



DEPARTMENT OF REGULATORY AND ECONOMIC RESOURCES (RER)
BOARD AND CODE ADMINISTRATION DIVISION

NOTICE OF ACCEPTANCE (NOA)

**MIAMI-DADE COUNTY
PRODUCT CONTROL SECTION**

11805 SW 26 Street, Room 208
Miami, Florida 33175-2474
T (786)315-2590 F (786) 31525-99

www.miamidade.gov/economy

**CertainTeed LLC.
20 Moores Road
Malvern, PA 19355**

SCOPE:

This NOA is being issued under the applicable rules and regulations governing the use of construction materials. The documentation submitted has been reviewed and accepted by Miami-Dade County RER - Product Control Section to be used in Miami Dade County and other areas where allowed by the Authority Having Jurisdiction (AHJ).

This NOA shall not be valid after the expiration date stated below. The Miami-Dade County Product Control Section (In Miami Dade County) and/or the AHJ (in areas other than Miami Dade County) reserve the right to have this product or material tested for quality assurance purposes. If this product or material fails to perform in the accepted manner, the manufacturer will incur the expense of such testing and the AHJ may immediately revoke, modify, or suspend the use of such product or material within their jurisdiction. RER reserves the right to revoke this acceptance, if it is determined by Miami-Dade County Product Control Section that this product or material fails to meet the requirements of the applicable building code.

This product is approved as described herein, and has been designed to comply with the Florida Building Code including the High Velocity Hurricane Zone of the Florida Building Code.

DESCRIPTION: CertainTeed Conventional Built-Up-Roof System over Lightweight Concrete Decks.

LABELING: Each unit shall bear a permanent label with the manufacturer's name or logo, city, state and following statement: "Miami-Dade County Product Control Approved", unless otherwise noted herein.

RENEWAL of this NOA shall be considered after a renewal application has been filed and there has been no change in the applicable building code negatively affecting the performance of this product.

TERMINATION of this NOA will occur after the expiration date or if there has been a revision or change in the materials, use, and/or manufacture of the product or process. Misuse of this NOA as an endorsement of any product, for sales, advertising or any other purposes shall automatically terminate this NOA. Failure to comply with any section of this NOA shall be cause for termination and removal of NOA.

ADVERTISEMENT: The NOA number preceded by the words Miami-Dade County, Florida, and followed by the expiration date may be displayed in advertising literature. If any portion of the NOA is displayed, then it shall be done in its entirety.

INSPECTION: A copy of this entire NOA shall be provided to the user by the manufacturer or its distributors and shall be available for inspection at the job site at the request of the Building Official.

This NOA renews NOA # 20-0723.16 and consists of pages 1 through 10.
The submitted documentation was reviewed by Alex Tigera.



**NOA No.: 23-0215.04
Expiration Date: 04/28/28
Approval Date: 05/04/23
Page 1 of 10**

ROOFING SYSTEM APPROVAL

Category: Roofing
Sub-Category: Built-Up Roofing
Material: Fiberglass
Deck Type: Lightweight Concrete
Maximum Design Pressure: -52.5 psf

TRADE NAMES OF PRODUCTS MANUFACTURED OR LABELED BY APPLICANT:

TABLE 1

<u>Product</u>	<u>Dimensions</u>	<u>Test Specification</u>	<u>Product Description</u>
Flintglas Ply 4	36" x 164'7"; Roll weight: 40/55 lbs. (5 squares)	ASTM D2178 Type IV UL Type G1	Fiberglass, asphalt impregnated ply sheet.
Flintglas Premium Ply 6	39 ³ / ₈ " x 164'7"; Roll weight: 40 lbs. (5 squares)	ASTM D2178, Type VI UL Type G1	Fiberglass, asphalt impregnated ply sheet.
Flintglas® MS Cap Sheet	36" X 32'10"; Roll Weight: 78 lbs. (1 square)	ASTM D3909 UL Type G3	Asphalt impregnated and coated inorganic glass fiber surfaced with mineral granules used as the top ply in conventional built-up roof membranes.
All Weather/Empire Base Sheet	36" x 65'10"; Roll weight: 86 lbs. (2 squares)	ASTM D4601 Type II	SBS modified, fiberglass reinforced base/ply sheet.
Flintlastic Poly SMS Base Sheet	39 ³ / ₈ " x 64' 4"; Roll weight: 90 lbs. (2 squares)	ASTM D4601 Type II	SBS modified, polyester reinforced base/ply sheet.
Glasbase Base Sheet	36" x 98'9"; Roll weight: 69 lbs. (3 squares)	ASTM D4601 Type II	Asphalt coated, fiberglass reinforced base/ply sheet.
Flintlastic Base 20	36" x 98'9"; Roll weight: 90 lbs. (3 squares)	ASTM D6163 Grade S Type I	SBS modified, fiberglass reinforced base/ply sheet.
Flintlastic Ultra Poly SMS Base Sheet	39 ³ / ₈ " x 32'10"	ASTM D6164 Grade S Type I	SBS modified, polyester reinforced base/ply sheet.



