

# Tradesmans Choice

# MS602

## JOIN N FLEX

### Polyurethane HYBRID



## Technical Data Sheet

### DESCRIPTION

Join n Flex is a low modulus, Hybrid Polyurethane, flexible joint sealant and adhesive that is free of Isocyanate and other hazardous raw materials and omits low odour. Join n Flex has been formulated to offer outstanding adhesion to most common building and automotive materials; such as Aluminium, timber, concrete, fibreglass and can be used in most sealing and joint filling applications.

Join n Flex displays high joint movement capability with no sagging or slump characteristics to provide a high quality & efficient joint finish.

### APPLICATIONS

Join n Flex is suitable for:

- Construction Joint Sealant applications
- Perimeter seals around doors, windows and facades
- General purpose interior joint sealant applications
- Sealing and bonding metal roofing systems
- Automotive and marine applications requiring a flexible adhesion profile between substrates
- Sound dampening measures: Suitable for the interface of anti-corrosion seals in areas of rivets, bolts & hinges.

### Substrates:

- Precast concrete panels
- Fibre Cement Sheet
- Block work & Bricks
- Aluminium profiles
- Sandstone & Granite
- Fiberglass
- Plasterboard & Blue Board

### ADVANTAGES

- Solvent & Isocyanate Free
- Low VOC
- Low odour
- Non corrosive
- Joint movement total 50%
- Non slump
- Paintable

### PRODUCT CHARACTERISTICS

<b>Colour</b>	Black / Grey
<b>Appearance</b>	Thixotropic, non sag paste
<b>Composition</b>	Polyurethane HYBRID
<b>Curing Method</b>	Moisture curing
<b>Service Temperature</b>	-40°C to +90°C
<b>Product Codes</b> 600ml Sausage	Grey: 53HJNFSG Black : 53HJNFBS

### TYPICAL PROPERTIES

<b>Movement Capability</b>	Total 50%
<b>Elongation @ Break</b>	Approx. >450%
<b>Skinning Time</b>	Approx. 35 mins @ 25°C, 50% Relative Humidity
<b>Tack Free Time</b>	60 minutes
<b>Rate of Cure</b>	2.5mm per 24 hours
<b>Shore A. Hardness</b>	45 ± 5
<b>Specific Gravity</b>	1.6g/mL (DIN 52451-A)
<b>Tensile Strength</b>	0.7N/mm <sup>2</sup>
<b>Application Temperature</b>	+5°C to +45°C
<b>VOC Rating</b>	34g/mL (3.4%)

**NOTE:** All data provided is based on 25°C and 50% Humidity Conditions & fully cured after 21 days.

## INSTRUCTIONS FOR USE

Read and understand the Safety Data Sheet before using this product. SDS can be acquired by visiting [www.macsim.com.au](http://www.macsim.com.au)

### Surface Preparation

Surfaces to be bonded must be clean and dry, as well as free of wax, grease, dust and any other foreign materials so that the adhesive bond is not compromised.

### Priming

It is advisable to conduct preliminary adhesion tests on substrates where the application is critical or if the adhesion performance is unknown.

### Applications Instructions

Cut nozzle at a sharp angle slightly wider than the desired Bead or joint width. If being installed as a joint sealant, always use a suitable backing rod to ensure the correct depth is achieved. The joint depth should be half of the joint width. Extrude sealant with a gun and tool with a round spatula within 10 minutes to spread the sealant against joint surfaces.

### Joint Design

- Join n Flex has a high body designed not to slump in joints up to 40mm in width.
- To allow the sealant to move effectively, the correct joint design requires that the sealant depth must be half of the width of the joint.
- A suitable closed cell must be used to ensure that the correct joint depth is achieved.

### Limitations

- Join n Flex will bond to most common construction substrates, however an adhesion test on sample substrates should be conducted to ensure adequate adhesion in the finished application.
- In waterproofing applications, Join n Flex should be left to cure a minimum of 8 hours prior to being covered by any membrane/ sealer system.
- Tests should be conducted to ensure that there are no adverse reactions between Join n Flex and a membrane coating system.
- Will not adhere to some plastics, polyethylene, polypropylene & Teflon.

### Curing

Cure speed is dependent upon the temperature, humidity, depth of sealant and substrate. Typically, a joint will form a firm skin in one hour and takes up to seven days to fully cure. In cold or very humid climates, the cure time may extend beyond seven days.

### Shelf Life

18 months shelf life when stored in a dry environment and between +5°C and +25°C.

### Cleaning

Cured material removed by mechanical means only.

### Disposal

Dispose of small quantities and empty containers by wrapping with paper and putting in garbage. For larger quantities, if recycling or reclaiming is not possible, use a commercial waste disposal service.

## HEALTH & SAFETY

### Safety

If poisoning occurs, contact Poisons Information Centre: Australia: 13 11 26; New Zealand: 0800 764 766.

**KEEP OUT OF REACH OF CHILDREN** Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Handle under inert gas. Protect from moisture. Do not breathe dust/fume/gas/mist/vapours/spray. Do not eat, drink or smoke when using this product. Avoid release to the environment. Wear protective gloves/protective clothing/eye protection/face protection. Keep away from any possible contact with water, because of violent reaction and possible flash fire.

### First Aid

IF exposed or if you feel unwell: Call a POISON CENTER or doctor/physician. Brush off loose particles from skin. Immerse in cool water/wrap in wet bandages. Take off contaminated clothing and wash before reuse. In case of fire: Use alcohol resistant foam or normal protein foam for extinction. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention. IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention.

### DISCLAIMER

The information in this Technical Data Sheet (TDS) is based on our present knowledge to the date of the publication. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship. It is only a guide for safe handling, use, storage, transporting and disposal of the product.