

General Description

CRYLCOAT® E 04810 is a carboxyl functional polyester resin for use with 7% TGIC in the production of powder coatings. Formulations based on CRYLCOAT® E 04810 exhibit outstanding flexibility, excellent outdoor durability, good flow and storage stability.

Saturated Polyester Resin

Preliminary Technical Data Sheet

Product Specification

| | Limits |
|--------------------------------------|---------------|
| Appearance | Pale granules |
| Brookfield Viscosity @ 200 °C, mPa.s | Approx. 3200 |
| Color, b-value | Max. 15 |
| Acid value (mg KOH/g) | Approx. 31 |

Other Properties

| | Typical value |
|-----------------------|---------------|
| Glass transition (°C) | Approx. 63 |

Starting Formulation

| Component | Weight (%) |
|-----------------------|------------|
| CRYLCOAT® E 04810 | 67.90 |
| TGIC | 5.10 |
| Titanium dioxide | 25.55 |
| MODAFLOW® Powder 6000 | 0.70 |
| Benzoin | 0.75 |

Extrusion & Application Conditions

| Extrusion | |
|-------------|--|
| Extruder | Twin screw |
| Speed | 350 rpm |
| Torque | 75 ± 5 % |
| Temperature | 90 to 110 °C |
| Application | |
| Application | 60 micrometer film on 0.5 mm steel panel |
| Spray Gun | Output voltage: 60 kV |
| Curing | 10 min @ 200° C metal temperature |

Film Properties

| Test | Result |
|--|---------|
| Gloss @ 60° (%) | 98 |
| Direct/reverse impact (kg. cm or in. lbs.) | 160/160 |

Shelf Life

Under normal storage conditions (≤30°C), the shelf life of the resin will be 24 months from date of manufacturing. For product older than 24 months, it is recommended to check the acid value and the viscosity every year.

Safety & Environmental Protection

For more information, please refer to the Material Safety Data Sheet.

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