

ICC-ES Evaluation Report

ESR-5430

Issued July 2025 This report also contains:

- City of LA Supplement

Subject to renewal July 2026 - CA Supplement

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DIVISION: 07 00 00-THERMAL AND MOISTURE PROTECTION

Section: 07 54 00 — Thermoplastic Membrane Roofing Section: 07 54 19— Polyvinyl Chloride-

Roofing

REPORT HOLDER:

GAF

EVALUATION SUBJECT:

EVERGUARD® PVC SINGLE-PLY ROOF MEMBRANE SYSTEMS: EVERGUARD® PVC, EVERGUARD® PVC FLEECE-BACK MEMBRANE,

EVERGUARD PVC KEE, EVERGUARD® PVC KEE

FLEECE-BACK MEMBRANE



1.0 EVALUATION SCOPE

Compliance with the following codes:

- 2024, 2021, 2018, 2015, and 2012 International Building Code® (IBC)
- 2024, 2021, 2018, 2015, and 2012 *International Residential Code*® (IRC)

Properties evaluated:

- Weather resistance
- Fire classification
- Wind uplift resistance
- Impact resistance

2.0 USES

EverGuard® PVC single-ply roofing membranes are used as roof coverings in mechanically fastened and adhered fire-classified roof assemblies.

3.0 DESCRIPTION

3.1 General:

The EverGuard® PVC, EverGuard® PVC Fleece-Back Membrane, EverGuard® PVC KEE, and EverGuard PVC KEE Fleece-Back Membrane described in this report consist of single-ply roofing membranes complying with ASTM D4434, insulation where used, barrier board or slip sheet where used, flashing, mechanical fasteners and/or adhesives that are installed on a combustible or noncombustible deck.

3.2 Membranes:

3.2.1 EverGuard® PVC: EverGuard® PVC is a nominally 50-, 60- or 80-mil-thick [0.050 inch (1.27 mm), 0.060 inch (1.5 mm) or 0.080 inch (2.0 mm)], Polyvinyl Chloride roof covering with woven polyester reinforcement. The membrane is supplied in rolls 60 inches (1524 mm) or 120 inches (3048 mm) wide. The 50-mil [0.050 inch (1.27 mm)] and 60-mil [0.060 inch (1.5 mm)] membranes are supplied in 100 foot (30.5 m) rolls and the 80-mil [0.080 inch (2.0 mm)] membrane is supplied in 80 foot (24.4 m) rolls.

- **3.2.2 EverGuard® PVC Fleece-Back Membrane:** EverGuard® PVC Fleece-Back Membrane, also known as EverGuard® PVC FB Ultra, is a nominally 50-, 60- or 80-mil-thick [0.050 inch (1.27 mm), 0.060 inch (1.5 mm) or 0.080 inch (2.0 mm)], Polyvinyl Chloride roof covering with woven polyester reinforcement and a 3.5 oz/yd² (120 g/m²) polyester fleece fabric backing. The membrane is supplied in rolls 60 inches (1523 mm) or 120 inches (3048 mm) wide. The 50-mil [0.050 inch (1.27 mm)] and 60-mil [0.060 inch (1.5 mm)] membranes are supplied in 100 foot (30.5 m) rolls and the 80-mil [0.080 inch (2.0 mm)] membrane is supplied in 80 foot (24.4 m) rolls.
- **3.2.3 EverGuard PVC KEE:** EverGuard PVC KEE is a nominally 50-, 60- or 80-mil-thick Polyvinyl Chloride roof covering with woven polyester reinforcement. The 50-mil membrane [0.050 inch (1.27 mm)] and the 60-mil membrane [0.060 inch (1.5 mm)] are supplied in rolls 60 inches (1524 mm) or 120 inches (3048 mm) wide. The 50-mil [0.050 inch (1.27 mm)] and 60-mil [0.060 inch (1.5 mm)] membranes are supplied in 100 foot (30.5 m) rolls and the 80-mil [0.080 inch (2.0 mm)] membrane is supplied in 80 foot (24.4 m) rolls.
- **3.2.4 EverGuard® PVC KEE Fleece-Back Membrane:** EverGuard® PVC KEE Fleece-Back Membrane is a nominally 50-, 60- or 80-mil-thick [0.050 inch (1.27 mm), 0.060 inch (1.5 mm) or 0.080 inch (2.0 mm)], Polyvinyl Chloride roof covering with woven polyester reinforcement and a 3.5 oz/yd² (120 g/m²) polyester fleece fabric backing. The membrane is supplied in rolls 60 inches (1523 mm) or 120 inches (3048 mm) wide. The 50-mil [0.050 inch (1.27 mm)] and 60-mil [0.060 inch (1.5 mm)] membranes are supplied in 100 foot (30.5 m) rolls and the 80-mil [0.080 inch (2.0mm)] membrane is supplied in 80 foot (24.4 m) rolls.

3.3 Roof Deck:

Combustible roof decks are limited to minimum nominally $^{15}/_{32}$ -inch-thick (11.9 mm) Exposure 1 wood structural panels, which must comply with IBC Section 2603.4.1.5. Noncombustible decks are steel or concrete decks specified in the IBC. The steel roof deck must be minimum No. 22 gage steel [base-metal thickness of 0.0273 inch (0.69 mm)], having a minimum yield strength, F_y , of 33 ksi or 80 ksi (227 or 550 MPa), depending on the wind uplift capacity of the roof assemblies shown in Table 2 and 3. Concrete decks must have a minimum 2500 psi (17.2 MPa) compressive strength and a minimum 28 day cure time prior to the roofing system installation.

3.4 Insulation:

Foam plastic insulation, where used, must have a flame-spread index of not more than 75 when tested in accordance with ASTM E84 or UL 723 at the maximum thickness intended for use. Polyisocyanurate foam plastic thermal insulation must comply with ASTM C1289. Polystyrene foam plastic insulation must comply with ASTM C578. Wood fiberboard insulation must comply with ASTM C208. See <u>Tables 1</u> through 7 for insulations used with specific roof covering systems.

3.5 Barrier Board, Cover Board or Slip Sheet:

Barrier boards, cover boards and slip sheets must be UL classified for roofing applications. Barrier boards and cover boards, where used, must be a minimum 1/4-inch-thick (6.4 mm) G-P Gypsum LLC "DensDeck® Roof Board" or "DensDeck® Prime Roof Board," or minimum 1/4-inch-thick (6.4 mm) USG Corporation "SECUROCK® Gypsum-Fiber Roof Board" or "SECUROCK® Glass-Mat Roof Board."

- **3.5.1 VersaShield® SOLO™ Fire-Resistant Slip Sheet:** VersaShield® SOLO™ Fire-Resistant Slip Sheet is a non-asphaltic fiberglass-based slip sheet. The slip sheet is supplied in rolls 6 feet (1.83 m) wide by 166.7 feet (50.8 m) long.
- **3.5.2** EnergyGuard[™] Barrier Polyiso Insulation Board: EnergyGuard[™] Barrier Polyiso Insulation Board consists of coated glass-fiber bonded to an isocyanurate foam core. Minimum 1/2-inch-thick (6.4 mm).
- **3.5.3 EnergyGuard[™] NH Barrier Polyiso Insulation Board:** EnergyGuard[™] NH Barrier Polyiso Insulation Board consists of coated glass-fiber bonded to an isocyanurate foam core. Minimum 1/2-inch-thick (6.4 mm).

3.6 Fasteners and Plates:

Fasteners and plates used to attach barrier or cover board layer materials, insulation boards and the roof covering membrane must be corrosion-resistant. Fasteners may be any of the insulation and membrane fasteners and plates summarized in this section or shown in <u>Tables 3</u>, 4, 5, 6, and 7, as applicable.

3.6.1 Drill-Tec[™] #12 Fastener or Drill-Tec[™] #14 Fastener: The standard Drill-Tec[™] #12 Fastener is a #12 diameter by maximum 8-inch-long (203 mm) drill-point screw with a #3 Phillips head. The Drill-Tec[™] #14 Fastener is a #14 diameter by maximum 24-inch-long (609 mm) drill-point screw with a #3 Phillips head. The fasteners are coated with a black proprietary coating. The fasteners are for use with Drill-Tec[™] 3" Standard Steel Plates for preliminary fastening of insulation boards to plywood, steel and concrete (#14 only) decks. See Tables 3 and 4 for preliminary attachment details.

