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# PAC-CLAD® PRODUCT RANGE

Petersen, a Carlisle company, manufactures PAC-CLAD architectural metal cladding products in multiple gauges of steel and aluminum. PAC-CLAD products include wall and roof panel systems and accessories, plus coil and flat sheet, all of which can be applied to nonresidential and residential structures. Founded in 1965, Petersen also operates full production facilities in Illinois, Georgia, Texas, Maryland, Arizona and Washington. Petersen maintains a national network of field sales representatives to provide service to all 50 United States plus locations in Canada, Mexico and the Caribbean.

The range of PAC-CLAD products includes factory-produced wall and roof panel systems, soffit panels, flat sheet and coil, perforated aluminum, coping and fascia, column covers, snow retention systems, custom fabrication services, plus glass trim and storefront products. Available materials include PAC-CLAD prefinished 24 and 22 gauge steel; .032, .040, .050 and .063 gauge aluminum; 032 – .125 gauge mill finish aluminum; and anodized aluminum in .032 through .125 gauge.

# WALL PANEL SYSTEMS

Wall systems include hidden-fastener and exposed-fastener panels, composite systems plus column covers. Aluminum panels, coil and flat sheet are available perforated in multiple combinations of hole sizes, shapes and spacing.

### **ROOF PANEL SYSTEMS**

Standing seam roof panel profiles include mechanically seamed and snap-seam profiles. Multiple styles of soffit panels are offered in either solid or vented.

# PERIMETER / EDGE PRODUCTS

Coping and fascia systems are available with matching flashing and trim, which can be factory-formed or field-formed from PAC-CLAD material. All Petersen perimeter systems are produced in 12' lengths for savings in material handling.

#### **GUTTERS AND DOWNSPOUTS**

PAC-Tite gutters, downspouts and scuppers improve water management performance while complementing a building's aesthetic qualities. Custom engineering promotes ease of installation and helps the drainage systems withstand harsh environments. The product line is Factory Mutual-approved and features ANSI/SPRI GT-1 compliance.

# PAC-CLAD COLORS

PAC-CLAD is a versatile and durable coating of 70% polyvinylidene fluoride (PVDF) made with Kynar 500 resin that is applied to Galvalume steel or prime quality aluminum. A 35-year finish warranty is included with Petersen's standard colors. Custom colors are available. Most colors meet LEED requirements and are rated by the Cool Roof Rating Council. Galvalume Plus is available.

#### WARRANTIES

Petersen offers a 35-year finish warranty against fading and chipping, plus a coastal finish warranty against saltwater exposure for PAC-CLAD aluminum only. An optional weathertightness warranty is offered. Technical assistance and service are available from a nationwide network of architectural representatives who can assist with material selection, finish specification, installation and budgeting.



# PAC-CLAD® STANDARD COLOR CHART

#### FINISH WARRANTY

Life expectancy is 35 years-plus on 70% PVDF-finished materials. A 35-year, non-prorated finish warranty covering color fade, chalking and film integrity is available at no extra charge. Warranty for Weathered Steel and Weathered Copper does not cover fade. Warranty for Cardinal Red and Award Blue is 10 years for fade and 20 years for chalking and adhesion.

#### PREMIUM COLORS

Petersen's premium colors include several metallic finishes, plus two two-coat finishes Weathered Steel and Weathered Copper. These colors are ideal for all building envelope applications. A PAC-CLAD 35-year, non-prorated finish warranty applies.

# TRIM

PAC-CLAD products are available in prime quality aluminum (.032 - .063), 24 and 22 gauge Galvalume steel, finished with a 70% PVDF finish on the top side, with a washcoat on the bottom. Other metals available include mill finish aluminum, stainless steel, Galvalume Plus and anodized aluminum.

A strippable vinyl film can be applied to coil, flat sheet or fabricated parts to protect painted surfaces. Vinyl masking is recommended where extra handling is expected. NOTE: Vinyl film must be removed immediately after installation.

### COMMITMENT TO SUSTAINABILITY

PAC-CLAD products provide unmatched aesthetics and performance, plus an element of sustainability. Where possible, Petersen's PAC-CLAD products include a high percentage of recycled material, which lowers their environmental footprint. Additionally, Petersen products are 100% recyclable which may reduce the stream of solid waste to landfills.

Petersen also offers the industry's widest range of 46 standard colors, most of which feature outstanding SRI (Solar Reflectance Index) values for improved cooling and energy savings performance. Petersen offers multiple finishes that are rated by the Cool Roof Rating Council. In addition, many PAC-CLAD finishes have an SRI of 29 or higher for steep slope roofs, to allow a building to qualify for credits in the U.S. Green Building Council's Leadership in Energy and Environmental Design (LEED) building rating system.



Petersen has been a proud partner with Sherwin-Williams Coil Coatings since 1972

**NOTE:** Colors below are not exact representations of actual PAC-CLAD colors. Ask a Petersen representative for a color-chip chart or painted metal samples before making final color selection.

# STANDARD COLORS



<sup>\*</sup> Denotes PAC-CLAD Cool Color

# PREMIUM COLORS



# PAC-CLAD® STANDARD COLOR AVAILABILITY

PAC-CLAD	REFLECTIVITY	EMISSIVITY	3 YEAR	SRI		EEL			MINUM		20-IN	. COIL
STANDARD COLORS	KEILEGIIIII	ZIIII G G I T I I	EXPOSURE	J.I.I	24 GA.	22 GA.	.032	.040	.050	.063	24 GA.	.032
AGED BRONZE	0.29	0.87	0.27	29	~							
ALMOND	0.56	0.86	0.55	65	~	~	~	~	~		~	
ARCADIA GREEN	0.29	0.87	0.29	29	~		~					
AWARD BLUE***	0.24	0.86	0.23	22	~		~		~			
BERKSHIRE BLUE*	0.30	0.87	0.27	31	~							
BLACK ALUMINUM**	0.04	0.89	0.04	-2			~	~	~	~		
BONE WHITE	0.70	0.86	0.69	85	~	~	~	~	~	~	~	~
BURGUNDY	0.14	0.85	0.13	9	~		~		~			
BURNISHED SLATE	0.32	0.87	0.31	33	~							
CARDINAL RED***	0.44	0.86	0.44	49	~		~		~			
CHARCOAL	0.30	0.86	0.30	30	~		~	~	~		~	~
CITYSCAPE	0.49	0.86	0.50	56	~	~	~	~	~		~	~
COLONIAL RED	0.31	0.86	0.31	31	~		~	~	~			
DARK BRONZE	0.29	0.86	0.29	29	~	~	~	~	~	~	~	~
EVERGREEN	0.28	0.86	0.26	27	~		~					
FOREST GREEN	0.10	0.86	0.10	4	~	~	~	~	~			
GRANITE*	0.33	0.87	N/A	34	~	~	~	~	~			
GRAPHITE	0.29	0.87	0.28	29	~	<u> </u>			<u> </u>			
HARTFORD GREEN	0.08	0.88	0.08	3	~		~	~	~			
HEMLOCK GREEN	0.31	0.87	0.30	32	~		~		~			
HUNTER GREEN	0.28	0.86	0.27	27	~		~		- ·			
INTERSTATE BLUE	0.16	0.87	0.27	12	~		~		~			
MANSARD BROWN	0.31	0.86	0.13	31		~	~					
MATTE BLACK STEEL**	0.26	0.86	0.25	25	<b>V</b>		•	~	~			
	0.20	0.87	0.25	31	<b>~</b>	~					<b>Y</b>	~
MEDIUM BRONZE MIDNIGHT BRONZE				0	<b>~</b>	~	~	~	~	~	-	
	0.06	0.87	0.06	_	<b>~</b>			~				
MILITARY BLUE	0.31	0.86	0.30	31	~		~					
MUSKET GRAY	0.32	0.86	0.31	33	~	~	~		~			
PACIFIC BLUE	0.28	0.86	0.27	27	~		~					
PATINA GREEN	0.33	0.86	0.32	34	~		~					
SANDSTONE	0.48	0.86	0.48	54	~	~	~	~	~	~	~	~
SIERRA TAN	0.32	0.82	0.31	31	~	~	~	~	~		~	
SLATE GRAY	0.38	0.86	0.37	41	~	~	~	~	~		~	~
STONE WHITE	0.69	0.86	0.67	84	~	~	~	~	~	~	~	~
TEAL	0.32	0.86	0.32	33	~		~					
TERRA COTTA	0.34	0.87	0.33	36	~		~		~		~	~
PAC-CLAD PREMIUM (	COLORS											
AGED COPPER	0.55	0.80	0.53	62	~		~					
ANODIC CLEAR	0.32	0.83	0.31	31				~				
CHAMPAGNE	0.50	0.85	0.49	57	~		~	~	~			
COPPER PENNY	0.52	0.81	0.52	58	~		~	~	~		~	
SILVER	0.47	0.87	0.46	53	~	~	~	~	~		~	~
SILVERSMITH	0.32	0.88	0.32	34				~	<u> </u>			
WEATHERED COPPER	0.45	0.88	N/A	51	~							
WEATHERED STEEL	0.32	0.89	N/A	34	~							
WEATHERED ZINC	0.48	0.82	0.46	53	~	~	~		~			
ZINC	0.42	0.82	0.38	45	~		~	~	~			
CLEAR-COAT ACRYLIC			5.50					-				
			0.55									
GALVALUME PLUS	0.68	0.14	0.55	57	~	~					~	

