

As with all powder coatings, this product may vary between lot numbers, KV settings, mil thickness, oven temperatures, application equipment, and technique. We recommend a clear topcoat to maintain the appearance and prevent oxidation on metallic powder coatings. Always coat a sample before any production, to determine if this product meets all your requirements.

Product Number and Name: PPB 10828 Merlin's Potions

Suggested Cure Time and Temperature: 10 Minutes at 400°F

As always, the cure time starts when the substrate reaches temperature.

Special Instructions / Notes:

Top Coat Information: Top coats are transparent. The color and brightness of the substrate (surface) under a top coat will affect the finished appearance. To achieve results as seen on the S panel image, the top coat must be applied over a bright silver substrate. Polished Aluminum HSS-2345 or other silver can be used as a base coat to simulate the appearance of a bright silver substrate when one is not present. As always, shoot a test piece first to determine if your desired results will be achieved.

<u>Note:</u> Each additional coat of powder coating will act as an insulator, which will require additional time for the substrate to reach temperature. Extend cure times as needed.

Powder Properties:

Thermosetting Powder Coating Powder type: TGIC Polyester Specific Gravity: 1.26+/-0.05

Storage: Store in a cool dry environment 70° F

Shelf Life: 6-8 Months

Application:

Pretreatment and proper prep to substrate before powder coating is a critical factor in developing maximum corrosion resistance and maximizing the lifetime of the product.

Electrostatic spray to a cold substrate Recommended Mil Thickness: 2.0-3.0 Mils

Equipment information:

Fluidized Hopper Recommended Not Recommended for tribo application Suggested Nozzle: No specific tip is required

Testing parameters are as follows:

- Gloss Units and levels are measured at a 60° angle
- Adhesion is measured on a scale of OB, 1B, 2B, 3B, 4B, 5B, with 5B being the highest achievable rating.
- **Flexibility or Conical Mandrel Bend**: "100% Resistance" is the highest achievable rating and indicates that the coating did not crack or spall.
- Impact Performance Direct/ Indirect is measured on a scale of 0 inch-lbs. to 160 inch-lbs., with 160 inch-lbs. being the highest achievable rating.

Testing Results

Type of Substrate: Mild steel Q panel/ Aluminum Q panel

Cure Method: 10 Minutes at 400°F

Nozzle type used for testing: Conical

Average Mil Thickness of panels: 2.0-3.0 Mils

KV settings-50

Gloss Unit
Gloss Level
High gloss

• Adhesion 5B

Flexibility or Conical Mandrel Bend
Impact Performance - Direct
Impact Performance - Indirect
120 Inch-pounds
120 Inch-pounds

Pencil Hardness
2H-H

PLEASE NOTE

Not all powders are recommended for exterior use, it is the buyer's responsibility to ensure they are purchasing a product that is best suited for the intended application. Certain pigment types, such as those found in the Illusion Series and Transparent powders do not have the same level of UV resistance as those found in Solid Tone finish types.

Exterior tops coats applied to interior finishes may prolong the fading process but <u>DOES NOT</u> ensure a long-lasting exterior finish. Please conduct your own testing to ensure the products you choose meet your requirements.

Applicable for product manufactured after: 2/10/2022 Revisions:

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The information contained in this bulletin we believe to be correct to the best of our knowledge and testing. The recommendations and suggestions herein are made without guarantee or representation as to results. We recommend that you make adequate tests in your laboratory or plant to determine if this product meets all your requirements.