

# Mer-Thane 300R Topcoat

## Aliphatic Urethane Topcoat

# Product Data Sheet

### PRODUCT DESCRIPTION

Mer-Thane 300R Topcoat is an economical, single-component, moisture-cured, liquid-applied, aliphatic urethane topcoat designed for use with waterproofing membrane systems. This product meets the most stringent air quality standards in jurisdictions such as Southern California and the New England states.

Common application areas include:

- Pedestrian traffic surfaces
- Re-sealing existing urethane surfaces (e.g., Sports decks, sun decks, balconies over occupied space)
- Most metal, rubber, wood & masonry surfaces

### CHARACTERISTICS

- Excellent weatherability
- Seamless
- Easy-to-use
- UV resistant with good color retention
- Durable, pedestrian traffic coating
- For use in SCAQMD regions

### CAUTIONS & LIMITATIONS

- The substrate surface must be structurally sound, clean, dry and free of dirt, dust, oil, grease, paint or other contaminants at the time of material application.
- Do not install during inclement weather, when precipitation is occurring or expected within 24 hours.
- Application in direct sunlight during high temperatures may adversely affect aesthetics.
- Not designed for vehicular or heavy steel wheeled traffic.
- Not suitable for below-grade, split slab, or slab-on-grade without on-grade vapor barrier.
- Not for use on sandwich slabs without a vapor barrier or with insulation, slabs over unvented metal pans, suspended pool decks, swimming pools, magnesite, lightweight concrete, asphalt surfaces or asphalt overlays.
- Containers that have been opened should be used within 48 hours. The product is moisture-reactive and will gel or set up when exposed to moisture in the atmosphere. A polyethylene sheet must be used as a protective blanketing prior to re-sealing the lid on a partially used container. Keep the lid tightly sealed when the material is not in use.
- Before using Mer-Thane products, read all container labels, MSDS, application instructions and storage and handling information carefully. Applicators should wear an approved respirator, protective glasses, clothing and gloves. Contains isocyanates, avoid contact of material with skin or eyes and avoid breathing vapors. Mix and apply materials in well ventilated areas and observe normal safety precautions. Mer-Thane materials are classified as corrosive material and can cause irritation in prolonged exposure. Wash skin thoroughly with soap and water if product(s) contact skin. Consult the Material Safety Data Sheet for additional information and precautions.
- Protect all finished surfaces that are not intended to receive the deck coating system materials.

### TECHNICAL DATA

<b>Coverage Rate</b> .....	5 gallons/500 ft <sup>2</sup> Yield 12 mils
<b>DFT per Coat, excluding aggregate</b> ..... (ASTM C109)	12 mils
<b>Hardness</b> ..... (ASTM D2240, Shore A)	85-95
<b>Tear Resistance</b> ..... (ASTM D624, Die C)	350-450 pli
<b>Tensile Strength</b> ..... (ASTM D412)	3,700-4,300 psi
<b>Elongation</b> .....	200-300%
<b>Specific Gravity</b> .....	1.20
<b>Total Solids by Weight</b> ..... (ASTM D2369)	83-87%
<b>Total Solids by Volume</b> ..... (ASTM D2697)	81-85%
<b>Viscosity</b> .....	2,800-4,200 cps at 75°F (24°C)
<b>VOC</b> ..... (ASTM D2369-81)	0.825 lbs/gallon (99 g/L)

- Use extra caution in protecting surfaces not to be coated when using spray application methods. Windy conditions or overspray can damage surrounding surfaces.
- 300R Topcoat is considered dangerous goods. DOT regulations classify it as paint, Class 3, UN1263, PG III, flammable liquid.
- Surface may be slippery when wet. Broadcast aggregate is recommended to enhance skid resistance.
- Over time, topcoat may dull and become more susceptible to staining.
- Limited chemical resistance.

### PACKAGING

5 gallon (18.9 liter) pail.

### COLOR

Mer-Thane 300R Topcoat is available in 7 standard colors, Dusk Grey, Sidewalk Grey, Rocky Grey, Monterey Sand, Desert Tan, Suede and White. Consult the Color Selection Guide for additional details.

### INSTALLATION CONDITIONS

The Mer-Thane 300R Topcoat should be installed when the surface and ambient temperatures are above 50°F (10°C) and below 100°F (37.8°C). Temperature should be at least 5°F above the dewpoint. Do not install during inclement weather, when precipitation is occurring or expected within 24 hours. Mer-Thane 300R Topcoat material is very sensitive to heat and moisture. Higher temperatures and/or high humidity will significantly accelerate the cure time. Use caution in thickness of application. Low temperature and/or low humidity will extend the cure time.

