

MASTER CHEMICALS TECHNOLOGY

MC-Poly Seal 2

High elastic two component Polysulphide sealant

Description:

MC- Poly Seal 2 is a tow component high performance joint sealant based on Polysulphide, it is available in non sag grade (N.S) and pouring grade (P).

Uses:

MC- Poly Seal 2 is used for sealing of construction and expansion joints in most structures *such as* :

Sewage plants, reservoirs, swimming pools, bridge decks and any expansion joints subject to large movement and vibration.

MC- Poly Seal 2 is also used for installation of glazed units, curtain walling systems and similar structures where thermal movement can be high and large variations in wind pressure are possible.

Advantages:

MC-Poly Seal 2 :-

- Can be applied to vertical, over head or horizontal planes
- ♦ Is non biodegradable ideal for use in sewage plants , exposed atmospheric conditions .
- Has excellent chemical, oils and petroleum products resistant, safe to use in environmentally sensitive conditions.
- Meets the following specification : DIN 18540, BS 4254, ASTM C- 1193 , C-920, type M use T Grade P or N S , class 50 , US. Fed TT- S-227E

Technical Data:

Specific gravity	: 1.6 <u>+</u> 0.05 kg/ L
Movement Accommodation factor	: <u>+</u> 50 %
Application Temp.	: 4 °C to 60 ° C
Service Temp.	:- 40 °C to 80° C
Plastic deformation (BS 4254)	:<25 %
Shrinkage	: Nil
Vertical creep	: Nil
Pot life @ 25 °C	: Non sag 4 hours, Pouring 2 hours
Initial Set @ 25 °C	: 24 hours
Full Cure	: 7 days
Hardness shore A	: 25-50
Packaging	: 4 Liters (in 2 components)

Quantity requirement:

M C - Poly Seal 2 is required for 1 m length joint as shown in the table (in c.c) :-

Width	Depth	Quantity
8mm	8mm	64c.c
12.7mm	12.7mm	162c.c
25mm	12.5mm	313c.c
30mm	12.7mm	381c.c
50mm	12.7mm	635c.c

Chemical Resistance:

	24 Hours	48 Hours	7 Days
Hydrochloric Acid 10 %	U	U	U
Nitric Acid 10 %	U	А	А
Sulphuric Acid 10 %	U	U	U
Acetic Acid 5 %	U	U	U
Citric Acid 5 %	U	U	U
Lactic Acid 5 %	U	U	U
Ammonium Hydroxide 5 %	U	U	U
Sodium hydroxide 30 %	U	U	U
Bleach 5 %	U	U	U
Brine	U	U	U
Sugar Solution	U	U	U
Detergents	U	U	U
Hydraulic Fluids	U	U	U
Isopropyl alcohol	U	U	U
Linseed oil	U	U	U
Lemonade Concentrate	U	U	U
Water	U	U	U
Petrol and jet Fuels	U	U	U
Chlorinated Solvents	U	LA	А
Aromatic Solvents	U	LA	Α
Key U: Unaffected	A: Attacked		L: Slightly

Dimensioning of joints:

- The joint width must be at least 4 times larger than foreseen movement .
- The joint depth must be : equal to the width in joints up 12.7 mm

one – half the width in joints from 12.7 mm to 25 mm

not grater than 12.7 mm in joints from 25 mm to 50 mm

Application:

- Joint preparation: the surfaces of the joint to be sealed must be clean and dry using compressed air is preferable.
- Priming : the porous materials like concrete, is primed with *M C Poly Seal primer* (see its technical data)
- Packing filler : It is recommendable to use closed cell polyethylene foam
 M C Master Back as a backing rod filler to control the joint depth (see its technical data)
- Mixing: Mix the two component well using mechanical mixer with 400-500 rpm .
- Procedure: after the surface dry of the primer and instillation of backing filler gun grade is applied with gun or spatula; for a better finish the sealant may be smoothed with spatula.

Cleaning:

For cleaning tools and equipments use a suitable thinner.

Safety precautions:

The following notes should be considered when using MC- Poly Seal 2:

- 1- Take precautions to prevent material entering the eyes.
- 2- Take precautions to avoid skin contact.
- 3- Provide adequate ventilation.

For more details contact Master Chemicals Technology technical department

Or visit our website <u>www.mc.com.eg</u>