

**SIMPLEX SIGNALING  
EQUIPMENT UNITS  
FOR D-C SUPERVISORY AND DIAL PULSE SIGNALING  
EQUIPMENT DESIGN REQUIREMENTS  
COMMON SYSTEMS**

**1. GENERAL**

**Scope**

**1.01** This specification, together with the supplementary information listed herein, covers the equipment design requirements for the framework, equipment, and circuits to be used in the manufacture and installation of simplex signaling units. Equipment included in this specification may be ordered by specifying the code and list numbers covered in part 4.

**1.02** This specification is reissued to add a two circuit simplex signaling unit J98603D to replace the single circuit arrangements covered by J98603A. This redesign resulted from changes in the circuit required in providing connection to a-c earth potential filter equipment. Two circuits are provided on the unit as this results in a more economical equipment arrangement considering the added apparatus involved in the circuit change.

**Description**

**1.03** The signaling units covered herein provide a means for signaling or dialing over a simplex leg of cable or open wire or a combination of cable and open wire circuit.

**1.04** J98603C covers requirements for a five circuit unit for 2-way signaling and dialing. This circuit is arranged for earth potential compensation and operates with trunks which are arranged for use with type "B" composite signaling circuits. The unit is arranged on a five circuit basis to tie in with the ground potential compensation arrangement which uses one earth potential leg for five circuits. This unit occupies the space of five 1-3/4" x 19" mounting plates. Jacks required for testing and maintenance are located in a jack mounting at the bottom of the unit.

**1.05** J98603D covers requirements for a two circuit unit for 2-way signaling and dialing over circuits not requiring earth potential compensation and which operate with trunks which are arranged for use with type "B" composite signaling circuits. This unit occupies the space of three 1-3/4" x 19" mounting plates. Jacks required for testing and maintenance are located on jack mountings at the right side of the unit. Provision is made for either 500 volt or 1000 volt breakdown condensers.

**Subdivision of Equipment**

J98603C — AT&TCo Std — Five Circuit Simplex Signaling Unit — 2-Way Signaling and Dialing Over Cable Circuits — Arranged for Earth Potential Compensation

J98603D — AT&TCo Std — Two Circuit Simplex Signaling Unit — 2-Way Signaling and Dialing Over Open Wire or Cable Circuits — Not Arranged for Earth Potential Compensation

**2. SUPPLEMENTARY INFORMATION**

800-600-000 — List of General Equipment Requirement Sections

801-000-000 — Equipment Design and General Requirements and Engineering Information — Common Systems

J99220 — Office Grounding Requirements

**3. DRAWINGS**

**Circuits**

SD-95051-01 — Simplex Signaling Circuit — 2-Way Signaling or Dialing Over Open Wire or Cable Simplex Circuits — Not Arranged for Earth Potential Compensation

SD-95053-01 — Simplex Signaling Circuit — 2-Way Signaling and Dialing Over Cable Circuits — Arranged for Earth Potential Compensation

**Equipment**

ED-95051-01 — Simplex Signaling Unit Equipment — For 2-Way Signaling or Dialing Over Cable or Open Wire Circuits

ED-95053-01 — Simplex Signaling Equipment Units — 2-Way Signaling and Dialing — Arranged for Earth Potential Compensation

**Wiring**

ED-90976-01 — Switchboard Cabling Plan

**4. EQUIPMENT**

**J98603C — AT&T Co Std — Five Circuit Simplex Signaling Unit — 2-Way Signaling and Dialing Over Cable Circuits — Arranged for Ground Potential Compensation — Space of 5, 1-3/4" Mtg. Plates**

Equipment — ED-95053-01, Fig. 3

**List 1** — Framework, assembly, wiring, and common equipment for one five circuit simplex signaling unit.

	WIRE	EQUIP	NOTES
Framework ED-90782-01, G5	—	1	
Simplex Sig. Ckt.			
SD-95053-01:			
Fig. 1	1	1	
Fig. 6	5	1	A
Figs. 2, 3, 4, & 5	1	0	

**List 2** — Equipment per SD-95053-01, Figs. 2 and 6, 3 and 6, 4 and 6, or 5 and 6, required in addition to list 1 for circuits 2, 3, 4, or 5, respectively. (See Note A.)

**Note**

A. All optional apparatus shall be furnished on the unit and shall be strapped as required to meet job requirements.

**J98603D — AT&T Co Std — Two Circuit Simplex**

Bell Telephone Laboratories, Inc.

**Signaling Unit — 2-Way Signaling and Dialing over Open Wire or Cable Circuits — Not Arranged for Ground Potential Compensation — Occupies Space of 3, 1-3/4" Mtg. Plates**

Equipment — ED-95053-01, Fig. 5

**List 1** — Framework, assembly, wiring, and common equipment for one two circuit Simplex signaling unit with equipment for one circuit.

	WIRE	EQUIP	NOTES
Framework ED-90782-01, G3	—	1	
Simplex Sig. Ckt.			
SD-95051-01, Fig. 1			
(Less (A) Cond.)	2	1	A

**List 2** — Equipment per SD-95051-01, Fig. 1 (Less (A) Cond.), required in addition to list 1 to equip the second circuit.

**List 3** — Equipment per SD-95051-01, Fig. 1 ((A) Cond. only), required in addition to list 1 or 2 for 500 volt breakdown condensers.

**List 4** — Equipment per SD-95051-01, Fig. 1 ((A) Cond. only), required in addition to list 1 or 2 for 1000 volt breakdown condensers.

**Note**

A. All optional apparatus (except "V" and "X" — Mfr Disc.) shall be furnished on the unit and shall be strapped as required to meet job requirements.

**5. GENERAL NOTES****List of A&M Only and Mfr Disc. Equipment**

EQUIPMENT	RATING	COVERED IN ISSUE	REPLACING EQUIPMENT
J98603A	Mfr Disc.	4	J98603D
J98603B	Mfr Disc.	3	J98603C

**5.01** The above equipment has been replaced as indicated.