- **3.6.2 Drill-Tec[™] XHD Fastener:** The Drill-Tec[™] XHD Fastener is a #15 diameter by maximum 22-inch-long (558.8 mm) drill-point screw with a #3 Phillips head. The fasteners are coated with a black proprietary coating. The fasteners must be of sufficient length to penetrate a minimum of ³/₄ inch (19 mm) through steel deck or ³/₄ inch (19 mm) through plywood sheathing. The fastener is for use with Drill-Tec[™] plates for attachment of the EverGuard[®] membrane to plywood and steel decks. See Tables 3 and 4 for membrane attachment details.
- **3.6.3 Drill-Tec[™] Extra Heavy Duty ASAP Assembled Screw and 2³/8 in. Steel Plate:** The Drill-Tec[™] Extra Heavy Duty ASAP Assembled Screw and 2³/8 in. Steel Plate is a #15 fastener assembled with Drill-Tec[™] 2³/8 in. Barbed XHD Plate. The fasteners are for preliminary fastening of insulation boards and for attachment of the EverGuard® membrane to steel decks. See Table 4 for attachment details.
- **3.6.4 Drill-Tec[™] 3" Standard Steel Plate and Drill-Tec[™] 3" Steel Plate:** The Drill-Tec[™] 3" Standard Steel Plate is a 3-inch-diameter (76 mm), 0.020-inch-thick (0.51 mm), Galvalume AZ-55 coated plate. The Drill-Tec [™] 3" Steel Plate is a ribbed, 3-inch-diameter (76 mm), 0.020-inch-thick (0.51 mm), Galvalume AZ-55 coated plate. The plates are for use with Drill-Tec[™] Standard #12 or #14 Fasteners for preliminary attachment of insulation boards to plywood, steel and concrete (#14 only) decks. See <u>Table 5</u> and <u>Table 6</u> for preliminary attachment details.
- **3.6.5 Drill-Tec[™] 2³/₈ in. Barbed XHD Plate and Drill-Tec[™] 2³/₄ in. Barbed SXHD Plate:** The Drill-Tec[™] 2³/₈ in. Barbed XHD Plate is a 2³/₈-inch-diameter (60 mm), 0.040-inch-thick (1.02 mm), Galvalume AZ-55 coated plate. The Drill-Tec[™] 2 ³/₄ Barbed SXHD Plate is a 2³/₄-inch-diameter (70 mm), 0.040-inch-thick (1.02 mm), Galvalume AZ-55 coated plate. The plates have pointed barbs projecting downward ¹/₈ inch (3.2 mm) from the underside between raised circular stampings. The plates are for use with Drill-Tec[™] XHD and SXHD Fasteners for attachment of the EverGuard[®] membrane to plywood, steel and concrete decks. See Table 4 for membrane attachment details.
- **3.6.6 Drill-Tec[™] AccuTrac[®] Flat Plate and AccuTrac[®] Recessed Plate:** The Drill-Tec[™] AccuTrac[®] Flat Plate is a 3-inch-square, 0.018-inch-thick, A2-SS aluminized steel plate. The Drill-Tec[™] AccuTrac[®] Recessed Plate is a 3-inch-square, 0.018-inch-thick, Galvalume coated steel plate. The plates are for use with Drill-Tec[™] Standard #12 or #14 Fasteners for preliminary attachment of insulation boards to plywood, steel, and concrete (#14 only) decks. See <u>Table 5</u> and <u>Table 6</u> for membrane attachment details.
- **3.6.7 Drill-Tec[™] Eyehook® AccuSeam® Plate:** The Drill-Tec[™] Eyehook® AccuSeam® Plate is a 2³/₈-inch-diameter, 0.034-inch-thick, Galvalume coated steel plate used in combination with Drill-Tec[™] fasteners for the attachment of single-ply membranes. See <u>Table 4</u> for preliminary attachment details.
- **3.6.8 Drill-Tec[™] RhinoBond® PVCPVC XHD and XHD TreadSafe® Plate:** The Drill-Tec[™] RhinoBond® PVC XHD TreadSafe® plate is a 3-inch-diameter, 0.028-inch-thick, Galvalume steel plate with a Polyvinyl Chloride (PVC) coating. Plate is designed to be used with heat welded single-ply membranes. See <u>Table 3</u> for membrane attachment details.
- **3.6.9 Drill-Tec[™] 2 in. Double Barbed XHD Plate:** The Drill-Tec[™] Double Barbed XHD Plate is a 2¹/₈-inch-diameter, 0.030-inch-thick, Galvalume steel plate used with Drill-Tec[™] XHD Fastener for the attachment of approved membranes. See Table 4 for preliminary attachment details.
- **3.6.10 Drill-Tec[™] #14 HD or Drill-Tec[™] #12 DP Fastener:** The Drill-Tec[™] #14 HD and #12 DP Fasteners are carbon steel screws with #3 Phillips drive, modified truss head for use in steel, wood or concrete decks. The fasteners are coated with an epoxy coating. The fasteners are for use with Drill-Tec[™] 3" Flat Steel Plates for preliminary fastening of insulation boards to plywood, steel and concrete (#14 only) decks. See <u>Table 5</u> and <u>Table 6</u> for preliminary attachment details.
- **3.6.11 Drill-Tec™ #15 EHD Fastener:** The Drill-Tec™ #15 EHD Fasteners are carbon steel screws with #3 Phillips drive, modified truss head for use in steel, wood or concrete decks. The fasteners are coated with an epoxy coating. The fasteners must be of sufficient length to penetrate a minimum of ¹/₂ inch (13 mm) through steel deck or ³/₄ inch (19 mm) through plywood sheathing. The fastener is for use with Drill-Tec™ plates for attachment of the EverGuard® membrane to plywood and steel decks. See <u>Table 4</u> or membrane attachment details.
- **3.6.12 Drill-Tec[™] #12 DF Fastener or Drill-Tec[™] #14 DF Fastener:** The standard Drill-Tec[™] #12 DF Fastener is a #12 diameter by maximum 8-inch-long (203 mm) drill-point screw with a #3 Phillips head. The Drill-Tec[™] #14 DF Fastener is a #14 diameter by maximum 12-inch-long (305 mm) drill-point screw with a #3 Phillips head. The fasteners are coated with a black proprietary coating. The fasteners are for use with Drill-Tec[™] 3" DF Steel Insulation Plates for preliminary fastening of insulation boards to plywood, steel and concrete (#14 only) decks. See Tables 3 and 4 for preliminary attachment details.
- **3.6.13 Drill-Tec[™] #15 DF Fastener:** The Drill-Tec[™] #15 DF Fastener is a #15 diameter by maximum 16-inch-long (406 mm) drill-point screw with a #3 Phillips head. The fasteners are coated with a black

proprietary coating. The fasteners must be of sufficient length to penetrate a minimum of $^{3}/_{4}$ inch (19 mm) through steel deck or $^{3}/_{4}$ inch (19 mm) through plywood sheathing. The fastener is for use with Drill-TecTM plates for attachment of the EverGuard® membrane to plywood and steel decks. See <u>Tables 3</u> and <u>4</u> for membrane attachment details

- **3.6.14 Drill-Tec[™] Flat Steel Plate:** The Drill-Tec[™] Flat Steel plate is a galvalume steel stress plate. The plates are for use with Drill-Tec[™] #12 DP or Drill-Tec[™] #14 HD fasteners for preliminary attachment of insulation boards to plywood (#12 DP or #14 HD), steel (#12 or #14 HD) and concrete (#14 HD only) decks.
- **3.6.15 Drill-Tec[™] 3" Recessed Steel Plate:** The Drill-Tec[™] 3" Recessed Steel Plate is a galvalume steel **stress** plate for use with Drill-Tec[™] fasteners.
- **3.6.16 Drill-Tec[™] 2.4" Barbed Seam Plate:** The Drill-Tec[™] 2.4" Barbed Seam Plate is a galvalume steel stress plate for use with Drill-Tec[™] fasteners.
- **3.6.17 Drill-Tec[™] 3" DF Steel Insulation Plate:** The Drill-Tec[™] 3" DF Steel Insulation Plate is a 3-inch-diameter (76 mm), 0.019-inch-thick (0.48 mm), Galvalume AZ-50 coated plate. The plates are for use with Drill-Tec[™] #12 DF or #14 DF Fasteners for preliminary attachment of insulation boards to plywood, steel and concrete (#14 only) decks. See Table 5 and Table 6 for preliminary attachment details.
- **3.6.18 Drill-Tec[™] 2³/₈" DF Barbed Seam Plate:** The Drill-Tec[™] 2³/₈ DF Barbed Seam Plate is a 2³/₈-inch-diameter (60 mm), 0.038-inch-thick (1 mm), Galvalume AZ-50 coated plate. The plates have pointed barbs projecting downward ¹/₈ inch (3.2 mm) from the underside between raised circular stampings. The plates are for use with Drill-Tec[™] #15 DF Fasteners for attachment of the EverGuard[®] membrane to plywood, steel and concrete decks. See Table 4 for membrane attachment details.

3.7 Adhesives:

General - See <u>Tables 2</u>, <u>5</u>, <u>6</u> and <u>7</u> for the specific adhesive to be used with each system and <u>Table 8</u> for the specific application rate for the following adhesives:

- **3.7.1 EverGuard® PVC #2331 Bonding Adhesive:** EverGuard® PVC #2331 Bonding Adhesive, is a synthetic polymer-based, contact bonding adhesive designed for bonding PVC single-ply membranes and flashings to various substrates. The adhesive is applied at a total rate of 1.67 to 1.80 gal/100 ft² to both the substrate and the underside of the membrane. The adhesive has a shelf life of 12 months when stored in unopened containers at temperatures between 40°F and 90°F (4°C to 32.2°C).
- **3.7.2 EverGuard® WB181 Bonding Adhesive:** EverGuard® WB181 Bonding Adhesive is a water-based, contact adhesive designed for bonding single-ply membranes to various substrates. For fleeced backed PVC membranes, the adhesive is applied to the substrate surface only at a coverage rate of 0.83 to 1.00 gal/100ft². The adhesive has a shelf life of 12 months when stored in unopened containers at temperatures between 40°F and 90°F (4°C to 32.2°C).
- **3.7.3 GAF LRF Adhesive M and LRF Adhesive O:** LRF Adhesive M and LRF Adhesive O are two component, solvent free, polyurethane foam adhesives designed for bonding fleece back membranes to various substrates. LRF Adhesive M can also be used to adhere insulation to various substrates. Adhesive is applied in ¾-inch-wide (19 mm) liquid beads spaced at 12-inches (305 mm) on-center. The adhesive has a shelf life of 12 months when stored in unopened containers at temperatures between 45°F and 95°F (7°C to 35°C).
- **3.7.4 GAF PVC Quick Spray Adhesive:** PVC Quick Spray Adhesive is a sprayable, water-based contact adhesive designed for bonding PVC membranes to various substrates. The adhesive is applied with a coverage rate of 6.0 lb/100 ft². to both the substrate and the underside of the membrane. The adhesive has a shelf life of 12 months when stored in unopened containers at temperatures between 50°F and 150°F (10°C to 65.6°C).
- **3.7.5 EverGuard® PVC Quick Lay Adhesive**: EverGuard® PVC Quick LayAdhesive is a sprayable solvent-based contact adhesive designed for bonding PVC smooth-backed membranes to various substrates. The adhesive is applied with a coverage rate of 1.0 lb/100 ft². The adhesive has a shelf life of 12 months when stored in unopened containers at temperatures between 40°F and 150°F (4.4°C to 65.6°C).
- **3.7.6 OMG Inc. OlyBond 500®** and **OlyBond 500®** Canister Adhesive: OMG Inc. OlyBond 500® and OlyBond 500® Canister Adhesive is a two-component polyurethane foam adhesive designed to secure insulation or membranes to roof decks. OMG Inc. OlyBond 500® Canister is to be utilized for ribbon or spatter application, and OlyBond 500® is to be used for ribbon application only. For insulation, the adhesive is dispensed in a pre-foamed bead that spreads to several inches before rising ¾ to 1 inch above the substrate. For roof membranes, the adhesive is applied in a spatter pattern with 50-percent coverage.
- **3.7.7 GAF LRF Adhesive XF:** GAF LRF Adhesive XF is a two-component, construction-grade, low-rise polyurethane foam roofing adhesive. It is designed to adhere most roof insulations, and cover boards to

compatible substrates and vapor retarders as well as to adhere fleeceback single-ply membranes. The "Part A" and "Part B" components are dispensed from two pre-pressurized disposable cylinders utilizing a two-component disposable foam applicator. GAF LRF Adhesive XF is to be utilized for ribbon or spatter application For insulation, the adhesive is dispensed in a pre-foamed bead that spreads to several inches before rising ³/₄ to 1 inch above the substrate. For fleeced back membranes, the adhesive is applied in a spatter pattern at a rate of 3.0 lbs/100 sq. ft.

