

TRIMPHONES ON EXTENSION PLAN ARRANGEMENTS AND ADD-ON UNITS

SECTION 1. GENERAL NOTES

1 GENERAL

Service difficulties were experienced with the tone ringer in early Trimphones. As a result of interim measures taken to reduce these difficulties there are several variants of Trimphone. Severe limitations are placed on the field of application of some variants. The limitations are given in the following notes.

The Telephone 2/722 has a tone ringer designed to overcome all known difficulties.

2 TELEPHONES 722 and 1/722

These telephones should only be used on exclusive service D.E.Ls.

3 TELEPHONES 722 MOD, 1/722 MOD AND 1/722 MARK 2

These telephones have suppressor components and a 22K Resistor fitted to reduce tone ringer sensitivity and special installation instructions, to be used in conjunction with the relevant 700 type plan diagram, are given in Section 2.

4 TELEPHONES 2/722

These telephones can, where Trimphones are permitted, be fitted in accordance with the 700 type plan diagrams.

Where a buzzer is required it must be fitted external to the telephone. This will make the conductor normally needed to connect the buzzer spare and therefore in some installations where a 5 way cord is specified the 4 way cord supplied with the telephone can be used instead. For example, in N4509 the buzzer 32A-1 is connected at the internal extension to the Blue conductor; the Blue can be used as the Orange of the 5 way cord, the other three conductors being connected as shown on the diagram.

To determine the correct connexions for the buzzer and the conductor that is made spare consult the schematic plan diagram.

5 ADD-ON UNITS

The Trimphone equivalents of the Telephone 706 and 710 add-on units are given below

Telephone 706	Telephone 710	Trimphone
SWITCH No. 5A-3	SWITCH No. 5A-4	SWITCH No. 13A-2 (Includes press button)
Part 1/DSP/1233) Part 1/DSP/1252) Part 1/DSP/1256)	Part 1/DSP/1242	SWITCH No. 19A-1
SWITCH No. 5A-3 and locking press button (on/off)	SWITCH No. 5A-4 and locking press button (on/off)	Provided by off position of tone ringer
BUZZER No. 32A-1	BUZZER No. 32A-1	BUZZER No. 20B (Fitted adjacent to the block terminal)

NOTE Some early Switches 19A-1 had the Blue and Brown connexions reversed. If trouble experienced check that the Blue and Slate leads are in electrical contact when the switch itself is unoperated. If leads reversed correct by reversing the connexions at the telephone terminals.

6 RESISTORS CARBON 26KD 22K

22K Resistors that are recovered in accordance with the instructions in Section 2 should be stored by taping or tying to a rear leg of the dial mounting.

SECTION 2

EXCLUSIVE SERVICEPLAN 1 See Dgm N4501

Apparatus required.

Main with one extension only (if Trimphone required)

For Telephone 706, read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Switch 5A-3 and Part 1/DBU/263 read Switch 13A-2.

For Cord Inst 5/37A read Cord Inst 6/52AX

Extension (if Trimphone required)

For Telephone 706 read Telephone 1/722 MOD or 1/722 MK2.

Wire to Dgm N4501 EXCEPT,

Omit strap T16-T17 in Trimphone at MAIN

Connect black conductor of Cord Inst 6/52AX on Trimphone at main to T13 (spare) and insulate in BT.

PLAN 1A See Dgm N4502

Apparatus required.

Main.

For Telephone 706 read Telephone 1/722 MOD or 1/722 MK2 (if required).

Delete Cord Inst 4/83AA.

Add Thermistor 1A-1 if main not a Trimphone.

Extension

For Telephone 706 read Telephone 1/722 MOD or 1/722 MK2 (if required).

For Cord Inst 5/37AA read Cord Inst 6/52AA (intermediate).

Delete Cord Inst 4/83AA (last), Switch 5A-3 and Part 1/DBU264.