APPROVED INSULATIONS:

TABLE 2		
<u>Product Name</u>	<u>Product Description</u>	<u>Manufacturer (With Current NOA)</u>
FlintBoard ISO	Polyisocyanurate foam insulation	CertainTeed LLC.
FlintBoard _H ISO	Polyisocyanurate foam insulation	CertainTeed LLC.
ACFoam-II	Polyisocyanurate foam insulation	Atlas Roofing Corporation
DensDeck, DensDeck Prime	Water resistant gypsum board	Georgia Pacific Gypsum LLC.
H-Shield	Polyisocyanurate foam insulation	Hunter Panels, a div. of Carlisle Const. Materials
ENRGY 3	Polyisocyanurate foam insulation	Johns Manville Corp.
Ultra-Max	Polyisocyanurate roof insulation	Rmax, A Business Unit of Sika Corporation
Structodek High Density Fiberboard Insulation	High Density Wood Fiber insulation board.	Blue Ridge Fiberboard, Inc.
EnergyGuard™ Perlite Roof Insulation	Perlite insulation board	GAF
Fesco Board	Expanded perlite and fiber insulation	Johns Manville Corp.

APPROVED FASTENERS:

TABLE 3				
<u>Fastener Number</u>	<u>Product Name</u>	<u>Product Description</u>	<u>Dimensions</u>	<u>Manufacturer (With Current NOA)</u>
1.	Trufast FM-90 Base Sheet Fastener	Base ply fastening systems for lightweight concrete decks.	2.7" x 1.7"	Altenloh, Brinck & Co. U.S., Inc.
2.	CR Assembled Base Sheet Fastener (1.7")	Fastener assembly for Base Sheet fastening only	1.125" x 1.75" 2.75" Galvalume steel stress plate	OMG, Inc.



EVIDENCE SUBMITTED:

<u>Test Agency/Identifier</u>	<u>Name</u>	<u>Report</u>	<u>Date</u>
Trinity ERD	TAS 117 (B)	3503.10.06	10/10/06
	TAS 117 (B)	O6490.04.07-R1	06/27/07
	TAS 117 (B)/ ASTM D6862	C8500SC.11.07	11/30/07
	TAS 114	C8370.08.08	08/19/08
	ASTM Physical Properties	C10080.09.08-R4	03/25/10
	ASTM D4601	C40050.09.12-1	09/28/12
	ASTM D3909	C44200.03.13	03/22/13
	ASTM D2178	C47250.03.14	03/26/14
	ASTM D1876	C35460.05.11-R1	05/20/15
	ASTM D3909	CTR-SC11145.09.16-2A	09/19/16
	ASTM D4601	CTR-SC11145.09.16-3A	09/19/16
Factory Mutual Research Corp.	FMRC 4470	J.I. 3Y8A1.AM	03/23/96
	FMRC 4454	J.I. 0D3A3.AM	04/04/97
	FMRC 4470	J.I. 1D7A4.AM	11/09/98
	FMRC 4470	J.I. 2D0A0.AM	12/23/98
Underwriters Laboratories, Inc.	UL 790	R11656	01/11/13
PRI Construction Materials Technologies LLC	ASTM D6163	CTC-066-02-01	08/09/11
	ASTM D2178	CTC-123-02-01	03/13/12
	ASTM D4601	CTC-124-02-01	03/13/12
	ASTM D4601	CTC-127-02-01	03/13/12

APPROVED ASSEMBLIES

Deck Type 4I:	Lightweight Concrete, Insulated
Deck Description:	Concrecel, Mearlcrete or Elastizell Cellular Lightweight Concrete over structural concrete. (Deck System Limitations Apply.)
System Type A:	Anchor sheet mechanically fastened, one or more layer of insulation adhered with approved asphalt.

