MIAMI-DADE

MIAMI-DADE COUNTY, FLORIDA
METRO-DADE FLAGLER BUILDING

BUILDING CODE COMPLIANCE OFFICE
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PRODUCT CONTROL DIVISION
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PRODUCT CONTROL NOTICE OF ACCEPTANCE

Johns Manville Corp.
717 17 Street (P.O. Box 5108)
Denver ,CO 80217

Your application for Notice of Acceptance (NOA) of:
Ultraguard PVC Gypsum Deck
under Chapter 8 of the Code of Miami-Dade County governing the use of Alternate Materials and Types of Construction, and completely described herein, has been recommended for acceptance by the Miami-Dade County Building Code Compliance Office (BCCO) under the conditions specified herein.

This NOA shall not be valid after the expiration date stated below. BCCO reserves the right to secure this product or material at any time from a jobsite or manufacturer's plant for quality control testing. If this product or material fails to perform in the approved manner, BCCO may revoke, modify, or suspend the use of such product or material immediately. BCCO reserves the right to revoke this approval, if it is determined by BCCO that this product or material fails to meet the requirements of the South Florida Building Code.

The expense of such testing will be incurred by the manufacturer.

ACCEPTANCE NO.: 01-0112.10
EXPIRES: 06/21/2006

Raul Rodriguez
Chief Product Control Division

THIS IS THE COVERSHEET, SEE ADDITIONAL PAGES FOR SPECIFIC AND GENERAL CONDITIONS
BUILDING CODE & PRODUCT REVIEW COMMITTEE

This application for Product Approval has been reviewed by the BCCO and approved by the Building Code and Product Review Committee to be used in Miami-Dade County, Florida under the conditions set forth above.

Francisco J. Quintana, R.A.
Director
Miami-Dade County
Building Code Compliance Office

APPROVED: 06/21/2001

ROOFING SYSTEM APPROVAL

Category:	Roofing	Approval Date: **June 21, 2001**
Sub-Category:	Single Ply	Expiration Date: **June 21, 2006**
Material:	PVC	
Deck Type:	Poured Gypsum	
Maximum Design Pressure	-45 psf	
Fire Classification:	See General Limitation #1	

TRADE NAMES OF PRODUCTS MANUFACTURED OR LABELED BY APPLICANT:

Product	Dimensions	Test Specification	Product Description
UltraGard SR-50, SR-60 and SR-80	37.5" - 81" wide	ASTM D 4434	Polyester reinforced PVC membrane 50, 60 or 80 mils thickness used in mechanically fastened and adhered roofing assemblies, and as membrane flashing for walls, curbs, etc.
UltraGard Plus 50 Plus 60	53" - 81" wide	ASTM D 4434	Polyester reinforced PVC membrane 50 mils and 60 mils thick with a 7.5 ounce polyester fleece laminated to the underside. UltraGard Plus may be mechanically attached or adhered to acceptable substrates.
UltraGard V-2/50 and V-2/60	37.5" - 81" wide	ASTM D 4434	Polyester reinforced PVC polymer based, 50 or 60 mil membrane used in mechanically fastened and adhered roofing assemblies, and as membrane flashing for walls, curbs, etc.
Seekure Paper Slipsheet	96" x 300'		A laminated Kraft paper slipsheet with a fiberglass scrim reinforcement intended for use with mechanically attached systems as a separating slipsheet over smooth substrates. It is not intended for use over smooth surface BURs.
CTP Foil Slipsheet	6' - 300'		A laminated foil/Kraft paper slip sheet with a polyethylene coating on both sides of the foil intended for use with mechanically attached systems as a separation layer.
DN Flameguard Slipsheet	71" x 700'		A laminated aluminum foil/Kraft paper slipsheet with proprietary flame extinguishing adhesive and a fiberglass scrim reinforcement for use with mechanically attached systems as a fire-retardant slipsheet in certain UL and FM assemblies.

