

**PROGRP**  
**Flexiglass**

GRP multi surface overlay

**STYRENE  
FREE**

# Application Guide

**10** YEAR  
WARRANTY

**20** YEAR  
WARRANTY



# PROGRP Flexiglass

GRP multi surface overlay



## INTRODUCTION

CROMAR FLEXIGLASS PRIMER-ENCAPSULATING OVERLAY SYSTEM IS A REVOLUTIONARY ADDITION TO THE CROMAR RANGE OF LIQUID APPLIED ROOFING PRODUCTS. DESIGNED TO WORK ON A VARIETY OF EXISTING ROOF SURFACES, PROVIDING A HARD WEARING AND RAPID CURING SOLUTION.

### BENEFITS:

STYRENE FREE

OVERLAY RESIN SYSTEM

HIGH FLEX RESIN PROPERTIES

RAPID CURE SYSTEM

### APPLICATIONS:

ROOFING FELT

ASPHALT

SINGLE PLY MEMBRANES

METALS

EXISTING LIQUID APPLIED SYSTEMS

## TRAINING

Merchant site training is available. See your distributor or Cromar website for details. Training is always recommended before installing a Flexiglass roof.

## PRIMARY COMPONENTS

### FLEXIGLASS

20kg.

### FLEXIGLASS ENCAPSULATING PRIMER

5kg.

### FLEXIGLASS CATALYST

1kg and 5kg.

### CHOPPED STRAND MATTING

225gsm.

### GRP EDGE TRIMS

Pre-formed in 3m lengths.

## ANCILLARY COMPONENTS

### ACETONE

For Trim and when required preparation of primer and Flexiglass surface.

### TRIM ADHESIVE

For ensuring correct fixing of trims.

### FLEXI TEX SEAM TAPE

For bandaging trim to roof, cracks or splits in roofing material.

## APPLICATION TOOLS

### APPLICATION ROLLERS

(Frame and sleeve) 3", 7" and 9" wide for applying primer and Flexiglass resins (replacement sleeves available).

### LAMINATING BRUSHES

1", 2" and 4" wide for application of primer, Flexiglass and moulding to shape in difficult to access areas.

Also useful for Flexiglass detailing such as bottom lip of trims.

### MIXING BUCKETS

For measuring primer and Flexiglass, mixing in Catalyst and transferring to roof surface.

### DISPOSABLE NITRILE GLOVES

To protect hands when applying resins.



## ASSESSING THE ROOF

Is the roof viable for an overlay system?

- The roof must be sound and stable.
- Any movement of the substrate will need to be investigated and rectified.
- No ponding water.
- Not all liquid coatings can be overlaid successfully, an adhesion test must be undertaken.

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For technical queries please contact us on: 01977 663 133 for advice.

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## PREPARATION

Repair cracks, splits or damaged areas in the substrate. The roof should be dry, free from dirt, moss, vegetation, and loose material/chippings.

A moss & mould remover should be used to clean the roof, if moss and vegetation are present.

It would be advisable to carry out an adhesion test irrespective of the surface to be covered.

This would test the adhesion of the primer to the substrate.

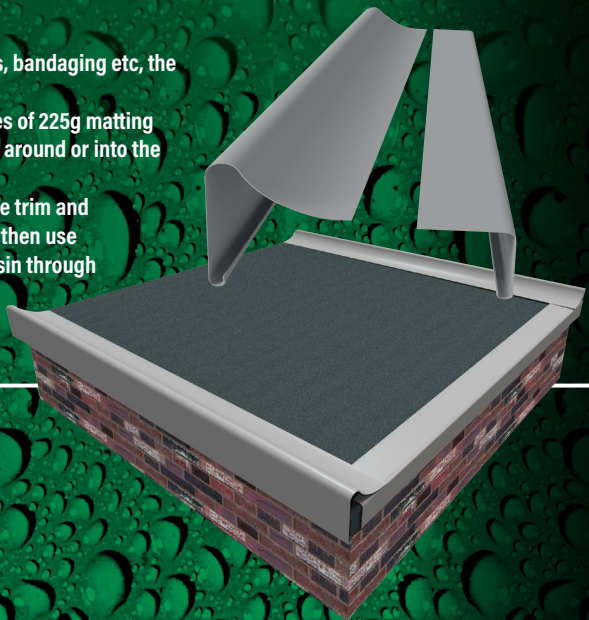


## TRIMS (AS REQUIRED)

When doing detail work, corners, joints, bandaging etc, the following process is recommended.

