST2P = EST = F If no digits are prefixed, enter N (no).
	CANCNORC	Y or N	<i>Cancel normal charge</i> If the type of call is direct dial (DD) and no charge is required for the call, or type of call is no prefix (NP) and coin is returned to prepay or coin-dial-tone-first line, enter Y (yes). Otherwise, enter N (no). If the call is routed to an announcement and the call is billed (coins collected, off hook returned, message rate pegged), enter Y. Otherwise, enter N (no). If field CANCNORC is equal to Y, the call is charged. If this field is set to Y, then a nonrevenue call is assumed and reflected in the call code of the bearer capability (BC) automatic message accounting (AMA) record. When this field is set to N, then a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).
	OPTIONS	SETCDN	<i>Set called party number</i> Enter SETCDN to signify that the CDNNAME is reset to a newly specified name (subfield CDNNAME).

Data example

The following example shows sample datafill for table OFRT selector N.

OFRT selector N (end)

MAP display example for table OFRT selector N

RTE	RTELIST
4	(N D N01 3 N N \$) \$ \$

OFRT selector N2

RTESEL = N2

Route selector N2 is used if translation requires the capability to strip the NPA digits off and/or add them back on to the outpulsed digits to reach a uniform outpulsing schema.

Route selector N2 is specific to Feature Group D (FGD) Equal Access calls only and does not support any International call scenario.

Route selector N2 is limited to IT, MF and ISUP type trunks.

Route selector N2 is a clone of route selector N with the addition of two fields, a Delete Digits Last Stage (DDLS) field and a Add Digits Last Stage (ADLS) field.

Route selector N2 is used as a substitute for route selector N and only when the DELDIGS and PRXDIGS fields are used for purposes other than modifying the called number. Accordingly, the DELDIGS field is assumed to be set to 15 since the N2 selector is only used when the OZZ digits are required and the PRXDIGS field is used to insert the OZZ digits. The DDLS field holds the value which determines the number of digits that will be deleted from the front of the called number to be outpulsed. The ADLS field holds the actual digits which will be prefixed onto the front of the called number to be outpulsed.

Route selector N2 is a model of route selector N and all billing records are produced exactly as if the N selector was used. Digit manipulation done by route selector N2 is not shown in the billing records.

OFRT selector N2 (continued)**Data II**

The following table lists the datafill for table OFRT selector N2.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the entry blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements RTESEL, CONNTYPE, CLLI, DELDIGS, PRFXDIGS, and CANCELORC.
	RTESEL	N2	<i>Route selector</i> Enter N2.
	CONNTYPE	D	<i>Connection type</i> This field is not used by the system logic. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.
	DELDIGS	15	<i>Delete digits</i> Enter 15, which is the number of digits deleted before outpulsing when route selector N2 is used.

OFRT selector N2 (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	PRFXDIGS	0 to 9, B, C, D, E, F, or N	<i>Prefix digits</i> If digits or control signals, or both are prefixed, enter up to 11 prefix digits or equivalents. The following is a list of control signals and their digit equivalents: C11 = B C12 = C KP = D KP2 = E ST3P = B STP = C STKP = D ST2P = E ST = F If no digits are prefixed, enter N (no).
	CANCNORC	Y or N	<i>Cancel normal charge</i> If the type of call is direct dial (DD) and no charge is required for the call, or type of call is no prefix (NP) and coin is returned to prepay or coin-dial-tone-first line, enter Y (yes). Otherwise, enter N (no). If the call is routed to an announcement and the call is billed (coins collected, off hook returned, message rate pegged), enter Y. Otherwise, enter N (no). If field CANCNORC is equal to Y, the call is charged. If this field is set to Y, then a nonrevenue call is assumed and reflected in the call code of the bearer capability (BC) automatic message accounting (AMA) record. When this field is set to N, then a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).

OFRT selector N2 (end)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	DDLS	0 to 15	<i>Delete digits last stage</i> Enter the number of digits deleted from the front of the called number to be outpulsed.
	ADLS	0 to 15	<i>Add digits last stage</i> Enter the actual digits which are prefixed onto the front of the called digits to be outpulsed. If no digits are prefixed onto the front of the called digits to be outpulsed, enter N.

Data I l e x a m p l e

The following example shows sample datafill for table OFRT selector N2.

MAP display example for table OFRT selector N2

RTE	RTELIST
41	(N2 D 15 374 N 3 510) \$
42	(N2 D 15 456 N 3 N) \$

OFRT selector NODE

RTESEL = NODE

Route selector NODE is used in offices with feature BV1534 (Dynamically Controlled Routing [DCR]) positioned in the route list after the direct routes to the destination and before the fixed hierarchical routing (FHR) tandem routes.

Refer to the description of table DESTKEY for information on the DCR feature tables.

If the office is used as a DCR switch, then routing proceeds to table DESTNODE field DESTKEY equal to field DESTNAME associated with this selector.

Route lists referred to by field DIRRTE of table DESTNODE must not contain either the DCRT or the NODE element.

If the product load does not define non-DCR calls, all calls that encounter DCR route elements in the route list will be treated as DCR calls. If the product load defines DCR and non-DCR calls, both DCR selectors (DCRT and NODE) are skipped for non-DCR calls.

OFRT selector NODE (continued)

Data II

The following table lists the datafill for table OFRT selector NODE.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the field blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field is a vector of route elements. Each route element consists of subfield RTESEL and refinements. If RTESEL equals NODE, datafill refinements DCR_NETWORK, DESTNAME, and OSID. Enter \$ (dollar sign) to indicate the end of the vector.
	RTESEL	NODE	<i>Route selector</i> Enter NODE.
	DCR_NETWORK K	alphanumeric (1 to 12 characters)	<i>Dynamically Controlled Routing network name</i> Enter the DCR network name. The DCR network name must be datafilled in field NETLIST in table DESTKEY.

OFRT selector NODE (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	DESTNAME	alphanumeric (1 to 16 characters)	<i>Destination node name</i> Enter the DCR destination office name. The destination office name must be datafilled in field DESTKEY, in table DESTKEY.
	OSID	1 to 55	<i>Outpulsing scheme identification</i> Enter the index into field OSID of table DESTNODE to identify the outpulsing scheme defined in table DESTNODE. An entry outside of this range is invalid.

Data l l e x a m p l e

The following example shows sample datafill for table OFRT selector NODE.

MAP display example for table OFRT selector NODE

RTE	RTELIST
1	(DCRT MTL05 2) (S D TOROON0101T2) (NODE MTL05 2) (T OFRT 1)\$
2	(DCRT TORO7 1) (S D OTWAON2301T0) (NODE TORO7 1) (S D LNTOPSO)\$

OFRT selector NOT

RTESEL = NOT

Route selector NOT permits the specification of a condition that must not be met to route as specified. If the condition is not met, then the instructions of this route element are executed. Otherwise they are skipped, and translation searches for instructions in the next route element.

List of conditions

Always (All types of DMS-100 Family): The condition is always met. This is most useful when making temporary changes (that is, change the condition to ALWAYS instead of rewriting the whole element.)

CALLCHR (CALL CHARACTERISTIC: (IBN) The condition is met if the call characteristic specified is assigned in table CALLCHR.

COSMAP CLASS OF SERVICE MAPPING: (IBN) Table COSMAP is accessed at mapping name COSMAP to determine if condition is met.

EA EQUAL ACCESS END OFFICE (EAEO): Condition is met if the call is equal access and the call matches the specified subcondition as follows:

CAC CARRIER ACCESS CODE: Condition is met if the call is equal access and the carrier access code 10XXX is dialed.

INTNL INTERNATIONAL: Condition is met if the call is equal access international.

PIC PRIMARY INTER-LATA CARRIER: This condition is used for inter-LATA call routing from an EAEO to an access tandem (AT) that includes the Traffic Operator Position System (TOPS) Inter-LATA carrier services (TICS). When the PIC condition is used, table OFRT is set up such that the primary route is taken for non-PIC calls and the secondary route is taken for PIC calls.

INTERLATA INTER-LATA (DMS-200 AT): This condition can be used in an office with feature package NTX821AA (Tandem Operator Service Routing). It routes inter-LATA and intra-LATA traffic to different destinations from the same office route.

The main application is routing of equal-access operator traffic to operating telephone company (OTC) operator trunks and interexchange carrier (IEC) operator trunks in a DMS-200 AT.

NRR NETWORK BLOCKING REROUTE (MARS): This condition is used in an office with feature AD2641 (MARS - Meridian Automatic Route

OFRT selector NOT (continued)

Selection). The condition is met if there are no available outgoing trunks at any one of the tandem switches in the path on an ISDN user part (ISUP) or a primary access rate (PRA) call from an originating switch.

RND PERCENTAGE OF CALLS SELECTED RANDOMLY: (All types of DMS-100 Family switches) The DMS program decides that the condition is met on a random basis to ensure that the specified percentage of calls take this route element.

SITE SITE: This condition is used in a remote switching center (RSC), where trunks are connected to remotes creating a network of alternate routes for completing a call. The most efficient route for a specific call then depends on the site of the originator.

TOD TIME OF DAY: (IBN) Table TIMEODAY is accessed at fields TODNAME and TIMES to determine if the condition is met.

TOPEAALT TOPS EQUAL ACCESS ALTERNATE CARRIER: (TOPS with the feature AF1781 (Alternate Carrier Selection) The condition is met if the call is routed to an alternate carrier and the call is not at a TOPS position.

TOPEACLS TOPS EQUAL ACCESS CLASS OF SERVICE: (TOPS) The condition is met if the class of service of an incoming call matches the entry in field TOP_CND_RTE.

TOPEAXFR TOPS EQUAL ACCESS CARRIER TRANSFER: (TOPS with feature AF1781 (Alternate Carrier Selection) The condition is met if the call is marked as a carrier transfer call by a TOPS operator (XFR IC indicated on the TOPS operator display prior to the call being released).

SNPA CONDITIONAL ROUTING BASED ON SNPA: (conditional routing based on service numbering plan area [SNPA]) The condition is met if the SNPA for the call is equal to the SNPA datafilled in field SNPA_CND_RTE.

MIGRATE—Identifies lines which are in the process of migrating from a collapsing office into a Call Server Complex (CS2000). The migrating lines are pre-datafilled in the new office, but are blocked from terminations by the existence of the MIGRATE option until the physical move is complete. Terminations to the DN on the CS2000 are avoided by routing to the collapsing site while the DN is still in service. This is accomplished during the routing stage of call processing by using a conditional route selector (CND MIGRATE) in tables HNPACONT.RTEREF, FNPACONT.RTEREF, OFRn and IBNRTn. When the CND MIGRATE conditional selector is encountered, terminating calls are completed to DNs which are not assigned the MIGRATE

OFRT selector NOT (continued)

option. The call is redirected via an office route or trunk CLLI to the collapsing office for DNs which are assigned the MIGRATE option.

List of routing options:

- Route to specified table at specified index
- Route to another route list in table OFRT
- SK: Route after skipping specified number of route elements

Datafill

The following table lists the datafill for table OFRT selector NOT.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements CONDITION and CONDRTE.

OFRT selector NOT (continued)**Field descriptions**

Field	Subfield or refinement	Entry	Explanation and action
	RTESEL	NOT	<i>Route selector</i> Enter NOT.
	CONDITION	see subfields	<i>Condition</i> This field consists of condition selector subfield CNDSEL and CNDSEL refinement subfields as follows: CNDSEL and Refinements: ALWAYS - None CALLCHR - CALLCHR COSMAP - COSMAP EA - EA_CND_RTE INTERLATA - None MIGRATE - None NNR - None RND - PERCENT SITE - SITE TOD - TODNAME, TIMES TOPEAALT - None TOPEACLS - TOP_CND_RTE TOPEAXFR - None SNPA - SNPA_CND_RTE

CNDSEL = ALWAYS

Use condition ALWAYS if translation proceeds as specified in the next tuple unconditionally (routing specified in field CONDRTE never used).

This condition is useful when making temporary changes (that is, change the condition to ALWAYS instead of rewriting the whole element.)

OFRT selector NOT (continued)

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	ALWAYS	<i>Condition selector</i> Enter ALWAYS if transfer is always required.

CNDSEL = CALLCHR (IBN)

Use condition call characteristic (CALLCHR) if translation proceeds as specified in the next tuple on condition that the call characteristic specified in field CALLCHR is assigned in table CALLCHR. Otherwise, the call proceeds as specified in field CONDRTE.

Datafill fields CNDSEL and CALLCHR as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	CALLCHR	<i>Condition selector</i> Enter CALLCHR as the type of condition tested.
	CALLCHR	DILITOL SAT	<i>Call characteristic</i> Enter the name of the entry in table CALLCHR that contains the characteristic upon which the transfer is dependent.

CNDSEL = COSMAP (IBN)

Use condition class of service mapping (COSMAP) if translation proceeds as specified in the next tuple on condition that the network class of service assigned to the call passes the class of service screening. Otherwise, the call proceeds as specified in field CONDRTE.

OFRT selector NOT (continued)

Datafill fields CNDSEL and COSMAP as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	COSMAP	<i>Condition selector</i> Enter COSMAP as the type of condition tested.
	COSMAP	alphanumeric	<i>Call of service MAP</i> Enter the name of the entry in table COSMAP that contains the NCOS mapping upon which the transfer is dependent.

CNDSEL = EA (EAEO)

Use condition equal access (EA) if translation proceeds as specified in the next tuple on condition that the call matches the characteristics defined in field EA_CND_RTE. Otherwise, the call proceeds as specified in field CONDRTE.

Datafill fields CNDSEL and EA_CND_RTE as follows:

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	EA	<i>Condition selector</i> Enter EA as the type of condition tested.
	EA_CND_RTE		<i>Condition subselector</i> Enter one of the following values:
		CAC	<i>Equal-access carrier access code</i> Enter CAC as the condition subselector tested for an equal access call where 10XXX was dialed.

OFRT selector NOT (continued)**Field descriptions for conditional datafill**

Field	Subfield or refinement	Entry	Explanation and action
		INTNL	<i>Equal access international</i> Enter INTNL as the condition subselector tested for an equal access international call.
		PIC	<i>Equal access presubscribed interexchange carrier</i> Enter PIC as the type of condition tested for an equal access call. This condition is used for inter-LATA call routing from an EAEO to an AT that includes the TOPS inter-LATA carrier service (TICS). If the PIC condition subselector is used, table OFRT is set up such that the primary route is taken for non-PIC calls and the secondary route is taken for PIC calls.

CNDSEL = INTERLATA (DMS-200 AT)

Condition INTERLATA can be used provided that the following conditions are not:

- The feature package NTX821AA (Tandem Operator Services Routing) is present.
- Table TRKLATA contains at least one tuple for each incoming trunk for which this conditional selector is used.
- Table DATAOLA is datafilled.

The condition INTERLATA is true or false as follows:

- INTERLATA condition is true for all international calls. Tables TRKLATA and LATAOLA are not used for international calls.
- INTERLATA condition is false for all 0- calls. Tables TRKLATA and LATAOLA are not used for 0- calls.
- INTERLATA condition is false for all privilege calls.
- INTERLATA condition is false for all other calls if an entry is not found in either table TRKLATA or table LATAOLA.
- If an entry is found in both tables TRKLATA and LATAOLA, INTERLATA condition is true if table LATAOLA field LATAINTER and INTERLATA condition is false if table LATAOLA field LATAINTRA.

OFRT selector NOT (continued)

The originating trunk group CLLI and the calling number index into table TRKLATA to obtain the originating local access and transport area (LATA) of the call. For operator number identification (ONI) and automatic number identification (ANI)-fail calls, the digits 000 are the calling digits.

The originating LATA and the called number index into table LATAXLA to determine the inter-LATA or intra-LATA status of the call.

If the above condition is met, translation proceeds as specified in field CONDRTE. Otherwise, the call proceeds as specified in the next tuple.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	INTERLATA	<i>Condition selector</i> Enter INTERLATA as the type of condition tested.

CNDSEL = MIGRATE

Use condition MIGRATE if translation proceeds as specified in field CONDRTE unconditionally.

This condition occurs when the terminator has the MIGRATE option. The translation does not proceed unconditionally.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	MIGRATE	Enter MIGRATE if the call is to be transferred to a route list or element based on the assignment of the MIGRATE line option to the terminating DN.

CNDSEL = NRR (MARS)

Use condition network blocking reroute (NRR) in an office with feature AD2641 ((F1) MARS - Meridian Automatic Route Selection). The condition is met if there are no available outgoing trunks at any one of the tandem

OFRT selector NOT (continued)

switches in the path on ISDN user part (ISUP) or primary access rate (PRA) call from an originating switch.

In a corporate network with PRA or ISUP facilities, the tandem switch sends a release message back to the originating switch if it has no available outgoing trunks. If the call is over PRA, the release message has the cause of ISDN_NO_CHANNEL_OR_CIRCUIT_AVAILABLE. If the call is over ISUP, the release message has a cause of CI_NO_CIRCUIT_AVAILABLE.

Upon receiving the release message, the originating switch can be programmed using selector CNDSEL(NRR) to re-route the call instead of terminating the call in a treatment to the end user based on the cause.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	NRR	<i>Condition selector</i> Enter NRR as the type of condition tested.

CNDSEL = RND

Use condition percentage of call selected randomly (RND) if translation proceeds as specified in the next tuple based on the percentage specified on a random basis. Otherwise, the call proceeds as specified in field CONDRTE.

Datafill fields CNDSEL and PERCENT as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	RND	<i>Condition selector</i> Enter RND as the type of condition tested.
	PERCENT	0 to 100	<i>Percent</i> Enter the percentage of calls affected.

CNDSEL = SITE

Use condition SITE in a remote switching center (RSC) where trunks are connected to remotes creating a network of alternate routes for completing a call. The most efficient route for a specific call then depends on the site of the originator.

OFRT selector NOT (continued)

Translation proceeds as specified in the next tuple on condition that the site of the originator of the call matches the entry specified in field SITE. Otherwise, the call proceeds as specified in field CONDRTE.

To optimize this condition, trunk groups must be unique by site and all the trunk members of that trunk group must belong to that specific site.

Datafill fields CNDSEL and SITE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	SITE	<i>Condition selector</i> Enter SITE as the type of condition tested.
	SITE	HOST or alphanumeric	<i>Site name</i> Enter HOST or a site name known to table SITE.

CNDSEL = TOD (IBN)

Use condition time of day (TOD) if translation proceeds as specified in the next tuple on condition that one of the times specified in field TIMES is compatible with one of the times specified in table TIMEODAY. Otherwise, the call proceeds as specified in field CONDRTE.

Up to 14 of the times specified in table TIMEODAY is entered. No spaces are left between the times.

Datafill fields CNDSEL, TODNAME, and TIMES as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOD	<i>Condition selector</i> Enter TOD as the type of condition tested.

OFRT selector NOT (continued)**Field descriptions for conditional datafill**

Field	Subfield or refinement	Entry	Explanation and action
	TODNAME	alphanumeric	<i>Time of day name</i> Enter the name assigned to the entry in the table TIMEODAY to which translation routes.
	TIMES	0 to 9or A to F	<i>Times</i> Enter the times at which the transfer to another route list or element occurs. An entry outside of this range is invalid.

CNDSEL = TOPEAALT

Use condition TOPEAALT (TOPS equal access alternate carrier) for TOPS with feature AF1781 (Alternate Carrier Selection). The call proceeds as specified in the next tuple on condition that the call is routed to an alternate carrier and the call is not at a TOPS position. Otherwise, the call proceeds as specified in field CONDRTE.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOPEAALT	<i>Condition selector</i> Enter TOPEAALT as the type of condition tested.

CNDSEL = TOPEACLS

Use condition TOPS equal access class of service (TOPEACLS) if the call proceeds as specified in the next tuple on condition that the class of service of an incoming call matches with field TOP_CND_RTE. Otherwise, the call proceeds as specified in field CONDRTE. There are as many route list

OFRT selector NOT (continued)

elements as there are classes of service. Datafill fields CNDSEL and TOP_CND_RTE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOPEACLS	<i>Condition selector</i> Enter TOPEACLS as the type of condition tested.
	TOP_CND_RTE		<i>TOPS equal access class of service</i> Enter one of the following values:
		EACoin	Equal access coin
		EAHOTEL	Equal access hotel
		EARBILL	Equal access restricted billing lines
		EACAMA	Equal access 1+ type calls that do not require operator assistance
		EACAMAFL	Equal access CAMA ANI fail (for example, 1+ CAMA type nonoperator calls that are ANI fail). Note: This is equivalent to the former EANONANI
		EACAMONI	Equal access CAMA ONI (for example, 1+ CAMA type nonoperator calls that are ONI)
		EAOTHOPR	Equal access other operator. (for example, all other operator-assisted type calls that have ANI success)
		EAOPANIF	Equal access other operator ANI fail (for example, all other operator assisted type calls that have ANI failure)
		EAOPONI	Equal access other operator ONI (for example, all other operator assisted type calls that are ONI)

CNDSEL = TOPEAXFR

Use condition TOPS with the Alternate Carrier Selection feature (TOPEAXFR) if the call proceeds as specified in the next tuple on condition

OFRT selector NOT (continued)

that the call is marked as a carrier transfer call by a TOPS operator (XFR IC indicated on the TOPS operator display prior to the call being released). Otherwise, the call proceeds as specified in field CONDRTE.

Datafill field CNDSEL as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	TOPEAXFR	<i>Condition selector</i> Enter TOPEAXFR as the type of condition tested.

CNDSEL = SNPA

Use condition SNPA in an office with feature Conditional Routing Based on SNPA.

Translation proceeds as specified in the next tuple on condition that the SNPA of the originator of the call matches the entry specified in field SNPA_CND_RTE. Otherwise, the call proceeds as specified in field CONDRTE.

Datafill fields CNDSEL and SNPA_CND_RTE as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CNDSEL	SNPA	<i>Condition selector</i> Enter SNPA as the type of condition tested.
	SNPA_CND_RTE	numeric (3 digits)	<i>Conditional route SNPA</i> Enter the three digit code for the SNPA.

OFRT selector NOT (continued)

Routing options

Each of the above formats with route selector NOT have field CONDRTE which is datafilled as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	CONDRTE	see subfields	<i>Conditional route</i> This field consists of subfields RTETYPE, RTEREF, SKIPNUM, EXTRTEID, TABNAME, and INDEX.

Route to specified route list in this (same) table

If the call is transferred to another route list in the same table, datafill fields RTETYPE and RTEREF as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	RTETYPE	ST	<i>Route type</i> Enter ST (same table) as the route type.
	RTEREF	1 to 1023	<i>Route reference number</i> Enter the route reference number (must be a higher number in the same table) to where translation transfers if the condition is met. An entry outside of this range is invalid.

OFRT selector NOT (continued)**Route after skipping specified number of route elements**

If the call skips to another route element (within the same route list), datafill fields RTETYPE and SKIPNUM as follows:

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	RTETYPE	SK	<i>Route type</i> Enter SK (skip) as the route type.
	SKIPNUM	0 to 7	<i>Skip number</i> Enter the number of elements to skip (within the same route list) if the condition is met.

Route to specified table at specified index

If the call is transferred to another route list in table OFRT, datafill fields RTETYPE and EXTRTEID as follows.

Field descriptions for conditional datafill

Field	Subfield or refinement	Entry	Explanation and action
	RTETYPE	T	<i>Route type</i> Enter T (transfer) as the route type.
	EXTRTEID	see subfields	<i>External route identifier</i> This field consists of subfields TABNAME and INDEX.
	TABNAME	OFRT, OFR2, OFR3, OFR4, TOPS, IBNRT2, IBNRT3, IBNRT4, IBNRTE	<i>Table name</i> Enter the office route table name to which translation transfers when the condition is met.
	INDEX	0 to 1023	<i>Route reference index</i> Enter the route reference index number in table OFRT, to where translation transfers when the condition is met. An entry outside of this range is invalid.

OFRT selector NOT (continued)**Field descriptions for conditional datafill**

Field	Subfield or refinement	Entry	Explanation and action
	KEY	RRTE	
	TABREF	IRTE	
	XLASYS	AC, AM, CT, FA, FT, NSC, OFC, PX or NIL	Translation system. If the entry in subfield TABREF is IRTE, datafill this refinement. Enter the next translation system to use, followed by a space, then datafill refinement XLANAME. Enter one of the following: • AC (access) • AM (ambiguous) • CT (country) • FA (foreign area) • FT (utility) • NSC (number service code) • OFC (office) • PX (prefix)
	XLANAME	alphanumeric (1 to 8 characters)	Translation name. If the entry in subfield TABREF is IRTE, datafill this refinement. Enter the translation name of the table within the XLASYS to which the call is routed.

Datafill example

The following examples show sample datafill for table OFRT selector NOT.

Example 1

This is an example of extending a route list that requires more than eight route elements. The last element in the route list contains the conditional selector ALWAYS, and transfers to a higher route list in the same table.

OFRT selector NOT (continued)

MAP display example for table OFRT selector NOT

RTE	RTELIST
1	(NOT ALWAYS) (ST 25) \$

Example 2

If the call passes class of service when the class of service mapping MAP1 is performed on its NCOS or time of day NCOS, skip three elements in the route list. Otherwise, go to next element in route list.

MAP display example for table OFRT selector NOT

RTE	RTELIST
2	(NOT COSMAP MAP1) (SK 3) \$

Example 3

If this call has previously been over a satellite link, go to route list 35 in table OFR4. Otherwise, go to next element in route list.

MAP display example for table OFRT selector NOT

RTE	RTELIST
5	(NOT CALLCHR SAT) (T OFR4 35) \$

Example 4

If time is equal to the times specified in table TIMEODAY for routes 4 and F for time of day name CUST01, skip one element in route list.

OFRT selector NOT (end)

MAP display example for table OFRT selector NOT

RTE	RTELIST
28	(NOT TOD CUST01 4F) (SK 1)\$

Example 5

This is an example of possible datafill for the conditional selectors TOPEAALT and TOPEAXFR.

MAP display example for table OFRT selector NOT

RTE	RTELIST
50	(NOT TOPEAALT) (SK 1) (S D ALTCAR2) (SD OGEACAR2)\$
120	(NOT TOPEAXFR) (SK 1) (S D ALTCAR2) (S D OGEACAR2)\$

Example 6

An example of datafill for the MIGRATE option follows:

MAP DISPLAY example for selector NOT, MIGRATE option

TABLE OFNRT
520 (NOT MIGRATE SK 2) (DN 214 520 4) (CND ALWAYS SK 1) (T OFRT 895) \$

Table history

SN06 (DMS)

Added CND and NOT conditional routes for feature A00001207.

OFRT selector NPOS

RTESEL = NPOS

Route selector NPOS is used as follows:

To indicate that no calling number identification is required for ONI (operator number identification) from multiparty line or ANI (automatic number identification) failure DD (direct dial).

For calls received over SuperCAMA (SC) or Traffic Operator Position System (TOPS) trunk group types.

In the following cases selector NPOS is equivalent to route selector N:

- calls originated from trunk group types other than SC or TOPS
- calls without ONI or ANI-failure indication

Data II

The following table lists the datafill for table OFRT selector NPOS.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. Entries outside the indicated range are invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements RTESEL, CONNTYPE, CLLI, DELDIGS, PRFXDIGS, and CANCEORC.

OFRT selector NPOS (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	RTESEL	NPOS	<i>Route selector</i> Enter NPOS.
	CONNTYPE	D	<i>Connection type</i> This field is not used by the system logic. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.
	DELDIGS	0 to 15	<i>Delete digits</i> Enter the number of digits deleted before outputting.

OFRT selector NPOS (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	PRFXDIGS	0 to 9, B, C, D, E, F, or N	<i>Prefix digits</i> If digits or control signals or both are prefixed, enter up to nine prefix digits or equivalents. The following is a list of control signals and their digit equivalents: C11 = BC12 = CKP = DKP2 = EST3P = BSTP = CSTKP = DST2P = EST = F If no digits are prefixed, enter N (no).
	CANCNORC	Y or N	<i>Cancel normal charge</i> If the type of call is direct dial (DD) and no charge is required for the call, or type of call is no-prefix (NP) and coin is returned to prepay or coin-dial-tone-first line, enter Y (yes). Otherwise, enter N (no). If the call is routed to an announcement and the call is billed (coins collected, off hook returned, message rate pegged), enter Y. Otherwise, enter N. If field CANCNORC is equal to Y, the call is charged. If this field is set to Y, then a nonrevenue call is assumed and reflected in the call code of the bearer capability (BC) automatic message accounting (AMA) record. If this field is set to N, then a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).

Data I l e x a m p l e

The following example shows sample datafill for table OFRT selector NPOS.

OFRT selector NPOS (end)

MAP display example for table OFRT selector NPOS

RTE	RTELIST
11	(NPOS D PRAESP 0 N N) \$

OFRT selector NPOSDN

RTESEL = NPOSDN

Route selector NPOSDN is used to indicate that no calling number identification is required for ONI (operator number identification) from multiparty line, or automatic number identification (ANI)-failure direct dial (DD) for calls received over SuperCAMA (SC) or Traffic Operator Position System (TOPS) trunk group types.

In the following cases, selector NPOSDN is equivalent to route selector DN:

- calls originated from trunk group types other than SC or TOPS
- calls without ONI or ANI-failure indication

Data II

The following table lists the datafill for table OFRT selector NPOSDN.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements SNPA and OFCCODE.
	RTESEL	NPOSDN	<i>Route selector</i> Enter NPOSDN.

OFRT selector NPOSDN (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	SNPA	numeric	<i>Serving NPA</i> Enter the serving numbering plan area code of the destination address.
	OFCCODE	numeric	<i>Office (nnx) code</i> Enter the first three to seven digits of the dialed destination address.

Data l l e x a m p l e

The following example shows sample datafill for table OFRT selector NPOSDN.

MAP display example for table OFRT selector NPOSDN

RTE	RTELIST
7	(NPOSDN 613 225 2600)\$

OFRT selector QH

RTESEL = QH (IBN)

Route selector QH (queue head) is used if the route list contains cheap and expensive routes. Any route list element after the QH is considered more expensive than the one before the QH. Selector QH is used with call back and off-hook queuing to separate the low-tariff and high-tariff elements. The off-hook queuing waiting time associated with the route list is also required. If there is no expensive route, the last element in the route list must have this selector. If route selector QH is used in table OFRT, it routes the call to treatment. Due to this routing action, selector QH is only used in table IBNRTE.

Data II

The following table lists the datafill for table OFRT selector QH.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinement OHQWT.

OFRT selector QH (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	RTESEL	QH	<i>Route selector</i> Enter Integrated Business Network (IBN) route selector QH.
	QTIME	2 to 60	<i>Off-hook queuing waiting time</i> Enter the time, in 1 s intervals, for the off-hook queuing time. An entry outside of this range is invalid.

Data I l e x a m p l e

An example of datafill for a route element with the selector QH is shown below. Any route list element after the QH is considered more expensive than the one before the QH.

The off-hook queuing time is 15 s.

MAP display example for table OFRT selector QH

RTE	RTELIST
4	(QH 15) \$

OFRT selector RT

RTESEL = RT

Route selector RT (retranslate) is used if the incoming dialed digits are replaced in their entirety by the number (maximum 11 digits) specified in field REPLDIGS and the call is retranslated starting from table HNPACONT.HNPACODE for the serving NPA specified in field SNPA. Note that class of service screening is not accessed on the retranslated part of the call because this process has occurred previously. HNPA and FNPA tables, however, are accessed.

Selector RT designates retranslation. This selector inserts new digits before retranslation is attempted. The DMS software assumes that the RT route element lists are final if a call advances to an route element in the list during call processing translations.

Data II

The following table lists the datafill for table OFRT selector RT.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: RTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements SNPA, TYPCALL, ORIGSCRE, REPLDIGS, CANCNORC, and BILLCODE.
	RTESEL	RT	<i>Route selector</i> Enter RT.

OFRT selector RT (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	SNPA	numeric	<i>Serving numbering plan area</i> Enter the NPA of the HNPACONT table to which translation proceeds for translation of the replace digits.
	TYPCALL	DD, NP or OA	<i>Type of call</i> Enter the type of call associated with the replace digits: DD (direct dial), NP (no prefix), or OA (operator assisted). An entry outside of this range is invalid.
	ORIGSCRE	LCL or NLCL	<i>Originating source</i> Enter the originating source associated with the replace digits, LCL (local) or NLCL (nonlocal).
	REPLDIGS	numeric (up to 11 digits)	<i>Replace digits</i> Enter the digits that replace the dialed digits.
	CANCNORC	Y or N	<i>Cancel normal charge</i> Enter Y (yes) if type of call is DD and charge is canceled. Otherwise, enter N (no). If the call is routed to an announcement and the call is billed (coins collected, off-hook returned, message rate pegged), enter Y. Otherwise, enter N. If field CANCNORC is equal to Y, the call is charged. If this field is set to Y, then a nonrevenue call is assumed and reflected in the call code of the bearer capability (BC) automatic message accounting (AMA) record. If this field is set to N, a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).

OFRT selector RT (end)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	BILLCODE	numeric (up to 11 digits) or N	<i>Billing code</i> If the route is centralized automatic message accounting (CAMA) and a billing number is required, enter the 7-digit directory number to which the call is charged. If the route is local automatic message accounting (LAMA) and a billing number is required, enter the ten-digit directory number to which the call is charged. If a billing number is not required, enter N (no).
	OPTION	RC or \$	<i>Option</i> Enter RC for routing characteristic if a different routing characteristic is required for ISDN calls, and datafill field RCNAME. Otherwise, enter \$ to indicate that no option is required.
	RCNAME	alphanumeric or blank	<i>Routing characteristic</i> If field OPTION is set to RC, enter an ISDN routing characteristic defined in table RCNAME. Otherwise, leave this field blank.