3.7.8 H.B. Fuller Millenium PG-1 Pump Grade Adhesive: H.B. Fuller Millenium PG-1 Pump Grade Adhesive is a two-component, construction-grade, low-rise polyurethane foam roofing adhesive. It is designed to adhere most roof insulations, and cover boards to compatible substrates and vapor retarders as well as to adhere fleeceback single-ply membranes. The "Part 1" and "Part 2" components are dispensed from two pre-pressurized disposable cylinders utilizing a two-component disposable foam applicator. H.B. Fuller Millenium PG-1 Pump Grade Adhesive is to be utilized for ribbon or spatter application. For insulation and coverboard, the adhesive is dispensed in a pre-foamed bead that spreads to several inches before rising ¾ to 1 inch above the substrate. For fleeced back membranes, the adhesive is applied in a spatter pattern at a rate of 0.3 Gal. per 100 sq. ft.

3.8 Impact Resistance:

The EverGuard® PVC, EverGuard® PVC Fleece-Back Membrane, EverGuard® PVC KEE Ultra, and EverGuard PVC KEE Fleece-Backed Membrane roofing systems described in this report comply with requirements for impact resistance in the 2024 IBC Section 1504.7, 2021 IBC Section 1504.8 (2018, 2015, and 2012 IBC Section 1504.7) based on testing in accordance with Section 4.6 of FM 4770.

4.0 DESIGN AND INSTALLATION

4.1 General:

Installation of the EverGuard® PVC, EverGuard® PVC Fleece-Back Membrane, EverGuard® PVC KEE, and EverGuard PVC KEE Fleece-Back Membrane roofing membranes described in this report must comply with the applicable code, the manufacturer's published installation instructions and this report. The manufacturer's published installation instructions must be available on the jobsite at all times during installation. EverGuard® PVC products are attached to the roof deck by mechanical fastening systems or adhered to the underlying substrate in accordance with Tables 3,4, 5 and 6. All substrates must be clean, smooth, and free of sharp edges, foreign materials, oil and grease.

The slope of the roof on which the single-ply membranes are installed must be a minimum of $^{1}/_{4}$:12 (2 percent slope) and must not be more than the maximum slope indicated for the particular assembly as listed in Tables 1 and $\underline{2}$.

Penetrations and terminations of the roof covering must be flashed and made weathertight in accordance with the requirements of the membrane manufacturer and IBC Section 1503.2 or IRC Section R903.2, as applicable.

- **4.1.1 Mechanically Attached Systems:** Mechanically attached systems consist of insulation boards or cover boards mechanically presecured to noncombustible or combustible roof decks with the fasteners and plates described in <u>Tables 3</u> and <u>4</u>. The insulation is covered with one of the EverGuard® PVC membranes, which is mechanically fastened through the insulation and into the roof deck using the fasteners and plates as described in <u>Tables 3</u> and <u>4</u>.
- **4.1.2** Adhered Systems: Adhered systems consist of insulation boards or coverboards mechanically or adhesively attached to noncombustible or combustible roof decks with the fasteners and plates, or adhesives as described in <u>Tables 5</u>, <u>6</u> and <u>7</u>. The insulation is covered with one of the EverGuard[®] PVC membranes, which is adhered to the insulation using the adhesive as described in <u>Tables 5</u>, <u>6</u>, <u>7</u> and <u>8</u>.
- **4.1.3** Lap Joints: EverGuard® PVC products are lapped and heat-welded in accordance with <u>Table 3</u>.

4.2 Fire Classification

- **4.2.1** New Construction: The PVC single-ply membrane roofing systems described in <u>Tables 1</u> and <u>2</u>, when installed in accordance with this report, are Class A or Class C roof covering systems in accordance with ASTM E108 or UL 790.
- **4.2.2 Reroofing:** The existing deck must be inspected to verify that the structure to be reroofed is structurally sound and adequate to support and secure the roofing membrane. Prior to the installation of new roof coverings, inspection by and written approval from the code official having jurisdiction must be required.

Class A or C roof covering systems may be installed over existing classified roof covering systems under the following conditions without additional roof classification tests, provided the resulting classification is the lower of the new or existing roofing classifications.

- New uninsulated systems installed only over existing uninsulated assemblies
- New insulated systems installed over existing uninsulated systems only.

4.3 Wind Uplift Resistance:

- **4.3.1 New Construction:** The allowable wind uplift pressures for the single-ply roof covering systems described in this report are noted in <u>Tables 3</u>, <u>4</u>, <u>5</u> and <u>6</u>. Metal edge securement systems must be listed in accordance with the 2011 edition of ANSI/SPRI/FM4435 ES-1, and designed and installed for wind loads in accordance with the 2024 and 2021 IBC Section 1504.6; and 2018 and 2015 IBC Section 1504.5 and IBC Chapter 16 [2003 edition of ANSI/SPRI ES-1, and designed and installed in accordance with 2012, 2009 and 2006 IBC Section 1504.5 and 2012, 2009 and 2006 IBC Chapter 16].
- **4.3.2 Reroofing:** Roof covering systems employing mechanical fasteners must be qualified, to the satisfaction of the code official, as to the adequacy of fasteners penetrating through existing roof coverings into structural substrates. Since the composition and/or condition of any particular underlying existing roofing material may vary widely, reroofing with adhered systems is outside the scope of this report.

5.0 CONDITIONS OF USE:

The EverGuard® PVC single-ply roof membranes described in this report comply with, or are suitable alternatives to what is specified in, the code indicated in Section 1.0 of this report, subject to the following conditions:

- **5.1** Installation of the roofing systems must comply with the IBC, the manufacturer's published installation instructions and this report. In the event of a conflict between the manufacturer's published installation instructions and this report, this report governs.
- **5.2** The roof-membrane system must be installed by applicators authorized by GAF. Roof classification requirements are as shown in <u>Tables 1</u> and <u>2</u> wind design requirements are as shown in <u>Tables 3</u>, <u>4</u>, <u>5</u> and <u>6</u>.
- **5.3** Foam plastic insulation must be separated from the interior of the building by an approved thermal barrier in accordance with IBC Section 2603.4.1.5 or IRC Section R316.5.2, as applicable, except when use without a thermal barrier is specifically addressed in an ICC-ES evaluation report for the foam plastic insulation.
- 5.4 Foam plastic insulation, where used, must bear the label of an approved agency indicating that the foam plastic has a flame-spread index of not more than 75 when tested, at the maximum thickness intended for use, in accordance with ASTM E 84 or UL 723, subjected to the approval of a code official.
- **5.5** Above-deck thermal insulation board must comply with the applicable standards listed in IBC Table 1508.2 or IRC Table R906.2, as applicable.
- **5.6** Design wind-uplift pressure on any roof area, including edge and corner zones, must not exceed the allowable wind pressure for the system installed in that particular area. Refer to the allowable wind uplift pressure for roof coverings as listed in Tables 3, 4, 5 and 6.
- **5.7** The allowable wind uplift pressures listed in <u>Table 3</u>, <u>4</u>, <u>5</u> and <u>6</u> are for the roof covering only. The deck and framing to which the roof covering is attached must be designed for the applicable components and cladding wind loads in accordance with the IBC.
- **5.8** When application is over existing roofs, documentation of the wind uplift resistance of the composite roof construction must be submitted to the code official for approval at the time of permit application.
- **5.9** Calculations demonstrating that the required wind resistance is less than the allowable wind resistance must be submitted to the code official.
- **5.10** EverGuard® PVC, EverGuard® PVC Fleece-Back Membrane, EverGuard® PVC KEE, and EverGuard PVC KEE Fleece-Back Membrane single-ply roof membranes are manufactured in Cedar City, Utah under a quality control program with inspections by ICC-ES.

6.0 EVIDENCE SUBMITTED

6.1 Data in accordance with the ICC-ES Acceptance Criteria for Membrane Roof-covering Systems (AC75), dated July 2010 (editorially revised April 2024)

7.0 IDENTIFICATION

- 7.1 The ICC-ES mark of conformity, electronic labeling, or the evaluation report number (ICC-ES ESR-5430) along with the name, registered trademark, or registered logo of the report holder must be included in the product label.
- 7.2 In addition, each roll of the roof covering membranes (EverGuard® PVC, EverGuard® PVC Fleece-Back, EverGuard® PVC KEE, and EverGuard PVC KEE Fleece-Back); are identified with a label indicating the company name (GAF), the product name, and the evaluation report number (ESR-5430).

7.3 The report holder's contact information is the following:

GAF 1 CAMPUS DRIVE PARSIPPANY, NEW JERSEY 07054 800-763-4411 www.gaf.com

TABLE 1—FIRE CLASSIFICATION ASSEMBLIES—MECHANICALLY FASTENED ROOF COVERING SYSTEMS

	TABLE 1—FIRE CLASSIFICATION ASSEMBLIES—MECHANICALLY FASTENED ROOF COVERING SYSTEMS										
SYSTEM NO.	ROOF CLASS	DECK ²	MAX. ROOF SLOPE	BARRIER BOARD OR SLIP SHEET	INSULATION¹	COVER BOARD	MEMBRANE				
1	А	Min. 15/32 in. Plywood or 1 in. Wood Plank	1-1/2 :12	VersaShield Solo	(Optional)EnergyGu ard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	None	EverGuard PVC or EverGuard PVC KEE				
2	А	Min. 15/32 in. Plywood or 1 in. Wood Plank	1-1/2:12	Min. 1/4 inch thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. ½-inch- thick, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	EverGuard PVC or EverGuard PVC				
3	А	Min. 15/32 in. Plywood or 1 in. Wood Plank	5:12	None	(optional) Any UL Classified foam plastic insulation board	Min. 1/4 inch thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC or EverGuard PVC KEE				
4	А	Min. 15/32 in. Plywood or 1 in. Wood Plank	1/2:12	None	(optional) EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Min. 1/2 inch- thick, EnergyGuard Barrier or EnergyGuard NH Barrier	EverGuard PVC or EverGuard PVC KEE				

TABLE 1—FIRE CLASSIFICATION ASSEMBLIES—MECHANICALLY FASTENED ROOF COVERING SYSTEMS (continued)

SYSTEM NO.	ROOF CLASS	DECK ²	MAX. ROOF SLOPE	BARRIER BOARD OR SLIP SHEET	INSULATION ¹	COVER BOARD	MEMBRANE
5	A	Min. 15/32 in. Plywood or 1		None	(optional) EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation,	Min. 3 inch-thick, EnergyGuard Ultra Polyiso Insulation or	EverGuard PVC or EverGuard Extreme PVC
3	(in. Wood Plank	1/2:12	Notice	EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	EnergyGuard NH Ultra Polyiso Insulation	
6	Α	Non- Combustible	5:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	Any UL Classified foam plastic insulation board	Min. 1/4 inch- thick, DensDeck®, DensDeck®Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC or EverGuard Extreme PVC
7	Α	Non- Combustible	1-1/2:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. ½ inch-thick, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	EverGuard PVC or EverGuard Extreme PVC

For **SI:** 1 inch = 25.4 mm; 1 ft = 0.305 m; 1 psf = 47.88 Pa.