### SUBSTRATE PREPARATION

The substrate surface must be clean, dry and free of dust and any other contaminants at the time of material application. A minimum finished deck slope of 2% (1/4 unit vertical in 12 units horizontal) is required for proper drainage. Surface imperfections, if left untreated, will be noticeable in the finished application.

### Primer - Horizontal Surface

When necessary apply Mer-Thane 300SC or 300 Primer to the properly prepared surface using a brush or or phenolic resin core roller at 1 gallon/300 ft<sup>2</sup> (3.8 L/27.9 m<sup>2</sup>). Primer must dry tack free before applying the 300R Topcoat.

**MIXING**

Mer-Thane 300R Topcoat and Mer-Thane Pigment Paste should be thoroughly mixed individually prior to combining to ensure homogeneous material and color. While mechanically mixing the topcoat using a mechanical mixer at slow speed, add 1 quart of Mer-Thane Pigment Paste and thoroughly blend the components until a uniform color is obtained. Then, pour a small amount of the topcoat into the Mer-Thane Pigment Paste container and scrape the sides thoroughly. Pour back into the topcoat material and again thoroughly blend the combined components, until a uniform color is obtained. Use care when mixing to avoid air bubbles.

**APPLICATION**

Apply Mer-Thane 300R Topcoat to the properly prepared perimeter flashing and horizontal deck areas using a squeegee and/or a solvent resistant, phenolic core roller. Apply evenly over the entire deck surface at a rate of 1 gallon per 100 ft<sup>2</sup> (3.8 L per 9.3 m<sup>2</sup>) (12 mils DFT). Apply with continuous coverage to minimize lines and/or streaking, use extra care not to entrain air into the material. Allow Mer-Thane 300R Topcoat to cure a minimum of 16 hours and a maximum of 48 hours at 70°F (21°C) RH 50% before proceeding with any additional coats to ensure proper adhesion. If more than 48 hours elapses between coats, the surface must be primed.

Sloped or pitched surfaces may require additional applications to achieve the desired thickness. When using a notched squeegee, back rolling may be required to achieve the desired finish.

Accelerator T can be added to 300G Topcoat for a shortened cure time for rehabilitation or repair projects. Refer to the Accelerator T use Instructions also provided in the Mer-Thane 500 system Technical Application Guide.

Mer-Thane 300R Topcoat will be tack free and dry to touch within 16 hours at 70°F (21°C) RH 50%. Light traffic service can be introduced 24 hours (minimum) after application. Return to full service after 72 hours.

**FIRST AID**

**EYE CONTACT:** Flush eye with water for at least 15 minutes. Get medical attention promptly.

**INHALATION:** Take person to fresh air. If breathing is difficult, administer oxygen. Get medical attention immediately.

**SKIN CONTACT:** Wipe off contacted area and wash thoroughly with soap and water. If redness, itching, or a burning sensation develops, seek medical attention immediately.

**INGESTION:** Do not induce vomiting. Consult physician immediately.

**FIRE**

Wear self-contained breathing apparatus with full face piece and protective clothing. Use foam, carbon dioxide, dry chemical, and/or halogenated agents.

**SPILL OR LEAK**

Wear skin, eye, and respiratory protection during cleanup. Soak up material with absorbent and shovel into a chemical waste container. Cover container, and remove from work area.

**STORAGE & HANDLING**

Store all Mer-Thane materials in a dry environment at temperatures between 65 to 70°F (18 to 21°C). All materials should be stored in compliance with local fire and safety requirements. Do not store at high temperatures or in direct sunlight. Do not allow uncured materials to freeze. Store materials in tightly closed original containers, off the ground, on plywood or non-asphaltic insulation board. Avoid moisture contamination. Always wear proper safety equipment, including an approved respirator, eye protection and gloves when mixing and/or applying these products. Do not breathe vapors. Do not keep opened containers in confined spaces.

The material is combustible; the combustion products may be hazardous. Do not expose this material to open flames, sparks, or other sources of ignition. Use proper grounding and bonding procedures during liquid transfer as described in National Fire Protection Association document NFPA77. Consult published OSHA (Occupational Safety and Health Administration) regulations for additional information and compliance information.

**SHELF LIFE**

The shelf life is one (1) year from the date of manufacture in the original, unopened container when the material is properly stored.

**WARRANTY**

Limited manufacturer's defect warranty. Contact Mer-Ko Technical Service Department for specific warranty information or [www.parexmer-ko.com](http://www.parexmer-ko.com)

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