Data example

The following example shows sample datafill for table OFRT selector RT.

MAP display example for table OFRT selector RT

RTE	RTELIST
12	(RT 613 NP LCL 365 N N RC 64KNAME) \$

OFRT selector RX

RTESEL = RX (IBN)

Route selector RX (retranslate) is used when retranslation of dialed digits is required and the new digits are specified in table DIGMAN.

Selector RX designates retranslation. This selector inserts new digits before retranslation is attempted. The DMS software assumes that the RX route element lists are final if a call advances to a route element in the list during call processing translations.

Data II

The following table lists the datafill for table OFRT selector RX.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023, blank	Route reference index. If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	Route list. This field consists of subfield RTESEL and refinements STS, TYPCALL, DMI, and BILLDMI.
	RTESEL	RX	Route selector. Enter RX.
	STS	numeric	Serving translation scheme. Enter the numbering plan area (NPA) of table HNPACONT to which translation proceeds for translation of the replace digits.

OFRT selector RX (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	TYPCALL	DD, NP, OA	Type of call. Enter the type of call associated with the replace digits: DD (direct dial), NP (noprefix), or OA (operator assisted). An entry outside of this range is invalid.
	DMI	1 to 32 767, 0	Digit manipulation index. Enter the index into table DIGMAN (the Digit Manipulation table) when the called party number is modified before outpulsing. Otherwise enter 0 to indicate that digit manipulation in table DIGMAN is not required.
	BILLDMI	0 to 32 767	Digit manipulation index billing number. Enter the DMI to alter the billing number.
	OPTION	RC or \$	Option. Enter RC for routing characteristic if a different routing characteristic is required for ISDN calls, and datafill field RCNAME. Otherwise, enter \$ to indicate that no option is required.
	RCNAME	alphanumeric or blank	Routing characteristic. If field OPTION is set to RC, enter an ISDN routing characteristic defined in table RCNAME. Otherwise, leave this field blank.

Data l l e x a m p l e

The following example shows sample datafill for table OFRT selector RX.

MAP display example for table OFRT selector RX

RTE	RTELIST
10	(RX 514 DD 104 104 RC 64KNAME) \$

OFRT selector S

RTESEL = S

Route selector S is used if the outgoing or two-way trunk group is intertoll and standard digit manipulation is required. Standard digit manipulation cannot be performed for routes that are specified in a standard pretranslator.

Route selector S is also used in an equal access end office (EAEO), only on a domestic call going directly to a carrier on an automatic time and charges (ATC) trunk. In this case the called digits are outpulsed as dialed and no numbering plan area (NPA) is inserted or deleted by the S selector. The translation system must be NA (national). The N selector must be used for all other calls in the EAEO (such as tandem calls or direct international calls) and all feature group D (FGD) calls in the access tandem (AT).

If the ABC digits dialed are represented in table HNPACODE by code types FNPA, FRTD, FRTE, OPC3, OPC4, or OPC5, the following standard digit manipulation logic is applicable:

- If the ABC digits dialed are equal to the connecting NPA (CONNGNPA) specified in the intertoll trunk group data, the ABC digits are deleted from the digits outpulsed unless the called NPA is equal to the serving NPA and is not a toll center code (TCC). If routing to your own NPA through a different NPA, then the serving NPA is prefixed, unless it was already dialed.
- If the ABC digits dialed are equal to the connecting NPA (CONNGNPA) and the DEF digits are equal to the terminating toll center code specified in the intertoll trunk group data, the ABCDEF digits are deleted from the digits outpulsed.

If the ABC digits dialed are represented in table HNPACODE by code type HRTE, TTC, SCD3, or SCD4, the following standard digit manipulation is applicable:

- If the serving NPA (SVGNPA) and the connecting NPA (CONNGNPA) in the intertoll trunk group data are not equal, the serving NPA specified in the intertoll trunk group data is prefixed to the digits outpulsed.
- If the serving NPA (SVGNPA) and the connecting NPA (CONNGNPA) in the intertoll trunk group data are equal, and the ABC digits dialed are equal to the terminating toll center code (TTC) specified in the intertoll trunk group data, the ABC digits are deleted from the outpulsed digits.

Selector S is used if outgoing or two-way trunk group is other than intertoll, and no digit outpulsing is required, or if digit deletion is performed by the trunk group logic. See the description of table TRKGRP.

OFRT selector S (continued)

This selector is used for the routing of calls to announcement or tones.

Data II

The following table lists the datafill for table OFRT selector S.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements CONNTYPE and CLLI.
	RTESEL	S	<i>Route selector</i> Enter S.
	CONNTYPE	D	<i>Connection type</i> This field is not used by system logic. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.

Data II e xample

The following example shows sample datafill for table OFRT selector S.

OFRT selector S (end)

MAP display example for table OFRT selector S

RTE	RTELIST
5	(S D SD54) \$

OFRT selector SG

RTESEL = SG

Use route selector SG under the following conditions:

- There are a large number of trunk groups assigned to the same dialed number (for example, to an Internet service provider [ISP]).
- There are long hold times.
- Trunk use is for outgoing calls only.

Route selector SG allows selection of a trunk group from the groups in table SUPERTKG (Super Trunk Group). Table SUPERTKG joins up to 220 ISDN primary rate interface (PRI) trunk groups (defined in table TRKGRP) together into super-groups.

Route selector SG also allows optional entries to table DIGMAN for digit manipulation of called number characteristics.

To use route selector SG, enter SG in table OFRT subfield RTESEL. Selector SG has five subfields: ALGORITHM, ATTEMPTS, SUPERTKG_NAME, OPTIONS and CALLTYPE.

For even call distribution across trunk groups defined in super-groups, use the following selection algorithms together:

- CHCL super-group selection algorithm in table OFRT with SG_CWCTH selection algorithm in table TRKGRP
- CHCCL super-group selection algorithm in table OFRT with SG_CCWCTH selection algorithm in table TRKGRP

Datafill

The table that follows lists datafill for table OFRT selector SG.

Field descriptions

Field	Subfield	Entry	Explanation and action
RTE		1 to 1023 or blank	Route reference index. If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank.
RTELIST		see subfield	Route list. This field includes subfield RTESEL.

OFRT selector SG (continued)**Field descriptions**

Field	Subfield	Entry	Explanation and action
	RTESEL	SG	Route selector. This subfield indicates the route selector. Enter SG (super-group) and datafill subfields ALGORITHM, ATTEMPTS, SUPERTKG_NAME, DMI and CALLTYPE.
	ALGORITHM	CHCL, CHCCL, CYC, RND	Algorithm. This subfield indicates the selection algorithm for trunk groups defined in table SUPERTKG. Enter one of the following values: • Enter CHCL for circular hunting in the clockwise direction. • Enter CHCCL for circular hunting in the counterclockwise direction. • Enter CYC for cyclical hunting. For each call routed through the super-group, the switch selects the trunk group after the last searched trunk group to search in sequence. • Enter RND for random hunting. For each call routed through the super-group, the switch randomly selects the first trunk group to search.
	ATTEMPTS	numeric (1 to 220)	Maximum number of search attempts. This subfield indicates the maximum number of trunk groups to search for a free trunk member. For ALGORITHM settings CHCL and CHCCL, set subfield ATTEMPTS to a value less than or equal to 50. This recommended limit reduces real-time use during searches in the 220 possible trunk groups in table SUPERTKG.

OFRT selector SG (continued)

Field descriptions

Field	Subfield	Entry	Explanation and action
			The following warning message displays if the ATTEMPTS value exceeds 50 for ALGORITHM setting CHCL or CHCCL: Warning : Recommended ATTEMPTS value for CHCL and CHCCL is 50 Note: The recommended ATTEMPTS value of 50 is based on a total of 23 B-channels in each trunk group. With non-facility associated signaling, reduce the ATTEMPTS value so that the total number of B-channels searched in a super-group does not exceed 1150.
	SUPERTKG_NAME	alphanumeric (1 to 16 characters)	Super-group name. This subfield indicates the super-group name from table SUPERTKG.
	OPTIONS	see subfield.	Enter up to two options with DMI refinements.

OFRT selector SG (continued)**Field descriptions**

Field	Subfield	Entry	Explanation and action
	DMI	numeric (1 to 32 766)	Enter DMI and the index number to table DIGMAN. This option allows the called number characteristics to be manipulated by the action of table DIGMAN. This is an index into table DIGMAN.
	CALLTYPE	PUBlic, PriVaTe, WATS,ASDS, LDS, Foreign eXchange, TIE, INWATS	Call Type. This subfield allows for switching of routing call-types on an as-needed basis. • Enter PUB for public routing of calls. Operator Access Type (OATYPE) has options (NONE, 0M, 0P). Transit Network Selector (TNS) has values (0 to 999, N, C). NPOS has values N, Y. • Enter PVT for private routing of calls. Facility Number (FACNUM) has values 0 to 1023. Numbering Plan Indicator (NPI) has values E164 and PVT. • Enter WATS for WATS routing of calls. Zone is ZONE_TYPE. Numbering Plan Indicator (NPI) has values E164 and PVT. CARRIER IS VECTOR OF UP TO 1 IC_INC_CARRIER_NAME'S. • Enter ASDS for ASDS routing of calls. Numbering Plan Indicator (NPI) has values E164 and PVT. • Enter LDS for LDS routing of calls. Numbering Plan Indicator (NPI) has values E164 and PVT. • Enter FX for foreign exchange routing of calls. Facility Number (FACNUM) has values 0 to 1023. Numbering Plan Indicator (NPI) has values E164 and PVT. • Enter TIE for TIE routing of calls. Facility Number (FACNUM) has values 0 to 1023. Numbering Plan Indicator (NPI) has values E164 and PVT. • Enter INWATS for INWATS routing of calls. Facility Number (FACNUM) has values 0 to 1023. Numbering Plan Indicator has values E164 and PVT.

OFRT selector SG (end)

Datafill example

The figure that follows shows sample datafill for table OFRT selector SG.

MAP display example for table OFRT selector SG

RTE	RTELIST OPTIONS
99	(SG RND 3 ISP5GRP3 \$) (SG CYC 10 ISP5GRP4 \$) \$

The following example shows sample datafill for table OFRT selector SG. The route shown in this example has subfield ALGORITHM set to CHCL (clockwise circular hunting). The maximum number of search attempts (subfield ATTEMPTS) is 10.

MAP display example for table OFRT selector SG

RTE	RTELIST OPTIONS
155	(SG CHCL 10 ISP4GRP1 \$) \$

MAP display example for table OFRT selector SG

RTE	RTELIST OPTIONS
696	(SG CYC 10 KNGARG (DMI 1010) \$)\$ \$

The following example shows sample datafill for Table OFRT selector SG subfield CALLTYPE.

MAP display example for Table OFRT selector SG subfield CALLTYPE

TABLE: OFRT
773 (SG CHCL 50 PRIGRP1 PUBLIC \$)\$
774 (SG CHCL 50 PRIGRP1 PRIVATE \$)\$

OFRT selector ST

RTESEL = ST

Route selector ST (same table), is used if more than eight route list elements are needed. Translation proceeds to the specified route reference index in the same table (used for chaining together route lists in the same table).

The route reference index specified with an ST selector must be greater than the route reference index of the route list in which the ST selector occurs (that is, in OFRT 25, the RTEREF must be at least 26).

Data II

The following table lists the datafill for table OFRT selector ST.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinement RTEREF.

OFRT selector ST (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	RTESEL	ST	<i>Route selector</i> Enter ST.
	RTEREF	1 to 1023	<i>Same table route reference index</i> Enter the route reference index, within the same table, to which translation is routed (used for chaining route lists together). The route reference index provided as data for the ST selector must be greater than the index of the route list in which it is inserted (that is, in OFRT 25, RTEREF must be at least 26). An entry outside of this range is invalid.

Data l l e x a m p l e

The following example shows sample datafill for table OFRT selector ST.

MAP display example for table OFRT selector ST

RTE	RTELIST
14	(ST 123) \$

OFRT selector SX

RTESEL = SX

Route selector SX is a clone of route selector S with the addition of one field, ROUTATTR_INDEX. This field contains the index into table ROUTATTR which contains the expanded routing information to be applied to the call.

Interpretation and use of route selector SX is product dependent. By default, field ROUTATTR_INDEX remains empty and the SX selector does nothing.

Route selector SX is used if the outgoing or two-way trunk group is intertoll and expanded standard digit manipulation is required. Expanded standard digit manipulation cannot be performed for routes that are specified in a standard pretranslator.

Route selector SX is also used in an equal access end office (EAEO), only on a domestic call going directly to a carrier on an automatic time and charges (ATC) trunk. In this case the called digits are outputted as dialed and no numbering plan area (NPA) is inserted or deleted by the SX selector. The translation system must be NA (national). The N selector must be used for all other calls in the EAEO (such as tandem calls or direct international calls) and all feature group D (FGD) calls in the access tandem (AT).

Route selector SX is used if outgoing or two-way trunk group is other than intertoll, and no digit outputting is required, or if digit deletion is performed by the trunk group logic. See the description of table TRKGRP.

This selector is used for the routing of calls to announcement or tones.

OFRT selector SX (continued)**Data II**

The following table lists the datafill for table OFRT selector SX.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements CONNTYPE and CLLI.
	RTESEL	SX	<i>Route selector</i> Enter SX.
	CONNTYPE	D	<i>Connection type</i> This field is not used by system logic. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.
	ROUTATTR_IN DEX	alphanumeric (1 to 16 characters)	<i>Route attribute index</i> Enter the index into table ROUTATTR containing the expanded routing information to be applied to the call.

OFRT selector SX (end)

Data I l e xample

The following example shows sample datafill for table OFRT selector SX.

MAP display example for table OFRT selector SX

RTE	RTELIST
5	(S D SD54 RTEATTR_INDEX) \$

OFRT selector T

RTESEL = T

Route selector T is used if translation routes to terminating test line (table TTL4), network management reroute (subtable REROUTE.NWMRROUT), Traffic Operator Position System (table TOPS), Integrated Business Network (IBN) Route (table IBNRTE), office route (table OFRT), or overseas route (tables OVR0 to OVR89).

Selector T is routed to during call processing translation, the DMS software assumes that the current route list is exhausted. Any subsequent route list elements are not routed to within the list.

For example, assume selector T is used in a route list before selector N. In this case, routing advances to the table and the selector T route element list points to the next step in translation. If the table route is exhausted, the table is exited and translation is stopped. Selector N is not advanced to, even though selector N is in the route element list after selector T.

Data II

The following table lists the datafill for table OFRT selector T.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this entry blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinement EXTRTEID.

OFRT selector T (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	RTESEL	T	<i>Route selector</i> Enter T.
	EXTRTEID	see subfields	<i>External route identifier</i> This field consists of subfields TABID and KEY.
	TABID	IBNRTE, IBNRT2, IBNRT3, IBNRT4, OFRT, OFR2, OFR3, OFR4, OSNCCAP, RRTE, TOPS, TTL4OPS, or OVRx (where x is 0 to 89)	<i>Table identifier</i> Enter OFRT, OFR2, OFR3, OFR4, TTL4, TOPS, OSNCCAP, IBNRTE, or OVRx (where x is 0 to 89) for the table name to which translation routes. Enter RRTE if translation proceeds through the network management reroute feature and subtable REROUTE.NWMRRROUT. Additional information is provided in the description of subtable REROUTE.NWMRRROUT.
	KEY	1 to 1023	<i>Key</i> Enter the index into the required table or subtable. An entry outside of this range is invalid.

Data file example

The following example shows sample datafill for table OFRT selector T.

MAP display example for table OFRT selector T

RTE	RTELIST
45	(T IBNRTE 34)

OFRT selector TC

RTESEL = TC

Route selector TC is required if the route list can only be accessed by the directory number or trunk that is defined in the first element of the route list.

Data II

The following table lists the datafill for table OFRT selector TC.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements TESTSEL, LEN, CLLI, or MEMBER.
	RTESEL	TC	<i>Route selector</i> Enter TC.
	TESTSEL	L or T	<i>Test selector</i> If the route is accessed from the line whose line equipment number (LEN) is specified, enter L. If the route is accessed from the trunk whose code and member number is specified, enter T.

OFRT selector TC (continued)**TESTSEL = L (non-ISDN lines)**

If field TESTSEL is L, datafill field LEN for non-ISDN lines as follows.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	LEN	see subfields	<i>Line equipment number</i> This field defines the physical location of the equipment that is connected to a specific telephone line. Because field LEN is common to more than 60 tables, it is documented in a single section to avoid unnecessary duplication. Refer to section "Common entry field LEN" for a complete description of field LEN and associated subfields. Field LEN consists of subfields SITE, FRAME, UNIT, DRAWER or LSG, SHELF, SLOT, and CIRCUIT.

TESTSEL = L (ISDN lines)

If field TESTSEL is L, datafill field LEN for ISDN lines as follows.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	LEN	see subfields	<i>Line equipment number</i> This field defines the physical location of the equipment that is connected to a specific telephone line. Because field LEN is common to more than 60 tables, it is documented in a single section to avoid unnecessary duplication. Refer to section "Common entry field LEN" for a complete description of field LEN and associated subfields. For ISDN lines, field LEN consists of subfield LTID. For non-ISDN lines, field LEN consists of subfields SITE, FRAME, UNIT, DRAWER or LSG, SHELF, SLOT, and CIRCUIT.

OFRT selector TC (end)**TESTSEL = T**

If field TESTSEL is T, datafill fields CLLI and MEMBER as follows.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code, assigned to the trunk group in table CLLI.
	MEMBER	0 to 9999	<i>Member number</i> Enter the external trunk number assigned to the trunk.

Data II e xample

The following example shows sample datafill for table OFRT selector TC.

MAP display example for table OFRT selector TC

RTE	RTELIST
63	(TC T XYZ100 21)\$

OFRT selector TPBX

RTESEL = TPBX

Route selector TPBX is used in a DMS-250 to route calls through table DIGMAN to private branch exchanges (PBX) in a DMS-250 to PBX configuration.

Selector TPBX cannot be used in any type of office for which this table description is intended: DMS-100, DMS-200, and DMS-300 including Meridian Digital Centrex (MDC), ISDN, Centralized Automatic Message Accounting (CAMA), Traffic Operator Position System (TOPS), and Auxiliary Operator Services System (AOSS).

Data II

This table description does not cover DMS-250 and the detailed description of selector TPBX is not provided.

OFRT selector TRMT

RTESEL = TRMT

Route selector TRMT (treatment) is used if a call is routed to treatment.

Data II

The following table lists the datafill for table OFRT selector TRMT.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements RTETRMT.
	RTESEL	TRMT	<i>Route selector</i> Enter TRMT.
	RTETRMT	alphanumeric	<i>Route treatment</i> Enter the required treatment routed to. A list of valid treatments can be found in subtable TMTCNTL.TREAT.

Data II e xample

The following example shows sample datafill for table OFRT selector TRMT.

OFRT selector TRMT (end)

MAP display example for table OFRT selector TRMT

RTE	RTELIST
1	(TRMT BNCI) \$

OFRT selector TS

RTESEL = TS**Two-stage outpulsing**

Route selector TS is provided in switching units that require two-stage outpulsing for international direct dial (DD) calls.

The first stage of outpulsing is composed of key pulse (KP) + three or six digits + signaling terminal (ST).

Field FSTNUM and FSTSTAGE equal to 3 and xxx

If the first stage is three digits, the following is the outpulsing format (the value of xxx is supplied by the operating company):

KP + xxx + ST

Field FSTNUM and FSTSTAGE equal to 6 and xxxxxx

If the first stage is six digits and six (xxxxxxx) digits are specified by the operating company, the following is the outpulsing format:

KP + xxxxxx + ST

Field FSTNUM and FSTSTAGE equal to 6 and xxx

If the first stage is six digits and three (xxx) digits are specified by the operating company, the following is the outpulsing format:

KP + 011 + xxx + ST

Field FSTNUM and FSTSTAGE equal to 6 and N

If the first stage is six digits and no digits are specified by the operating company, the following is the outpulsing format:

KP + 011 + CC + ST

If the country code is specified by the operating company as part of the xxx or xxxxxx data and the country code is less than three digits, the country code must be augmented with zeros.

OFRT selector TS (continued)**Data II**

The following table lists the datafill for table OFRT selector TS.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave this field blank. An entry outside of this range is invalid. Note: Field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS is automatically extended to the highest route index used in field RTE of subtables HNPACONT.RTEREF, FNPACONT.RTEREF, and FNPACONT.FNPASTS.RTEREF respectively.
RTELIST		see subfield	<i>Route list</i> This field consists of subfield RTESEL and refinements CONNTYPE, CLLI, DELDIGS, PRFXDIGS, CANCNORC, FSTNUM, and FSTSTAGE.
	RTESEL	TS	<i>Route selector</i> Enter TS.
	CONNTYPE	D	<i>Connection type</i> This field is not required by system logic. Enter D to satisfy table editor. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier</i> Enter the code in table CLLI to which translation is routed.
	DELDIGS	0 to 15	<i>Delete digits</i> Enter the number of digits deleted before outpulsing.

OFRT selector TS (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	PRFXDIGS	0 to 9, B, C, D, E, F, or N	<i>Prefix digits</i> If digits or control signals or both are prefixed, enter up to 11 prefixed digits or equivalents. The following is a list of control signals and their digit equivalents: C11 = B C12 = C KP = D KP2 = E ST3P = B STP = C STKP = D ST2P = E ST = F If no digits are prefixed, enter N.
	CANCNORC	Y or N	<i>Cancel normal charge</i> If the type of call is DD (direct dial) and no charge is required for the call, enter Y (yes). Otherwise, enter N (no). If the call is routed to an announcement and the call is billed (coins collected, off-hook returned, message rate pegged), enter Y (yes). Otherwise, enter N (no). If field CANCNORC is equal to Y, the call is charged. If this field is set to Y, then a nonrevenue call is assumed and reflected in the call code of the bearer capability (BC) Automatic Message Accounting (AMA) record. If this field is set to N, a revenue record is assumed and reflected in the call code of the AMA record (provided nonrevenue is not indicated in another manner).

OFRT selector TS (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	FSTNUM	3 or 6	<i>First number</i> Enter the number of digits that are required for the first stage.
	FSTSTAGE	numeric or N	<i>First stage</i> Enter up to 11 digits that are outpulsed with the KP and ST signals.

Data example

The following examples show sample datafill for table OFRT selector TS.

Data example 1

An example of datafill for table OFRT in a toll switching unit (DMS-200) is shown below. Memory is allocated for 32 route lists in table OFRT (item 2, quantity 32).

Route reference number 1

This is the route taken by translation if the first route associated with route reference number 1 in subtable HNPACONT.RTEREF 613 or code 413 in table FNPACONT have an all-trunks-busy condition.

If all trunks to CLLI OTWAON1002T1 are busy, the translation selects an alternate route to OTWAON109000.

If all trunks to CLLI OTWAON109000 are busy, translation routes to treatment NCIT (no circuit intertoll) in table intertoll treatment if the call originates on an intertoll trunk, or to treatment NCOT (no circuit other trunk) in the incoming CAMA treatment table if the call originates on an incoming CAMA trunk.

If the switching unit is not equipped with an intertoll or incoming CAMA treatment table, the translation routes to treatment NCIT or NCOT in the office treatment table.

Route reference number 2

This is the route taken by translation if the first route associated with route reference numbers 1 and 2 in subtable FNPACONT.RTEREF 416 have an all-trunks-busy condition. Translation routes sequentially down the route list if all-trunk-busy conditions are encountered in a manner similar to that explained for route reference number 1.

OFRT selector TS (continued)

Route reference number 3

This is the route taken by translation if the first route associated with route reference number 7 in subtable HNPACONT.RTEREF 613 has an all-trunks-busy condition. Translation routes sequentially down the route list if all trunk busy conditions are encountered in a manner similar to that explained for route reference number 1.

Route reference number 4

This is the route taken by translation if the code dialed has vacant code or home NPA intercept treatment specified.

Vacant code announcement (VCA) is applied to the call originator for the number of cycles of announcement specified for VCA in table ANNS.

If the originator has not terminated the call at the end of the VCA, translation routes the call to tone T120.

Tone is applied until the originator goes on hook.

Route reference number 5

This is the route taken by translation if the code 555-1212 is dialed on an incoming CAMA trunk belonging to an incoming CAMA trunk group having subtable CLSVSCRC CAMA.

The digits 555 are deleted, and digits 055 are prefixed. The charge condition is not canceled because the operating companies require that a record of all calls to code 555 is entered on the AMA tape. If the charge or the record of calls to code 555 are not required, set field CANCNORC to Y (yes).

Translation routes sequentially down the route list if all-trunk-busy conditions are encountered, in a manner similar to that explained in route reference number 1.

OFRT selector TS (continued)**MAP display example for table OFRT selector TS**

RTE	RTELIST
1	(S D OTWAON1002T1) (S D OTWAON109000)\$
2	(S D OTWAON1002T0) (S D OTWAON109000)\$
3	(S D OTWAON2301T0) (S D OTWAON1002T0) (S D OTWAON1002T1)\$
4	(S D VCA) (S D T120)\$
5	(N D OTWAON2301T0 3 055 N) (N D OTWAON1002T0 3 055 N)
	(N D OTWAON1002T1 3 055 N)\$

Data II e xample 2

An example of datafill for table OFRT in a local switching unit (DMS-100) is shown below. Memory is allocated for 64 route lists in table OFRT (item 2, quantity 64).

Route reference number 1

This is the route taken by translation if the first route associated with route reference number 8 in subtable HNPACONT.RTEREF 613 has an all-trunks-busy condition.

If there are idle trunks in the trunk group (OTWAON2301TO), the system logic selects the most idle trunk and outpulses the dialed digits, excluding prefix digits.

If all trunks in the trunk group (OTWAON2301TO) are busy, translation routes to treatment NCRT (no circuit) in table TMTCNTL.TREAT.

Route reference number 4

This is the route taken by translation if the code dialed has vacant code or home NPA intercept treatment specified.

Vacant code announcement is applied to the call originator for the number of cycles of announcement specified for VCA in table ANNS.

If the originator has not terminated the call at the end of the VCA, translation routes the call to tone T120 for the length of time specified for T120 in table TONES.

If the originator has not terminated the call when the T120 tone has been applied for the maximum period of time, the line is placed in the lockout list.

OFRT selector TS (continued)

Route reference number 5

This is the route taken by translation if directory numbers (DN) within the range of 725-3000 to 725-3999 are dialed. The above number is routed to OFRT 5 in table WRDN.

If there are idle trunks in the trunk group (OTWAON1C0010) system logic selects the most idle trunk and outpulses the number of digits (3) specified in table TRKGRP.

If all trunks in the trunk group (OTWAON1C0010) are busy, the translation routes to treatment NCRT (no circuit) in table TMTCNTL.TREAT.

Route reference number 10

This is the route taken by translation if the DN 725-1111 (assigned to the milliwatt test line) is dialed. The above number is assigned to office route index 10 in table WRDN.

Route reference number 11

This is the route taken by translation if the DN 725-1181 (assigned to the synchronous test line) is dialed. The above number is assigned to office route index 11 in table WRDN.

Note: If the office is set up with a nonsynchronous test line, translation is routed to CLLI code NOSYN.

Route reference number 12

This is the route taken by translation if the DN 725-1191 (assigned to the balance termination test line) is dialed. The above number is assigned to office route index 12 in table WRDN.

Route reference number 13

This is the route taken by translation if the DN 725-1194 (assigned to the loop around test line port 1) is dialed. The above number is assigned to office route index 13 in table WRDN.

Route reference number 14

This is the route taken by translation if the DN 725-1195 (assigned to the loop-around test line port 2) is dialed. The above number is assigned to office route index 14 in table WRDN.

Route reference number 15

This is the route taken by translation if the DN 725-1192 (assigned to the short circuit test line) is dialed. The above number is assigned to office route index 15 in table WRDN.

OFRT selector TS (continued)

Route reference number 16

This is the route taken by translation if the DN 725-1193 (assigned to the open circuit test line) is dialed. The above number is assigned to office route index 16 in table WRDN.

Route reference number 17

This is the route taken by translation if a coin box line dials the operator code (0-). If there are idle trunks in the trunk group (OTWAON231BB6), the most idle trunk is selected.

If all trunks in the trunk group (OTWAON231BB6) are busy, the translation routes to treatment NCRT (no circuit) in table TMTCNTL.TREAT. The digit 0 is assigned to office route index 17 table STDPRTCT.STDPRT.

Route reference number 18

This is the route taken by translation if a DN that is assigned to treatment OPRT (regular intercept) is dialed. The directory number is assigned to office route index 18 in table WRDN.

If there are idle trunks in the trunk group (OTWAON234QBO), the most idle trunk is selected.

If all trunks in the trunk group (OTWAON234QBO) are busy, translation routes the call to tone T120 for the length of time specified in table TONES.

If the originator has not terminated the call if the T120 tone is applied for the maximum period of time, the line is returned to an idle state.

Route reference number 22

This is the route taken by translation if the code 411 or 611 is dialed by an OUTWATS line. The above codes are assigned to office route index 22 in table CLSVSCRC.

If there are idle trunks in the trunk group (OTWAON231BB2), the most idle trunk is selected.

If all trunks in the trunk group (OTWAON231BB2) are busy, the translation routes to treatment NCRT (no circuit) in the office treatment table.

Route reference number 76

This is the route taken by translation if the code 999 is taken as the station ringer test access code in the example of the description of subtable STDPRTCT.STDPRT, where the call is sent on to table OFRT at index RTE equal to 76.

OFRT selector TS (end)

Index RTE equal to 76 in table OFRT sends the call to fixed CLLI STRG (station ring) for the new station-ringer test.

MAP display example for table OFRT selector TS

RTE	RTELIST
1	(TS D LKOUT 3 2 Y 3 33) (S D LKOUT)\$

OFRT selector UOP

RTESEL=UOP

Route selector UOP enables telephone operating company personnel to set uniform outpulsing for direct inward dial (DID) calls to private branch exchanges (PBX) and to automatic intercept (AI) trunks.

The following table lists the trunk and signaling types that selector UOP supports.

Uniform Outpulsing supported trunks

Trunk type	Signaling type	Route selector
AI	PTS	UOP
PX, P2	PTS	UOP
TO, T2	PTS	UOP
IBNTO, IBNT2	PTS	UOP

Datafill

The following table describes field names, subfield names, and valid data ranges for Table OFRT, selector UOP with UOP/ISA enhancements.

Field descriptions for Table OFRT using the UOP/ISA Enhancement Feature

Field	Subfield or refinement	Entry	Explanation and action
RTELIST		see subfields	Route list. This field consists of subfields IBNRTSEL, OHQ, CBQ, and EXP.
	RTESEL	ISA	IBN route selector. Enter ISA with the line (L) selector only. Or enter ISA with the variable (V) selector and the L (line) route selector. Either route selector scenario must be entered.
	CONNTYPE	D	Connection type. System logic does not use this field. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	Common language location identifier. Enter the code in Table CLLI where translation routes.

Field descriptions for Table OFRT using the UOP/ISA Enhancement Feature

Field	Subfield or refinement	Entry	Explanation and action
	DMI	0 to 32,767	Digit manipulation index. Enter a value that corresponds to the tuple from Table DIGMAN that provides digit manipulation commands.
	CANCNORC	Y or N	Cancel normal charge. Enter Y if the type of call is a direct dial (DD) call and the charge is canceled. Otherwise, enter N.
	TENDIG_ REQD	Y or N	Ten digits required. Enter Y, so that the host application can determine if a ten digit DN should be derived for manipulation and outpulsing based on the ten digit DN and not what was dialed. The default is N. TENDIG_REQD can only be used if a DMI value is present. If the DMI value is nil, then the TENDIG_REQD will not be allowed to be set to Y. The ten digit DN is derived by the application software for 7 digit or external dialed calls.

The following table lists the datafill for table OFRT selector UOP.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RTE		1 to 1023 or blank	<i>Route reference index</i> If the record is the first in the route list, enter the route reference number assigned to the route list. Otherwise, leave the entry blank. An entry outside of this range is invalid. Note: The switch automatically extends field MAXRTE of tables HNPACONT, FNPACONT, and FNPACONT.FNPASTS to the highest route index used in field RTE for the following subtables: - HNPACONT.RTEREF - FNPACONT.RTEREF - FNPACONT.FNPASTS.RTEREF, respectively.
RTELIST			<i>Route list</i> This field consists of subfield RTESEL.
	RTESEL	UOP	<i>Route selector</i> Enter UOP for uniform outpulsing. If subfield RTESEL equals UOP, enter datafill for subfields CONNTYPE, CLLI, DMI, and CANCNORC.
	CONNTYPE	D, A, T, CROUTING	<i>Connection type.</i> System logic does not use this field. Enter D to satisfy table control. An entry outside of this range is invalid.
	CLLI	alphanumeric (1 to 16 characters)	<i>Common language location identifier.</i> Enter the code in table CLLI where translation routes.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
	DMI	0 to 32,767	<i>Digit manipulation index.</i> Enter the index number in table DIGMAN that provides digit alteration for the called number.
	CANCNORC	Y or N	<i>Cancel normal charge.</i> Enter Y (yes) if type of call is a direct dial (DD) call and the charge is canceled. Otherwise, enter N (no). If switch routes the call to an announcement and bills the call (coins collected, off-hook returned, message rate pegged), enter Y. Otherwise, enter N. If field CANCNORC is equal to Y, the call is charged. If this field is equal to Y, the switch assumes the call is a nonrevenue call. The switch reflects the information in the call code of the bearer capability (BC) automatic message accounting (AMA) record. If this subfield is equal to N, the switch assumes the record is a revenue record. The switch reflects this information in the call code of the AMA record (provided another method does not indicate nonrevenue. is not indicated in).

Datafill example

The following example shows sample datafill for table OFRT selector UOP.

