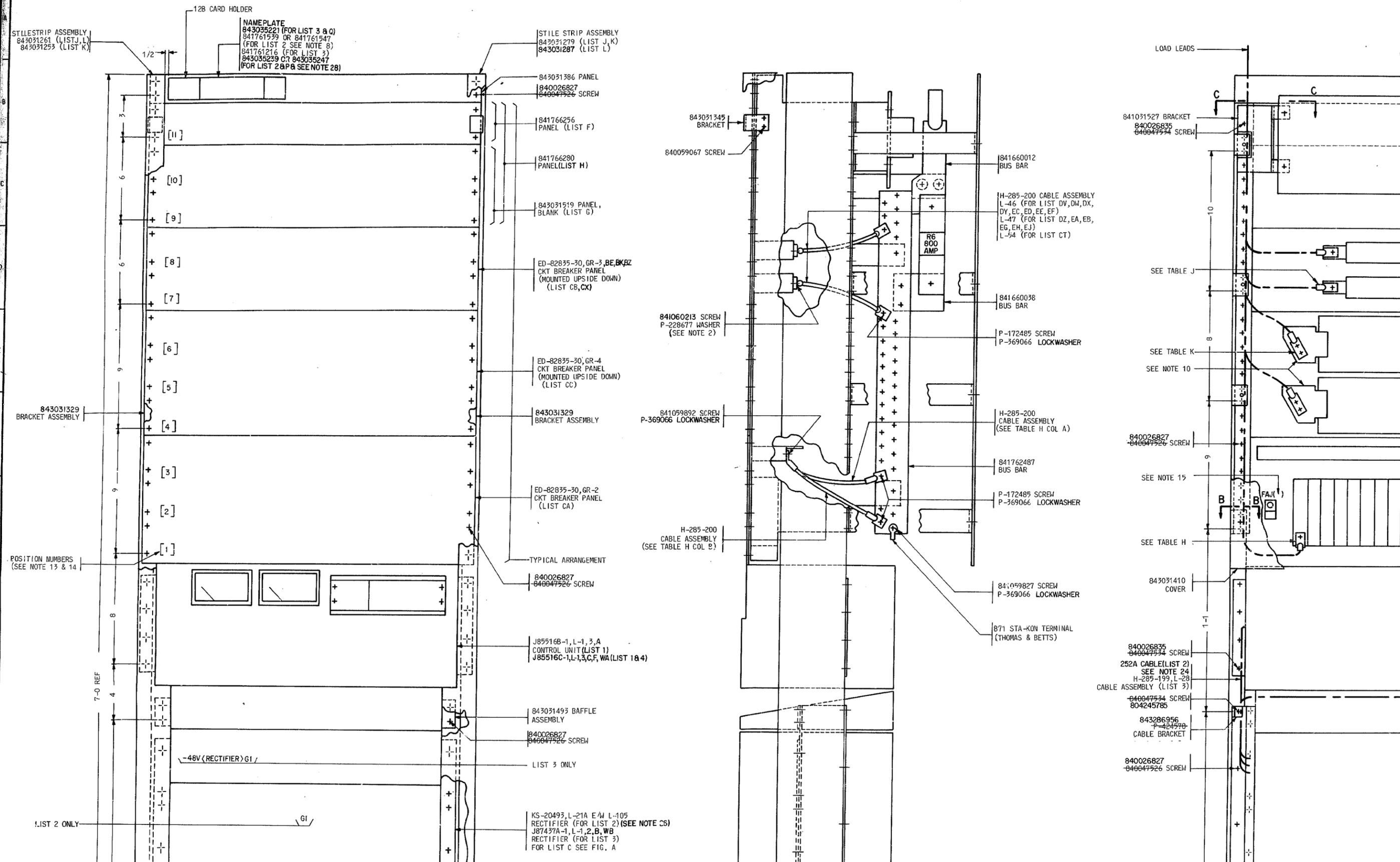


ENGINEERING NOTES

- 51-INFORMATION FURNISHED PER THIS DRAWING IS IN ACCORDANCE WITH B.S.P. 802-679-162.
- 52-THE FOLLOWING IS NOT FURNISHED AND SHALL BE ORDERED AS REQUIRED:
 - A. TERMINALS AND MOUNTING MATERIAL FOR LOAD LEADS.
 - B. WIRING AND OUTSIDE OF BAY MATERIAL FOR APPLIANCE OUTLET. (SEE ED-1A157-73)
- 53-PANEL POSITION NUMBERS SHALL BE SPECIFIED FOR LIST CA, CB AND CC CIRCUIT BREAKER PANELS AND LISTS F, G, & H BLANK PANELS (SEE NOTES 13 AND 14)
- 54-WHEN SUPPLEMENTARY LISTS ARE ADDED TO UNITS IN THE FIELD THE JOB ENGINEER SHALL REFER TO OFFICE RECORDS TO DETERMINE IF WIRING IS ALREADY FURNISHED. IF NOT, WIRING AS REQUIRED SHALL BE ORDERED BY THE JOB ENGINEER.
- 55-THE KS-20493 RECTIFIERS PROVIDED PER LIST 2 ARE MANUFACTURED BY LORAIN OR NORTH ELECTRIC. THE JOB SPECIFICATION SHALL SPECIFY THE VENDOR AND INCLUDE THE ASSOCIATED SD DRAWINGS AND OPTIONS IN THE OFFICE RECORDS. ASSOCIATED SCHEMATIC AND WIRING DIAGRAMS ARE AS FOLLOWS:
 - SD-82401-02 | NORTH ELECTRIC
 - T-82401-91
 - SD-81999-02 | LORAIN
 - T-81999-91
- 56-FRAMEWORK ANCHOR MATERIAL SHALL BE ORDERED IN ACCORDANCE WITH ED-1A210-20 AND H-511-049.
- 57-THE JOB SPECIFICATION SHALL SPECIFY THE BAY AND POWER FRAME NUMBERING