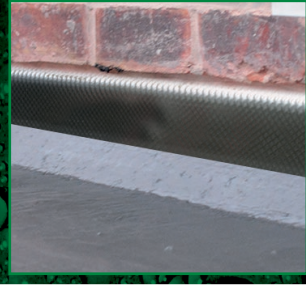
Detail work; Wet out the required pieces of 225g matting prior to offering into place and forming around or into the area to be covered.

Bandaging; Apply Flexiglass resin to the trim and primed roof area, roll out the bandage, then use application roller to draw Flexiglass resin through the bandage, then apply 2nd coat of Flexiglass resin until the matting has wetted out.



## EXISTING ABUTMENTS AND CURBS (AS REQUIRED)

Trims should be added to existing curbs and abutments, with flashing fitted after the Flexiglass has cured.



	5 - 10°C	10 - 15°C	15 - 20°C	20 - 25°C
	5%	4%	3%	2%
	Pump Strokes 30g (Approx)	Pump Strokes 30g (Approx)	Pump Strokes 30g (Approx)	Pump Strokes 30g (Approx)
5kg	8	6	5	3
10kg	15	12	9	6
15kg	22	17	13	9

*Required for primer & Flexiglass application*

## CATALYST RATES

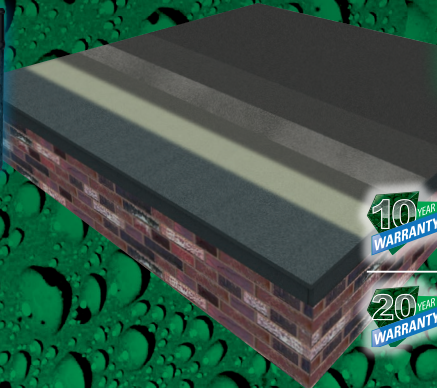
Recommended catalyst addition rate based on temperature range.



## COVERAGE RATES



**ENCAPSULATING PRIMER**  
200-500 g/m<sup>2</sup>  
Dependent on substrate



**1ST LAYER OF FLEXIGLASS**  
800-1000 g/m<sup>2</sup>  
Dependent on substrate



**2ND LAYER OF FLEXIGLASS**  
400-500 g/m<sup>2</sup>  
Dependent on substrate



**3RD LAYER OF FLEXIGLASS**  
500 g/m<sup>2</sup>  
Dependent on substrate

# MATERIAL QUANTITY GUIDE

Primer				Flexiglass				Catalyst Calc is based on Rough & 20 Year					
Roof Area	Smooth	Medium	Rough	Roof Area	10 Year	20 Year	CSM	Roof Area	5%	4%	3%	2%	
Temp										5 - 10°C	10 - 15°C	15 - 20°C	20 - 25°C
1m <sup>2</sup>	200g	300g	500g	1m <sup>2</sup>	1.5kg	2kg	225kg	10m <sup>2</sup>			1kg	1.25kg	
5m <sup>2</sup>	1kg	1.5kg	2.5kg	5m <sup>2</sup>	7.5kg	10kg	1.125kg	15m <sup>2</sup>		1.125kg	1.5kg	1.875kg	
10m <sup>2</sup>	2kg	3kg	5kg	10m <sup>2</sup>	15kg	20kg	2.25kg	20m <sup>2</sup>	1kg	1.5kg	2kg	2.5kg	
15m <sup>2</sup>	3kg	4.5kg	7.5kg	15m <sup>2</sup>	22.5kg	30kg	3.375kg	25m <sup>2</sup>	1.25kg	1.875kg	2.5kg	3.125kg	
20m <sup>2</sup>	4kg	6kg	10kg	20m <sup>2</sup>	20kg	40kg	4.5kg	30m <sup>2</sup>	1.5kg	2.25kg	3kg	3.75kg	
25m <sup>2</sup>	5kg	7.5kg	12.5kg	25m <sup>2</sup>	37.5kg	50kg	5.625kg	40m <sup>2</sup>	2kg	3kg	4kg	5kg	
30m <sup>2</sup>	6kg	9kg	15kg	30m <sup>2</sup>	45kg	60kg	6.75kg	50m <sup>2</sup>	3kg	4.5kg	6kg	6.25kg	
40m <sup>2</sup>	8kg	12kg	20kg	40m <sup>2</sup>	60kg	80kg	9kg	70m <sup>2</sup>	3.5kg	5.25kg	7kg	8.75kg	
50m <sup>2</sup>	10kg	15kg	25kg	50m <sup>2</sup>	75kg	100kg	11.25kg	100m <sup>2</sup>	5kg	7.5kg	10kg	12.5kg	
70m <sup>2</sup>	14kg	21kg	35kg	70m <sup>2</sup>	105kg	140kg	15.75kg						
100m <sup>2</sup>	20kg	30kg	50kg	100m <sup>2</sup>	150kg	200kg	22.5kg						

