



Aluma Protect 4400/4401

Aluminum Epoxy Primer

TECHNICAL BULLETIN 428 5/13

- Smooth finish provides an excellent bonding surface for additional primers or topcoats.
- Easy to mix and apply.
- Excellent water, chemical and corrosion resistance for aluminum.
- High Performance Strontium Chromate Primer for all aluminum surfaces.



Aluma Protect Aluminum Epoxy Primer 4400/4401 is a corrosion resistant, two component epoxy-polyamide coating for use on properly prepared aluminum where maximum resistance to fresh or salt water is required. The complete coating system is resistant to water, many industrial chemical fumes, and very humid environments. It is intended as a corrosion resistant primer coat for aluminum pleasure craft and has excellent durability in exterior exposures. This product provides an excellent long term barrier to reduce galvanic corrosion to aluminum vessels.

PHYSICAL DATA

VEHICLE TYPE.....Epoxy/Polyamide
 FINISH.....Low Luster
 COLOR.....Bright Yellow
 COMPONENTS.....2
 MIX RATIO (A/B)...1 to 1 (by volume)
 CURING MECHANISM....Chemical Cure
 SOLIDS (theoretical)
 By weight.....45 ± 2%
 By volume.....28 ± 2%
 COVERAGE.....800 sq. ft 2 gal kit
 300 sq. ft .75 gal kit
 VOC.....596 g/l max. (admixed)
 FLASH POINT....60°F Part A
 40°F Part B

APPLICATION DATA

METHOD.....Brush, Roller, Airless or Conventional Spray
 INDUCTION PERIOD....15 minutes @ 70°F
 NUMBER OF COATS....1 or more
 DRY FILM THICKNESS PER COAT.....
 1 mil (3.6 wet mils)
 APPLICATION TEMP (air & substrate).....
 50° F. Min. / 90° F. Max.
 POT LIFE.... 6 hrs. @ 90°F
 10 hrs. @ 70°F
 20 hrs. @ 50°F
 DRY TIME (Hours)

Substrate	To	To	To
Temp	Recoat	Bottom Paint	Launch
90°F	1 - 24	1 - 8	48
70°F	4 - 96	4 - 16	72
50°F	8 - 192	8 - 24	120

If these recommended intervals are exceeded, sand thoroughly with 80 grit sandpaper before recoating or applying bottom paint.
 THINNER.....97 Epoxy Thinner

ASSOCIATED PRODUCTS

97 Epoxy Thinner
 120 Brushing Thinner
 4700/4701 High Build Epoxy Primer



Aluma Protect 4400/4401 Aluminum Epoxy Primer

APPLICATION INFORMATION

Stir both components thoroughly. Mix the two components together in the ratio of 1 part of Component A to 1 part of Component B by volume. Allow to stand 15 minutes at approximately 70° before using. (Allow to stand at least 30 minutes if temperature is between 50° and 65°F) May be applied by brush, roller, conventional or airless spray. Thinning is not normally required for application, however, small amounts of 97 Epoxy Thinner may be used if necessary to facilitate application. Wet film thickness should be 3.6 mils per coat, which yields 1.0 mil dry film thickness. A wet film thickness gauge should be used to monitor paint application. One or two coats of Aluma Protect 4400/4401 should be overcoated with Pettit Protect 4700/4701 to provide a corrosion and chemical resistant barrier for use on all aluminum craft and surfaces.

Surface Preparation: Coating performance, in general, is proportional to the degree of surface preparation. Follow recommendations carefully, avoiding shortcuts. Inadequate preparation of surfaces will virtually assure inadequate coating performance. Degrease aluminum by wiping with 97 Epoxy Thinner. Sandblast, sand or grind the surface to achieve a good adhesion profile.

SYSTEMS

Bare Steel: Not recommended - use Pettit Protect 4700/4701 for steel surfaces.

Bare Aluminum, Hulls and Outdrives: Sandblast (using non-metallic media) or disc sand the aluminum to clean, bright metal. Wipe clean of residue with Pettit 120 Brushing Thinner and immediately apply one coat of Aluma Protect Aluminum Epoxy Primer 4400/4401. At 70°F let dry 4 hours minimum, 96 hours maximum, and apply an additional coat followed by two coats of Pettit Protect High Build Epoxy Primer 4700/4701 following application and recoat instructions.

Previously Primed Surfaces: Aluma Protect Aluminum Epoxy Primer 4400/4401 may be applied over existing two part epoxy finishes, provided they are in sound condition. Brush-off sandblasting or very heavy sanding with 60 grit sandpaper is required to maintain maximum adhesion. Wipe clean with 120 Brushing Thinner. Then apply one or two coats 4400/4401 per instructions. Remember, coating performance is only as good as the surface to which it's applied. All existing two package epoxy finishes in poor condition, as well as all one package primers and bottom paints, should be removed completely and the appropriate bare aluminum system as described above should be followed before using Aluma Protect Aluminum Epoxy Primer 4400/4401. Aluma Protect Aluminum Epoxy Primer is not recommended for use over antifouling paints.