TABLE A									
COL	A	B	C	D	E	F	G	H	
	EQUIPMENT	RAT-ING	LIST	NO.	CIRCUITS AND FIGURES	AND	FIGURES	EQUIPPED	
					CKT	FIG	WRG	APP	
	EQUIPMENT AND WIRING REQUIRED IN ADDITION TO LIST 1 FOR A CIRCUIT BREAKER PANEL 9 INCHES HIGH ARRANGED TO MOUNT 14, KS-22010 CIRCUIT BREAKERS 40 TO 110 AMPERE CAPACITY		CA	1	T-82447-30	8A			
				i	ED-82835-30 GR 2, BJ				
	EQUIPMENT AND WIRING REQUIRED IN ADDITION TO LIST 1 FOR A CIRCUIT BREAKER PANEL 6 INCHES HIGH ARRANGED TO MOUNT 2, KS-22012 CIRCUIT BREAKERS OF 100 TO 225 AMPERE CAPACITY.		CB	1	T-82447-30	9A			
					ED-82835-30 GR-3, BE, BK				
	EQUIPMENT AND WIRING REQUIRED IN ADDITION TO LIST 1 FOR A CIRCUIT BREAKER PANEL 9 INCHES HIGH ARRANGED TO MOUNT 2, KS-21124 CIRCUIT BREAKERS OF 225 TO 400 AMPERE CAPACITY.		CC	1	T-82447-30	9A			
					ED-82835-30 GR-4, BE, BL				
	EQUIPMENT AND WIRING REQUIRED IN ADDITION TO LIST CA FOR	250	CM	1	T-82447-30	(8A)	HB		
		500	CN	1	T-82447-30	(8A)	HB, HC		
		625	CP	1	T-82447-30	(8A)	HD, HE		
	CABLE ASSEMBLIES REQUIRED IN ADDITION TO LIST CA AND LIST	CM		CQ	1	T-82447-30	(8A)	HF OMIT HB	
		CN		CR				HF, HG OMIT HB, HC	
		CP		CS				HH, HU OMIT HD, HE	
	CABLE ASSEMBLY REQ'D IN ADDITION TO EACH LIST DV, DW, DX, DY, EC, ED, EE OR EF WHEN THE CIRCUIT BREAKER PANEL IS PER LIST CB IS MOUNTED IN POS 10			CT	1	T-82447-30	(9B)	HAY OMIT HAX	
	CABLE ASSEMBLY REQ'D IN ADDITION TO EACH LIST DZ, EA, EB, EG, EH OR EJ WHEN THE CIRCUIT BREAKER PANEL PER LIST CC IS MOUNTED IN POS 10.			CU	1	T-82447-30	(9B)	HAY OMIT HAZ	
	CABLE ASSEMBLY REQ'D IN ADDITION TO EACH LIST EK, EL, EM, EN OR EP WHEN CIRCUIT BREAKER PANEL PER LIST CC IS MOUNTED IN POS 9			CV	1	T-82447-30	(9C)	HBA OMIT HAZ	
	CABLE ASSEMBLIES REQUIRED IN ADDITION TO EACH LIST EK, EL, EM, EN OR EP WHEN CIRCUIT BREAKER PANEL PER LIST CC IS MOUNTED IN POS 9			CW	1	T-82447-30	(9C)	HBA OMIT HAZ	
	EQUIPMENT ALWAYS REQUIRED IN ADDITION TO LIST CB TO PROVIDE CIRCUIT BREAKER GUARDS			CX	1	ED-82835-30 GR-BZ			
	EQUIPMENT REQUIRED IN ADDITION TO LIST CA TO PROVIDE ONE KS-22010 CIRCUIT BREAKER AND CHARGE SWITCH WITH	40 45 50 60 70 75 100 110		DB DC DD DE DF DG DH DJ DK	1	U V W X Y Z AA AB AC	8B	HK	HL HM HN HO HP HQ HR HS HT HU
	EQUIPMENT REQUIRED IN ADDITION TO LIST CA TO PROVIDE ONE KS-22010 CIRCUIT BREAKER WITHOUT CHARGE SWITCH AND	40 45 50 60 70 90 100 110		DL DM DN DO DP DR DS DT DU		AD AE AF AG AH AI AJ AK AL AM		HK, HAX	HV HW HX HY HZ HAA HAB HAC HAD HAE HAF HAG HAH HAJ HAK HAL
	EQUIPMENT REQUIRED IN ADDITION TO LIST CB TO PROVIDE ONE KS-22012 CIRCUIT BREAKER WITH CHARGE SWITCH WITH	100 110 125 150 175 200 225		DV DW DX DY DZ EA EB		AN AO AP AQ AR AS AT AV	9B	HAX	HAM HAN HAP HAQ HAR HAS HAT
	EQUIPMENT REQUIRED IN ADDITION TO LIST CB TO PROVIDE ONE KS-22012 CIRCUIT BREAKER WITHOUT CHARGE SWITCH WITH	100 110 125 150 175 200 225		EC ED EE EF EG EH EJ		AW AX AY AZ BA BB BC			
	EQUIPMENT REQUIRED IN ADDITION TO LIST CC TO PROVIDE ONE KS-21124 CIRCUIT BREAKER WITH CHARGE SWITCH AND	225 300 400		MFR DISC EK EL EM	1	ED-82835-30 GR-BL BF G H	9C	HK, HAZ	HK, HAU HK, HAV HK, HAW
	EQUIPMENT REQUIRED IN ADDITION TO LIST CC TO PROVIDE ONE KS-21124 CIRCUIT BREAKER WITH CHARGE SWITCH AND	500 600		EN EP	1	ED-82835-30 GR-BL BG BH	9C	HK, HAZ	HK, HBB HK, HBC
	EQUIPMENT REQUIRED IN ADDITION TO LIST EK, EL, EM, EN OR EP WHEN A CHARGE SWITCH IS NOT REQUIRED			EQ	1	T-82447-30 ED-82835-30 GR-BN	(9C)	OMIT HK	OMIT HK
	EQUIPMENT REQUIRED IN ADDITION TO LIST CA TO PROVIDE A GUARD FOR EACH CIRCUIT BREAKER			ER		ED-82835-30 GR-BM			

