



## TECHNICAL SUPPORT DATA

### Specification for the installation of network data cabling



The following document is a summary of the Electrical Installation Standards section of the JTL Electrical Specification - Document 02447, Issue 2, July 1998.

#### CABLE SPECIFICATION

##### From the JTL Network Controller to JTL Controllers

Suitable junction boxes are available which connect CAT5 cables to the network controller and legacy cabling systems. Premade cables are available for connection between these junction boxes and the controller systems CAB60 and CAB01 for legacy connections. Category 5 Unscreened Twisted Pair (CAT5 UTP) Solid Conductor

If screened CAT5 cable (STP) is used to give mechanical strength the screen must not be connected to earth.

##### From the JTL Network Controller types CUX-M, NC300 and NC600 to the staff terminal

The cables required for this purpose are 2 off Category 5 Unscreened Twisted Pair (CAT5 UTP) Solid Conductor. These cables to be installed along with a patch box located adjacent to the staff terminal PC.

##### Example CAT5 UTP solid core are:

Brand Rex 305 m (Farnell part no 158-173)  
Alcatel 305 m (Farnell part no 268-793)

Telephone cable and other low voltage insulated cables must not be used.

##### From the JTL Network Controller to security dialout unit

A 2 core stranded security cable is required between the network controller and the security dialout unit. JTL provide a junction box at the network controller to terminate this cable.

#### CABLE SEGREGATION

Where communications cables run in parallel with power cables, there must be a minimum segregation of 350 mm.

Signal cables should not be installed in metal or plastic trunking with power cables.

Within enclosures twin compartment trunking is acceptable.

The communications cables must NOT under any circumstances be strapped to Steel Wired Armoured Cables, or Pipes.

#### CABLE TERMINATION

All flexible cables connected to JTL screw connectors should be bootlace ferruled.

All signal cables should be identified at each termination. These IDs should be transferred to the relevant cable drawings, a set of which to be forwarded to JTL.

If joints become a necessity, then a suitable junction box should be used.

Connector block or insulating tape joints must not be used.