

**Product Group**

Polyurethane Topcoats

**Characteristics**



Product Information

Aerowave® 5001 is a low and semi gloss gloss, water-based, 3-component, isocyanate cured polyurethane finish for interior and exterior use.

- Waterbased technology
- Compatible with all products out of the Aerowave® Series
- Low VOC emission
- Excellent appearance, MAR resistance and durability
- CARC resistance to STANAG 4360 Issue 2
- Infrared reflecting (IRR)
- Resistance to aircraft hydraulic fluids and chemicals

Aerowave® 5001 is a product part of the Aerowave® Series which utilizes the latest water based technology and sets the standard for minimum process times, reduced process cycle costs and environmental care.

**Components**



Hardener  
Thinner or  
Activator

Curing Solution 6002  
D.I. water or tap water\*

\*) Quality meets Council Directive 98/83/EC of 3 November 1998 on the quality of water intended for human consumption.

**Specifications**



Qualified  
Product List

Eurofighter SP-J-513-C-0083 (performance)

For most recent up-date or missing specifications please check the qualified product list (QPL) on [www.anac.com](http://www.anac.com)

**Surface Conditions**



Cleaning

- Observe the recoatability limits of the relevant primer.
- Aerowave® 5001 is compatible with all products out of the Aerowave® Series.
- Remove oil, grease and other contaminations carefully prior to application of the finish.
- Recondition aged primers or topcoats with e.g. Scotch-Brite™ type A very fine to a uniform matt surface.
- Remove dust with e.g. tack rags prior to application of the primer.

**Instruction for Use**



Mixing Ratio  
(volume)

	Volume (v/v)	Weight (w/w)
Aerowave 5001	100 parts	100 parts
Curing Solution 6002	30 parts	25 parts

Reduce to spraying viscosity with maximum:

D.I. water or tap-water	20 parts	20 parts
-------------------------	----------	----------

- Allow products to acclimatize to room temperature before use.
- Shake or stir the Aerowave® 5001 till all pigment is uniformly dispersed before adding hardener.
- Add Curing Solution 6002 and stir the catalyzed mixture thoroughly for at least 2 minutes; mechanical mixing is preferred.
- Add D.I. water or tap water and stir again till a homogeneous mixture for at least 2 minutes.



Induction Time

Not applicable. Product can be used directly after mixing.



Initial Spraying Viscosity (21°C/70°F)

70 – 90 seconds ISO-Cup 4.  
32 – 40 seconds Gardner Signature Zahn-Cup #2

**Note:** Stir or shake the *mixed* components thoroughly shortly before measuring the viscosity.



Potlife (21°C/70°F – 55% RH)

2 hours



Dry Film Thickness (DFT)

35 – 55 µm  
1.6 – 2.2 mil



Note

Respect described potlife. Potlife depends upon temperature!

## Application Recommendations



Conditions

Temperature: 15 – 35°C  
59 – 95°F  
Relative Humidity: 25 – 80%



Note

Aerowave® 5001 may be applied in conditions outside of the the limits shown above. Care must be excercised to ensure a satisfactory result. Please contact your local ANAC representative to determine the proper application techniques when environmental conditions fall outside of the recommended range.



Equipment

Air 1.2 – 1.4 mm nozzle orifice  
HVLP 1.2 – 1.4 mm nozzle orifice  
Air Electrostatic\* 1.2 – 1.5 mm nozzle orifice  
Airless/Air Assist .009 - .013 inch, angle 40° – 60°



Note

\*) Use Electrostatic spray equipment designed for application of water based products

To avoid contamination of water based – solvent based coating products it is advised to use dedicated water- / solvent-based spray equipment. For application of water based products use non corrosive spray equipment (e.g. stainless steel).



Number of Coats

Spray an homogeneous uniform wet coat, followed after 2 – 10 minutes flash-off time by another uniform wet coat.



Cleaning of Equipment

Clean the equipment with water directly after use. If necessary, semi-cured material remaining on the equipment can be cleaned with Solvent Cleaning C28/15 or Solvent Cleaning 98068.



