Wiring Devices Technical

Telephone, TV/FM and Satellite Socket Outlets

Standards and approvals

Telephone and TV sockets comply with the following:

Telephone sockets K422 and K427

BS 6312: 2.2, BS 5733:2010 (where applicable).

K4817: BS 5733:2010 (where applicable) and FCC68.

TV sockets

BS 3041 Part 2:1977 / IEC 169-2:1977, BS 5733:2010 (where applicable) and IEC65, clauses 10.1, 10.3.

Satellite TV sockets

BS 5733:2010 (where applicable).

TECHNICAL SPECIFICATION

ELECTRICAL

TELEPHONE SOCKETS, CABLE SPECIFICATION CW1311, CW1293, CW1308, CW1316

NO. OF CABLES PER TERMINATION

RE-USABILITY

>9 reterminations (should not be reterminated with smaller diameter wire)

TV SOCKETS

Cable specification: CT100 or equivalent Any standard

LOW-LOSS TV CO-AXIAL CABLE:

Outside 4-8mm diameter, inner conductor 0.5-2mm diameter

INSERTION LOSS

Insertion loss data available on request

'F' TYPE SATELLITE SOCKET (K3525), CABLE SPECIFICATION

 $\label{localization} \mbox{Co-axial cable: inner core diameter} - 0.5 \mbox{-} 1.2 \mbox{mm}$

RJ11 (K4817), CABLE SPECIFICATION

Capable of taking 0.08 to 0.65mm² solid or stranded cable

PHYSICAL

AMBIENT OPERATING TEMPERATURE

--5°C to +40°C

IP RATING

MAX. INSTALLATION ALTITUDE

2000 metres







Description

A part of the very wide range of products to meet the latest technical requirements and the standards applicable to modern technology in the installation of telephone and television equipment. The master and secondary telephone sockets K422 and K427 comply with relevant approvals for direct and indirect connections between a termination point of a public telecommunications system and any piece of approved telecommunications apparatus. For applications requiring twin or dual telephone outlets, refer to the Modular Data section, pages 46-48.

Telephone and TV sockets fit into plaster depth boxes (except for RJ11).

The F-type Satellite Socket may be used for connection of CATV, MATV and satellite TV installations.

FEATURES

- Single screw termination on TV outlets
- Protected, fully enclosed PCBs
- Meet all relevant BS requirements
- Quick, simple and reliable terminal connection
- IDC connectors on telephone outlets
- Part of a complete range of products for telephone, television and data processing requirements
- Angled connector on TV outlets
- Sockets fit in plaster depth boxes (except K4817)

Wiring Devices Technical





Telephone, TV/FM and Satellite Socket Outlets

Installation (Telephone sockets)

Product performance, systems compatibility

Master Sockets: for use as the first socket outlet on a direct exchange or PABX line. They contain surge protector (for line protection against electrical surges) and ringing capacitor.

Secondary Sockets

For use as extension sockets when connected on the same line as a Master Socket.

Installation tools required

MK IDC insertion tool List No. 400NAT (not supplied with product).

Wiring regulation restrictions

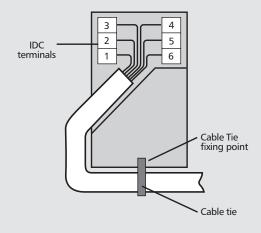
Domestic installations

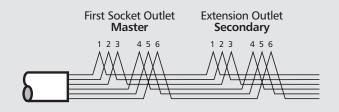
Any number of MK sockets may be installed thereafter, with a total REN (Ring Equivalent Number) value of all telephone equipment connected on a line not exceeding 4.

Telephone Wiring Scheme

- 1 GREEN / white
- 2 BLUE / white
- 3 ORANGE / white
- 4 WHITE / orange
- 5 WHITE / blue
- 6 WHITE / green

Note: Main wire colour is shown in capitals





Wiring Devices Technical

Digital TV and Telephone Outlets (Logic Plus and Modular Datacoms)

Installation (TV sockets)

Product performance, systems compatibility

Isolated Outlets are intended for use where safety isolation (rated at 2000V ac) is required to provide protection against faults occurring within any mains powered product used on different parts of the distribution system. They are not suitable for use in systems where DC signals are passed through the socket, (e.g. where masthead/headend equipment is controlled by receiver/decoder equipment).

Diplexer Outlets are used in distribution systems where both TV and FM band signals are combined on a single aerial downlead. The filtering in the diplexer separates the appropriate signals and feeds them through to the relevant output connection port.

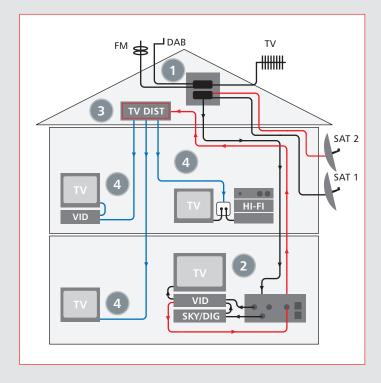
Cable Routing and Use of Cable Clamp

Sharp bends in the cable must be avoided during installation. The single TV/FM socket is fitted with a cable clamp that can be fixed on either side of the termination position to facilitate this

When tightening the screening braid clamps ensure that the cable is firmly gripped and that the inner insulation is not squashed flat beyond a slight oval shape.

Safety Information

TV outlets or modules must not be installed in the same enclosure as equipment rated in excess of 50V, (e.g. mains rated 13A sockets or switches).



Method of installation of TV and FM aerial connection by using MK coaxial socket outlet and only one downlead.

Conventional distribution system for TV and FM signals using a single aerial downlead.

The signals from the TV and FM aerials and the satellite dish are combined together using two products. The first combines the TV and FM signals and the second adds the Sky signal to the TV/FM signal and provides a DC control path to power the LNB unit on the satellite dish. (These products are not supplied by MK).

The single aerial down lead feeds into the triplexer (black lines in wiring diagram).

- The separated satellite signal is then fed to the decoder. The decoded satellite signal is then fed into the VCR along with the TV signal from the Triplexer. The output signal from the VCR then feeds into the TV and also back to the single outlet and onto the distribution amplifier (black lines in wiring diagram).
- The single cable back-feed then feeds back to the input of a multi way distribution amplifier, (typically located in the loft or garage) (red lines in wiring diagram).
- Each individual output from the distribution amplifier is then fed to the individual rooms in the house to a standard TV (single or diplexer) outlet to which the TV/VCR and/or Hi-Fi can be connected (blue lines in wiring diagram).