FlyGloss FGBC Base Coat

Acrylic Polyurethane Topcoat



Product FlyGloss FGBC Base Coat

Item Class Base Coat / Clear Coat System

FlyGloss FGBC acrylic polyurethane base coat is intended for use with FGCC clear coat to achieve superior gloss and color retention that outshines and outlasts preceding aerospace market technologies. FGBC is available in both solid and special effect colors. With a solid content of over 50 percent, FGBC offers single coat coverage on almost all colors. In addition, this product has a dry to tape time of 2-3 hours and a recoat window of 96 hours.

Specifications

Product is manufactured to meet the performance requirements of the following specifications:

AMS 3095A* - AIMS 04-04-025 - AIMS 04-04-033 - AIMS 04-04-037 - BAMS 565-018 - MEP 10-125 Type I* - BAMS 565-018

(*Listed on QPL)

Activator & Additives

Activator	Activator Activating Thinner	
925 (Solid Colors)	FG3002 Slower Dry	PS50
	FG3004 Normal Dry	
	FG3009 Faster Dry	

Use of Primers

3Chem recommends use of P1019 (High Solid Epoxy Primer) and P-1069 (Surfacing Primer) with this system. Please contact your local 3Chem representative for a complete list of epoxy primers which may be utilized with this system.

Surface Preparation

Prepare substrate per OEM requirements. Refer to FlyGloss application guide for detailed instructions or contact your local 3Chem representative for assistance.

Mixing Instructions

Base	Finish	Activator	Mix Ratio
FGBC-2XXX	Solid Colors	925	1:1:.25
FGBC-8XXX	Special Effects	925	1:1:.25
FGCC-XXXX	Required Clear Coat	900	1:1

All Colors:

Shake (Base) for 15 minutes to assure no solid settlement remains in can. Add component B activator to component A paint first. Mix ratio for material is 1-part component A paint, 1-part component B activator, up to .25 parts activating thinner.

***All FGBC base coat colors must be top coated with FlyGloss FGCC clear coat to meet specification requirements. Read FGCC clear coat technical data sheet before applying.

Induction Time

No induction time is required prior to use. Once mixed together, ensure that admixed material is continuously stirred for at least 5 minutes before proceeding.

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PRODUCT TECHNICAL DATA SHEET

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Spraying Viscosity Solid Colors: 18-22 Seconds with #2 Zahn cup, Special Effect Colors: 17-21 Seconds with #2

Zahn cup

Pot Life 4 Hours @ 21° Celsius, 70° Fahrenheit

Film Thickness 1-1.5 mils DFT (Only one coat required) Wet film thickness should be 2-3 mils total

Application Instructions

Temperature and Humidity	Minimum	Maximum
Temperature Celsius	11°	35°
Temperature Fahrenheit	52°	95°
Humidity	33%	74%

Spray Equipment

Spray Gun Type	Tip/Nozzle Size	Cap Pressure	Pot Pressure
Conventional Air	1.3 - 1.6 mm	45 to 60 psi	10 to 20 psi
HVLP	1.4 - 1.6mm	10 psi Maximum	10 to 20 psi
Electrostatic	1.2 - 1.5mm	45 to 60 psi	10 to 40 psi

Dry Times 1:1:.25 - FG3002 Slower Dry - Do not use in temperature ranges 52-65°F (11-18°C)

Temperature	Dry to Recoat	Dry to Tape	Dry to Handle	Clearcoat Window	Full Cure
66-85°F (19-29°C)	4 Hours	7-8 Hours	16 Hours	96 Hours	7 Days
86-95°F (30-35°C)	3 Hours	6 Hours	12 Hours	96 Hours	7 Days

Dry Times 1:1:.25 - FG3004 Normal Dry

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Temperature	Dry to Recoat	Dry to Tape	Dry to Handle	Clearcoat Window	Full Cure		
52-65°F (11-18°C)	4 Hours	6-7 Hours	8 Hours	96 Hours	7 Days		
66-85°F (19-29°C)	1.5 Hours	3.5 Hours	6 Hours	96 Hours	7 Days		
86-95°F (30-35°C)	1 Hour	2.5 Hours	4 Hours	96 Hours	7 Days		

Dry Times 1:1:.25 - FG3009 Faster Dry – Do not use in temperature ranges 86-95°F (30-35°C)

Temperature	Dry to Recoat	Dry to Tape	Dry to Handle	Clearcoat Window	Full Cure
52-65°F (11-18°C)	1.5 Hours	3-4 Hours	7 Hours	96 Hours	7 Days
66-85°F (19-29°C)	1 Hour	2 Hours	5 Hours	96 Hours	7 Days

Oven Force Dry Instructions 1:1:.25 (Using FG3004 Normal Dry activating thinner)

Flash Time	Oven temperature	Dry to Tape	Dry to Handle	Clearcoat Window	Full Cure
30 Minutes	1 hour @ 120° F (48°C)	1.5 Hours	3 Hours	96 Hours	7 Days

Only mix enough material to be applied on initial coat. Always add component B activator to component A paint. Complete kit of material will yield 2.25 US Gallons (8.5 liters). 1-gallon component A paint, 1-gallon component B activator, 1-quart activating thinner.

Apply one even wet coat of material using a uniform spray pattern. Cross coat may be required to achieve 100% coverage in one single coat depending on color. Certain colors may require additional coats.

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Application Instructions

PS50 Accelerator Repair Application - 1:1 plus accelerator (No activating thinner should be used)

PS50 Required	Dry to Recoat	Pot Life	Dry to Tape	Dry to Handle	Clearcoat Window	Full Cure
1oz/29ml per	15 Minutes	1 Hour	30 Minutes	2.5 Hours	18 Hours	7 Days
admixed gallon						

Theoretical Coverage 1100-1200 sq. ft / gallon @ 1 mil 27-28 m2 / liter @1 mil

*Coverage based on 100% transfer efficiency rate

Dry Film Weight Per 25 microns: 27-35 g/m2

Per dry mil: .0057-.0082 lbs./ft2

Color Available in all gloss color ranges

*Special Effects colors include micas and pearlescent

Gloss Solid colors: 85 minimum @ 60 degrees

Special Effects colors: 30-60 @ 60 degrees

(Gloss 95 minimum once clear coated with FGCC-100)

Volatile Organic Compound 300 – 380 g/l

Shelf Life 24 Months (When stored in climate-controlled environment between 60-80° F)

*Product may be re-certified upon inspection by 3Chem.

Safety Instructions Always read material safety data sheet (SDS) and product label before utilizing

this product. Product SDS is available upon request.

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PRODUCT TECHNICAL DATA SHEET