MAP display example for table OFRT selector UOP

RTE	RTELIST
11	(UOP D MTRL PQ0201T0 1000 N) \$
55	(UOP D 2WAINT2A 1001 N) \$

OFRTMA2

Table name

ISDN OFR2 Route Reference Table

Functional description

Table OFRTMA2 alters the routing index for calls with ISDN routing characteristics.

This table is entered just before entry into table OFR2, provided a routing characteristic name (subfield RCNAME) is present in the call, where the routing characteristic name is the ISDN routing characteristic name. If a tuple with the matching routing characteristic name and route reference index is not found in table OFRTMA2, the new route index defaults to the original route index.

Data II sequence and implications

The following tables must be datafilled after table OFRTMA2.

- RCNAME
- OFR2

Table size

0 to 262 144 tuples

Data II

The following table lists datafill for table OFRTMA2.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>Key into table OFRTMA2</i> This field consists of subfields RCNAME and INDEX.
RCNAME		alphanumeric	<i>Routing characteristic name</i> Enter a routing characteristic name known to table RCNAME.

OFRTMA2 (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
INDEX		1 to 1023	<i>Route reference index</i> Enter the route reference index of a basic routing list in table OFR2. A basic routing list is a routing list in table OFR2 that is accessed if ISDN routing characteristics are not present. Any entry outside the range indicated for this field is invalid.
NEWINDEX		1 to 1023	<i>New route reference index</i> Enter the route reference index of a nonbasic routing list in table OFR2. A nonbasic routing list is a routing list that is accessed if ISDN routing characteristics are present. Any entry outside the range indicated for this field is invalid.

Data file example

The following example shows sample datafill for table OFRTMA2.

MAP display example for table OFRTMA2

KEY NEWINDEX		
64KNAME	1	100
TNSPUB	1	101

OFRTMA3**Table name**

ISDN OFR3 Route Reference Table

Functional description

Table OFRTMA3 is used to alter the routing index for calls with ISDN routing characteristics.

This table is entered just before entry into table OFR3 provided an routing characteristic name (subfield RCNAME) is present in the call, where the routing characteristic name is the ISDN routing characteristic name. If a tuple with the matching routing characteristic name and route reference index is not found in table OFRTMA3, then the new route index defaults to the original route index.

Data II sequence and implications

The following tables must be datafilled after table OFRTMA3.

- RCNAME
- OFR3

Table size

0 to 262 144 tuples

Data II

The following table lists datafill for table OFRTMA3.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>Key into table OFRTMA3</i> This field consists of subfields RCNAME and INDEX.
	RCNAME	alphanumeric	<i>Routing characteristic name</i> Enter a routing characteristic name known to table RCNAME.

OFRTMA3 (end)

Field descriptions (Sheet 2 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	INDEX	1 to 1023	<i>Route reference index</i> Enter the route reference index of a basic routing list in table OFR3. A basic routing list is a routing list in table OFR3 that is accessed if ISDN routing characteristics are not present. Any entry outside the range indicated for this field is invalid.
NEWINDEX		1 to 1023	<i>New route reference index</i> Enter the route reference index of a nonbasic routing list in table OFR3. A nonbasic routing list is a routing list that is accessed if ISDN routing characteristics are present. Any entry outside the range indicated for this field is invalid.

Data file example

The following example shows sample datafill for table OFRTMA3.

MAP display example for table OFRTMA3

KEY NEWINDEX			
64KNAME	1	100	
TNSPUB	1	101	

OFRTMA4**Table name**

ISDN OFR4 Route Reference Table

Functional description

Table OFRTMA4 is used to alter the routing index for calls with integrated services digital network (ISDN) routing characteristics.

This table is entered just before entry into table OFR4, provided a routing characteristic name (subfield RCNAME) is present in the call, where the routing characteristic name is the ISDN routing characteristic name. If a tuple with the matching routing characteristic name and route reference index is not found in table OFRTMA4, the new route index returns to the original route index by default.

Data II sequence and implications

The following tables must be datafilled after table OFRTMA4.

- RCNAME
- OFR4

Table size

0 to 262 144 tuples

Data II

The following table lists datafill for table OFRTMA4.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>Key into table OFRTMA4</i> This field consists of subfields RCNAME and INDEX.
	RCNAME	alphanumeric	<i>Routing characteristic name</i> Enter a routing characteristic name known to table RCNAME.

OFRTMA4 (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	INDEX	0 to 1023	<i>Route reference index</i> Enter the route reference index of a basic routing list in table OFR4. A basic routing list is a routing list in table OFR4 that is accessed if ISDN routing characteristics are not present. Any entry outside the range indicated for this field is invalid.
NEWINDEX		0 to 1023	<i>New route reference index</i> Enter the route reference index of a nonbasic routing list in table OFR4. A nonbasic routing list is a routing list that is accessed if ISDN routing characteristics are present. Any entry outside the range indicated for this field is invalid.

Data l l e x a m p l e

The following example shows sample datafill for table OFRTMA4.

MAP display example for table OFRTMA4

KEY NEWINDEX		
64KNAME	1	100
TNSPUB	1	101

OFRTMAP**Table name**

ISDN OFRT Route Reference Table

Functional description

Table OFRTMAP is used to alter the routing index for calls with ISDN routing characteristics.

This table is entered just before entry into table OFRT, provided an routing characteristic name (RCNAME) is present in the call, where RCNAME is the ISDN routing characteristic name. If a tuple with the matching RCNAME and route reference index is not found in table OFRTMAP, then the new route index defaults to the original route index.

Data II sequence and implications

The following tables must be datafilled after table OFRTMAP.

- RCNAME
- OFRT

Table size

0 to 262 144 tuples

Data II

The following table lists datafill for table OFRTMAP.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY			<i>Key into table OFRTMAP</i> This field consists of subfields RCNAME and INDEX.
	RCNAME	alphanumeric	<i>Routing characteristic name</i> Enter a routing characteristic name datafilled in table RCNAME.

OFRTMAP (end)

Field descriptions (Sheet 2 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	INDEX	1 to 1023	<i>Route reference index</i> Enter the route reference index of a basic routing list in table OFRT. A basic routing list is a routing list in table OFRT that is accessed if ISDN routing characteristics are not present. Any entry outside the range indicated for this field is invalid.
NEWINDEX		1 to 1023	<i>New route reference index</i> Enter the route reference index of a nonbasic routing list in table OFRT. A nonbasic routing list is a routing list that is accessed if ISDN routing characteristics are present. Any entry outside the range indicated for this field is invalid.

Data example

The following example shows sample datafill for table OFRTMAP.

MAP display example for table OFRTMAP

KEY NEWINDEX		
64KNAME	1	100
TNSPUB	1	101

OHBTADMN**Table name**

Off-Hook Balance Testing Administration Table

Functional description

Table OHBTADMN sets office-wide parameters for off-hook balance testing (OHBT) and contains a list of digital test unit (DTU) resources available for OHBT.

For a complete description of the off-hook balance test refer to the Lines Maintenance Guide.

Data II sequence and implications

Table TRKMEM must be datafilled before table OHBTADMN.

To add a new DTU to the list of available DTUs for OHBT, the DTU must first be datafilled in table TRKMEM, but must not be datafilled in table FMRESINV.

Table size

The table size is fixed at one tuple.

Data II

The following table lists datafill for table OHBTADMN.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
ADMNKEY		0	Administration key. Enter 0 (zero). Only one tuple is allowed for table OHBTADMN, so this field is limited to one value.
CCOCC		0 to 50	Central control occupancy threshold. Enter a value to indicate the central control (CC) occupancy percentage level threshold. When the percentage of CC occupancy exceeds this level, the feature will automatically be disabled. When the percentage of CC occupancy drops below this level, the feature will be re-enabled automatically. The default value for this field is 40 (40 %).

OHBTADMN (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
TESTTYPE		DISABLED, ORIG, ORIGTERM, or TERM	Off-hook balance test type. Enter a value to indicate the type of off-hook balance testing (OHBT) that can be run on the switch as follows: • Enter DISABLED to run no tests and disable the feature. • Enter ORIG to run tests on lines datafilled for ORIG testing. • Enter ORIGTERM to run tests on all lines datafilled for OHBT testing. • Enter TERM to run tests on lines datafilled for TOA or TOATOS testing. The value of this field overrides the value of field TESTTYPE in table OHBTINV. For example, if this field is set to ORIG, tests are not run on lines datafilled with TOA, TOATOS, or ORIGTOA in field TESTTYPE in table OHBTINV. The default value for this field is DISABLED.
TOSTIME		4 to 10	TOS test time. Enter a value to specify the maximum time, in seconds, to maintain a monitor connection on a line while waiting for an opportunity to perform a TOS test. The default value for this field is 10 (10 s).
RETEST		Y or N	Retest indicator. This field indicates whether lines that have their balance networks changed following an OHBT are to be scheduled for a retest on the next call. Enter Y (yes) to specify that all changes are to force a retest on the next call. Enter N (no) to specify that no additional testing is to be performed. The default value for this field is N.

OHBTADMN (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
LOGCHG		Y or N	Change log. Enter Y to generate LINE601 logs once OHBT tests are complete, recommending a different balance network from that present on the line when the tests started. Otherwise, enter N. The default value for this field is N.
LOGNOCHG		Y or N	No change log. Enter Y to generate LINE600 logs once OHBT tests are complete, recommending the same balance network as that present on the line when the tests started. Otherwise, enter N. The default value for this field is N.
LOGFAIL		Y or N	Failure log. Enter Y to generate LINE602 logs when OHBT tests fail to complete. Otherwise, enter N. The default value for this field is N.
DTU		0 to 9999 (vector of 20 entries)	Digital test units. Enter the external trunk name of up to 20 digital test units (DTU). Enter \$ to indicate the end of the vector. The default value for this field is \$.

Data example

The following example shows sample datafill for table OHBTADMN.

MAP display example for table OHBTADMN

ADMNKEY	CCOCC	TESTTYPE	TOSTIME	RETEST	LOGCHG	LOGNOCHG	LOGFAIL	DTU
0	0	DISABLED	10	N	N	N	N	\$

OHBTADMN (end)

Table history

BCS36

Table OHBTADMN was introduced.

OHBTINV

Table name

Off-Hook Balance Testing Inventory Table

Functional description

Table OHBTINV contains the off-hook balance testing (OHBT) information for each line. Table OHBTINV is datafilled automatically through table LNINV. Tuples cannot be added to or deleted from table OHBTINV. Most changes to datafill in this table are made by using the CI command SCHDOHBT, but standard table control utilities allow changes to some fields.

For a complete description of the off-hook balance test refer to the Lines Maintenance Guide.

Data II sequence and implications

Table OHBTINV is datafilled automatically when table LNINV is datafilled; as lines are added to or deleted from table LNINV, corresponding tuples are added to or deleted from table OHBTINV.

Table size

0 to 32 767 tuples

Memory is allocated automatically.

OHBTINV (continued)

Data II

The following table lists datafill for table OHBTINV.

OHBTINV (continued)**Field descriptions (Sheet 1 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
LEN		see subfields	<i>Line equipment number</i> This field defines the physical location of the equipment that is connected to a specific telephone line. Because field LEN is common to more than 60 tables, it is documented in a single section to avoid unnecessary duplication. Refer to section "Common entry field LEN" for a complete description of field LEN and associated subfields. Field LEN consists of subfields SITE, FRAME, UNIT, DRAWER or LSG, SHELF, SLOT, and CIRCUIT.
TESTTYPE		ORIG, ORIGTOA, TOA, or TOATOS	<i>Off-hook balance testing type</i> This field indicates the test type that is run on each line as follows: • ORIG indicates that originating (ORIG) off-hook balance testing (OHBT) is run on the line. • ORIGTOA indicates that ORIG or test-on-answer (TOA) OHBT is run on the line, depending on whether the line originates or terminates the call. • TOA indicates that TOA OHBT is run on the line. • TOATOS indicates that test-on-silence (TOS) is run on the line. The value of this field is overridden by the value of field TESTTYPE in table OHBTADMN. For example, if a line has TESTTYPE set to ORIG in table OHBTINV, but the line has TESTTYPE set to TERM in table OHBTADMN, no testing is performed on the line. The default value for this field is ORIG.

OHBTINV (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
TESTOPTN		DAILY, DISABLED, EACHCALL, MONTHLY, NEVER, NEXTCALL, or WEEKLY	<i>Test option</i> This field indicates the scheduling time frame that is selected for each line test. The scheduling is as follows: • DAILY indicates that the specified test is run on the first call of each day. • DISABLED indicates that no test is run on the line. • EACHCALL indicates that the specified test is run on every call. • MONTHLY indicates that the specified test is run on the first call of each month. • NEVER indicates that no test is run on the line. • NEXTCALL indicates that the specified test is run on the next call only. • WEEKLY indicates that the specified test is run on the first call of each week. Note: The difference between options DISABLED and NEVER is that option DISABLED can be changed to any other option (except NEVER) by using the CI command SCHDOHBT, but a line that has TESTOPTN set to NEVER requires the use of table control to change to another option. The default value for this field is DISABLED.

OHBTINV (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
BNV		9002, L, NA, or NL	<i>Balanced network value</i> This field indicates the recommended balanced network for each line. The values are indicators of the following: 9002 indicates that a 900- 2.16-F network is recommended for the line. - L indicates that a loaded network is recommended for the line. - NA indicates that no test results are available for the line. - NL indicates that a non-loaded network is recommended for the line. The default value for this field is NA.
TESTEX		Y or N	<i>Test executed</i> This field indicates whether a test was run on the line in the current scheduling period.

Data l l e x a m p l e

The following example shows sample datafill for table OHBTINV.

MAP display example for table OHBTINV

	LEN	TESTTYPE	TESTOPTN	BNV	TESTEX
HOST	02 1 01 02	ORIG	DISABLED	L	Y
HOST	02 1 01 03	ORIG	DAILY	L	Y
HOST	02 1 01 04	BOTH	WEEKLY	L	Y
HOST	02 1 01 06	ORIG	WEEKLY	L	Y
HOST	02 1 01 08	TOA	DAILY	L	Y
HOST	02 1 01 10	TOA	DAILY	L	Y
HOST	02 1 01 11	ORIG	MONTHLY	L	Y
HOST	02 1 01 12	TOATOS	DAILY	L	Y
HOST	02 1 01 13	ORIG	EACHCALL	L	Y
HOST	02 1 01 14	DISABLED	DAILY	L	Y
HOST	02 1 01 14	BOTH	NEVER	L	N

OHBTINV (end)

Table history

BCS36

Table OHBTINV was introduced.

OHIP

Table name

Office Hardware Inventory Package Table

Functional description

Feature BC02766 (table OHIP) is implemented as an optional stand-alone resident feature and is part of DMS software package NTX120AA (Office Hardware Inventory Package).

From the data schema point of view, the above feature is implemented through two interdependent tables known as OHIP and OHIPBULK.

Table OHIP keeps track of all the in-service hardware inventory (including HOST and REMOTES) except line cards, while table OHIPBULK keeps track of all the spare circuit packs and all the line cards on a quantity basis.

Table OHIP is used to identify the operational (in-service) hardware inventory, except line cards.

Data II sequence and implications

The initial datafill of tables OHIP and OHIPBULK is the responsibility of the operating company.

Tables OHIP and OHIPBULK are interdependent.

Table size

0 to 32 767 tuples

The size of this table is not subject to external control.

OHIP (continued)**Data II**

The following table lists datafill for table OHIP.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields	<i>Key</i> This field consists of subfields SITE, FRTYPE, FRNO, SHPOS, and CARDNO.
	SITE	alphanumeric (table of up to 4 characters)	<i>Site</i>This subfield specifies the physical site where the circuit pack is located (for example, HOST or REM1).
	FRTYPE	alphanumeric	<i>Frame type</i> Enter the frame type on which the circuit pack is located (for example, CCC, TME, NET, and so on).
	FRNO	0 to 511	<i>Frame number</i> Enter the frame number.
	SHPOS	0 to 77	<i>Shelf position</i> Enter the number of the shelf containing the circuit pack.
	CARDNO	0 to 63	<i>Card number</i> Enter the slot position in the shelf into which the circuit pack is plugged.
PECCODE		alphanumeric (table of 6)	<i>Equipment product engineering code</i> Enter the product engineering code (PEC) of the circuit pack.
RELEASE		alphanumeric (table of 2)	<i>Release</i> Enter the Northern Telecom release number of the circuit pack.

OHIP (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
STATUS		B, D, I, O, R, or U	<i>Status</i> Enter the status of the circuit pack slot position: borrowed (B), delivered (D), installed (I), ordered (O), replaced (R), or unequipped (U).
DATE		yymmdd	<i>Date</i> Enter the date that the table record was last updated.

Data l l e x a m p l e

The following example shows sample datafill for table OHIP.

MAP display example for table OHIP

KEY					PECCODE	RELEASE	STATUS	DATE
OTWA	CCC	0	65	6	1X32AB	01	D	830521
BSHP	DTC	1	18	14	6X02AA	01	B	830424
STLN	NET	3	00	0	0X48AA	02	I	830614

OHIPBULK

Table name

Bulk Hardware Inventory Package Table

Functional description

Table OHIPBULK is used to identify the quantity of all spare circuit packs and all line cards.

For related information, refer to table OHIP.

Data II sequence and implications

The initial datafill of tables OHIPBULK and OHIP is the responsibility of the operating company.

Tables OHIP and OHIPBULK are interdependent.

Table size

0 to 32 767 tuples

Data II

The following table lists datafill for table OHIPBULK.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
BULKKEY		see subfields	<i>Key</i> This field consists of subfields SITE, PEC, RELEASE, and STATUS.
	SITE	alphanumeric (table of 4)	<i>Site</i> Enter the physical site at which the circuit pack is located (for example, HOST or REM).
	PEC	alphanumeric (table of 6)	<i>Equipment product engineering code</i> Enter the product engineering code (PEC) of the circuit pack.
	RELEASE	alphanumeric (table of 2)	<i>Release</i> Enter the Northern Telecom release number of the circuit pack.

OHIPBULK (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	STATUS	B, D, I, O, R, S, or U	<i>Status</i> Enter the status of the circuit pack slot position: borrowed (B), delivered (D), installed (I), ordered (O), replaced (R), spare (S), or unequipped (U).
QUANTITY		0 to 32767	<i>Quantity</i> Enter the number of circuit packs corresponding to a given key.
DATE		yymmdd	<i>Date</i> Enter the date on which the table record was last updated.

Data l l e x a m p l e

The following example shows sample datafill for table OHIPBULK.

MAP display example for table OHIPBULK

BULKKEY	QUANTITY	DATE
OTWA 2X31AA 01 0	124	830214
BSHP 6X02AA 01 S	10	830424
BSHP 2X17AB 02 D	5624	830606
STLN 0X48AA 01 S	1	830614
STLN 2X17AB 01 D	310	830610

OICBC

Table name

Office Identification Code Billing Code Table

Functional description

Table OICBC is used to verify that the XXX (formerly NXX) in field BCKEY is a valid billing code for automatic message accounting (AMA) purposes.

Table OICBC is indexed on a three-part key (field BCKEY). Field BCKEY is made up of the common language location identifier (CLLI), the office identification code (OIC), and the calling XXX code. With an increase in the range of 200 to 999 to 0 to 999, field NXX was renamed to XXX to reflect this change. Table OICBC also specifies the charge class of the call.

For related information, refer to table TOPSOIC.

Data II sequence and implications

Table TOPSOIC must be datafilled before table OICBC.

Table size

Tables OICBC and TOPSOIC share some common storage. The size of table OICBC changes dynamically and is calculated with the following equation in terms of words:

$\{(1 \times d) + (32 \times d) + ([\text{max} / 256] \times 256 \times d) + ([\{1 + d\} \times 100] \text{ for each unique trunk group entry in table TOPSOIC}) + (2000 \text{ for each unique combined [trunk group + XXX] entry in table OICBC})\}$

where

d

is 3 for NT40 or 4 for the DMS SuperNode

max

is the maximum number of trunk groups

Note: The maximum number of trunk groups cannot exceed the value of 8191, the entry in table DATASIZE for table TRKGRP.

The minimum table size is obtained by adding together the first three parts of the equation $\{(1 \times d) + (32 \times d) + ([\text{max} / 256] \times 256 \times d)\}$. The maximum table size is obtained by adding all five parts of the equation.

OICBC (continued)**Example**

If $d = 4$, the maximum trunk group size is 300, and only one unique trunk group is used, then table size is calculated with the following equation:

$$\{(1 \times 4) + (32 \times 4) + ([300 / 256] \times 256 \times 4) + ([\{1 + 4\} \times 100] + (2000 \times 300 \times 1000))\}$$

where

$$1 \times 4 = 4$$

$$32 \times 4 = 128$$

$$(300 / 256) \times 256 \times 4 = 1.17 \times 256 \times 4 = 2 \times 256 \times 4 = 2048$$

$$(1 + 4) \times 100 = 500$$

$$2000 \times 300 \times 1000 = 600,000,000$$

Therefore, for this example,. minimum table size is $4 + 128 + 2048 = 2180$.

Maximum table size is $2180 + 500 + 600,000,000 = 600\ 002\ 680$.

Data II

The following table lists datafill for table OICBC.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
BCKEY		see subfields	<i>Billing code key</i> This field is a three-part key and consists of subfields CLLI, OIC, and XXX.
	CLLI	alphanumeric (up to 16 characters)	<i>Common language location identifier</i> Enter the common language location identifier (CLLI) code.
	OIC	0 to 99	<i>Office identification code</i> Enter the office identification code (OIC) code.
	XXX	0 to 999	<i>XXX code</i> Enter the calling XXX code (formerly NXX).

OICBC (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
BILLCD		0 to 9, B to F, N (6 digits)	<i>Billing code</i> Enter the billing code.
CHGCLSS		CAM0, CAM1, CAM2, CAM3, CSD0, DAT0, DAT1, DAT2, DAT3, DIHS, DLLS, DLHS, INW0, LAM0, LCDR, MBG, NONE, RCFW, SPCL, TOPS, TRMB, TWX0, or WAT0,	<i>Charge class</i> Enter a valid value of type charge_class.

Data example

The following example shows sample datafill for table OICBC.

MAP display example for table OICBC

BCKEY BILLCD CHGCLSS
TOPCOMAMF 27 622 613622 TOPS

OLNSDARS

Table name

Originating Line Number Screening Directory Assistance Billing Restriction

Functional description

This table is used for directory assistance calls to provide the restricted billing index for various protocols and an index to other DMS switch tables. In addition table OLNSDARS provides operator screen display indices into tables OLNSRSDP and OLNSEQDP. Table OLNSDARS has a eight part key consisting of the service/equipment indicator, DA billing options, and treatment indicator.

Data II sequence and implications

Tables OLNSRSDP and OLNSEQDP must be datafilled before table OLNSDARS.

Table size

0 to 32,767 tuples

OLNSDARS (continued)**Data II**

The following table lists datafill for table OLNSDARS.

Field descriptions (Sheet 1 of 7)

Field	Subfield or refinement	Entry	Explanation and action
DARSKEY		see subfields	Toll and Assist Billing Restrictions Key. This field is the index into this table and consists of subfields SRVEQPT, THIRD, CCARD, SPLBNS, SENTPD, and TRMT.
	SERVEQPT	POTS, LECPST, RES1, RES2, LECSEMI, BUSFLAT, BUS1, BUS2, NCNNOIPP, NCNIPP, PRETCS, LECPRE, LECALT, ICSTD, ICALT, RESFLAT, VQNOTAX, VQTAX, IPSTD, IPALT, HOSPITAL, PRISON, AQNOTAX, AQTAX, DORM, CENTREX,	Service Equipment. This field corresponds to the Originating Service/Equipment Indicator received from the OLNS database. This indicator provides the calling station type. The default is POTS. This indicator value appears in AMA table 675 (Modified Service or Equipment Indicator) of structure code 0772. The values are defined as follows: (Note, the associated AMA protocol value is shown in parenthesis. However, the AMA value is not an input to this table, rather, the indicator is an input to AMA and to this field.) • POTS (01) - POTS line, business/residential • LECPOST (02) - LEC public, standard interface, postpay overtime Public, standard interface indicates a set whose functions (that is, rating, coin detection, coin signaling, and announcements) are controlled by signaling from the network. Postpay overtime indicates a coin phone for which the customer is allowed to talk for the initial period and one subsequent period before being prompted for payment for the preceding period (that is, payment is made after its corresponding time interval of a call.)

OLNSDARS (continued)**Field descriptions (Sheet 2 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	SERVEQPT (continued)	PBX, PRSNIPP, WATS, CELL, PAGER, PCS, FGA, MOBILE, SPLPOST, SPLPRE, INCMPIF, CELLR1, CELLR2, BUSSL, BUSML, POST	Values are defined as follows (continued): - RES1 (03), RES2 (04) - POTS line; residential; message rate 1, 2 Flat rate, message rate 1, and message rate 2 indicate the rate applicable to the line that is used by the Real Time Rating System when determining the rate for a call. - LECSEMI (05) - LEC semi-public: This indicates that the originating stations is a coin phone owned by an LEC (operating company) for which special agreements have been made with the location provider. - BUSFLAT (06) - POTS line, business, flat rate - BUS1 (07), BUS2 (11) - POTS line; business; message rate 1, 2 - NCNNOIPP (08) - coinless (non-IPP) - NCNIPP (09) - coinless (IPP) IPP refers to a public station that is owned by an independent payphone provider; in the past, these sets were referred to as customer owned coin operator telephones (COCOTs). - PRETCS (10) - LEC prepaid, telecommunications card station: - This indicates a coinless set owned by an LEC that accepts pre-paid cards (for example, cash cards).

OLNSDARS (continued)**Field descriptions (Sheet 3 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	SERVEQPT (continued)		Values are defined as follows (continued): • LECPRE (12) - LEC public, standard interface, prepay overtime Prepay overtime indicates a coin phone for which the customer is allowed to talk for the initial period and is prompted to pre-pay for the next time duration (that is, all time intervals for a call are paid before they occur.) • RESFLAT (16) - POTS line, residential, flat rate • VQNOTAX (17) - voice quote, without tax • LECALT (13) - LEC public, alternate interface: This indicates a set whose functions (that is, rating, coin detection, coin signaling, and announcements) are controlled locally (that is, these functions are located in the set). • ICSTD (14) - IC public, standard interface • ICALT (15) - IC public, alternate interface • VQTAX (18) - voice quote, with tax • IPSTD (19) - IPP, standard interface • IPALT (20) - IPP, alternate interface • HOSPITAL (21) - hospital • PRISON (22)- prison (non-IPP) • AQNOTAX (23) - auto quote, without tax

OLNSDARS (continued)**Field descriptions (Sheet 4 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	SERVEQPT (continued)		Values are defined as follows (continued): • AQTAX (24)- auto quote, with tax • DORM (25) - dormitory line • CENTREX (26) - Centrex line • PBX (27) - PBX line • PRSNIPP (28) - prison (IPP) • WATS (29) - WATS line • CELL (30)- cellular • PAGER (31) - pager • PCS (32) - personal communications service (PCS) • FGA (33) - Feature Group A • MOBILE (34) - mobile • SPLPOST (35) - LEC public, special billing, post-pay overtime • SPLPRE (36) - LEC public, special billing, pre-pay overtime • INCMPIF (37) - public, incompatible network interface • CELLR1 (38), CELLR2 (39) - cellular; rate 1, 2 • BUSSL (40) - POTS line, business, single-line • BUSML (41) - POTS line, business, multi-line • POST (42) - public, postpay

OLNSDARS (continued)**Field descriptions (Sheet 5 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	THIRD	ALLOW, DISALL, OPR, OPRAUTO	Third Number. This field specifies the restrictions associated with third number billing. This field corresponds to the Third Number Billing Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. This is the same as the pre-OLNS billing types THIRD and SPLCLG. The values are defined as follows: • ALLOW - allowed • DISALL - not allowed • OPR - allowed with live operator verification • OPRAUTO - allowed with operator or automated verification
	CCARD	ALLOW, DISALL, CIR	Calling Card. This field specifies the restrictions associated with calling card billing. This field corresponds to the Calling Card Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. This is the same as the pre-OLNS billing type CALLING CARD. The values are defined as follows: • ALLOW - allowed • DISALL - not allowed • CIR - card issuer restrictions
	SPLBNS	ALLOW, DISALL	Special Billed Number Screening. This field specifies the restrictions associated with special called billing. This field corresponds to the Special BNS Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. The values are defined as follows: • ALLOW - allowed • DISALL - not allowed

OLNSDARS (continued)**Field descriptions (Sheet 6 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
	SENTPD	ALLOW, DISALL	Station Paid. This field specifies the restrictions associated with station paid billing. This field corresponds to the Sent Paid Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. The values are defined as follows: • ALLOW - allowed • DISALL - not allowed
	TRMT	TONE, TONEP1, TONEP2, TONEP3, TONEP7, TONEP8, TONEP9, TONEP13, OPRSTA, OPRCUST, HANDCAP, DEAF, FRAUD, NOOPR, TP4NOPR, TP5NOPR, TP6NOPR, TP10NOPR, TP11NOPR, TP12NOPR, TP14NOPR, SPL1, SPL2, SPL3, SPL4, SPL5	Treatment. This is the Treatment indicator returned by the OLNS database. The default is TONEP2. The values are defined as follows: • TONE - automated treatment, provide alerting tone only • TONEP1-TONEP3, TONEP7-TONEP9, TONEP13 -automated treatment, provide alerting tone and prompting announcement 1-3,7-9,13 • OPRSTA - operator treatment, operator handling (station limitations) • OPRCUST - operator treatment, operator handling (at customer request) • HANDCAP - special treatment, handicapped • DEAF- special treatment, deaf • FRAUD - operator treatment, high fraud • NOOPR - automated treatment, provide alerting tone only - no operator access • TP4NOPR-TP6NOPR, TP10NOPR-TP12NOPR, TP14NOPR, - automated treatment, provide alerting tone and prompting announcement 4-6, 10-12,14 - no operator access • SPL1 -SPL5 - automated treatment, special handling 1-5

OLNSDARS (end)**Field descriptions (Sheet 7 of 7)**

Field	Subfield or refinement	Entry	Explanation and action
SCRNCODE		0 to 100	Screen Code. The field replaces the restricted billing number from table SPLDNID. It is used by various protocols for announcements and as an index to tables such as DABILL, ADACCOPT, CT4QREST, and so forth.
RSDPIDX		0 to 100	Restriction Display Index. This is an index into table OLNSRSDP to obtain a display for the billing type. Value 100 is the nil display number.
EQDPIDX		0 to 100	Equipment Display Index. This is an index into table OLNSEQDP to obtain a display for the originating equipment type. Value 100 is the nil display number.

Data file example

The following example shows sample datafill for table OLNSDARS.

MAP display example for table OLNSDARS

DARSKEY									
					SCRNCODE	RSDPIDX	EQDPIDX		

DORM	ALLOW	ALLOW	ALLOW	DISALL	TONEP1				
					5	2	2		

Table history**NA006**

This table was created by functionality TOPS OLNS Interface, ABS00012.

Supplementary information

None

OLNSDFLT

Table name

Originating Line Number Screening Directory Assistance Default

Functional description

This table provides information for handling OLNS query protocol data errors. The information includes toll and assist (TA) and directory assistance (DA) billing restrictions, service/equipment type, and call treatment. This table is indexed by table OLNSERR.

No DACOLL indicator is given since collect billing on DA calls is always denied.

Data II sequence and implications

Table OLNSDFLT must be datafilled before table OLNSDFLT.

Table size

1 to 100 tuples

OLNSDFLT (continued)**Data II**

The following table lists datafill for table OLNSDFLT.

Field descriptions (Sheet 1 of 8)

Field	Subfield or refinement	Entry	Explanation and action
IDX		0 to 99	Index. Index into table from table OLNSERR. The default is 0.
	TRMT	SCRND, TONE, TONEP1, TONEP2, TONEP3, TONEP7, TONEP8, TONEP9, TONEP13, OPRSTA, OPRCUST, HANDCAP, DEAF, FRAUD, NOOPR, TP4NOPR, TP5NOPR, TP6NOPR, TP10NOPR, TP11NOPR, TP12NOPR, TP14NOPR, SPL1, SPL2, SPL3, SPL4, SPL5	Treatment. This is the Treatment indicator returned by the OLNS database. The default is TONEP2. The values are defined as follows: • SCRND - not available due to LIDB data screening • TONE - automated treatment, provide alerting tone only • TONEP1-TONEP3, TONEP7-TONEP9, TONEP13 - automated treatment, provide alerting tone and prompting announcement 1-3,7-9,13 • OPRSTA - operator treatment, operator handling (station limitations) • OPRCUST - operator treatment, operator handling (at customer request) • HANDCAP - special treatment, handicapped • DEAF - special treatment, deaf • FRAUD - operator treatment, high fraud • NOOPR - automated treatment, provide alerting tone only - no operator access • TP4NOPR-TP6NOPR, TP10NOPR-TP12NOPR, TP14NOPR, - automated treatment, provide alerting tone and prompting announcement 4-6, 10-12,14 - no operator access • SPL1 -SPL5 - automated treatment, special handling 1-5

OLNSDFLT (continued)**Field descriptions (Sheet 2 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
SERVEQPT		POTS, LECPOST, RES1, RES2, LECSEMI, BUSFLAT, BUS1, BUS2, NCNNOIPP, NCNIPP, PRETCS, LECPRE, LECALT, ICSTD, ICALT, RESFLAT, VQNOTAX, VQTAX, IPSTD, IPALT, HOSPITAL, PRISON, AQNOTAX, AQTAX, DORM, CENTREX, PBX, PRSNIPP, WATS, CELL, PAGER, PCS, FGA, MOBILE, SPLPOST, SPLPRE, INCMPIF, CELLR1, CELLR2, BUSSL, BUSML, POST	Service Equipment. This field corresponds to the Originating Service/Equipment Indicator received from the OLNS database. This indicator provides the calling station type. The default is POTS. The values are defined as follows: • POTS - POTS line, business/residential • LECPOST - LEC public, standard interface, postpay overtime Public, standard interface indicates a set whose functions (that is, rating, coin detection, coin signaling, and announcements) are controlled by signaling from the network. Postpay overtime indicates a coin phone for which the customer is allowed to talk for the initial period and one subsequent period before being prompted for payment for the preceding period (that is, payment is made after its corresponding time interval of a call.) • RES1, RES2 - POTS line; residential; message rate 1, 2 Flat rate, message rate 1, and message rate 2 indicate the rate applicable to the line that is used by the Real Time Rating System when determining the rate for a call. • LECSEMI - LEC semi-public: This indicates that the originating stations is a coin phone owned by an LEC (operating company) for which special agreements have been made with the location provider.