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Roofing Product Control Examiner

Product	Dimensions	Test Specification	Product Description
Polyester Protection Mat	12' x 100'		A 9 ounce needle-punched polyester fabric that is used as a cushioning layer in certain applications.
Detail Membrane 80	35" x 75'	ASTM D 4434	35" wide, 80 mil thick PVC membrane used in field-formed flashing where heat forming is required. Available in white, grey, pearl or black.
Detail Strip 80	6" x 150'		6" wide 80 mil thick unreinforced PVC membrane strips used to waterproof joints of UltraGard metal. Available in white, grey, pearl and black.
Inside Corner	various		Pre-manufactured corners available in white or grey used to waterproof the corners of walls, parapets, etc..
Outside Corner	various		Pre-manufactured corners available in white or grey used to waterproof the corners of walls, parapets, curbs, pitch pockets, etc..
Coated Metal Sheets	4' x 8' 4' x 10'		Available in white, grey and black. 4' x 8' and 4' x 10' sheet sizes. UltraGard metal is a laminate of UltraGard PVC membrane and galvanized steel field fabricated into metal base flashings, edge details, and pitch pockets.
Coated Metal 3" strip	3" x 8' 3" x 10'		Pre-cut UltraGard metal strips are used for base securement and membrane flashing securement in specific details.
Pipe Boots	various		Pre-manufactured membrane boots used to flash round penetrations from 1" to 12" in diameter.
¼" Microfoam	6' x 225'		A multi-ply polypropylene foam intended for use with mechanically attached systems as a cushioning slipsheet over rough, uneven substrates. It is not intended for use over existing gravel surfaced built-up roofs.
JM ISO-1, E'NRG'Y 2, PSI 25	various	ASTM C 1289	Polyisocyanurate roof insulation with heavy, non-asphaltic, glass fiber reinforced facers. Available in flat and tapered sheets and ranging in thickness from 1" to 4.1".
UltraFast Standard Fastener	1¼" - 16"	PA 114	Threaded fastener used with the appropriate membrane disc or insulation plate for membrane or insulation attachment to wood, concrete and minimum 24 gauge steel decks.

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Product	Dimensions	Test Specification	Product Description
JM CD-10	1" - 16"	PA 114	Used with the appropriate membrane disc or insulation plate for membrane or insulation attachment to concrete decks.
JM NTB	2.5" - 10"	PA 114	Large auger type fastener used with the appropriate membrane disc or insulation plate for attachment of membrane or insulation to sound gypsum and cementitious wood fiber decks.
UltraGard High Load Fastener	1¼" - 16"	PA 114	Threaded fastener used with UltraGard High Load Plate to attach membrane to wood, concrete and steel decks.
UltraGard TPR Peel Rivet	1.5" - 10"	PA 114	Aluminum-magnesium peeling type fastener used with the appropriate membrane disc or insulation plate for membrane or insulation attachment to sound gypsum, cementitious wood fiber and light gauge metal decks.
UltraGard High Load Plate	2-3/8" dia. with barbs	PA 114	Steel plate used with UltraGard High Load Fastener to attach membrane to wood, concrete and steel decks.
UltraGard 2 7/8" Hex Plate	2 7/8" Hex	PA 114	Metal insulation plate used with various fasteners for insulation attachment.
UltraGard 2" Round Metal Barbed Disc	2" Round	PA 114	Used with various acceptable fasteners for membrane attachment.
UltraGard 2" Round Tri-Lock Plastic Barbed Disc	2" Round	PA 114	2" round locking plate used with acceptable fasteners for membrane attachment.
UltraGard 3" Plastic Hex Locking Plate	3" Hex	PA 114	Plastic locking plate used with various fasteners for insulation attachment.
UltraGard System AIP	2 7/8" - 12"	PA 114	Pre-assembled fastener and plate designed not to back out, used for insulation attachment to wood and min. 24 gauge steel decks.
UltraGard System AMP	2 7/8" - 12"	PA 114	Pre-assembled fastener and plate designed not to back out, used for membrane attachment to wood and min. 24 gauge steel decks.
Termination Bar	1.35" x 10'		An extruded aluminum (0.93" thick) bar slotted 6" on center used to terminate adhered "SR" and "FAS" membrane flashings in certain details.
7" Round Disk Caps	7" round		Round membrane caps used to waterproof fastening discs in certain applications. Available in white and grey.