Wire to Dgm N4502 EXCEPT,

The OFF position of the Tone Ringer control must be made available at each extension. This facility replaces the Switch 5A-3.

Omit strap T16-T17 in MAIN instrument.

Fit Thermistor 1A-1 between T16-T17 in MAIN if not a Trimphone.

Connect black conductor of Cord Inst 6/52AX on Trimphones at intermediate extensions to T13 (spare) and insulate in BT.

PLAN 4 See Dgm N4506

Apparatus required.

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For plug 420 W/Cord Inst 4/97AD read Plug 420 Grey - 4...

For Part 1/DSP/1252 read Switch No. 19A-1

Add Thermistor 1A-1 for Fig 2 only.

Wire to Dgm N4506 Fig 1 omitting strap T16-T17 or,

Wire to Dgm N4506 Fig 2 EXCEPT,

In Bell Set 26 replace strap B2-B3 with Thermistor 1A-1

PLAN 105 External Extension, see Dgm N4507

Apparatus required.

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Part 1/DSP/1233 read Switch 19A-1

Delete Part 1/DBU/263

Wire to Dgm N4507 panels 9 and 10 EXCEPT

Recover Resistor Carbon 26KD 22K from T5-T15

PLAN 107 Extension see Dgm N4509

Apparatus required

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Switch 5A-3 and Part 1/DBU/263 read Switch 13A-2.

For Buzzer 32A-1 read Buzzer 20B.

For Part 1/DSP/1223 read Switch 19A-1

Delete Cord Inst 5/37AA (internal extension)

Wire to Dgm N4509 EXCEPT

Omit strap T16-T17.

On Panel 4 for Cord Inst 5/37AA substitute Cord Inst 4/108AX (supplied with telephone) and connect RED T8-BT4, GRN T17-BT5, WH T18-BT6, BL T12-BT1

On Panel 4 connect Buzzer 20B between BT3 and BT6.

On External extension recover Resistor Carbon 26KD 22K from T5-T15

PLAN 108 Main see Dgm N4511

Apparatus required

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Switch 5A-3 and Part 3/DBU/263 read Switch 13A-2

For Part 1/DSP/1256 read Switch 19A-1

For Cord Inst 6/44AA read Cord Inst 6/52AX. Add Thermistor 1A-1

Omit Rectifier Element 205.

Wire to Dgm N4511 EXCEPT,

Omit strap T4-T5

Fit Thermistor 1A-1 between T4-T5

Recover Resistor Carbon 26KD 22K from T5-T15

Recover Tone Ringer grey lead from T17 or T13 and insulate.

Recover Thermistor 1A-1 from T16-T17 (if fitted).

PLAN 1 ON EXCHANGE LINE OF PLAN 107 See Dgm N4515.

Apparatus required

For Telephone 706 read Telephone 1/722 MOD or 1/722 MK2.

For Buzzer 32A-1 read Buzzer 20B.

Omit Cord Inst 5/37AA or 6/44AA.

Omit Resistor Carbon 15FD 50 ohms

Omit Rectifier Element 205.

For Part 1/DSP/1252 read Switch 19A-1

Wire to Dgm N4515 EXCEPT,

Connect Buzzer 20B between BT1-BT3

Connect Cord Inst 4/108AX (supplied with telephone) RED T8-BT4, GRN T17-BT5, BLU T15-BT1, WH T18-BT6

Recover Resistor Carbon 26KD 22K from T5-T15

PLAN 1 ON EXTENSION OF PLAN 105, 105A, 107, 107A. Plan 1 extension only. See Dgm N4517

Apparatus required

Internal Extension

Add Telephone 1/722 MOD or 1/722 MK2.

Add Switch 13A-2

For Buzzer 32A-1 read Buzzer 20B

Omit Rectifier Element 205

Telephone 706 and Switch 5A-3 recovered from Extension Plan 107, 107A is not required

External Extension

Add Telephone 1/722 MOD or 1/722 MK2.
Add Switch 19A-1
Add Switch 13A-2
Omit Rectifier Element 205
Omit 1 Cord Inst 5/37AA
Telephone 706 and Switch 5A-3 recovered from
Extension Plan 107, 107A is not required.

