

Technical Data

FIRE SEALANT 400

Fire and Acoustic Rated Low Modulus Sealant



Description

FIRE SEALANT 400 is a neutral cure, elastic silicone sealant which has a fire rating of up to 4 hours in certain joint configurations (when tested to BS EN 1366-4 2006).

Benefits

- Fire rated to BS EN 1366-4 2006
- Neutral cure – adheres to most building surfaces, porous and non porous
- Permanently flexible (25% movement accommodation)
- Excellent weathering characteristics – suitable for internal and external use.
- Can be used in joints up to 50mm wide.
- No priming required for most construction substrates
- Non slump - easy to apply and tool off
- Forms an acoustic seal

Recommended For

All building joints which require a fire rating.

Sealing joints, voids and irregular holes in fire walls, partitions and other structures; also for maintaining the integrity of pipes and cables that penetrate them. Ideal for use for fire rated expansion joints.

Specification Compliances

- Fire rated BS EN 1366-4 2006 (report no. 181970 (May 2009) DIN 4102 -B1 and EN1366 Part 4.
- Acoustic tested to BS EN ISO 140-3:1995.
- Tested for air permeability to EN 13141-1 Ventilation for buildings. Performance testing of components/products for residential ventilation.
- CE Marked under ETAG 026 Part 3-ETA 13/1059 and EN15651-1: 2012 Type F EXT-INT-CC Class 25LM.



Available in

380ml Cartridges in the following colours:

- White
- Grey
- Black

Storage

Store in cool dry conditions between + 5°C and 25°C.

Shelf Life

Use within 12 months.

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Health & Safety

Consult MSDS for full list of hazards.

Specific Data

| | |
|----------------------|---|
| Slump | Nil in joints up to 50mm |
| Max Joint Width | 50mm * |
| Hardness | Shore A: 35 - 40 |
| SG | Approx. 1.3g/cm ³ |
| Tack Free Time | 20-30 Minutes |
| Joint Movement | + / - 25% of Original Size |
| Cure Rate | 1mm / 24hrs at 50% Relative Humidity 23°C |
| Service Temperatures | -40 - +140°C |
| Cleaning | Uncured: white spirits; cured sealant: SILICONE EATER |
| Life Expectancy | 25 Years + |

* For larger joint configuration please consult our technical services

Joint Dimensions

For maximum movement accommodation, it is recommended that:

1. The sealant joint depth should be no less than 5mm
2. Joint depth should be 5mm for joints up to 10mm wide
3. Joints above 10mm in width should be half the width in depth up to 20mm and minimum 10mm for wider joints

Joint depth may be adjusted to the correct size using EVERBUILD JOINT BACKER ROD or BOND BREAKING TAPE in cases where there is not sufficient depth to use Backer Rod.

Movement Factors

Butt joints: 50% (not to exceed +/- 25% in any one direction)

Lap joints: 100% (not to exceed +/- 50% in any one direction)

Specific Resistances

Mild acids / alkali's at room temperature < 10% concentration.

Joint Width Calculation

Joint widths are calculated as in BS6213:

$$\text{Width} = \frac{M \times 100}{F} + M$$

Where M = movement and F = movement accommodation Factor

Surface Preparation

All surfaces must be clean, dry and dust free. All loose or flaking surface coatings, and old sealant and mastic joints, should be removed before application.

Primer

Mortar: Use Primer P1.

Improve adhesion on non-porous surfaces by using Primer NP2.

Limitations

- Do not use on surfaces that bleed oils or plasticisers or in contact with bitumen or asphalt.
- Do not attempt to sand down. Finish smooth as per directions.
- Not overpaintable.
- Can yellow whilst curing if exposed to brick acid or bleach.

Fire Rating Table (BS476) Part 20 1987

| WALL DEPTH (MM) | SEALANT | GAP WIDTH (MM) | SEALANT DEPTH (MM) | BACKING ROD | INTEGRITY (MINS) | INSULATION (MINS) |
|-----------------|------------------|----------------|--------------------|----------------------------|------------------|-------------------|
| 200 | Fire Sealant 400 | 11 | 10 | 15mm diameter polyethylene | 240 | 240 |
| 200 | Fire Sealant 400 | 31 | 20 | 40mm diameter polyethylene | 225 | 240 |
| 100 | Fire Sealant 400 | 33 | 20 | 40mm diameter polyethylene | 116 | 187 |
| 100 | Fire Sealant 400 | 11 | 10 | 15mm diameter polyethylene | 146 | 202 |

NOTE: FIRE SEALANT 400 seals applied flush with BOTH faces of wall using two separate backing blocks.

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