¹All foam plastic insulation must be UL classified and limited to minimum ½-inch-thick (12.7 mm) and the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness in accordance with this table, whichever is less. Unless otherwise noted, insulation are flat or tapered board of the minimum thickness noted.

noted.

2Wood deck must be minimum 15/32-inch-thick (11.9 mm) plywood or 1-inch-thick wood plank. Steel deck must be minimum No. 22 gage galvanized steel [0.030 inch (0.76 mm)]. Concrete must have a minimum compressive strength (f_c) of 2500 psi.

TABLE 2—FIRE CLASSIFICATION ASSEMBLIES—ADHERED ROOF COVERING SYSTEMS³

		.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	ABLE 2—FIRE CLASSIFICATION ASSEMBLIES—ADHERED ROOF COVERING STSTEMS					
SYSTEM NO.	ROOF CLASS	DECK ²	MAX. ROOF SLOPE	BARRIER BOARD	INSULATION ¹	COVER BOARD	MEMBRANE	ADHESIVE ATTACHMENT
1	Α	Non- Combustible	1:12	(Optional) Min. 1/2 inch- thick, DensDeck®, PensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EnergyGuard Polyiso Insulation, EnergyGuard Ultra, EnergyGuard NH, or EnergyGuard NH Ultra adhered with a nominal ¾ inch bead of LRF Adhesive M, LRF Adhesive XF or OlyBond Fastening System	(Optional) Min. ½ inch thick, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	EverGuard PVC or EverGuard PVC KEE	EverGuard WB 181 Bonding Adhesive or EverGuard #2331 Bonding Adhesive or EverGuard PVC Quick Lay Adhesive
2	Α	Non- Combustible	4:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	None	Min. 1/4-inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC, EverGuard PVC KEE,EverGuard PVC Fleece-Back Membrane, or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive
3	Α	Non- Combustible	3:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	None	Min. 1/4 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC, EverGuard PVC KEE, EverGuard PVC Fleece-Back Membrane, or EverGuard PVC KEE Fleece-Back Membrane	EverGuard PVC 2331 Bonding Adhesive
4	Α	Non- Combustible	1:12	(Optional) Min. 1/2 in. thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. ½-inch- thick, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board, or EnergyGuard NH HD Plus	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC Quick Spray Adhesive or EverGuard PVC Quick Lay Adhesive
5	А	Min. 15/32 in. Plywood or 1 in. Wood Plank	1:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	(Optional) EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Min. 1/4-inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuardPVC or EverGuard PVC KEE	EverGuard PVC Quick Spray Adhesive or EverGuard PVC Quick Lay Adhesive

TABLE 2—FIRE CLASSIFICATION ASSEMBLIES—ADHERED ROOF COVERING SYSTEMS³ (continued)

SYSTEM NO.	ROOF CLASS	DECK ²	MAX. ROOF SLOPE	BARRIER BOARD	INSULATION ¹	COVER BOARD	MEMBRANE	ADHESIVE ATTACHMENT
6	A	Non- Combustible	1:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation, or	(Optional) Min. ½-inchthick, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	EverGuard PVC Fleece-Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	LRF Adhesive M, LRF Adhesive O, or OlyBond 500 Canister
7	А	Non- Combustible	1/4:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	(Optional) EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Min. 1/4 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC Fleece-Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	LRF Adhesive XF
8	А	Non- Combustible	3:12	(Optional) Min. 1/2 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	Any UL classified polyisocyanurate, EPS or EPS foam plastic insulation boards adhered with a nominal ¾-inch bead of LRF Adhesive M, LRF Adhesive VF, or OlyBond Fastening System.	Min. 1/4 inch- thick, DensDeck®, DensDeck® Prime, SECUROCK® Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC Fleece-Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	LRF Adhesive M, LRF Adhesive O, LRF Adhesive XF, or OlyBond 500 Canister
9	А	Min. 15/32 in. Plywood or 1 in. Wood Plank	1/2:12	None	Min. 3-inch-thick, EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation, or	None	EverGuard PVC1EverGuard PVC KEE, EverGuard PVC Fleece-Back Membrane, or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive or EverGuard #2331 Bonding Adhesive

For **SI:** 1 inch = 25.4 mm; 1 ft = 0.305 m; 1 psf = 47.88 Pa.

¹All foam plastic insulation must be UL classified and limited to minimum 1/2-inch-thick (12.7 mm) and the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness in accordance with this table, whichever is less. Unless otherwise noted, all insulations are flat or taper board of the minimum thickness noted.

 $^{^{2}}$ Wood deck must be minimum 15 /₃₂-inch-thick (11.9 mm) plywood or 1-inch-thick wood plank. Steel deck must be minimum No. 22 gage galvanized steel [0.030 inch (0.76 mm)]. Concrete must have a minimum compressive strength (f_c) of 2500 psi. 3 Adhesive and adhesive application rates to be as specified in Section 3.7 and 7 Table 8, unless the adhesive application rate is described in the system detailed in

TABLE 3—WIND RESISTANCE—WELDED ROOF COVERING

			BASE INSULATION ¹	TOP INSULATION ¹		ROOF COVE	ER⁵	
SYSTEM NO	DECK ²	BARRIER BOARD OR SLIP SHEET	Туре	Туре	Membran e	Fasteners and Plates ^{3,4}	Contributory Area per Fastener Max. Fastener Spacing (inches)	ALLOWABL E WIND UPLIFT PRESSURE (psf)
NC-1	Min. 22 ga, type B, Grade 33 steel or min. 2,500 psi concrete	(Optional) Min. 0.5 in. thick DensDeck®, SECUROCK ® Gypsum- Fiber Roof Board, SECUROCK ® Glass-Mat Roof Board or ¾4 in. thick EnergyGuar d Perlite Roof Insulation (Homogeneo us).	Min. 1.0 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, or Structodek™ High Density Fiber Board Roof Insulation	EverGuard PVC or EverGuard PVC KEE	Drill-Tec RhinoBond PVC XHD Plates, Drill- Tec RhinoBond PVC XHD Tread Safe Plates (see note) and Drill-Tec #14 Fasteners (structural concrete deck only) or Drill-Tec XHD Fasteners (steel deck only)	5.33 ft² (6 Fasteners per 48 x 96 in. Board)	45
NC-2	Min. 22 ga, type B, Grade 33 steel or min. 2,500 psi concrete	(Optional) Min. 0.5 in. thick DensDeck®, SECUROCK ® Gypsum-Fiber Roof Board, SECUROCK ® Glass-Mat Roof Board or ¾ in. thick EnergyGuar d Perlite Roof Insulation (Homogeneo us)	Min. 1.0 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, or Structodek™ High Density Fiber Board Roof Insulation	EverGuard PVC or EverGuard PVC KEE	Drill-Tec RhinoBond PVC XHD Plates, Drill- Tec RhinoBond PVC XHD Tread Safe Plates (see note) and Drill-Tec #14 Fasteners (structural concrete deck only) or Drill-Tec XHD Fasteners (steel deck only)	Max. 24 x 36 in. grid	45
NC-3	Min. 22 ga, type B, Grade 33 steel or min. 2,500 psi concrete	(Optional) Min. 0.5 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board or % in. thick EnergyGuard Perlite Roof Insulation (Homogeneou s)	Min. 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass- Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, FinergyGuard NH HD Plus Polyiso Cover Board, or Structodek™ High Density Fiber Board Roof Insulation	EverGuard PVC or EverGuard PVC KEE	Drill-Tec RhinoBond PVC XHD Plates, Drill- Tec RhinoBond PVC XHD Tread Safe Plates (see note) and Drill- Tec #14 Fasteners (structural concrete deck only) or Drill- Tec XHD Fasteners (steel deck only)	Max. 24 x 24 in. grid	60

			BASE	TOP			· · · · · · · · · · · · · · · · · · ·	
SYSTEM		BARRIER	INSULATION ¹	INSULATION ¹		ROOF C	OVER⁵	ALLOWABLE WIND UPLIFT
NO	DECK ²	BOARD OR SLIP SHEET	Туре	Туре	Membra ne	Fasteners and Plates ^{3,4}	Contributory Area per Fastener Max. Fastener Spacing (inches)	PRESSURE (psf)
NC-4	Min. 22 ga, type B, Grade 33 steel or min. 2,500 psi concrete	(Optional) Min. 0.5 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board or ¾ in. thick EnergyGuard Perlite Roof Insulation (Homogeneou s)	Min. 1.0 in. thick EnergyGuard Polyiso Insulation EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, or Structodek™ High Density Fiber Board Roof Insulation	EverGua rd PVC or EverGua rd PVC KEE	Drill-Tec RhinoBond PVC XHD Plates, Drill-Tec RhinoBond PVC XHD Tread Safe Plates (see note) and Drill-Tec #14 Fasteners (structural concrete deck only) or Drill-Tec #15 XHD Fasteners (steel deck only)	2.67 ft² (12 Fasteners per 48 x 96 in. Board)	83
NC-5	Min. 22 ga, type B, Grade 33 steel or min. 2,500 psi concrete	(Optional) Min. 0.5 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board or ¾ in. thick EnergyGuard Perlite Roof Insulation (Homogeneou s)	Min. 1.5 in. thick EnergyGuard Polyiso Insulation EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, or Structodek™ High Density Fiber Board Roof Insulation	EverGua rd PVC or EverGua rd PVC KEE	Drill-Tec RhinoBond PVC XHD Plates, Drill-Tec RhinoBond PVC XHD Tread Safe Plates (see note) and Drill-Tec #14 Fasteners (structural concrete deck only) or Drill-Tec #15 XHD Fasteners (steel deck only)	Max. 16 x 24 in. grid	83

