WOLTERS ENGINEERING

ENGINEERING, DRAFTING, CONSULTING

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PRODUCT EVALUATION

PRODUCT: MASTER SERIES 1 1/2" STANDING SEAM 16 oz. COPPER ROOF PANEL
16" WIDE, OVER ½" (NOMINAL) PLYWOOD
(FLPA# 32387.3)

MANUFACTURER: METAL MASTER SHOP
7484 NW 8TH STREET
MIAMI, FL 33126

To all concerned,

The Master Series 1 1/2" Standing Seam 16 oz. Copper Roof Panel, manufactured by Metal Master Shop, is a 16" wide non-structural Copper roof panel with 1 ½" ribs that are mechanically seamed to 180°. This panel system meets the requirements of Sections 1507.4 and 1518.9 of the 7th Edition (2020) Florida Building Code. It has been tested per TAS 100, TAS 125, and ASTM E2140 by Intertek B&C, with results shown in test reports L0234.02-450-18, L0234.01-450-18, and N0714.02-450-18.

Technical Documentation:

1. Drawing "M15CHVHZ" dated 08/10/20, signed and sealed by Scott Wolters, PE.
2. Test Reports listed above by Intertek B&C. signed and sealed by Vinu Abraham, PE
3. Supplemental Calculations to support "M15CHVHZ" drawing, signed and sealed by Scott Wolters, PE.

I have reviewed this submittal per the requirements of FAC Product Approval Rule Chapter 61G20-3.005 (4). Based on the limitations listed below and those provided in the documents above, this product meets all the requirements of the 7th Edition (2020) Florida Building Code generally, and chapter 15 specifically, including the HVHZ provisions.

Limitations: This Roof System is approved for use inside and outside of the HVHZ.

Overall Limitations:		
	Maximum Panel Width:	16"
	Minimum Rib Height:	1 1/2"
	Minimum Slope:	1"/12" (HVHZ)
		¼"/12" (Outside of HVHZ)
	Clip Anchors:	26 Ga., 304 SS, 2" long

Field Installation

Maximum Design Pressure:	78.5 psf.
Clip Anchor Spacing:	4" from ends, 12" max. O.C.
Clip Anchor Fasteners:	#10x1" Pancake Hd SS fast's, (2) per clip

Panels are seamed to 180°.

Perimeter and Corner Installation

Maximum Design Pressure:	101.0 psf
Clip Anchor Spacing:	4" from ends, 6" max. O.C.
Clip Anchor Fasteners:	#10x1" Pancake Hd SS fast's, (2) per clip

Panels are seamed to 180°.

Underlayment: : Any underlayment meeting the requirements of FBC Sections 1518.2 thru 1518.4 (HVHZ) or Section 1507.1.1 (Outside HVHZ).

(or)

Any underlayment with a valid Florida Product Approval or Miami-Dade NOA

Fire Barrier: (where req'd by code) 1 layer of VersaShield with 4" overlaps, anchored with .120"x1 ¼" galvanized roof nails with 32 Ga. Tin caps spaced 6" O.C. in rows at the perimeter, at overlaps, and two intermediate rows per sheet.

(or)

Any fire barrier with a valid FLPA or Miami-Dade NOA

Minimum Substrate: ½' (15/32" min) 4-ply CDX Plywood, nailed to 2x rafters spaced 24" max. O.C. with 8d ring-shank nails spaced 4" O.C.

(or)

¾" minimum solid wood plank (S.G.=0.42 min)

Note: The ¾" wood planking must be installed as a solid deck and must be nailed or fastened in a manner equal to the deck above, or a specified by a Florida licensed Architect/Engineer.

Other Limitations:

1. Fire classification is not a part of this evaluation. Refer to a current Approved Roofing Materials Directory for fire ratings of this product.
2. Shear diaphragm values are not a part of this evaluation.
3. Design of substrate is by others and is not a part of this evaluation.
4. All panels shall be permanently labeled with the manufacturer's name and/or logo, and "Metal Master Shop FLPA# 32387.3, 1 ½" x 16" Standing Seam Roof System".

Panel Forming: These panels may be jobsite roll formed with the following Metal Master Shop machines, per approval of 3rd party QA provider, to the dimensions shown in Drawing M15CHVHZ:

#100801 #109212207

Re-Roofing: The Master Series 1 ½" Standing Seam 16 oz. Copper Roof Panel System may be installed over a single layer of existing shingles, provided the existing roof meets the requirements of FBC Section 1521 (HVHZ) or 1511 (outside of HVHZ).

If you have any questions or need more information concerning this approval, please contact me.

Thank you,

Scott Wolters
FL PE# 62354
FEB 14 2022

SCOTT WOLTERS LICENSE No 62354 STATE OF FLORIDA PROFESSIONAL ENGINEER