TREMCO

APPLICATION INSTRUCTIONS

TREMproof® 260

Single-Component Asphalt Emulsion Waterproofing Membrane

1. PURPOSE

1.1 The purpose of this document is to establish uniform procedures for applying the TREMproof® 260 Waterproofing Membrane.

1.2 The techniques involved may require modifications to adjust to jobsite conditions. Consult your Tremco Representative for specific design requirements.

2. SCOPE

2.1 The document will provide typical instructions for the application of TREMproof 260. Tremco recognizes that site-specific conditions, weather patterns, contractor preferences and membrane detailing may require deviation or alteration from these prescribed installation procedures. When such circumstances exist on a project, Tremco recommends that the local Tremco Sales Representative or Technical Services be contacted for assistance and approval.

3. POSSIBLE SYSTEM COMPONENTS

- Dymonic® 100
- HPDE Protection/Barrier Courses
- Paraterm® Bar
- TREMDrain® DPI
- TREMDrain QSP
- TREMDrain Series Drainage Mats and Protection Boards
- Tremco 2450 Protection Board
- Tremco Protection Mat
- Tremco-Approved Carrier Sheet
- Nudura® Insulated Concrete Forms (ICF)
- ExoAir® Low-Expanding Foam (LEF)
- Nudura® Low-Expansion Spray Foam
- Approved Willseal® Expansion Joints

4. SUBSTRATE PREPARATION

4.1 Surface to be waterproofed may be dry, damp, or green concrete and shall be clean, sound, and free of all contaminants which may interfere with adhesion or proper curing. If release agents are present, they must be removed per the manufacturer's recommendation prior to the installation of TREMproof 260. Allow a minimum of 24 hours for concrete to dry after removing foam walls.

4.2 Substrate surface shall be free of voids, exposed aggregate areas, honeycombs, splatters, ridges, fins and other projections or depressions which preclude a smooth and level surface.

4.3 Any concrete masonry unit construction may receive a parge coat of acceptable cementitious coating approved by Tremco. All CMU walls must have all joints solid grouted and struck flush with no voids.

4.4 All penetrations shall be encased in concrete. Penetrations shall be solid grouted in place. No flexible or corrugated pipe of any type shall be used for a through wall penetration. Penetrations shall be spaced a minimum of 2" (5 cm) apart to allow for detail work.

4.5 Sidewalls of expansion joints shall be parallel, smooth, and straight. Block out if required shall be as per the recommendations of the manufacturer.

4.6 **Nudura Insulated Concrete Forms (ICF) or Insulated Concrete Forms -** Surface to be coated must be dry, clean, free of dust, mud, or any other substances that might prevent the placement and bonding of membrane. After UV exposure it may be necessary to rasp and clean substrate to the standards above. Contact Tremco and/or Nudura Technical Services for additional information.

4.7 Prep all gaps, cuts, or defects over 1/16" (1.6 mm) with Dymonic 100, ExoAir LEF, or Nudura Low Expansion Spray Foam.

5. DETAIL WORK

5.1 All shrinkage cracks shall be treated with a 60-mil coating of TREMproof 260 6" (15 cm) wide, centered over the crack. Do not co-spray TREMproof 260 detail coat.

5.2 Moving structural cracks greater than 1/16" (1.6 mm) and control joints shall be routed and caulked with Dymonic 100, followed by a 60-mil detail coat of TREMproof 260, extending a minimum of 3" (7.6 cm) on either side of the crack. Do not co-spray TREMproof 260 detail coat.

5.3 A 1" (25 mm) cant of Dymonic 100, ExoAir LEF or Nudura Low-Expansion Spray Foam shall be installed around all penetrations. Install a 60-mil detail cot of TREMproof 260 extending 2" (5 cm) onto the penetration and 6" (15 cm) onto the surrounding substrate. Do not co-spray detail coat. Penetrations must be rigidly supported through the membrane as to not allow movement of penetrating item.

5.4 Inside and outside corners shall be treated with a 60-mil detail coat of TREMproof 260 extending a minimum of 3" (7.6 cm) on either side of the corner. Inside corners should be caulked with Dymonic 100. Do not co-spray detail coat.

5.5 Base of wall shall be treated with TREMproof 260 pre-applied at footing wall joint to replace a reinforcing cant or fill gap, pre-sprayed at 35-40 mils wet. Prep all gaps or joints over 1/16" (1.6 mm) with Dymonic 100.

