

TOPCOAT XS4201 HIGH GLOSS

COATINGS FOR AIRCRAFT STRUCTURE PROTECTION

AkzoNobel

Product information



High solid polyurethane 2K topcoat for external and structural application.

XS4201 is available in high gloss, semi-gloss and matt version (for matt and semi-gloss version see corresponding TDS)

Components



Base XS4201

Hardener / Catalyst XS4201

Thinner P2

Specifications



Product information mentioned in the technical datasheet is given for information purposes and can differ from requirements of specifications above. In that case, customer requirements are valid for your application.

Physical properties



THEORETICAL COVERAGE

11 m²/L for 50µm dry - 120 ft²/L for 2 mils dry (base and hardener undiluted)

DRY FILM WEIGHT

1.45 for white base

VOC

420 g/l or 3.5 lb/gal (ISO11890-1 and ASTM D 3960)

SHELF LIFE / STORAGE

18 months for the base and hardener stored between 5°C and 35°C (41°F and 95°F) in full and sealed original packaging.

48 months for thinner P2 stored between 5°C and 35°C (41°F and 95°F) in full and sealed original packaging.

GLOSS LEVEL

> 90 GU at 60°

NOTES

Flash Point : 24°C (75°F) for the base and 170°C (340°F) for the hardener

Gloss levels have been determined using glossmeter with an angle of incidence of 60°.

The theoretical consumption value doesn't take into account the transfer efficiency for spray application

Surface preparation



XS4201 must be applied on an appropriate primer according to substrate used and protection required.

XS4201 is compatible with the following primer SP350, P60-LC, P65-HG, F69, HB215, and the PU system Phosmap 11 and Isomap P23.

The XS4201 top coat is intended for use on metallic substrates (steel, aluminium alloys) coated with a surface treatment (anodisation, conversion) and

an epoxy primer for adhesion and corrosion protection (such as MAPAERO SP350 chrome free primer).

Application of SP350 primer --> See SP3500 Technical Data Sheet on our website.

All the recommendations mentioned above are given for information.

TOPCOAT XS4201 HIGH GLOSS

COATINGS FOR AIRCRAFT STRUCTURE PROTECTION

AkzoNobel

Instructions for use



SPRAY APPLICATION

Base
Hardener / Catalyst
Thinner

Mixing ratio by volume

4 V
1 V
0.5 V to 1 V

MIXING PROCEDURE

Ideally, the unmixed products should be stored between 18°C and 25°C (64°F and 77°F) for 24 hours before use. The XS4201 base should be mixed for 5 minutes in a pneumatic or oscillating mixer before use. Mix the base, hardener and thinner until the mixture is homogenous. Preparation should be carried out between 15°C and 35°C (59°F and 95°F). Sieve the mixture with a 125-190 µm mesh

INDUCTION TIME

None

Spraying viscosity at 20°C / 68°F

Zahn 2 Cup **ISO 4 Cup**

35 ± 7s 45 ± 10s

For Black, White and Grey Colors, dilution of 0.5 V is recommended.
For bright colors, a dilution of 1 V is recommended.

POT LIFE

4 hours

NOTE

Viscosities mentioned above are corresponding to the recommended range of viscosity to ensure compliant application. The range of dilution must be used to adjust viscosity to reach the recommended one.

TOPCOAT XS4201 HIGH GLOSS

COATINGS FOR AIRCRAFT STRUCTURE PROTECTION

AkzoNobel

Application recommendations



CONDITIONS

Temperature 15°C to 35°C (59°F to 95°F)
Relative humidity 20% to 80%

EQUIPMENT

Gravity compressed air gun Nozzle 1.5 to 1.8 mm

DRY / WET FILM THICKNESS

40 to 80 µm (1.6 to 3.2 mil) dry / 80 to 160 µm (4 to 7 mils) wet for 0.5V dilution

NUMBER OF COATS

Apply 2 layers as crossed coats. Let it dry for solvent evaporation for 30 minutes and apply again 2 layers as a crossed coats

EQUIPMENT CLEANING

Clean the equipment with an appropriate cleaning thinner such as MAPAERO D713 or P2 or cetonic solvent.

NOTE

Spray with dry, oil-free air.

For topcoat buffing, it is recommended to start with wet sanding using P3000 grade (not coarser grade).

Drying times



Dust free

Dry to handle

Fully Cured

23°C (73°F)

1 Hour

6 to 8 Hours

7 days

50°C (122°F)

N.A.*

4 Hours

24 Hours

60 ° C (140°F)

N.A.*

3 Hours

12 Hours

NOTE

Drying times have been determined using test pieces of a thickness <2 mm for 50µm (2 mils) dry film.

*N.A. : Not Applicable

Defects & corrections



In the event of a defect, contact your Quality Department.

Health & Safety



See the product Safety Data Sheet.

The MSDS are available through our website www.mapaero.com upon request.

Packing



The base is available in 1 and 4 L.

The hardener is available in 1 L and 5 L.

The thinner is available in 1 L and 5 L.

WARRANTY : We guarantee our products against hidden defaults over material and preparation. Our Responsibility is limited to the obligation of freely replacing the defective material without there being a claim for any compensation. The advice we give is based on our experience but it might not be absolutely right. Consequently this does not imply our responsibility in case of inefficiency. Furthermore our company cannot be responsible for any material or corporal damages caused due to a misuse or mishandling of our products. Any concession to these clauses, to be valid, must be an official document issued by our offices and signed by our direction.