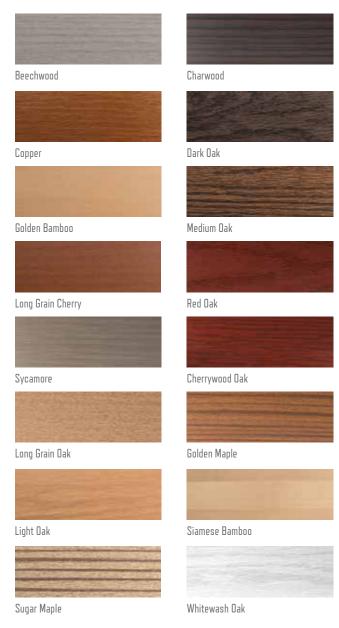
PAC-CLAD Premium finishes are available from stock at a moderate extra cost. PAC-CLAD Copper Penny is a Non-Weathering finish. Solar Reflectance Index calculated according to ASTM E-1980.
\*Low Gloss/Low Sheen, 70% PVDF finish \*\* Appearance differs for Black Aluminum and Matte Black Steel \*\*\* 10-year finish warranty

#### TECHNICAL DATA FOR KYNAR 500/HYLAR 5000 COATING:

- South Florida Exposure: Color (ASTM D 2244) No more than 5ΔE Hunter units at 20 years; Chalk (ASTM D 4214) – Rating no less than 8 at 20 years; Film integrity – 20 years.
- Accelerated Weathering (ASTM D 4587, ASTM G 154): 5000 Hours; Chalk, per ASTM D 4214, rating of 6 or better; Color, per ASTM D 2244, < 5ΔE (Hunter Units) color change.
- Humidity Resistance (ASTM D 2247): Galvalume or HDG, 100% RH, 2000 hours – No field blisters; Aluminum, 100% RH, 3000 hours – No field blisters
- Salt Spray Resistance (ASTM B 117): Aluminum: 3000 hours, creep from scribe no more than 1/16" (2mm), no field blisters. Galvalume or HDG: 2000 hours, creep from scribe no more than 1/8" (4mm), no field blisters
- Chemical/Acid Pollution Resistance (ASTM D 1308): Pass
- T-Bend (ASTM D 4145): 1T 3T with no loss of adhesion Pencil hardness (ASTM D 3363): HB 2H
- Specular Gloss (ASTM D 523) @ 60 degrees: Typical 20 35 Abrasion Resistance (ASTM D 968): 80 Liters/Mil +/- 5 Liters Cross Hatch Adhesion (ASTM D 3359); No loss of adhesion
- Reverse Impact (ASTM D 2794): Galvalume or HDG, 2x metal thickness inch-pounds, no loss of adhesion; Aluminum, 1.5x metal thickness inch-pounds, no loss of adhesion
- Flame Test (ASTM E 84): Class A Coating

# PVDF SIMULATED FINISHES

# **WOOD GRAIN**



When the performance of metal is required but the look of wood is desired, Petersen's wood grain textures are ready to dazzle. Petersen's PAC-CLAD wood grain patterns will convince the casual observer that metal is actually wood. PAC-CLAD PVDF wood grain finishes combine the beauty of wood with the durability of metal. Wood grain finishes are not stocked.

# **MATERIALS**

22 gauge, 24 gauge steel .032, .040, .050 aluminum Coil: 36.25" width only

All colors and gauges are available, but with extended lead times and are subject to minimum quantity requirements

# ORE



Enjoy the look of natural metal patinas that never change, with PAC-CLAD Ore finishes from Petersen. Ore finishes provide designers with alternatives to expensive and unpredictable natural metals that will not tarnish, discolor or rust, making them an ideal option for clean, elegant metal architecture. Ore finishes are not stocked.

#### **MATERIALS**

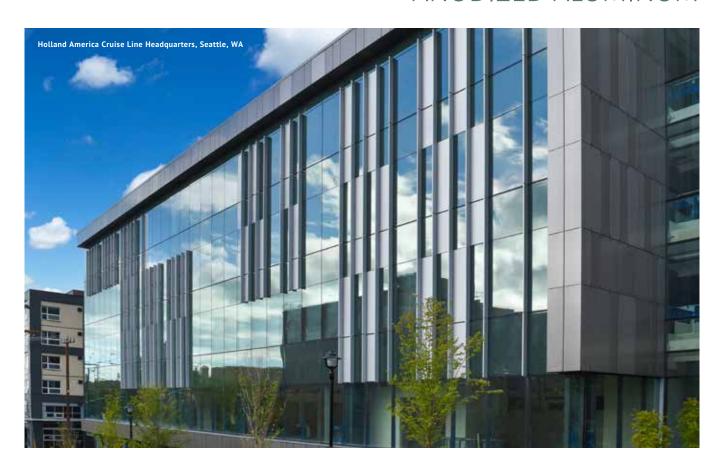
24 gauge - 22 gauge steel .032 - .063 aluminum Coil: 36.25" width only

...

All colors and gauges are available, but with extended lead times and are subject to minimum quantity requirements.

A Printed colors are not exact representations of actual PAC-CLAD PVDF Finishes. Please ask a PAC rep for color samples before making a final selection.

# ANODIZED ALUMINUM









Clear Anodized

Dark Bronze Anodized

Rlack Anndized

# ANODIZED ALUMINUM

Anodized aluminum allows designers to inject creativity into any project. Petersen's collection of anodized finishes includes the essentials: Clear, Dark Bronze and Black. For whatever signature look is desired, anodized aluminum can deliver beauty, long-lasting performance, light weight and corrosion resistance.

The anodized finishes are highly resistant to ultraviolet light, and reflect years of research and investment in control of uniformity and appearance. The investment has resulted in the most consistent anodized finishes in the market.

Note: Finish warranty available on some anodized aluminum.

▲ Printed colors are not exact representations of actual PAC-CLAD Finishes.

Please ask a PAC rep for color samples before making a final selection.

ANODIZED COLORS	.032	.040	.050	.060	.080	.125
PAC CLEAR ANODIZED*	~	~	~	~	~	~
PAC DARK BRONZE ANODIZED*	~	~	~	~	~	
PAC BLACK ANODIZED*		~	~	~	~	

\*Stocked

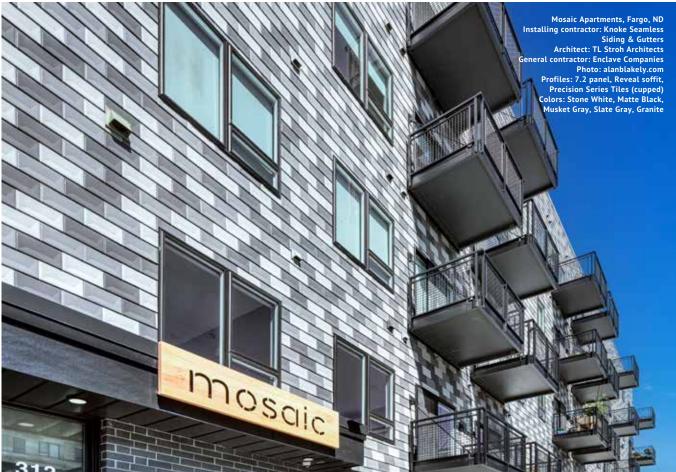
Note: More finishes are available but with longer lead time and subject to minimum quantities; consult rep for details.



Anodized metal is offered proudly through a partnership with Lorin Industries.

# PAC-CLAD® WALL PANEL APPLICATIONS





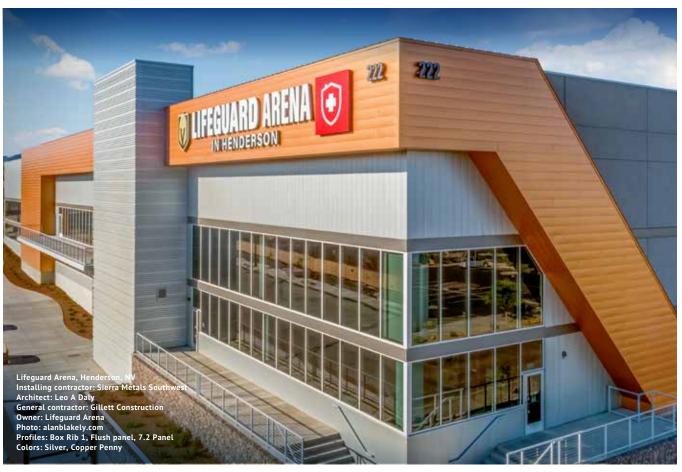


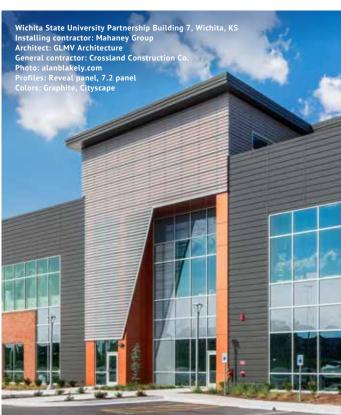


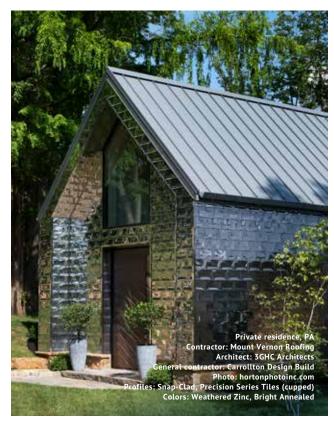
# PAC-CLAD® WALL PANEL APPLICATIONS



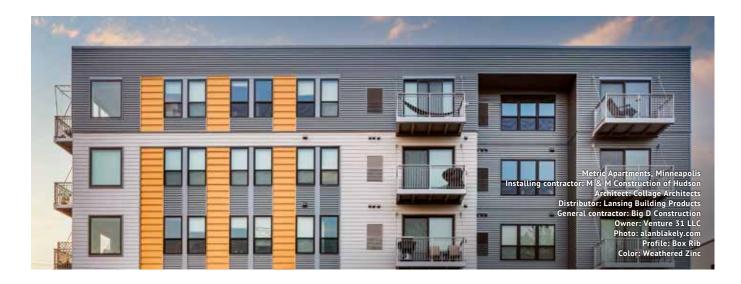








# PRECISION SERIES HWP AND HIGHLINE WALL PANELS



# PRODUCT FEATURES

- No-clip panel, or clip installation for expansion/contraction
- Multiple rib patterns provide a variety of looks and design options
- ▶ Panel depths of 1/8" or 1-3/8"
- ▶ Cost-effective installation
- ▶ Horizontal or vertical installation
- ▶ Micro-seam corners available
- Panel lengths: 30' maximum for steel;

22' maximum for aluminum on the thrufastened leg; longer lengths available on clip panels

#### MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- 36 stocked colors (.032 aluminum)
- ▶ 16 stocked colors (22 gauge steel)
- 22 stocked colors (.040 aluminum)
- 29 stocked colors (.050 aluminum)
- ▶ Galvalume Plus available

#### TESTS

- ASTM E330
- ASTM E283
- ASTM E331
- AAMA 501.1-05-B1, B2, C2, S1
- ▶ ASTM 1592

### FLORIDA BUILDING PRODUCT APPROVALS

Please refer to pac-clad.com or your local factory for specific product approval numbers for Precision Series panels.



# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel

.050 aluminum

**SPECS** 

12" or 16" Wide 7/8" High



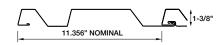


# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

**SPECS** 

11.356" Wide 1-3/8" High





# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

SPECS

15.356" Wide 1-3/8" High



Precision Series architectural wall panels provide design flexibility by combining bold visual effects with easy, cost-effective installation. Multiple profiles are available with a variety of rib patterns. Options for each profile include a no-clip panel, or a clip-fastened panel to accommodate expansion and contraction.

The original Precision Series HWP profile features a %" depth, while the Precision Series Highline profiles are 1-%" deep,

and can be intermixed to add visual intensity to a building's exterior. Precision Series wall panels can be installed horizontally or vertically.

Consult Petersen rep for maximum length; minimum panel length is 4'. Additionally, these wall panels can be specified as perforated in aluminum only for use in equipment screen applications, or for architectural flair.



# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

SPECS

11.356" Wide 1-3/8" High





# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

SPECS

11.356" Wide 1-3/8" High





#### **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

**SPECS** 

15.356" Wide 1-3/8" High





#### **MATERIALS**

.050 aluminum 22 gauge steel

**SPECS** 

15.356" Wide 1-3/8" High





# **MATERIALS**

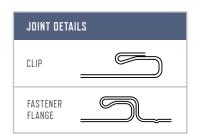
.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

#### **SPECS**

12.043" Wide 1-3/8" High



Highline panels should be installed in single-piece runs, either horizontally (male side down) or vertically. For aluminum panels more than 22' or steel panels more than 30' the clip version should be utilized. Contact PAC rep for longer length options. Box Rib panels are NOT designed to be field-lapped over one another.



Note: Line drawings on these two pages are not to scale.

# PRECISION SERIES BOX RIB WALL PANELS

Precision Series Box Rib architectural wall panels provide design flexibility by combining bold visual effects with easy, cost-effective installation. Multiple profiles are available with a variety of rib patterns. Each profile is offered in a no-clip panel, or a clip-fastened panel to accommodate expansion and contraction.

The Box Rib profiles are 1-3/8" deep and a nominal 12" wide. All precision Series profiles, including Box Rib, Highline and HWP, can be intermixed to add visual intensity to a building's exterior. Precision Series wall panels can be installed horizontally or vertically. Consult Petersen rep for maximum length; minimum panel length is 4'.

Additionally, Precision Series wall panels can be specified as perforated but only in aluminum for use in equipment screen applications, over graphics or for architectural flair.

#### PRODUCT FEATURES

- No-clip panel, or clip installation for expansion/contraction
- Panel depth 1-3/8" nominal
- Panel width of 12" nominal
- Cost-effective installation
- ▶ Horizontal or vertical orientation
- ▶ Micro-seam corners available
- ▶ Panel length: 30' maximum for steel
- Panel length: 22' maximum for aluminum on the thru-fastened leg (no clip), longer lengths available on clip panels

#### TESTING

- ASTM E330
- AAMA 501.1-05
- ASTM E283
- ASTM 1592
- ASTM E331

# MATERIALS

- ▶ 43 stocked colors (24 gauge steel)
- ▶ 16 stocked colors (22 gauge steel)
- ▶ 36 stocked colors (.032 aluminum)
- ▶ 22 stocked colors (.040 aluminum)
- ▶ 29 stocked colors (.050 aluminum)
- Galvalume Plus available



#### **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

#### **SPECS**

12" Wide 1-3/8" High Note: Minimum panel length is 4'





#### **MATERIALS**

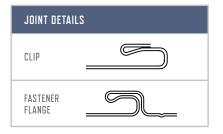
.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

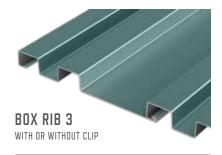
# **SPECS**

12" Wide 1-3/8" High Note: Minimum panel length is 4'



Note: Line drawings on this page are not to scale.





### **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

#### **SPECS**

12" Wide 1-3/8" High Note: Minimum panel length is 4'





#### **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel .050 aluminum

# **SPECS**

12" Wide 1-3/8" High Note: Minimum panel length is 4'



Box Rib panels should be installed in single-piece runs, either horizontally (male side down) or vertically. For aluminum panels more than 22' or steel panels more than 30' the clip version should be utilized. Contact PAC rep for longer length options. Box Rib panels are NOT designed to be field-lapped over one another.

# PRECISION SERIES TILES

The Precision Series Tiles collection from Petersen includes three metal tile profiles that offer designers, specifiers and installers an alternative to roll-formed panel-style cladding. The stamped tiles can be applied to roof or wall installations, and are offered in three styles including Cupped, Flat and Diamond. Designed to enhance architectural design, the tiles add dimension to the exterior of any structure. The tiles can be applied to either commercial or residential environments, and are covered by the PAC-CLAD 35-year finish warranty.

The interlocking tiles are formed using progressive tooling to create a uniform and cost-effective cladding solution. This system installs directly over plywood or elevated channels using concealed fasteners. No sealant is required for the tiles' breathable joints. Thermal gain and movement is not an issue,

as the small size of each tile means movement will be minimal. Only basic sheet metal tools are required to work with these products. Minimum slope of 3:12 for roof applications.

### PRODUCT FEATURES

#### MATERIAL

- 43 stocked colors (24 gauge steel)
- 36 stocked colors (.032 aluminum)
- .032 anodized
- Zalmag® coated steel (26 gauge) (Sold only in Florida and Texas)

#### ASTM TESTS

- ASTM E283
- ASTM E330
- ASTM E331

#### UL CLASSIFICATION

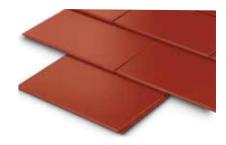
▶ UL 580-1897

#### AAMA TESTS

AAMA 501.1

# **CUPPED TILE**

# FLAT TILE



# DIAMOND TILE



# **CUPPED TILE**

The cupped tile catches light at multiple angles that creates a multi-shade effect as viewing perspective changes. In roof applications, installers can safely walk on the cupped tiles during installation.

- Nominal: 15" x 9-5/8"
- Exposed: 14-1/2" x 8-5/16" +/- 1/16"

#### FLAT TILE

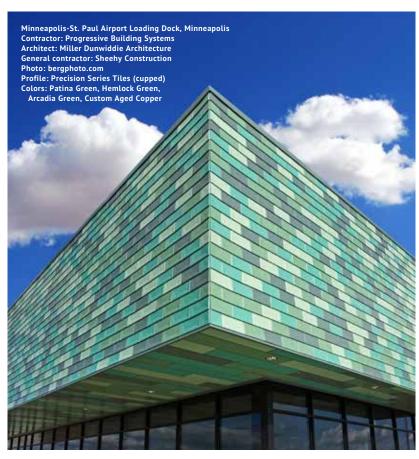
The flat tile has the flexibility to integrate with both modern and traditional designs.

- Nominal: 15" x 9-5/8"
- Exposed: 14-1/2" x 8-5/16" +/- 1/16"

#### DIAMOND TILE

Diamond tiles can be installed horizontally, or on an angle to achieve a diamond or clapboard pattern.

- Nominal: 8-5/16" x 9-3/4"
- Exposed: 7-1/4" x 8-5/16" +/-1/16"



# FLUSH AND REVEAL WALL PANELS

Flush and Reveal panels are designed for wall, fascia and soffit applications where a flat appearance is desired. A rounded interlock leg and concealed fastening system improves the flush appearance while providing additional strength. Panels are factory-formed to length to minimize field cutting. Maximum panel length is 25' and minimum panel length is 4'.

Flush panels are available in on-center dimensions designed to complement Petersen's roofing panel product line. Flush and Reveal joint configurations are available.

#### PENCIL RIBS

The Flush and Reveal panels are available with optional pencil ribs. Pencil ribs are recommended for longer panel lengths. One or two ribs are available.

# INSTALLATION

Flush and Reveal panels shall be installed over a solid substrate with appropriate ice and water shield, or in limited applications over framing sections. When used in a windscreen application, panels must be fastened (stitched) through side joints. Consult a local architect/engineer for requirements of local codes and conditions.

# OPTIONAL CLIP

An optional patented concealed fastening clip is available on the 12" panel only to raise a panel assembly's wind resistance performance level. The optional clip has been designed and tested to resist disengagement during high-wind events.