OLNSDFLT (continued)**Field descriptions (Sheet 3 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
SERVEQPT (continued)			Values are defined as follows (continued): - BUSFLAT - POTS line, business, flat rate - BUS1, BUS2 - POTS line; business; message rate 1, 2 - NCNNOIPP - coinless (non-IPP) - NCNIPP - coinless (IPP) IPP refers to a public station that is owned by an independent payphone provider (ipp); in the past, these sets were referred to as customer owned coin operator telephones (COCOTs). - PRETCS - LEC prepaid, telecommunications card station: - This indicates a coinless set owned by an LEC that accepts pre-paid cards (for example, cash cards). - LECPRE - LEC public, standard interface, prepay overtime Prepay overtime indicates a coin phone for which the customer is allowed to talk for the initial period and is prompted to pre-pay for the next time duration (that is, all time intervals for a call are paid before they occur.) - LECALT - LEC public, alternate interface: This indicates a set whose functions (that is, rating, coin detection, coin signaling, and announcements) are controlled locally (that is, these functions are located in the set). - ICSTD - IC public, standard interface

OLNSDFLT (continued)**Field descriptions (Sheet 4 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
SERVEQPT (continued)			Values are defined as follows (continued): • ICALT - IC public, alternate interface • RESFLAT - POTS line, residential, flat rate • VQNOTAX - voice quote, without tax • VQTAX - voice quote, with tax • IPSTD - IPP, standard interface • IPALT - IPP, alternate interface • HOSPITAL - hospital • PRISON - prison (non-IPP) • AQNOTAX - auto quote, without tax • AQTAX - auto quote, with tax • DORM - dormitory line • CENTREX - Centrex line • PBX - PBX line • PRSNIPP - prison (IPP) • WATS - WATS line • CELL - cellular • PAGER - pager • PCS - personal communications service (PCS) • FGA - Feature Group A • MOBILE - mobile • SPLPOST - LEC public, special billing, post-pay overtime • SPLPRE - LEC public, special billing, pre-pay overtime

OLNSDFLT (continued)**Field descriptions (Sheet 5 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
SERVEQPT (continued)			Values are defined as follows (continued): • INCMPIF - public, incompatible network interface • CELLR1, CELLR2 - cellular; rate 1, 2 • BUSSL - POTS line, business, single-line • BUSML - POTS line, business, multi-line • POST - public, postpay
TASENTPD		SCRND, ALLOW, DOM, IAPYMT, IACUST, DISALL	Toll and assist bill to sent-paid calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DOM -allowed for domestic • IAPYMT - allowed for intraLATA calls due to non-payment • IACUST - allowed for intraLATA calls at customer request • DISALL - not allowed for the calling number
TACOLL		SCRND, ALLOW, DOM, DISALL	Toll and assist collect billing calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DOM -allowed for domestic • DISALL - not allowed for the calling number

OLNSDFLT (continued)**Field descriptions (Sheet 6 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
TATHIRD		SCRND, ALLOW, DOM, DISALL, OPR, OPRAUTO	Toll and assist bill to third number calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DOM -allowed for domestic • DISALL - not allowed for the calling number • OPR - allowed with live operator • OPRAUTO - allowed with operator or automated verification
TACCARD		SCRND, ALLOW, DOM, DISALL, CIRLCL, CIRIA, CIR, NDCIRLCL, NDCIRIA, NDCIR	Toll and assist bill to credit card calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DOM -allowed for domestic • DISALL - not allowed for the calling number • CIRLCL - card issuer restrictions for local calls • CIRIA - card issuer restrictions for intraLATA, non-local calls • CIR - card issuer restrictions • NDCIRLCL - non-domestic calls not allowed and card issuer restrictions for intraLATA, non-local calls • NDCIRIA - non-domestic calls not allowed and card issuer restrictions for intraLATA, non-local calls • NDCIR - non-domestic calls not allowed and card issuer restrictions

OLNSDFLT (continued)**Field descriptions (Sheet 7 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
TABNS		SCRND, ALLOW, DISALL	Toll and assist alternate billing paid by the called party (equivalent to SPL CLD). Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DISALL - not allowed for the calling number
DACC		SCRND, ALLOW, DISALL, RSTR, LCL, NOSTPD	Directory assistance call completion. Allow billing on the call completion portion of a DACC call? Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DISALL - not allowed for the calling number • RSTR - allowed from this line with billing restrictions (for toll and non-toll calls) • LCL - allowed from this line for local, non-toll calls: This value indicates that call completion is toll free. • NOSTPD - allowed from this line for alternate billed calls - no sent paid: This value indicates station paid billing is not allowed on the call completion; however, everything else is allowed.
DASENTPD		SCRND, ALLOW, DISALL	Directory assistance bill to sent-paid calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DISALL - not allowed for the calling number

OLNSDFLT (continued)**Field descriptions (Sheet 8 of 8)**

Field	Subfield or refinement	Entry	Explanation and action
DATHIRD		SCRND, ALLOW, DISALL, OPR, OPRAUTO	Directory assistance bill to third number calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DISALL - not allowed for the calling number • OPR - allowed with live operator • OPRAUTO - allowed with operator or automated verification
DACCARD		SCRND, ALLOW, DISALL, CIR	Directory assistance bill to credit card calls. Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DISALL - not allowed for the calling number • CIR - card issuer restrictions
DABNS		SCRND, ALLOW, DISALL	Directory assistance alternate billing paid by the called party (equivalent to SPL CLD). Following are the values: • SCRND - not available due to LIDB data screening • ALLOW - allowed for the calling number (This is the default value.) • DISALL - not allowed for the calling number

Data example

The following example shows sample datafill for table OLNSDFLT.

OLNSDFLT (end)**MAP display example for table OLNSDFLT**

IDX	TRTMT DATHIRD	SERVEQP DACCARD	TASENTPD DABNS	TACOLL	TATHIRD	TACCARD	TABNS	DACC	DASENTPD
0	TONEP2 A	POTS1 A	A A	A	A	A	A	A	A
1	TONEP2 A	POTS1 A	A A	A	A	A	A	N	A
2	TONEP2 A	POTS1 A	A A	A	A	A	A	B	A

Error messages

The following error messages apply to table OLNSDFLT.

Error messages for table OLNSDFLT

Error message	Explanation and action
Tuple is referenced by table OLNSERR.	If an attempt is made to delete a tuple in table OLNSDFLT which is referenced by table OLNSERR, this error message is displayed.

Table history**NA006**

This table was created by functionality TOPS OLNS Interface, ABS00012.

Supplementary information

None

OLNSEQDP**Table name**

Originating Line Number Screening Service/Equipment Display

Functional description

This table provides the 8-character equipment display for the operator. The key into this table is based on the equipment indicator returned by the OLNS data base. The display from this table appears where the display from table RESTBIL appeared prior to OLNS.

Data II sequence and implications

The following tables must be datafilled after table OLNSEQDP.

- OLNSTARS
- OLNSDARS

Table size

0 to 100 tuples

Data II

The following table lists datafill for table OLNSEQDP.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
EQDPKEY		see subfield EQDPIDX	Equipment Display Key. This field consists of subfield EQDPIDX.
	EQDPIDX	0 to 99	Equipment Display Index. This field is the index into the table. The display number is obtained from table OLNSTARS or OLNSDARS.
DISPLAY		8-character string	Operator Display. Enter an arbitrary name to identify the equipment type of the originating party on the operator display.

Data II e xample

The following example shows sample datafill for table OLNSEQDP.

OLNSEQDP (end)

MAP display example for table OLNSEQDP

EQDPKEY	DISPLAY

5	INMATE

Table history

NA006

This table was created by functionality TOPS OLNS Interface, ABS00012.

Supplementary information

None

OLNSERR

Table name

Originating Line Number Screening Error

Functional description

This table is indexed by OLNS query protocol data errors and then provides an index into table OLNSDFLT for error handling. In table OLNSERR, the error type and call type are the tuple key, and the tuple data is an index into table OLNSDFLT. Data errors types are OLNS TCAP or SCCP errors, queries not launched due to code gapping, screened or invalid data, or timeout.

Data II sequence and implications

Table OLNSDFLT must be datafilled before table OLNSERR.

Table size

This table has a fixed size of 108 tuples.

OLNSERR (continued)**Data II**

The following table lists datafill for table OLSERR.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		see subfields ERROR and CLGSERV	Key to table. This field consists of subfields ERROR and CLGSERV.
	ERROR	ACG, DATAERR, DATAUNAV, GTTFAIL, MISCERR, MISSGRP, MISSREC, MISROUTE, NETPROB, NONPARGR P PROTPROB, SCREENED, TIMEOUT, UNAVNETR, UNEXCOMP, UNEQUUSER, UNEXDATA, VACANTGR	OLNS query error. Following are descriptions of the values: • ACG - Automatic Call Gapping. ACG in effect, also known as network management • DATAERR - Data error- not in range of defined protocol values • DATAUNAV - Data unavailable • GTTFAIL - GTT failure consisting of no translation for an address of this nature or no translation for this specific address • MISCERR - Miscellaneous error- if an error occurs which is not one of the other errors defined • MISSGRP - Missing group

OLNSERR (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	ERROR (continued)		Following are descriptions of the values (continued): • MISSREC - Missing customer record • MISROUTE - Misroute • NETPROB - Network problem consisting of subsystem failure or congestion or network failure or congestion • NONPARGRP - Non-participating group • PROTPROB - Protocol problem in query message to the database (which cause the OLNS LIDB to send a reject message to DMS) • SCREENED - Screened data • TIMEOUT - No database response within timeout period • UNAVNETR - Unavailable network resource • UNEXCOMP - Unequipped user • UNEQUUSER - Unexpected Component Sequence • UNEXDATA - Unexpected data value • VACANTGR - Vacant group
	CLGSERV	STATION, SPECIAL, HOTEL, COIN, MOBILE, OTHER	Calling service type. This is determined on the basis of the signalling information and OLNS response message information.
DFLTIDX		0 to 99	Table OLNSDFLT index. Index into table OLNSDFLT for error handling.

Data II e xample

The following example shows default datafill for table OLNSERR. All default datafill is added at initial program load (IPL). The tuples can be changed but not deleted.

OLNSERR (continued)

MAP display of default data for table OLNSERR

KEY	DFLTIDX
ACG STATION	0
ACG SPECIAL	0
ACG HOTEL	0
ACG COIN	0
ACG MOBIL	0
ACG OTHER	0
DATAERR STATION	0
DATAERR SPECIAL	0
DATAERR HOTEL	0
DATAERR COIN	0
DATAERR MOBIL	0
DATAERR OTHER	0
DATAUNAV STATION	0
DATAUNAV SPECIAL	0
DATAUNAV HOTEL	0
DATAUNAV COIN	0
DATAUNAV MOBIL	0
DATAUNAV OTHER	0
GTTFAIL STATION	0
GTTFAIL SPECIAL	0
GTTFAIL HOTEL	0
GTTFAIL COIN	0
GTTFAIL MOBIL	0
GTTFAIL OTHER	0
MISCERR STATION	0
MISCERR SPECIAL	0
MISCERR HOTEL	0
MISCERR COIN	0
MISCERR MOBIL	0
MISCERR OTHER	0
MISSGRP STATION	0
MISSGRP SPECIAL	0
MISSGRP HOTEL	0
MISSGRP COIN	0
MISSGRP MOBIL	0
MISSGRP OTHER	0

OLNSERR (continued)**MAP display of default data for table OLNSERR (continued)**

KEY	DFLTIDX
-----	-----
MISSSREC STATION	0
MISSSREC SPECIAL	0
MISSSREC HOTEL	0
MISSSREC COIN	0
MISSSREC MOBIL	0
MISSSREC OTHER	0
MISROUTE STATION	0
MISROUTE SPECIAL	0
MISROUTE HOTEL	0
MISROUTE COIN	0
MISROUTE MOBIL	0
MISROUTE OTHER	0
NETPROB STATION	0
NETPROB SPECIAL	0
NETPROB HOTEL	0
NETPROB COIN	0
NETPROB MOBIL	0
NETPROB OTHER	0
NONPARGR STATION	0
NONPARGR SPECIAL	0
NONPARGR HOTEL	0
NONPARGR COIN	0
NONPARGR MOBIL	0
NONPARGR OTHER	0
PROTPROB STATION	0
PROTPROB SPECIAL	0
PROTPROB HOTEL	0
PROTPROB COIN	0
PROTPROB MOBIL	0
PROTPROB OTHER	0
SCREENED STATION	0
SCREENED SPECIAL	0
SCREENED HOTEL	0
SCREENED COIN	0
SCREENED MOBIL	0
SCREENED OTHER	0

OLNSERR (continued)**MAP display of default data for table OLNSERR (continued)**

KEY	DFLTIDX
TIMEOUT STATION	0
TIMEOUT SPECIAL	0
TIMEOUT HOTEL	0
TIMEOUT COIN	0
TIMEOUT MOBIL	0
TIMEOUT OTHER	0
UNAVNETR STATION	0
UNAVNETR SPECIAL	0
UNAVNETR HOTEL	0
UNAVNETR COIN	0
UNAVNETR MOBIL	0
UNAVNETR OTHER	0
UNEXCOMP STATION	0
UNEXCOMP SPECIAL	0
UNEXCOMP HOTEL	0
UNEXCOMP COIN	0
UNEXCOMP MOBIL	0
UNEXCOMP OTHER	0
UNEQUUSER STATION	0
UNEQUUSER SPECIAL	0
UNEQUUSER HOTEL	0
UNEQUUSER COIN	0
UNEQUUSER MOBIL	0
UNEQUUSER OTHER	0
UNEXDATA STATION	0
UNEXDATA SPECIAL	0
UNEXDATA HOTEL	0
UNEXDATA COIN	0
UNEXDATA MOBIL	0
UNEXDATA OTHER	0
VACANTGR STATION	0
VACANTGR SPECIAL	0
VACANTGR HOTEL	0
VACANTGR COIN	0
VACANTGR MOBIL	0
VACANTGR OTHER	0

OLNSERR (end)

Error messages

The following error messages apply to table OLNSERR.

Error messages for table OLNSERR

Error message	Explanation and action
Tuples can not be added or deleted.	If an attempt is made to add or delete a tuple in table OLNSDFLT, the add or delete is not allowed and this error message is displayed.
The referenced tuple is not datafilled in table OLNSERR.	If an attempt is made to change a tuple in table OLNSDFLT and the referenced tuple is not present in table OLNSERR, the change is not allowed and this error message is displayed.

Table history**NA006**

This table was created by functionality TOPS OLNS Interface, ABS00012.

Supplementary information

None

OLNSLANG

Table name

Originating Line Number Screening Language

Functional description

Table OLNSLANG defines languages received from an OLNS query as valid for use by the system. The table maps the language to a language name used by table TOPSLANG. After mapping the language, it is passed through different protocols like AABS, DA, OAP, and OPP.

Data II sequence and meaning

Enter datafill into table TOPSLANG before table OLNSLANG.

Table size

0 to 52 tuples

OLNSLANG (continued)

Data II

The table that follows lists datafill for table OLNSLANG.

OLNSLANG (continued)**Field descriptions (Sheet 1 of 2)**

Field	Subfield	Entry	Explanation and action
OLNSLANG		DEFAULT, AMHARIC, ARABIC, ARMENIAN, BENGALI, CAJUN, CANTONESE, CROATIAN, CZECH, DANISH, DRU, DUTCH, FINNISH, FORMOSAN, FRENCH, FRENCH_ CREOLE, GERMAN, GREEK, GUJARATHI, HEBREW, HINDI, HUNGARIAN, ILOCANO, ITALIAN, JAPANESE, KOREAN, LITHUANIAN, MALAYALAM, MANDARIN, MIAO, MON_KHMER, NAVAHO, NORWEGIAN, PANJABI, PENN_DUTCH, PERSIAN, POLISH, PORTUGUESE ,	Originating line number screening language. This field is the key field. Enter a language that is returned by the OLNS database. The valid entries are shown. The following are comments on some of the entries. • DEFAULT -used if the OLNS response does not contain a foreign language parameter. • HINDI - Urdu • MIAO - Hmong • MON-KHMER - Cambodian • PENN_DUTCH - Pennsylvania dutch • THAI - Laotian If table OLNSLANG does not contain an OLNS foreign language, it is not used. Therefore, the calling language is not changed. All languages returned by OLNS may not be supported, so are not defined in table TOPSLANG. Therefore , an alternate language may be suitable. For example, if CZECH is not supported, FRENCH may be appropriate.

OLNSLANG (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield	Entry	Explanation and action
OLNSLANG (continued)		RUMANIAN, RUSSIAN, SAMOAN, SERBO_CROA , SLOVAK, SPANISH, SWEDISH, SYRIAC, TAGALOG. THAI, TIAN, TURKISH, UKRAINIAN, VIETNAMESE, YIDDISH	
LANGNAME		name from table TOPSLANG	Language name. Enter an language name that is sent in the different protocols to notify the system.

Data I l e x a m p l e

The figure that follows shows sample datafill for table OLNSLANG.

MAP display example for table OLNSLANG

OLNSLANG	LANGNAME
-----	-----
DEFAULT	ENG
SPANISH	SPA
FRENCH	FRE
GERMAN	GER
TAGALOG	ENG
ITALIAN	ITA
MANDARIN	MAN
CZECH	FRE

The above datafill shows that TAGALOG and CZECH are not supported, so alternate languages ENGLISH and FRENCH are used.

The LANGNAME can be used for QMS refinement by language in table CT4QLANG as follows:

OLNSLANG (end)

MAP display example for table CT4QLANG

OLDCT4Q	LANGCRIT	NEWCT4Q

0_MINUS	FRE	0_MINUS_FRE

The above example shows that operator handled calls from French subscribers are routed to a call queue staffed by French speaking operators.

Table history
TOPS11

This table was created by feature AF7728 in functionality OLNS Foreign Language, ENSV0021.

OLNSRSDP**Table name**

Originating Line Number Screening Restricted Billing Display

Functional description

This table provides the 8-character restricted billing screen display for the operator. The index into this table is obtained from table OLNSTARS (for toll and assist calls) or OLNSDARS (for directory assistance calls), field RSDPIDX.

Data II sequence and implications

The following tables must be datafilled after table OLNSRSDP.

- OLNSTARS
- OLNSDARS

Table size

0 to 100 tuples

Data II

The following table lists datafill for table OLNSRSDP.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
RSDPKEY		see subfield RSDPIDX	Restricted Display Number Key. This field consists of subfield RSDPIDX.
	RSDPIDX	0 to 99	Restricted Display Number Index. This field is the index into the table. The display number is obtained from table OLNSTARS or OLNSDARS.
DISPLAY		8-character string	Operator Display. Enter an arbitrary name to identify the billing type on the operator display.

Data II e xample

The following example shows sample datafill for table OLNSRSDP.

OLNSRSDP (end)

MAP display example for table OLNSRSDP

RSDPKEY	DISPLAY
2	NOCOL

Table history

NA006

This table was created by functionality TOPS OLNS Interface, ABS00012.

Supplementary information

None

OLNSTARS

Table name

Originating Line Number Screening Toll and Assist Billing Restriction

Functional description

This table is used for toll and assist calls to provide the restricted billing index for various protocols and an index into other DMS switch tables. In addition this table provides operator screen display indices into tables OLNSRSDP and OLNSEQDP. Table OLNSTARS has a eight part key consisting of the service/equipment indicator, billing options, and treatment indicator.

Data II sequence and implications

Tables OLNSRSDP and OLNSEQDP must be datafilled before table OLNSTARS.

Table size

0 to 32,767 tuples

OLNSTARS (continued)**Data II**

The following table lists datafill for table OLNSTARS.

Field descriptions (Sheet 1 of 11)

Field	Subfield or refinement	Entry	Explanation and action
TARSKEY		see subfields	Toll and Assist Billing Restrictions Key. This field is the index into the table and consists of subfields SRVEQPT, COLLECT, THIRD, CCARD, SPLBNS, SENTPD, DACC, and TRMT.
	SERVEQPT	POTS, LECPOST, RES1, RES2, LECSEMI, BUSFLAT, BUS1, BUS2, NCNNOIPP, NCNIPP, PRETCS, LECPRE, LECALT, ICSTD, ICALT, RESFLAT, VQNOTAX, VQTAX, IPSTD, IPALT, HOSPITAL, PRISON, AQNOTAX, AQTAX, DORM, CENTREX,	Service Equipment. This field corresponds to the Originating Service/Equipment Indicator received from the OLNS database. This indicator provides the calling station type. The default is POTS. This indicator value appears in AMA table 675 (Modified Service or Equipment Indicator) of structure code 0772. The values are defined as follows: (Note, the associated AMA protocol value is shown in parenthesis. However, the AMA value is not an input to this table, rather, the indicator is an input to AMA and to this field.) • POTS (01) - POTS line, business/residential • LECPOST (02) - LEC public, standard interface, postpay overtime Public, standard interface indicates a set whose functions (that is, rating, coin detection, coin signaling, and announcements) are controlled by signaling from the network. Postpay overtime indicates a coin phone for which the customer is allowed to talk for the initial period and one subsequent period before being prompted for payment for the preceding period (that is, payment is made after its corresponding time interval of a call.)

OLNSTARS (continued)**Field descriptions (Sheet 2 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	SERVEQPT (continued)	PBX, PRSNIPP, WATS, CELL, PAGER, PCS, FGA, MOBILE, SPLPOST, SPLPRE, INCMPIF, CELLR1, CELLR2, BUSSL, BUSML, POST	Values are defined as follows (continued): - RES1 (03), RES2 (04) - POTS line; residential; message rate 1, 2 Flat rate, message rate 1, and message rate 2 indicate the rate applicable to the line that is used by the Real Time Rating System when determining the rate for a call. - LECSEMI (05) - LEC semi-public: This indicates that the originating stations is a coin phone owned by an LEC (operating company) for which special agreements have been made with the location provider. - BUSFLAT (06) - POTS line, business, flat rate - BUS1 (07), BUS2 (11) - POTS line; business; message rate 1, 2 - NCNNOIPP (08) - coinless (non-IPP) - NCNIPP (09) - coinless (IPP) IPP refers to a public station that is owned by an independent payphone provider; in the past, these sets were referred to as customer owned coin operator telephones (COCOTs). - PRETCS (10) - LEC prepaid, telecommunications card station: - This indicates a coinless set owned by an LEC that accepts pre-paid cards (for example, cash cards).

OLNSTARS (continued)**Field descriptions (Sheet 3 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	SERVEQPT (continued)		Values are defined as follows (continued): • LECPRE (12) - LEC public, standard interface, prepay overtime Prepay overtime indicates a coin phone for which the customer is allowed to talk for the initial period and is prompted to pre-pay for the next time duration (that is, all time intervals for a call are paid before they occur.) • RESFLAT (16) - POTS line, residential, flat rate • VQNOTAX (17) - voice quote, without tax • LECALT (13) - LEC public, alternate interface: This indicates a set whose functions (that is, rating, coin detection, coin signaling, and announcements) are controlled locally (that is, these functions are located in the set). • ICSTD (14) - IC public, standard interface • ICALT (15) - IC public, alternate interface • VQTAX (18) - voice quote, with tax • IPSTD (19) - IPP, standard interface • IPALT (20) - IPP, alternate interface • HOSPITAL (21) - hospital • PRISON (22) - prison (non-IPP) • AQNOTAX (23) - auto quote, without tax

OLNSTARS (continued)**Field descriptions (Sheet 4 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	SERVEQPT (continued)		Values are defined as follows (continued): • AQTAX (24)- auto quote, with tax • DORM (25) - dormitory line • CENTREX (26) - Centrex line • PBX (27) - PBX line • PRSNIPP (28) - prison (IPP) • WATS (29) - WATS line • CELL (30)- cellular • PAGER (31) - pager • PCS (32) - personal communications service (PCS) • FGA (33) - Feature Group A • MOBILE (34) - mobile • SPLPOST (35) - LEC public, special billing, post-pay overtime • SPLPRE (36) - LEC public, special billing, pre-pay overtime • INCMPIF (37) - public, incompatible network interface • CELLR1 (38), CELLR2 (39) - cellular; rate 1, 2 • BUSSL (40) - POTS line, business, single-line • BUSML (41) - POTS line, business, multi-line • POST (42) - public, postpay

OLNSTARS (continued)**Field descriptions (Sheet 5 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	COLLECT	ALLOW, DOM, DISALL	Collect. This field specifies the restrictions associated with collect billing. This field corresponds to the Originating Collect Billing Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. This is the same as the pre-OLNS billing type COLLECT. The values are defined as follows: • ALLOW - allowed • DOM - allowed for domestic • DISALL - not allowed
	THIRD	ALLOW, DOM, DISALL, OPR, OPRAUTO	Third Number. This field specifies the restrictions associated with third number billing. This field corresponds to the Third Number Billing Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. This is the same as the pre-OLNS billing types THIRD and SPLCLG. The values are defined as follows: • ALLOW - allowed • DOM - allowed for domestic • DISALL - not allowed • OPR - allowed with live operator verification • OPRAUTO - allowed with operator or automated verification

OLNSTARS (continued)**Field descriptions (Sheet 6 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	CCARD	ALLOW, DOM, DISALL, CIRLCL, CIRIA, CIR, NDCIRLCL, NDCIRIA, NDCIR	Calling Card. This field specifies the restrictions associated with calling card billing. This field corresponds to the Calling Card Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. This is the same as the pre-OLNS billing type CALLING CARD. The values are defined as follows: • ALLOW - allowed • DOM - allowed for domestic • DISALL - not allowed • CIRLCL - card issuer restrictions for local calls • CIRIA - card issuer restrictions for IntraLATA, non-local calls • CIR - card issuer restrictions • NDCIRLCL - non-domestic calls not allowed and card issuer restrictions for local calls • NDCIRIA - non-domestic calls not allowed and card issuer restrictions for IntraLATA, non-local calls • NDCIR - non-domestic calls not allowed and card issuer restrictions
	SPLBNS	ALLOW, DISALL	Special Billed Number Screening. This field specifies the restrictions associated with special called billing. This field corresponds to the Special BNS Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. The values are defined as follows: • ALLOW - allowed • DISALL - not allowed

OLNSTARS (continued)

Field descriptions (Sheet 7 of 11)

Field	Subfield or refinement	Entry	Explanation and action
	SENTPD	ALLOW, DOM, IAPYMT, IACUST, DISALL	Station Paid. This field specifies the restrictions associated with station paid billing. This field corresponds to the Sent Paid Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. The values are defined as follows: • ALLOW - allowed • DOM - allowed for domestic • IAPYMT - allowed for IntraLATA calls due to non-payment • IACUST - allowed for IntraLATA calls at customer request • DISALL - not allowed

OLNSTARS (continued)**Field descriptions (Sheet 8 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	DACC	ALLOW, DISALL, RSTR, LCL, NOSTPD	Directory Assistance Call Completion. This field specifies the restrictions associated with DA call completion. This field corresponds to the Originating DACC Indicator of the Originating Billing Services Indicator parameter received from the OLNS database. The values are defined as follows: • ALLOW - allowed from this line for toll and non-toll calls: This value indicates call completion is allowed. Billing checks are not necessary. All billing types should be allowed. Note that LIDB datafill should never return 'allowed from this line' along with restrictions on the billing types allowed. Therefore, this combination should be should not be allowed when the LIDB is populated. If this data inconsistency does occur and the DACC indicator equals "allowed", call completion is allowed to continue with no further checking for billing restrictions. As a guideline when datafilling the LIDB, this value can be used if a line has a billing restriction on the DA but not the TA portion of the call or when there are no restrictions on any of the billing types. • DISALL - not allowed from this line for toll and non-toll calls: This value indicates call completion is not allowed for this line.

OLNSTARS (continued)**Field descriptions (Sheet 9 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	DACC (continued)		Values are defined as follows (continued): • RSTR - allowed from this line with billing restrictions for toll and non-toll calls: This value indicates call completion is allowed, but the selected billing is checked by the DMS switch against the billing indicator to determine if it's allowed. As a guideline when datafilling the LIDB, this value can be used if a line has a billing restriction on the TA portion of the call. • LCL - allowed from this line for local, non-toll calls: This value indicates that call completion is allowed for local, non-billable calls only. • NOSTPD - allowed from this line for alternate billed calls - no sent paid: This value indicates that station paid billing is not allowed on call completion and the DMS switch checks the selected billing against the billing indicators to make sure billing is allowed. This is handled in the same manner as RSTR except station paid is not allowed regardless of the indicator. As a guideline when datafilling the LIDB, this value can be used if If a line has a billing restriction on the TA portion of the call, but the sent paid indicator is not one of those that is restricted and should not be allowed for call completion, or the line does not have any restrictions, but sent paid is not allowed on the call completion portion of the call.

OLNSTARS (continued)**Field descriptions (Sheet 10 of 11)**

Field	Subfield or refinement	Entry	Explanation and action
	TRMT	TONE, TONEP1, TONEP2, TONEP3, TONEP7, TONEP8, TONEP9, TONEP13, OPRSTA, OPRCUST, HANDCAP, DEAF, FRAUD, NOOPR, TP4NOPR, TP5NOPR, TP6NOPR, TP10NOPR, TP11NOPR, TP12NOPR,T P14NOPR,SP L1, SPL2, SPL3, SPL4, SPL5	Treatment. This is the Treatment indicator returned by the OLNS database. The default is TONEP2. This field corresponds to AMA table 677 (modified treatment indicator) in structure code 0772. The values are defined as follows (note, AMA values are in parenthesis): • TONE (01) - automated treatment, provide alerting tone only • TONEP1 (01), TONEP2 (07), TONE3 (08), TONEP7-TONEP9, TONEP13 -automated treatment, provide alerting tone and prompting announcement 1-3,7-9,13 • OPRSTA (03) - operator treatment, operator handling (station limitations) • OPRCUST (04) - operator treatment, operator handling (at customer request) • HANDCAP (05) - special treatment, handicapped • DEAF (06) - special treatment, deaf • FRAUD (09) - operator treatment, high fraud • NOOPR (10) - automated treatment, provide alerting tone only - no operator access • TP4NOPR (11), TP5NOPR (12), TP6NOPR (13), TP10NOPR-TP12NOPR, TP14NOPR - automated treatment, provide alerting tone and prompting announcement 4-6, 10-12,14 - no operator access • SPL1 -SPL5 - automated treatment, special handling 1-5

Field	Subfield or refinement	Entry	Explanation and action
SCRNCODE		0 to 100	Screen Code. This field replaces the restricted billing number from table SPLDNID. It is used by various protocols for announcements and as an index to tables such as DABILL, ADACCOPT, CT4QREST, and so forth. Value 100 is the nil value.
RSDPIDX		0 to 100	Restriction Display Index. This is an index into table OLNSRSDP to obtain a display for the billing type. Value 100 is the nil display number and indicates there is no screen display.
EQDPIDX		0 to 100	Equipment Display Index. This is an index into table OLNSEQDP to obtain a display for the originating equipment type. Value 100 is the nil display number and indicates there is no screen display.

The following example shows sample datafill for table OLNSTARS.

TARSKEY									
				SCRNCODE		RSDPIDX		EQDPIDX	

PRISON	ALLOW	ALLOW	DISALL	DISALL	DISALL	RSTR	OPRSTA		
				74		1		5	

This table was created by functionality TOPS OLNS Interface, ABS00012.

None

OMACC**Table name**

Operational Measurements Accumulator (OMACC) table

Functional description

Table OMACC records the period of time that the accumulating registers collect data for a specified accumulating class of operational measurements (OM).

For related information, see the description of table OMPRT.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table OMACC.

For a one-night process (ONP), table OMACC restores before tables OMACCGRP, OMACCFLD, OMACCKEY, OMACCTOT, and OMTOTAL.

Table size

0 to 30 tuples

The system allocates memory for a maximum of 30 entries in table OMACC.

Data II

Datafill for table OMACC appears in the following table.

Field descriptions (Sheet 1 of 4)

Field	Subfield or refinement	Entry	Explanation and action
CLASS		alphanumeric	<i>Class name.</i> The use of command OMCLASS causes the system to enter data in this field. This action establishes an operational measurements (OM) class. The field contains the name of the accumulating or history class of OMs for which to establish accumulating periods.
ENABLED		Y or N	<i>Enabled.</i> Enter Y (yes) to enable the accumulating class. Enter Y if accumulation of data during the specified period occurs. For other conditions, enter N (no).

