

## PRODUCT DATA

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# BOSTIK BOND-FLEX 100 HMA SILICONE SEALANT

Bostik Bond-Flex 100 HMA Silicone Sealant is a single part, acetoxy type silicone rubber sealant. It cures on exposure to atmospheric moisture to form a resilient highly elastic seal which maintains flexibility over a wide range of temperatures. The sealant is extremely resistant to weathering, ageing and water. It is supplied in a range of colours in ready to use cartridges suitable for application by means of a skeleton gun. Bostik Bond-Flex 100 HMA Silicone Sealant is suitable for general purpose applications in glazing and where adhesion to non-porous surfaces is required, including top sealing in glazing, sealing metal cladding and curtain walling. Bostik Bond-Flex 100 HMA conforms to ISO 11600 F&G 20 LM. Bostik Bond-Flex 100 HMA contains fungicide.

### Features

- Conforms to ISO 11600 F&G 20 LM
- High level of extensibility – over 600%
- Durable waterproof seal
- Flexible at low (-50°C) and high temperatures (+180°C)
- Low shrinkage

### Product Characteristics

Colour	White, clear & black
Form	Non-slump paste
Specific gravity (density)	1.035 g/cm <sup>3</sup>
Composition	Silicone rubber
Packaging	Cartons of 25 x C20 plastic cartridges
Shelf life/storage	At least 24 months from date of manufacture when stored unopened in a cool, dry place within the temperature range +5°C to +25°C and out of direct sunlight. PROTECT FROM FROST

### Typical Performance Data (approx.)

Drying time	<i>Touch:</i> 10 – 20 minutes <i>Through:</i> 24 hours (dependent on bead size and humidity – rate of cure is approx 2mm a day at 23°C/55% RH)
Service temperature	-50°C to +180°C
Application temperature	+5°C to +40°C
Coverage	10 linear metres of 6mm diameter bead per cartridge
Joint movement accommodation	±25%

Flow	< 2mm
Tensile strength	1.8 MPa (N/mm <sup>2</sup> ) (DIN 53504) for a 2mm film
Elongation at break	650% (DIN 53504)
Modulus 100% elongation	0.3 MPa (N/mm <sup>2</sup> ) (DIN 53504) for a 2mm film
Shore A hardness	18 (DIN 53505) for a 2mm film
Solvent for cleaning up	White spirit

### Directions for use

#### IMPORTANT

Before embarking on any work involving Bostik Bond-Flex 100 HMA Silicone Sealant, the separate Safety Data Sheet should be carefully studied by those carrying out the work.

1. Surfaces should be clean, dry, firm and free from dust, oil, grease and any loose materials.  
  
Loose and flaking paint should be thoroughly removed before sealing. As paint surfaces vary considerably, it is recommended that a preliminary adhesion test should be carried out before application. When using in remedial applications remove all old silicone first.
2. If required place masking tape along joint edges and remove within 5 minutes of applying the sealant.
3. Cut off the dome at the top of the cartridge, cut the nozzle to the required diameter and then screw it onto the cartridge.
4. Insert the cartridge into a skeleton gun and squeeze the trigger until the sealant appears.
5. Apply ensuring no air is trapped behind the sealant.

NOTE: For conventional construction joints subject to movement, it is important that the dimensional proportions of the joint are correct. For Bostik Bond-Flex 100 HMA:

Width: *Minimum* 4mm  
*Maximum* 25mm

See final page for disclaimer.

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Depth: *Minimum* 5mm  
*Maximum* 10mm

Ideally the width of the joint should be twice the depth of the joint.

When using Bostik Bond-Flex 100 HMA for sealing typical connection joints a suitable inert filling material such as closed cell polythene foam should be used to prevent sealant adhesion to the bottom of the joint, thus avoiding excess tension of the sealant.

This sealant emits small quantities of acetic acid during curing. It must therefore only be applied in well ventilated conditions.

6. The sealant surface can be tooled immediately to a smooth finish using a tooling stick or trowel dipped in diluted detergent. Do not use a wetted finger.
7. Clean application equipment and remove excess uncured sealant with white spirit and cured sealant by abrasion.

#### Restrictions on Use

Bostik Bond-Flex 100 HMA should not be used on substrates such as concrete, marble or similar materials e.g. granite as the product releases acetic acid during curing and may cause staining. It also is not suitable for use on polyethylene, polypropylene, Teflon and bituminous surfaces.

Bostik Bond-Flex 100 HMA should not be used in contact with metals such as lead, copper, galvanised steel, brass or zinc.

Bostik Bond-Flex 100 HMA may be discoloured in contact with organic elastomers such as EPDM and neoprene.

Bostik Bond-Flex 100 HMA is not recommended for sealing of aquaria or for continuous water immersion, or for structural glazing.

#### Precautions in Use

For health and safety instruction, first aid measures and spillage and disposal instructions, see separate health and safety data sheet for Bostik Bond-Flex 100 HMA Silicone Sealant.

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