## TRIM

All flashing and trim shall be fabricated by Petersen or qualified fabricator. Flashing shall be PAC-CLAD aluminum or PAC-CLAD steel. A 35-year non-prorated finish warranty can be supplied covering finish performance. Minimum bending radius is 2T. Vinyl masking is recommended on all fabrication applications where extra handling is expected. NOTE: The strippable vinyl film must be removed immediately after installation.

### HORIZONTAL APPLICATIONS

When installing Flush and Reveal panels horizontally, install first panel at top of wall and proceed to bottom.

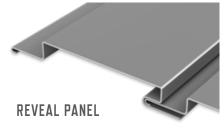
### **OIL CANNING**

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.









# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum\* 22 gauge steel\*

# **SPECS**

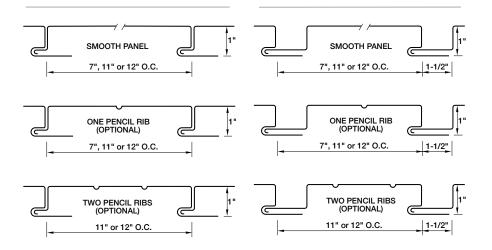
7", 11", or 12" O.C. 1" High

# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum\* 22 gauge steel\*

# **SPECS**

7", 11", or 12" O.C. 1" High



# PRODUCT FEATURES

- Available with up to two pencil ribs
- Rounded interlock leg provides improved flush fit
- Optional clips available for Miami-Dade wind resistance requirements
- ▶ 35-year non-prorated finish warranty
- Panel lengths from 4' to 25'

# MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- ▶ 16 stocked colors (22 gauge steel)
- ▶ 36 stocked colors (.032 aluminum)
- ▶ 22 stoc ked colors (.040 aluminum)
- Galvalume Plus available

#### ASTM TESTS - FLUSH

- ASTM E330 tested 12" only
- ASTM 1592
- ASTM E283
- ASTM E331
- AAMA 501.1-05

# FLORIDA BUILDING PRODUCT APPROVALS

Please refer to pac-clad.com or your local factory for specific product approval numbers for Flush panels.

\*Limited color availability.

- 12" O.C. has reduced fastener flange
- Clip not shown in drawings above
- A complete specification is available online at pac-clad.com.

# EXPOSED FASTENER PANELS



Petersen offers a complete line of exposed fastener panels, allowing for creative design flexibility in a cost-effective yet architecturally attractive metal panel. The versatile 7.2 panel, R-36 and %" Corrugated panels can be specified for a wide range of building envelope applications including roofs, walls and linear panels. The M-36, M-42 and ½" Corrugated panels are suitable for wall and equipment screen projects.

#### TRIM

All flashing and trim shall be fabricated by Petersen or qualified fabricator. Flashing shall be PAC-CLAD aluminum (.032 - .063 gauge as specified) or PAC-CLAD steel (24 gauge or 22 gauge as specified). A 35-year non-prorated finish warranty can be supplied covering finish performance. Minimum bending radius is 2T; consult rep for details.

Vinyl masking is recommended on all fabrication applications where extra handling is expected. NOTE: The strippable vinyl film must be removed immediately after installation.

Photo above:
Westfield Ninth Grade Center, Houston
Installing contractor: PRC Roofing
Architect: Pfluger and DLR Group
General contractor: Satterfield and Pontikes
Owner: Spring Independent School District
Photo: alanblakely.com
Profiles: 7.2 panel, Corrugated panel
Colors: Charcoal, Custom Scarlett

# PRODUCT FEATURES

- ▶ 35-year non-prorated finish warranty
- Matching screws and rivets
- Closure strips available
- ▶ Precut short lengths (5'-0" minimum) (3'-0" on the M-42)
- ▶ Panel lengths up to 30′ on steel and 22′ on aluminum

#### MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- ▶ 16 stocked colors (22 gauge steel)
- ▶ 36 stocked colors (.032 aluminum)
- 22 stocked colors (.040 aluminum)
- 29 stocked colors (.050 aluminum)
- Galvalume Plus available

# FLORIDA BUILDING PRODUCT APPROVALS

Please refer to pac-clad.com or your local factory for specific product approval numbers for exposed fastener panels.



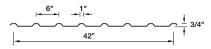
### **MATERIALS**

.032 aluminum .040 aluminum .050 aluminum

22 gauge steel

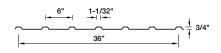
24 gauge steel





Note: Made only in Tyler, Texas facility

# M-36 PANEL\*

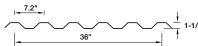


# **MATERIALS**

.050 aluminum

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel



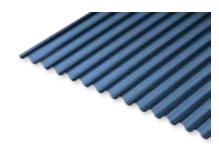


# **MATERIALS**

24 gauge steel .032 aluminum .040 aluminum 22 gauge steel

.050 aluminum





# 7/8" CORRUGATED



# 1/2" CORRUGATED



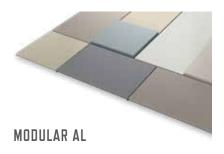
\*Note: The M-36 and M-42 panels are not intended for use in the construction of metal buildings or structural roof applications. Please consult with Petersen regarding the application of this panel. A complete specification is available online at pac-clad.com.

Photo at left: Hurricane Dockside Grill, Hagerstown, MD Contractor: Heidler Roofing Photo: David Fonda Profile: R-36 panel Color: Cardinal Red

# MODULAR AL WALL PANEL SYSTEM

The PAC-CLAD Modular AL panel system from Petersen empowers designers to create unique cassette-style metal cladding surfaces using panels of various sizes and depths and in multiple colors. Panel dimensions can be standardized, or designers can define panel dimensions and depths to create truly unique, flexible and eye-catching patterns. Vertical or horizontal panels can be combined in the same layout. Panels can be finished in any combination of the 46 standard PAC-CLAD colors, or custom colors. Panels can be perforated, including in specific patterns that spell words or form logos. Installation of Modular AL panels can be performed on a variety of substrates including plywood, insulation, purlins or any combination of these.





#### **MATERIALS MAX DIMENSIONS** .050 aluminum 24-in. by 120-in. .063 aluminum 24-in. by 120-in.

30-in. by 120-in.

**SPECS** 

.080 aluminum

Standard Sizes: 24" x 72", 24" x 120" Depth range: 13/8-in. to 3-in. Joint range: 1/2-in. to 1-in. Custom sizes: Consult factory rep

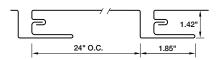


Photo above:

La Crosse Fire Department Station No. 2, La Crosse, WI Installing contractor: Bluewaters Companies

Architect: Wendel Distributor: ABC Supply

General contractor: Market & Johnson

Owner: City of La Crosse, WI Photo: alanblakely.com Profile: Modular AL

Colors: Granite, Sandstone, Champagne

### PRODUCT FEATURES

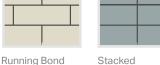
- Flat or tapered
- No sealants
- Concealed fasteners
- Easy installation
- Can be perforated
- Custom Sizes
- ▶ 35-year finish warranty
- Made of 100% recycled aluminum
- Full fabrication package on all projects
- Weep holes for pressure and moisture venting
- Mix and match panel depths and sizes
- Stacked and running bond designs available

# **TESTING**

- ▶ E283
- ▶ E331
- ▶ E330
- ▶ AAMA 508

# **DESIGN CONFIGURATIONS**







Depth Range 1 3/8-in to 3-in.

Stacked





Scan to view AR model. Place it in your space, walk around it.



# COMPOSITE WALL PANELS



Petersen offers another dimension in design flexibility with its series of composite wall panels. PAC's panel systems provide unmatched performance and stunning visual effects for any commercial or retail application.

The PAC-3000 CS panels are comprised of an .020 face and back skin thermobonded to a polyethylene or fire-retardant core. Panels are formed by a rout-and-return process utilizing computer-controlled routing equipment. This state-of-the-art fabrication ensures tight tolerances and accurate panel dimensions. Staggered angle clips mounted to the panel allow for each panel to be installed and adjusted individually.

The PAC-3000 RS is a rain-screen system that eliminates the use of caulk, utilizing clean reveals for an architecturally pleasing system. The system is constructed with metal composite material (MCM), available in a wide range of finishes and colors to complement any design scheme. Extrusions are fixed to the perimeter of the panel and nest into the extruded track which is attached to the substrate. The result is a free-floating panel installation since the panel is not fastened to the substrate.

### COLORS

The PAC-CLAD colors on pages 4-7 *do not* apply to composite panels. Consult Petersen rep for color options.

#### PRODUCT FEATURES

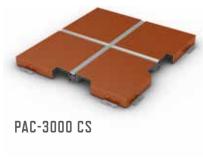
- Available in a wide variety of non-PAC-CLAD colors and finishes
- Precise fabrication to meet exacting tolerances
- ▶ Rout-and-return fabrication
- ▶ Welded corners available

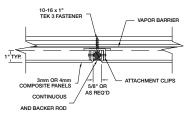
#### MATERIAL

- ▶ 3mm, 4mm, 6mm Composite
- ▶ .063 .125 Mill Finish Aluminum
- ▶ Zinc ▶ Stainless steel
- Anodized aluminum

#### TESTS

- ▶ ASTM E283\*, ASTM E330\*, ASTM E331\*
- \*Composite material only







PLYWOOD SUBSTRATE

10-16 X 1"
TEK 3 FASTENER

VAPOR BARRIER

VAPOR BARRIER

VAPOR BARRIER

Soo"

Soo"

Smm OR 4mm
COMPOSITE PANE
COMPOSITE PANE
COMPOSITE PANE

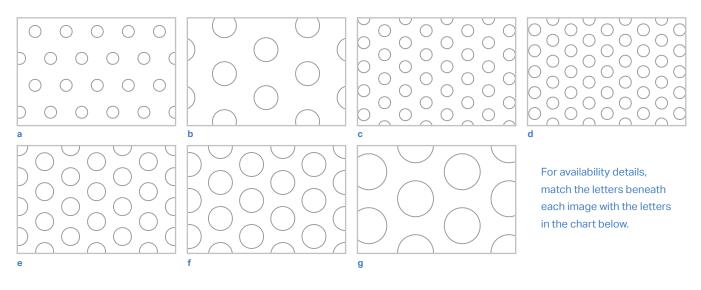
# PERFORATED METAL

Petersen offers perforation of select PAC-CLAD metal wall panels and flat sheet. Perforated panels and metal can provide a contrasting look with any non-perforated metal to create visual interest on any project. Architects can specify perforated aluminum and copper to diffuse light, air or sound, or simply for architectural flair. Typical applications include equipment screens, partitions, sign panels, parking decks, guards, interior acoustical applications and enclosures of any kind.

