**PU Acrylate Waterproof Coating for Roofs** 



### **TECHNICAL DATA SHEET**

TRUBUILD ROOFTECT ADVANCED is a single-component, waterproofing system with unique PU acrylate-based formulation which provides excellent barrier against water and heat. It forms a seamless waterproofing membrane which has excellent elongation with good crack-bridging capacity and excellent reflectance properties. Hence, it forms exceptional waterproofing coating system with good durability.

#### **ADVANTAGES**









- ➤ Excellent waterproofing system ➤ Improved bond
  - strength
- > Excellent weather resistance

- > Durable coating
- ➤ Excellent resilience to ➤ Reduces surface thermal stress
  - temperature up to 10°C



#### **AREAS OF APPLICATION**







#### Waterproofing of roofs with

- Brick bat coba
- Sloppy roofs / flat roof
- Cement mortar screed
- China mosaic & tile roof embedded in RCC
- For miscellaneous surface, contact Trubuild technical service team

NOTE - For china mosaic and other roof tiles, use Trubuild Primesure Premium Primer.

# **AVAILABLE PACKING**

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#### **HOW TO USE**

#### **SURFACE PREPARATION**

- Remove the loose and unsound materials, oil, dirt, debris from the substrate.
   Remove all the previous waterproofing coatings if any, by mechanical means to avoid failure of any subsequent upcoming waterproofing coatings.
- Fill all the existing cracks up to 5 mm by making "V" groove and then filling it with Trubuild CFP 425 & for cracks larger than 5 mm use Trubuild WPL 333/Trubuild BWP 222 for making Polymer modified mortar and then fill it.
- Then make angle fillet at wall and slab junction with the help of Trubuild BWP 222 (10-12% of cement weight in mortar) and repair all the patches and joints with Trubuild Non-Shrink Grout HS and make surface sound.
- Suitable slope of 1:80 to 1:100 should be maintained on the substrate to discharge run-off water completely.
- Stagnant water due to undulation in the roof surface must be highlighted and repaired with polymer modified mortar.
- Ensure that all the penetration points, mechanical equipment, HVAC & solar panels
  are suitably placed on the upstand and rounded with angle fillet and Resipro High
  Strength Hybrid Sealant.
- For china mosaic and other roofing tiles like ceramic, marble, clay, granite, etc. should be firmly bedded, primed and grouted with Trubuild Primesure Premium before application of Topcoat.
- Mix the Trubuild Non-Shrink Cementitious Grout/ Trubuild Tile Grout with Trubuild BWP 222 and make the desired consistency to fill the joints & cracks up to 5 mm.
- Fill the tile joints with spatula or putty knife and buffing. Cleaning should be done
  within 1-2 hrs for removal of any residue after work. Cracks up to 5 mm over china
  mosaic roof tiles surface must be cut and filled with Trubuild CFP 425.

#### **APPLICATION**

- Before application of Trubuild Rooftect Advanced, a self-priming coat (50% water dilution by weight) on the substrate should be applied. During self-priming, it is to be ensured that the substrate should be in Saturated Dry Condition (SSD).
- The coverage of primer coat will be approx. 9-10 sqmt./ per L depending upon the substrate conditions. Allow it to dry minimum for 4-6 hrs.
- If the substrate is smooth or needs to have more bond strength then as a primer,
   Trubuild Primesure Premium can be recommended as an expert solution with coverage of 120-150 sqft./L/coat without dilution by brush.
- After drying of Primer coat, apply 1st coat of Trubuild Rooftect Advanced horizontally without any dilution at the rate 2-2.2 sqmtr/L/coat. Allow the first coat to dry for minimum 4-6 hours.
- During application of Trubuild Rooftect Advanced, first coat over joints a 45 to 50 GSM fibre mesh can be recommended as a sandwiched layer between first and second coat to enhance tensile properties of the coating.
- · Then apply 2nd coat vertically without any dilution
- · Allow the system to air cure for minimum 7-10 days

#### **TECHNICAL DETAILS**

PROPERTIES	STANDARD	RESULTS
Solid content (%)	ASTM D 1644:01	60±2
Density (Gm/cc)	ASTMD D 1475:13	1.26±0.01
Elongation (%)	ASTM D 412:2016	≥220
Tensile strength (Mpa)	ASTM D 412:2016	≥2
Crack bridging (mm)	EN 1062-7:2004	Up to 2
Pull of adhesion (Mpa)	ASTM D 4541:2017	≥2
Water absorbtion (%)	ASTM D 471:16a	<7
Water vapour transmition (Gm/m²/24 hr)	ASTM D 1653:13	110
DFT, microns		450 - 500
SRI	ASTM E 1980-19, EN 12898:2019, EN 673:2011 & EN 410:2011.	107
UV resistance	ASTM D4587	Excellent

