REVÊTEMENTS MPC COATINGS

TECHNICAL DATA SHEET

MPC-MEM 100

EPOXY-URETHANE HYBRID MEMBRANE COATING, 125% ELONGATION

PRODUCT DESCRIPTION

MPC-MEM 100 is a 2-component, 100% solids, self-leveling and high-build flexible epoxy urethane membrane coating. It is designed to be used as a seamless flexible floor coating to protect substrates against water infiltration. MPC-MEM 100 is specifically formulated to provide high elongation, excellent adhesion, abrasion, impact, and chemical resistance.

AREAS OF APPLICATION

Residential Use – Balcony terraces; outdoors spaces and pool outlines.

Commercial Use - Parking decks; foot bridges and walkways

Industrial Use - Parking decks; Warehouses; Airports and hangars; Processing and manufacturing plants

ENVIRONMENTAL APPROVALS/ CERTFICATES

- Meets CFIA and USDA requirements for indirect food contact / use in food plants.
- Conforms with LEEDv4 EQ credit: Low emitting materials SCAQMD Method 304-91 for architectural coatings.
- VOC content <100 g/L

PACKAGING AND RECOMMENDED THICKNESS

MPC- MEM 100 is offered in the following kit sizes:
3-gallon kit 7.56L resin (A) and 3.78L hardener (B)
Bulk packaging also available upon request

Available in pretint grey.

Recommended Film Thickness / Coverage
20-25 mils / 190-240 sq. ft. / per 3-gallon kit
*Parking membrane system (please refer to systems data sheet)
~15-30 mils / 160-320 sq. ft. / per 3-gallon kit with full sand broadcast

PRODUCT PROPERTIES

Mix Ratio:	2 parts resin A / 1 part hardener B by vol.		
Viscosity: **ASTM D445-06**	Resin 2500 -3000 cps. Hardener 1000 -1200 cps.		
Solids by wt.:	100%		
Shelf Life:	1 year when stored in original, unopened packaging. Store dry at temperatures between 15°C to 30°C (59 °F to 86 °F). **Two-part epoxies may exhibit non-permanent, reversible crystallization when exposed to cold temperatures or temperature cycling during transit and storage.**		
Working time on substrate:	30-35 minutes 21°C / 70°F @50% relative humidity		
Curing Schedule	10°C (50°F)	20°C (68°F)	30°C (86°F)
Recoat (max. 48 hrs)	24-48 hrs.	18-24 hrs.	16-18 hrs.
Foot traffic	~2 days	~1 days	~18 hrs.
Vehicular traffic	~4 days	~2 days	~2 days
Full Chemical Cure	~10 days	~7 days	~5 days
Product Application:	Apply using a rubber squeegee and back roll using a fine quality 10mm roller to obtain a uniform coating. Clean equipment with appropriate solvent. Once the product has hardened, it may only be removed mechanically.		

Curing times are subject to variations determined by the ambient conditions, including air and substrate temperature, as well as relative humidity. It is imperative to shield the coating from moisture, condensation, and direct water exposure during the initial 24-hour curing period. If the recommended recoating time has exceeded 48 hours, it becomes necessary to sand the prior coat using a screed mesh to eliminate any glossy finish. Moreover, thorough cleaning by vacuuming is essential to eradicate any dust particles. The surface should exhibit a consistent matte appearance, entirely devoid of any gloss, following the cleanup process, before proceeding to apply the next coat.

MASTER PROTECTIVE COATINGS INC.
785 RUE SALABERRY
LAVAL, QUEBEC H7S 1H5

E-MAIL: INFO@MPCOATINGS.CA
WEBSITE: MPCOATINGS.CA
INSTAGRAM: @MPC.COATINGS

REVÊTEMENTS MPC COATINGS

TECHNICAL DATA SHEET

MPC-MEM 100

EPOXY-URETHANE HYBRID MEMBRANE COATING, 125% ELONGATION

SURFACE PREPARATION

Remove dust, dirt, grease, oil, and all other contaminants with proper cleaner/degreaser. Prepare the surface mechanically as per ICRI-CSP2 profile by diamond grinding to ensure removal of laitance, curing agents and sealers. The compressive strength of a newly poured concrete substrate must be at least 25 MPA (3635 psi) after 28 days of cure and at least 1.5 MPA (218 psi) tensile strength. **Be careful with condensation (at least 3 degrees of the dew point).** All cracks, holes and irregularities must be repaired with a crack filler prior to applying the coating.

MIXING INSTRUCTIONS

Empty container B (hardener) into container A (resin). Mechanically mix the combined product for a maximum of 1 minute using a low-speed drill (300-450rpm) to reduce air entrapment and to obtain a homogeneous mixture. Once the product is mixed proceed to application instructions. **Do not let the product sit in container as it will rapidly start to react and cure.**

MIX A&B

LOW SPEED
1MIN MAX

TECHNICAL PROPERTIES

Abrasion Resistance, ASTM D4060	**Taber abraser CS-17 calibrase wheel 1000 cycles/1000 g = 0.05-gram loss**
Elongation @ Break, ASTM D638	**125% at break**
Peel Strength, ASTM D638	**3,340 psi**
Tensile strength, ASTM D638	**1,500 psi**
Hardness, Shore D ASTM D2240	**40-45**
VOC, ASTM D2369	**< 50 g/L**

PRODUCT RESTRICTIONS

- Not recommended for application at temperatures below 10°C / 50°F or above 30°C / 86°F. An application below/above these temperatures will result in decreased product workability and cure times.
- Ambient humidity of the surroundings should not exceed 85% during application and during curing process.
- The substrate temperature must be at least 3°C (5.5°F) above measured dew point.
- Humidity content of substrate must be < 4% at time of application.
- Do not apply on porous surfaces where a transfer of humidity may occur during the application.
- Applying this product on a substrate without a moisture barrier may risk delamination due to hydrostatic pressure.
- Freshly applied product must be protected against moisture, condensation, and water for at least 48 hours.
- Surface discoloration of product will occur upon prolonged exposure to UV rays.
- Exposure during the curing stage of the coating to the by-products of propane combustion may cause discoloration (amine blushing).

DISCLAIMER AND WARRANTY

MPC warrants that our products are free from manufacture defects in accordance with our quality control procedures. Any products proven defective are limited to the replacement of defective products or refund of the purchase price as determined by MPC. Please contact your local MPC sales representative for more information and warranty requirements.

The information and recommendations contained in this technical data sheet are based on reliable test results according to MPC. The data mentioned are specific to the material indicated. If used in combination with other materials, the results may be different. It is the responsibility of the user to validate the information therein and to test the product before using it. MPC assumes no legal responsibility for the results obtained in such cases. MPC assumes no legal responsibility for any direct, indirect, consequential, economic or any other damages except to replace the product or to reimbursement the purchase price, as set out in the purchase contract.

MASTER PROTECTIVE COATINGS INC.
785 RUE SALABERRY
LAVAL, QUEBEC H7S 1H5

E-MAIL: INFO@MPCOATINGS.CA
WEBSITE: MPCOATINGS.CA
INSTAGRAM: @MPC.COATINGS