OMACC (continued)**Field descriptions (Sheet 2 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
PRECSN		SPRECISION DPRECISION HPRECISION HISTPRECISION	<i>Precision.</i> Enter SPRECISION for single precision, DPRECISION for double precision, HPRECISION for holding precision, and HISTPRECISION for history precision.
WHEN		see subfield	<i>When.</i> This field contains subfield REP.
	REP	AUTO MONTHLY WEEKLY DAILY HOURLY HALFHOURLY DAYTIME HISTORY DEVWEEK or DEVDAY	<i>Repetition.</i> Enter the period of time that OMs for an enabled class accumulate. Enter AUTO for holding classes. This value cannot change, this value is read-only. The setting of the accumulating period occurs in field OMXFER in table OFCENG. If AUTO appears in table OMACC, enter AUTO in subfield REP in tables OMPRT and OMTAPE. For an OMXFER rate of $\times 15$, enter AUTO in subfield REP in tables OMACC and OMPRT. If the OMXFER rate is $\times 30$ and a report each 0.5 h is a requirement, the following are possible datafill combinations for subfield REP: • table OMACC with AUTO setting and table OMPRT with AUTO setting • table OMACC with HALFHOURLY setting and table OMPRT with HALFHOURLY setting • table OMACC with AUTO setting and table OMPRT with HALFHOURLY setting • table OMACC with HALFHOURLY setting and table OMPRT with AUTO setting Enter MONTHLY to specify one accumulation of OMs in a month. Enter refinements FROMDAYOFM, FROMTIME, TODAYOFM, and TOTIME where REP= MONTHLY.

OMACC (continued)**Field descriptions (Sheet 3 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	REP (continued)		You can obtain a set of data for a full month. For this even to occur, refinements FROMDAYOFM and TODAYOFM, and refinements FROMTIME and TOTIME must have the same values. For example, MONTHLY 1 0 C00 1 0 C00 corresponds to the period from midnight at the start of the month to the following. Refinement MONTHLY 1 0 C00 1 0 C00 corresponds to the values to midnight at the end of the last day of the month. Enter WEEKLY to specify one accumulation of OMs each week. Enter data in refinements FROMDAYOFW, FROMTIME, TODAYOFW, and TOTIME where REP=WEEKLY. Enter DAILY to specify one accumulation of OMs each day of each week. Enter data in refinements FROMTIME and TOTIME where REP=DAILY. To obtain a full 24 h set of data for a DAILY accumulation, refinements FROMTIME and TOTIME must have the same values. For example, DAILY 12 C00 12 C00 corresponds to every 24 h from 12 noon to 12 noon. Enter HOURLY to specify a continuous succession of accumulations of OMs each hour. Enter data in refinement STARTUP where REP=HOURLY or HALFHOURLY. Enter HALFHOURLY to specify a continuous succession of accumulations of OMs each 0.5 h. Enter refinement STARTUP where REP=HOURLY or HALFHOURLY.

OMACC (continued)**Field descriptions (Sheet 4 of 4)**

Field	Subfield or refinement	Entry	Explanation and action
	REP (continued)		The DAYTIME is like DAILY, except the use of this value specifies OM accumulation for a specified block of days each week. If you enter DAYTIME, enter data in refinements FROMDAYOFW, TODAYOFW, FROMTIME, and TOTIME where REP=DAYTIME. The HISTORY appears only for history classes. This value cannot change. This value is read-only. See refinements SNAPSHOTS and XFER where REP=HISTORY. Enter DEVWEEK to specify one accumulation of OMs each week. Enter refinements DOW and WHEN where REP= DEVWEEK. Enter DEVDAY to specify one accumulation of data each day of the week. Enter refinement WHEN where REP=DEVDAY.

REP = MONTHLY

If the entry in subfield REP is MONTHLY, enter data in refinements FROMDAYOFM, FROMTIME, TODAYOFM, and TOTIME as the following table describes.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY OFM	1 to 31	<i>From day of month.</i> Enter the day of the month that data collection starts.
	FROMTIME	see subfields	<i>From time.</i> This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection starts.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection starts.
	TODAYOFM	1 to 31	<i>To day of month.</i> Enter the day of the month that data collection stops.

OMACC (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	TOTIME	see subfields	<i>To time.</i> This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection stops.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection stops.

REP = WEEKLY

If the entry in subfield REP is WEEKLY, enter data in refinements FROMDAYOFW, FROMTIME, TODAYOFW, and TOTIME as the following table describes.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week.</i> Enter the day of the week that data collection starts.
	FROMTIME	see subfields	<i>From time.</i> This refinement contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection starts.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection starts.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week.</i> Enter the day of the week that data collection stops.
	TOTIME	see subfields	<i>To time.</i> This refinement contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection stops.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection stops.

OMACC (continued)**REP = DAILY**

If the entry in subfield REP is DAILY, enter data in refinements FROMTIME and TOTIME as the following table describes.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMTIME	see subfields	<i>From time.</i> This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection starts.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection starts.
	TOTIME	see subfields	<i>To time.</i> If the entry in subfield REP is DAILY, enter this refinement. This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection stops.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection stops.

REP = HOURLY or HALFHOURLY

If the entry in subfield REP is HOURLY or HALFHOURLY, enter data in refinement STARTUP as the following table describes.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	STARTUP	C00, C15, C30, or C45	<i>Startup.</i> If the entry in subfield REP is HOURLY, enter this refinement. This refinement defines the time past the hour that the first accumulating period starts. This time is also dependent on the value in field OMXFER in table OFCENG. Enter the time of the hour, in 15 min intervals, that data collection starts.

OMACC (continued)**REP = DAYTIME**

If the entry in subfield REP is DAYTIME, enter data in refinements FROMDAYOFW, TODAYOFW, FROMTIME, and TOTIME as the following table describes.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week.</i> Enter the day of the week that data collection starts.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week.</i> Enter the day of the week that data collection stops.
	FROMTIME	see subfields	<i>From time.</i> This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of each day of the FROMDAYOFW to TODAYOFW period that data collection starts.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection starts.
	TOTIME	see subfields	<i>To time.</i> This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period that data collections stops.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection stops.
Note: Refinement FROMTIME specifies the block of days. Refinement TOTIME does not specify the block of days. If the period of accumulation overlaps midnight, accumulation continues into the day following the entry refinement TODAYOFW contains.			

OMACC (continued)**REP = HISTORY**

If the entry in subfield REP is HISTORY, with the use of command OMCLASS, the following occurs. The system enters the subfields that appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	SNAPSHOTS	1 to 6	<i>Number of snapshots.</i> This read-only field specifies the number of history registers for each measurement.
	XFER	T5, T10, T15, T20, or T30	<i>Transfer attribute.</i> This read-only field specifies the time, in minutes, that a single history register is current. A value of T5 causes the history register to cycle every five min.

REP = DEVWEEK

If the entry in subfield REP is DEVWEEK, enter data in refinements DOW and WHEN as the following table describes.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	DOW	SU, MO, TU, WE, TH, FR, or SA	<i>Day of week.</i> Enter the day of the week that data collection occurs.
	WHEN	see subfields	<i>When.</i> This refinement consists of sub-refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection starts.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection starts.

OMACC (end)**REP = DEVDAY**

If the entry in subfield REP is DEVDAY, enter data in refinement WHEN as the following table describes.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	WHEN	see subfields	<i>When.</i> This refinement consists of subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day that data collection starts.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the time of the hour, in 15 min intervals, that data collection starts.

Data II e xample

Sample datafill for table OMACC appears in the following example.

MAP example for table OMACC

CLASS	ENABLED	PRECSN	WHEN
EADAS30M	N	SPRECISION	AUTO
EADAS60M	N	SPRECISION	AUTO
EADAS24H	N	SPRECISION	AUTO
PREV5M	N	SPRECISION	AUTO
CURR5M	N	SPRECISION	AUTO

Table history**BASE06**

Field PRECSN was added in accordance with Non-Data Tables to Tables (OM).

Additional information

There is no additional information.

OMACCFLD

Table name

Operational Measurements Accumulator Field (OMACCFLD) table

Functional description

- Table OMACCFLD contains the operational measurement (OM) configuration data associated with the OM CI command OMACCFLD. Use this table to perform the following actions:
- add an OM field to an accumulating class
- delete an OM field from an accumulating class

This table provides an alternate interface to OM accumulating information. Before the introduction of this table, access to this information only occurred through use of OM CI commands.

The addition or deletion of tuples from this table is the same as activating the OM CI command OMACCFLD.

Data II sequence and meaning

Enter data in tables OMACC and OMACCGRP before you enter data in table OMACCFLD.

Table size

0 to 960 000 tuples

Data II

Datafill for table OMACCFLD appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OMFIELD	CLASS GROUP and FIELD	see subfields	<i>OM field.</i> This field is the key for the table. This field contains a correct accumulating class, a correct OM group, and a field entry.
	CLASS	a maximum of 8 alphanumeric characters	<i>Accumulating class.</i> Enter the name of the accumulating class. For example, TEST1. Enter a maximum of 30 accumulating classes.

OMACCFLD (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
OMDATA	GROUP	a maximum of 8 alphanumeric characters	<i>Group.</i> Enter the OM group name. For example, TRK.
	FIELD	ALL or FIELD	<i>Fields.</i> Enter ALL if addition or deletion of all the fields in the specified OM group must occur. Enter FIELD if the addition or deletion of separate register fields must occur. Enter data in the refinement field.
	field	a maximum of 8 alphanumeric characters	Enter the field name. For example, RCVSZ2.
		ADD or DELETE	<i>OM data.</i> Enter ADD to add fields to the accumulating class. Enter DELETE to delete fields from the accumulating class.

Data example

Sample datafill for table OMACCFLD appears in the following example.

MAP example for table OMACCFLD

CLASS	GROUP	FIELD	OMDATA
PREV5M	RCVR	FIELD	RCVSZRS DELETE
PREV5M	RCVR	FIELD	RCVSZ2 DELETE
PREV5M	RCVR	FIELD	RCVOVFL DELETE
PREV5M	RCVR	FIELD	RCVQOCC DELETE
PREV5M	RCVR	FIELD	RCVQABAN DELETE
PREV5M	RCVR	FIELD	RCVTRU2 DELETE
PREV5M	TRMTCM	FIELD	TCMUNDT DELETE
PREV5M	TRMTCM	FIELD	TCMPDIL DELETE

OMACCGRP

Table name

Operational Measurements Accumulator Groups (OMACCGRP) table

Functional description

Table OMACCGRP holds the operational measurement (OM) configuration data associated with the OM CI command OMACCGRP. Use this table to assign or delete OM groups to or from accumulating classes. Before, the OM CI command OMCLASS defined the accumulating classes.

Before the introduction of this table, access of OM accumulating information could only occur through use of OM CI commands. This table provides an alternate interface to OM accumulating information.

Tuples in table OMACCGRP update with use of the OMACCGRP command to add or delete OM groups from accumulating classes.

Data II sequence and meaning

Use the class names that you can use as the first part of the key in table OMACCGRP to update table OMACC. Perform this action before you enter table OMACCGRP. Use the table editor or the OMCLASS command to perform these updates.

Table OMTOTAL restores before table OMACCGRP during a one-night process (ONP)

Table size

0 to 30 000 tuples

Data II

Datafill for table OMACCGRP appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OMGRP	CLASS and GROUP	See subfields	<i>OM group</i> . This field is the key for the table. The field consists of a correct accumulating class and a group.
	CLASS	a maximum of eight alphanumeric characters	<i>Accumulating class</i> . Enter the accumulating class name, for example, TEST1. Enter a maximum of 30 accumulating classes.

OMACGRP (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
OMDATA	GROUP	ALL or GROUP	<i>Group.</i> Enter ALL if the accumulating class must have all OM groups defined on the switch added or deleted. Enter GROUP if an accumulating class must have an individual OM group added or deleted. Enter refinement ONEGRP.
	ONEGRP	a maximum of eight alphanumeric characters	<i>OM group.</i> Enter the OM group name, for example, TRK.
		ADD or DELETE	Enter ADD if the accumulating class must have an OM group or groups added or deleted. Enter DELETE if the accumulating class must have an OM group or groups deleted.

Data example

Sample datafill for table OMACGRP appears in the following table.

MAP example for table OMACGRP

CLASS	GROUP	OMDATA
PREV5M	GROUP	RCVR
PREV5M	GROUP	TRMTCM
PREV5M	GROUP	TRMTER
PREV5M	GROUP	TRMTFR
PREV5M	GROUP	TRMTRS
PREV5M	GROUP	RADR
PREV5M	GROUP	EACARR
PREV5M	GROUP	CBK
PREV5M	GROUP	PRP
PREV5M	GROUP	NWMTGCNT

OMACCKEY

Table name

Operational Measurements Accumulator Key table

Functional description

Table OMACCKEY holds the operational measurement (OM) configuration data associated with the OM CI command OMACCKEY. The operating company uses this table to select specified tuples in an accumulating group and OM class. The operating company selects these tuples for output to a printing device.

This table provides an alternate interface to OM accumulating data. Before the introduction of this table, access to OM accumulating data only occurred with the OM CI commands.

When you use the OM CI command OMACCKEY, the system updates table OMACCKEY.

Data II sequence and meaning

Enter data in tables OMACC and OMACCGRP before you change the datafill in table OMACCKEY.

Table size

0 to 1 966 080 000 tuples

Data II

Datafill for table OMACCKEY appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OMKEY	CLASSGROUP NODE and KEY	see subfields	<i>OM key.</i> This field is the key for the table. This field contains a correct accumulating class, a correct OM group, a node entry, and a key entry.
	CLASS	a maximum of 8 alphanumeric characters	<i>Accumulating class.</i> Enter the accumulating class name. For example, TEST1. You can enter a maximum of 30 accumulating classes.

OMACCKEY (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
OMDATA	GROUP	a maximum of 8 alphanumeric characters	<i>Group.</i> Enter the name of the OM group that contains the registers.
	NODE	CM, FP, AP	<i>Node.</i> Enter the node name. The node name indicates if the computing module (CM), file processor (FP) or application processor (AP) has the OM configuration of this tuple. Note: When S/DMS operational measurements (SOM) are not active, the only correct entry for this field is CM. If the entry in this field is AP or FP, enter data in refinement NODENO
	KEY	ALL or KEY	<i>Field key.</i> Enter ALL to add or delete all fields in the OM group. Enter KEY to add or delete one field. If you enter KEY, enter data in refinement KEY_VALUE.
	NODENO	0 to 255	<i>Node number.</i> Enter the node number.
	KEY_VALUE	0 to 65 536	Enter the added or deleted key.
		ADD or DELETE	Enter ADD to add fields. Enter DELETE to delete fields.

Data II e xample

Datafill for table OMACCKEY appears in the following example.

OMACCKEY (end)

MAP example for table OMACCKEY

CLASS	GROUP	NODE	KEY	OMDATA
TEST1	GROUPA	CM	KEY 8	DELETE
TEST2	GROUPA	CM	KEY 57	DELETE
TEST3	GROUPA	CM	KEY 245	DELETE
TEST1	GROUPB	FP 0	ALL	DELETE
TEST4	GROUPX	CM	KEY 1	DELETE
TEST4	GROUPY	AP 1	KEY 1	DELETE
TEST4	GROUPY	AP 1	KEY 2	DELETE

OMACCTOT**Table name**

Operational Measurements Accumulator Total table

Functional description

Table OMACCTOT holds the operational measurement (OM) configuration data associated with the OM CI command OMACCTOT. This table can specify that an accumulating group and OM class only require OM totals. This table can specify that an accumulating group and OM class do not require OM totals.

This table provides an alternate interface to OM accumulating data. Before the introduction of this table, access to OM accumulating data only occurred with the OM CI commands.

When you use the OM CI command OMACCTOT, the system updates table OMACCTOT.

Data II sequence and meaning

You must enter data in tables OMACC and OMACCGRP before you enter data in table OMACCTOT.

Table size

0 to 30 000 tuples

Data II

Datafill for table OMACCTOT appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
ACCTTKEY	CLASS and GROUP	see subfields	<i>Accumulating total key.</i> This field is the key for the table. This field contains a correct accumulating class and a correct OM group.
	CLASS	a maximum of 8 alphanumeric characters	<i>Accumulating class.</i> Enter the accumulating class name. For example, TEST1. You can enter a maximum of 30 accumulating classes.

OMACCTOT (end)

Field descriptions (Sheet 2 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OMDATA	GROUP	a maximum of 8 alphanumeric characters	<i>OM group</i> . Enter OM group name. For example, TRK.
		ON or OFF	Enter ON to activate the capability. Enter OFF to deactivate the capability.

Data l l e x a m p l e

Sample datafill for table OMACCTOT appears in the following example.

MAP example for table OMACCTOT

CLASS	OMTOT
TEST1	GROUPX
TEST2	GROUPX
TEST2	GROUPZ
TEST3	GROUPA
TEST4	GROUPC
TEST4	GROUPF
TEST4	GROUPN

OMDEV

Table name

Operational Measurements Device Table

Functional description

The system uses table OMDEV to enter dedicated output devices for operational measurements (OM). Table OMDEV contains field DEVNAME. This field specifies an output device or disk volume name, and field EBCDIC. Field EBCDIC specifies if the system uses the ASCII (American Standard Code for Information Interchange) or EBCDIC (Extended Binary-coded Decimal Interchange Code) output character standard for output.

In table OMPRT, the entry in field OUTDEV specifies the dedicated output device to which the system sends a report. This entry corresponds to the entry in field DEVNAME in table OMDEV. The system sends OMs to a dedicated output device. The system does not send other data to the device.

The system uses entry in field DEVNAME to print OM buffered reports. The output device must not be a guaranteed device. A guaranteed device continues to run despite call processing or the maintenance load. A guaranteed device continues to run if the DMS switch is under a heavy load.

For additional information on OM buffered reports, see table OMPRT.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table OMDEV.

Table size

1 to 32 tuples

This table contains one tuple that you cannot change or delete. Use the ADD command of table control to add more tuples to a maximum of 32 different devices.

OMDEV (end)

Data II

Datafill for table OMDEV appears in the following table.

xxxField descriptions

Field	Subfield or refinement	Entry	Description
DEVNAME		alphanumeric (1 to 16 characters)	<i>Device or volume name.</i> Enter the device or volume name of the dedicated output device that receives OM buffered reports. Dedicated devices are for the field application.
EBCDIC		Y or N	<i>EBCDIC output character standard.</i> Enter Y if the EBCDIC output character standard applies. Enter N if the ASCII output character standard applies.

Data II e xample

Sample datafill for table OMDEV appears in the following example.

In this example, one tuple is always present in table OMDEV. You cannot delete or change this tuple. The device name of the dedicated output devices is SINK. The system does not use the EBCDIC output character standard. The ASCII output is in effect.

MAP example for table OMDEV

DEVNAME	EBCDIC
SINK	N

OMGRPORD

Table name

Operational Measurements Group Order Table

Functional description

Table OMGRPORD allows the operating company to define the order of the operational measurements (OM) group outputs in each OM accumulating class. The OM accumulating classes are the entries in table OMACC. The operating company can arrange the OM outputs according to the desired priority through the entry of data in table OMGRPORD. If you do not enter data in table OMGRPORD, the output priority of the classes depends on default values.

The group name of an OM accumulating class must be present in table OMGRPORD, the system generates the output of that group. The system generates the output according to the default groups that table OMGRPORD defines. If an OM accumulating class name is not present in table OMGRPORD, the system generates the output in default order.

For additional information, see table OMPRT.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table OMGRPORD.

Note: You must delete an OM group from table OMGRPORD before you delete a tuple from an accumulating class.

Table size

The system allocates memory for this table. Each OM accumulating class requires 64 words of protected data store.

OMGRPORD (end)**Data II**

Datafill for table OMGRPORD appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Description
CLASS		alphanumeric (a maximum of 8 characters)	<i>Class name.</i> Enter the class name for the OM accumulating class that the OMCLASS commands define.
ORDER		0 to 255	<i>Order.</i> Enter the order of the output in the class for the group name.
GRPNAME		alphanumeric (a maximum of 8 characters)	<i>Group name.</i> Enter the correct OM group name. The OM group name is part of the class name that you enter in field CLASS through command OMACCTAB.

Data II e xample

Sample datafill for table OMGRPORD appears in the following example.

MAP example for table OMGRPORD

CLASS	ORDER	GRPNAME
TAPE	0	TRK
TAPE	1	ANN
TAPE	2	AMA
JOHN	0	RCVR
JOHN	1	AMA
JOHN	5	NMC

Note: Operating companies can add new group names between JOHN 1 and JOHN 5.

OMKEYORD**Table name**

OMKEYORD

Functional description

Table OMKEYORD records the operational measurements (OM) tuple order on the switch. During a One Night Process (ONP), the system transfers the OM tuple order information from OMKEYORD to the new software load. The new software load uses the OM tuple order information to order the multiple tuple OM groups for that office.

Data II sequence and meaning

You must enter data in table VIRTGRPR before you enter data in table OMKEYORD.

Table size

0 to 16 383 000

Data II

Datafill for table OMKEYORD appears in the following table.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Description
OMORDKEY		see subfields	<i>OM order key</i> This field is the key to the table. This field contains subfields OMGROUP and OMTUPLE.
	OMGROUP	alphanumeric (3 to 8 characters)	<i>OM group</i> . This subfield is an OM group name, for example, FTRQ.
	OMTUPLE	numeric (0 to 16383)	<i>OM tuple</i> . This subfield is the index number of the OM tuple, for example, 0.

OMKEYORD (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Description
OMORDPI		numeric (0 to 16383)	<i>OM order print index.</i> This field contains the OM tuple index that the system prints. This OM tuple index is the same as the OM tuple index from the old software load. A value of 16383 indicates that the tuple is a hole tuple. A hole tuple keeps the correct OM tuple order in the new software load. A hole tuple replaces an OM tuple from the old software load deleted in the new software load.
OMORDCV		alphanumeric (1 to 76 characters)	<i>OM order tuple name.</i> This field contains the name of the OM tuple. This field represents the name of field OMORDPI. For example, FTRQAGENTS.

Data l l e x a m p l e

Sample datafill for table OMKEYORD appears in the following example.

MAP example for table OMKEYORD

```

OMORDKEY OMORDPI OMORDCV
-----
FTRQ 0 0 FTRQAGENTS
FTRQ 1 16383 HOLE TUPLE
FTRQ 2 1 FTRA8WAREAS

```

Table history**BASE08**

Table OMKEYORD was introduced in BASE08.

OMPRT

Table name

Operational Measurements Printer Table

Functional description

The operational measurements (OM) system collects and reports OMs.

An OM is a number that indicates the quantity of a specified aspect of switch performance. For example, the number of central message controller (CMC) faults in the last hour is an operational measurement.

A set of registers provides each measurement count. These registers can be one of the following types:

- **Active** - The system updates these registers with each event or sample.
- **Holding** - These registers generate OM reports. The OM reports represent snapshots of the Active registers.
- **Accumulating** - These registers calculate measurements over a long period of time. At the end of the period, the register generates a report.
- **History** - These registers store the OM counts of the holding registers for specified periods. After each register stores the count of the holding register, the system cycles the register. A new register stores the count from the holding register the next time a transfer to the history register is necessary. Each class can have a maximum of six history registers, to provide the past history of the class.

Active counts increase each time a measured event occurs. To prevent data skewing in generated reports, the system can transfer active counts to a set of parallel registers. These registers are holding registers. Data skewing can occur if an active count increases while the system generates the count. The system generates data from the holding registers.

The office parameter OMXFR in table OFCENG determines the transfer period. The transfer period can be 15 min or 30 min. The transfer of active count to holding count occurs for each count at the same time. The system resets the active counts to zero after each transfer.

The operating company (OC) defines accumulating registers. These registers gather the contents of corresponding holding registers over long periods of time, like a day or week. The system adds the contents of the holding register to the accumulating register after each active-to-holding transfer is complete. The system resets the accumulating register to zero at the start of the accumulating period.

OMPRT (continued)

This table can define history classes of measurements. A history class is a set of measurements. Each history class has a repeated series of rotating registers. The following are common for each measurement in a single class:

- the number of registers in the series
- the period of the cycle

The two values are attributes of the class. The snapshot attribute is the number of registers for each measurement. The transfer attribute is the length of time that a single register is current.

This feature causes the active-to-holding transfer period to change to 5 min. Parameter OMXFR defines the active-to-holding transfer period. After each active-to-holding transfer, the system checks each history class. The system performs this check to determine if a holding-to-history transfer is necessary. If this transfer is necessary, every measurement in the history class sets the current history register to the contents of the holding register. The system increases or recycles the identity of the current history register.

Before you can enter data in a table, the OC must define the accumulating and history classes. The MAP command OMCLASS defines an OC name (DEMO) and the accumulating register size. Examples of accumulating register size are single or double. An example of an OC name and register size definition is OMCLASS DEMO SINGLE.

Command OMCLASS can define a history class (EXAMPLE), with the snapshot (3) and transfer (15 min) attributes. An example of a history class, snapshot, and transfer attribute definition is OMCLASS EXAMPLE HISTORY 3 15. The MAP command OMACCTAB defines the measurements of groups that the system registers. The system places tuples in table OMACC when you use OMCLASS. To enable the history or accumulating class, change the field ENABLE in OMACC to Y (yes).

Field WHEN in table OMACC for a history class contains the keyword HISTORY. Two subfields that contain the snapshot and transfer attributes follow the keyword. Use the OMCLASS command to specify these attributes. You cannot use the table editor to change field WHEN for history classes. To change the attributes of a history class, use command OMACCTAB to remove member measurements. Issue the OMCLASS command again on the same class to specify the new attributes.

Classes HALFHOUR, OFCBSYHR, DAY, TRUNKHR, MONTH, and TAPE are for the normal or standard collection of operational measurements.

OMPRT (continued)

Classes SPECIAL 1 to 24 are for OC functions other than the normal or standard collection of OMs.

Note: For BCS36 and later versions, commands OMACCGRP and OMACCFLD replace command OMACCTAB. Refer to the *Operational Measurements Reference Manual* for additional information on these commands.

The system allows a maximum of six historical registers for each measurement in each class.

The system controls the scheduling of the transfer of accumulating and history classes to the output device. The system controls the scheduling from tables OMPRT and OMTAPE.

The predefined system performs the holding of the accumulating class. A holding class that is present contains every OM group and every register in each group. Use the command OMCLASS to define subsets of holding registers, like accumulating classes. An example of an accumulating class is OMCLASS <class name> HOLDING. In table OMACC, specify field WHEN as auto.

The AUTO in table OMPRT or OMTAPE generates a report after every transfer from an active class to a holding class.

The total number of accumulating, holding, and history classes cannot exceed 30.

For additional information on operational measurements, see the NTPs that appear in the next table.

OM reference manuals

Title
<i>Basic Administration Procedures</i>
<i>Service Problem Analysis Administration Guide</i>
<i>Operational Measurements Reference Manual</i>

OMPRT (continued)

See the appropriate table for the office parameters associated with operational measurements. The tables that contain these office parameters appear in the next table..

Office parameter tables

Office parameter	Table name
OMHISTORYON	OFCOPT
OMINERLANGS	OFCOPT
OMPRTFORMAT	OFCENG
OMTAPESUPPRESSION	OFCENG
OMTELCOLABEL	OFCENG
OMXFR	OFCENG

Functional description of table OMPRT

Table OMPRT contains values that govern the measurement class, timing, and other parameters. The system requires these values to perform a data copy process from a holding or accumulating register to the output device. The system performs a transfer of the data to the output device. The facilities of the DMS-100 family logging mechanism and the routing and reporting subsystem transfer data to the output device. The logging mechanism collects output reports from every part of the system. The system files these reports in the order of log report numbers.

The OMPR and OMRS logs contain the OM reports. Datafill in tables LOGDEV and LOGCLASS associates each report with specified output devices. The LOGUTIL is the medium that generates OMPR and OMRS log reports. A LOGUTIL search does not support OMPR and OMRS log reports. The key to table OMPRT relates each tuple to the log report number of the desired output in OMPR and OMRS. When table OMPRT contains measurement group, class, timing, and other data, the routing and reporting subsystem routes the output report. The subsystem routes the report to the associated output device at the scheduled times. The key reference to the log report number triggers this process.

A description of the relationship of the logging mechanism to the routing and reporting subsystem appears in the *Input/Output System Reference Manual*. Refer to *Log Report Manual* for additional details.

OMPRT (continued)

Buffering of OMPR reports

Table OMPRT provides buffering of OMPR reports. The system first saves a buffered OMPR report in a disk buffer. The system retrieves the report from the disk and sends the report to a dedicated output device. The system does not transfer buffered reports to the output device. Only buffered OM data uses an output device, like a printer. If the system uses the output device for other purposes, the system does not generate OM reports properly.

Field BUFFOUT (Buffered Output) determines if the system sends a report buffered or unbuffered to the output device. If field BUFFOUT is Y when the report is output, the system saves the entry in the disk buffer. Field WHEN in the same tuple specifies the scheduled output. The system retrieves the report from the disk. The system sends the report to the output device when the CPU has available capacity. If the entry in field BUFFOUT is N, the system prints the report unbuffered. The system sends the report to the log system.

Field OUTDEV specifies the dedicated output device to which the system sends the report. This field corresponds to an entry in field DEVNAME in table OMDEV. When you enter data in field OUTDEV, the device must be available for output. The device must be available because the OM system attempts to output the device when a report is available. This device can receive OM buffered reports.

The system sends buffered reports to disk in a compressed format. This format allows support for OM commands OMACCFLD, OMACCKEY, OMTOTAL, and OMACCTOT. Table OMGRPORD controls the OM group output order. The system does not support tuple suppression. If the system retrieves a report from the disk buffer, the system outputs the report. The system outputs the report according to the specifications when the system sends the report to disk.

Feature AG0355 (OM Output Robustness) also applies to these reports. If data overwriting occurs, the system sends truncated reports to disk. When the system outputs the report, the system prints a message.

The system maintains output of buffered OM data to a dedicated output device during warm and cold restarts. The system can reroute the output in mid stream. A restart can occur when the system writes OM buffered data. When this condition occurs, the output continues after the restart from the beginning of the report. The system can route OM buffered data generated on one device to another device without loss of data.

If the output device fails during a write operation, the system raises a major alarm (OMBRFAIL). The system raises the alarm in the EXT level of the MAP terminal. File system errors or incorrect deletion of the buffer can cause this failure. Attempts to start the OMBR system without a successful create

OMPRT (continued)

(CREATE) of the buffer can cause this failure. If the system raises or clears the alarm, the system generates a standard EXT software alarm log. The command string OMBR;STATUS informs the operating company personnel of the OMBR failure and that maintenance is necessary. The operating company performs maintenance to stop the system, investigate the cause of the failure, and recreate the buffer.

If the output device fails during a read operation or the output to the drive stops, the system generates log OM2115. The system raises minor alarm OMBRSTOP. The system raises this alarm in the EXT level of the MAP terminal. The operating company personnel choose when to start the report again through CI commands. The operating company can restart the report after the device problem clears or the system routes the report to another device. If the operating company ignores the problem for an extended period of time, the disk buffer fills. The system sends OM data unbuffered to the log system. The system continues to buffer reports after the output device problem clears.

If the dedicated output device is a device that supports files, the subsystem associates a filename with the output. The device can support files to which filenames can append (example disk). In this occurrence, the filename is OMBRyymmddhhmm where <yymmddhhmm> is the time of the first report. The other devices have a separate file for each report. In these occurrences, the filename is OMrrrRyymmddhhmm, where <rrr> is the report number and the time is as described earlier.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table OMPRT.

Table size

0 to 32 tuples

The system allocates memory for each report number in table OMPRT.

OMPRT (continued)**Data II**

Datafill for table OMPRT appear in the following table.

Field descriptions (Sheet 1 of 5)

Field	Subfield or refinement	Entry	Description
REPNO		200 to 231	<i>Report number.</i> Enter the number assigned to a specified output report. A maximum of 32 different output reports can occur at one time.
ACTIVE		Y or N	<i>Active.</i> Enter Y if the report number is active. Enter N if the report number is not active.
SUPZERO		Y or N	<i>Suppress zeros.</i> If the entry is Y, the system transfers tuples that contain data other than zero to the output device. If the entry is N, the system transfers each tuple to the output device.
PRTSPEC		see subfields	<i>Print specification.</i> This field contains subfield ID.
	ID	ALL ALLCLASS ALLGROUP or ONETAB	<i>Identification.</i> Enter the required type of output report. For each table, enter ALL and leave refinements NAME, CLASS, and GROUP blank. For each table in a specified class, enter ALLCLASS. Enter data in refinement CLASS. Leave refinements NAME and GROUP blank. For each table in a specified group, enter ALLGROUP. Enter data in refinement GROUP. Leave refinements NAME and CLASS blank. For one table specified by group and class, enter ONETAB. Enter data in refinements NAME, GROUP, and CLASS.
	NAME	see subfields	<i>Name.</i> This field contains subfields GROUP and CLASS.

OMPRT (continued)**Field descriptions (Sheet 2 of 5)**

Field	Subfield or refinement	Entry	Description
WHEN	GROUP	alphanumeric	<i>Operational measurement group.</i> Enter the group of OMs that the system transfers to the output device. See the <i>Operational Measurements Manual</i> , for a list of OM group names used in every switching unit. For switching units where office parameter OFFICETYPE in table OFCSTD equals OFF100OESD, OFF200OESD, or OFFCOMBOESD.
	CLASS	alphabetic	<i>Class name.</i> Enter the name of the accumulating or history class of OMs that the system transfers to the output device.
		see subfields	<i>When.</i> This field contains subfield REP. The values for this field specify when and the frequency of system transfers of OMs to the output device.