SYSTEM		BARRIER BOARD	BASE INSULATION ¹	TOP INSULATION ¹		ROOF COVE	· · · · · · · · · · · · · · · · · · ·	ALLOWABLE
NO	DECK ²	OR SLIP SHEET	Туре	Туре	Membrane	Fasteners and Plates ^{3,4}	Contributory Area per Fastener Max. Fastener Spacing (inches)	WIND UPLIFT PRESSURE (psf)
C-1	Min. 15/32 in. Plywood or 1 in. Wood Plank or 15/32 in. APA Span- Rated OSB Secured to Structural Lumber Supports Spaced Max. 24 in. o.c.	None	(Optional, One or more of the following) Min. 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation Insulation	Min. 0.25 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC or EverGuard Extreme PVC	Drill-Tec RhinoBond PVC XHD Plates or Drill-Tec RhinoBond PVC XHD Tread Safe Plates and Drill-Tec #14 Fasteners	Max. 18 x 24 in. grid	38
C-2	Min. 15/32 in. Plywood or 1 in. Wood Plank or 15/32" APA-Rated OSB Secured to Structural Lumber Supports Spaced Max. 24 in. o.c.	None	(Optional, One or more of the following) Min. 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Min. 0.25 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, or SECUROCK® Glass-Mat Roof Board	EverGuard PVC or EverGuard PVC KEE	Drill-Tec RhinoBond PVC XHD Plates or Drill-Tec RhinoBond PVC XHD Tread Safe Plates and Drill-Tec #14 Fasteners secured 24 in. o.c. into the structural lumber supports (max. 24 x 24 in. grid)	Max. 24 x 32 in. grid	60

For **SI:** 1 inch = 25.4 mm; 1 ft = 0.305 m; 1 psf = 47.88 Pa.

¹All foam plastic insulation must be UL classified and limited to the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness

in accordance with this table, whichever is less. Unless otherwise noted, all insulations are flat or taper board of the minimum thickness noted.

2Wood deck must be minimum 15/32-inch-thick (11.9 mm) plywood or 1-inch-thick wood plank. Steel deck must be minimum No. 22 gage galvanized steel

^{[0.030}inch (0.76 mm)]. Concrete must have a minimum compressive strength (f₂) of 2500 psi.
³Insulation Plates & Screws: Drill-Tec™ 3" Steel Plates, 3" Standard Steel Plates, AccuTrac® Flat Plates, AccuTrac® Recessed Plates, 3 in. Ribbed Galvalume Plates (Flat) and Drill-Tec™ #12 Fasteners (steel deck only) or Drill-Tec™ #14 Fasteners (steel or structural concrete)

⁴Drill-Tec™ 3" Recessed Steel Plates or Drill-Tec™ 3" Flat Steel Plates and Drill-Tec™ #12 DP Fasteners (steel deck only) or Drill-Tec™ #14 HD Fasteners (steel or structural concrete), applied within the contributory area specified above. ⁵The membrane side laps are minimum 3.0 in. wide and are sealed with minimum 1.5 in. wide heat welds.

TABLE 4—WIND RESISTANCE —MECHANICALLY FASTENED ROOF COVERING SYSTEMS

			BASE INSULATION	TOP INSULATION ¹			ROOF CO	VER ⁵			ALLOW- ABLE
SYSTEM NO	DECK ²	BARRIER BOARD OR SLIP SHEET	Туре	Туре	Membrane	Fasteners and Plates ^{3,4}	Min. Lap Width	Min. Weld Width	Max. Lap Spacing	Max. Fastener Spacing	WIND UPLIFT PRESSU RE (psf)
C-1	Min. 15/32 in. Plywoo d or 1 in. Wood Plank or 15/32" APA Rated OSB	VersaShield Solo Fire Resistant Slip Sheet OR Min.0.25 in. thick DensDeck®, SECUROCK® Gypsum- Fiber Roof Board, or SECUROCK® Glass-Mat Roof Board (not required when used as coverboard)	Min. 0.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. thick DensDeck®, SECUROCK Gypsum- Fiber Roof Board, SECUROCK® Glass- Mat Roof Board, min. 0.5 in. thick EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, Structodek High Density Fiberboard Roof Insulation, EnergyGuard Perlite Recover Board or min. 0.75 in. thick EnergyGuard Perlite Roof Insulation	EverGuard PVC or EverGuard PVC KEE	See footnote 6 for fastener and plate options	6 in.	1.5 in.	114 in.	6 in.	30
NC-1	22 ga, 33 ksi Steel or Structur al Concret e	Min. 0.5 in. thick DensDeck®, SECUROCK® Gypsum- Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, or 0.75 in. thick EnergyGuard Perlite Roof Insulation	Min. 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum- Fiber Roof Board, SECUROCK® Glass- Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board, Structodek High Density Fiber Board Roof Insulation, EnergyGuard Perlite Recover Board, or min. 0.75 in. thick EnergyGuard Perlite Roof Insulation)	EverGuard PVC or EverGuard PVC KEE	See footnote 7 for fastener and plate options	6 in.	1.5 in.	114 in.	12 in.	30

TABLE 4—WIND RESISTANCE —MECHANICALLY FASTENED ROOF COVERING SYSTEMS (continued)

	1	TABLE 4	THE REGIOTAL	NCE —MECHANICAI	LITAGILIN	LD ROOF GO	VEIXIIIO O	O I LINO (continuea		
SYSTEM	DECK ²		BASE INSULATION ¹	TOP INSULATION ¹			ROOF CO\	/ER⁵			ALLOW- ABLE
NO		BARRIER BOARD OR SLIP SHEET	Туре	Туре	Membrane	Fasteners and Plates ^{3,4}	Min. Lap Width	Min. Weld Width	Max. Lap Spacing	Max. Fastener Spacing	WIND UPLIFT PRESSU RE (psf)
NC-2	Min. 80ksi Steel or Structural Concrete	Min. 0.5 in. thick DensDeck®, SECUROCK® Gypsum- Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, or 0.75 in. thick EnergyGuard Perlite Roof Insulation	Min. 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) Min. 0.25 in. DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, SECUROCK® Glass-Mat Roof Board, min. 0.5 in. EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board Structodek High Density Fiber Board Roof Insulation, EnergyGuard Perlite Recover Board, or min. 0.75 in. thick EnergyGuard Perlite Roof Insulation	EverGuard PVC or EverGuard PVC KEE	See footnote 7 for fastener and plate options	6 in.	1.5 in.	114 in.	6 in.	45
NC-3	22 ga, 33 ksi Steel or Structural Concrete	None	Min. 1.0 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) 0.75 in. EnergyGuard Perlite Roof Insulation, 0.5 in. EnergyGuard Perlite Recover Board, 0.5 in. EnergyGuard High Density Wood Fiberboard, or 0.25 in. DensDeck	EverGuard PVC or EverGuard PVC KEE	See footnote 9 for fastener and plate options	6 in.	1.5 in.	54 in.	12 in.	53

TABLE 4—WIND RESISTANCE —MECHANICALLY FASTENED ROOF COVERING SYSTEMS (continued)

SYSTEM DE	DECK ²	DECK ²	BARRIER	BASE INSULATION ¹	TOP INSULATION ¹			ROOF CO	/ER⁵			ALLOW- ABLE
		BOARD OR SLIP SHEET	Туре	Туре	Membrane	Fasteners and Plates ^{3,4}	Min. Lap Width	Min. Weld Width	Max. Lap Spacing	Max. Fastener Spacing	WIND UPLIFT PRESSU RE (psf)	
NC-4	22 ga, 33 ksi Steel or Structural Concrete	None	Min. 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	(Optional) 0.75 in. EnergyGuard Perlite Roof Insulation, 0.5 in. EnergyGuard Perlite Recover Board, 0.5 in. EnergyGuard High Density Wood Fiberboard, or 0.25 in. DensDeck	EverGuard PVC or EverGuard PVC KEE	See footnote 8 for fastener and plate options	6 in.	1.5 in.	54 in.	6 in.	60	

For **SI:** 1 inch = 25.4 mm; 1 ft = 0.305 m; 1 psf = 47.88 Pa.

¹All foam plastic insulation must be UL classified and limited to the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness

in accordance with this table, whichever is less. Unless otherwise noted, all insulations are flat or taper board of the minimum thickness noted. The insulation is preliminarily secured ²Wood deck must be minimum ¹⁵/₃₂-inch-thick (11.9 mm) plywood or 1-inch-thick wood plank. Steel deck must be minimum No. 22 gage galvanized steel

[0.030inch (0.76 mm)]. Concrete must have a minimum compressive strength (f_c) of 2500 psi.

³Insulation Plates & Screws: Drill-Tec™ 3" Steel Plates, 3" Standard Steel Plates, AccuTrac® Flat Plates, AccuTrac® Recessed Plates, 3 in. Ribbed Galvalume Plates (Flat) and Drill-Tec™ #12 Fasteners (steel deck only) or Drill-Tec™ #14 Fasteners (steel or structural concrete)

⁴Drill-Tec™ 3" Recessed Steel Plates or Drill-Tec™ 3" Flat Steel Plates and Drill-Tec™ #12 DP Fasteners (steel deck only) or Drill-Tec™ #14 HD Fasteners (steel or structural concrete), applied within the contributory area specified above.

⁵The membrane is adhered to the insulation with the selected adhesive per manufacturer's published installation instructions. Membrane side laps are min. 3.0 in. wide and sealed with min. 1.5" wide heat welds.