Note

The way of application, skills and experiences of the painter and surrounding conditions (temperature, relative humidity, airspeed) significantly affect the final appearance and dry film thickness. When using the product for the first time it is strongly recommended to apply some test panels first.

**Physical Properties**



Drying Times

	21°C/70°F -	70°C/158°F*
	55% RH	
Surface dry	3 hrs	30 min
Dry to handle	10 hrs	60 min

\*) Substrate surface temperature

When forced cured; allow the paint a 15 - 30 minutes ambient flash-off time with sufficient air movement before entering the oven in order to obtain the best results.

Recoat minimum                      When surface dry

Recoat maximum                      48 hrs.  
If a drying time of 48 hrs is exceeded  
recondition the surface with e.g. Scotch-Brite™ type A very fine



Note

Curing of waterborne products depends on temperature, relative humidity and air flow. Increased temperatures, low RH and efficient airflow can decrease the drying times significantly.



Theoretical Coverage

9 m<sup>2</sup> per liter base material at 50 µm dry film thickness



Dry Film Weight

<1.5 g/m<sup>2</sup>/µm  
<0.0078 lbs/ft<sup>2</sup>/mil



Volatile Organic Compounds

≤ 120 g/L (1.0 lb/gal), product ready to apply  
≤ 250 g/L (2.1 lb/gal), exempt water according to ASTM D-3960



Gloss (60°)

Matt finish: < 5 g.u. at 60° angle  
Semi gloss finish: 15 – 25 g.u. at 60° angle



Color

Available colors on request



Flash-point

Aerowave® 5001	>21°C / 70°F
Curing Solution 6002	>21°C / 70°F



**Storage**

Store the product dry and at a temperature between 5 and 25°C / 41 and 77°F. Stored in the original unopened containers. Periodical short time exposure (max. 48 hrs at a time) to higher temperatures (max. 40°C / 104°F) will not negatively influence the shelf life of the products.

Shelf life  
(21°C/70°F and  
55% RH)

Aerowave® 5001	12 months
Curing Solution 6002	18 months



**Note**

**Do not seal the containers with the paint mixture. Danger of pressure build-up!**

**Safety Precautions**

Comply with all local safety, disposal and transportation regulations. Check the Material Safety Data Sheet (MSDS) and label of the individual products carefully before using the products. The MSDS's are available on request.

**FOR PROFESSIONAL USE ONLY**

**IMPORTANT NOTE** The information in this data sheet is not intended to be exhaustive and is based on the present state of our knowledge and on current laws: any person using the product for any purpose other than that specifically recommended in the technical data sheet without first obtaining written confirmation from us as to the suitability of the product for the intended purpose does so at his own risk. It is always the responsibility of the user to take all necessary steps to fulfill the demands set out in the local rules and legislation. Always read the Material Data Sheet and the Technical Data Sheet for this product if available. All advice we give or any statement made about the product by us (whether in this data sheet or otherwise) is correct to the best of our knowledge but we have no control over the quality or the condition of the substrate or the many factors affecting the use and application of the product. Therefore, unless we specifically agree in writing otherwise, we do not accept any liability whatsoever for the performance of the product or for any loss or damage arising out of the use of the product. All products supplied and technical advice given is subject to our standard terms and conditions of sale. You should request a copy of this document and review it carefully. The information contained in this data sheet is subject to modification from time to time in the light of experience and our policy of continuous development. It is the user's responsibility to verify that this data sheet is current prior to using the product.

Brand names mentioned in this data sheet are trademarks of or are licensed to Akzo Nobel.  
Scotch-Brite is a trademark of 3M.

**Address**

Akzo Nobel Aerospace Coatings, a division of International Paint LLC (USA), East Water Street, Waukegan, IL 60085, USA  
Akzo Nobel Aerospace Coatings BV, Rijksweg 31, P.O. Box 3, 2170 BA Sassenheim, the Netherlands  
Internet: [www.anac.com](http://www.anac.com)