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Product	Dimensions	Test Specification	Product Description
UltraGard PVC Membrane Adhesive (Latex)	5 Gal. Pail	Proprietary	Designed for bonding UltraGard PVC membrane to concrete, cellular concrete, and specific wood fiber roof insulations in horizontal applications only.
UltraGard PVC Membrane Adhesive (Solvent)	5 Gal. Pail	Proprietary	Designed for bonding UltraGard PVC membrane to metal, wood, concrete, cellular concrete and specific roof insulations in both horizontal and vertical applications.
UltraGard PVC Membrane One-Step Adhesive	5 Gal. Pail		Designed for bonding UltraGard PVC membrane to various vertical and horizontal surfaces.
UltraGard Sealant	30 Tube box		A single component, gun grade elastomeric polyurethane sealant used to seal UltraGard termination bar, counter flashings, etc.. UltraGard caulk is not used to caulk field seams. UltraGard caulk is available in white and grey.
UltraGard Pourable Sealer	1 Gal. Can		A two part polyurethane sealant used as a pitch pocket filler.
UltraGard PVC Round Pitch Pocket	6.5" Round		Rigid PVC flashing with an opening 6.5" in diameter used to waterproof irregularly shaped penetrations.
UltraGard PVC Sealant	1 Gal.	Proprietary	A liquid PVC compound used to seal non-encapsulated edges of completed seams.
UltraGard Solvent Welding Solution	1 Gal.		May be used to weld UltraGard PVC membrane to UltraGard metal in certain detail applications.
UltraGard Roof Systems Membrane Cleaner	1 Gal. Can		May be used to clean small areas of the membrane where asphalt, roofing cement, etc. must be removed.
Type R Tie-in Membrane	24" x 82'		An asphalt compatible PVC membrane used as a tie-in material to existing built-up roofs.
WBP 100 Walkway	48" x 60'		100 mil thick texturized polyester reinforced PVC membrane used as a walkway and protection material. Available in blue or grey.

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TRADE NAMES OF PRODUCTS MANUFACTURED BY OTHERS:

Product	Dimensions	Test Specification	Product Description	Manufacturer
EPS	various	PA 110	Extruded polystyrene insulation	generic
High Density Wood Fiberboard	various	PA 110	Wood fiber insulation board	generic
Perlite Insulation	various	PA 110	Perlite insulation board	generic
Polyethylene	4 mil min.		Vapor barrier / Air barrier	generic
Red Rosin	various		Rosin paper for barrier layer on wood decks	generic
Type X Gypsum	various		Fire resistant rated gypsum	generic
Dens-Deck	4' x 8'	PA 110	Gypsum board	Georgia-Pacific (with current PCA)
Overlayment Board	4' x 8'	PA 110	Gypsum board	Georgia-Pacific
Sturdi-Top	various	PA 110	Wood fiberboard	Georgia-Pacific (with current PCA)
Dekfast Fasteners #12, #14 & #15		PA 114	Insulation fastener for wood, steel and concrete decks	Construction Fasteners Inc. (with current PCA)
Dekfast Hex Plate	2 7/8" x 3 1/4"	PA 114	Galvalume hex stress plate.	Construction Fasteners Inc. (with current PCA)
Dekfast Lock Plate	3" x 3 1/4"	PA 114	Polypropylene locking plate.	Construction Fasteners Inc. (with current PCA)
#12 & #14 Roofgrip		PA 114	Insulation fastener for wood & steel decks	ITW Buildex (with current PCA)
AccuTrac Hextra Fastener		PA 114	Insulation fastener	ITW Buildex (with current PCA)
Hextra Plus		PA 114	Insulation fastener and metal or plastic plate	ITW Buildex (with current PCA)
Metal Plate	3" square	PA 114	3" square galvalume AZ50 stress plate	ITW Buildex (with current PCA)