Perforation is available in a nearly endless combination of hole sizes, spacing and open space percentages to complement virtually any architectural design or need. Perforation options will vary by panel profile and metal thickness; consult factory for details.



#### THE MOST POPULAR EXAMPLES ARE SHOWN BELOW. ADDITIONAL OPTIONS ARE AVAILABLE.



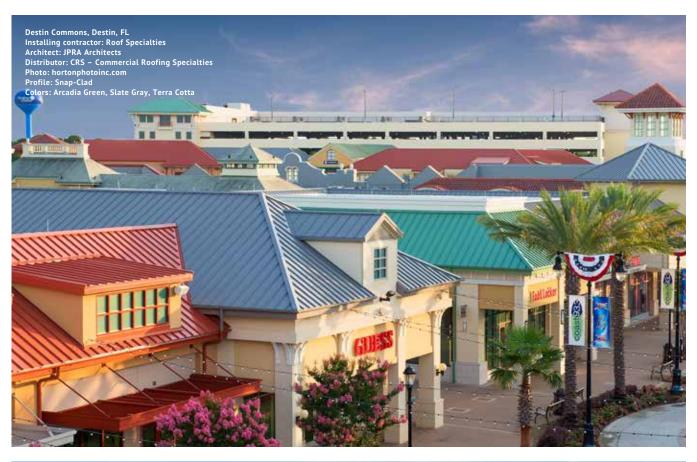
	PATT	ERN SPECS		AVAILABLE ROLL-FORMED PANELS								SHEET
	DIAMETER	CENTERS (staggered)	OPEN AREA	FLUSH/ REVEAL	HWP	HIGHLINE	BOX RIB	7/8 CORRUGATED	7.2 PANEL	R-36	M-36	
а	1/8" Round	0.324"	13.5%	**	~	~	~	~	~	~	~	~
b	1/4" Round	1/2"	23%	**	~	~	~	~	~	~	~	~
С	1/8" Round	1/4"	23%	**	~	~	~	~	~	~	~	~
d	1/8" Round	7/32"	30%	**	~	~	~	~	~	~	~	~
е	3/16" Round	5/16"	33%	**	~	~	~	~	~	~	~	~
f	1/4" Round	3/8"	40%	**	~	~	~	~	~	~	~	~
g	3/8" Round	9/16"	40%	**	~	~	~	~	~	~	~	~

<sup>✓</sup> Available in .032, .040 and .050 roll-formed products | \*\* Available in .032 and .040 roll-formed products

 $Consult \ local \ factory \ for \ additional \ pattern \ options \ not \ shown \ on \ the \ above \ chart.$ 

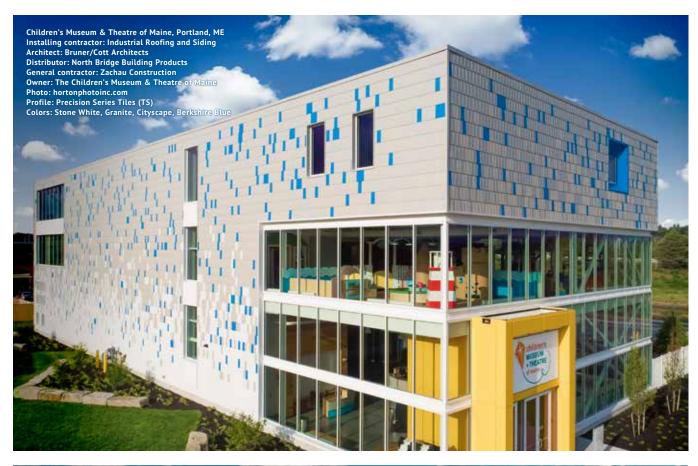
Notes: FExtra charges are applied for perforation FSteel will not be perforated Limitations might apply for certain perforation specs; check with Petersen facility for details and options.

# PAC-CLAD® ROOF AND WALL PANEL APPLICATIONS



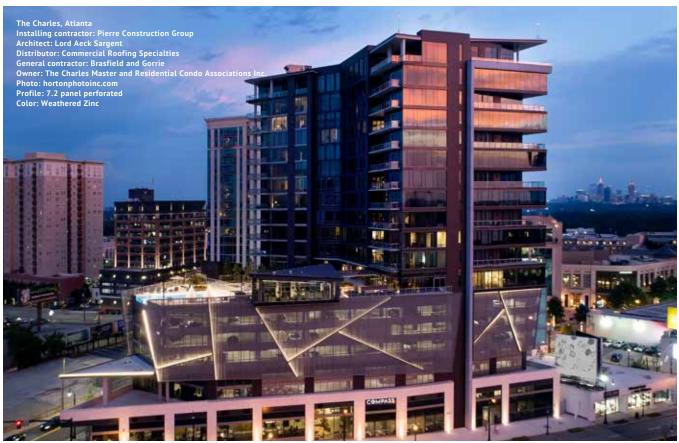


# PAC-CLAD® ROOF AND WALL PANEL APPLICATIONS









# SNAP-CLAD PANELS

Snap-Clad panels feature architectural aesthetics as well as structural performance. Snap-Clad panels, produced in continuous lengths, are leveled to provide superior flatness and feature an optional factory-applied sealant bead for improved weather resistance. Maximum panel length varies by facility and minimum panel length is 4'. Consult factory for longer lengths.

Snap-Clad panels feature a 1-¾" leg height and a continuous interlock for improved structural performance and wind resistance. A concealed-fastener clip system allows for thermal expansion/contraction while providing extraordinary hold-down strength. Two clips are available: a standard clip for most mansard and fascia applications, and a high-performance clip for roofing applications and UL 90-rated assemblies.

# **TRIM**

All flashing and trim shall be fabricated by manufacturer or qualified fabricator. Flashing shall be PAC-CLAD aluminum (.032 - .063 gauge as specified) or PAC-CLAD steel (24 gauge or 22 gauge as specified). A 35-year non-prorated finish warranty can be supplied covering finish performance. Minimum bending radius is 2T; consult rep for details. Vinyl masking is recommended on all fabrication applications where extra handling is expected. NOTE: The strippable film must be removed immediately after installation.

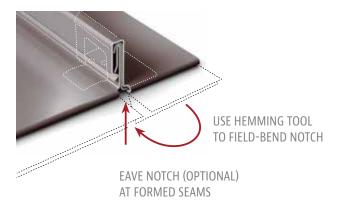
# INSTALLATION

Snap-Clad panels are intended for use in roofing, mansard and fascia applications. Substrates may include 5%" (min.) plywood, nailboard insulation or equal with an underlayment of ice and water shield applied horizontally from eave to ridge.

Other substrates may include metal decking or rigid insulation in conjunction with bearing plates. A minimum 2:12 pitch is recommended in most applications. Contact Petersen for assistance with details on projects requiring lower slopes. For coastal applications, aluminum panels along with stainless steel clips must be used for warranty. Consult a local architect/engineer for compliance with local codes and conditions.

#### EAVE NOTCHING

Factory-produced eave notching is available from the Illinois factory at nominal additional cost on Snap-Clad panels and Redi-Roof standing seam panels. Factory eave notching saves on labor cost by eliminating the need for field cutting to produce a properly trimmed eave detail.



# **OIL CANNING**

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.

### PRODUCT FEATURES

- ► Architectural/structural panel
- ▶ Factory-applied sealant available
- ▶ Continuous interlock
- ▶ Labor-saving one-piece design
- ▶ Pencil ribs upon request
- ▶ Striations upon request
- ► Factory eave notching available from the Illinois factory
- ▶ 35-year non-prorated finish warranty
- Maximum factory-produced panel length varies by facility. Consult rep for details.

- ▶ Weathertightness warranty available
- ▶ 43 stocked colors (24 gauge steel)
- ▶ 16 stocked colors (22 gauge steel)
- 36 stocked colors (.032 aluminum)
- ▶ 22 stocked colors (.040 aluminum)
- ▶ Panels available in Galvalume Plus

#### UL CLASSIFICATION

- ▶ UL-580 Class 90 wind uplift
- ▶ UL-1897 wind uplift
- ▶ UL-790 Class A fire rated
- ▶ UL-263 fire resistance rated
- ▶ UL-2218 impact resistance rated

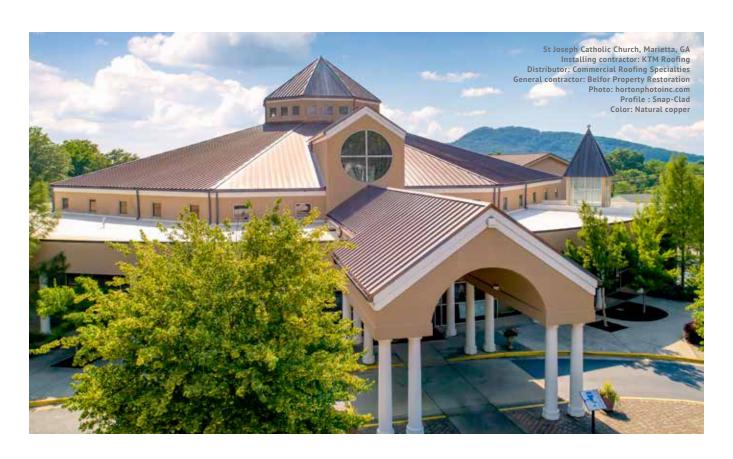
- ▶ UL-90 rated aluminum panel up to 16" O.C.
- UL-90 rated steel panel up to 18" O.C.