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VER NO. 1.1

#### **ADDITIONAL INFORMATION**

#### **LIMITATIONS & PRECAUTIONS**

- Prior to using Trubuild Rooftect Advanced, ensure previous waterproofing treatment is completely removed and cleaned.
- Avoid application of Trubuild Rooftect Advanced if the substrate temperature is less than 10 °C or greater than 40 °C and the RH value should not exceed 75%
- Ensure forced consumption of material to achieve all the properties.
- Mix well after opening container using low RPM paddle mixture to get a homogeneous mix.
- Avoid application during intermittent rain or on surfaces with standing/run off water
- Pond test should be conducted after air curing of the coating for minimum 7-10 days.
- Ensure the coating applied on roof surface is free from any standing water.
- Application of Trubuild Rooftect Advanced should be avoided in any water retaining structure.
- Consumption of all the material should be done in a single go once it is opened to avoid any contamination.
- Do not mix any emulsion or water to it, as this will decrease the durability and performance of the coating.
- Always use brush and roller for coating application.
- Do not keep material under direct sunlight. Always keep it in shade and close the lid for keeping it air tight to avoid skinning.
- Take out a sufficient quantity of material from the container which you can consume within 15-30min.
- Coating should be applied on a sound & stable cementitious substrate.

- Always use an air blower (don't use hot air blower) before commencement of coating to remove the dust.
- Do not use other manufacturers primer or other material which is used for repairing and priming as it will not confront any type of performance which we are providing with our product and system.
- Do not skip any of the systems prescribed for the application of Trubuild Rooftect Advanced. It may decrease the performance or even lead to failure of the entire system.
- For miscellaneous surfaces always contact Trubuild technical service team for quidance
- Always use clean brush and roller to avoid foreign material intrusion into the coating, which may get peeled off, taking waterproofing coating with it.
- Application of Trubuild Rooftect Advanced should be as per the coverage mentioned above to minimize entrapped bubbles and for better bonding with the substrate.
- Please read all the guidelines and always try to get in touch with our Trubuild Technical sales person before starting any type of application to avoid any waterproofing system failure.
- If the surface has excess moisture, then there is possibility of blister formation in case of all liquid applied membrane coatings.
- Stone, paver blocks, earthen pots, etc., should not be kept on waterproof coated terrace surfaces.
- Substrate should be fully cured as per standard construction practice before application of coatings.
- Both sides of the parapet wall should be coated with TruBuild Rooftect Advanced.

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#### **FEATURES**

- Single component
- Excellent water resistance
- UV resistance
- Good breathability
- · Does not require any additional protection
- Excellent adhesion to the substrate
- · Water-based hence eco friendly
- Excellent elongation & good crack-bridging capacity
- · Excellent SRI value

#### **POST APPLICATION AREAS**

Conduct pond test after min. 7 days for max. 24 hrs. with 50 mm height.

#### HANDLING PRECAUTIONS

Mandatory and recommended industrial hygiene procedures should be followed whenever our products are being handled and processed. For additional information please refer material safety sheet

#### **STORAGE**

- Product should be stored in a dry place in its original, properly closed container at temperature between 2°C-40°C.
- Partially emptied container should be closed immediately.

#### **SHELF LIFE**

24 months from the date of manufacturing

#### **COVERAGE**

- Trubuild Rooftect Advanced as a primer (50% water dilution, by weight) is 9-10 m<sup>2</sup>/L/coat
- Trubuild Rooftect Advanced is 2-2.2 sqmt./L/coat. A minimum of two coats is recommended.
- NOTE 1 Coverage will depend upon porosity and undulation of the substrate.
- NOTE 2 Comparative thermal performance of Trubuild Rooftect Topcoat Advanced on roofing:

Temperature of the roof surface recorded with the aid of laser guided infrared non-contact thermometer from 1pm to 3pm. The degree of surface temperature reduction will vary depending on the condition of the existing surface, site location, roof pitch and weather factor.

NOTE 3 - Trubuild Primesure Premium as primer without dilution coverage will be 120-150 sqft./L/coat.

#### **SAFETY**

- Avoid contact with eyes and skin. In case of contact with eyes ,rinse thoroughly with water and consult a doctor.
- Wear suitable protection gloves and goggles/face protection during work.
- In case the product has been swallowed, seek medical advice immediately and present the pack label.

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