OMPRT (continued)**Field descriptions (Sheet 3 of 5)**

Field	Subfield or refinement	Entry	Description
	REP	AUTO, MONTHLY, WEEKLY, DAILY, HOURLY, HALFHOURLY, DEVDAY, DEVWEEK, DAYTIME, or HISTORY	<i>Repetition.</i> Enter the specified time or period of time over which transfers to the output device occur. Entry AUTO specifies that the system transfers a report to the output device every time the system updates holding registers. The system can transfer a report when the total period defined in table OMACC ends. Entry MONTHLY specifies that the system transfers a report to the output device during a specified period. Refinements FROMDAYOFM, FROMTIME, TODAYOFM, and TOTIME define this period. Entry WEEKLY specifies that the system transfers a report to the output device during a specified period. Refinements FROMDAYOFW, FROMTIME, TODAYOFW, and TOTIME define this period. Entry DAILY specifies that the system transfers a report to the output device during a specified period. Refinements FROMTIME and TOTIME specify this period. Entry HOURLY specifies that the system transfers a report to the output device every hour. The output starts at the time that refinement STARTUP defines.

OMPRT (continued)

Field descriptions (Sheet 4 of 5)

Field	Subfield or refinement	Entry	Description
	REP (continued)		Entry HALFHOURLY specifies that the system transfers a report to the output device every half hour. Output starts at the time that refinement STARTUP defines. Entry DEVDAY specifies that the system transfers a report to the output device one time every day. The output occurs at the time that refinement WHEN defines. Entry DEVDAY can associate with a WEEKLY accumulating class. If this condition applies. DEVDAY provides a daily readout of the accumulating count of OMs in the class. Entry DEVDAY provides a readout during the period set in table OMACC. Entry DEVWEEK specifies that the system transfers a report to the output device one every week. The output occurs at the time that refinements DOW and WHEN define. Entry DEVWEEK can associate with a monthly accumulating class. If this condition applies. Entry DEVWEEK provides a readout of the accumulating count of OMs in the class every week. Entry DEVWEEK provides a readout during the period set in table OMACC.

OMPRT (continued)**Field descriptions (Sheet 5 of 5)**

Field	Subfield or refinement	Entry	Description
			Entry DAYTIME specifies that the system transfers a report to the output device each day of the block of days. Refinements FROMDAYOFW and TODAYOFW define this block of days during the period that refinements FROMTIME and TOTIME specify. The block of days refers to FROMTIME. The block of days does not refer to TOTIME. If the period overlaps midnight, reports continue to the day that follows TODAYOFW. Enter HISTORY for the history classes. You cannot change this value. This value is read-only. Note: You cannot use C15 and C45 when the OM transfer period is 30 min. The OFCENG parameter OMXFR and OFCOPT parameter OMHISTORYON control the OM transfer period.

REP = AUTO

If the value of subfield REP is AUTO, go to field BUFFOUT in Table Table , "Field descriptions" on page -880.

REP = MONTHLY

If the value of subfield REP is MONTHLY, enter data in refinements FROMDAYOFM, FROMTIME, TODAYOFM, and TOTIME as in the following description.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Description
	FROMDAY OFM	1 to 31	<i>From day of month.</i> Enter the day of the month when the transfer of a collection of OMs starts for an active report number to the output device.
	FROMTIME	see refinements	<i>From time.</i> This field contains refinements HR and MIN.

OMPRT (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Description
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the transfer of a collection of OMs starts for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the transfer of a collection of OMs starts for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.
	TODAYOFM	1 to 31	<i>To day of month.</i> Enter the day of the month when the transfer of a collection of OMs stops for an active report number to the output device.
	TOTIME	see refinements	<i>To time.</i> This field contains refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the transfer of a collection of OMs stops for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the transfer of a collection of OMs stops for an active report number to the output device. The minute entry can be C00, C15, C30 or C45.

OMPRT (continued)**REP = WEEKLY**

If the value of subfield REP is WEEKLY, enter data in refinements FROMDAYOFW, FROMTIME, TODAYOFW, and TOTIME. A description of this process appears in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week.</i> Enter the day of the week when the transfer of a collection of OMs starts for an active report number to the output device.
	FROMTIME	see refinements	<i>From time.</i> This field consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the transfer of a collection of OMs starts for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the transfer of a collection of OMs starts for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week.</i> Enter the day of the week when the transfer of a collection of OMs stops for an active report number to the output device.
	TOTIME	see refinements	<i>To time.</i> This field consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the transfer of a collection of OMs stops for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the transfer of a collection of OMs stops for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.

OMPRT (continued)**REP = DAILY**

If the value of subfield REP is DAILY, enter data for refinements FROMTIME and TOTIME as in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Description
	FROMTIME	see refinements	<i>From time.</i> This field consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the transfer of a collection of OMs starts for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the transfer of a collection of OMs starts for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.
	TOTIME	see refinements	<i>To time.</i> This field consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the transfer of a collection of OMs stops for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute during the hour when the transfer of a collection of OMs stops for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.

REP = HOURLY

If the value of subfield REP is HOURLY, enter data for refinement STARTUP as in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Description
	STARTUP	C00, C15, C30, or C45	<i>Startup.</i> Enter the minute of each hour when the system transfers the collection of OMs for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.

OMPRT (continued)**REP = HALFHOURLY**

If the value of subfield REP is HALFHOURLY, enter data for refinement STARTUP as in the previous table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Description
	STARTUP	C00, C15 C30, or C45	<i>Startup.</i> Enter the minute of the half-hour when the system transfers the collection of OMs for an active report number to the output device. The minute entry can be C00, C15, C30, or C45.

REP = DEVDAY

If the value of subfield REP is DEVDAY, enter refinement WHEN as in the previous table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Description
	WHEN	see refinements	<i>When.</i> This field contains refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the system transfers the collection of OMs for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the system transfers the collection of OMs for an active report to the output device. The minute entry can be C00, C15, C30, or C45.

OMPRT (continued)

REP = DEVWEEK

If the value of subfield REP is DEVWEEK, enter data for refinements DOW and WHEN as in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Description
	DOW	SU, MO, TU, WE, TH, FR, and SA	<i>Day of week.</i> Enter the day of the week when the system transfers the collection of OMs for an active report number to the output device.
	WHEN	see refinements	<i>When.</i> This subfield consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the system transfers the collection of OMs for an active report number to the output device.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the system transfers the collection of OMs for an active report to the output device. The minute entry can be C00, C15, C30, or C45.

REP = DAYTIME

If the value of subfield REP is DAYTIME, enter data for refinements FROMDAYOFW, TODAYOFW, FROMTIME, and TOTIME. A description of this process appears in the following table. The order of fields is different than normal.

Note: The block of days refers to FROMTIME. The block of days does not refer to TOTIME. If the period overlaps midnight, reporting continues to the day that follows TODAYOFW.

OMPRT (continued)**Field descriptions for conditional data II**

Field	Subfield or refinement	Entry	Description
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week.</i> Enter the day of the week when the transfer of a collection of OM starts for an active report number to the output device.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week.</i> Enter the day of the week when the transfer of a collection of OM stops for an active report number to the output device.
	FROMTIME	see refinements	<i>From time.</i> This subfield consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period. The transfer of a collection of OM starts for an active report number to the output device during this period.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour of each day of the FROMDAYOFW to TODAYOFW period. The transfer of a collection of OM starts for an active report to the output device during this period. The minute entry can be C00, C15, C30, or C45.
	TOTIME	see refinements	<i>To time.</i> This subfield consists of refinements HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period. The transfer of a collection of OM stops for an active report number to the output device during this period.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute during the hour of each day of the FROMDAYOFW to TODAYOFW period. The transfer of a collection of OM stops for an active report number to the output device during this period. The minute entry can be C00, C15, C30, or C45.

OMPRT (continued)**REP = HISTORY**

If the value of subfield REP is HISTORY, values for refinements SNAPSHOTS and XFER as in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Description
	SNAPSHOTS	1 to 6	<i>Number of snapshots.</i> This read-only field indicates the number of history registers for each OM.
	XFER	T5, T10, T15, T20, or T30	<i>Transfer attribute.</i> This read-only field indicates the time, in minutes, that a single history register is current. For example, if the value is T5, the history register cycles every 5 min.

For all tuples

For each tuple, enter data in fields BUFFOUT and OUTDEV.

Field descriptions

Field	Subfield or refinement	Entry	Description
BUFFOUT		Y or N	<i>Buffered output.</i> Enter Y if the system buffers the report on disk. In other occurrences, enter N. The default value, if the field is blank, is N.
OUTDEV		alphanumeric (1 to 16 characters)	<i>Output device.</i> Enter the output device, entered earlier in table OMDEV, to which the system sends the buffered output. Entry SINK is the null device. Entry SINK is always present in table OMDEV. Field OUTDEV does not have meaning if the entry in field BUFFOUT is equal to N. The default value for this field is SINK.

Data II e xample

Sample datafill for table OMPRT appears in the following example.

OMPRT (continued)**MAP example for table OMPRT**

REPNO	ACTIVE	SUPZERO	WHEN	BUFFOUT	OUTDEV	PRTSPEC
200	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
201	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
202	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
203	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
204	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
205	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
206	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
208	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
209	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK
210	N	N				ALL
MONTHLY	1	0 C00	1	0 C00	N	SINK

Table history
CSP05

Command OMACCGRP and OMACCFLD replaced command OMACCTAB in CSP05. A note about BCS36 and later versions information was added. The note was referenced out to the *Operational Measurements Reference Manual* in CSP05.

BCS36

Reference in the section ``Functional description of table OMPRT'' was removed in BCS36. This section stated that the definition of history classes of

OMPRT (end)

measurement could occur if the operating company had the OM Holding Class Enhancements feature. This feature is mandatory.

OMREPORT

Table name

Operational Measurements Report Table

Functional description

Table OMREPORT obtains reports on system performance through operational measurements (OM).

Note: This table supports double-precision OM accumulating classes.

Refer to *Operational Measurements Reference Manual* for additional information on OM reports.

Refer to *Switch Performance Monitoring System Application Guide* for information on Switch Performance Monitoring System (SPMS)

The system stores OM reports in the log system central buffer, against log name OMRS. The system stores the OM reports until the system routes the reports to the correct devices.

For each of the 23 entries in the table, the table records the following data:

- schedule (report) number
- report status. Report status can be active or inactive.
- type of report. The type of report specifies the period of time that the OM report covers. See field REP for additional information.
- class of register
- name of the report. The name can be one of the names that appears in the following list:
 - ACHGXREP
 - ACHREP
 - AMREPORT
 - CDSREP
 - DTDETECT
 - EATSMS
 - PRDTKMTC
 - SPMSREP
 - TFCANA

OMREPORT (continued)

Note: The system generates report DTDETECT if feature BR0482 (Unauthorized Digitone Service Detection) is present in the switch and is active. The user must request this report before the command interpreter (CI) command STOP turns the feature off. The system erases the record of users when the service stops.

- line output setting short or long. The short setting is 80 characters and the long setting is 132 characters. The OM reports AMREPORT, CDSREP, DTDETECT, or SPMSREP do not require this information.
- usage units hundred call seconds (CCS) or erlangs (ERL). The OM reports AMREPORT, CDSREP, DTDETECT, EATSMS, or SPMSREP do not require this information.
- which of the two sets of values the system uses that table NWMCLLI stores. Only report ACHREP requires this information.
- if the system requires setup usage, connect usage, and the sum of setup and connect usage. Only reports TFCANA and EATSMS require this information.
- if the deletion of each directory number (DN) occurs from the record of users list after each report. Only report DTDETECT requires this information.

Data II sequence and meaning

You do not need to enter data in other tables before you enter data in table OMREPORT.

Table size

The system allocates memory for a maximum of 24 entries.

The operating company can assign 23 of the 24 entries. The system designates the entry that remains as report name *SPARE*.

OMREPORT (continued)**Data II**

The datafill for table OMREPORT appears in the following table.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
SCHEDNO		0 to 23	<i>Schedule number</i> Enter the OM report schedule number.
ACTIVE		Y or N	<i>Active</i> Enter Y (yes) if the schedule number is active. If the schedule number is not active, enter N (no).
WHEN		see subfield	<i>When</i> This field contains subfield REP.
	REP	AUTO DAILY DAYTIME DEVDAY DEVWEEK HALFHOURLY HISTORY HOURLY MONTHLY or WEEKLY	<i>Report</i> Enter the type of report you require. If the report requires an automatic readout each time the system updates the holding or accumulating registers, enter AUTO. The report is for a specified period of time during each day of the week and you issue the report daily. When this condition occurs, enter DAILY. Enter data in the refinements that correspond. If the report is output daily, but only for the block of consecutive days specified, enter DAYTIME. Enter data in the refinements in section "REP = DAYTIME".. Entry DAYTIME allows the use of time intervals that overlap midnight.
	REP		If the report is output daily at a specified time enter DEVDAY. Enter data in the refinements that correspond. This action allows the operating company to see the accumulation of a longer class. An example of a longer class is MONTHLY. The report can associate with a WEEKLY accumulating class. When this condition occurs, the report provides the user with a daily readout as the information accumulates. Note: The operating company uses this type of report if the entry in field NAME is AMREPORT.

OMREPORT (continued)

Field descriptions (Sheet 2 of 3)

Field	Subfield or refinement	Entry	Explanation and action
	REP		If the report is output weekly at a specified day and time, enter DEVWEEK. This action allows the operating company to see the accumulation of a longer class. An example of a longer class is MONTHLY. Enter data in the refinements that correspond. If the report associates with a MONTHLY accumulating class, the report provides the user with a weekly readout as it accumulates. If the report covers a 0.5-h period that starts at 0, 15, 30, or 45 min past the hour, enter HALFHOURLY. Enter data in the refinements that correspond. Enter HISTORY for the history classes. Enter data in the refinements that correspond. The user cannot change this value. The user can only read this value.

OMREPORT (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	REP		If the report covers a 1-h period that starts at 0, 15, 30, or 45 min past the hour, enter HOURLY. Enter data in the refinement in section "REP = HOURLY".. If the report is for a specified length of time during the day for a number of continuous days during the week, enter WEEKLY. Enter data in the refinements in section "REP = WEEKLY".. If the report covers a 1-h period, that starts at 0, 15, 30, or 45 min past the hour, enter HOURLY. Table "Field descriptions for conditional datafill", in this document, indicates this entry. If the report is for a specified length of time during the day, for a number of continuous days during the month, enter MONTHLY. Enter data in the refinements that the table in section "REP = MONTHLY" indicates. If the report is for a specified length of time during the day for a number of continuous days during the week, enter WEEKLY. Enter data in the refinements that the table in section "REP = WEEKLY" indicates.

REP = DAILY

If the entry in subfield REP is DAILY, enter data in refinements FROMTIME and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	FROMTIME	see subfields	<i>From time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the report prints.

OMREPORT (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when report prints.
	TOTIME	see subfields	<i>To time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the report prints.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when the report prints.

REP = DAYTIME

If the entry in subfield REP is DAYTIME, enter data in refinements FROMDAYOFW, TODAYOFW, FROMTIME, and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week</i> Enter the day of the week when the report prints.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week</i> Enter the day of the week when the report stops printing. Note: The block of days refers to FROMTIME. The block of days does not refer to TOTIME. If the period overlaps midnight, reporting continues to the day following TODAYOFW.
	FROMTIME	see subfields	<i>From time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period when the report prints.

OMREPORT (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute during the hour of each day of the FROMDAYOFW to TODAYOFW period when the report prints.
	TOTIME	see subfields	<i>To time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period when the report stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute during the hour of each day of the FROMDAYOFW to TODAYOFW period when the report stops printing.

REP = DEVDAY

If the entry in subfield REP is DEVDAY, enter data in refinement WHEN.
These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	WHEN	see subfields	<i>When</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the report stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when the report stops printing.

OMREPORT (continued)

REP = DEVWEEK

If the entry in subfield REP is DEVWEEK, enter data in refinements DOW and WHEN. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	DOW	SU, MO, TU, WE, TH, FR, or SA	<i>Day of week</i> Enter the day of the week when the system prints the collection of OMs for an active report number.
	WHEN	see subfields	<i>When</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.

REP = HALFHOURLY

If the entry in subfield REP is HALFHOURLY, enter data in refinement STARTUP. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	STARTUP	C00, C15, C30, or C45	<i>Startup</i> Enter the minute of the half hour when the system prints the collection of OMs for an active report number.

OMREPORT (continued)**REP = HISTORY**

If the entry in subfield REP is HISTORY, enter data in refinements SNAPSHOTS and XFER. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	SNAPSHOTS	1 to 6	<i>Number of snapshots</i> This read-only field specifies the number of history registers for each OM.
	XFER	T5, T10, T15, T20, or T30	<i>Transfer attribute</i> This read-only field specifies the time, in minutes, a history register is current. For example, if the value is T5, the history register cycle is each 5 min.

REP = HOURLY

If the entry in subfield REP is HOURLY, enter data in refinement STARTUP. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	STARTUP	C00, C15, C30, or C45	<i>Startup</i> Enter the minute of the hour when the system prints the collection of OMs for an active report number.

REP = MONTHLY

If the entry in subfield REP is MONTHLY, enter data in refinements FROMDAYOFM, FROMTIME, TODAYOFM, and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFM	1 to 31	<i>From day of month</i> Enter the day of the month when a collection of OMs for an active report number starts printing.
	FROMTIME	see subfields	<i>From time</i> This field contains subfields HR and MIN.

OMREPORT (continued)**Field descriptions for conditional data II (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.
	TODAYOFM	1 to 31	<i>To day of month</i> Enter the day of the month when a collection of OMs for an active report number stops printing.
	TOTIME	see subfields	<i>To time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.

REP = WEEKLY

If the entry in subfield REP is WEEKLY, enter data in refinements FROMDAYOFW, FROMTIME, TODAYOFW, and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week</i> Enter the day of the week when a collection of OMs for an active report number starts printing.
	FROMTIME	see subfields	<i>From time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.

OMREPORT (continued)**Field descriptions for conditional data II (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week</i> Enter the day of the week when a collection of OMs for an active report number stops printing.
	TOTIME	see subfields	<i>To time</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when a collection of OMs for an active report number stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute</i> Enter the minute of the hour when a collection of OMs for an active report number stops printing.
	CLASS	alphanumeric (a maximum of 8 characters)	<i>Class name</i> Enter the class name for the OM accumulating class or history that the CI OMCLASS commands define.
	DATA	see subfield	<i>Data</i> This field contains subfield NAME.

OMREPORT (continued)**Field descriptions for conditional data II (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	NAME	ACHGXREP ACHREP AMREPORT CDSREP DTDETECT EATSMS PRDTKMTC *SPARE* SPMSREP or TFCANA	<i>Name</i> Enter one of the following report names: ACHGXREP: attempts for each circuit for each hour global exception ACHREP: attempts for each circuit for each hour AMREPORT: maintenance managers morning report CDSREP: call disposition summary DTDETECT: unauthorized Digitone detection. Available when digitone detection service is in use. EATSMS: equal access traffic analysis PRDTKMTC: periodic trunk maintenance *SPARE*: no report data SPMSREP: Switch Performance Monitoring System TFCANA: traffic analysis The default value for this field is *SPARE*. Note: Some reports are not in basic packages. These reports are correct if the operating company purchases this feature.

NAME = ACHGXREP, ACHREP, EATSMS, PRDTKMTC, or TFCANA

If the entry in subfield NAME is ACHGXREP, ACHREP, EATSMS, PRDTKMTC, or TFCANA, enter data in refinement L_LEN. These entries appear in the following table.

NAME = ACHGXREP, ACHREP, or PRDTKMTC

If the entry in subfield NAME is ACHGXREP, ACHREP, or PRDTKMTC, enter data in refinement U_UNIT. These entries appear in the following table.

OMREPORT (continued)**NAME = ACHREP**

If the entry in subfield NAME is ACHREP, enter data in refinement THLD_NO. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	THLD_NO	1 or 2	<i>Threshold number</i> Enter the numeric value that represents the set of thresholds in table NWMCLLI used with the report.

NAME = EATSMS or TFCANA

If the entry in subfield NAME is EATSMS or TFCANA, enter data in refinements SET_U, CON_U, and SUM_U. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	SET_U	Y or N	<i>Set-up usage</i> Enter Y if you require an output of setup use. If you do not require this output, enter N.
	CON_U	Y or N	<i>Connect usage</i> Enter Y if you require an output of connect use. If you do not require this output, enter N.
	SUM_U	Y or N	<i>Sum of set-up and connect usage</i> Enter Y if you require an output of the summation of setup and connect use. If you do not require this output, enter N.

OMREPORT (continued)**NAME = ACHGXREP**

If the entry in subfield NAME is ACHGXREP, enter data in refinements PCO_LIM, ACH_LIM, and CCH_LIM. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	PCO_LIM	0 to 100	<i>Percentage overflow limit</i> Enter the percentage overflow that generates an exception report.
	ACH_LIM	0 to 255	<i>Attempts per circuit per hour limit</i> Enter the number of attempts for each circuit for each hour for which the system generates an exception report.
	CCH_LIM	0 to 255	<i>Calls connected per circuit per hour limit</i> Enter the number of attempts for each circuit for each hour for which the system generates an exception report.

NAME = DTDETECT

If the entry in value of subfield NAME is DTDETECT, enter data in refinement CLEAR. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
CLEAR		Y or N	<i>Clear directory number</i> Enter Y if the system clears the DNs from the record of users list after each report. Each report contains the DN of DP-classed subscribers using the Digitone receivers for digit collection after the last report. If the system does not clear the DNs from the record of users list after each report, enter N.

Data II e xample

Sample datafill for table OMREPORT appears in the following example.

OMREPORT (end)

The example contains the following:

- one entry for report PRDTKMTC with a short line printout and ERL usage unit
- one entry for report ACHGHXREP with a long line printout and CCS usage units. Report ACHGHXREP uses the first value of attempts for each circuit for each hour as field ACH1 defines in table NWMCLLI.
- one entry for report TFCANA with a short line printout that shows setup usage, connect usage, and the sum of setup and connect usage
- one entry for report CDSREP
- one entry for report AMREPORT
- one entry for report SPMSREP

MAP example for table OMREPORT

SCHEDNO	ACTIVE	DATA			WHEN	CLASS
1	Y	PRDTKMTC	S	ERL	AUTO	HOLDING
2	Y	ACHREP	L	CCS	1	HOLDING
3	Y	TFCANA	S	Y	AUTO	HOLDING
4	Y	CDSREP			Y	Y
5	Y	AMREPORT		DEVDAY	7	C00
6	Y	SPMSREP		DEVDAY	8	C00

OMTAPE

Table name

Operational Measurements Output Recording Table

Functional description

Table OMTAPE contains values that govern the operational measurements (OM) class, timing, and other parameters the system requires. The system requires these parameters when the system performs a data copy process. The system performs this copy process between a holding, accumulating, or history register and a designated recording device.

Table OMTAPE schedules the transfer of OM data to a device independent recording package (DIRP) during the current calendar month.

See table OMPRT for more information.

Data II sequence and meaning

- You must enter data in the following tables before table OMTAPE:
- DIRPSSYS
- DIRPPPOOL

You must enter data in these tables to specify the output device to which the system transfers the OM data. The output device can be tape or disk.

Table size

32 tuples

The system allocates memory for a maximum of 32 entries in table OMTAPE.

OMTAPE (continued)**Data II**

The datafill for table OMTAPE appears in the following table.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
NUMBER		0 to 31	<i>Output recording number.</i> Enter the number assigned to the output recording device.
ACTIVE		Y or N	<i>Active.</i> Enter Y (yes) if transfer to the output recording device proceeds as scheduled. If the transfer does not proceed as scheduled, enter N (no).
CLASS		alphanumeric 1 to 10 characters	<i>Class name.</i> Enter the name of the accumulating or history class of OMs that the system transfers to the output recording device. Note: Each OM in the group in the class must be present. If each OM is not present, the system does not transfer the group in the class to the output recording device.
WHEN		see subfield	<i>When.</i> This field contains subfield REP.

OMTAPE (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	REP	AUTO DAILY DAYTIME DEVDAY DEVWEEK HALFHOURLY HISTORY HOURLY MONTHLY or WEEKLY	<i>Report.</i> Enter the specified time or period of time over which transfers to the output recording device occur. If the report requires an automatic readout each time the system updates the holding or accumulating registers, enter AUTO. If the report is for a specified period of time during each day of the week and the system issues the report daily, enter DAILY. If the report is output daily for the block of consecutive days specified, enter DAYTIME. An entry of DAYTIME allows the use of time intervals that overlap midnight. If the report is output daily at a specified time, to allow the operating company to see the accumulation of a longer class enter DEVDAY. An example of a longer class is MONTHLY. If the report associates with a WEEKLY accumulating class, the report provides the user with a daily readout. The report occurs as the information accumulates. Note: This type of report is in use if the OM report name in table OMREPORT is AMREPORT. If the report is output weekly at a specified day and time and allows the operating company to see the accumulation of a longer class, enter DEVWEEK. An example of a longer class is MONTHLY. If the report associates with a MONTHLY accumulating class, the report provides the user with a weekly readout. The report occurs as the information accumulates.

OMTAPE (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
	REP (continued)		If the report covers a half-hour period that commences at 0, 15, 30, or 45 min past the hour, enter HALFHOURLY. Enter HISTORY for the history classes. The user cannot change this value. The user can read this value. If the report covers a one-hour period that commences at 0, 15, 30, or 45 min past the hour, enter HOURLY. If the report is for a specified length of time during the day for a number of consecutive days during the month, enter MONTHLY. If the report is for a specified length of time during the day for a number of consecutive days during the week, enter WEEKLY.

REP = DAILY

If the entry in subfield REP is DAILY, enter data in refinements FROMTIME and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMTIME	see subfields	<i>From time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the report starts printing.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the report starts printing.
	TOTIME	see subfields	<i>To time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the report stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the report stops printing.

OMTAPE (continued)**REP = DAYTIME**

If the entry in subfield REP is DAYTIME, enter data in refinements FROMDAYOFW, TODAYOFW, FROMTIME, and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week.</i> Enter the day of the week when the report starts printing.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week.</i> Enter the day of the week when the report stops printing. Note: The block of days refers to FROMTIME. The block of days does not refer to TOTIME. If the period overlaps midnight, reporting continues to the day following TODAYOFW.
	FROMTIME	see subfields	<i>From time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period when the report starts printing.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute during the hour of each day of the FROMDAYOFW to TODAYOFW period when the report starts printing.
	TOTIME	see subfields	<i>To time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour during each day of the FROMDAYOFW to TODAYOFW period when the report stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute during the hour of each day of the FROMDAYOFW to TODAYOFW period when the report stops printing.

OMTAPE (continued)**REP = DEVDAY**

If the entry in subfield REP is DEVDAY, enter data in refinement WHEN. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	WHEN	see subfields	<i>When.</i> This field contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the report stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the report stops printing.

REP = DEVWEEK

If the entry in subfield REP is DEVWEEK, enter data in refinements DOW and WHEN. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	DOW	SU, MO, TU, WE, TH, FR, or SA	<i>Day of week.</i> Enter the day of the week when the system prints the collection of OMs for an active report number.
	WHEN	see subfields	<i>When.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.

OMTAPE (continued)**REP = HALFHOURLY**

If the entry in subfield REP is HALFHOURLY, enter data in refinement STARTUP. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	STARTUP	C00, C15, C30, or C45	<i>Startup.</i> Enter the minute of the half hour when the system prints the collection of OMs for an active report number.

REP = HISTORY

If the entry in subfield REP is HISTORY, enter data in refinements SNAPSHOTS and XFER. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	SNAPSHOTS	1 to 6	<i>Number of snapshots.</i> This read-only field specifies the number of history registers for each OM.
	XFER	T5, T10, T15, T20, or T30	<i>Transfer attribute.</i> This read-only field specifies the time, in minutes, that a single history register is current. For example, if the value is T5, the history register cycle is every 5 min.

REP = HOURLY

If the entry in subfield REP is HOURLY, enter data in refinement STARTUP. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	STARTUP	C00, C15, C30, or C45	<i>Startup.</i> Enter the minute of the hour when the system prints the collection of OMs for an active report number.

OMTAPE (continued)**REP = MONTHLY**

If the entry in subfield REP is MONTHLY, enter data in refinements FROMDAYOFM, FROMTIME, TODAYOFM, and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFM	1 to 31	<i>From day of month.</i> Enter the day of the month when a collection of OMs for an active report number starts printing.
	FROMTIME	see subfields	<i>From time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.
	TODAYOFM	1 to 31	<i>To day of month.</i> Enter the day of the month when a collection of OMs for an active report number stops printing.
	TOTIME	see subfields	<i>To time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.

OMTAPE (continued)**REP = WEEKLY**

If the entry in subfield REP is WEEKLY, enter data in refinements FROMDAYOFW, FROMTIME, TODAYOFW, and TOTIME. These entries appear in the following table.

Field descriptions for conditional data II

Field	Subfield or refinement	Entry	Explanation and action
	FROMDAY-OFW	SU, MO, TU, WE, TH, FR, or SA	<i>From day of week.</i> Enter the day of the week when a collection of OMs for an active report number starts printing.
	FROMTIME	see subfields	<i>From time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when the system prints the collection of OMs for an active report number.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when the system prints the collection of OMs for an active report.
	TODAYOFW	SU, MO, TU, WE, TH, FR, or SA	<i>To day of week.</i> Enter the day of the week when a collection of OMs for an active report number stops printing.
	TOTIME	see subfields	<i>To time.</i> This subfield contains subfields HR and MIN.
	HR	0 to 23	<i>Hour.</i> Enter the hour of the day when a collection of OMs for an active report number stops printing.
	MIN	C00, C15, C30, or C45	<i>Minute.</i> Enter the minute of the hour when a collection of OMs for an active report number stops printing.

Data II e xample

Sample datafill for table OMTAPE appears in the following example.

OMTAPE (end)**MAP example for table OMTAPE**

NUMBER	ACTIVE	CLASS	WHEN								
0	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
1	N	TNOS1							AUTO		
2	N	TNOS1							AUTO		
3	N	TNOS1							AUTO		
4	N	TNOS1							AUTO		
5	N	TNOS1							AUTO		
6	N	TNOS1							AUTO		
7	N	TNOS1							AUTO		
8	N	TNOS1							AUTO		
9	N	TNOS1							AUTO		
10	N	TNOS1							AUTO		
11	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
12	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
13	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
14	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
15	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
16	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
17	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
18	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
19	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
20	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
21	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
22	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
23	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
24	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
25	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
26	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
27	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
28	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
29	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
30	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		
31	N	HOLDING	MONTHLY	1	0	C00	1	0	C00		

OMTHRESH

Table name

Threshold Alarms Table

Functional description

Table OMTHRESH allows the operating company to specify the alarm level, threshold value, and scan time for each alarm. The threshold value represents the amount of incrementing an operational measurements (OM) register that is required during the scan period to activate the associated alarm. If an alarm is activated for an OM, log OM2200 is produced.

For related information, refer to table ALARMTAB.

Data II sequence and implications

Table TMINV must be datafilled prior to table OMTHRESH.

Note: Table OMTHRESH should be one of the last tables datafilled. Although table OMTHRESH is not directly linked to other tables it does depend on them by way of the OM system. It depends mostly upon inventory tables or tables that list item groups that are represented in OMs.

Table size

0 to 128 tuples

Data II

The following table lists datafill for table OMTHRESH.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		alphanumeric (up to 16 characters)	<i>Key</i> Enter OM register data in one of the following formats: • <name of OM register>\$<name of tuple> • <name of OM register>\$<number of tuple> • <name of OM register>\$<total>
ENABLED		Y or N	<i>Enabled</i> Enter Y (yes) if the OM is to have a threshold; otherwise enter N (no).

OMTHRESH (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
ALMLEVEL		CR, MJ, MN, or NA	<i>Alarm level</i> Enter the type of alarm activated: CR (critical alarm), MJ (major alarm), MN (minor alarm), or NA (no alarm).
THRESHLD		1 to 32767	<i>Threshold</i> Enter the maximum number of events that can occur during a specified time interval (scan time) without activating an alarm. Entries outside this range are invalid.
SCANTIME		1 to 32767	<i>Scan time</i> Enter the time interval, in minutes, during which thresholding is implemented. Entries outside this range are invalid.

Data Il e xample

The following example shows sample datafill for table OMTHRESH.

MAP display example for table OMTHRESH

KEY	ENABLED	ALMLEVEL	THRESHLD	SCANTIME
CCBOVFL\$0	Y	MJ	20	10

OMTOTAL

Table name

Operational Measurements Totaling

Functional description

Table OMTOTAL holds the operational measurement (OM) configuration data that associates with the OM CI command OMTOTAL. This table can activate or deactivate the OM totaling feature. This table maintains a record over a one night process (ONP) of the number fields in OM groups that are present.

This table provides an alternate interface to OM accumulating data. Before the introduction of this table, the user could only access this data through the use of OM CI commands.

When the system executes the OM CI command OMTOTAL, the system updates this table according to this command.

Data II sequence and meaning

The system restores table OMTOTAL before table OMACCGRP during an ONP.

You cannot add or delete tuples in this table. The addition of entries occurs during initial program load (IPL).

Table size

1000 tuples

Note: The number of OM groups defined for the software load controls the minimum size of the table.

OMTOTAL (end)**Data II**

Datafill for table OMTOTAL appears in the following table.

Field descriptions

Field	Subfield or refinement	Entry	Explanation and action
OMTTLKEY		A maximum of 8 alphanumeric characters	<i>OM group.</i> This field is the key for the table. Enter each correct OM group defined for the software load during initial program load (IPL).
OMTTLING		OFF or ON	<i>OM totalling state.</i> Enter ON to activate OM totaling for the OM group. Enter OFF to deactivate OM totaling for the OM group. Note: During IPL, each entry in this field is OFF.
FIELDS			<i>Fields.</i> The number of fields defined for the OM group. This field is not visible. This field is in use during an ONP. The entries in the field are determined during IPL when you enter the OM groups.

Data II e xample

Sample datafill for table OMTOTAL appears in the following example.