Wire to Dgm N4517 EXCEPT,

FIG 1 Connect Cord Inst 4/108AX (supplied with
telephone) RED T8-BT4, GRN T12-BT1 BLU T15-BT5,
WH T18-BT6.

FIG 1 Connect Buzzer 20B between BT3-BT6

FIG 2 Connect Cord Inst 4/108AX (supplied with
trimphone) as Cord Inst 5/37AA, ignoring orange
conductor.

FIG 2 Recover Resistor Carbon 26KD 22K from
T5-T15

PLAN 1A ON EXCHANGE LINE OF PLAN 105, 107 see Dgm
N4516

Apparatus required

For Telephone 706 read Telephone 722 MOD or
1/722 MOD or 1/722 MK2
For Part 1/DSP/1252 read Switch 19A-1
Add Thermistor 1A-1, where required,
Delete Switch 5A-3 and Part 3/DBU/264
Delete Cord Inst 4/83AA.

Wire to Dgm N4516 EXCEPT,

The OFF position of the tone ringer control must
be made available at each Trimphone; this

facility replaces the Switch 5A-3.

Transfer tone ringer GREY lead from T17 to T13.

Recover Thermistor 1A-1 from T16-T17 (where
fitted).

Recover Resistor Carbon 26KD 22K from T5-T15

FIG 1 In last extension fit Thermistor 1A-1 in
place of strap T17-T18.

FIG 2 In last extension fit Termistor 1A-1
between T4-T14.

FIG 2 Connect Green conductor of line cord on
last extension between T14-BT2.

PLAN 1A ON EXTENSION OF PLAN 107, 107A, see Dgm N4518

Limitations. A Trimphone may not be provided as
a Plan 1A extension on an internal extension of a
Plan 107, 107A.

Apparatus Required

For Plan 107, 107A external extension.

For Telephone 706 read Telephone 722 MOD or
1/722 MOD or 1/722 MK2
For Switch 5A-3 read Switch 13A-2
For Part 1/DSP/1233 read Switch 19A-1
For 1 Cord Inst 4/83AA read Cord Inst
4/108AX (Provided with Trimphone)

For Plan 1A extension

For Telephone 710 read Telephone 1/722 MOD
or 1/722 MK2
For 2 Switches 5A-4 read 1 Switch 13A-2
For Part 1/DSP/1242 read Switch 19A-1
Add Thermistor 1A-1, not required if Plan
107, 107A extension is a Trimphone.
Delete Part 4/DBU/260.

Delete Part 3/DBU/262
Delete 1 Cord Inst 4/83AA
Delete Rectifier Element 205

Wire to Dgm N4518 FIG 2 EXCEPT

The OFF position of the Trimphone tone ringer control must be made available on the Plan 1A extension. This facility replaces Switch 5A-4 'D'.

Connect the line cord on the Plan 107, 107A extension RED T9-BT4, GRN T14-BT3, BLU T17-BT2, WH T18-BT6

Fit a Thermistor 1A-1 between T16-T17 in Plan 107, 107A extension if instrument is not a Trimphone.

Connect the Blue lead of Part 1/DSP/1233 to T14.

On Plan 1A extension, if a Trimphone, transfer the tone ringer GREY lead from T17 to T13.

PLAN 4 OFF MAIN OF PLAN 1, see Dgm N4519

Apparatus required

For Telephone 706 read Telephone 1/722 MOD or 1/722 MK2.
For Plug 420 with Cord Inst 4/97AD read Plug 420 Grey-4....
Add Thermistor 1A-1
For Part 1/DSP/1252 read Switch 19A-1 (where required)

Wire to Dgm N4519 EXCEPT

Recover strap T16-T17 in Plan 1 main

Fit Thermistor 1A-1 between T16-T17 in Plan 1 main if not a Trimphone.

