



Stop the **LEAKS!** Reflect the **HEAT!**
Lower energy **BILLS!** **SAVE MONEY!**



Technical Data Sheet

ALDOCOAT 400

PREMIUM ACRYLIC

PRODUCT DESCRIPTION:

ALDOCOAT 400 is a high solids, technologically advanced, fire retardant, thixotropic, 100% acrylic elastomer uniquely formulated for the protection of spray polyurethane foam, metal, and a wide variety of other substrates. The proprietary formulation incorporates premium elastomeric acrylic resins, reinforcing laminar pigments and non-migrating fire retardants to produce a seamless, flexible, durable membrane having exceptional weatherability, ultraviolet and fire resistance. **ALDOCOAT 400** acts as a “breathing” membrane allowing trapped moisture vapor to pass through the film while remaining impervious to exterior mass water penetration. The resultant tough, cured film provides good resistance to mechanical damage and chemical attack.

RECOMMENDED USES:

ALDOCOAT 400 is the ideal choice for metal roofs, BUR and single ply restoration. This product is ideal for use over spray polyurethane foam and metal decks. **ALDOCOAT 400** has Miami Dade approval (ASTM 6083) over foam and metal decks. The thixotropic nature of **ALDOCOAT 400** permits high build coverage, even on rough, textured or vertical surfaces without pinholing or sagging. It also has excellent adhesion to a variety of other substrates, such as asphalt, primed wood, primed metal, concrete and masonry. Ponding water conditions are to be avoided. Please contact our Technical Service Department for primer recommendations for application over rusted surfaces.

COLORS:

ALDOCOAT 400 is available in standard white and medium gray. Custom color matching is available upon request where a specific color is required.

GENERAL APPLICATION INSTRUCTIONS OVER SPRAY POLYURETHANE FOAM:

ALDOCOAT 400 may be applied by airless spray equipment. Airless spray is the most efficient application method for larger projects. Brushes and rollers may be used for detail work such as edge termination, filling of voids, pinholes and small cracks. Apply **ALDOCOAT 400** only to clean and dry sound substrates free of loose particles or other foreign matter. **ALDOPRIME 708** Acrylic or 720 Neoprene may be used to enhance adhesion over aged spray polyurethane foam roofs.

Contact our Technical Service Personnel for project specific primer recommendations and substrate preparation.

TYPICAL PHYSICAL PROPERTIES:

TOTAL SOLIDS:
65% by weight ASTM D1644
58% by volume ASTM 2697

WEIGHT PER GALLON:
11.2 lbs per gallon ± 0.2

FLASH POINT:
None

CLEAN UP:
Soap and Water

SHELF LIFE:
12 months @ 45°- 80° F

COLOR:
White, Gray or as specified

VISCOSITY:
12,600 cP (4 @ 6 RPM) ASTM 2196

ELONGATION:
239% ASTM D2370

IMPACT RESISTANCE:
exceeds 160b in/lb. ASTM D-2294

HARDNESS:
45 Shore A ASTM D-2240

TENSILE STRENGTH:
400 psi ASTM D2370

PERMEANCE:
6.5 perms ASTM D1653

SALT SPRAY
No effect (3000 hours) ASTM B-117

WEATHERABILITY
No effect (3800 hours) ASTM G-26

SERVICE TEMPERATURE:
-40° TO 200° F

CURE TIMES:
DRY TO TOUCH: 4 Hours @ 75° F
TACK FREE: 12 Hours
RECOAT: 12-24 Hours

MIAMI-DADE APPROVED
NOA #08-0417.02

SOLAR REFLECTANCE
76%

THERMAL EMITTANCE
88%



SOME SEPARATION MAY OCCUR DURING SHIPMENT AND STORAGE. THEREFORE, THE CONTENTS OF EACH CONTAINER SHOULD BE THOROUGHLY POWER MIXED FOR THREE (3) TO FIVE (5) MINUTES. DO NOT THIN PRODUCT!

