

## Clearcoat U-Sil 120 GL

## 1-pack polysiloxane urethane coating material

Product description: Clearcoat U-Sil 120 GL is a coating material based on sol-gel

technology with very good corrosion protection. The stable hydrophobic surface decreases soiling and improves the easy-to-

clean features.

Fields of application: light metal surfaces (Al, Anodized Al, Mg, window and door frames),

Stainless Steel, heat-exchangers

**Product features:** - one coat paint

- DTM (direct-to-metal) coating

- transparent

- doesn't contain alcohol (Methanol)

- no cromating is required

- resistant against humidity and temperature changes

- chromate and lead-free

- stable under alkaline conditions (pH 12.5)

**Product data:** 

Color: colorless transparent, glossy

**Delivery form:** 1kg can

25kg hobbock

200kg steel drum

Shelf life: At least 6 months in closed original can, stored at cool, dry

conditions.

**Technical data:** 

**Type of binder**: Polysiloxane-Urethane-Resin

**Solid content:** approx. 40 % non-volatile matter (theoretical value)

**Density:** 1.015 g/L



**Consumption:** The needed consumption depends on the roughness of the surface

and application method and is about 20 g/m².

Temperature resistance: -20°C to +250 °C

Chemical resistance: resistant against a range of organic solvent and base chemicals

Salt spray test DIN 50021-SS	> 1.500 h pass, no damage No delamination or corrosion at scribe
Condensation water test DIN 55017 KK	9 weeks (1.512 h) No blisters, no corrosion
Cross cut adhesion test DIN EN ISO 2409	GT/TT = 0
Accelerated weathering according to DIN EN ISO 16474-3 (Method A, Cycle 1)	after 1.000 h no color/gloss changing no blisters, corrosion or delamination
Degree of gloss	High gloss
Contact angle (water)	104°
formability / T-Bend Test DIN EN 13523-	No cracks, TO to T3
Filiform corrosion test DIN EN 3665	After 500 h No damage
MEK-Test >100 DH with nonwoven DIN EN 13523-11	> 100 DH, passed test

## **Processing:**

Surface treatment: Depends on the coated surface. In any case the surface must be free

of dirt, dust and grease.

We recommend alkaline cleaning for Aluminum, Magnesium and

Stainless Steel.

Application: Spraying

Nozzle size: 0.8 - 1.5 mmSpray pressure: 2.0 - 2.5 bar

Dip or flood

Drying: 140°C / 40 min

160°C / 30 min 180°C / 10 min 250°C / 2 min

(object temperature!)

Coating thickness:  $3 - 10 \mu m dry$ 



Cleaning of tools: thinner for 2 component paints

The given data is for guidance only and is not a legally binding guarantee. The product has the properties described above. The product information can and is only intended to provide non-binding advice.

Stand: Avril 2020

NTC Nano Tech Coatings GmbH, Marpinger Weg 2, 66636 Tholey, Germany, Tel.: +49 6853 96111-00, info@ntcgmbh.com