⁶Membrane Fastener & Plates: Drill-Tec #14 Fasteners and Drill-Tec 2 in. Double Barbed XHD, Drill-Tec 2-3/8 in. Barbed XHD, Drill-Tec 2-3/8 in. Eyehook AccuSeam, Drill-Tec™ 2.4 in. Barbed Seam or Drill-Tec™ 2.4 in. Scoop Seam Plates

Membrane Fastener & Plates: Drill-Tec #14 Fasteners (structural concrete deck only) OR Drill-Tec XHD Fasteners (steel deck only) and Drill-Tec 2 in. Double Barbed XHD, Drill-Tec #14 Fasteners (structural concrete deck only) OR Drill-Tec #14 Fasteners (structural concrete deck Tec 2-3/8 in. Barbed XHD OR Drill-Tec #14 Fasteners (structural concrete deck only) OR Drill-Tec EHD Fasteners (steel deck only) and Drill-Tec ™ 2.4 in. Barbed Seam or Drill-Tec™ 2.4 in. Scoop Seam Plates OR Drill-Tec Extra Heavy Duty ASAP Assembled Screw and 2-3/8 in. Steel Plate (steel deck only)

8Membrane Fastener & Plates: Drill-Tec #14 Fasteners (structural concrete deck only) OR Drill-Tec XHD Fasteners (steel deck only) and Drill-Tec 2-3/8 in. Barbed XHD Plates OR Drill-Tec EHD Fasteners (steel deck only) Drill-Tec™ 2.4 in. Barbed Seam or Drill-Tec™ 2.4 in. Scoop Seam Plates

9Membrane Fastener & Plates: Drill-Tec #14 Fasteners (structural concrete deck only) OR Drill-Tec XHD Fasteners (steel deck only) and Drill-Tec 2-3/8 in. Eyehook AccuSeam Plates

TABLE 5—WIND RESISTANCE —ADHERED ROOF COVERING SYSTEMS

SYSTEM		BARRIER	INSULATION		INSULATION ATTACHMENT		ROOF COVER⁵	ALLOWABLE WIND UPLIFT
NO	DECK ²	BOARD OR SLIP SHEET	ATTACHME NT ^{3,4}	INSULATION ¹		MEMBRANE	MEMBRANE ATTACHMENT ⁶	PRESSURE (psf)
C-1	Min. 15/32 in. Plywood or 1 in. Wood Plank	VersaShield Solo Fire Resistant Slip Sheet OR Min. 0.25 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, or SECUROCK® Glass-Mat Roof Board	Fastened through insulation and barrier board or slip sheet	Any thickness EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Drill-Tec 3" Steel Plates, Drill-Tec #12 Fasteners, 1.6 ft² per fastener (20 fasteners per 4 x 8 ft. board) OR Drill-Tec 3" Recessed Steel Plates and Drill- Tec #12 DP Fasteners	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive OR EverGuard PVC Quick LayAdhesive	60.0

							ROOF COVER⁵	ALLOW- ABLE
SYSTEM NO	DECK ²	BARRIER BOARD OR SLIP SHEET	INSULATION ATTACHMENT 3,4	INSULATION ¹	INSULATION ATTACHMENT	MEMBR ANE	MEMBRANE ATTACHMENT ⁶	WIND UPLIFT PRESSUR E (psf)
C-2	Min. 15/32 in. Plywood or 1 in. Wood Plank	VersaShield Solo Fire Resistant Slip Sheet OR Min. 0.25 in. thick DensDeck®, SECUROC K® Gypsum- Fiber Roof Board, or SECUROC K® Glass- Mat Roof Board	Fastened through insulation and barrier board or slip sheet	Min. 2.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Drill-Tec 3" Steel Plates and Drill-Tec #12 Fasteners, 1.78 ft² per fastener (18 fasteners per 4 x 8 ft. board) OR Drill-Tec 3" Recessed Steel Plates and Drill-Tec #12 DP Fasteners	EverGuar d PVC or EverGuar d PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive OR EverGuard PVC Quick Lay Adhesive	52.5
C-3	Min. 15/32 in. Plywood or 1 in. Wood Plank	None	N/A	Min. 1.0 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	OlyBond 500 or LRF Adhesive M or LRF Adhesive XF applied in 0.75-1.00 in. wide ribbons spaced 6 in. o.c.	EverGuar d PVC or EverGuar d PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive OR EverGuard PVC Quick LayAdhesive LV 50	75.0
C-4	Min. 15/32 in. Plywood or 1 in. Wood Plank	None	N/A	Min. 1.0 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	OlyBond 500 or LRF Adhesive M or LRF Adhesive XF applied in 0.75-1.00 in. wide ribbons spaced 12 in. o.c.	EverGuar d PVC or EverGuar d PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive OR EverGuard PVC Quick Lay Adhesive	67.5

For **SI:** 1 inch = 25.4 mm; 1 ft = 0.305 m; 1 psf = 47.88 Pa.

¹All foam plastic insulation must be UL classified and limited to the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness

in accordance with this table, whichever is less. Unless otherwise noted, all insulations are flat or taper board of the minimum thickness noted.

²Wood deck must be minimum ¹⁵/₃₂-inch-thick (11.9 mm) plywood or 1-inch-thick wood plank. Steel deck must be minimum No. 22 gage galvanized steel [0.030 inch (0.76 mm)]. Concrete

must have a minimum compressive strength (f_c) of 2500 psi.

3Insulation Plates & Screws Note: Drill-Tec™ 3" Steel Plates, 3" Standard Steel Plates, AccuTrac® Flat Plates, AccuTrac® Recessed Plates, 3 in. Ribbed Galvalume Plates (Flat) and Drill-Tec™ #12 Fasteners (steel deck only) or Drill-Tec™ #14 Fasteners (steel or structural concrete) OR

⁴Drill-Tec™ 3" Recessed Steel Plates or Drill-Tec™ 3" Flat Steel Plates and Drill-Tec™ #12 DP Fasteners (steel deck only) or Drill-Tec™ #14 HD Fasteners (steel or structural concrete), applied within the contributory area specified above.

⁵The membrane is adhered to the insulation with the selected adhesive per GAF or the adhesive manufacturer's published installation instructions. Membrane side laps are min. 3.0 in. wide and sealed with min. 1.5" wide heat welds.

⁶ Adhesive and adhesive application rates to be as specified in Section 3.8 and <u>Table 8</u>, unless the adhesive application rate is described in the system detailed in <u>Table 5</u>,

TABLE 6—WIND RESISTANCE —ADHERED ROOF COVERING SYSTEMS

SYSTEM		INSULATION	INSULATION	COVER BOARD	COVER BOARD AND/OR	F	COOF COVER⁵	ALLOWABLE WIND
NO	DECK ²	1	1 ATTACHMENT ³ , AND/OR INSUL		INSULATION ATTACHMENT	MEMBRANE	MEMBRANE ATTACHMENT ⁶	UPLIFT PRESSURE (psf)
C-1	Min. 15/32 in. Plywood or 1 in. Wood Plank	(Optional) Min 0.5 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Loose Laid	0.25 in. thick USG SECUROCK® Gypsum- Fiber Roof Board	Drill-Tec 3" Standard Steel Plates and Drill-Tec # 12 Fasteners, 18 per board OR Drill-Tec 3" Recessed Steel Plates and Drill-Tec #12 DP Fasteners, (18 fasteners per board	EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive OR OlyBond 500 Canister OR LRF Adhesive O or LRF Adhesive M or LRF Adhesive XF	60.0
C-2	Min. 15/32 in. Plywood or 1 in. Wood Plank	(Optional) Min 0.5 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Loose Laid	0.25 in. thick DensDeck Prime Roof Board	Drill-Tec 3" Standard Steel Plates and Drill-Tec #12 Fasteners, 18 per board OR Drill-Tec 3" Recessed Steel Plates and Drill-Tec #12 DP Fasteners, 2.67 ft² per fastener (12 fasteners per 4 x 8 ft. board board)	EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive OR OlyBond 500 Canister OR LRF Adhesive O or LRF Adhesive M or LRF Adhesive XF	52.5
NC-1	22 ga, 33 ksi Steel or Structural Concrete	Min 1.5 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	2.67 ft² per fastener (12 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum- Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board NH HD Plus Polyiso Cover Board	LRF Adhesive M or OlyBond 500	EverGuard PVC or EverGuard PVC KEE	EverGuard® PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive (no SECUROCK coverboard) OR EverGuard PVC Quick Lay Adhesive	38

SYSTEM			INSULATION	COVER BOARD	COVER BOARD AND/OR		ALLOWABLE WIND UPLIFT	
NO	DECK ²	INSULATION 1	ATTACHMENT ^{3,} 4	AND/OR INSULATION	INSULATION ATTACHMENT	MEMBRANE	MEMBRANE ATTACHMENT ⁶	PRESSURE (psf)
NC-2	22 ga, 33 ksi Steel or Structural Concrete	Min 1.5 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	2.0 ft² per fastener (16 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board NH HD Plus Polyiso Cover Board	LRF Adhesive M or OlyBond 500	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive (no SecuRock coverboard) OR EverGuard PVC Quick Lay Adhesive	45
NC-3	22 ga, 33 ksi Steel or Structural Concrete	Min 2.0 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	4.0 ft² per fastener (8 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board NH HD Plus Polyiso Cover Board NH HD Plus Polyiso Cover	LRF Adhesive M or OlyBond 500	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray (no SecuRock coverboard) OR EverGuard PVC Quick Lay Adhesive	30

SYSTEM		INSULATION	INSULATION	COVER BOARD	COVER BOARD AND/OR		ROOF COVER⁵	ALLOWABLE WIND UPLIFT
NO	DECK ²	1	ATTACHMENT ^{3,} 4	AND/OR INSULATION	INSULATION ATTACHMENT ^{3,4}	MEMBRANE	MEMBRANE ATTACHMENT ⁶	PRESSURE (psf)
NC-4	22 ga, 33 ksi Steel or Structural Concrete	Min 2.0 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	2.9 ft² per fastener (11 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board Cover Board EnergyGuard NH HD Plus Polyiso Cover Board	LRF Adhesive M or OlyBond 500.	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive (no SecuRock coverboard) OR EverGuard PVC Quick Lay Adhesive	45
NC-5	22 ga, 33 ksi Steel or Structural Concrete	Min 1.5 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	2.67 ft² per fastener (12 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	LRF Adhesive M or OlyBond 500	EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	Adhered with EverGuard WB 181 Bonding Adhesive	38
NC-6	22 ga, 33 ksi Steel or Structural Concrete	Min 1.5 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	2.0 ft ² per fastener (16 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	LRF Adhesive M or OlyBond 500	EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	Adhered with EverGuard WB 181 Bonding Adhesive OR OlyBond 500 Canister OR LRF Adhesive O or LRF Adhesive M	45