All General and System limitations apply.

LWC Deck:	<p>Minimum 160 psi, Elastizell Lightweight Insulating Concrete is applied with an 1/8" slurry coat followed by a 2" Star-R-Foam Gripper-HB or 1/12" Apache Holey Board. Apply a minimum 2" thick top coat of Elastizell Lightweight Insulating concrete.</p> <p>Or</p> <p>Minimum 200 psi, Mearlcrete is applied with an 1/8" slurry coat followed by minimum 1-1/2" thick Holey Board or EPS Insulation. Followed by a minimum 2" thick top coat of Mearlcrete or Elastizell is placed over the insulation</p> <p>Or</p> <p>Minimum 400 psi, Concrecel Bonding agent applied to the deck at rate 600 ft²/gal. followed by a slurry-coat of insulating concrete 1/4" thick above the top flange followed by a minimum 1" thick holey board and allowed to cure overnight. The following day a minimum 2 1/4" top coat Concrecel Concrete is placed. After an additional cure time of 24 hours, Concrecel Curing Compound was roller applied at a rate of 600 ft²/gal.</p>
------------------	---

Base Sheet Options:	<p>(Elastizell; Option #1) One ply of All Weather/Empire Base Sheet, Flintastic Base 20 or Flintlastic Poly SMS Base Sheet mechanically attached to the deck using Trufast FM-90 Base Sheet Fastener spaced 7" o.c. in the 4" side lap and 7" o.c. in two evenly divided, staggered rows in the center of the sheet.</p> <p><i>(Maximum Design Pressure –45 psf, See General Limitation #7.)</i></p> <p>(Concrecel or Mearlcrete; Option #2.) One ply of All Weather/Empire Base Sheet or Glasbase Base Sheet mechanically attached to the deck using OMG CR Assembled Base Sheet Fastener (1.7") spaced 7" o.c. in the 4" side lap and 7" o.c. in two evenly divided, staggered rows in the center of the sheet.</p> <p><i>(Maximum Design Pressure –52.5 psf, See General Limitation #7.)</i></p>
----------------------------	---

One or more layers of any of the following insulations:

<u>Base Insulation Layer</u>	<u>Insulation Fasteners</u>	<u>Fastener Density/ft²</u>
ACFoam-II, ENRGY 3, Ultra-Max, H-Shield Minimum 1" thick	N/A	N/A
Structodek High Density Fiberboard Insulation Minimum ½" thick	N/A	N/A
Fesco Board or EnergyGuard™ Perlite Roof Insulation Minimum ¾" thick	N/A	N/A
DensDeck, DensDeck Prime Minimum ¼" thick	N/A	N/A

<u>(Optional) Top Insulation Layer</u>	<u>Insulation Fasteners</u>	<u>Fastener Density/ft²</u>
Any Insulation listed for Base Layer, above.		

Note: All insulation shall be adhered to the anchor sheet in full mopping of approved hot asphalt within the EVT range and at a rate of 20-40 lbs./100 ft². Please refer to Roofing Application Standard RAS 117 for insulation attachment. Insulation listed as base layer only shall be used only as base layers with a second layer of approved top layer insulation installed as the final membrane substrate. Composite insulation panels may be used as a top layer placed with the polyisocyanurate side facing down.

Base Sheet:
(Optional) Install one ply of All Weather/Empire Base Sheet, Flintlastic Base 20, Flintlastic Poly SMS Base Sheet, Flintlastic Ultra Poly SMS Base Sheet or Glasbase Base Sheet directly over the top layer of insulation. Adhere with any approved mopping asphalt at an application rate of 20-35 lbs./sq.