TABLE A									
COL	A	B	C	D	E	F	G	H	
	EQUIPMENT	RAT-ING	LIST	NO.					
	FRAMEWORK, ASSEMBLY WIRING AND COMMON EQUIPMENT FOR ONE 151C POWER PLANT, INITIAL BAY.			1	1				J8551
	WIRING AND EQUIPMENT REQUIRED IN ADDITION TO LIST 1 TO PROVIDE ONE 208/240 VOLT SINGLE PHASE RECTIFIER WITH 100 AMPERE CHARGE CAPACITY WITH OUTPUT CIRCUIT BREAKER.			2	1				T-824 (INSTA WIR)
	WIRING AND EQUIPMENT REQUIRED IN ADDITION TO LIST 1 TO PROVIDE ONE 208/240 VOLT THREE PHASE RECTIFIER WITH 100 AMPERE CHARGE CAPACITY WITH OUTPUT CIRCUIT BREAKER.			3	1				J8743
	WIRING AND EQUIPMENT ALWAYS REQUIRED IN ADDITION TO LIST 1 TO PROVIDE A CONNECTORIZED CONTROL UNIT			4	1				J8551
									OMIT 1 J8551 T-824
	EQUIPMENT REQUIRED IN ADDITION TO LIST 3 WHEN RECTIFIER AC SERVICE IS	208 VOLTS 240 VOLTS			A				J8743
	EQUIPMENT REQUIRED IN ADDITION TO LIST 1 TO PROVIDE A BLANK PANEL WHEN A RECTIFIER PER LIST 2 OR 3 IS NOT FURNISHED				C				
	EQUIPMENT REQUIRED IN ADDITION TO LIST 1 FOR BAY FRAMEWORK FRONT BASE COVERS	WITH APPLIANCE OUTLET WITHOUT APPLIANCE OUTLET			D E				
	EQUIPMENT REQUIRED IN ADDITION TO LIST 1 FOR A	THREE INCH SIX INCH NINE INCH			F G H				
	EQUIPMENT REQUIRED IN ADDITION TO LIST 1 FOR STILE STRIPS WHEN USED	WITHOUT SUPPLEMENTARY BAY WITH SUPPLEMENTARY BAY ON LEFT SUPPLEMENTARY BAY ON RIGHT			J K L				
	EQUIPMENT REQUIRED IN ADDITION TO LIST 3 & 4 TO PROVIDE A CABLE ASSEMBLY FOR USE WITH THE J85516C-1 CONTROL UNIT				M	1			T-8244 OMIT 1
	EQUIPMENT REQUIRED IN ADDITION TO LIST 2 & 4 TO PROVIDE A CABLE ASSEMBLY FOR USE WITH THE J85516C-1 CONTROL UNIT				N	1			T-8244 OMIT 1 (INSTA WIRE)
	EQUIPMENT REQUIRED IN ADDITION TO LIST 2 & 4 TO PROVIDE A NAMEPLATE FOR USE WITH THE J85516C-1 CONTROL UNIT				P				NON
	EQUIPMENT REQUIRED IN ADDITION TO LIST 3 & 4 TO PROVIDE A NAMEPLATE FOR USE WITH THE J85516C-1 CONTROL UNIT				Q				NON



