GacoFlex™

Product Data Sheet (PDS): **GacoFlex™ U91C Series (Compliant)**
Revised: 05/2026

GACOFLEX™ U91C SERIES (COMPLIANT) SINGLE-COMPONENT MOISTURE-CURE POLYURETHANE COATING

A. DESCRIPTION:

GacoFlex U91C (Compliant) is a single component moisture cure aromatic urethane base coat that exhibits strong adhesion to numerous substrates. GacoFlex U91C produces a tough film that provides robust protection to foam substrates and prevents oil migration on asphalt-based roofs. GacoFlex U91C is not a finish coat and should be top coated with GacoFlex aliphatic urethane, silicone, or acrylic coatings to provide excellent weatherability, UV resistance and high reflectance to promote a cool roof.

GacoFlex U91C is a single-component, moisture-cure polyurethane coating.

B. RECOMMENDED USE:

GacoFlex U91C is designed to rejuvenate and extend the life of aged asphaltic, single ply and previously coated roofs. It provides excellent oil migration resistance on asphaltic roofs without the application of bleed blocking primers. It also provides excellent protection for foam roofs due to the tough cured film.

C. PACKAGED PRODUCT DATA:

PROPERTY	*DESCRIPTION*
ADHESION	Exceptional adhesion to GacoFlex GacoPrime Low VOC Primer, E5691 Water Reducible Epoxy Sealer/Primer, and E5320 2-Part Epoxy Primer/Filler.
COLOR	U9101C - OYSTER
CONSISTENCY	GacoFlex U91C is thixotropic in nature and has a viscosity of approximately 8000 centipoises.
COVERAGE	1 gal / 100 ft² (3.8 L / 9.3 m^2) yields a Dry Film Thickness (DFT) of 12 mils.
SOLIDS	80% by volume
STORAGE STABILITY	12 months at 50 °F – 80 °F (10 °C – 26 °C)
TOXICITY	Contains a toluene diisocyanate prepolymer.
V.O.C.	< 50 g / L
WEATHERABILITY	Outstanding weatherability and chalking resistance.

D. PHYSICAL PROPERTIES:

PROPERTY	*ASTM TEST*	*STANDARD (MIN)*
FLASH POINT	D56 (Closed Cup)	63 °F (17.2 °C)
HARDNESS	D2240	90 ± 5 Shore A
HARDNESS @ 70 °F (27 °C)	C836	77 Shore A
TEAR RESISTANCE	D624	360 pli
TENSILE	D412	
	Elongation:	350 %
	Permanent Set at Break:	7 % max
	Strength:	2600 psi (17.9 MPa)

WATER VAPER PERMEABILITY	E-96 Procedure B Max. 100% RH difference @ 73° (23 °C)	0.02 perm inches

E. APPLICATION:

STEP	*INSTRUCTIONS*
THINNING	Thinning is typically required. Use GacoFlex T5112 Thinner for Aromatic Urethanes or GacoFlex T5120 Compliant Thinner for Polyurethanes, but do not thin more than 10% by volume.
MIXING	Use an electric or compressed-air-powered mixer that will thoroughly agitate the mix. A Jiffy-type mixer has been found to work well with this coating.
POT LIFE	After 2 hours at 70 °F – 80 °F (21 – 27 °C) and 50% RH, there will be some skinning and an increase in viscosity. Thinning up to 10% with GacoFlex T5112 Thinner for Aromatic Polyurethanes during initial mixing will extend pot life, for a maximum of three hours.
APPLICATION	Refer to Gaco Application Specification for specific instructions and requirements. Sample application would be to prepare the substrate according to Gaco General Instructions “GW-1-1 Surface Preparation” and apply at a rate of 1.25 gal / 100 ft² (5.7 L / 9.3 m²) for an approximate Wet Film Thickness (WFT) of 20 mils. NOTE: Do not exceed an application rate of 1.5 gal / 100 ft² (5.7 L / 9.3 m²) per coat.
DRY TIME	10-12 hours at 75 °F (24 °C) and 50% RH. Dry time will be faster in warmer and more humid conditions, and slower in colder and dryer conditions.
CLEAN UP	Clean up application tools and equipment with GacoFlex T5112 or GacoFlex T5120.

F. PHYSICAL PROPERTIES:
Meets the requirements of Florida Maintenance coating specifications. Applications on single-ply membranes require GacoPrime LVOC Primer prior to applying GacoFlex U91C Polyurethane Coating. For applications over metal and asphalt substrates, priming with GacoFlex E5320 2-Part Epoxy Primer/Filler is recommended.

PROPERTY	*ASTM TEST*	*REQUIRED*	*RESULT*
EXTERNAL FIRE EXPOSURE-FLAME SPREAD	ASTM E108	Class A 1.0 in 12 (metal) Class A 2.0 in 12 (BUR)	Pass
VOLUME SOLIDS (%)	ASTM D2697	50 % min	80 %
INITIAL ELONGATION AT BREAK (%)	ASTM D2370	100 % min	468 %
AGED ELONGATION AT BREAK (%)	ASTM D2370	100 % min	383 %
TENSILE STRENGTH	ASTM D2370	200 psi (1.3 MPa) min	435 psi (3 MPa)
PERMEABILITY (PERM INCHES) (23C, 50% RH DIFFERENCE)	ASTM D1653	50 perm in	5 perm in
WATER SWELLING (%)	ASTM D471	20 % max	12 %

** For specific Health and Safety information, please refer to Safety Data Sheet (SDS)*