SYSTEM		INSULATIO	INSULATION	COVER BOARD	COVER BOARD		ROOF COVER⁵	ALLOWABLE WIND UPLIFT
NO	DECK ²	N ¹	ATTACHMENT ^{3,4}	AND/OR INSULATION	AND/OR INSULATION ATTACHMENT ^{3,4}			PRESSURE (psf)
NC-7	22 ga, 33 ksi Steel or Structural Concrete	Min 2.0 in. EnergyGuar d Polyiso Insulation, EnergyGuar d Ultra Polyiso Insulation, EnergyGuar dNH Polyiso Insulation, or EnergyGuar dNH Ultra Polyiso Insulation	4.0 ft ² per fastener (8 fasteners per 4 x 8 ft. board board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, EnergyGuard NH HD Plus Polyiso Cover Board	LRF Adhesive M or OlyBond 500	EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive OR OlyBond 500 Canister OR LRF Adhesive O or LRF Adhesive M	30
NC-8	22 ga, 33 ksi Steel or Structural Concrete	Min 2.0 in. EnergyGuar d Polyiso Insulation, EnergyGuar d Ultra Polyiso Insulation, EnergyGuar dNH Polyiso Insulation, or EnergyGuar dNH Ultra Polyiso Insulation	2.9 ft ² per fastener (11 fasteners per 4 x 8 ft. board) See Footnotes 3 and 4 for fasteners	(Optional) Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, EnergyGuard HD Polyiso Cover Board, EnergyGuard HD Plus Polyiso Cover Board, EnergyGuard NH HD Polyiso Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board Cover Board	LRF Adhesive M or OlyBond 500	EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive OR OlyBond 500 Canister OR LRF Adhesive O or LRF Adhesive M	45
NC-9	22 ga, 33 ksi Steel or Structural Concrete	Min. 0.5 in. thick DensDeck® Prime or SECUROC K® Gypsum- Fiber Roof Board and GAF SA Vapor Retarder XL, self adhered	4.0 ft ² per fastener (8 fasteners per 4 x 8 ft. board) See Footnotes 3 and 4 for fasteners	Min 1.0 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuardNH Polyiso Insulation, or EnergyGuardNH Ultra Polyiso Insulation	LRF Adhesive M or OlyBond 500	EverGuard PVC or EverGuard PVC KEE	EverGuard WB 181 Bonding Adhesive	45

SYSTEM	_	INSULATIO	INSULATION	COVER BOARD	COVER BOARD AND/OR		ROOF COVER ⁵	ALLOWABLE WIND UPLIFT
NO	DECK ²	N ¹	ATTACHMENT ^{3,4}	AND/OR INSULATION	INSULATION ATTACHMENT ^{3,4}	MEMBRANE	MEMBRANE ATTACHMENT ⁶	PRESSURE (psf)
NC-10	22 ga, 33 ksi Steel or Structural Concrete	Min 1.0 in. EnergyGuar d Polyiso Insulation, EnergyGuar d Ultra Polyiso Insulation, EnergyGuar dNH Polyiso Insulation, or EnergyGuar dNH Ultra Polyiso Insulation	Loose laid	Min. 0.25 in. thick DensDeck® Prime, SECUROCK® Gypsum-Fiber Roof Board, or SECUROCK® Glass- Mat Roof Board	4.0 ft² per fastener (8 fasteners per 4 x 8 ft. board): Secured with Drill-Tec #12 Fasteners (steel deck only) or Drill- Tec #14 Fasteners (steel or structural concrete deck) and Drill-Tec 3" Steel Plates, Drill-Tec 3" Standard Steel Plates, Drill-Tec AccuTrac Recessed Plates or Drill-Tec 3" Recessed Plates. OR Drill-Tec 3" Recessed Steel Plates or Drill-Tec 3" Flat Steel Plates and Drill-Tec #12 DP Fasteners (steel deck only) or Drill- Tec #14 HD Fasteners (steel or structural concrete)	EverGuard PVC, EverGuard PVC KEE, or EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive (Fleece-Back Membrane only) OR EverGuard PVC #2331 Bonding Adhesive (smooth-back membrane only) OR EverGuard PVC Quick Spray Adhesive (smooth-back membranes only, no SecuRock coverboard) OR EverGuard PVC Quick Lay Adhesive (smooth-backed membrane only)	30
NC-11	22 ga, 33 ksi Steel or Structural Concrete	Min 1.0 in. EnergyGuar d Polyiso Insulation, EnergyGuar d Ultra Polyiso Insulation, EnergyGuar dNH Polyiso Insulation, or EnergyGuar dNH Ultra Polyiso Insulation	Loose laid	Min. 0.25 in. thick DensDeck®, SECUROCK® Gypsum-Fiber Roof Board, or SECUROCK® Glass- Mat Roof Board	3.2 ft² per fastener (10 fasteners per 4 x 8 ft. board) Secured with Drill- Tec #12 Fasteners (steel deck only) or Drill-Tec #14 Fasteners (steel or structural concrete deck) and Drill-Tec 3" Steel Plates, Drill- Tec 3" Standard Steel Plates, Drill- Tec AccuTrac Flat Plates or Drill-Tec AccuTrac Recessed Plates OR Drill-Tec 3" Recessed Steel Plates or Drill-Tec 3" Flat Steel Plates and Drill-Tec #12 DP Fasteners (steel deck only) or Drill- Tec #14 HD Fasteners (steel or structural concrete)	EverGuard PVC, EverGuard PVC KEE, or EverGuard PVC Fleece- Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive (Fleece-Back Membrane only) OR EverGuard PVC #2331 Bonding Adhesive (smooth-back membrane only) OR EverGuard PVC Quick Spray Adhesive (smooth-back membranes only, no SecuRock coverboard) OR EverGuard PVC Quick Lay Adhesive (smooth-back membrane only)	45

SYSTEM		INSULATION COVER BOARD AND/OR AND/OR AND/OR INSULATION			RC	OOF COVER ⁵	ALLOWABLE WIND UPLIFT	
NO	DECK ²	INSULATION 1	ATTACHMENT ³ ,	AND/OR INSULATION	INSULATION ATTACHMENT ^{3,4}	MEMBRANE	MEMBRANE ATTACHMENT ⁶	PRESSURE (psf)
NC-12	22 ga, 33 ksi Steel or Structural Concrete	Min 1.0 in. EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Loose laid	Min. 0.5 in. thick EnergyGuard HD Cover Board, EnergyGuard NH HD Cover Board, EnergyGuard HD Plus Cover Board, or EnergyGuard NH HD Plus Polyiso Cover Board	2.0 ft² per fastener (16 fasteners per 4 x 8 ft. board) Secured with Drill- Tec #12 Fasteners (steel deck only) or Drill-Tec #14 Fasteners (steel or structural concrete deck) and Drill-Tec 3" Steel Plates, Drill- Tec 3" Standard Steel Plates, Drill- Tec™ AccuTrac Flat Plates or Drill-Tec AccuTrac Recessed Plates	EverGuard PVC, EverGuard PVC KEE, or EverGuard PVC Fleece-Back Membrane or EverGuard PVC KEE Fleece-Back Membrane	EverGuard WB 181 Bonding Adhesive (Fleece-Back Membrane only) OR EverGuard PVC #2331 Bonding Adhesive (smooth-back membrane only) OR EverGuard PVC Quick Spray Adhesive (smooth-back membranes only) OR EverGuard PVC Quick Lay Adhesive (smooth-back membrane only)	45
NC-13	22 ga, 33 ksi Steel	Min. 2.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Drill-Tec 3" Steel Plates and Drill- Tec #12 Fasteners, 2.0 ft² per fastener (16 fasteners per 4 x 8 ft. board) OR Drill-Tec 3" Recessed Steel Plates and Drill- Tec #12 DP Fasteners	N/A	N/A	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive OR EverGuard PVC Quick Lay Adhesive	60

NC-14	22 ga, 33 ksi Steel or Structural Concrete	Min 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation, or	Drill-Tec 3" Steel Plates and Drill-Tec #12 Fasteners (for steel deck) or Drill-Tec #14 Fasteners (for concrete) OR Drill-Tec #12 DP Fasteners applied at a rate of 16 fasteners per 4'x8' board for min. 1.5 in. thick base insulation, or 8 fasteners per 4'x8' board for min 2.0 in. thick base insulation, or 10 fasteners insulation, or 10 fasteners per 10 fasteners per 10 fasteners per 11 fasteners per 12 fasteners per 13 fasteners per 14 fasteners per 16 fasteners per 17 fasteners per 18 fasteners per 18 fasteners per 18 fasteners per 19 fasteners per 10 fasteners	Min 1.5 in. thick EnergyGuard Polyiso Insulation, EnergyGuard Ultra Polyiso Insulation, EnergyGuard NH Polyiso Insulation, or EnergyGuard NH Ultra Polyiso Insulation	Olybond 500 Adhesive Fastener or LRF Adhesive M	EverGuard PVC or EverGuard PVC KEE	EverGuard PVC #2331 Bonding Adhesive OR EverGuard PVC Quick Spray Adhesive OR EverGuard PVC Quick Lay Adhesive	45
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For SI: 1 inch = 25.4 mm; 1 ft = 0.305 m; 1 psf = 47.88 Pa.

All foam plastic insulation must be UL classified and limited to the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness

Fasteners (steel deck only) or Drill-Tec™ #14 Fasteners (steel or structural concrete)

⁴Drill-Tec™ 3" Recessed Steel Plates or Drill-Tec™ 3" Flat Steel Plates and Drill-Tec™ #12 DP Fasteners (steel deck only) or Drill-Tec™ #14 HD Fasteners (steel or structural concrete), applied within the contributory area specified above.

⁵The membrane is adhered to the insulation with the selected adhesive per GAF or the adhesive manufacturer's published installation instructions. Membrane side laps are min. 3.0 in. wide and sealed with min. 1.5" wide heat welds.

⁶ Adhesive and adhesive application rates to be as specified in Section 3.8 and <u>Table 8</u>, unless the adhesive application rate is described in the system detailed in <u>Table 6</u>.