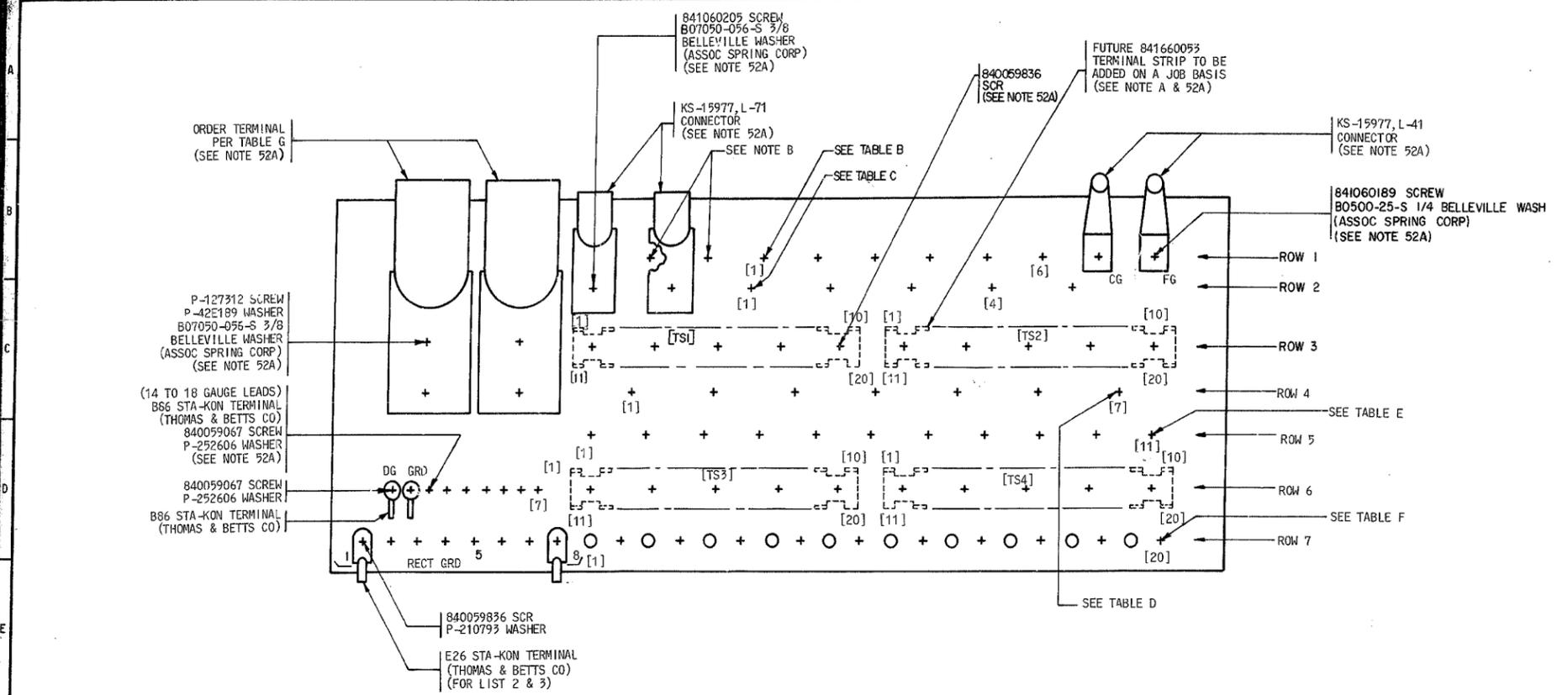
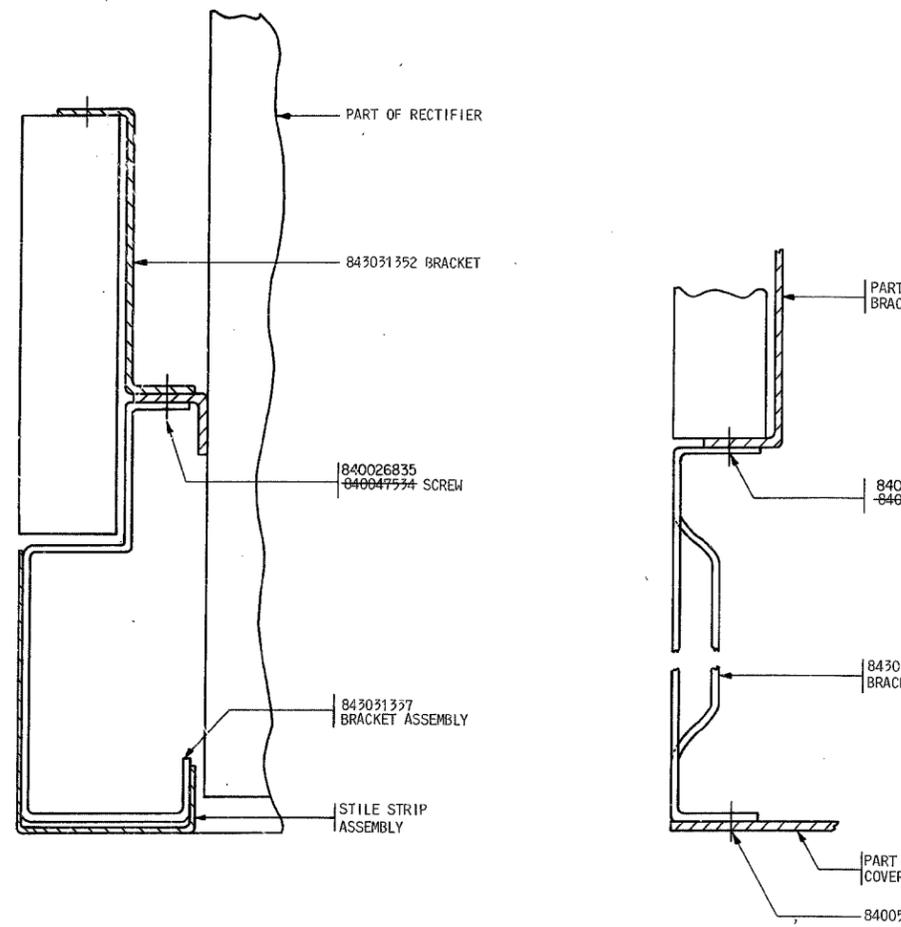


FIG. B
TERMINATIONS ON
GRD BUS BAR
(SEE NOTES A TO K)



