



**PLATINUM PHASE
POLYURETHANE
PU SERIES - POWDER COATING**

Product Description:

Platinum Phase PU Series is a thermosetting powder coating based on specially selected polyester resins and hardener to give a Polyurethane powder coatings. It is developed to satisfy the requirements of Exterior durability with attractive decorative finishes combined with Optimum protective properties. Platinum Phase PU Series offer excellent gloss retention and resistance to color change properties.

Platinum Phase PU Series are available in a variety of colors as per RAL Card, custom made Shades in Glossy, Satin and Matt finishes. Other patterns like Grit Finish, Texture, Wrinkle, Hammer Tone & Metallic Finishes are also available.

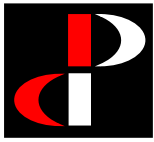
Application Areas:

Platinum Phase PU Series is recommended for Exterior applications. It's available in variety of colors, finishes and gloss levels. Typical application areas are Aluminum Industry, Electric Panel Boards, Air conditioner cabinets, Farm equipment's, Garden Furniture, Playground item, Automobile Accessories, Architectural items, Light Fixtures etc.

Powder Application:

Platinum Phase PU Series can be applied by automatic corona Electrostatic Powder Spray – 40 to 100 KV. Over spray powder can be reclaimed using suitable equipment's and recycled through the coating systems.

Platinum Phase Metallic Powders can be applied by Electrostatic corona spray equipment. However different electrostatic gun types may give different charging characteristics and hence affect the final appearance. Also due to the nature of the product care should be taken, to ensure that the used reclaimed powder has good color and gloss uniformity as well as consistency of metallic effect when compared to original virgin material.



Powder Coating Technical Data Sheet
PLATINUM PHASE SDN. BHD (701635-A)
Consistent Quality & Innovative Creation

Pre-treatment:

Substrate should be free of grease, oil, dirt, finger prints, and drawing compounds, remove all contamination and apply surface treatments to get optimum adhesion and coating performance properties. The use of a chemical conversion coating prior to the application of a powder coating is strongly recommended i.e. Iron or Zinc Phosphate. The recommended types of pre-treatments for the most frequently used substrates are:

<i>For Steel</i>	-:	<i>Iron or Zinc Phosphate</i>
<i>For Galvanized Steel</i>	-:	<i>Chromate treatment</i>
<i>For Aluminium</i>	-:	<i>Chromate treatment (DIN 50939)</i>

Powder Properties:

Chemical Type	-:	Polyurethane – PU Series
Gloss @ 60° (ASTM D-523)	-:	Glossy - 90 ± 10 % Reduce Gloss - 70 ± 10 % Semi- Glossy - 50 ± 10 % Matt - 30 ± 10 % Extra Matt - ≤ 20 % Sand Texture - 16 ± 15 %
Particle Size (ISO 13320)	-:	65 ± 5% above 32 micron sieve
Specific Gravity (ISO 8130)	-:	1.2 – 1.8 (Depending upon the colour & Finishing)
Theoretical Coverage	-:	8 – 13sq. meters/kg (as per Dry Film Thickness, Specific Gravity & Transfer efficiency)
Recommended Curing Schedule	-:	200°C x 10Min
Film Thickness	-:	For Smooth Finishing :- 60 - 90 micron For Texture Finishing :- 80 – 140 micron



Powder Coating Technical Data Sheet
PLATINUM PHASE SDN. BHD (701635-A)
Consistent Quality & Innovative Creation

Mechanical Testing:

• Cupping Test	(ISO 1520)	-:	5mm Pass (No surface cracking)
• Impact Test Direct	(ISO 6272)	-:	50 kg/cm (No surface cracking)
• Impact Test Indirect	(ISO 6272)	-:	50 kg/cm (No surface cracking)
• Adhesion	(ISO 2409)	-:	GT = 0 (2 mm square)
• Pencil Hardness	(ASTM D 3363)	-:	H Pass (No pencil marks)
• Conical Mandrel	(DIN53152)	-:	0~3 mm Pass (No surface cracking)

Corrosion Testing:

NACL 5% Salt Spray (ASTM B117)

After 1000 hours : No blistering;
No undercutting

Humidity (ASTM D2247)

Min 500 hours : No blistering;
No undercutting

Accelerated Weathering (ISO 11507)

UVA-340 (After 1000 hours) : Excellent gloss retention;
Color stability.

Storage Conditions: Store Powder in a Dry cool condition. Do not exceed 33°C. Keep powder in packed condition if not in use to avoid contamination and moisture. Do not mix with any other Powder.

The information in this Data Sheet is the outcome of our research work and experience. The information contained herein is believed to be accurate but cannot be taken as a formal warranty. According to the policy of PLATINUM PHASE SDN BHD, the results are subject to change without notice. It is recommended to check the product carefully prior to application.

Platinum Phase Sdn.Bhd (HQ). Plot 155, Jalan PKNK Utama, Kawasan Perusahaan Taman Ria Jaya, 08000 Sungai Petani, Kedah, Malaysia.
Tel: +604-4428018; Fax: 604-4428028