



MC-Plan 120 IN

Non-Reinforced PVC Membrane for Waterproofing

Product Properties

- Flexible membrane made of with Polyvinyl Chloride having thickness of 2mm
- Good Mechanical Properties as per EN 13491
- Available with twin colors with top/bottom signal layer
- Good resistance to swelling and ageing
- Good Root resistance properties as per EN 14416
- Good water resistance with properly welded joints
- Loosely laid to cover all types of surface undulations and construction joints.

Areas of Application

- Waterproofing of sub structure construction
- Waterproofing of Water retaining structures, like Water Reservoirs, canal etc
- Waterproofing lining for Cut and Cover Tunnel system
- High end waterproofing for Roofs, Terrace Garden etc with suitable protective layer.

Application Notes

General

MC-Plan 120 IN is non-reinforced, Opaque, flexible membrane made of with Polyvinyl Chloride (PVC) with dual tone with indicative top facing signal color. This Product should not be recommended for waterproofing areas subjected to long UV exposure.

The quality of the welding depends on the temperature used for the welding machine and suitable welding technique. Suitable welding can be tested manually for proper water tightness. In case of double welding joints, Applicator should ensure its weldability for better air/water tightness.

Advantages

MC-Plan 120 IN is available in 2mm thickness, having good water resistance properties for underground structure. This membrane can provide a continuous, seam less waterproofing layer when all the joints of the membrane welded with suitable hot air welding machine. **MC-Plan 120 IN** has good root resistance properties so it is very suitable for waterproofing of terrace garden or roof top waterproofing with suitable protective layer.

Though these membranes are not good at long term UV resistances, hence proper protective layer should be provided over the membrane when it is applied in exposed areas.

For different application condition, Suitable application system can be recommended by MC Bauchemie recommended applicators. For Further Technical assistance please contact MC Bauchemie India Technical Team.

Instruction for use

Safety & Precaution

Surface Preparation

All the applied surface should be free from any unsound materials and should be free from any pointed edge. The surface should be free from any standing water or flowing water. The surface should be free from any chemical contamination or any acidic substances.

Suitable precaution should be taken during application of PVC membrane. Special care should be taken during handling of Welding machine. For any medical emergency seek immediate medical help.

Application

During application of **MC-Plan 120 IN** care should be taken that the application area should be free from any sharp edges or lots of protrusions. if this kind of surface is unavoidable then before application of **MC-Plan 120 IN** a 200/300 GSM geotextile mat can be applied to protect the membrane from all these sharp edge objects.

During application of the membrane minimum overlapping width should be maintained throughout the joint uniformly. All the overlapping joints should be welded by using hot air or hot wedge welding machines.

**Technical Data For MC-PLAN 120 IN**

Characteristic	Unit	Value	Comments
Thickness	mm	2	±10% as per EN 1849 - 2
Specific weight	Kg/m ²	2,6	±5% as per EN 1849 - 2
Tensile Strength	N/mm ²	L ≥ 17 T ≥ 17	As per EN 12311-1
Elongation at Failure	%	L ≥ 300 T ≥ 300	As per EN 12311-1
Tear Strength	N	≥ 100	As per EN 12310-2
Impact Resistance	KN	≥ 2.5	No penetration at 1100mm height of fall when it is tested as per EN 12236 and DIN 16726
Water Pressure resistance	bar	5	Waterproof at 5bar for 24 hrs
Root resistance		No penetration	Tested as per DIN 4062 and EN 14416
Shear Strength of Welded Seam	N/mm ²	≥ 13,5	Tested as per EN 12317-2 (break out of the Joint)
Static Puncture Resistance	kg	≥ 20	20kg for 24h as per EN 12730 – B
Fire Resistance		Class E	As per EN 13501

Product Characteristics for MC-PLAN 120 IN

Type	Flexible PVC membrane
Delivery	2m X 20m Roll
Storage	Can be stored in original sealed packages in dry and cool conditions. The same requirements are valid for Transport

Safety Advice

Please Take notice of the safety information and advice given on the packaging labels, safety information sheets and General Application Advice.

Note: - The information on this Data Sheet is based on our experiences and correct to the best of our knowledge. It is However, not binding. It has to be adjusted to the individual structure, application purpose and especially to local conditions. Our Data refers to the accepted engineering rules, which have to be observed during application. This provided we are liable for the correctness of this data within the scope of our terms and conditions of sale-delivery-and-service. Recommendations of our employees which differ from the data contained in our information sheets are binding if given in written form. The accepted engineering rules must be observed at all times.

Edition: - MC/IND/R0/SEP2020, Some Technical Changes have been made to this print medium. Older editions are invalid and may not be used anymore. If a technically revised new edition is issued, this edition becomes invalid.