# PROTECTA® FR PIPE WRAP

# TECHNICAL DATA SHEET

## General Product Description

Protecta® FR Pipe Wrap is designed to maintain the fire resistance of fire separating walls and floors when these are breached by plastic pipes, conduits or metal pipes with continuous combustible insulation, and may be used in drywalls, masonry or concrete walls and concrete floors.

Each pipe wrap consists of a graphite based reactive intumescent strip, which reacts to heat and closes the opening left by the softening plastic pipe or pipe insulation in a fire. The pipe wrap is installed completely around the pipes or insulation and secured with the self-adhesive tab. The annular space around the pipe wrap is sealed with Protecta® EX Mortar or Protecta® FR Board.

## Properties

- For plastic pipe sizes from smallest pipes available to Ø400 mm with a wide range of pipe wall thicknesses
- For metal pipes with continuous combustible pipe insulation
- For plastic pipes with cables (conduits)
- Pipe wraps comes in two different types; ready made for most common diameters and in 25 metre rolls for all diameters
- Fire classifications up to 240 minutes for both integrity and insulation
- Certified for PVC-U, PVC-C, PE, LDPE, MDPE, HDPE, ABS, SAN+PVC and PP pipes
- Tested and certified for U/U pipe end applications
- Classified for fire sealing in all types of constructions
- Excellent sound insulation
- No emissions - environmentally and user friendly
- Simple to install in both Protecta® FR Board and EX Mortar
- Unlimited storage time (under correct conditions)
- 30 years working life guarantee

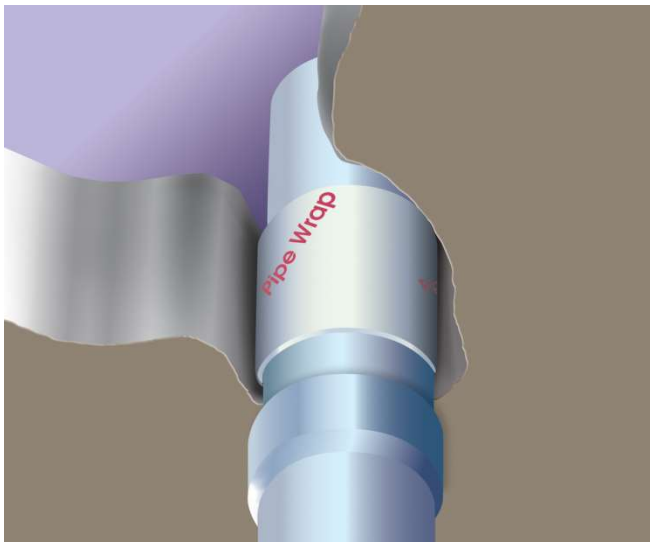
## Sound Insulation

| Description | Sound reduction |
|---|---|
| Pipe Wraps installed in FR Board | 55 dB RW |
| Pipe Wraps installed in EX Mortar | 64 dB RW |

The sound insulation value is only valid for the fire seal and not for other elements in the building construction. The sound insulation has been tested by the accredited laboratory Exova BM Trada in Great Britain according to EN ISO 10140-2. Test report is available upon request.

## Sizes and Intended Use

| Pno. | Size | Qty/ Bag | Intended Use |
|---|---|---|---|
| P068 | FR Pipe Wrap 55mm | 25 | Plastic pipes & conduits ≤ Ø55mm |
| P076 | FR Pipe Wrap 82mm | 25 | Plastic pipes & conduits ≤ Ø82mm |
| P069 | FR Pipe Wrap 110mm | 25 | Plastic pipes & conduits ≤ Ø110mm |
| P074 | FR Pipe Wrap 125mm | 20 | Plastic pipes ≤ Ø125mm |
| P075 | FR Pipe Wrap 160mm | 12 | Plastic pipes ≤ Ø160mm |
| P077 | FR Pipe Wrap 200mm | 1 | Plastic pipes ≤ Ø200mm |
| P083 | FR Pipe Wrap 250mm | 1 | Plastic pipes ≤ Ø250mm |
| P141 | FR Pipe Wrap 315mm | 1 | Plastic pipes ≤ Ø315mm |
| P099 | FR Pipe Wrap 50mmx25m | 1 | Metal pipes with combustible pipe insulation, plastic pipes & conduits |
| P106 | FR Pipe Wrap 75mmx25m | 1 | |




## Pipe end configurations

When testing pipes, one can choose not to cap (or close) the pipe, or cap the pipe inside the furnace, or outside the furnace, or on both sides. The configuration chosen depends on the intended application of the pipe and/or the installation environment. The code defining if a pipe is capped is stated after the fire classification. For instance EI 60 C/U which means the pipe was capped inside the furnace, and uncapped outside the furnace. The test configuration defines the approvals possible.

Our suggestions for engineering judgments are:

| Intended use of pipe | | Pipe end condition |
|---|---|---|
| Rainwater pipe | At roof | C/U [1] |
| | Further below | C/C [2] |
| Drainage or sewage pipe | At drainage | C/U [1] |
| | Further below | C/C [2] |
| Pipes in closed circuits (water, gas, vacuum systems, el. etc.) | | C/C [2] |
| Pipes with open ends and at least 50cm pipe on both sides | | U/U |

[1] U/U condition can also be used

[2] U/C, C/U and U/U conditions can also be used

## Technical Data

| | |
|---|---|
| **Technical Approval** | ETAG 026-2 |
| **Durability according to ETAG 026-2** | $Z_2$ intended for use in internal conditions with humidity classes other than $Z_1$, excluding temperatures below 0 °C. |
| **Conditioning procedure** | EN 13238:2010 |
| **Expansion ratio** | 28:1 |
| **Expansion pressure** | 55 N |
| **Colour** | Anthracite |
| **Graphite weight** | 1.3 kg/m² per mm thickness |
| **Graphite density** | 1300 kg/m³ |
| **Normal expansion time** | Less than 10 minutes |
| **Minimum expansion temperature** | 150 °C |
| **Storage** | Store in temperatures between 5˚C and 30˚C |
| **Life** | Under normal conditions; 30 years + |



Technical Data Sheet to ETA 14/0247