5.6 At footing wall joint, prep the gap between the footing and the Nudura foam with Dymonic 100, ExoAir LEF or Nudura Low Expansion Spray Foam. The horizontal face of the footing should be waterproofed all the way to the edge.

5.7 **Willseal Expansion Joints -** see Willseal Expansion Joint Application Instructions. Contact your Willseal Technical Service Representative.

6. MEMBRANE APPLICATION - BACKFILLED WALLS

6.1 TREMproof 260 can be applied to surface when ambient temperatures are as low as 20 °C (-7 °C). Prior to spraying in temperatures below 40 °F (4 °C), contact Tremco Technical Service at 866-209-1404 to ensure your equipment and operational practices meet the needs of your application environment.

6.2 Spray TREMproof 260 between 2,200 and 2,800 lb/in² (psi) (155 and 197 kg/cm²). For best results, use a .535 or .539 spray tip.

6.3 Attention must be taken during the application process to ensure a consistent, homogeneous membrane. Use a wet film thickness gauge and staging of material to ensure proper minimum thickness is achieved.
NOTE: When applying over Insulated Concrete Forms, be mindful of the pressure at which mil thickness is being measured. Mil gauges, when used appropriately, should not be pressed into the surface of the Insulated Concrete Forms.

6.4 The membrane should be applied to a minimum of 95 wet mils. For poured concrete walls, an established maximum coverage rate of 16 ft²/gal (0.39 M²/L) will yield the desired wet mil thickness at application. For unparged masonry walls, an estimated coverage rate of 13 ft²/gal (0.32 M²/L) will yield the desired wet mil thickness at application.

6.5 TREMproof 260 cure time can be accelerated through a process known as co-spraying. Co-spraying involves the use of a specialized dual-head spray gun and other support equipment where an accelerant is sprayed in tandem with the TREMproof 260. When co-spraying TREMproof 260, the pressure should remain between 2,200 and 2,800 psi (155 and 197 kg/cm²) on the TREMproof 260 (high pressure) side and between 85 and 100 psi (6 and 7 kg/cm²) on the accelerant (low pressure) side. The recommended tip size is .539 on the high pressure side and .627 on the low pressure side.

6.6 Allow TREMproof 260 to cure prior to exposure to rain, sleet, or snow. It is important to note that the co-spraying only accelerates the cure time of TREMproof 260 and it is not required to cause the membrane to cure - TREMproof 260 is a single-component air cure membrane and will cure without being accelerated. The accelerant used in the co-spray process is water (~98%) mixed with calcium chloride (~2%). Accelerant is mixed at a 1 to 5 ratio (1 part accelerant to 5 parts TREMproof 260) at the spray gun.

6.7 Prepare accelerant solution by mixing 77% calcium chloride flakes with water as follows: 16.6 oz (465 g) of 77% calcium chloride flakes per 5 gal (19 L) of water. Tremco has partnered with Spray Equipment to evaluate a number of spray or pump options for TREMproof 260. Contact Spray Equipment at 800-666-6072 for detailed equipment recommendations or validation of existing equipment.

6.8 Inspect the surface thoroughly for pinholes, blisters, or other voids in the membrane. If any are detected, reapply until a monolithic coating at the specified minimum thickness is achieved. If the membrane has already completely cured, prepare the surface with a mineral spirit wipe to clean and soften the surface of the TREMproof 260 membrane. Immediately reapply at the minimum specified thickness, extending 6" (15 cm) in all directions.

6.9 The TREMproof 260 requires the use of a protection course. TREMDrain DPI may be installed while the membrane is still tacky. Begin installation by placing the first 4' x 4' (1.22 M x 1.22 M) TREMDrain DPI board at the base of the wall, resting on the footer. TREMDrain QSP and Tremco Protection Mat may be installed after the membrane is set but is still tacky.

6.10 Once the membrane has cured, the other TREMDrain prefabricated drainage mats, Tremco HDPE Protection/Barrier Courses, Tremco 2450 cut to size, as well as expanded and extruded polystyrene boards may be installed with a Tremco approved construction adhesive. Contact Tremco Technical Service for more information.
NOTE: When attaching drainage and protection courses to ICF, use a non-self drilling course thread screw into the fastening strip of the ICF. Consult your Tremco Technical Representative for availability and detailed application instructions on these products.

6.11 In co-sprayed applications, TREMDrain QSP must be set into the membrane within 2 to 3 min. Failure to do to would require a 10-mil recoat to adhere the course.

