SIGMAGUARD™ 730

OVERVIEW

• Place of origin: Indonesia

Gloss level: Gloss

• Dry to touch: 3 hours

• Number of components: 2

• Color: Offwhite, cream

PRODUCT DETAIL

DESCRIPTION

Two-component, high solids polyamine cured phenolic epoxy coating

PRINCIPAL CHARACTERISTICS

- Tank coating with good chemical resistance against a wide range of chemicals
- Short curing periods
- Good low-temperature curing
- Easy to clean
- Can be used under insulation up to 150°C (300°F)

COLOR AND GLOSS LEVEL

- Offwhite, cream
- Gloss

BASIC DATA AT 20°C (68°F)

Data for mixed product		
Number of components	Two	
Mass density	1.4 kg/l (11.7 lb/US gal)	
Volume solids	78 ± 2%	
VOC (Supplied)	Directive 1999/13/EC, SED: max. 169.0 g/kg max. 242.0 g/l (approx. 2.0 lb/US gal)	
Recommended dry film thickness	150 μm (6.0 mils)	
Theoretical spreading rate	5.2 m²/l for 150 μm (209 ft²/US gal for 6.0 mils)	
Dry to touch	3 hours	
Overcoating Interval	Minimum: 8 hours Maximum: 28 days	
Full cure after	See curing table	
Shelf life	Base: at least 12 months when stored cool and dry Hardener: at least 24 months when stored cool and dry	

Notes:

- See ADDITIONAL DATA Spreading rate and film thickness
- See ADDITIONAL DATA Overcoating intervals
- See ADDITIONAL DATA Curing time

RECOMMENDED SUBSTRATE CONDITIONS AND TEMPERATURES

Substrate conditions

- Steel; blast cleaned to a minimum of ISO-Sa2½, blasting profile $40 70 \mu m (1.6 2.8 mils)$
- Previous coat of approved coating must be dry and free from any contamination

Substrate temperature and application conditions

- Substrate temperature during application and curing should be above 5°C (41°F)
- Substrate temperature during application should be at least 3°C (5°F) above dew point

INSTRUCTIONS FOR USE

Mixing ratio by volume: base to hardener 75:25 (3:1)

- The temperature of the mixed base and hardener should preferably be above 15°C (59°F), otherwise extra thinner may be required to obtain application viscosity
- Adding too much thinner results in reduced sag resistance and slower cure
- Thinner should be added after mixing the components

Induction time

Allow induction time before use

Mixed product induction time		
Mixed product temperature	Induction time	
15°C (59°F)	15 minutes	
20°C (68°F)	10 minutes	
25°C (77°F)	5 minutes	

<u>Pot life</u>: 1.5 hours at 20°C (68°F) Note: See ADDITIONAL DATA – Pot life

Air spray

Recommended thinner: THINNER 91-92

Volume of thinner: 5 - 15% for a one coat application of 150 μm (6.0 mils) DFT

Nozzle orifice: 1.8 – 2.0 mm (approx. 0.070 – 0.079 in)

Nozzle pressure: 0.3 - 0.4 MPa (approx. 3 - 4 bar; 44 - 58 p.s.i.)

Airless spray

Recommended thinner: THINNER 91-92

Volume of thinner: 0 - 10% for a one coat application of 150 μm (6.0 mils) DFT

Nozzle orifice: Approx. 0.53 – 0.69 mm (0.021 – 0.027 in) **Nozzle pressure:** 15.0 MPa (approx. 150 bar; 2176 p.s.i.)

Brush/roller

For stripe coating and spot repair only

Cleaning solvent: THINNER 90-53

ADDITIONAL DATA

Spreading rate and film thickness		
DFT	Theoretical spreading rate	
125 μm (5.0 mils)	6.2 m²/l (250 ft²/US gal)	
150 μm (6.0 mils)	5.2 m²/l (209 ft²/US gal)	

Note: Maximum DFT when brushing: 100 μ m (4.0 mils)

Overcoating interval for DFT up to 150 μm (6.0 mils)						
Overcoating with	Interval	5°C (41°F)	10°C (50°F)	20°C (68°F)	30°C (86°F)	40°C (104°F)
itself	Minimum	32 hours	24 hours	8 hours	4 hours	3 hours
	Maximum	28 days	28 days	28 days	14 days	7 days

Note: Surface should be dry and free from any contamination

Curing time for DFT up to 150 μm (6.0 mils)			
Substrate temperature	Minimum curing time before transport of aliphatic petroleum products and ballast water and tanktest with seawater	Minimum curing time before transport of cargoes without note 4, 7, 8 or 11	
5°C (41°F)	10 days	17 days	
10°C (50°F)	7 days	14 days	
20°C (68°F)	3 days	5 days	
30°C (86°F)	60 hours	4 days	
40°C (104°F)	36 hours	3 days	

Notes:

- Minimum curing time before transport of cargoes with note 4,7,8 or 11: 3 months
- For detailed information on resistance and resistance notes, please refer to the latest issue of the cargo resistance list
- Adequate ventilation must be maintained during application and curing (please refer to INFORMATION SHEETS 1433 and 1434)

Pot life (at application viscosity)		
Mixed product temperature	Pot life	
15°C (59°F)	3 hours	
20°C (68°F)	1.5 hours	
25°C (77°F)	1 hour	
30°C (86°F)	30 minutes	

SAFETY PRECAUTIONS

- For paint and recommended thinners see INFORMATION SHEETS 1430, 1431 and relevant Material Safety Data Sheets
- This is a solvent-borne paint and care should be taken to avoid inhalation of spray mist or vapor, as well as contact between the wet paint and exposed skin or eyes

WORLDWIDE AVAILABILITY

It is always the aim of PPG Protective and Marine Coatings to supply the same product on a worldwide basis.
 However, slight modification of the product is sometimes necessary to comply with local or national rules/circumstances. Under these circumstances an alternative product data sheet is used.