Technical Datasheet

Prime Flex 900 XLV

Water-Activated Polyurethane Injection Resin

Description

A single-component, hydrophilic and ow viscosity liquid resin designed to react with water and expand, forming a closed cell, watertight foam. 900 XLV is used to seal actively leaking joints and cracks in concrete structures, particularly tight or hairline cracks. Material is typically injected under pressure through injection ports.

Advantages

- Single-component; no catalyst or accelerators needed
- Pump material directly from container drums
- Extremely tough & flexible. Expands & contracts parallel to the crack in varying temperatures
- Up to 600% expansion (unconfined)
- Low viscosity; will penetrate tight / hairline cracks

Applications

- Structures subject to movement or vibration
- Soil binding for slough control & sidewall support
- Curtain grouting manholes to seal cracks & penetrations
- Water treatment tanks & waste water pipes
- Dams
- Tunnels
- Lift service pits, utility vaults
- Underground concrete walls (foundations, car parks)

Technical information

Typical Properties @ 23°C; Liquid	Results	Test Method
Viscosity	250-350 centipoise	ASTM D 1638
Solids content	88%	

Note: Properties will vary depending upon site conditions, application method, mixing method and equipment, material temperature, and curing conditions.

Typical Properties - Cured	Results	Test Method
Tensile strength	3.10 MPa	ASTM D3574
Tensile elongation	350 %	ASTM D3574
Tear resistance	0.00237 kN-m	ASTM D3574
Shrinkage	Less than 2%	ASTM D1042/ D756
Reaction Times @ 23°C based on 2:1 ratio of resin to water		
Initial reaction	30 seconds	
Full rise	1 minute, 50 seconds	

Material Temperature Conditioning

Prior to site use, resin drums must be stored overnight at 21-27°C to precondition.

Mixing Ratio

It is not necessary to pre-stir Prime 900 XLV prior to use.

Uses available clean water to initiate reaction. Inject as a single component or twin stream 2 parts resin to 1 or 2 parts water.

Cleaning

Flush injection equipment immediately with Prime Flex Eco Flush.

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Packaging

Prime Flex 900 XLV is available in 18.9L drums.

Prime Flex Eco Flush is available in 20 litre drums.

Storage

Shelf Life of Prime Flex is 18 months from date of manufacture when stored correctly in unopened containers

Store in dry environment between 5-27˚C. Do not allow product to freeze. Protect from moisture.

Health & Safety

Product Safety Data Sheets (SDS) are available from Nufins. SDS sheets are provided to help customers satisfy their safe handling, use and disposal needs as well as assist with any conformance requirements made locally by health and safety regulations.

SDS are continually updated to provide the latest information to our customers. We therefore recommend contacting our head office to obtain the most recent and accurate SDS before handling and using any product.

Limitations

Low temperatures will slow down reaction times and increase resin viscosity.

Do not apply below 5˚C as the material will not cure below this temperature.

pH below 3 or above 10 may adversely affect foam properties.

Disclaimer

The information contained herein is to the best of our knowledge true and accurate and is given in good faith but without warranty. The user will be deemed to have satisfied themselves independently as to the suitability of our products for their own particular purpose. In no event shall Nufins be liable for consequential or incidental damages.

Users must always refer to the most recent issue of the Technical Datasheets, copies of which will be supplied on request.

Technical Support

Through our technical department and laboratories we can offer a comprehensive service to specifiers and contractors. Technical contacts are available to provide further information and arrange demonstrations.

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