

Registry No. 29824 17520 Edinburgh Dr Tampa, FL 33647 (813) 480-3421

Issued December 13, 2022

### **EVALUATION REPORT**

# FLORIDA BUILDING CODE, 7<sup>TH</sup> EDITION (2020)

Manufacturer: TEK INDUSTRIES, LLC

11801 Pierce Street, Suite 200

Riverside, CA 92505 (877) 729-5229

www.tekroofingsystems.com

Manufacturing: Burleson, TX

Quality Assurance: Intertek (QUA1673)

SCOPE

Category: Roofing
Subcategory: Metal Roofing
Code Sections: 1504.3.1, 1504.3.2

**Properties:** Wind Resistance, Physical Properties

### **REFERENCES**

<u>Entity</u>	Report No.	<u>Standard</u>	<u>Year</u>
Intertek (TST1558)	N5488.01-109-18	TAS 125	2003
PRI Construction Materials Technologies (TST5878)	2324T0001	UL 580	2006
		UL1897	2012
PRI Construction Materials Technologies (TST5878)	2324T0002	ASTM G 155	2013
PRI Construction Materials Technologies (TST5878)	2324T0003	ASTM B 117	2016

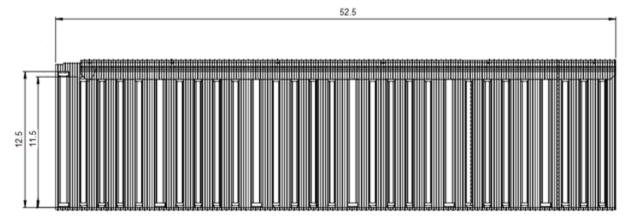
## **PRODUCT DESCRIPTION**

# **HURRICANE® Metal Shake Pro**

**Profile:** Max. 11.5 in. x 50 in. coverage; lock at nose of panel; concealed fastening

**Description:** Non-structural, preformed, fastened, stoned-coated steel panels

Material: Min. 28 ga. stone coated ASTM A792 AZ30, Grade 80 steel;  $F_y = min. 80 \text{ ksi}$ ;



TI21001.1 FL38136-R1 Page 1 of 5



### **APPROVED ASSEMBLIES**

D

В

С

60 ft

60 ft

60 ft

49 ft

52 ft

60 ft

46 ft

19 ft

22 ft

60 ft

23 ft

NA

System 1									
Roof Deck:  Solid or closely fitted min. 15/32 in. APA span rated CDX plywood sheathing for new and existing construction at max. 24 in. span; Designed by others in accordance with FBC requirements.									
Underlaymen	t:	Installed in accordance with FBC requirements.							
Insulation:		1" x 49.5" x 8" tapered EPS insulation installed under each course of panels.							
Panels are installed by engaging the lock at the nose of the panel to the preceding course and fastening the underlap of the panel with six (6) #10 x 2-1/2 in. T17 WOOD-X HWH corrosion resistant wood screws per panel as shown below. Subsequent courses are offset a minimum 18-inches at the side laps. Fasteners shall penetrate through the deck a minimum 3/8" and shall comply with section 1506.6 and 1507.4.4.									
52.5"									
Lock at nose of panel			3.25" 7.2	5"	10"	10"	10"	10"	2"
	Maximum Design -90 psf								
Pressures:				g 2:1 margin					
		Maxi		Roof Heigl Slopes 2:12		le/Hip Roof	S		
				•	Wind Speed	l (mph)			
Exposure	≤120	130	140	150	160	170	180	190	200
Zone 1 – Field									
В	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	45 ft
С	60 ft	60 ft	60 ft	60 ft	60 ft	50 ft	29 ft	17 ft	NA
D	60 ft	60 ft	60 ft	60 ft	42 ft	21 ft	NA	NA	NA
	Zone 2 (includes 2e, 2n, and 2r) – Perimeter								
В	60 ft	60 ft	60 ft	60 ft	58 ft	38 ft	25 ft	17 ft	NA
С	60 ft	60 ft	52 ft	27 ft	NA	NA	NA	NA	NA

Notes: 1) Exposure category for the structure location shall be as defined in the International Building Code 2) Limitations are based on the exposed area of  $10\text{ft}^2$  or less 3) Topographic factors such as escarpments or hills are not included in the above assessment 4) Applicable for Enclosed Buildings without overhangs 5) NA = "Not Allowed" 6)  $K_d = 0.85$  7) Projects with mean roof heights of greater than 60 ft shall be evaluated by a licensed design professional 8) See page 4 for details for dimensions and locales of Zone 1, 2, and 3 9)  $V_{ult}$  is shown in the above table. Design pressures are calculated using  $V_{asd} = V_{ult} \sqrt{0.6}$ .