It is recommended that **ALDOCOAT 400** be sprayed in multiple coats applied in multi-directional passes (north-south/east-west) to insure uniform film build and to avoid pinholing. Final dry film thickness (DFT) is to be a minimum of 25 dry mils and free of voids, pinholes, holidays, cracks or blisters. COATING APPLICATION SHOULD BE SUSPENDED IMMEDIATELY AND OUR TECHNICAL SERVICE PERSONNEL CONTACTED IF THE RESULTS BEING OBTAINED ARE LESS THAN DESIRABLE.

Apply two (2) or more coats of **ALDOCOAT 400** at the rate of 1-2 gallons per 100 square feet. As a visual aid in the application of the product, the base coat may be gray or light gray. Darker colors are available and may accelerate the curing process in cooler ambient temperatures. Accentuated surface profiles that increase total surface area will require a proportionate increase in the amount of **ALDOCOAT 400** to satisfy the minimum dry mil thickness specification requirements. If specification calls for roofing granules, these may be broadcast into intermediate coat or within 10 minutes of final coat application at the rate of 35-40 pounds per 100 square feet. No foot traffic should be permitted on the coated surface for 72 hours after application.

GENERAL APPLICATION INSTRUCTIONS OVER METAL:

ALDOCOAT 400 may be applied to all types of metal substrates, including surfaces previously coated with aluminized asphalt or other similar acrylic coatings. Apply **ALDOCOAT 400** only to clean, dry, sound surfaces free of loose particles or other foreign matter. Surface should be thoroughly inspected for oxidation. Conditions of all seams, fasteners and flashing areas should be checked for gaps, pinholes or cracks.

Pressure washing is required as the initial step in the preparation of the substrate. All seams are to be sealed, fastener heads addressed and all roof penetrations inspected as well for possible water penetration. Roof deck is to be water tight prior to coating application. Strict adherence to the published ALDO Metal Roof Restoration Specification or consultant/architect specification is required.

ALDO Products Company, Inc., is not responsible for building engineering or structural design issues, internal or external. Please consult a building professional if such issues are suspected of having an affect on any roof restoration process.

LIMITATIONS AND PRECAUTIONS:

ALDOCOAT 400 is a water-based elastomeric acrylic coating that will freeze and become unusable at temperatures below 32° F. PROTECT FROM FREEZING DURING SHIPMENT AND STORAGE. Do not store material at temperatures below 45° F. Do not apply when ambient air and substrate temperatures fall below 50° F or when there is a possibility of temperatures dropping below 32° F within a 24 hour period after application.

Do not apply over wet substrates or in inclement weather. Total cure of **ALDOCOAT 400** requires complete evaporation of water. Cool temperatures and high humidity retard cure. Coatings can cause a premature artificial dew zone during the cure process under certain climatic conditions. This is generated as the water in the coating evaporated, cooling the surface and attracting moisture in the form of dew. Therefore, it is imperative not to apply the product if climatic conditions prevent complete cure before rain, dew or freezing temperatures.

ALDOCOAT 400 is not a vapor barrier coating and is not recommended for use over cold storage installations. Where a vapor barrier is required, contact our Technical Service Personnel for proper selection and installation procedures.



SPRAY EQUIPMENT RECOMMENDATIONS:

Airless spray equipment provides the most efficient method of application with consistent results. The following are critical equipment specification requirements:

PUMP: One (1) gallon per minute output with suggested three thousand (3,000) psi pressure capability.

GUN: airless gun compatible with pump used.

SCREEN SIZE: filter screens should be thirty (30) mesh or larger.

TIP SIZE: A reversible self-cleaning tip with orifice size of .027" to .039" and a fan angle of 40° to 50°. Typically, a .031" tip is used for ALDOCOAT 400.

FLUID HOSE: 3/8 " minimum inside diameter, nylon high pressure type hose for lengths up to one hundred (100) feet from pump. From one hundred (100) to two hundred (200) feet use 1/2" or larger hose

FREIGHT CLASSIFICATION:

Resin Emulsion, Class 55. PROTECT FROM FREEZING DURING SHIPMENT AND STORAGE.