

MANUFACTURERS OF THE FINEST INDUSTRIAL FINISHES

POST OFFICE BOX 4089 • 2727 OHIO • PHONE (316)838-4288 • FAX (316)838-6328

WILKOPON EPOXY NOVOLAC GRAY WILKO NO. 332.3215

PRODUCT DESCRIPTION: No. 332.3215 Wilkopon Epoxy Novolac Gray is a 2-component phenolic novalac finish that exhibits excellent abrasion, heat and chemical resistance. It is made with ingredients that are approved for contact with Type VII food as listed under 21 CFR 175.300.

TYPICAL USES: Recommended as an internal lining for immersion service of crude oil, diesel fuel, gasoline at ambient temperatures.

GENERIC TYPE:	Epoxy Novolac-Polyamine	
COLOR:	Gray	
FINISH:	60° Gloss- 85 minimum	
WEIGHT PER GALLON:	10.6 lb/gal (activated)	
VOLUME SOLIDS:	59 % (activated)	
VOC:	3.1 lb/gal (activated)	
RECOMMENDED DRY FILM THICKNESS: 1-2 mils		

COVERAGE:	@ 1 mil DFT	
	Theoretical:	946 sq. ft./act. gal.
	Practical:	757 sq. ft./act. gal.

SURFACE PREPARATION: Note: For optimal coating performance, take considerable care with surface preparation.

Metal: Remove all oil, grease or scale from the surface, then blast with sharp sand or grit to finish. Use a non-spherical blast medium to give a 2-3 mil profile and to achieve the following surface preparation standards:

Non-chemical Service: SSPC-SP6 Commercial Blast (NACE 3) Intermittent Splash or Wear:SCC-SP10 near White Metal Blast (NACE 2)

Immersion or Abrasive Service: SSPC-SP5 White Metal Blast (NACE 1)

Concrete: Concrete should be aged at least 28 days before coating and the surface should be clean, dry and free of form-release agents silicone water proof coatings and/or curing

agents. Sand Blasting or scarification is recommended. Wash down old concrete to remove all residues and neutralize the pH

before blasting or scarifying. For severe service, a second wash is recommended.

RECOMMENDED PRIMERS. May be used DTM. For steel use Wilkopon Epoxy Primers 342.22 or 347.29. For galvanized metal or stainless steel use No. 603-08 Vinyl Primer Wash or Wilkopon Nos. 342-22 or 347-29.

MIXING PROCEDURES: Note: Do not mix partial kits.

- 1. Thoroughly mix resin before adding the hardener.
- 2. Empty the entire amount of the hardener into the resin container. Mix ratio is 4 parts of 332.3215 to 1 part of 3215B
- 3. Mix thoroughly, until uniform in consistency, then continue to mix for an additional 2-3 minutes. Pay special attention to the bottom and the sides of the container to insure complete mixing. A mechanical mixer is preferred. Use at low speed and keep the mixing blade down in the product to avoid entrapping air. If mixing by hand, use a square cornered, flat implement, such as a standard paint stirring stick. Do not use plastic containers for mixing.

THINNING: Thinning is not required. If thinning is necessary, add 4 to 6 fl. oz. of No. 13 thinner to the resin and mix thoroughly before adding the hardener. Note: Do not exceed 10% solvent by volume. Read the Material Safety Data Sheet for No.13 (flammable liquid) before using it.

POT LIFE:

2 hours@ 70 °F

Do not keep blended coating in the original container unless immediate use is planned. Otherwise, exotherm (heat created during the curing process) will considerably shorten the pot life. Pour the coating into a rolling tray or large aluminum-basting pan. Try to keep the depth of coating in the tray below 3/8".

CAUTIONS:

- If the ambient temperature is 85°F or higher, pot life may be as short as 1 hour. Have the working surfaces ready, and mix no more than one gallon of the coating at a time. To increase the pot life under these conditions, put the tray or pan on ice or in ice water. Do not get water or ice in the tray with the coating.
- 2. The substrate temperature must be no less than 5°F above dew point the temperature at which moisture will condense on the surface of the substrate during all blasting and coating procedures.
- 3. Due to the fast setting time (pot life) it is imperative that the material spray pot and fluid lines be shaded (protected) from direct sunlight during high heat weather. Material Pot Life may be extended by placing mixed material bucket in cold ice water. *continued on page 2*

SERVICE TEMPERATURE (DRY): Exposure: This coating is capable of 300°F continuous operation and intermittent spikes of short duration up to 350°F. The coating may show signs of discoloration, but will maintain its integrity.