Ply Sheet: One ply of All Weather/Empire Base Sheet, Flintlastic Base 20, Flintlastic Poly SMS Base Sheet, Flintlastic Ultra Poly SMS Base Sheet or two or more plies of Flintglas Ply Sheet 4 or Flintglas Premium Ply 6 adhered in a full mopping of approved asphalt at an application rate of 20-35 lbs./sq.

Cap Sheet:
(Optional) One ply of Flintglas MS Cap Sheet adhered in a full mopping of approved asphalt at an application rate of 20-35 lbs./sq.

Surfacing: (Required if no cap sheet is used) Any coating, listed below, used as a surfacing, must be listed within a current NOA. Install one of the following:

1. Flood coat of hot asphalt with an application rate of 60 lbs./sq. ± 20%; plus gravel or slag with an application rate of 400 lbs./sq. & 300 lbs./sq., respectively.
2. A two part coating consisting of a base coat of APOC #300 Non-Fibered Emulsion at rate of 3 gal./sq.; surfaced with 1 gal./sq. APOC#212 Fibered Aluminum Roof Coating.

Maximum Design Pressure: See fastening requirements above



Deck Type 4: Lightweight Concrete, Non-Insulated
Deck Description: Concrecel, Mearlcrete or Elastizell Cellular Lightweight Concrete over structural concrete. (Deck System Limitations Apply.)
System Type E: Base sheet mechanically fastened.

All General and System limitations apply.

LWC Deck: Minimum 160 psi, Elastizell Lightweight Insulating Concrete is applied with an 1/8" slurry coat followed by a 2" Star-R-Foam Gripper-HB or 1/12" Apache Holey Board. Apply a minimum 2" thick top coat of Elastizell Lightweight Insulating concrete.

Or

Minimum 200 psi, Mearlcrete is applied with an 1/8" slurry coat followed by minimum 1-1/2" thick Holey Board or EPS Insulation. Followed by a minimum 2" thick top coat of Mearlcrete or Elastizell is placed over the insulation

Or

Minimum 400 psi, Concrecel Bonding agent applied to the deck at rate 600 ft²/gal. followed by a slurry-coat of insulating concrete 1/4" thick above the top flange followed by a minimum 1" thick holey board and allowed to cure overnight. The following day a minimum 2 1/4" top coat Concrecel Concrete is placed. After an additional cure time of 24 hours, Concrecel Curing Compound was roller applied at a rate of 600 ft²/gal.

Base Sheet Options: (Elastizell; Option #1) One ply of All Weather/Empire Base Sheet, Flintlastic Base 20 or Flintlastic Poly SMS Base Sheet mechanically attached to the deck using Trufast FM-90 Base Sheet Fastener spaced 7" o.c. in the 4" side lap and 7" o.c. in two evenly divided, staggered rows in the center of the sheet.
(Maximum Design Pressure –45 psf, See General Limitation #7.)

(Concrecel or Mearlcrete; Option #2.) One ply of All Weather/Empire Base Sheet or Glasbase Base Sheet mechanically attached to the deck using OMG CR Assembled Base Sheet Fastener (1.7") spaced 7" o.c. in the 4" side lap and 7" o.c. in two evenly divided, staggered rows in the center of the sheet.
(Maximum Design Pressure –52.5 psf, See General Limitation #7.)

Ply Sheet: One ply of All Weather/Empire Base Sheet, Flintlastic Base 20, Flintlastic Poly SMS Base Sheet, Flintlastic Ultra Poly SMS Base Sheet or two or more plies of Flintglas Ply Sheet 4 or Flintglas Premium Ply 6 adhered in a full mopping of approved asphalt at an application rate of 20-35 lbs./sq.

Cap Sheet:
(Optional) One ply of Flintglas MS Cap Sheet adhered in a full mopping of approved asphalt at an application rate of 20-35 lbs./sq.

Surfacing:

(Required if no cap sheet is used) Any coating, listed below, used as a surfacing, must be listed within a current NOA. Install one of the following:

1. Flood coat of hot asphalt with an application rate of 60 lbs./sq. \pm 20%; plus gravel or slag with an application rate of 400 lbs./sq. & 300 lbs./sq., respectively.
2. A two part coating consisting of a base coat of APOC #300 Non-Fibered Emulsion at rate of 3 gal./sq.; surfaced with 1 gal./sq. APOC#212 Fibered Aluminum Roof Coating.

