



Technical Data Sheet U-Bond 309 TFC
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U-Bond 309 TFC

One-part polyurethane fast curing translucent paste adhesive

DESCRIPTION

U-Bond 309 TFC is a one-part, solvent-free moisture curing polyurethane paste fast setting translucent adhesive suitable for flexible bonding of wood, wood derivatives and different construction materials for general assembly. Thixotropic, is suitable for vertical applications without sagging. Excellent resistance to water, temperatures, weathering and ageing conditions according to EN 204 D4.

Compliant to:

EN 204 D4
LEED iEQc 4.1; SCAQMD Rule 1168; BAAQMD Reg 8 Rule 51
CARB VOC levels regulation

AREAS OF APPLICATION

U-Bond 309 TFC is suitable for general material assembly through fast setting beading application, outdoor applications for woodworking, structural bonding of wood and derived products; chipboard, plywood, high pressure laminate, insulating materials like XPS, PU and PVC rigid foam, GRP, metals, aluminum, stainless steel, galvanized steel, construction materials like natural stone, marble, ceramics. Ideal to bond with invisible bonding line for its translucency.

FEATURES

- One-component polyurethane
- Translucent, for invisible bonding line
- Very fast setting
- Cold applied, gun grade
- Easy-to-use, non-sagging
- Very low foaming with high filling capacity
- Excellent adhesion on numerous substrates like insulating material, wood, plastic and metal
- Solvent free – Odorless
- Weathering resistance according to DIN 204 D4
- Resistant to ageing
- Resistant to chemicals



TECHNICAL DATA

Appearance	Non-sag thixotropic paste
Color	Translucent
Chemical nature	Polyurethane
Curing Mechanism	Moisture-curing
Density [g/cm ³] (NPT method 06) (23°C and 50% RH)	ca. 1.13
Film formation time [min] (23°C and 50% RH)	ca. 8
Film formation time [min] (23°C and 50% RH + water spray)	ca. 5
Initial setting time [min] (23°C and 50% RH)	ca. 15
Final setting time [h] (23°C and 50% RH)	ca. 24
Shear strength [N/mm ²] (EN 205 D1; beech tree /beech tree)	≥ 10
Shear strength [N/mm ²] (EN 205 D4; beech tree /beech tree)	≥ 4
Application temperature [°C]	From +5 to +40
Temperature Resistance [°C]	From -40 to +100

APPLICATION

The surfaces to be treated should be perfectly clean, dry and free from dust and grease. It is necessary to treat the bonding surface according to NPT application guidelines, eventually using a specific CLEANER or ACTIVATOR from NPT range. It is advisable to carry out preliminary adhesion tests on the support.

Apply on one side with a caulking gun or spread on substrate with a spatula. Fix the substrates to be bonded until the adhesive is completely cured, the use of clamps is recommended. The adhesive hardens up with environmental moisture and the moisture contained in the material; in order to guarantee a controlled hardening, when bonding nonabsorbent materials or materials with < 8% humidity, is recommended to vaporize water (approx. 10g water/m² for 150g adhesive/m²). U-Bond 309 TFC slightly swells (foams) during the setting process. For the bonding of non-absorbent surface layers, please take care that no air is included when joining the surfaces.



CLEANING OF EQUIPMENT AND PERSONAL PROTECTIVE MEASURES

Clean the tools used with acetone or solvent. When the adhesive has not yet hardened, it can be removed using paper or a cloth. Once hardened, the product can only be removed mechanically. Avoid skin contact by using latex, rubber or polyethylene gloves. If it comes in contact with the skin, remove immediately and wash with soap and water.

PACKAGING

PE cartridges 310ml - 12 pieces per box
200lt Drums

STORAGE AND SHELF LIFE

U-Bond 309 TFC can be stored for 12 months in its original packaging (unopened container) between 10°C and 25°C in a cool, dry place. The storage temperature should not exceed 25°C for extended periods of time. Keep away from wet areas, direct sunlight and heat sources.

GENERAL INFORMATION

The information contained in this technical data sheet is to the best of our knowledge correct, being based on our knowledge and experience to date and cannot be used as a guarantee, due to the various different materials present on the market and the fact that the application conditions are not under our direct control and supervision. NPT srl, however, guarantees constant product quality. NPT srl, has the right to modify or up-date this technical data sheet according to requirements. Customers are kindly requested to verify that they are in possession of the latest version.

ALWAYS CONSULT THE MATERIAL SAFETY DATA SHEET BEFORE USING THE PRODUCT