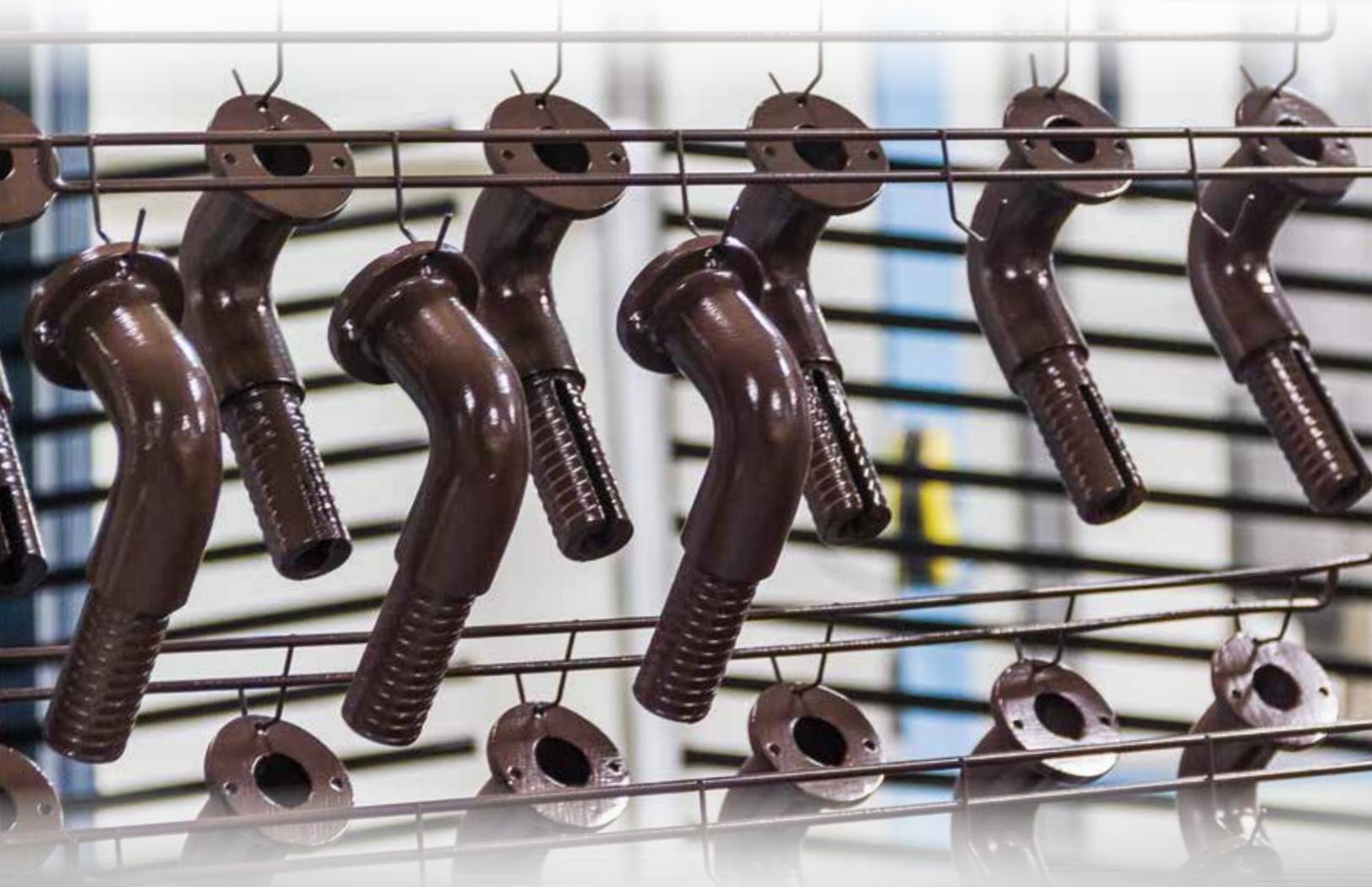


Key-Link

Fencing & Railing

POWDER COATING PROCESS

AAMA 2604 & 2605 Standards



EXCEPTIONAL VERSATILITY • INNOVATIVE SOLUTIONS

POWDER COATING PROCESS

Using AAMA 2604 & 2605 powder coating specifications:

Our powdering coating process is designed to meet or exceed the AAMA 2604 powder coating standard. AAMA 2605 is available if special ordered.

Architects and building owners should determine which performance specification is required, along with the finish color. In order to ensure the powder coat performance expected for a given application, one of two AAMA specifications should be referenced: AAMA 2604 and 2605.



1

LOADING AREA

Aluminum parts are loaded evenly onto a horizontal hanger that is placed on a conveyor in preparation for a 5-stage pretreatment wash.

2

5-STAGE WASH

The 5-stage pretreatment wash consists of cleaning the aluminum so that it is free of any organic and inorganic contaminants. This system provides superior pretreatment to the aluminum parts for the powder coating final quality, appearance, and performance.