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Product	Dimensions	Test Specification	Product Description	Manufacturer
AccuTrac Plate	3" square	PA 114	3" square galvalume AZ50 stress plate	ITW Buildex (with current PCA)
Gearlok Plastic Plate	3" round	PA 114	Polyolefin plastic plate	ITW Buildex (with current PCA)
Olympic Standard	3" round	PA 114	3" round galvalume AZ55 steel plate	Olympic (with current PCA)
Olympic Fastener #12 & #14		PA 114	Insulation fastener	Olympic (with current PCA)
Olympic Polypropylene	3.25" round	PA 114	Polypropylene plastic plate	Olympic (with current PCA)
Insul-Fixx Fastener		PA 114	Insulation fastener for wood, steel and concrete decks	SFS/Stadler (with current PCA)
Insul-Fixx S	3" square	PA 114	3" square galvalume AZ55 stress plate	SFS/Stadler (with current PCA)
Insul-Fixx P	3" round	PA 114	3" round polyethylene stress plate	SFS/Stadler (with current PCA)
Plate Fixx Fastener		PA 114	Insulation fastening assembly	SFS/Stadler (with current PCA)
Rawl Fasteners #12 or #14		PA 114	Insulation fastener for steel and wood decks and concrete (#14 only)	The Rawlplug Company Inc. (with current PCA)
Rawl 2" Plate	2" round	PA 114	2" round galvalume AZ55 membrane plate	The Rawlplug Company Inc. (with current PCA)
Rawlite 3" Plate	3" round	PA 114	3" round galvalume AZ55 steel plate for use with Rawlite fasteners	The Rawlplug Company Inc. (with current PCA)
Rawl Spike		PA 114	Insulation fastener and steel and plastic stress plate for concrete deck	The Rawlplug Company Inc. (with current PCA)
Rawlite		PA 114	Insulation fastener for cementitious and gypsum decks	The Rawlplug Company Inc. (with current PCA)
Structodeck	various	PA 110	High density wood fiber	Masonite

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EVIDENCE SUBMITTED:

Test Agency	Test Identifier	Description	Date
Factory Mutual Research Corporation	J.I. 2W1A3.AM	Wind Uplift	01/03/94
Factory Mutual Research Corporation	J.I.3Y6A0.AM	Wind Uplift	11/15/95
Factory Mutual Research Corporation	J.I. 4Z0A5.AM	Wind Uplift	02/07/96
Factory Mutual Research Corporation	1D6A1.AM 0D9A8.AM	PA 114	09/04/98 04/26/99
Dynatech Engineering Corporation	94.9.27	Wind Uplift	09/28/94
Underwriters Laboratories	R 6509	Fire Classification	05/10/93
Case Consulting	#04534	Physical Properties	08/16/93
Exterior Research & Design, LLC.	#3705.09.96-1	PA 114	09/03/96
Exterior Research & Design, LLC.	#3705.10.97-1	PA 114	10/17/97

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APPROVED ASSEMBLIES:

Membrane Type: Single Ply, Thermoplastic, Adhered PVC

Deck Type 6I: Poured Gypsum, Insulated, New Construction

Deck Description: Poured Gypsum Concrete

System Type B: Base layer of insulation mechanically attached, top insulation layer fully adhered with approved asphalt or adhesive

All General and System Limitations apply.