Zone 3 (includes 3e and 3r) - Corner

NA

31 ft

NA

NA

NA

20 ft

NA

NA

NA

NΑ

NA

50 ft

NA

NA

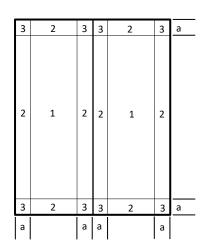
TI21001.1 FL38136-R1 Page 2 of 5



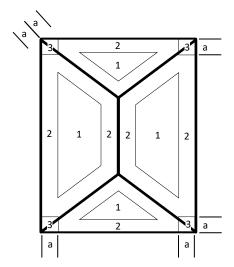
System 2									
Roof Deck:		Solid or closely fitted min. 1/2" CDX plywood for new and existing construction at max. 24 in. span; Designed by others in accordance with FBC requirements.							
Underlaymen	t:	Installed in accordance with FBC requirements.							
Attachment:		Panels are installed by engaging the lock at the nose of the panel to the preceding course and fastening the underlap of the panel with eight (8) #10 x 2-1/2 in. hex head, corrosion resistant wood screws spaced 6-3/4 in. o.c. per panel as shown below. Fasteners shall penetrate through the deck a minimum 3/8" and shall comply with section 1506.6 and 1507.4.4.							
		•				52.5"			
			3.25" 6 3/4	4" 6 3/4"	6 3/4"	6 3/4"	6 3/4" 6	3/4" 6 3/4	2"
Look									
Lock at nose of panel			Ī				· 		11111
Maximum De Pressures:		-101 psf	alculated usin	a 2:1 marain	of safety				ВВ
1 10000100.			imum Mean		-	le/Hin Poo	fe		
		IVIAXI		Slopes 2:12	- 12:12				
Exposure		<sup>9</sup> Basic Wind Speed (mph)							
Lxposure	≤120	130	140	150	160	170	180	190	200
				Zone 1 –	Field				
В	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft
С	60 ft	60 ft	60 ft	60 ft	60 ft	60 ft	50 ft	30 ft	18 ft
D	60 ft	60 ft	60 ft	60 ft	60 ft	41 ft	21 ft	NA	NA
	1		Zone 2 (incl					1 -	
В	60 ft	60 ft	60 ft	60 ft	60 ft	57 ft	38 ft	26 ft	18 ft
C	60 ft	60 ft	60 ft	47 ft	25 ft	NA	NA	NA	NA
D	60 ft	60 ft	43 ft	19 ft	NA	NA	NA	NA	NA
	1 00 %	00.6	`	includes 3e					
B	60 ft	60 ft	60 ft	60 ft	47 ft	31 ft	20 ft	NA NA	NA
C D	60 ft	60 ft	40 ft	20 ft NA	NA NA	NA NA	NA NA	NA NA	NA NA
ט	60 ft	38 ft	16 ft	INA	INΑ	NΑ	NA	NA	NΑ



## Gable



Hip



Dimension "a" shall be 10% of the least horizontal dimension or (0.4 x *Mean Roof Height*), whichever is smaller, but not less than either 4% of the least horizontal dimension or 3ft.

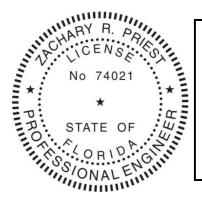
#### LIMITATIONS

- 1. This report is not for use inside the HVHZ.
- 2. Fire classification is not within the scope of this evaluation.
- 3. The roof deck and the roof deck attachment shall be designed by others to meet the minimum design loads established for components and cladding and in accordance with FBC requirements.
- 4. Roof slope shall be in accordance with FBC Section 1507.4.2.
- 5. Reroofing shall be in accordance with FBC Section 1511. Recovery versus replacement shall be evaluated in accordance with FBC Section 1511.3.
- Installation of the evaluated products shall comply with this report, the FBC and the manufacturer's published application instructions. Where discrepancies exist between these sources, the more restrictive and FBC compliant installation detail shall prevail.
- 7. All products listed in this report shall be manufactured under a quality assurance program in compliance with Rule 61G20-3.



## **COMPLIANCE STATEMENT**

The products evaluated herein by Zachary R. Priest, P.E. have demonstrated compliance with the Florida Building Code, 7<sup>th</sup> Edition (2020) as evidenced in the referenced documents submitted by the named manufacturer.



This item has been digitally signed and sealed by Zachary R. Priest, PE, on 12/13/2022.

Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Zachary R. Priest, P.E. Florida Registration No. 74021 Organization No. ANE9641

#### **CERTIFICATION OF INDEPENDENCE**

CREEK Technical Services, LLC does not have, nor will it acquire, a financial interest in any company manufacturing or distributing products under this evaluation.

CREEK Technical Services, LLC is not owned, operated, or controlled by any company manufacturing or distributing products under this evaluation.

Zachary R. Priest, P.E. does not have, nor will acquire, a financial interest in any company manufacturing or distributing products under this evaluation.

Zachary R. Priest, P.E. does not have, nor will acquire, a financial interest in any other entity involved in the approval process of the product.

## **END OF REPORT**

TI21001.1 FL38136-R1 Page 5 of 5