7. MEMBRANE APPLICATION - BLINDSIDE WALLS: CONCRETE SHOTCRETE SLURRY WALL

7.1 Prior to installation of the TREMDrain 6000 drainage mat/carrier sheet/TREMproof 260 system against the shotcrete concrete slurry wall, remove all sharp protrusions. Fill medium size voids (around 2" wide and/or 1" deep) with concrete grout. Fill or bridge larger voids which would cause excessive deflection in the drainage board with rigid insulation, plywood, or similar.

7.2 Install TREMDrain 6000 drainage mat (fabric side against the substrate) overlapping 4-6" and fastening every 3-4" with a 2-3" hexagonal washer or similar using a minimum 1" nail with powder-actuated gun. The seams may be taped with ExoAir 110AT when required. The bottom 6' of the application should have two installations of the TREMDrain 6000 one over another or install TREMDrain Total-Drain. When applicable, install TREMDrain Universal Tee to connect the drainage pipes.

7.3 Attach Tremco-approved carrier sheet over the previously installed TREMDrain 6000, using the same washer and fasteners as noted in 7.2. Additional fastening may be required by site conditions. The carrier sheet should be installed as tight as possible to help eliminate large wrinkling and/or sagging after the subsequent TREMproof 260 application.

7.4 Treat the seams in one of the following ways: **1)** Spray TREMproof 260 (without co-spray) between the 4" seam overlap, and firmly press the overlapped sheets together, OR **2)** Tape the seam overlap with the ExoAir 110AT centered over the seam, and mechanically roll press the tape with a J-roller to ensure sound contact.
NOTE: All inside and outside corners should be treated so that a minimum 12" (30.5 cm) of drain mat or carrier sheet extends beyond the inside/outside corner. The drain mat or carrier sheet should never stop or start in these locations.

7.5 Spray the TREMproof 260 with co-spray at 95-100 wet mils over the previously installed carrier sheet with treated seams. Follow sections 6.5 through 6.7 for pump and spray directions.

7.6 Inspect the surface thoroughly for pinholes, blisters, or other voids in the membrane. If any are detected, reapply until a monolithic coating with the specified minimum thickness is achieved. If the membrane has already completely cured, prepare the surface with xylene and wipe to clean and soften the surface of the TREMproof 260 membrane. Immediately reapply at the minimum specified thickness, extending 6" (15 cm) in all directions.

7.7 Wall Placement - prior to wall placement, correct any deficiencies in the TREMDrain 6000/Carrier Sheet/TREMproof 260 application.

7.8 Detail all penetrations per Tremco's standard published details.

7.9 If the structural wall is poured-in-place, the concrete should not be dropped from higher than 4' (1.2 M) and should be forced towards the form work and not the membrane. If the structural wall is shotcrete, the spray should be blown in an upward direction in 4' (1.2 M) lifts, so as not to lodge between the seam lap.

8. WOOD LAGGING WALLS

8.1 Prior to installation of the TREMDrain 6000/Carrier Sheet/TREMproof 260 system against the wood lagging wall, remove all sharp protrusions. Be sure all lagging board nails are pounded flush or removed. Check for missing or damaged lagging boards and repair using concrete grout, treated wood, or both. Fill or cover any gaps between lagging boards exceeding 1" (2.5 cm) using concrete grout or treated plywood min. 5/8"-3/4".

8.2 If the top of the steel I-beams are to be removed, either pre-burn the front-face and half-way through the webbing or cover the front face with a cement board to prevent damage to the installed system.

8.3 The wood lagging is assumed flush to the front face of the I-beams for all wood lagging installations. If tis varies from this configuration, please call your local Tremco Technical Sales Representative or Tremco Technical Service Representative.

8.4 Install the TREMDrain 6000/Carrier Sheet/TREMproof 260 as directed in sections 7.2 through 7.9.

9. CLEAN UP

9.1 Remove any masking materials after installation. Clean spillage and soiling on adjacent construction that will be exposed in the finished work using cleaning agents and procedures recommended by the manufacturer of the affected construction.

9.2 Protect membranes to avoid damage from other trades and other construction materials during subsequent operations. Backfill operations may begin after the membrane has cured (16 to 24 hr and firm and dry to the touch).

9.3 Schedule work so that the membrane is covered as soon as possible after installation. If it cannot be covered within 30 days of installation, apply temporary UV protection such as dark plastic sheets or tarpaulins or contact Tremco for additional Recommendations.

TP260AI-BG/1022

TREMCO

tremcosealants.com | 800.321.7906

TREMCO

Construction Products Group

3735 Green Rd. | Beachwood, OH 44122
800.321.7906 | tremcocpg.com