Insulation Base Layer	Fastener Type	Fastening Detail No.	Fasteners Per Board	Fastener Density
Approved Type(s): **E'NRG'Y-2, PSI-25, JM ISO-1**				
Minimum: 1.5" x 4' x 4'	GTL	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	LiteDeck	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	NTB Magnum	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	TPR	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	JM NTB	[3]	8	1:2 ft.²
Approved Type(s): **Esgard Fiberboard, Huebert Fiberboard, Celotex Fiberboard, GAFTEMP Fiberboard**				
Minimum: 1" x 4' x 8'	GTL	[4]	16	1:2 ft.²
Minimum: 1" x 4' x 8'	LiteDeck	[4]	16	1:2 ft.²
Minimum: 1" x 4' x 8'	NTB Magnum	[4]	16	1:2 ft.²
Minimum: 1" x 4' x 8'	TPR	[4]	16	1:2 ft.²
Minimum: 1.5" x 4' x 4'	JM NTB	[3]	8	1:2 ft.²
Approved Type(s): **Dens Deck**				
Minimum: ¼" x 4' x 8'	GTL	[4]	16	1:2 ft.²
Minimum: ¼" x 4' x 8'	LiteDeck	[4]	16	1:2 ft.²
Minimum: ¼" x 4' x 8'	NTB Magnum	[4]	16	1:2 ft.²
Minimum: ¼" x 4' x 8'	TPR	[4]	16	1:2 ft.²
Minimum: 1.5" x 4' x 4'	JM NTB	[3]	8	1:2 ft.²

Note: Base layer shall be mechanically attached with fasteners and density described above. Insulation panels listed are minimum sizes and dimensions; if larger panels are used the number of fasteners per board shall be increased maintaining the same fastener density (See Roofing Application Standard RAS 117 for fastening details).

Insulation Top Layer	Fastener Type	Fastening Detail No.	Fasteners Per Board	Fastener Density
Approved Type(s): **Any of the insulation listed for Base Layer, above.**				

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Note: Apply top layer of insulation in a full mopping of any approved mopping asphalt within the EVT range and at a rate of 20-40 lbs/100 ft^2. 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.

Vapor Retarder:	(Optional) An FMRC approved vapor barrier approved for use with hot asphalt may be applied to the deck or perlite base layer.
Barrier	None.
Membrane:	UltraGard PVC Roofing Systems SR-50, 60 or 80, Plus 50 or Plus 60 or V-2/50 or V-2/60 installed utilizing UltraGard Membrane Adhesive at a rate of 60 square feet/gallon or UltraGard PVC Latex Adhesive (where acceptable) at a rate of 40 square feet/gallon. Field sheets are to be lapped a minimum of 3" and heat seamed together using hot air equipment, which will give a minimum 1½" weld area. UltraGard Liquid PVC Seam Sealant is to be applied to all cut or non-encapsulated edges. Care shall be taken to avoid getting adhesive in the seam areas.
Maximum Design Pressure:	-45 psf (See General Limitation #9.)

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Membrane Type: Single Ply, Thermoplastic, Adhered PVC

Deck Type 6I: Poured Gypsum, Insulated, New Construction

Deck Description: Poured Gypsum Concrete

System Type C: All layers of insulation simultaneously fastened.

All General and System Limitations apply.

Insulation Base Layer	Fastener Type	Fastening Detail No.	Fasteners Per Board	Fastener Density
Approved Type(s): **E'NRG'Y-2, JM ISO-1,**				
Minimum: 1.5" x 4' x 4'	N/A	N/A	N/A	N/A
Approved Type(s): **Esgard Fiberboard, Huebert Fiberboard, Celotex Fiberboard, GAFTEMP Fiberboard**				
Minimum: 1" x 4' x 8'	N/A	N/A	N/A	N/A
Approved Type(s): **Dens Deck**				
Minimum: ¼" x 4' x 4'	N/A	N/A	N/A	N/A

Note: All layers shall be simultaneously fastened. See top layer below for fasteners and density.