MAP example for table OMTOTAL

OMTTLKEY	OMTTLING
DDU	OFF
CACHEMGR	OFF
DRM	OFF
CP	OFF
CP2	OFF
EXT	OFF
LOGS	OFF
LMD	OFF
PCMCARR	OFF
PM2	OFF

OPENANI

Table name

Open Numbering Plan ANI Table

Functional description

Table OPENANI determines the automatic number identification (ANI) status and calling service feature for calls arriving on Traffic Operator Position System (TOPS) trunks that support open numbering.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OPENANI.

Table size

0 to 100 tuples

Data II

The following table lists datafill for table OPENANI.

Field descriptions (Sheet 1 of 3)

Field	Subfield or refinement	Entry	Explanation and action
ANIDIGS		0 to 99	<i>Automatic number identification digits</i> Enter the ANI index number.
FORMAT		ANI, ANIF, or ONI	<i>Digit spill format</i> Enter the digit spill format. ANI ANI format expects called digits. If called digits are present, the call is flagged as an ANI success. If called digits are not present, the call is flagged as an ANI failure. ANIF (ANI failure) ANIF format does not expect called digits. If called digits are present, the call is flagged as an ANI failure and the received calling digits are ignored. If called digits are not present, the call is flagged as an ANI failure.

OPENANI (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
FORMAT (contd)			ONI (operator number identification) ONI format does not expect called digits. If called digits are present, the call is flagged as an ANI failure and the received called digits are ignored. If called digits are not present, the call is flagged as requiring ONI.
CLGSERV		APS, BLDNINTC, COIN, HOTEL, INTC, MOBILE, RESTRICT, SPECIAL, STATION, or TRBLINTC	<i>Calling service feature type</i> Enter the calling service feature type. APS Enter APS for an attendant pay station. APS uses station call translations. BLDNINTC Enter BLDNINTC for blank directory number intercept. BLDNINTC uses station call translations. COIN Enter COIN for a coin pay station. COIN uses coin call translations. HOTEL Enter HOTEL for a hotel station. HOTEL uses hotel station call translations. INTC Enter INTC for call intercept. INTC uses regular intercept call translations. MOBILE Enter MOBILE for a mobile telephone unit. MOBILE uses station call translations.

OPENANI (end)**Field descriptions (Sheet 3 of 3)**

Field	Subfield or refinement	Entry	Explanation and action
CLGSERV (contd)			RESTRICT Enter RESTRICT for call restriction. RESTRICT uses restricted call translations. SPECIAL Enter SPECIAL for special calls. SPECIAL uses table SPLDIND for call translations. STATION Enter STATION for station calls. STATION uses station call translations. TRBLINTC Enter TRBLINTC for trouble intercept calls. TRBLINTC uses station trouble-intercept call translations.
SCRNIDX		0-100	Screening index. This field is an index into table RESTBIL (TA call) or DARSTBIL (DA call). This field supports a check of billing restrictions based on the incoming ANI ID digits for OPENANI signaling. This field is used if table TOPSTOPT field ANIIDSCR = Y, table TRKGRP field SIGTYPE = OPENANI, and no other restrictions apply to the call.

Data example

The following example shows sample datafill for table OPENANI.

MAP display example for table OPENANI

ANI	FORMAT	CLGSERV	SCRNIDX
0	ANI	STATION	10

Table history
TOPS12

The feature Calling Restrictions for Wholesaling (59006832), UNBN0006, adds field SCRNIDX.

OPMINV**Table name**

Outside Plant Module Inventory Table

Functional description

Table OPMINV handles information relating the outside plant module (OPM) cabinet to the remote line concentrating module (RLCM) and the battery setup (if any) that it contains. The OPM is a repackaged RLCM in an environmentally controlled cabinet. The OPM functions as an RLCM in all call processing aspects. Optionally, the cabinet can contain an emergency battery power supply capable of up to eight hours of reserve power.

The small remote unite (SRU) is a DMS peripheral module (PM) that is a derivative of the OPM. The SRU is datafilled in table OPMINV if it is used in a central office switching center.

Battery strings for OPM must be equipped in pairs, one battery string attached to battery charger controller (BCC) 0, the other attached to BCC 1 respectively. The first pair is 0 and 4, the second pair is 1 and 5, the third pair is 2 and 6, and the fourth pair is 3 and 7.

Battery strings pairs (0, 4) (1, 5) (2, 6) (3, 7) must be equipped or unequipped.

Information in this table is unique by office and not unique by site. Each OPMPEs (outside plant module power and environmental system) has an entry in table OPMINV, and the maximum number of OPMPEs is controlled by the maximum number of line modules (LM) in the office.

Field ENABATST ensures testing that does not fail the batteries, and yet allows the audit to continue. Testing that could result in failed batteries does not occur if the field is set to N (no). Field ENABATST also determines whether testing of a battery string pair should be done once each week. If ENABATST is set to Y (yes), each Sunday the test/charge cycle is started on one of the battery string pairs for this OPM.

The test charge cycle includes three measurements of battery voltages: one at the end of the 24-hour open-circuit period, one after the discharge period, and one at the end of the open-circuit period which follows the charge period. If field ENABATST is set to Y, these measurements are taken against the test values defined by office parameters OPM_VOLT_TST_OCC, OPM_VOLT_TST_DIS, and OPM_VOLT_TST_CHG in table OFCSTD. The battery string pair can be marked as failed and removed from the charge rotation as a result of this testing.

OPMINV (continued)

If field ENABATST is set to N, the test/charge cycle degrades each week to a charge-only cycle, and no initial open-circuit or discharge occurs before the charge period. None of the three measurements is taken and used to determine failed strings. However, voltage measurements of the load bus, charge bus, and all strings are still taken each Sunday. The PES116 log is still output to record the value of these measurements as the audit continues.

Note: The recommended value for any test facility with several restarts a day is N. This disables battery testing. Testing should not occur unless the entire test and charge procedure is run. This occurs from a Sunday at 10:00 p.m. until Tuesday at 11:00 p.m. if default parameters are used. Any reload restarts during this time will abort the procedure.

Data II sequence and implications

The following tables must be datafilled after table OPMINV.

- CLLI
- LCMINV
- RMMINV

Table size

Memory in this table is dynamically allocated.

OPMINV (continued)**Data II**

The following table lists datafill for table OPMINV.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OPMPESK		0 to 198	<i>Outside plant module power and environmental system key</i> Enter the key to this table. This number is limited by the maximum number of line modules (LM) in the office.
RLCMNM		see subfields	<i>RLCM number</i> This field contains the information about the remote line concentrating module (RLCM) that is associated with the outside plant module power and environmental system (OPMPES). This information about the RLCM must first be datafilled in table LCMINV. This field consists of subfields SITE, FRAME and UNIT.
	SITE	alphanumeric (4 characters)	<i>Site</i> Enter the name of the site at which this OPMPES resides. This entry must be identical to that for the associated RLCM datafilled in table LCMINV.
	FRAME	0 to 99	<i>Frame</i> Enter the frame number of the RLCM. This entry must be identical to that for the associated RLCM datafilled in table LCMINV. Any entry outside the range indicated for this field is invalid.
	UNIT	0	<i>Unit</i> Enter 0 (zero). Any entry outside the range indicated for this field is invalid.
TMTYPE		RCCI or RMM	<i>Trunk module type</i> Enter RCCI (ISDN remote cluster controller) or RMM (remote maintenance module).

OPMINV (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
TMNM		0 to 2047	<i>Trunk module number</i> Enter the trunk module number for the RMM that is part of the OPM.
BATTINFO		Y or N(table of 8 booleans)	<i>Battery information</i> This field is a table of 8 booleans. The position of each boolean indicates which battery string is equipped or unequipped. Enter Y (yes) if the battery string is equipped. Otherwise, enter N (no). For example, an entry of YYNYYYN indicates battery strings 0, 1, 2, 4, 5, 6 are equipped, and battery strings 3, 7 are unequipped. Note: Battery strings must be equipped in pairs.
ENABATST		Y or N	<i>Enable battery test</i> Enter Y if three measurement types are taken on Sunday of each week. Enter N if batteries are not tested and audit continues. Note: If set to Y, all test and charge procedures are run. This occurs from Sunday at 10:00 p.m. until Tuesday at 11:00 p.m. if default parameters are used. Any reload restarts during this time abort the procedure.

Data I l e x a m p l e

The following example shows sample datafill for table OPMINV.

The example shows an OPM with key OPMPE\$K of 5, made up of RLCM REM1 02 0, and RMM with trunk module number 5.

Battery strings 0, 1, 2, 4, 5, 6 of the OPM are equipped.

OPMINV (end)

MAP display example for table OPMINV

OPMPESK	RLCMNM	TMTYPE	TMNM	BATTINFO	ENABATST	
5 REM1	2	0	RMM	5	YYNYYYN	N

OPRCMPLX

Table name

Table Operator Complex/Unit ID

Functional description

Table OPRCMPLX is used to obtain the complex/unit ID for a given operator identification (ID) to support login to the International Business Machine (IBM) Directory Assistance System (DAS) vendor. Table OPRCMPLX is indexed by the operator number to obtain the complex/unit ID that is sent to the DAS in a post status message for operator login. The complex/unit ID is used by the IBM system for the purpose of maintaining statistics over groups of operators from various DMS switches. The complex/unit ID has no internal significance to the DMS switch, but must be datafilled to satisfy the IBM vendor's requirements.

Table OPRCMPLX is part of feature AF1266 (IBM DA Protocol and Simulator) that is used in conjunction with the TOPSMPVR foldback features to provide for Traffic Operator Position System (TOPS) to service DA and Intercept (INT) call types while utilizing an IBM-DAS vendor.

In addition to table OPRCMPLX, feature AF1266 uses table ARUIBMRT. Tables SERVICES, TOPSPOS, OPRDAT, and MPCFASTA are also impacted as a result of allowing intercept service to be datafilled.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OPRCMPLX.

Prior to BCS32, all tuples from table OPRCMPLX had to be deleted office parameter TOPS_MAX_OPERATOR_NUM in table OFCENG had to be increased before the size of the table could be changed. For BCS32 and up, this is no longer necessary as store is allocated dynamically. Once the office parameter is increased, new tuples can be added immediately.

In an operator centralization (OC) host office, the office parameter range cannot be set above the previous maximum value (3099) unless all connected remotes are upgraded to BCS32 or greater. The BCS levels of all remotes are checked in table OCGRP.

Table size

0 to 9998 tuples

OPRCMPLX (continued)**Data II**

The following table lists datafill for table OPRCMPLX.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OPRNUM		0 to 9997	<i>Operator number</i> Enter the DMS operator identification (ID) number.
CPLXNUM		0 to 14	<i>Complex number</i> Enter the complex number mapped against the given operator ID. The complex/unit number is sent to the Directory Assistance System (DAS) at login for the given operator ID. Note: The increased range of CPLXNUM and UNITNUM should not be used unless the internal DA systems that use these values are updated to handle the new ranges.
UNITNUM		0 to 14	<i>Unit number</i> Enter the unit number mapped against the given operator ID. The complex/unit number is sent to the DAS at login for the given operator ID. Note: The increased range of CPLXNUM and UNITNUM must not be used unless the internal DASs that use these values are updated to handle the new ranges.

OPRCMPLX (end)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
MAPRQD		Y or N	<i>Selector field for Directory Assistance System operator ID</i> This selector field indicates whether a DAS operator number is required to map against the DMS operator number. Enter Y (yes) to indicate that a DAS operator number is required and datafill refinement DASOPRID. Otherwise, enter N (no).
DASOPRID		0 to 9999	<i>Directory Assistance System operator number</i> Enter the DAS operator number. This field provides mapping of the DMS operator number to a DAS operator ID. The ID is sent to the DAS at login by the DMS operator. If the ID is not datafilled, the DMS operator number is sent to DAS at login.

Data example

The following example shows sample datafill for table OPRCMPLX.

MAP display example for table OPRCMPLX

```
OPRNUM CPLXNUM UNITNUM DASDATA
```

Supplementary information

This section provides information on possible error messages when datafilling table OPRCMPLX.

Error messages

If an attempt is made to datafill an operator number greater than the current setting of the office parameter TOPS_MAX_OPERATOR_NUM in table OFCENG, the following error message is displayed:

```
OPRNUM EXCEEDS OFFICE PARM TOPS_MAX_OPERATOR_NUM
```

This message replaces the following message error message:

```
OPRNUM OUT OF RANGE
```

OPRDAT

Table name

TOPS Operator Data Table

Functional description

Table OPRDAT lists all the assigned operator numbers. Only operators with a number listed in this table are allowed to log in at a Traffic Operator Position System (TOPS) position.

Field OPRVAR and its refinements are required for initial datafill and are necessary to ensure that operator data is properly transferred to the current BCS level during BCS upgrades. These fields are changed using the TOPS force management (FM) devices. Use the table editor for additions and deletions only.

Data II sequence and implications

The following tables must be datafilled before table OPRDAT.

- OFCENG
- SERVICES

Table size

0 to 9998 tuples

The size of table OPRDAT is determined by office parameter TOPS_MAX_OPERATOR_NUM in table OFCENG. Memory is allocated by the value of field PARMVAL in table OFCENG with field PARMNAME equal to TOPS_MAX_OPERATOR_NUM. The value in table OFCENG can be changed and new tuples added to table OPRDAT immediately. The size of table OPRDAT is dynamically allocated during the update.

OPRDAT (continued)

Data II

The following table lists datafill for table OPRDAT.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
OPRNUM		see subfield	Operator number. This field consists of subfield OPRNUM. This field is the key to the table.
	OPRNUM	0 to 9997	Operator number. Enter the number assigned to an operator. Assign operator numbers contiguously to save data store. An operator is not allowed to log in unless the number is datafilled in this field. The highest number that can be assigned to an operator is specified in office parameter TOPS_MAX_OPERATOR_NUM in table OFCENG. Note: The maximum value allowed for the DMS-250 is 4095.
OPRVAR		see subfields	Operator position data. This field consists of selector subfield POS.

OPRDAT (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
	POS	ASST, IC, or OPR	Operator position type. Enter the type of operator position applicable to this operator identification number. Enter ASST if the operator identification number applies to assistance operators only. This operator number is only accepted if entered at an assistance position. If the operator identification number is entered at any other type of position, login is blocked. No refinements require datafill. Enter IC if the operator identification number is applicable to assistance and in-charge operators. This operator number is accepted if entered at either an assistance or an in-charge position. If the operator identification number is entered at a general position, login is blocked. No refinements require datafill. Enter OPR if the operator identification number applies to general operators.

Data example

The following example shows sample datafill for table OPRDAT.

MAP display example for table OPRDAT

OPRNUM	OPRVAR
0	OPR

OPRDAT (end)

Error messages

The following error messages apply to table OPRDAT.

Error messages for table OPRDAT

Error message	Explanation and action
OPRNUM EXCEEDS OFFICE PARM TOPS_MAX_OPERATOR_NUM .	An attempt was made to datafill an operator number greater than the setting of office parameter TOPS_MAX_OPERATOR_NUM.

Table history

TOPS12

When field POS = OPR, subfields CTTEAM, CTSET, XFRTEAM,XFRSET, and SVCSET are removed by functionality MD Code Removal and ReEngineering, OSB00001..

Supplementary information

None

OPRINFO

Table name

Operator information

Functional description

This table is used by the new TOPS translations and screening for non-equal access calls. The table supports the types of number as follows

- calling number (no originating party present)
- called number (no originating party present)
- third number
- busy line verification number
- overseas calling number

Data II sequence and meaning

Enter datafill into tables XLAGRP and TOPSDP before table OPRINFO.

Table size

5 tuples

OPRINFO (continued)

Data II

The table that follows lists datafill for table OPRINFO.

OPRINFO (continued)**Field descriptions (Sheet 1 of 3)**

Field	Subfield	Entry	Explanation and action
NUMTYP		OPERCLG, OPERCLD, OVERSEAS, THIRD, BLV	Number type. This field defines the type of call that can access the table. These tuples are predefined and cannot be added nor deleted. Only field XLASCHEM can be changed. The values for field NUMTYP are as follows: • OPERCLG - Operator to calling number connection. This tuple is used when the operator is trying to connect the calling party and no originating party nor agent is present. This call is a backward connection due to a previous call request, such as a time and charges request when the calling party hangs up and the operator must reestablish the connection. Translations and screening are as follows: — Table TOPSDP field OPERPRTN is used for pretranslations. — Table TOPSDP field STS is used for code translations. — Table TOPSDP field OPERSCRN is used for class of service screening. — Table TOPSPARM parameter DELAY_SPECIFIED_SNPA is used for expanding a seven digit back number to ten digits. — Since the operator is viewed as the starting point to translations, the Local Call Area Name is not applicable. In the past, this type of call was controlled by the DELAY tuple in table OPRTRANS.

OPRINFO (continued)**Field descriptions (Sheet 2 of 3)**

Field	Subfield	Entry	Explanation and action
			• OPERCLD - Operator to called number connection. This tuple is used when connecting to a DN with no originating party present. Some examples include a zenith call or when an operator accesses a loop at an idle position, and next may enter a CLD number to begin outpulsing. Translations and screening are the same as for OPERCLG. • THIRD - Third number. This tuple is used when connecting to a DN for third number verification. The originating agent information is not used for translations and screening because the originator is not calling the third party. Instead, the operator is calling the third party to verify billing acceptance. Translations and screening are the same as for OPERCLG, except there is no number expansion. In the past, this type of call was controlled by the SPLVIFY tuple in table OPRTRANS. • BLV - Busy line verification. This tuple is used when connecting to a DN for BLV. The originating agent information is not used for translations and screening because the originator is not calling the BLV number. Instead, the operator is performing BLV on a DN that was supplied by the originator. Translations and screening are the same as for OPERCLG, except there is no number expansion. In the past, this type of call was controlled by the VERIFY tuple in table OPRTRANS.

OPRINFO (continued)**Field descriptions (Sheet 3 of 3)**

Field	Subfield	Entry	Explanation and action
XLASCHEM		see subfields	OVERSEAS - Overseas calling number. This tuple is used when connecting forward to an overseas number. The originating agent information is not used for translations and screening. Translations and screening are the same as for OPERCLG, except there is no number expansion. In the past, this type of call was controlled by the OVERSEAS tuple in table OPRTRANS.
	NEWXLA	Y or N	Enhanced translations. This field enables the new TOPS translations and screening for the call type in field NUMTYP. Enter Y to enable the new method and enter datafill in field XLAGRP. Enter N to use the old method, which uses table OPRTRANS. The default is N.
	XLAGRP	name from XLAGRP	Translations group. This field is valid only when field NEWXLA = Y. This field assigns a translations group to access table TOPSDP for translations and screening informatoin. The group must be defined in table XLAGRP.

Data I l e xample

The figure that follows shows sample datafill for table OPRINFO.

OPRINFO (end)

MAP display example for table OPRINFO

NUMTYP	XLASCHEM	
OPERCLG	Y	XLGXLA
OPERCLD	Y	CLDXLA
OVERSEAS	Y	OVSXLA
THIRD	Y	3RDXLA
BLV	N	

Table history**TOPS12**

This table was introduced by feature 59006822 in functionality OPRTRANS and EA, UNBN0001.

Additional information

None

OPRTRANS

Table name

TOPS Operator Translations Table

Functional description

The OPRTRANS Table is part of the TOPS Call Processing feature package available in a toll switching unit equipped with the Traffic Operator Position System (TOPS).

The OPRTRANS Table is used during the translation of digits dialed by a TOPS operator for normal, verification, delay, MCCS and overseas calls to define:

- the serving NPA
- where class of service screening is required, the class of service screening subtable name assigned to the TOPS Operator (see table CLSVSCRC.CLSVSCR).
- where standard pretranslation is required, the standard pretranslator subtable name assigned to the TOPS Operator (see table STDPRTCT.STDPRT).

Table OPRTRANS can also be used for the translation of intra-LATA 800 calls originated on TOPS trunks. Private Virtual Network (PVN) calls do not use this table for translations.

In the case of Enhanced 800 (E800) service, if the routing number is returned from the service control point (SCP), the carrier identifier in the routing number is checked against the office parameter SSP_NSC_CARRIER_ID in table OFCENG. If the carrier identifier and the office parameter match, the call is translated as an intra-LATA call. For intra-LATA calls, retranslation starts at table OPRTRANS and then translates to table STDPRTCT.

In the case of 800 plus and 800 plus southbound calls originated on TOPS trunks, retranslation starts at table OPRTRANS.

Table OPRTRANS has six tuples that can be changed, but not deleted.

Table OPRTRANS together with table STDPRTCT.STDPRT enables the operating company to control operator-originated backward connections (delay calls). The operating company can permit all delay calls, prevent all delay calls, or selectively prevent certain delay calls based on the leading digits dialed. All of the aforementioned functions use the facilities of table STDPRTCT.STDPRT, which includes the ability to specify treatments.

OPRTRANS (continued)

Delay calls can be initiated by the following sequences:

- ACS, KP BACK DIGITS START
- RLS BCK, START
- RLS BCK, KP BACK DIGITS START

When a delay call is initiated, the TOPS software determines the pretranslator name from the entry DELAY in table OPRTRANS. The pretranslator name and screening class table name (if they are specified) are used to translate the delay call.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OPRTRANS.

Table size

Memory is dynamically allocated for each tuple in table OPRTRANS.

Data II

The following table lists datafill for table OPRTRANS.

Field descriptions (Sheet 1 of 2)

Field	Subfield or refinement	Entry	Explanation and action
KEY		OPERATOR SPLVFY VERIFY DELAY MCCS or OVERSEAS	Key. Enter the call type originated from the Traffic Operator Position System (TOPS) position.
STS		3 digits from HNPACONT	Serving translations scheme. Enter the serving NPA used for translation of digit dialed by the TOPS operators. This field is used to index the TOPS base translations and screening tables. The entry must be previously defined in table HNPACONT.

OPRTRANS (continued)**Field descriptions (Sheet 2 of 2)**

Field	Subfield or refinement	Entry	Explanation and action
SCRNCL		alphanumeric (1 to 4 characters)	Class of service screening subtable name. If screening by class of service is required, enter the name of the class of service screening subtable (see table CLSVSCRC.CLSVSCR). If screening by class of service is not required, enter NSCR. A class of service screening table name can also be specified in tables TRKGRP and TOPSBC.
PRTNM		alphanumeric (1 to 4 characters) or NPRT	Standard pretranslator subtable name. If standard pretranslation is required, enter the name of the standard pretranslator subtable assigned to the TOPS operator (see table STDPRTCT.STDPRT). If standard pretranslation is not required, enter NPRT.
LCANAME		NLCA	Local calling area screening subtable name. This field is not used; enter NLCA to satisfy the table editor. A local calling area screening table name can be specified in tables TRKGRP and TOPSBC.

Data file example

The following examples show sample datafill for table OPRTRANS.

Example 1: Initial setting

The initial setting for table OPRTRANS is shown below. Tuples cannot be added or deleted. The values in the fields other than those in field KEY can be altered using the CHANGE command.

OPRTRANS (continued)

MAP display example for table OPRTRANS

KEY	STS	SCRNCL	PRTNM	LCANAME
OPERATOR	613	NSCR	NPRT	NLCA
SPLVFY	613	NSCR	NPRT	NLCA
VERIFY	613	NSCR	NPRT	NLCA
DELAY	613	NSCR	NPRT	NLCA
MCCS	613	NSCR	NPRT	NLCA
OVERSEAS	613	NSCR	NPRT	NLCA

Note: The default value for STS is the first SNPA in the List of HNPA Code Tables HNPACONT.

Example 2: Delay calls

For example, a TOPS office with SNPA 613 and local NXX 621 that also serves offices in NPA 416 wants to deny calls to all other NPAs can datafill the tables in the following manner:

When processing a delay call, the call processing software always dials with ten digits. If the operator only enters seven digits, the local NPA is retrieved and prefixed onto the seven digits.

In this example all delay calls with numbers in the range 0 to 415, 417 to 612 and 614 to 999 are routed to vacant code. If the number begins with 416, the delay call is allowed and all ten digits outputted. If the number is 613621, the call is also allowed. However, because a TOPS position cannot output directly to lines, route OFRT 4 must be a loop-around trunks. Other calls with starting digits 613 are allowed; however, the 613 code is deleted by the pretranslator to prevent HNPI treatment.

OPRTRANS (end)**MAP display example for table OPRTRANS**

KEY	STS	SCRNCL	PRTNM	LCANAME
DELAY	613	NSCR	BACK	NLCA

MAP display example for table STDPRTCT.STDPRT

FROMDIGS	TODIGS	PRETRTE
0	415	D VACT
416	416	N OA 0 NA
417	612	D VACT
6130	613620	N OA 3 NA
613621	613621	T OA 3 OFRT 4 10 10 NONE
613622	6139	N OA 3 NA
614	9	D VACT

Table history**TOPS10**

Field SNPA is deleted and field STS is added. Field SNPA is moved to table TOPSPARM parameters OPR_SPECIFIED_SNPA and DELAY_SPECIFIED_SNPA. These changes are made by feature AF7498 in functionality TOPS BC/STS/SNPA, OSB00001.

BCS35

The note regarding translation of TOPS and PVN calls was added.

OPTCTL

Table name

Option Control Table

Functional description

Table OPTCTL is used by Northern Telecom (Nortel) to price features related to Custom Local Area Signaling Service (CLASS) on the basis of 100-line groupings.

For feature group supported options, the count is based on the number of assignments of the feature group line option, not the actual line options that make up a given feature group.

Table OPTCTL is a read-only table. Only authorized Nortel personnel are permitted to change field MAXCOUNT information for existing tuples. All other fields in table OPTCTL are datafilled automatically and cannot be altered by Nortel personnel.

Data II sequence and implications

There is no requirement to datafill other tables prior to table OPTCTL.

The following tables must be datafilled after table OPTCTL:

- LENFEAT
- LENLINES
- IBNFEAT
- IBNLINES

This table has no restart requirements.

Table size

0 to 32 tuples

OPTCTL (continued)**Data II**

The following table lists datafill for table OPTCTL.

Field descriptions (Sheet 1 of 4)

Field	Subfield	Entry	Explanation and action
NTXPKG		CTLPKG1 to CTLPKG10 or the entries listed below	<i>Northern Telecom package</i> This field shows the Nortel package number. For different pricing schemes that use manual line-by-line datafill, the predetermined entries CTLPKG1 to CTLPKG10 are added by Nortel personnel only. For more information on feature packaging, refer to the <i>Feature Description Manual Reference Manual</i>. The packages supported for line-by-line pricing follow:
		NTX219AB	NTX219AB (Teen Service)
		NTXA00AA	NTXA00AA (CLASS Call Setup)
		NTXA00AB	NTXA00AB (CLASS Call Setup)
		NTXA01AA	NTXA01AA (CLASS: Calling Number Display)
		NTXA41AA	NTXA41AA (CLASS: Calling Number Delivery Blocking Administration)
		NTXA42AA	NTXA42AA (CLASS Distinctive Ringing/Call Waiting)
		NTXA45AA	NTXA45AA (CLASS Selective Call Acceptance)
		NTXA94AA	NTXA94AA (RES Features)
		NTXA95AA	NTXA95AA (CLASS Selective Call Forwarding)
		NTXA96AA	NTXA96AA (CLASS Selective Call Rejection)
		NTXE52AA	NTXE52AA (Calling Name Delivery Switch Based)
		NTXE58AA	NTXE58AA (CLASS on MVP)
		NTXF82AA	NTXF82AA (RES Single Line Variety Package)
		NTXN97AA	NTXN97AA (Call Waiting Display)
		NTXP12AA	NTXP12AA (CLASS: Anonymous Caller Rejection)

OPTCTL (continued)**Field descriptions (Sheet 2 of 4)**

Field	Subfield	Entry	Explanation and action
		NTXP96AA	NTXP96AA (ADSI Call Logging)
LASTCHG		numeric, in the form YYYY/MM/DD (10 characters)	<i>Last changed</i> This field shows the date when this tuple was last changed. The field consists of: a four-digit year, a slash, a two-digit month, a slash, and a two-digit day.
MAXCOUNT		numeric (0 to 4294967295)	<i>Maximum count</i> This field specifies the maximum number of lines that can have one or more option and line class code (LCC) pairs listed in field OPTLIST, and is datafilled on a 100-line grouping basis. The default value is 999999. This field, which can be changed by Nortel personnel only, must be altered if line-by-line pricing control of the feature is required. The value of field MAXCOUNT is automatically set to 999999 if the feature package NTXQ70AA (Universal CLASS Feature Access) is present. Note: If line-by-line pricing of features is not done, do not change the default value of 999999 in field MAXCOUNT.
ACTCOUNT		numeric (0 to 4294967295)	<i>Actual count</i> This field specifies the number of lines assigned with one or more option and LCC pairs listed in field OPTLIST.
OPTLIST		vector of up to 32 option and LCC pairs	<i>Option list</i> This field, which consists of up to 32 multiples for subfields OPT and LCC, shows the line option and LCC for pricing control with the package indicated in field NTXPKG. If less than 32 multiples are required, the option list is ended with a \$ (dollar sign).
OPT			<i>Line options</i> This field shows the line options used for pricing control. The following line options are supported in table OPTCTL:

OPTCTL (continued)**Field descriptions (Sheet 3 of 4)**

Field	Subfield	Entry	Explanation and action
		ACB	ACB (automatic call back)
		ACBAMA	ACBAMA (ACB with usage sensitive billing)
		ACRJ	ACRJ (anonymous call rejection)
		AR	AR (automatic recall)
		CALLOG	CALLOG (call logging)
		CNAB	CNAB (calling name delivery blocking)
		CNAMD	CNAMD (calling name delivery)
		CND	CND (calling number delivery)
		CNDAMA	CNDAMA (CND with usage sensitive billing)
		CNDB	CNDB (calling number delivery blocking)
		CNDBAMA	CNDBAMA (CNDB with usage sensitive billing)
		COT	COT (customer originated trace)
		COTAMA	COTAMA (COT with usage sensitive billing)
		CPU	CPU (call pickup)
		CXR	CXR (call transfer)
		DDN	DDN (dialable directory number delivery)
		DDNAMA	DDNAMA (DDN with usage sensitive billing)
		DRCW	DRCW (distinctive ringing/call waiting)
		GIC	GIC (group intercom)
		MSB	MSB (make set busy)
		SDN	SDN (second DN (teen service))
		SCA	SCA (selective call acceptance)
		SCF	SCF (selective call forwarding)
		SCRJ	SCRJ (selective call rejection)

OPTCTL (continued)**Field descriptions (Sheet 4 of 4)**

Field	Subfield	Entry	Explanation and action
LCC		SCWID	SCWID (spontaneous call waiting identification)
		SLVP	SLVP (single line variety package)
		COIN	<i>Line class code</i> This field shows the line class codes used for pricing control.
		DATAP	
		DATA	
		FR1	
		IBN	
		ISDN	
		KSET	
		M5008	
		M5009	
		M5112	
		M5208	
		M5209	
		M5212	
		M5216	
		M5312	
		M5316	
		M6310	
		M6320	
		MRPSE	
		NLCC	
		SPC	
		STD	
		RES	

Data file example

The following example shows sample datafill for table OPTCTL.

This information is datafilled by default during loadbuild time and subsequently altered by Nortel personnel for pricing control according to the Nortel products that the operating company purchased.

OPTCTL (continued)**MAP display example for table OPTCTL**

NTXPKG	LASTCHG	MAXCOUNT	ACTCOUNT	OPTLIST
NTXP12	1993/09/09	999999	0	(ACRJ RES) (ACRJ IBN)
(ACRJ PSET)	(ACRJ M5009)	(ACRJ M5209)	(ACRJM5312)	(ACRJ M5212)
(ACRJ M5112)	\$			
NTXN97	1993/09/09	999999	0	(SCWID RES) \$
NTXQ29	1993/09/09	999999	0	(CNAB RES) \$
NTXA00	1993/09/09	999999	0	(AR M5312) \$
NTXP96	1993/09/09	999999	0	(CALLOG RES) (CALLOG IBN) \$

Table history**MMP13**

Added new LCCs for M6310 and M6320 Meridian Business sets.

NA008

Added missing LCCs for RES, IBN, 1FR, 1MR, PSET, DATA, and PDATA.

NA004

Added LCCs for M5008, M5208, M5216, and M5316 Meridian Business sets.

BCS35

Specified that the field MAXCOUNT value of 999999 applies if package NTXQ70AA (Universal CLASS Feature Access) is present

Supplementary information

This section provides information on alternative pricing schemes for table OPTCTL.

Alternative pricing schemes

Alternative pricing schemes such as call management services (CMS) are not recommended.

In Canada, CMS options automatic call back (ACB), automatic recall (AR), calling number delivery (CND), calling number delivery blocking (CNDB), customer originated trace (COT), and dialable directory number delivery

OPTCTL (end)

(DDN) come in the same NTX packages as for a CLASS office, but the type of line-by-line pricing control groupings can vary from office to office.

To accommodate these different pricing schemes, the predefined tuples CTLPKG1 through CTLPKG10 for manual datafill are used.

Note 1: If manual datafill is used, only the predetermined tuples CTLPKG1 to CTLPKG10 are added.

Note 2: Automatically datafilled tuples whose option list was removed can never be automatically datafilled again.

The above rules can only be used in the event that a new Nortel software package cannot be made available to cover the specific type of pricing used in a given office.

OPTOPT

Table name

Incompatible Options Table

Functional description

This is a read-only table. For each line option (for example, AUL), table OPTOPT lists the other line options (for example, MAN) that are not compatible.

The following tables use the information in table OPTOPT:

- HUNTGRP
- IBNFEAT
- IBNLINES
- KSETFEAT
- KSETLINE
- LENFEAT
- LENLINES

Datafill sequence and implications

This table cannot be datafilled by operating company personnel.

Table size

Memory for table OPTOPT is allocated dynamically.