CHEMICAL RESISTANCE (SPILLAGE ONLY):

Acetic Acid up to 10% Ammonium Hydroxide* Aromatic & Aliphatic Solvents Black Liquor Butyl Acetate Butyl Carbitol (Most) Chlorides White Liquor Urea Solutions 1,1,1-Trichloroethane Hydrochloric Acid (31%) Hydrogen sulfide Isopropyl Alcohol Mineral Acids Nitric Acid up to 45% (Mild) Organic Acids (Most) Phosphates Phosphoric Acid Potassium Hydroxide* Sodium Hydroxide* (Most) Sulfides Sulfuric Acid up to 80%

IMMERSION:

Diesel fuel*Ethanol*Jet Fuel*Methanol*Crude OilWaterGasolineAliphatic Solvents

*Ambient temperatures only

** Light colors will darken

APPLICATION EQUIPMENT:

1. CONVENTIONAL SPRAY: May be applied without thinning. If needed for workability, use Wilko No. No.71 or a good quality Epoxy thinner. No special gun setup is needed to apply this product. Most suction or pressure fed gun intended for applying low viscosity coating will work for this application. Adjust the air and fan setting until the desired finish is achieved.

Following is an example of a typical gun setup for a **Binks 2100**: **Siphon Fed (Cup Gun):**

Fluid Nozzle: 66SS (0.070 Orifice), Part #45-6601 Air Nozzle: 66SD, Part #46-6020 Needle: #565, Part # 47-56500 Atomization Pressure: 40-60 psi **Pressure Fed** Fluid Nozzle: 63CSS (0.052 Orifice) Part #45-6331 Air Nozzle: 63PB, Part #46-6002 Needle: 563A, Part #47-56310 Pot Pressure: 5-10 psi Atomization pressure: 40-60 psi.

- 2. *AIRLESS SPRAY*: Use a low output airless equipment designed for spraying Epoxy coatings, such as Graco Bulldog Hydra-Spray or larger, with a .009 - .013 inch fluid tip and tip pressure of 2400 psi. Use a short line (50 feet max).
- *3. BRUSH OR ROLLER:* Use for small areas only for uniform film. Fast dry properties of the coating may cause brush and roller marks. Thin with No.145 to retard dry.

MULTIPLE COATS: Second and subsequent coats must be applied before the previous coat has completely cross-linked. If the first coat has completely cured (more than 24 hours), brush blast before applying the second coat.

The same requirement applies when overlapping the seams of the adjacent coating sections to create a continuous protective film. If the coating surface to be overlapped at the seam cannot be brushed use a non-impact means such as power brushing or sanding to create a mechanical profile.

CURE TIME @ 70°F:

Re-coat Window:	12-24 hours
Light loading:	72 hours
Immersion (Aqueous)	72 hours
Full or Chemical Service	7 day

SPEED CURING: The cure time varies with temperature variations. If speed curing is desired, cure time can be reduced and product performance enhanced by artificially applying heat during the curing process. A temperature of 150°F for 2 hours is recommended for speed curing before placing the coating into full service.

CLEAN-UP: Use a mixture of MIBK and Butyl Acetate (50/50) or MEK for clean up.

FIRST AID: If inhaled, remove to fresh air. If not breathing, administer artificial respiration, preferably mouth to mouth. In case of any contact with eyes, flush with plenty of water for 15 minutes and secure medical attention.

PRECAUTION: This product is not intended for general consumer use. It can cause skin and eye irritations. Keep away from sparks, heat and open flames. Avoid contact with eyes, skin and clothing. Use with adequate ventilation and avoid prolonged breathing of vapors. Wear an air-supplied mask to avoid breathing concentrated vapors in enclosed areas. Keep the container closed. For additional safety information, refer to Material Safety Data Sheets.