Insulation Top Layer	Fastener Type	Fastening Detail No.	Fasteners Per Board	Fastener Density
Approved Type(s): **E'NRG'Y-2, PSI-25, JM ISO-1**				
Minimum: 1.5" x 4' x 4'	GTL	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	LiteDeck	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	NTB Magnum	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	TPR	[3]	8	1:2 ft.²
Minimum: 1.5" x 4' x 4'	JM NTB	[3]	8	1:2 ft.²
Approved Type(s): **Esgard Fiberboard, Huebert Fiberboard, Celotex Fiberboard, GAFTEMP Fiberboard**				
Minimum: 1" x 4' x 8'	GTL	[4]	16	1:2 ft.²
Minimum: 1" x 4' x 8'	LiteDeck	[4]	16	1:2 ft.²
Minimum: 1" x 4' x 8'	NTB Magnum	[4]	16	1:2 ft.²
Minimum: 1" x 4' x 8'	TPR	[4]	16	1:2 ft.²
Minimum: 1.5" x 4' x 4'	JM NTB	[3]	8	1:2 ft.²
Approved Type(s): **Dens Deck**				
Minimum: ¼" x 4' x 8'	GTL	[4]	16	1:2 ft.²
Minimum: ¼" x 4' x 8'	LiteDeck	[4]	16	1:2 ft.²
Minimum: ¼" x 4' x 8'	NTB Magnum	[4]	16	1:2 ft.²
Minimum: ¼" x 4' x 8'	TPR	[4]	16	1:2 ft.²
Minimum: 1.5" x 4' x 4'	JM NTB	[3]	8	1:2 ft.²

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Note: All layers of insulation shall be mechanically attached using the fastener density listed above. The insulation panels listed are minimum sizes and dimensions; if larger panels are used, the number of fasteners shall be increased maintaining the same fastener density. Insulation fasteners shall be tested for withdrawal resistance in compliance with Testing Application Standard TAS 105 to confirm compliance with the wind load requirements. Please refer to Roofing Application Standard RAS 117 for insulation attachment.

Vapor Retarder:	(Optional) An FMRC approved vapor barrier approved for use with hot asphalt may be applied to the deck or perlite base layer.
Barrier	None.
Membrane:	UltraGard PVC Roofing Systems SR-50, 60 or 80, Plus 50 or Plus 60 or V-2/50 or V-2/60 installed utilizing UltraGard PVC Membrane Adhesive at a rate of 60 square feet/gallon or UltraGard Latex Adhesive (where acceptable) at a rate of 40 square feet/gallon. Field sheets are to be lapped a minimum of 3" and heat seamed together using hot air equipment, which will give a minimum 1½" weld area. UltraGard Liquid PVC Seam Sealant is to be applied to all cut or non-encapsulated edges. Care shall be taken to avoid getting adhesive in the seam areas.
Maximum Design Pressure:	-45 psf.(See General Limitation #9.)

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Membrane Type: Single Ply, Thermoplastic, Adhered PVC

Deck Type 6I: Poured Gypsum, Insulated, New Construction

Deck Description: Poured Gypsum Concrete

System Type D: Membrane attached over perliminary fastened insulation.

All General and System Limitations apply.

Insulation Layer	Fastener Type	Fastening Detail No.	Fasteners Per Board	Fastener Density
Approved Type(s): **JM ISO-1, E'NRG'Y-2, PSI-25**				
Minimum: 1.4" x 4' x 8'	Approved	N/A	N/A	N/A
Approved Type(s): **Hy-Tec, Hy-Therm Composite, Hy-Therm AP, Hy-Therm SP, Composite FM**				
Minimum: 1.5" x 4' x 8'	Approved	N/A	N/A	N/A
Approved Type(s): **Fesco Board**				
Minimum: ¾" x 2' x 4'	Approved	N/A	N/A	N/A
Approved Type(s): **Armor-R Glass, Fiberglas Roof Insulation**				
Minimum: 15/16" x 4' x 4'	Approved	N/A	N/A	N/A
Approved Type(s): **Dens Deck**				
Minimum: ¼" x 4' x 8'	Approved	N/A	N/A	N/A

Note: Top layer shall have preliminary attachment, prior to the installation of the base/anchor sheet, at an application rate of two fasteners per board for insulation boards having no dimension greater than 4 ft., and four fasteners for any insulation board having no dimension greater than 8 ft. All layers of insulation and base sheet shall be simultaneously fastened. See base/anchor sheet below for fasteners and density.