#### ASTM TESTS

- ASTM E1592 tested
- ASTM E283/1680 tested
- ▶ ASTM E331/1646 tested

#### FLORIDA BUILDING & MIAMI-DADE PRODUCT APPROVALS

Please refer to pac-clad.com or your local factory for specific product approval numbers for Snap-Clad.



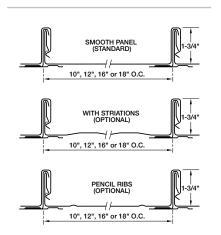


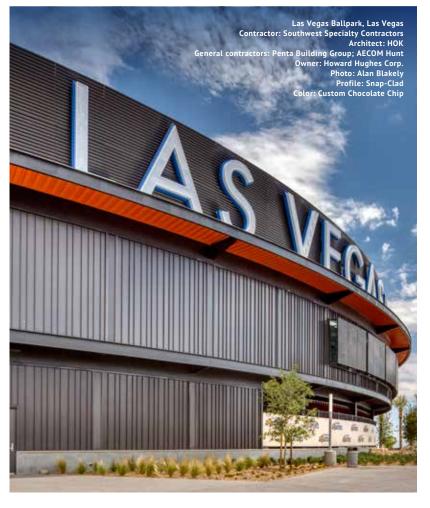
# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel

**SPECS** 

10", 12", 16" or 18" O.C. 1-3/4" High





# TITE-LOC PANELS



Tite-Loc panels combine structural performance with architectural aesthetics. Tite-Loc panels are leveled for flatness. A factory-applied sealant bead can be applied for additional weather resistance. Maximum panel length is 64' and minimum length is 4'. Consult factory for longer lengths.

Tite-Loc panels feature a 2" leg height that requires mechanical field seaming after installation. Panels have a concealed-fastener floating clip system designed to allow for thermal expansion/contraction.

# TRIM

All flashing and trim shall be fabricated by manufacturer or qualified fabricator. Flashing shall be PAC-CLAD aluminum or steel. A 35-year non-prorated finish warranty can be supplied covering finish performance. Minimum bending radius is 2T; consult rep for details. Vinyl masking is recommended on all fabrication applications where extra handling is expected. NOTE: The vinyl film must be removed immediately after installation.

### INSTALLATION

Tite-Loc panels are intended as architectural or structural roofing. Substrates may be ½" (min.) plywood, nailboard insulation or equal with an underlayment of ice and water shield applied horizontally from eave to ridge. Other substrates can be metal decking, purlins or rigid insulation in conjunction with bearing plates. A minimum ½:12 pitch is required.

For coastal applications, aluminum panels with stainless steel clips must be used for finish warranty. Consult a local architect/engineer for compliance with local codes.

# TITE-LOC/TITE-LOC PLUS PANELS

Tite-Loc and Tite-Loc Plus panels are factory-formed to length and field-seamed to a 90° lock (Tite-Loc) or a 180° lock (Tite-Loc Plus). The panels have been designed for application over a wide variety of substrates on roof slopes as low as ½:12 pitch. Available in 12", 16" and 18" widths, Tite-Loc and Tite-Loc Plus panels can be produced in 22 and 24 gauge steel or .032 and .040 aluminum.

### SEAMING

Tite-Loc and Tite-Loc Plus panels require the use of mechanical seamers. When seaming panels on slopes greater than 6:12, caution must be exercised to prevent seamer slippage and resulting finish scratches that may void the warranty. Seamers are available along with hand crimpers and other tools through D.I. Roof Seamers, which is the only supplier of this equipment approved by Petersen. For details and rental information visit pac-clad.diroofseamers.com.

### CURVED APPLICATIONS

The Tite-Loc panels can be curved to a minimum radius of 20'. Tite-Loc curving can be done in the field or at the factory depending on the radius and length of the panel. Tite-Loc Plus panels cannot be curved. For more about Petersen's curving capabilities, contact your local Petersen factory.

# OIL CANNING

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.





### **MATERIALS**

.032 aluminum\* 24 gauge steel\* .040 aluminum\* 22 gauge steel\*

> SMOOTH PANEL (STANDARD)

12", 16" or 18" O.C.

WITH STRIATIONS

(OPTIONAL)

12", 16" or 18" O.C

STRIATIONS W/ PENCIL RIBS\*

(OPTIONAL)

12", 16" or 18" O.C

PENCIL RIBS (OPTIONAL)

12", 16" or 18" O.C.

**SPECS** 

**\_** 

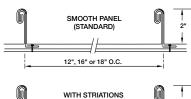
12", 16" or 18" O.C. 2" High

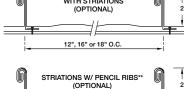
# **MATERIALS**

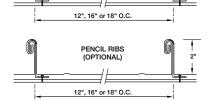
.032 aluminum\* 24 gauge steel\* .040 aluminum\* 22 gauge steel\*

**SPECS** 

12", 16" or 18" O.C. 2" High







Not all panel conditions are available in each Petersen branch; additional freight charges might apply if specific panel condition is required. Tite-Loc and Tite-Loc Plus panels are supplied "smooth" as standard. Customer must advise if additional panel conditions are required.



#### PRODUCT FEATURES

- Pencil ribs and striations are only available by request
- ▶ 35-year non-prorated finish warranty
- Maximum factory-produced panel length varies by facility. Consult rep for details.
- ▶ Weathertightness warranty available

#### MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- ▶ 16 stocked colors (22 gauge steel)
- ▶ 36 stocked colors (.032 aluminum)
- 22 stocked colors (.040 aluminum)
- ▶ Galvalume Plus available

#### UL CLASSIFICATION

- ▶ UL-580 Class 90 rated up to 18" O.C.
- ▶ UL-1897 wind uplift
- ▶ UL-790 Class A fire rated
- ▶ UL-263 fire resistance rated
- ▶ UL-2218 impact resistance rated

#### TESTS (TITE-LOC PLUS ONLY)

- 24 Gauge Steel SSTD Missile Impact Tested - Passed
- .032 Aluminum SSTD Missile Impact Tested - Passed

### ASTM TESTS

- ASTM E1592 tested
- ASTM E331/1646 tested
- ▶ ASTM E283/1680 tested
- ASTM E2140 (Tite-Loc Plus only)

# FLORIDA BUILDING & MIAMI-DADE PRODUCT APPROVALS

Please refer to pac-clad.com or your local factory for specific product approval numbers for Tite-Loc Plus.

Cape Canaveral Volunteer Fire Station, Cape Canaveral, FL Contractor: Quality Metals

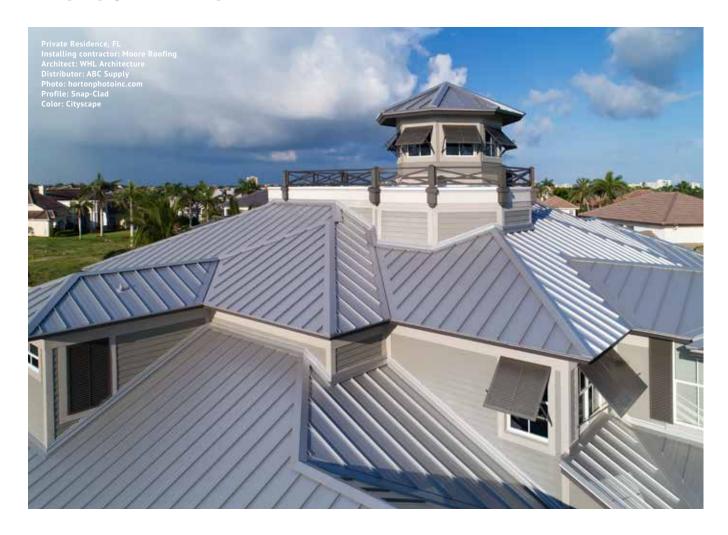
Architect: BRPH

General contractor: W&J Construction

Photo: hortonphotoinc.com Profile: Tite-Loc Plus Color: Arcadia Green

<sup>\*24</sup> gauge and 22 gauge steel and .032 and .040 aluminum panels are UL-90 classified over solid substrate. See roof deck construction in Underwriter Laboratories roofing materials and systems directory. \*\*24 gauge and 22 gauge Tite-Loc Plus panels are FM Approved in 12" and 16" widths over 16 gauge open purlins only.

# PAC-150 PANELS



PAC-150 standing seam metal roofing panels combine semistructural metal panel performance with architectural roofing panel aesthetics. Maximum panel length is limited when factory or shop-formed but virtually unlimited when field-formed; minimum panel length is approximately 4'.

PAC-150 roofing panels feature a 1.5" leg height which requires mechanical field seaming to either 90° or 180°. Panels have a concealed-fastener clip designed to allow for maximum design flexibility.

This panel combines an attractive thin-rib profile with superior structural performance. PAC-150 panels are designed for application over a variety of substrates in slopes as low as 1:12. PAC-150 roofing panels are available in a variety of widths from 12" to 20".

# **OIL CANNING**

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.

# REGIONAL AVAILABILITY

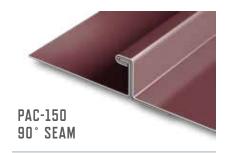
PAC-150 is produced only in Petersen's Georgia, Maryland and Arizona facilities; additional freight charges might apply.