FIG 2 Recover Thermistor 1A-1 from T16-T17 in Plan 4 Trimphone (where fitted).

FIG 2 Transfer Trimphone tone ringer Grey lead from T17 to T13 in Plan 4 Trimphones

PLAN 4 OFF MAIN OF PLAN 1A see Dgm N4520

Apparatus required

For Telephone 706 read Telephone 722 MOD, 1/722 MOD or 1/722 MK2
For Part 1/DSP/1252 read Switch 19A-1
For Plug 420 Grey with Cord Inst 4/97AD read Plug 420 Grey-4....
Add Thermistor 1A-1

Wire to Dgm N4520 EXCEPT

Recover strap T16-T17 in Plan 1A main.

Recover Thermistor 1A-1 from T16-T17 in Plan 4 Trimphone (if fitted).

Fit Thermistor 1A-1 between T16-T17 in Plan 1A main if not a Trimphone.

Transfer Trimphone tone ringer Grey leads from T17 to T13 in Plan 4 Trimphones.

2 SHARED SERVICE

PLAN 1 EXTENSIONS ONLY see Dgm N4521

Apparatus required

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Switch 5A-3 and Part 3/DBU/263 read Switch 13A-2.

Wire to Dgm N4521 EXCEPT,

Recover Resistor Carbon 26KD 22K from T5-T15

Connect Blue conductor of Cord Inst 4/108AX between T14-BT2 (spare).

PLAN 1A see Dgm N4522

Apparatus required

Main (if Trimphone required)

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Switch 5A-3 and Part 1/DBU/263 read Switch 13A-2

Delete Cord Inst 4/83AA and Thermistor 1A-1.

Extension (if Trimphone required)

For Telephone 710 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For 2 Switches 5A-4, Parts 2/DBU/260 and 3/DBU/262 read one Switch 13A-2.

For Cord Inst 5/37AA read Cord Inst 6/52AX
Delete Cord Inst 4/83AA.

Wire to Dgm N4522 EXCEPT,

Panel 4 Main, connect Blue conductor of Cord 4/108AX between T17 and BT2 if a Trimphone.

Recover Resistors Carbon 26KD 22K from T5-T15 in extension Trimphones.

Connect Resistor Carbon 26KD 22K between T5 and T15 on main if not a Trimphone.

The OFF position of extension tone ringers must be made available.

This facility replaces Switch 5A-4 'A'

PLAN 4 see Dgm N4526

Apparatus required

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2.

For Switch 5A-3 and Part 1/DBU/263 read Switch 13A-2

One Telephone - For Plug 420 etc read Plug 420 Grey-4.....

Two Telephones - for Plug 505 etc read Plug 505 Grey-1A

One Telephone,

Wire to Dgm N4526 FIG 1,

Two or more Telephones,

Wire to Dgm N4526 FIG 2 EXCEPT,

Recover Resistor Carbon 26KD 22K from T5-T15 in each Trimphone

Re-arrange wiring in Bell Set 26 in accordance with FIG 1 (N820)

Fit Thermistor 1A-1 between B4 and B9

Fit One Resistor Carbon 26KD 22K (recovered from Trimphone) between B4 and B5. Park any others

PLAN 1 ON EXCHANGE LINE OF PLAN 107, see Dgm N4535

Apparatus required

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK3
 For Switch 5A-3 and Part 1/DBU/263 read Switch 13A-2
 For Part 1/DSP/1252 read Switch 19A-1
 For Buzzer 32A-1 read Buzzer 20B
 Delete Resistor Carbon 15 FD 50 ohm, Cord Inst 6/44AA and Rectifier Element 205.

Wire to Dgm N4535 EXCEPT,

Connect Buzzer 20B between terminals BT1 and BT3.