NOTES:
 A-THE 841660053 TERMINAL STRIP PROVIDES 20 SOLDER TERMINALS. EACH TERMINAL HAS A MAXIMUM CURRENT CAPACITY OF 10 AMPERES.
 B-CONNECTORS SHALL NOT BE MOUNTED AT THESE LOCATIONS.
 C-CONNECTORS MAY BE MOUNTED IN ROW 1 WHEN PARTS OF ROW 2 ARE NOT USED.
 D-EACH CONNECTOR ALSO REQUIRES A B0500-025-S 1/4 BELLEVILLE WASHER (ASSOC SPRING CORP)
 E-CONNECTORS MAY BE MOUNTED IN ROW 2 WHEN PARTS OF ROWS 1 AND 3 ARE NOT USED.
 F-EACH CONNECTOR ALSO REQUIRES A B07050-056-S 3/8 BELLEVILLE WASHER (ASSOC SPRING CORP)
 G-CONNECTORS MAY BE MOUNTED IN ROW 4 WHEN PARTS OF ROWS 3 AND 5 ARE NOT USED.
 H-CONNECTORS MAY BE MOUNTED IN ROW 5 WHEN PARTS OF ROWS 4 AND 6 ARE NOT USED.
 J-(1) TWENTY KS-15977, L41 CONNECTORS MAY BE MOUNTED ON THE NEAR SIDE OF THE GROUND BUS BAR PLUS TEN KS15977, L316 ON THE FAR SIDE OR THE REVERSE OR
 (2) TEN KS-15977, L333 CONNECTORS NEAR SIDE
 (3) TERMINAL STRIPS MAY NOT BE MOUNTED IN ROW 6 ABOVE EQUIPPED CONNECTOR POSITIONS.
 K-CONNECTOR COMBINATIONS LISTED ARE EXAMPLES ONLY. OTHER COMBINATION MAY BE USED AS DETERMINED BY THE JOB ENGINEER.

TABLE B (GRD BUS BAR-ROW 1) SEE NOTE C

FOR WIRE GA SIZE	USE CONNECTOR KS-15977 LIST	MOUNTING MATERIAL (SEE NOTE D)
10	22	841059843 PHM SCR .250-20 X 1/2
8	161	
6	41	
1/0	333	841059876 PHM SCR .250-20 X 1/2

TABLE K (ED-82835-30, GR-4 CKT BRKR PAN) LIST CC

FOR WIRE GA SIZE	USE CONN KS-15977 LIST	MOUNTING MATERIAL	FURN PARALLEL CONN AS REQUIRED AS FOLLOWS			
			LOAD WIRE GA SIZE	KS-21500 CONN LIST	QTY	COVER REQUIRED
4/0	93	NONE REQUIRED FURNISHED WITH CKT BRKR	500 MCM	5	1	KS-21652, L-1 COVER
			750 MCM	2	2	NO. 104757-31 COVER (KEARNY-NATIONAL CO.)
350MCM	305		500 MCM	4	1	KS-21652, L-1 COVER
			750 MCM	1	2	NO. 104757-31 COVER (KEARNY-NATIONAL CO.)

TABLE C (GRD BUS BAR-ROW 2) SEE NOTE E

FOR WIRE GA. SIZE	USE CONNECTOR KS-15977 LIST	MOUNTING MATERIAL (SEE NOTE F)
1/0	71	841060221 PHM SCR .375-16 X 7/8
2/0	318	
4/0	319	
350MCM	347	841060239 PHM SCR .375-16 X 1

TABLE D (GRD BUS BAR-ROW 4) SEE NOTE G

FOR WIRE GA. SIZE	USE CONNECTOR KS-15977 LIST	MOUNTING MATERIAL (SEE NOTE F)
1/0	71	841060221 PHM SCR .375-16 X 7/8
2/0	318	
4/0	319	
350MCM	347	841060239 PHM SCR .375-16 X 1

TABLE E (GRD BUS BAR-ROW 5) SEE NOTE H

FOR WIRE GA SIZE	USE CONNECTOR KS-15977 LIST	MOUNTING MATERIAL (SEE NOTE D)
10	22	841059843 PHM SCR .250-20 X 1/2
8	161	
6	41	
1/0	333	841059876 PHM SCR

SECT A-A
(TYPICAL)

SECT B-B
(TYPICAL)