TABLE 7—WIND RESISTANCE —ADHERED ROOF COVERING SYSTEMS

SYSTEM	DECK1	THERMAL	THERMAL BARRIER	VAPOR	INSULATION ³	COVERBAORD ⁴	ROC	ALLOWABLE WIND UPLIFT	
NO	BLOIN	BARRIER	ATTACHMENT ²	BARRIER	MODERNON	COVERDACED	MEMBRANE	MEMBRANE ATTACHMENT ⁶	PRESSURE (psf)
NC-1	22 ga, 33 ksi Steel	Min. 0.5 in. thick DensDeck® Prime Roof Board	Drill-Tec 3" Ribbed Galvalum Plates (Flat) and Drill-Tec #12 Fasteners applied at a rate of 8 fasteners per 4'x8' board	GAF SA Vapor Retarder XL, self-adhered to the thermal barrier	One or more layers of Min 1.5 in. thick EnergyGuard Ultra Polyiso Insulation adhered with HB Fuller Millenium PG-1 Pump Grade Adhesive applied in 0.75 to 1-inch-wide ribbons spaced 12 inches on center	Min. 0.5 in. thick DensDeck Prime Roof Board adhered with GAF LRF Adhesive M applied in 0.75 to 1-inch-wide ribbons spaced 12 inches on center	EverGuard PVC Fleeceback	EverGuard WB 181 Bonding Adhesive applied at 1 gal per 115-125 ft ²	45
NC-2	22 ga, 33 ksi Steel	Min. 0.5 in. thick DensDeck [®] Prime Roof Board	Drill-Tec 3" Ribbed Galvalum Plates (Flat) and Drill-Tec #12 Fasteners applied at a rate of 8 fasteners per 4'x8' board	GAF SA Vapor Retarder XL, self-adhered to the thermal barrier	One or more layers of Min 1.5 in. thick EnergyGuard Ultra Polyiso Insulation adhered with HB Fuller Millenium PG-1 Pump Grade Adhesive applied in 0.75 to 1-inch-wide ribbons spaced 12 inches on center	Min. 0.5 in. thick DensDeck Prime Roof Board adhered with GAF LRF Adhesive M applied in 0.75 to 1-inch-wide ribbons spaced 12 inches on center	EverGuard PVC Fleeceback	HB Fuller Millenium PG-1 Pump Grade Adhesive applied in a spatter pattern at 0.3 gal per 100 ft² to both topside of coverboard and underside of membrane	45

For SI: 1 inch = 25.4 mm: 1 ft = 0.305 m: 1 psf = 47.88 Pa.

in accordance with this table, whichever is less. Unless otherwise noted, all insulations are flat or taper board of the minimum thickness noted.

2Wood deck must be minimum 15/32-inch-thick (11.9 mm) plywood or 1-inch-thick wood plank. Steel deck must be minimum No. 22 gage galvanized steel [0.030inch (0.76 mm)]. Concrete must have a minimum compressive strength (£) of 2500 psi.

3Insulation Plates & Screws Note: Drill-Tec™ 3" Steel Plates, 3" Standard Steel Plates, AccuTrac® Flat Plates, AccuTrac® Recessed Plates, 3 in. Ribbed Galvalume Plates (Flat) and Drill-Tec™ #12

To steel deck must be minimum No. 22 gage galvanized steel [0.030inch (0.76 mm)].

Thermal barrier attachment must be with Drill-Tec™ 3" Steel Plates and Drill-Tec™ #12 Fasteners.

All foam plastic insulation must be UL classified and limited to the maximum thickness in accordance with Section 3.5 of this report or the maximum thickness.

in accordance with this table, whichever is less. Unless otherwise noted, all insulations are flat or taper board of the minimum thickness noted

⁴All coverboards must be UL classified.
⁵The membrane is adhered to the insulation with the selected adhesive per GAF or the adhesive manufacturer's published installation instructions. Membrane side laps are min. 3.0 in. wide and sealed with min. 1.5" wide heat welds.

6 Adhesive and adhesive application rates to be as specified in Section 3.8 and Table 8, unless the adhesive application rate is described in the system detailed in Table 7. The adhesive is

applied to the coverboard , and the membrane is rolled into the wet adhesive.

TABLE 8—ADHESIVE APPLICATION RATE

ICC-ES° Most Widely Accepted and Trusted

MEMBRANE ADHESIVE APPLICATION RATE GAF EverGuard® PVC #2331 Bonding Adhesive 1.67 to 1.80 Gal./100sq. ft. (55-60 sq. ft./gal.) GAF EverGuard® WB 181 Bonding Adhesive 0.83 to 1.00 Gal./100 sq. ft. (100-120 sq. ft./gal.) GAF EverGuard® PVC Quick Spray Adhesive 0.705 lbs./100 sq. ft. GAF EverGuard® PVC Quick Lay Adhesive 1.00 Gal./100 sq. ft. (100 sq. ft./gal.) 3/4-inch-wide beads spaced 12" on-center GAF LRF Adhesive M applied parallel to the incline of the roof 3/4-inch-wide beads spaced 12" on-center GAF LRF Adhesive O applied parallel to the incline of the roof OMG Inc. OlyBond 500 3/4 - 1inch-wide beads spaced 12" on-center OMG Inc. OlyBond 500 Canister Spatter Pattern (50 percent Coverage) GAF LRF Adhesive XF 3/4 - 1inch-wide beads spaced 12" on-center GAF LRF Adhesive XF 3.0 lbs/100 sq. ft. (Spatter Pattern) HB Fuller Millenium PG-1 Pump Grade Adhesive Spatter Pattern (0.3 Gal./100 sq. ft.)



ICC-ES Evaluation Report

ESR-5430 City of LA Supplement

Issued July 2025

This report is subject to renewal July 2026.

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A Subsidiary of the International Code Council®

DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION

Section: 07 54 00—Thermoplastic Membrane Roofing

Section: 07 54 19—Polyvinyl Chloride Roofing

REPORT HOLDER:

GAF

EVALUATION SUBJECT:

EVERGUARD® PVC SINGLE-PLY ROOF MEMBRANE SYSTEMS: EVERGUARD® PVC. EVERGUARD® PVC FLEECE-BACK MEMBRANE, EVERGUARD PVC KEE, EVERGUARD® PVC KEE FLEECE-BACK MEMBRANE

1.0 REPORT PURPOSE AND SCOPE

Purpose:

The purpose of this evaluation report supplement is to indicate that the EverGuard® PVC Single-Ply Roof Membrane Systems, described in ICC-ES evaluation report ESR-5430, have also been evaluated for compliance with the codes noted below as adopted by the Los Angeles Department of Building and Safety (LADBS).

Applicable code editions:

- 2023 City of Los Angeles Building Code (LABC)
- 2023 City of Los Angeles Residential Code (LARC)

2.0 CONCLUSIONS

The EverGuard® PVC Single-Ply Roof Membrane Systems, described in Sections 2.0 through 7.0 of the evaluation report ESR-5430, comply with the LABC Chapter 15 and LARC Chapter 9, and are subjected to the conditions of use described in this supplement.

3.0 CONDITIONS OF USE

The EverGuard® PVC Single-Ply Roof Membrane Systems, described in this evaluation report must comply with all of the following conditions:

- All applicable sections in the evaluation report ESR-5430.
- The design, installation, conditions of use and identification are in accordance with the 2021 International Building Code® (IBC) and 2021 International Residential Code® (IRC) provisions, as applicable, noted in the evaluation report ESR-5430.
- The design, installation and inspection are in accordance with additional requirements of LABC Chapters 16 and 17, or LARC Chapter 3, as applicable.
- The EverGuard® PVC Single-Ply Roof Membrane Systems must not be installed over existing wood shakes or wood shingles in accordance with LABC Section 1512 and LARC Section R908.
- The installation of the EverGuard® PVC Single-Ply Roof Membrane Systems must comply with City of Los Angeles Information Bulletin P/BC 2023-016, "Dwellings in High Wind Velocity Areas (HWA)".
- Reroofing applications must comply with Sections 4.2.2, 4.3.2 and 5.8 of the evaluation report ESR-5430, LABC Section 1512 or LARC Section R908, as applicable. Where spaced sheathing exists, a minimum of 15/32-inch-thick (11.9 mm) plywood shall be installed prior to roofing installations.
- Where moderate or heavy foot traffic occurs for maintenance of equipment, the roof covering shall be adequately protected.
- The Building Inspector shall be notified 24 hours in advance prior to installation of the roof membranes.

This supplement expires concurrently with the evaluation report, issued July 2025.





ICC-ES Evaluation Report

ESR-5430 CA Supplement

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A Subsidiary of the International Code Council®

DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION Section: 07 53 23—Ethylene-Propylene-Diene-Monomer Roofing

Section: 07 54 19—Polyvinyl-Chloride Roofing

REPORT HOLDER:

GAF

EVALUATION SUBJECT:

EVERGUARD® PVC SINGLE-PLY ROOF MEMBRANE SYSTEMS: EVERGUARD® PVC, EVERGUARD® PVC FLEECE-BACK MEMBRANE, EVERGUARD PVC KEE, EVERGUARD® PVC KEE FLEECE-BACK MEMBRANE

1.0 REPORT PURPOSE AND SCOPE

Purpose:

The purpose of this evaluation report supplement is to indicate that the EverGuard® PVC Single-Ply Roof Membrane Systems, described in ICC-ES evaluation report ESR-1463, have also been evaluated for compliance with the codes noted below.

Applicable code editions:

■ 2022 California Building Code (CBC)

For evaluation of applicable chapters adopted by the California Office of Statewide Health Planning and Development (OSHPD) AKA: California Department of Health Care Access and Information (HCAI) and the Division of State Architect (DSA), see Sections 2.1.1 and 2.1.2 below.

■ 2022 California Residential Code (CRC)

2.0 CONCLUSIONS

2.1 CBC:

The EverGuard® PVC Single-Ply Roof Membrane Systems, described in Sections 2.0 through 7.0 of the evaluation report ESR-5430, comply with CBC Chapter 15, provided the design and installation are in accordance with the 2021 *International Building Code*® (IBC) provisions noted in the evaluation report and the additional requirements of CBC Chapter 15, as applicable.

The EverGuard® PVC Single-Ply Roof Membrane Systems may be used in the construction of new buildings located in any Fire Hazard Severity Zone within a State Responsibility Areas or any Wildland-Urban Interface Fire Area, provided installation is in accordance with the 2021 *International Building Code*® (IBC) provisions noted in the evaluation report and the additional requirements of Sections 701A.3 and 705A of the CBC.

- 2.1.1 OSHPD: The applicable OSHPD Sections and Chapters of the CBC are beyond the scope of this supplement.
- 2.1.2 DSA: The applicable DSA Sections and Chapters of the CBC are beyond the scope of this supplement.

2.2 CRC:

The EverGuard® PVC Single-Ply Roof Membrane Systems, described in Sections 2.0 through 7.0 of the evaluation report ESR-1463, comply with CRC Chapter 9, provided the design and installation are in accordance with the 2021 *International Residential Code*® (IRC) provisions noted in the evaluation report and the additional requirements of CRC Chapter 9, as applicable.

The EverGuard® PVC Single-Ply Roof Membrane Systems may be used in the construction of new buildings located in any Fire Hazard Severity Zone within a State Responsibility Areas or any Wildland-Urban Interface Fire Area, provided installation is in accordance with the 2021 *International Residential Code*® (IRC) provisions noted in the evaluation report and the additional requirements of Sections R337.1.3 and R337.5 of the CRC.

The products recognized in this supplement have not been evaluated for compliance with the International Wildland–Urban Interface Code®.

This supplement expires concurrently with the evaluation report, issued July 2025.