## HEALTH AND SAFETY - MATERIALS HANDLING



When mixing/applying Flexiglass use:

- Hand protection (Nitrile gloves)
  - Respiratory protection (dust mask)
  - Eye protection (protective goggles/glasses) Additionally, we recommend that eyewash liquid (saline solution) is available in the event that resin splashes into eyes.
- If primer or Flexiglass splashes in the eyes, irrigate thoroughly with eyewash liquid or fresh water and consult a medical professional if irritation persists.
- Refer to HSG 33

## APPLICATION

### - PRIMER APPLICATION

It is important that the products are mechanically stirred in the tin, prior to pouring into mixing buckets.

Add the required Flexiglass catalyst (after shaking vigorously) and again stir thoroughly for a minimum of 2 minutes using a mixing paddle.

Once catalysed the Flexiglass primer should be applied with a roller or brush at the recommended coverage ratio 200-500g/m<sup>2</sup>, dependent on substrate. Once the primer has cured and is trafficable, the roof should be inspected for defects.



**10** YEAR  
WARRANTY

## FLEXIGLASS APPLICATION

Once the primer is fully cured Flexiglass Resin should be mixed with the Catalyst (according to the rates on the chart opposite), and then applied at an overall coverage rate of 1200g - 1500g/m<sup>2</sup> to the clean and dry surface within the recommended temperature range.

- 1** Flexiglass resin is applied to the primed surface using the coverage rates of 800-1000g/m<sup>2</sup>.
- 2** A layer of Flexiglass 225gsm matting is then rolled onto the flexiglass base layer and consolidated using the application roller to help draw the base Flexiglass resin through the matting.
- 3** The remaining Flexiglass resin should then be applied to this consolidated surface at a coverage ratio of, 400 - 500g/m<sup>2</sup>

Once the Flexiglass has cured and is trafficable the roof should be inspected for defects. If any pin holes or sparsely covered areas are found, apply more Flexiglass to the affected areas.

**20** YEAR  
WARRANTY

- 4** For the 20 year warranty an additional layer of Flexiglass resin, mixed with Catalyst should be applied at a rate of 500g/m<sup>2</sup> (no additional matting required).



# Trouble Shooting Guide

Issue	Cause	Corrective Action
Rapid cure of resin on application.	Substrate or air temperature are outside of recommended guidelines.	Check catalyst and temperature chart, also reduce amount of resin being mixed.
Under cure or resin.	Catalyst and/or temperature level too low.	Check catalyst and temperature chart, and adjust mix.
Delamination between substrate and laminate.	Encapsulating primer not used prior to Flexiglass resin.	Must use primer to ensure good bond.
Delamination between substrate and laminate.	Substrates loose debris not removed, or a wet / damp surface.	Remove loose debris and make sure surface is dry.
Pitting of the membrane.	The resin has been subject to rain before it has cured.	If pitting is minor and the surface has cured, it can be overcoated.
Pitting of first resin and laminate, or looks dry with pinholes.	Not enough resin used to wet out the 225gsm glass fibre.	Repeat process using the correct resin to glass ratio, 800/1000g/m <sup>2</sup>
Second coat flecking or peeling away from the first application.	First coat has got wet or damp prior to second coat application.	Scrape away second coat, abrade, use acetone wipe and relay the complete system.
Cracking and peeling of resin.	Used as a flow coat only with no glass.	Must be used with glass 225gsm with even resin distribution either side. Scrape off loose resin and abrade, then use full system.
Cracking and peeling of resin.	Second coat applied outside of recommended maximum delay time, ie over 7days.	Scrape away second coat, abrade, use acetone wipe and relay the complete system.
Resin separation, patchy.	Insufficient mixing prior to application.	Make sure resin is properly mixed prior to use.
Discolouration of primer.	Bitumen leaching due to lack of primer.	Performance of primer is not affected, if aesthetics are a problem then re-apply once cured.
Resin splashes on adjacent surfaces.	Poor preparation.	Tape high risk area that could get splashed, use a splash guard on the roller. Use acetone wipes to clear splashes of resin immediately, if cured then scrape off, taking care not to cause further damage.

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