**Maximum Design
Pressure:**

See fastening requirements above



LIGHTWEIGHT INSULATING CONCRETE SYSTEM LIMITATIONS:

1. If mechanical attachment to the structural deck through the lightweight insulating concrete is proposed, a field withdrawal resistance testing shall be performed to determine equivalent or enhanced fastener patterns and density. All testing and fastening design shall be in compliance with Testing Application Standard TAS 105 and Roofing Application Standard RAS 117; calculations shall be signed and sealed by a Florida Registered Engineer, Architect, or Registered Roof Consultant.
2. For steel deck application where specific deck construction is not referenced: The deck shall be a minimum 22 gage attached with 5/8" puddle welds with weld washers at every flute with maximum deck spans of 5 ft. o.c.
3. For systems where specific lightweight insulating concrete is not referenced, the minimum design mix shall be a minimum of 300 psi.



GENERAL LIMITATIONS:

1. Fire classification is not part of this acceptance; refer to a current Approved Roofing Materials Directory for fire ratings of this product.
2. Insulation may be installed in multiple layers. The first layer shall be attached in compliance with Product Control Approval guidelines. All other layers shall be adhered in a full mopping of approved asphalt applied within the EVT range and at a rate of 20-40 lbs./sq., or mechanically attached using the fastening pattern of the top layer
3. All standard panel sizes are acceptable for mechanical attachment. When applied in approved asphalt, panel size shall be 4' x 4' maximum.
4. An overlay and/or recovery board insulation panel is required on all applications over closed cell foam insulations when the base sheet is fully mopped. If no recovery board is used the base sheet shall be applied using spot mopping with approved asphalt, 12" diameter circles, 24" o.c.; or strip mopped 8" ribbons in three rows, one at each side lap and one down the center of the sheet allowing a continuous area of ventilation. Encircling of the strips is not acceptable. A 6" break shall be placed every 12' in each ribbon to allow cross ventilation. Asphalt application of either system shall be at a minimum rate of 12 lbs./sq. **Note: Spot attached systems shall be limited to a maximum design pressure of -45 psf.**
5. Fastener spacing for insulation attachment is based on a Minimum Characteristic Force (F') value of 275 lbf., as tested in compliance with Testing Application Standard TAS 105. If the fastener value, as field-tested, are below 275 lbf. insulation attachment shall not be acceptable.
6. Fastener spacing for mechanical attachment of anchor/base sheet or membrane attachment is based on a minimum fastener resistance value in conjunction with the maximum design value listed within a specific system. Should the fastener resistance be less than that required, as determined by the Building Official, a revised fastener spacing, prepared, signed and sealed by a Florida registered Professional Engineer, Registered Architect, or Registered Roof Consultant may be submitted. Said revised fastener spacing shall utilize the withdrawal resistance value taken from Testing Application Standards TAS 105 and calculations in compliance with Roofing Application Standard RAS 117.
7. Perimeter and corner areas shall comply with the enhanced uplift pressure requirements of these areas. Fastener densities shall be increased for both insulation and base sheet as calculated in compliance with Roofing Application Standard RAS 117. Calculations prepared, signed and sealed by a Florida registered Professional Engineer, Registered Architect, or Registered Roof Consultant
(When this limitation is specifically referred within this NOA, General Limitation #9 will not be applicable.)
8. All attachment and sizing of perimeter nailers, metal profile, and/or flashing termination designs shall conform to Roofing Application Standard RAS 111 and applicable wind load requirements.
9. The maximum designed pressure limitation listed shall be applicable to all roof pressure zones (i.e. field, perimeters, and corners). Neither rational analysis, nor extrapolation shall be permitted for enhanced fastening at enhanced pressure zones (i.e. perimeters, extended corners and corners).
(When this limitation is specifically referred within this NOA, General Limitation #7 will not be applicable.)
10. All products listed herein shall have a quality assurance audit in accordance with the Florida Building Code and Rule 61G20-3 of the Florida Administrative Code.

END OF THIS ACCEPTANCE