Datafill

The following table lists datafill for table OPTOPT.

Field descriptions

Field	Subfield	Entry	Explanation and action
OPTION		alphanumeric	Line option. This key field contains one line option for each record.
INCOMPAT		INCOMPAT_OPTION_LIST	Incompatible options. This field contains all line options that are incompatible with the line option specified in the key field. Note: Value XXTRG is not a valid option.

OPTOPT (continued)**Datafill example**

The following example shows sample datafill for table OPTOPT.

MAP display example for table OPTOPTS

```

OPTION
-----
INCOMPAT
-----
AAB
(EHLD) (MDN) (MLAMP) $
AAK
(AEMK) (CAG) (CALLOG) (CLSUP) (DTM) (MDN) (SETMODEL) (SLQ) (SMDI) (SOR) (SORC) (UCD)
(UCDSD) $
ACB
(AUL) (AVT) (BNN) (CCSA) (FIG) (FTS) (LDTPSAP) (LNPTST) (MDN) (PCWT) (PREMTBL) (RAG)
(3WCPUB) $
ACD
(ACRJ) (AUL) (BC) (BNN) (CALLOG) (CNAB) (CNDB) (DLH) (DNH) (DOR) (DTM) (ECM) (EHLD)
(GIC) (MDN) (MLAMP) (MLH) (MPH) (MREL) (OLS) (PREMTBL) (PRH) (RMB) (SCMP) (SHU)
(SIMRING) (SLQ) (SMDI) (SOR) (SORC) (TBO) (TLS) (UCD) (UCDSD) $
ACOU
(DNH) (SCMP) $
ACRJ
(ACD) (AVT) (CCSA) (GIC) (LDTPSAP) (LNPTST) (SLQ) (UCD) (WC) $
AFC
(DBC) (CRBL) (NUMC) (NDNAP) $
AMSG
(AMSGDENY) (FTS) (LNPTST) $
AMSGDENY
(AMSG) (LNPTST) $
AOC
(AOC) $
AR
(AUL) (AVT) (BNN) (CCSA) (FIG) (FTS) (LDTPSAP) (LNPTST) (MDN) (PCWT) (PREMTBL) (RAG)
(3WCPUB) $
AUL
(ACB) (ACD) (AR) (ARDDN) (CALLOG) (CFBL) (CFDA) (CFGD) (CFGDA)
(CFW) (CNAB) (CNDB) (COT) (CPR) (CSMI) (CTD) (CUSD) (CWD) (DCBI)
(DCPU) (DMCT) (FCTDNTER) (FCTDNTRA) (FTS) (HOT) (ISA) (LINEPSAP) (LNPTST) (LNR) (MAN) (MPB)
(MPHH) (NFA) (ONI) (PBL) (RCHD) (RMI) (SCL) (SCS) (SCU) (SC1) (SC2) (SC3) (SLQ) (SLVP)
(SMDI) (TDN) (TDV) (UCD) (UCDSD) (WML) $
AVT
(ACB) (ACRJ) (AR) (ARDDN) (CBE) (CBI) (CBU) (CDE) (CDI) (CDU) (CFB) (CFBL) (CFD) (CFDA)
(CFDVT) (CFF) (CFI) (CFK) (CFRA) (CFS) (CFU) (CFW) (CMCF) (CNAMD) (CND) (CPU) (CSDO)
(CSMI) (CUSD) (CWX) (DIN) (DRCW) (ECM) (EHLD) (IECFB) (IECFD) (LDTPSAP) (LINEPSAP)
(LNPTST) (MDN) (MLAMP) (MPB) (MREL) (PBL) (PLP) (RAG) (RCHD) (RND) (RMI) (RSUS) (SCA)
(SCF) (SCL) (SCMP) (SCRJ) (SCS) (SCU) (SC1) (SC2) (SC3) (SDN) (SETMODEL) (SLQ) (SLVP)
(SMDI) (SMDICND) (SOR) (SORC) (SPB) (UCD) (UCDSD) (WUCR) $
BC
(ACD) (CNF) (CWD) (CWI) (CWO) (CWT) (DCBI) (EBO) (EMW) (ICM) (MBSCAMP) (MPH) (MWIDC)
(MWQRY) (MWT) (SLQ) (SMDI) (3WCPUB) (UCD) (UCDSD) $
BCLID
(DTM) (LNPTST) (MPH) $

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OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT

BLOCKCGN	
(CND) (RND) \$	
BNN	
(ACB) (ACD) (AR) (ARDDN) (CBE) (CBI) (CBU) (CDE) (CDI) (CDU) (CFB) (CFBL) (CFD) (CFDA)	
(CFDVT) (CFF) (CFI) (CFIND) (CFK) (CFRA) (CFS) (CFU) (CFW) (CFXDNCT) (CMCF) (CNAMD) (CAD)	
(CPU) (CSDO) (CSMI) (CUSD) (CWX) (DIN) (DRCW) (ECM) (EHLN) (IECFB) (IECFD) (LDTPSAP)	
(LINEPSAP) (LNPTST) (MDN) (MLAMP) (MPB) (MREL) (PBL) (PLP) (RAG) (RCHD) (RND) (RMI)	
(RSUS) (SCA) (SCF) (SCL) (SCMP) (SCRJ) (SCS) (SCU) (SC1) (SC2) (SC3) (SDN) (SETMODEL)	
(SLQ) (SLVP) (SMDI) (SMDICND) (SOR) (SORC) (SPB) (UCD) (UCDSD) (WC) \$	
CAG	
(AAK) (AEMK) (CALLOG) (CLSUP) (DOR) (DTM) (SLQ) (SMDI) (SOR) (UCD) (UCDSD) \$	
CALLOG	
(AAK) (ACD) (AEMK) (ASL) (AUL) (AVT) (CAG) (CCSA) (CCV) (DIN) (EMU) (FIG) (LDTPSAP)	
(LNPTST) (MDN) (MDNNAME) (MEMDISP) (MLAMP) (MREL) (MRF) (MWT) (OBS) (RMI) (SLQ) (UCD) \$	
CBE	
(BNN) (CBI) (CFXDNCT) (DLH) (DNH) (FNT) (HOT) (IECFB) (MLH) (PRH) (TBO) (TRMBOPT) \$	
CBI	
(BNN) (CBE) (CFXDNCT) (DLH) (DNH) (FNT) (HOT) (IECFB) (MLH) (PRH) (TBO) (TRMBOPT) \$	
CBU	
(BNN) (CFXDNCT) (DLH) (DNH) (FNT) (HOT) (MLH) (PRH) (TBO) (TRMBOPT) \$	
CCSA	
(ACB) (ACRJ) (AR) (ARDDN) (CALLOG) (CNAMD) (CND) (CNDB) (COT) (CSDO) (DDN) (DRCW) (FGA)	
(LCDR) (LDTPSAP) (MAN) (ONI) (RND) (SCA) (SCF) (SCRJ) \$	
CCW	
(LNPTST) (MLH) (NCCW) \$	
CARR	
(ESL) \$	
CDE	
(BNN) (CDI) (CFXDNCT) (DLH) (FNT) (HOT) (IECFD) (MLH) (PRH) (TBO) (TRMBOPT) \$	
CDI	
(BNN) (CDE) (CFXDNCT) (DLH) (FNT) (HOT) (IECFD) (MLH) (PRH) (TBO) (TRMBOPT) \$	
CDU	
(BNN) (CFXDNCT) (DLH) (FNT) (HOT) (MLH) (PRH) (TBO) (TRMBOPT) \$	
CDO	
(CDO) (CDO1) (CDO2) (CDO3) (CDO4) (CDO5) (CDO6) (CDO7) (CDO8) (CDO9) (CSDO) (FGA) (FNT) \$	
CD1	
(CDO) (CDO1) (CDO2) (CDO3) (CDO4) (CDO5) (CDO6) (CDO7) (CDO8) (CDO9) (CSDO) (FGA) (FNT) \$	
CD2	
(CDO) (CDO1) (CDO2) (CDO3) (CDO4) (CDO5) (CDO6) (CDO7) (CDO8) (CDO9) (CSDO) (FGA) (FNT) \$	
CD3	
(CDO) (CDO1) (CDO2) (CDO3) (CDO4) (CDO5) (CDO6) (CDO7) (CDO8) (CDO9) (CSDO) (FGA) (FNT) \$	
CD4	
(CDO) (CDO1) (CDO2) (CDO3) (CDO4) (CDO5) (CDO6) (CDO7) (CDO8) (CDO9) (CSDO) (FGA) (FNT) \$	

OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT
CD5	
(CDO) (CDO1) (CDO2) (CDO3) (CD04) (CDO5) (CD06) CDO7) (CD08) (CD09) (CSDO) (FGA) (FNT) \$	
CD6	
(CDO) (CDO1) (CDO2) (CDO3) (CD04) (CDO5) (CD06) CDO7) (CD08) (CD09) (CSDO) (FGA) (FNT) \$	
CD7	
(CDO) (CDO1) (CDO2) (CDO3) (CD04) (CDO5) (CD06) CDO7) (CD08) (CD09) (CSDO) (FGA) (FNT) \$	
CD8	
(CDO) (CDO1) (CDO2) (CDO3) (CD04) (CDO5) (CD06) CDO7) (CD08) (CD09) (CSDO) (FGA) (FNT) \$	
CD9	
(CDO) (CDO1) (CDO2) (CDO3) (CD04) (CDO5) (CD06) CDO7) (CD08) (CD09) (CSDO) (FGA) (FNT) \$	
CFB	
(BNN) (CFXDNCT) (DLH) (DNH) (FNT) (HOT) (MLH) (MPH) (NRS) (PRH) (TBO) (TRMBOPT) \$	
CFBL	
(AUL) (BNN) (DLH) (FNT) (HOT) (LNPTST) (MAN) (MLH) (MPB) (ONI) (TBO) (TRMBOPT) \$	
CFD	
(BNN) (CFXDNCT) (DLH) (FNT) (HOT) (MLH) (MPH) (NRS) (PRH) (TBO) (TRMBOPT) \$	
CFDA	
(AUL) (BNN) (DLH) (FNT) (HOT) (LNPTST) (MAN) (MLH) (MPB) (ONI) (TBO) (TRMBOPT) \$	
CFDVT	
(BNN) (DLH) (FNT) (HOT) (MLH) (ONI) (PRH) (TBO) (TRMBOPT) \$	
CFF	
(BNN) (CFI) (CFK) (CFU) (CFXDNCT) (CSDO) (FNT) (HOT) (LDTPSAP) (ONI) (TBO) (TRMBOPT) \$	
CFGD	
(AUL) (CFGDA) (CNAB) (CNDB) (FGA) (FNT) (HOT) (MAN) (MPH) (NRS) (ONI) (RCHD) (SCMO) (SDN) (SLVP) (TBO) (TRMBOPT) \$	
CFGDA	
(AUL) (CFGD) (FNT) (HOT) (LNPTST) (MAN) (MPB) (ONI) (RCHD) (SDN) (SLVP) (TBO) (TRMBOPT) \$	
CFI	
(BNN) (CFF) (CFK) (CFU) (CFXDNCT) (CSDO) (FNT) (HOT) (LDTPSAP) (NRS) (ONI) (TBO) (TRMBOPT) \$	
CFK	
(BNN) (CFF) (CFI) (CFRA) (CFU) (CFXDNCT) (CSDO) (FNT) (HOT) (LDTPSAP) (ONI) (PLP) (TBO) (TRMBOPT) \$	
CFRA	
(BNN) (CFK) (CSDO) (FNT) (HOT) (LNPTST) (ONI) (TBO) (TRMBOPT) \$	
CFS	
(BNN) (FNT) (HOT) (LDTPSAP) (TBO) (TRMBOPT) \$	
CFU	
(BNN) (CFF) (CFI) (CFK) (CFXDNCT) (CSDO) (CUST) (FNT) (HOT) (LDTPSAP) (NRS) (ONI) (TBO) (TRMBOPT) \$	
CFW	
(AUL) (BNN) (CUSD) (FNT) (HOT) (LNPTST) (MAN) (MPB) (ONI) (TBO) \$	
CFXDNCT	
(BNN) (CBE) (CBI) (CBU) (CDE) (CDI) (CDU) (CFB) (CFD) (CFF) (CFI) (CFK) (CFMDN) (CFTB) (CFTD) (CFU) (CMCF) (CSDO) (DLH) (DNH) (FNT) (HOT) (IECFB) (IECFD) (IRR) (LDTPSAP) (MLH) (NRS) (ONI) (PMD) (PRH) (TBO) (TRMBOPT) \$	

OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT

CHD	
(ECM) (FIG) (FTS) (LDTPSAP) (NDC) \$	
CIDSDLV	
(AVT) (PREMTBL) \$	
CIDSSUP	
(AVT) (PREMTBL) \$	
CIR	
(CFIND) (CWX) (DLH) (LNPTST) (MPH) (RCHD) (SCMP) (SDN) (SLVP) \$	
CLF	
(ESL) (FIG) (FTS) (LDTPSAP) (LNPTST) (PLP) \$	
CLI	
(LNPTST) (PBL) \$	
CLNT900	
(AINDN) \$	
CMD	
(PREMTBL) (RAG) (3WCPUB) (MDN) \$	
CMG	
(AUL) (BNN) (MDN) (PDO) (SIMRING) (WC) \$	
CNAMD	
(BNN) (CCSA) (LDTPSAP) (LNPTST) (3WCPUB) \$	
CND	
(AVT) (BLOCKCGN) (BNN) (CCSA) (DCND) (DDN) (LDTPSAP) (LNPTST) (PCWT) (PREMTBL) (3WCPUB) \$	
COIN	
(CWT) (CXR) (ICWT) (ICT) (I3WC) (MDN) (MTR) (SPM) (3WC) \$	
COT	
(AUL) (AVT) (CCSA) (3WCPUB) (LDTPSAP) (LNPTST) (PCWT) (PREMTBL) \$	
CPU	
(BNN) (FTS) (HOT) (LDTPSAP) (LNPTST) (PDO) (WC) \$	
CRBL	
(AFC) (NUMC) \$	
CRT	
(CRTDENY) (FIG) (FTS) (LNPTST) (NDC) (NOH) \$	
CRTDENY	
(CRT) \$	
CWD	
(AUL) (BC) (CWO) (FIG) (LDTPSAP) (MBSCAMP) \$	
CWI	
(BC) (CWX) (DLH) (FIG) (HOT) (NDC) \$	
CWO	
(BC) (CWD) (FTS) (LDTPSAP) (MBSCAMP) \$	
CWR	
(FTS) (LDTPSAP) (LNPTST) \$	
CWT	
(BC) (DLH) (FIG) (FTS) (LDTPSAP) (LINEPSAP) (LNPTST) (MPB) (NDC) (RPA) (SLQ) \$	
CWTACT	
(MLH) \$	
CWTC	
(DENYCWTC) (DSCWID) \$	

OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT
CXR	
(FIG) (TRS) (LNPTST) (NDC) (NOH) \$	
DBC	
(AFC) (MDN) (NUMC) \$	
DCBI	
(AUL) (BC) (DCPU) (DOR) (FTS) (LDTPSAP) \$	
DCBX	
(DCPX) (LDTPSAP) (NDC) \$	
DCND	
(CND) (DDN) (DTM) (MDN) (RND) (SCA) (SCWID) (SLQ) (UCD) \$	
DCPK	
(DOR) (FIG) (FTS) (LDTPSAP) \$	
DCPU	
(AUL) (DCBI) (DOR) (LDTPSAP) \$	
DDN	
(AVT) (CCSA) (CND) (DCND) (LDTPSAP) (LNPTST) (PCWT) (PREMTBL) (3WCPUB) \$	
DENYCWTC	
(CWTC) \$	
DENYSRA	
(ESL) (LINEPSAP) (PLP) (PPL) \$	
DGT	
(MAN) \$	
DIN	
(BNN) (CALLOG) (DRCW) (HOT) (LDTPSAP) (LINEPSAP) (BL) (SCA) (SCF) (SCRJ) \$	
DLH	
(ACD) (ADSI) (CBE) (CBI) (CBU) (CDE) (CDI) (CDU) (CFB) (CFBL) (CFD) (CFDA) (CFDVT)	
(CFIND) (CFXDNCT) (CIR) (CWI) (CWT) (CWX) (DMCT) ((DNH) (DSCWID) (ECM) (EHL) (IECFB)	
(IECFD) (IICB) (INT) (LDSA) (LDSO) (LDSR) (LDST) (LNPTST) (MDN) (MLAMP) (MLH) (MPB) (MREL)	
(NSDN) (PCWT) (PRH) (RAG) (RCHD) (RSUS) (SCMP) (SCWID) (SDN) (SETMODEL) (SHU) (SIMRING)	
(SLQ) (SLVP) (SOR) (SORC) (UCD) (UCDSD) (WC) (WUCR) \$	
DNH	
(ACD) (ACOU) (CBE) (CBI) (CBU) (CFB) (CFIND) (CFXDNCT) (CWX) (DLH) (DMCT) (ECM) (EHL)	
(IECFB) (IICB) (LDTPSAP) (LNPTST) (MDN) (MLAMP) (MLH) (MPB) (MPH) (MREL) (NSDN) (RCHD) (RSUS)	
(SCMP) (SDN) (SETMODEL) (SIMRING) (SLQ) (SLVP) (UCD) (UCDSD) (WC) (WUCR) \$	
DOR	
(ACD) (CAG) (CLSUP) (DCBI) (DCPK) (DCPU) (DMCT) (LNPTST) (LNR) (MSB) (MSBI) (SIMRING) \$	
DSCWID	
(CWTC) (DLH) (FIG) (FTS) (LNPTST) (MLH) (MPH) \$	
DTM	
(AAK) (ACD) (AEMK) (AVT) (BCLID) (CAG) (CLSUP) (DCND) (DMCT) (LDTPSAP)	
(LNPTST) (MLAMP) (MPH) (MREL) (PDO) (PREMTBL) (SMDI) (TBO) (TRMBOPT) \$	
ECM	
(ACD) (BNN) (CHD) (DLH) (LNPTST) (MLH) (SLQ) (UCD) \$	
EWAL	
(CTD) (FCTDNTER) (FCTDNTRA) (INTPIC) (LPIC) (PIC) \$	
EWALI	
(CTD) (FCTDNTER) (FCTDNTRA) (INTPIC) (LPIC) (PIC) (DCND) (DLH) (DMCT) (DNH) (ECM)	
(EHL) (KSH) (MDN) (MLAMP) (MLH) (MPH) (MREL) (PREMTBL) (PRH) (RCHD) (RMB) (SCMP) (SDN)	
(SHU) (SLVP) (SMDI) (TBO) (UCD) \$	

OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

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OPTION
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FIG
(ACB) (AR) (ARDDN) (CALLOG) (CHD) (CLF) (CNF) (CPH) (CRT) (CSMI) (CWD) (CWI)
(CWT) (CWX) (CXR) (DCPK) (DSCWID) (EBO) (EMW) (ESL) (FXR) (HLD) (LDSA)
(LDSO) (LDSR) (LDST) (LDTPSAP) (LINEPSAP) (LNPTST) (MWIDC) (MWQRY) (MWT)
(PCWT) (PRK) (RAG) (RMI) (SCWID) (3WC) (3WCPUB) $
FTS
(ACB) (AMSG) (AR) (ARDDN) (AUL) (CHD) (CLF) (CNF) (CPU) (CRT) (CSMI) (CW0) (CWR) (CWT)
(CXR) (DCBI) (DCPK) (DRCW) (DRING) (DSCWID) (EBO) (ELN) (EMW) (FTRGRP) (HLD) (ISA) (LNR)
(MWT) (NFA) (LNPTST) (PRK) (RAG) (RCHD) (SDN) (SDS) (SVCGRP) (3WCC) $
FXR
(CSDO) (FIG) (LDTPSAP) (MAN) (MPB) (NDC) (NOH) $
GIC
(ACD) (ACRJ) (EHLN) (LDTPSAP) (LNPTST) (MDN) (MLAMP) (MREL) (PLP) (TBO) (WML) $
HLD
(FIG) (FTS) (LDTPSAP) (LINEPSAP) (NDC) $
HOT
(AUL) (CBE) (CBI) (CBU) (CFE) (CDI) (CDU) (CFB) (CFBL) (CFD) (CFDA) (CFDVT) (CFF) (CFGD)
(CFGDA) (CFI) (CFK) (CFIND) (CRFA) (CFS) (CFU) (CFW) (CFXDNCT) (CMCF) (CPU) (CSDO) (CSMI)
(CUST) (CWI) (DIN) (FGA) (IECFB) (IECFD) (ISA) (LNPTST) (MAN) (MPB) (RMI) (RSP) (SCF)
(SCU) (TDV) (WUCR) $
ICM
(BC) $
IECFB
(BNN) (CBE) (CFXDNCT) (DLH) (DNH) (FNT) (HOT) (MLH) (PRH) (TBO) (TRMBOPT) $
IECFD
(BNN) (CDE) (CDI) (CFXDNCT) (DLH) (FNT) (HOT) (MLH) (PRH) (TBO) (TRMBOPT) $
ILB
(IMB) (LNPTST) $
IMB
(IMB) (LNPTST) $
INT
(DLH) (FGA) (LNPTST) (MDN) (MPB) (SCMP) $
INTPIC
(EWAL) (EWALI) $
ISA
(AUL) (ESA) (FTS) (HOT) (LNPTST) (ONI) (WML) $
KSH
(PBL) (SIMRING) (SLQ) (SMDI) (UCD) (UCDSD) $
LCDR
(CCSA) (CSDO) (LNTPST) (MAN) (ONI) $
LDSA
(DLH) (FIG) (LNPTST) (MPB) (NDC) $
LDSO
(DLH) (FIG) (LDSR) (LDST) (LNPTST) (MPB) (NDC) $
LDSR
(3WC) (ACB) (AR) (CHD) (CNF) (RAG) (WUCR) $
LDST
(DLH) (FIG) (LDST) (LNPTST) (MPB) (NDC) $

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OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT
LNPTST	
(ACB) (ACRJ) (ADSI) (AIN) (AINDN) (AMATEST) (AMSG) (AMSGDENY) (AR) (ARDDN)	
(ASP) (ATC) (AUL) (BCLID) (BNN) (CALLOG) (CCW) (CDT) (CFBL) (CFDA) (CFGDA)	
(CFRA) (CFW) (CIR) (CLF) (CLI) (CNAB) (CNAMD) (CND) (CNDB) (CNDBO) (COD)	
(CONVERT) (COT) (CPU) (CRT) (CSMI) (CTD) (CUSD) (CWR) (CWT) (CXR) (DDN)	
(DENY) (DENYCSMI) (DENYISA) (DENYU3WC) (DLH) (DNH) (DOR) (DRCW)	
(DSCWID) (DTM) (ECM) (ELN) (EWAL) (FANI) (FCTDINT) (FCTDNTER) (FCTDNTRA)	
(FGA) (FIG) (FNT) (FRO) (FRS) (FTRGRP) (FTS) (GIC) (GND) (HOT) (ILB) (IMB) (INT)	
(IRR) (ISA) (ISADEACT) (LCDR) (LDSA) (LDSO) (LDSR) (LDST) (LOD) (LOR) (LPIC)	
(MBK) (MDN) (MLH) (MSB) (MWT) (NAME) (NDC) (NFA) (NHT) (NLT) (NOH) (NPGD)	
(NTS_CID) (NTS_DNID) (OCFA) (OFR) (OFS) (ONI) (OUTWT) (PIC) (PILOT) (PLP)	
(PPL) (PRH) (RCVD) (RCHD) (RMB) (RMI) (RMP) (RMR) (RMS) (RMT) (RSP) (RSUS)	
(SACB) (SCA) (SCF) (SCMP) (SCRJ) (SCU) (SCWID) (SC1) (SC2) (SC3) (SDN) (SDS)	
(SDSDENY) (SDY) (SETMODEL) (SHU) (SL) (SLC) (SLU) (SLVP) (SMDI) (SMDICND)	
(SPB) (SRA) (STRD) (SUPPRESS) (SUS) (TBO) (TDN) (TERM) (TES) (TFO) (TRMBOPT)	
(3WC) (WML) (WUCR) \$	
MDN	
(AAB) (AAK) (ACD) (BNN) (CALLOG) (CFIND) (CMD) (CMG) (DCND) (DLH) (DMCT)	
(DND) (DNH) (GIC) (INT) (LDTPSAP) (LNPTST) (MLH) (MPH) (PBL) (PDO) (PREMTBL)	
(PRH) (RMB) (SDN) (SHU) (SLQ) (SLVP) (SMDI) (SOR) (SORC) (UCD) (UCDSD) (WC) (WUCR) \$	
MLH	
(ACD) (ADSI) (CBE) (CBI) (CBU) (CCW) (CDE) (CDI) (CDU) (CFB) (CFBL) (CFD)	
(CFDA) (CFDVT) (CFIND) (CFXDNCT) (CSDO) (CWTACT) (CWX) (DLH) (DMCT) (DNH)	
(DSCWID) (ECM) (EHL) (IECFB) (IECFD) (IICB) (INT) (LNPTST) (MDN) (MLAMP) (MPB)	
(MREL) (NSDN) (PCWT) (PRH) (RAG) (RCHD) (RSUS) (SCMP) (SCWID) (SDN)	
(SETMODEL) (SIMRING) (SLQ) (SLVP) (SOR) (SORC) (UCD) (UCDSD) (WC) (WUCR) \$	
MPH	
(ACD) (AUL) (BC) (BCLID) (CFB) (CFD) (CFGD) (CIR) (CWI) (CWX) (DNH) (DSCWID) (DTM)	
(LOD) (LOR) (MDN) (OFR) (OFS) (RAG) (RMB) (SCMP) (SCWID) (SETMODEL) (SHU) (SIMRING)	
(SLQ) (SMDICND) (SOR) (SORC) (TFO) (TRMBOPT) (UCD) \$	
NCCW	
(CCW) \$	
NDC	
(CHD) (CNF) (CRT) (CWI) (CWT) (CWX) (CXR) (DCBX) (FXR) (HLD) (LDSA) (LDSO)	
(LDSR) (LDST) (LNPTST) (MPB) (PCWT) (PRK) (3WC) (3WCPUB) \$	
NDNAP	
(AFC) (NUMC) \$	
NOH	
(CRT) (CXR) (FXR) (LINEPSAP) (LNPTST) (3WC) \$	
NUMC	
(AFC) (DBC) (CRBL) (NDNAP) \$	
PDO	
(DTM) (MDN) (PLP) (RSUS) (SDN) (SUS) \$	
PLP	
(BNN) (CFK) (CLF) (CNF) (DENYSRA) (GIC) (LNPTST) (PDO) (PRK) (SRA) \$	
REV	
(ICT) (I3WC) (I6WC) (VOWDN) \$	
RND	
(AVT) (BLOCKCGN) (BNN) (CCSA) (DCND) (LDTPSAP) (LNPTST) (PCWT) (PREMTBL) (3WCPUB) \$	

OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT
RSUS	
(BNN) (DLH) (DNH) (LNPTST) (MLH) (PBL) (PDO) \$	
SCA	
(AVT) (BNN) (CCSA) (CFMDN) (DCND) (DIN) (DMCT) (EHLN) (LDTPSAP) (LNPTST)	
(PCWT) (PREMTBL) (PRL) (3WCPUB) (WC) \$	
SDN	
(BNN) (CFGD) (CIR) (DLH) (DNH) (EHLN) (FTS) (LNPTST) (LOD) (LOR)	
(MLAMP) (MLH) (MPB) (MREL) (OFR) (OFS) (PDO) (PILOT) (PRH) (RCVD)	
(RMB) (SHU) (SLQ) (TBO) (TERM) (TFO) (TRMBOPT) (UCD) (WC) \$	
SDS	
(FTS) (LNPTST) (SDSDENY) \$	
SIMRING	
(ACD) (CMG) (DLH) (DNH) (DOR) (KSH) (MDN) (MLH) (MPH) (UCD) (WC) \$	
SRA	
(ESL) (LINEPSAP) (PLP) (PPL) \$	
SLQ	
(AAK) (ACD) (ACRJ) (AEMK) (AUL) (BC) (BNN) (CAG) (CALLOG) (CLSUP) (CNAB) (CNDB)	
(CWT) (DCND) ((DLH) (DMCT) (DNH) (ECM) (EHLN) (KSH) (MDN) (MLAMP) (MLH) (MPH) (MREL)	
(PREMTBL) (PRH) (RCHD) (RMB) (SCMP) (SDN) (SHU) (SLVP) (SMDI) (TBO) (UCD) \$	
SVCGRP	
(FTS) \$	
TBO	
(ACD) (CBE) (CBI) (CBU) (CDE) (CDI) (CDU) (CFB) (CFBL) (CFD) (CFDA) (CFDVT)	
(CFF) (CFGD) (CFGDA) (CFI) (CFK) (CFRA) (CFS) (CFU) (CFW) (CFXDNCT) (CMCF)	
(CSMI) (CUST) (DTM) (GIC) (IECFB) (IECFD) (LNPTST) (RMI) (SDN) (SLQ) \$	
TDN	
(AUL) (CSDO) (CTD) (FCTDNTER) (FCTNDTRA) (LNPTST) (RMT) (RSP) (SACB) (TDV) (TES) \$	
TDV	
(AUL) (CSDO) (CTD) (FCTDNTER) (FCTNDTRA) (HOT) (RMT) (RSP) (SACB) (TDV) (TES) \$	
TERM	
(LNPTST) (RCHD) (SCMP) (SDN) (SLVP) \$	
TES	
(LNPTST) (LNPTST) (TDN) (TDV) \$	
TFO	
(LNPTST) (MPH) (RCHD) (SCMP) (SDN) (SLVP) \$	
TLS	
(ACD) \$	
TRMBOPT	
(CBE) (CBI) (CBU) (CDE) (CDI) (CDU) (CFB) (CFBL) (CFD) (CFDA) (CFDVT) (CFF) (CFGD)	
(CFGDA) (CFI) (CFK) (CFRA) (CFS) (CFU) (CFXDNCT) (CMCF) (CSMI) (CUST) (DTM) (IECFB)	
(IECFD) (LNPTST) (MPH) (RCHD) (RMI) (SCF) (SCMP) (SDN) (SLVP) (TBO) \$	
3WC	
(CSDO) (FIG) (FTS) (LDTPSAP) (LNPTST) (MAN) (MPB) (NDC) (NOH) \$	
3WCPUB	
(ACB) (AR) (ARDDN) (BC) (CNAB) (CNAMD) (CND) (CNDB) (COT) (DDN) (DRCW) (FIG) (NDC)	
(RND) (SACB) (SCA) (SCF) (SCRJ) \$	

OPTOPT (continued)**MAP display example for table OPTOPT (continued)**

OPTION	INCOMPAT

UCD	
(AAK) (ACD) (ACRJ) (AEMK) (AUL) (BC) (BNN) (CAG) (CALLOG) (CLSUP) (CNAB) (CNDB) (DCND)	
(DLH) (DMCT) (DNH) (ECM) (EHLD) (KSH) (MDN) (MLAMP) (MLH) (MPH) (MREL) (PREMTBL) (PRH)	
(RCHD) (SCMP) (SDN) (SHU) (SIMRING) (SLQ) (SLVP) (TBO) \$	
UCDSD	
(AAK) (ACD) (AEMK) (AUL) (BC) (BNN) (CAG) (CLSUP) (CNAB) (CNDB) (DLH) (DNH) (EHLD)	
(KSH) (LDTPSAP) (MDN) (MLAMP) (MLH) (MREL) (PREMTBL) (PRH) (RMB) (SCMP) (SHU) (TBO) \$	
WC	
(ACRSJ) (BNN) (CMG) (CPU) (DLH) (DNH) (MDN) (MLH) (SCA) (SDN) (SIMRING) \$	
WML	
(AUL) (GIC) (ISA) (LNPTST) (MAN) (MPB) \$	
WUCR	
(DLH) (HOT) (LNPTST) (MDN) (MLH) \$	

Table history**SN06 (DMS)**

Removed references to incompatibility between BNN and WUCR, and between CIR and WUCR. (CR Q00761036)

MMP16

Added option IICB to tuples DNH, DLH, SPL, MLH, SIMRING and VIS in table OPTOPT example. Added options DLH, DNH, MLH, SPL, SIMRING and VIS to tuple IICB. The MAP display example of table OPTOPT may be enlarged by adding these tuples.

MMP15

Added option REV to the table OPTOPT example.

Added option CARR to the table OPTOPT example.

NA013

Added the CRT and CRTDENY options to the table OPTOPT example.

Added the PDO option to the table OPTOPT example.

Added the WC option to the table OPTOPT example.

NA012

Added option CNAMD to table OPTOPT example.

Added note to field INCOMPAT that value XXTRG is not a valid option.

OPTOPT (end)

Added option CFIND.

NA011

Added options CWTC, DENYCWTC, NDNAP, and RND. Removed option COD as an incompatibility of option ACD.

Removed MDN, PRL, PRV, MDNNAME and MEMDISP from option ECM for AU3191.

NA010

Added options AMMSG, AMMSGDENY, CMG, COT, NCCW, and SIMRING.

APC009.1

Added option LRS and its incompatibilities.

NA009

Added options CDU, CDE, CFD, CDI, CFF, CFGDA, CFI, CFK, CFU, CFW, DENYSRA, DNH, and SRA.

NA008

Added options ACB, AFC, AR, BLOCKCGN, BNN, CIDSSUP, CIDSDLV, CND, CFXDNCT, CRBL, DBC, and NUMC.

NA007

Added options EWALI and EWAL.

EUR006

Added option AOC.

NA006

Added option FTS.

NA003

Added option SLQ.

DMS-100 Family

North American DMS-100

Customer Data Schema Reference Manual

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Data Schema MTAHORIZ-OPTOPT

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