Vapor Retarder: (Optional) An FMRC approved vapor barrier approved for use with hot asphalt may be applied to the deck or perlite base layer.

Barrier: None.

Membrane UltraGard PVC Roofing Systems SR-50, 60 or 80, Plus 50 or Plus 60 or V-2/50 or V-2/60 installed in sheets 53" wide with a 5" overlap and fastened at the lap 6" o.c. using Rawlite fasteners and Rawlite Lap Plates or NTB Magnum with 2 in Head fasteners. Sheets are then heat seamed together with a minimum 1½" weld area. UltraGard liquid PVC seam sealant is to be applied to all cut or non-encapsulated edges. (1:2 ft^2).

Maximum Design Pressure: -45 psf (See General Limitation #9.)

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Membrane Type: Single Ply, Thermoplastic, Mechanically Attached PVC

Deck Type 6I: Poured Gypsum Concrete, Non-insulated, Tear-off Only

Deck Description: Poured gypsum concrete.

System Type E: Membrane attached to deck.

All General and System Limitations apply.

Barrier: Approved slipsheet (non-"Plus" membranes only).

Membrane: UltraGard PVC Roofing Systems SR-50, 60 or 80, Plus 50 or Plus 60 or V-2/50 or V-2/60 installed in sheets 53" wide with a 5" overlap and fastened at the lap 6" o.c. using Rawlite fasteners and Rawlite Lap Plates JM NTB with 2in head fasteners or NTB Magnum with 2 in Head fasteners. Sheets are then heat seamed together with a minimum 1½" weld area. UltraGard liquid PVC seam sealant is to be applied to all cut or non-encapsulated edges. (1:2 ft^2)

Maximum Design Pressure: -45 psf (See General Limitation #9.)

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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 sidelap 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 Engineer, 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. **(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 with 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.)**

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NOTICE OF ACCEPTANCE STANDARD CONDITIONS

1 Renewal of this Acceptance (approval) shall be considered after a renewal application has been filed and the original submitted documentation, including test supporting data, engineering documents, are no older than eight (8) years.

2 Any and all approved products shall be permanently labeled with the manufacturer's name, city, state, and the following statement: "Miami-Dade County Product Control Approved", or as specifically stated in the specific conditions of this Acceptance.

3 Renewals of Acceptance will not be considered if:
   a) There has been a change in the South Florida Building Code affecting the evaluation of this product and the product is not in compliance with the code changes;
   b) The product is no longer the same product (identical) as the one originally approved;
   c) If the Acceptance holder has not complied with all the requirements of this acceptance, including the correct installation of the product;
   d) The engineer who originally prepared, signed and sealed the required documentation initially submitted, is no longer practicing the engineering profession.

4 Any revision or change in the materials, use, and/or manufacture of the product or process shall automatically be cause for termination of this Acceptance, unless prior written approval has been requested (through the filing of a revision application with appropriate fee) and granted by this office.

5 Any of the following shall also be grounds for removal of this Acceptance:
   a) Unsatisfactory performance of this product or process;
   b) Misuse of this Acceptance as an endorsement of any product, for sales, advertising or any other purposes.

6 The Notice of Acceptance 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 Notice of Acceptance is displayed, then it shall be done in its entirety.

7 A copy of this Acceptance as well as approved drawings and other documents, where it applies, shall be provided to the user by the manufacturer or its distributors and shall be available for inspection at the job site at all times. The copies need not be resealed by the engineer.

8 Failure to comply with any section of this Acceptance shall be cause for termination and removal of Acceptance.

9 This Acceptance contains pages 1 through 16.

END OF THIS ACCEPTANCE

Frank Zuloaga, RRC
Roofing Product Control Examiner