### CURVED APPLICATIONS

The PAC-150 panels can be curved to a minimum radius of 20'. Curving can be done in the field or at the factory depending on the radius and length of the panel. For details about curving capabilities, please contact the Acworth, Ga., or Annapolis Junction, Md., factories.

### **SEAMERS**

PAC-150 panels require the use of mechanical seamers. When seaming panels on slopes greater than 6:12, caution must be exercised to prevent seamer slippage and resulting finish scratches that may void the warranty. Seamers are available along with hand crimpers and other tools through D.I. Roof Seamers, which is the only supplier of this equipment approved by Petersen. For details and rental information visit pac-clad. diroofseamers.com.



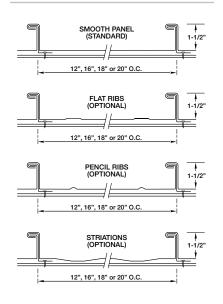
# **MATERIALS**

.032 aluminum 24 gauge steel

# **SPECS**

12", 16", 18"

or 20" O.C. 1-1/2" High





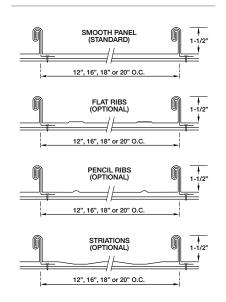
#### **MATERIALS**

.032 aluminum 24 gauge steel

# **SPECS**

12", 16", 18"

or 20" O.C. 1-1/2" High



# PRODUCT FEATURES

- ▶ 35-year non-prorated finish warranty
- ▶ Weathertightness warranty available
- Available in four pan variations; smooth, striated, pencil rib or flat rib. Check locally for panel condition availability
- Maximum panel length of 64' when factory or shop-formed but virtually unlimited when field-formed
- ► Mechanically seamed in the field to 90° or 180°
- ▶ NOTE: Seamers for PAC-150 are available from pac-clad.diroofseamers.com

### MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- ▶ 36 stocked colors (.032 aluminum)
- ▶ Galvalume Plus available

### **UL CLASSIFICATION**

- ▶ UL-580
- ▶ UL-1897
- ▶ TAS-125

# FLORIDA BUILDING PRODUCT APPROVALS

Contact the Acworth, Georgia facility for PAC-150 product approvals.

Photo below: Theodore Roosevelt Visitor Center, Onward, MS Contractor: Central Roofing

Architect: John S. Odom
Distributor: MS Roofing Supply
Owner: U.S. Fish and Wildlife Service
Photo: hortonphotoinc.com

Profile: PAC-150 Color: Weathered Steel



# PAC T-250 PANELS



PAC T-250 panels are factory-formed or field formed to length and field-seamed. The panels have been designed for application over a variety of substrates on roof slopes as low as 1/2: 12. PAC T-250 panels combines structural panel performance with architectural panel aesthetics. PAC T-250 panels feature a 2.5" nominal finished panel height from the deck with seam cap that requires mechanical field seaming after installation. T-250 panels have a continuous and/or intermittent concealed-fastener clip system to allow for thermal expansion/contraction. Adhesive beads are factory-applied to seam cover.

#### TRIM

All flashing and trim shall be fabricated by manufacturer or qualified fabricator. Flashing shall be PAC-CLAD aluminum or steel. Minimum bending radius is 2T. Vinyl film is recommended on all fabrication applications where extra handling is expected. NOTE: The vinyl film must be removed immediately after installation.

# OIL CANNING

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.

#### INSTALLATION

PAC T-250 panels are intended for use in architectural and structural roofing. Substrates may include 5/8" min. plywood, nailboard insulation or equal with an underlayment of ice and water shield applied horizontally from eave to ridge.

Other substrates may include metal decking, purlins or rigid insulation in conjunction with bearing plates. Maximum seam cap length is 25'. Contact Petersen for further assistance with project details. For coastal applications, aluminum panels along with stainless steel clips must be used for finish warranty. Consult a local architect/engineer for compliance with local codes and conditions. The panel is bi-directional, which allows installers to position the first panel in the center of a roof and install simultaneously in both directions.

#### SEAMING

PAC T-250 panels require the use of mechanical seamers, which are available along with hand crimpers and other tools through D.I. Roof Seamers, which is the only supplier of this equipment approved by Petersen. For details and rental information visit pac-clad.diroofseamers.com.

### REGIONAL AVAILABILITY

PAC T-250 is produced only in Petersen's Illinois and Texas facilities; additional freight charges might apply.

# **PRODUCT FEATURES**

- ▶ Smooth panels are standard
- Maximum factory-produced panel length varies by facility. Consult rep for details.
- ► Architectural/structural panel
- ▶ Factory-applied sealant in seam cover
- ▶ 35-year non-prorated finish warranty
- ► Field forming panels are available for long length requirements

- Can be tapered and radiused; consult factory for limitations
- Weathertightness warranty available
- ▶ Continuous and/or intermittent clips
- Not available in all locations. Consult PAC rep for availability.

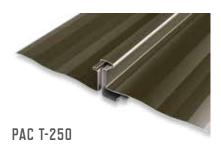
#### MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- ▶ 16 Stocked colors (22 gauge steel)
- ▶ 36 stocked colors (.032 aluminum)

- ▶ 22 stocked colors (.040 aluminum)
- ▶ Galvalume Plus available

#### **TESTING**

- ASTM 283 & 331 tested
- ASTM 1680 & 1646 tested
- ASTM E1592 tested
- ASTM E2140 tested
- ▶ FM 4474
- ▶ UL-580
- ▶ UL-897

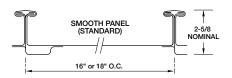


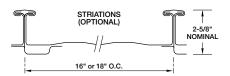
#### **MATERIALS**

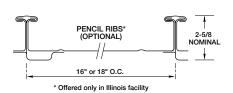
.032 aluminum 24 gauge steel .040 aluminum 22 gauge steel

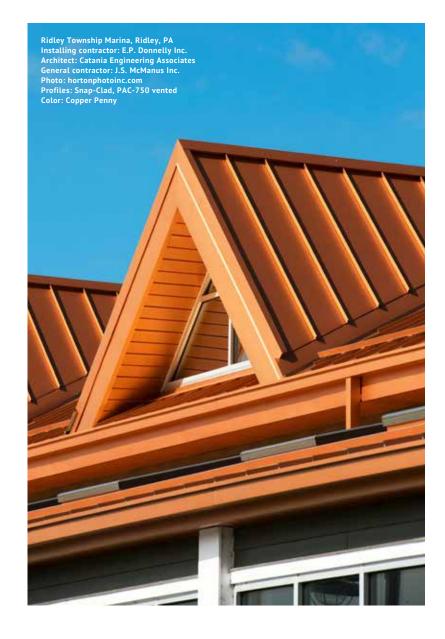
**SPECS** 

16", or 18" O.C. 2-5/8" nominal high

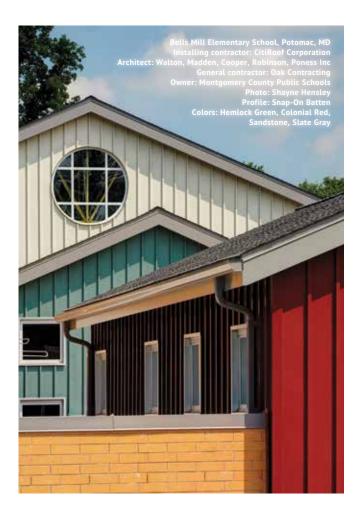








# **SNAP-ON PANELS**



Snap-On panels are ideal for use in roofing, mansard and fascia applications. Snap-On panels are designed to be installed over a waterproofed solid substrate and a minimum 3:12 roof pitch. Snap-On panels are factory roll-formed in continuous lengths. Maximum panel length is 35' and minimum panel length is 4'. Consult factory for nonstandard lengths.

The simplicity of the pan design combined with leveling provides superior flatness and allows for greater workability on site.

#### TRIM

All flashing and trim shall be fabricated by manufacturer or qualified fabricator. Flashing shall be PAC-CLAD aluminum (.032 - .063 gauge as specified) or PAC-CLAD steel (24 gauge or 22 gauge as specified). A 35-year non-prorated finish warranty can be supplied covering finish performance. Minimum bending radius is 2T; consult rep for details. Vinyl masking is recommended on all fabrication applications where extra handling is expected. NOTE: The strippable film must be removed immediately after installation.

### INSTALLATION

Snap-On panels shall be installed over solid decking (5/8" plywood, nailboard insulation or equal) with an underlayment applied horizontally from eave to ridge. Panels shall be fastened using Petersen nonpenetrating clips, fastening on 18" centers (max.). Minimum slope at 3:12 pitch. Consult a local architect or engineer for requirements of local codes and conditions.

### **CURVED PANELS**

The 1" Snap-On standing seam panel can be curved to a concave or convex radius, with a minimum radius of 9'. This panel is ideal for barrel vaults and entrance ways. Curved panels must be installed over a waterproofed solid substrate.

# **OIL CANNING**

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.

# PRODUCT FEATURES

- ldeal for transition roofs
- Pencil ribs available
- ▶ 35-year non-prorated finish warranty
- Panel lengths up to 35'

# MATERIAL

▶ 43 stocked colors (24 gauge steel)

- ▶ 36 stocked colors (.032 aluminum)
- ▶ Galvalume Plus available

#### UL CLASSIFICATION

- ▶ UL-580 Class 90 rated over solid substrate. (steel only up to 18" O.C.)
- ▶ UL-1897 wind uplift
- UL-790 Class A fire rated
- ▶ UL-263 fire resistance rated

#### ASTM TESTS

- ASTM E283/1680 tested
- ▶ ASTM E331/1646 tested

# FLORIDA BUILDING PRODUCT APPROVALS

Please refer to pac-clad.com or your local factory for specific product approval numbers for Snap-On Panels.





