PolySpec THIOKOL

TECHNICAL DATA SHEET – POLYSPEC® FLEX FR BASE COAT

Revised: 4/2019

DESCRIPTION

PolySpec® FLEX FR flexible epoxy basecoat, PolySpec® FLEX FR is on the Federal Government's Qualified Products List for interior decks on ships under MIL-D-24613, Type I, Class 2 and Type II, Class 2.

TYPICAL APPLICATION

BASE COAT	Flex FR @ 1/8" thickness

PERFORMANCE DATA

TENSILE STRENGTH (ASTM D-638)	1,500 psi
TENSILE ELONGATION (ASTM-D-638)	90%
FIRE RESISTANCE (MIL-D-24613)	Fire Retardant
FLEXURAL STRENGTH (2" MANDREL)	No cracking

BENEFITS

- Very light weight
- Zero VOC's, almost no odor
- Good wear qualities and chemical resistance
- Fire retardant properties
- Easy of maintain surface

RECOMMENDED USES

- Corridors
- Mess areas and kitchens
- Staterooms
- Infirmaries
- Passageways

GENERIC DESCRIPTION: Epoxy Deck Coating

PACKAGING/COVERAGE:

Base Coat @ 1/8"

Flex FR Base Coat 4 - Gallon / 52 sq. ft.

POLYSPEC® FLEX FR BASE COAT

FLEXIBLE EPOXY BASE COAT

ITW Polymers Sealants North America

STORAGE & INSTALLATION

STORAGE ENVIRONMENT	Dry area, 65-80ºF
APPLICATION TEMPERATURE, AMBIENT	50-85ºF
APPLICATION TEMPERATURE, SUBSTRA TE	Minimum 5ºF above dew point
SERVICE TEMPERATURE	Maximum 150ºF
SHELF LIFE	12 months
FOOT TRAFFIC, @ 77ºF	8 hours
FULL SERVICE, @ 77ºF	24 hours

Material cures more slowly at cooler temperatures, and working time will be substantially reduced at higher temperatures. In hot weather, material should be cooled to 65ºF to 80ºF prior to mixing and application to improve workability and avoid shortened pot life. The data shown above reflects typical results based on laboratory testing under controlled conditions. Reasonable variations from the data shown above may result.

CONSIDERATIONS & LIMITATIONS

1. Floors should be sloped to drain to prevent standing water or chemicals. As with any surface, all spills should be removed as soon as possible to prevent a slipping hazard.
2. Do not thin with solvents unless advised to do so by ITW Polymers Sealants North America, Inc.
3. Confirm product performance in specific chemical environment prior to use.
4. Prepare substrate according to "Surface Preparation" portion of this document.
5. Always use protective clothing, gloves and goggles during use. Avoid eye and skin contact. Do not ingest or inhale. Refer to Safety Data Sheet for detailed safety precautions.
6. For industrial/commercial use. Installation by trained personnel only.

SURFACE PREPARATION

STEEL: For steel surfaces, a "Near White Metal" ultra high-pressure wash or abrasive blast with anchor profile of 2–4 mils in accordance with Steel Structures Painting Council Specification SP-10 or NACE No. 2 is required.

Refer to PolySpec Surface Preparation Guidelines for more details.

INSTALLATION STEPS

1. **PRIMING (OPTIONAL):** When installing over bare steel, a primer (such as PolySpec® TITE M-50) will be required. PolySpec® TITE M-50: Using a Jiffy mixer blade and a 1/4" variable speed drill, thoroughly mix Parts A and Part B together for 1–2 minutes. Scrape the sides and bottom of the can to be sure that all material is thoroughly mixed together. Apply to the deck at 4–5 mils using a short nap roller. Do not allow primer to puddle. Coverage will be 300-350 square feet per gallon. Allow to cure for 10–12 hours at 75° F (25ºC).
2. **UNDERLAYMENT – FLEX FR BASE COAT (OPTIONAL):** FLEX FR Basecoat is a self-leveling epoxy underlayment. Always mix complete units, and do not attempt to mix partial units, unless instructed by a PolySpec representative. Always pre-mix Part A component. Add Part B to Part A. Using a Jiffy mixer blade and a 1/4" variable speed drill, thoroughly mix Part A and Part B together for 2 minutes. Do not whip bubbles into the mixture. Stop and scrape the sides and bottom of the can to be sure that all the material is mixed together. Blend for an additional 30 seconds. It is important that this product be thoroughly mixed to insure color uniformity throughout. Apply by pouring the Base Coat onto the deck quickly (pot life is short). Using a 1/4" notched trowel; spread the material to the deck evenly. Back rolling with a spiked roller may be necessary if air bubbles have been introduced into the mixed material. Additionally, using a spray bottle, you can mist the applied surface of the material with Isopropyl alcohol to release surface bubbles. Use sparingly, and do not saturate surface with alcohol. **IMPORTANT:** Always pour part B into part A to insure uniform consistency of mix. Take care when troweling that all marks and other imperfections are corrected to achieve a smooth, even finish. This is important when applying a thin film coating over underlayment. Allow the FLEX FR Base Coat to cure for 12-16 hours, or until surface is tack free. Sanding may be required if trowel marks are visible in the underlayment. If sanding is required, wipe surface with Isopropyl Alcohol prior to next operation.

MAINTENANCE

Clean the deck surface regularly with mild detergent and water. Dirt and abrasive materials left on the surface can abrade the finish and dull the shine. Do not use mechanical cleaners or abrasive powders. Waxing of the surface is not necessary and is not recommended.

RESEALING

The deck surface can be re-sealed using FLEX FR Top Coat if the final clear topcoat shows excess wear. This can be done by thoroughly cleaning and degreasing the deck and lightly sanding the topcoat. This step is extremely important to insure adhesion of the re-seal coat Then re-apply a thin coat of FLEX FR Top Coat to renew the deck surface.