## SHERWIN-WILLIAMS. General Industrial Coatings

BOND	PE/P	/Q	MIC
BOND	PE/P/Q 80+	/-10GL	serie115

Group	115 - Polyester Architectural – Bonded Metallic (Without Aluminium)
Curing	min: 170°C @ 20' to 40'   max: 200°C @ 8' to 12'
Surface	Metallic smooth
Gloss	Visual gloss
Approvals	Qualicoat class 1 category 3 (licence P-0554)  GSB : Florida 1 Quality (152 g)

## **PRODUCT DESCRIPTION**

A metallic TGIC-free thermosetting polyester powder coating featuring excellent resistance to UV radiation and outdoor weathering.

The powder forms a protective and decorative film with enhanced outdoor resistance.

PE/P/Q Mic is designed to protect aluminum and galvanized steel components used in the fenestration industry and carry GSB (l.152g) and Qualicoat class 1 category 3 (license P-0554) certification

Typical applications are door, window and cladding installations on domestic and commercial buildings.

The metallic effect pigment is incorporated into the product by means of a bonding process for optimum application and reproducibility.

In high traffic areas a clearcoat can be applied to prolong the aesthetics of the coating.

### Storage Life:

Store at temperatures lower than 30°C. Storage life in original package: 24 months.

## **CHARACTERISTICS**

Spec. Gravity (κg/I): 1,25 – 1,80 Theoretical Coverage @60um: 11 m<sup>2</sup>/kg

**Recommended film thickness:** Dry: 60 - 80 μm

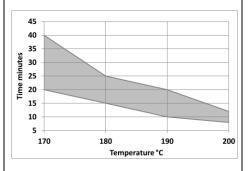
**Reaction To Fire EN 13501-1** Classification: A2-s1,d0

### APPLICATION

Suitable for automatic and manual electrostatic application Please contact your Sherwin-Williams representative to discuss tribo-static application

# Curing Cycle

Time	Substrate temperature			
8 - 12 min	200°C			
10 - 25 min	190°C			
15 - 25 min	180°C			
20 – 40 min	170°C			



## CHEMICAL RESISTANCE

Immersion method for 48 hours at ambient temperature into:

CHEMICAL	RESULT
Hydrochloric acid 10 %	intact
Nitric acid 30 % matt,	but washing off
Saturated hydrogen sulp	hide intact
Hydrogen peroxide 40 vc	olumes intact
Ammonium hydroxide 10	)% intact
Ammonium hydroxide 33	3 % intact
Sodium hydroxide 5 %	intact
Tartaric acid 5 %	intact
Sodium hydroxide 5 %	intact
Citric acid 5 %	intact
Lactic acid 5 %	intact
Ethanol	intact
N-butanol	intact
Petroleum ether s	lightly softened

#### SUBSTRATE PREPARATION

The surface treatment should be chosen according to the type of substrate and the required performance.

The surface to be coated must be free from oxidation, oil, grease or any other form of contamination.

A good quality pretreatment process is recommended for optimum performance, certified products can be found via Qualicoat, GSB or Qualisteelcoat.

Final user should select the proper pretreatment based on corrosion resistance performance.

Where required, the corrosion resistance can be enhanced using a primer system.

		Substrate			
Pretreatment		Aluminum	Steel	Galvanized Steel	Metallized Steel
	Cr-free (Zr, Ti, Oxilanes or alternatives)	~		1	
	Pre-anodising	✓			
Chemical	Chromate	✓		~	
	Phospho- chromate	∢			
	Iron phosphate		~		
	Zinc phosphate		~	~	
	Nano-ceramic		✓		
Mechanical	Sand blasting		~		
	Soft blasting			~	✓
	Sweeping			✓	✓





## PERFORMANCE DATA

A 60um coating applied to an aluminum test panel (ALQ-36) cured 15' @ 180°C satisfied the following requirements,

Buchholz indentation test: more than 90 UNI EN ISO 2815

Erichsen cupping test (mm): more than 5 UNI EN ISO 1520

Direct impact test (cm.Kg): more than 25 ASTM D 2794; ISO 6272-2:2002

Reverse impact test(cm.kg): more than 25 ASTM D 2794; ISO 6272-2:2002

Cylindrical mandrel size 5: does not break UNI EN ISO 1519

Crosscut adhesion (2mm) (GT): Class 0 UNI EN ISO 2409

Acetic salt fog test: Meets Qualicoat and GSB International Requirements UNI ISO 9227

Resistance to humidity: (Humidity test) 1000 hours no blistering, infiltration from the cross of max 1mm UNI EN ISO 6270-2:2005

Accelerated Weathering: 1000h Xenon-arc ≥ 50% gloss retention According with Qualicoat cycle (ISO16474-2)

300h UV-B: ≥ 50% gloss retention According with GSB cycle (ISO16474-3)

## CAUTION

## FOR INDUSTRIAL SHOP APPLICATION

Thoroughly review product label and Safety Data Sheet (SDS) prior to using this product.

A Safety Data Sheet is available from your local Sherwin-Williams facility or distributor

Note: Product Data Sheets are periodically updated to reflect new information relating to the product. It is important that the user obtain the most recent Product Data Sheet for the product being used. The information, rating, and opinions stated here pertain to the material currently offered and represent the results of tests believed to be reliable. However, due to variations in user handling and methods of application which are not known or under our control, The Sherwin-Williams Company cannot make any warranties as to the end result.