3

DRYING OVEN

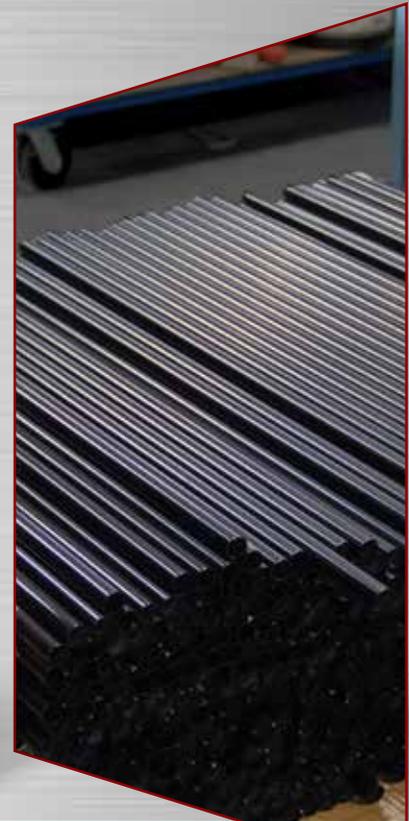
The aluminum is sent through the drying oven where any moisture from the pretreatment stage is removed. Parts normally spend 2 to 4 minutes in the oven around 380 - 420 degrees.

AAMA 2604

AAMA 2604 powder coatings are formulated with super durable or modified polyester resins. This finish provides good color and gloss retention for approximately five years of exposure.

AAMA 2605

AAMA 2605 is the high-performance exterior specification. These finishes are resistant to moisture, weathering, ozone and UV radiation. An application for this finish would include architectural projects that require long term cosmetic & functional protection (approx. 10 yrs).



4

COATING BOOTH

The conveyor then moves the aluminum through the powder coating booth at a steady rate so that the application guns cover the aluminum properly in order to meet the AAMA 2604 & 2605 standards.

5

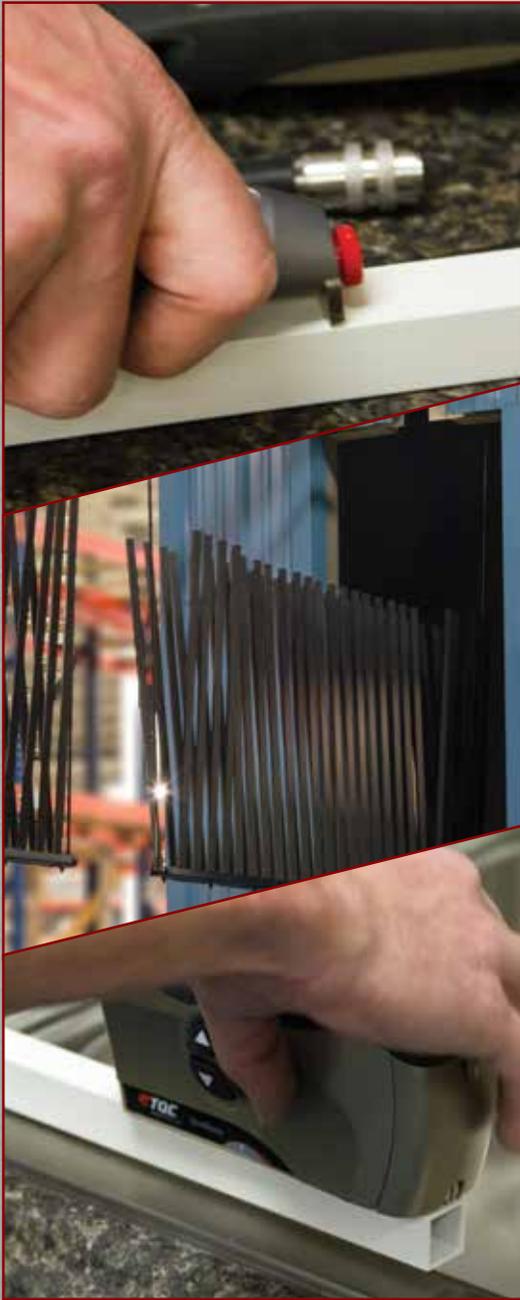
CURING OVEN

The powder is cured for 8 to 10 minutes at around 330 - 460 degrees depending on color and the parts density.

6

UNLOADING AREA

When the aluminum is cooled, it is unloaded and packed for shipment and delivery to the customer. Parts are also put through a testing process to ensure the powder coated aluminum meet or exceed AAMA 2604 & 2605 standards. (See back page for details)



TESTING PROCESS

The powder coat is tested daily for corrosion resistance and coating adhesion according to industry-standard specifications. It is also tested in an accelerated weathering environment for several thousand hours to test weathering quality.

	2604	2605
Corrosion	(after 3000 hours)	(after 4000 hours)
Humidity	Blisters size 8	
Salt Spray	1-2mm creepage, blisters size 8.	
Weathering	(5 yrs. S. Florida)	(10 yrs. S. Florida)
Color Change	Delta E <5 (i.e. about 5% fade)	
Gloss	Minimum 30%	Minimum 50%
Chalking	Better than #8 (ASTM D 4214)	

After 5 years (10 for AAMA 2605) of outdoor installation in conditions like southern Florida the powder coated products should have almost no color change and exhibit very little chalking.

Periodic cleaning with mild soap & water will enhance it & help to protect it from harmful agents.

Southern Florida is used because the environment there is harder on powder coated products than some environments, as it has both intense sunlight and high humidity.

150 Orlan Road | New Holland, PA 17557



DEALER
Item# DIPCSI

