

Joint statement from BESA and TICA:

Pre-insulated pipework for underground and buried applications (eg. primary heating networks) has a proven history of performance and a suite of related British Standards to reinforce good practice.

However, there appears to be a growth market for pre-insulated pipework installations inside of buildings also. This is a fundamental change in product application that would take pre-insulated pipework outside of the scope of the standards pertaining to buried pipework.

Building services pipe insulation specifications typically reflect the requirements of BS 5422 and help to ensure full compliance with building regulations. Pre-insulated pipework systems typically utilise either PUR or PE insulants - products which do not meet the fire performance criteria typically specified in building services applications.

In addition, the “one-size-fits-all” approach to insulation thickness typically undertaken by manufacturers of pre-insulated pipework simply does not allow for the required flexibility to meet individual specification requirements.

Of particular concern are coiled flexible polyethylene insulated piping systems. We have increasing evidence that these systems are being installed in high risk buildings, such as large multi-residential buildings.

Both BESA and TICA stand firm in our commitment to building safety and we assert that the burden of proof sits with manufacturers, distributors and installers of pre-insulated polyethylene pipework systems to clearly evidence the suitability of these products for application.

**Questions to ask include:**

- What is the thermal performance of your polyethylene system and how do you meet the W/m heat loss/heat gain requirements of BS 5422 and Approved Document L at the available manufactured thicknesses?
- What is the Euroclass fire rating of the polyethylene system at the required thickness to meet the necessary heat loss/heat gain requirements?
- Details of how Euroclass fire rating of the PUR/PE system was achieved and the arrangement of the insulants in the test to determine their exposure to heat and flame. Capped ends or uncapped and what pipework material was used. i.e. what was done to gain the classification?

We would expect all responsible companies in the supply chain to be able to evidence compliance with BS 5422 heat loss/heat gain tables clearly. We would also expect all responsible companies in the supply chain to be able to provide current Euroclass fire test certification for the complete range of polyethylene pre-insulated pipework products.

Looking ahead, we seek to challenge the wider industry to ensure that all pre-insulated systems meet the required standards. This should not stop at pre-insulated pipework products but should also include pre-insulated ductwork products.