

The preference within Thames Water is for cable ducts and openings into buildings to be sealed using a proprietary duct or cable transit sealing system which ensures a Lloyds certified minimum 1 bar gastight and 2.5 bar watertight seal and age tested for 50 years.

In addition to the WIMES methods for sealing cable ducts and openings in buildings Thames Water also accepts the following system:

The system should consist of water resistant insert sleeves and a silicone based fire rated, water and gastight sealant. The insert sleeves should be used to ensure cable separation and to pack any free space in the penetration allowing for the easy addition / removal of future cables. Sealant to be applied to the face of the penetration ensuring a pressure tight seal is maintained, sealant to be applied to a minimum depth of 20mm. The system to be fully installed in accordance with the manufacturers installation instructions.

Where a certified Fire rating is required a fully fire rated version of this system should be used incorporating expanding rubber insert sleeves.

4.2 Detailed Design

Notwithstanding the dimensions given within the Particular Specification the Contractor shall confirm by measurement on site the requirements for all cabling and plant provided within the Contract. Cabling and plant shall be provided compatible with site measurements.

The detailed design shall include, but not be limited to:

- Cable sizing calculations to ensure correct sizing, type, length and method of installation in the light of the plant and installation provided.
- Finalising all cable routes including sizing of cable containment (ducts, tray, trunking, conduits, etc) including mounting arrangements.
- All cable sizing calculations and test sheets shall be produced using the Amtech Pro Design software. Final test results shall be recorded on the Fast Test Plus format. Electronic copies of the design and test results shall be handed over to the Project Manager on completion.
- The Contractor shall submit calculations to the Project Manager showing that the installation complies with the IEE wiring regulations. On completion of the installation the Contractor shall provide Completion and Inspection Certificates in the form prescribed in the IEE Wiring Regulations
- The Contractor shall submit Loop diagrams to the Project Manager detailing all terminations and interconnecting cables.
- Circuit design information detailed in the cable sizing calculations shall include all of the optional information as detailed in WIMES 3.02, Clause 4.2.3.