Connect Cord Inst 4/108AX (supplied with Trimphone) RED T8-BT4, GRN T12-BT2, WH T18-BT6 and BLU T16-BT5

PLAN 4 ON PLAN 1 MAIN, see Dgm N4539

Apparatus required

For Telephone 706 read Telephone 722 MOD or 1/722 MOD or 1/722 MK2
 For Switch 5A-3 and Part 1/DBU/263 read Switch 13A-2

One Telephone

For Plug 420 etc read Plug 420 Grey-4

Two or more telephones

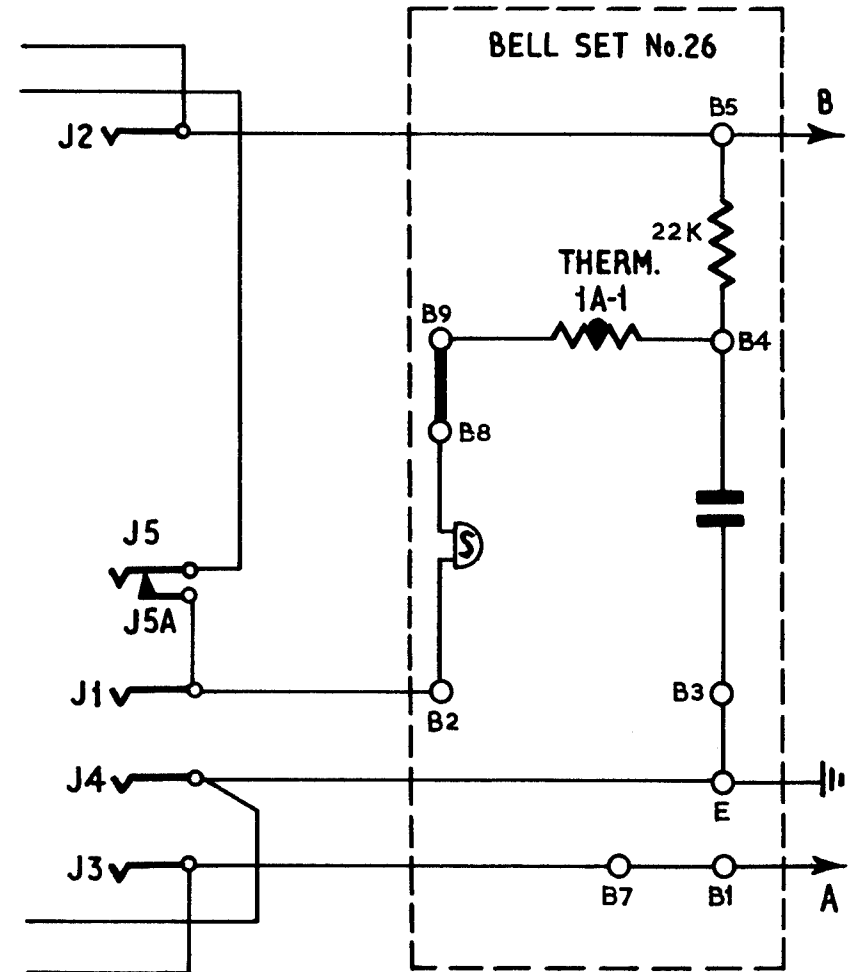
For Plug 505 etc read Plug 505 Grey-1A

Wire to Dgm N4539 EXCEPT,

Recover Resistors Carbon 26KD 22K from between T5-T15 in Trimphones.

Fit Resistor Carbon 26KD 22K between T5-T15 in Plan 1 main. Park any others

FIG.1. PLAN 4 SHARED SERVICE.
(TWO OR MORE TELEPHONES)



NOTE:— REPLACE STRAP B8-B9 BY EXTENSION BELL WHEN REQUIRED.

P.O. TELECOMMS. HQRS.	ISSUE		
		PAPER:—W CIRCLTN:— GENERAL	GB Palmer