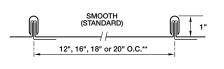
# SNAP-ON STANDING SEAM

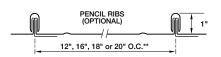
### **MATERIALS**

.032 aluminum 24 gauge steel\*

# **SPECS**

12", 16", 18" or 1" High 20" O.C.\*\*







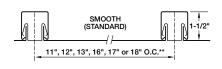
# SNAP-ON BATTEN

#### **MATERIALS**

.032 aluminum 24 gauge steel

# **SPECS**

11", 12", 13", 16", 17" 1-1/2" High or 18" O.C.\*\*





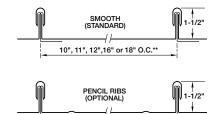
# HIGH SNAP-ON STANDING SEAM

#### MATERIALS

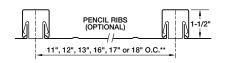
.032 aluminum 24 gauge steel\*

# **SPECS**

10", 11", 12", 16" or 1-1/2" High 18" O.C.\*\*



10", 11", 12", 16" or 18" O.C.\*\*



<sup>\*\*</sup> Panel width varies by factory. Consult PAC rep for details.

\*12" and 18" 24 gauge steel Snap-On Standing Seam panels and 11" and 18" 24 gauge steel High Snap-On Standing Seam panels are UL-90 Classified over solid substrate. See roof deck construction in Underwriter Laboratories roofing materials and systems directory.

A complete specification is available at pac-clad.com.

# REDI-ROOF PANELS



Redi-Roof standing seam is intended for application over a solid substrate with a minimum 3:12 roof pitch. Typical substrates include plywood, nailboard insulation or equal. Panels are factory roll-formed in continuous lengths. Maximum panel length is 45' and minimum panel length is 4'. Redi-Roof panels feature an offset profile which adds strength and allows room for a hex head fastener. The clip, with its button-punched design, ensures an extra-snug fit. The one-piece design allows for ease of installation.

#### TRIM

All flashing and trim shall be fabricated by manufacturer or qualified fabricator. Flashing shall be PAC-CLAD aluminum or PAC-CLAD steel. Minimum bending radius is 2T. Vinyl film is recommended on all fabrication applications where extra handling is expected. NOTE: The vinyl film must be removed immediately after installation.

# INSTALLATION

Redi-Roof panels shall be installed over solid decking with an underlayment applied horizontally from eave to ridge. Panels shall be fastened using Petersen nonpenetrating clips, fastening on 18" centers (max.). Minimum slope at 3:12 pitch. Consult a local architect/engineer for requirements of local codes and conditions.

# REGIONAL AVAILABILITY

Redi-Roof is produced only in Petersen's Illinois and Texas facilities; additional freight charges might apply.

# **OIL CANNING**

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.

### PRODUCT FEATURES

- ▶ Available with or without offsets
- ► Factory eave notching available from the Illinois factory
- ▶ Labor-saving one-piece design
- Pencil ribs available
- ▶ 35-year non-prorated finish warranty
- Panel lengths up to 45'

#### MATERIAL

- ▶ 43 stocked colors (24 gauge steel)
- 36 stocked colors (.032 aluminum)
- ▶ 16 stocked colors (22 gauge steel)
- ▶ Galvalume Plus available

#### UL CLASSIFICATION

- ▶ UL-580 Class 90 wind uplift (steel only)
- ▶ UL-790 Class A fire rated

- ▶ UL-263 fire resistance rated
- ▶ UL-2218 impact resistance rated

### ASTM TESTS

- ASTM E283/1680 tested
- ▶ ASTM E331/1646 tested

Photo above: Latrobe Elementary School, Latrobe, PA Contractor: Pennsylvania Roofing Systems Architect: Axis Architecture Distributor: Brock Associates

Owner: Greater Latrobe School District Photo: hortonphotoinc.com Profiles: Tite-Loc Plus, PAC-750 Soffit Color: Custom Marquis Orange





# **MATERIALS**

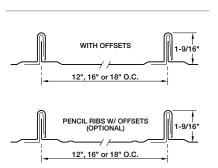
.032 aluminum

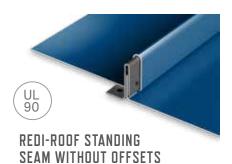
22 gauge steel

24 gauge steel\*

**SPECS** 

12", 16" or 18" O.C. 1-9/16" High





# **MATERIALS**

.032 aluminum

22 gauge steel

24 gauge steel\*

**SPECS** 

12", 16" or 18" O.C. 1-3/8" High

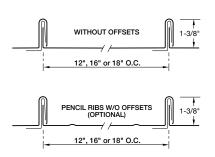


Photo above:

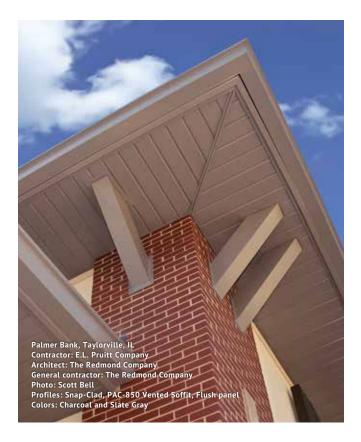
Fields Residence, Downers Grove, IL Installing contractor: Complete Flashings Architect: Kuklinski+Rappe Architects
General contractor: Roberts Design+Build
Photo: Tom Harris
Profile: Redi-Roof

Color: Weathered Zinc

A complete specification is available online at pac-clad.com.

<sup>\*24</sup> gauge steel, in all O.C.'s is UL-90 Classified over solid substrate. See roof deck construction in Underwriter Laboratories roofing materials and systems directory.

# SOFFIT PANELS



Petersen offers superior design versatility for soffit applications by providing the PAC-750/850 Soffit panels, as well as the Flush panel in a variety of gauges and widths. Both pre-formed profiles are effective solutions in soffit projects, and with the aluminum substrate can be ventilated for increased airflow capacity.

# PAC-750 SOFFIT PANELS

Petersen offers a pre-formed soffit panel suitable for both commercial and residential use. Panels are 12" wide with

a "vee" groove every 6" center-to-center and furnished in continuous lengths up to 25'. Minimum panel length varies by location. Consult rep.

# PAC-850 SOFFIT PANELS

PAC-850 Soffit panels utilize an innovative hook-and-grab interlock. Panels are 12" wide with a "vee" groove every 6" center-to-center and furnished in continuous lengths of up to 25'. Minimum panel length varies by location. Consult rep.

# **SOFFIT VENTING**

The PAC-750 and PAC-850 Soffit panels can be lanced to allow for airflow and under-eave ventilation in full or half vent.. See illustrations on page 39 for examples and limitations.

#### SOFFIT "J" CHANNEL

Petersen can provide soffit "J" Channel as trim in lengths up to 12' in matching colors.

#### FLUSH PANELS

The Flush panel and Reveal panel may be specified for use as soffit panels. Maximum panel length is 25' and minimum panel length is 4'. Pencil ribs can be added to the Flush panel for increased strength and aesthetics. Pencil ribs are recommended for longer panel lengths. One or two ribs are available at no additional cost. See drawings on page 17.

#### FLUSH AND REVEAL VENTING

The Flush and Reveal panels only in .032 aluminum are available ventilated. Consult the local factory for venting options.

# **DIL CANNING**

Jobsite factors such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect panel finish or structural integrity and therefore is not cause for rejection.

# PRODUCT FEATURES

- Four profiles available
- Perforation available for ventilation on aluminum only
- ▶ Roll-formed to exact lengths
- ▶ Matching "J" trim available
- ▶ 35-year non-prorated finish warranty

#### MATERIAL

- ▶ 43 stocked colors (24 gauge steel) (Flush/Reveal soffit only)
- ▶ 16 stocked colors (22 gauge steel) (Flush/Reveal soffit only)

- 36 stocked colors (.032 aluminum)
- 22 stocked colors (.040 aluminum)
- ► Galvalume Plus available (Flush and Reveal soffit only)

#### ASTM TESTS

- ASTM E330 Tested: Flush panel (12" only) and PAC-850
- ▶ ASTM 1592
- ASTM E283
- ASTM E331
- AAMA 501.1-05

#### FLORIDA BUILDING PRODUCT APPROVALS

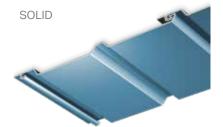
Please refer to pac-clad.com or your local factory for specific product approval numbers for soffit panels.

## OPEN AIR PERCENTAGES (750/850/FLUSH)

(these percentages are nominal and may vary per profile)

- ▶ Half vented (750/850) 6%
- Full vented (750/850) 12%
- Wide vent (Flush/Reveal) 12%
- Narrow vent (Flush/Reveal) 6%





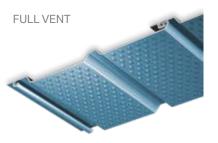












# SOFFIT FLUSH AND REVEAL

# **MATERIALS**

.032 aluminum 24 gauge steel .040 aluminum\* 22 gauge steel\*

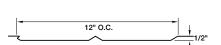
\*Limited color availability

# SPECS

7", 11", or 12" O.C. 1" High

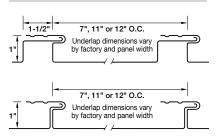




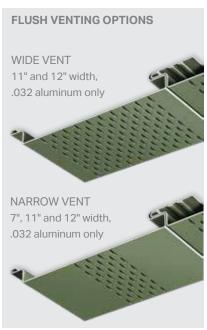




PAC-850







# PAC-CLAD HT UNDERLAYMENT





PAC-CLAD HT from Petersen is a self-adhering, high-temperature roofing underlayment designed to provide premium waterproofing protection for a variety of roofing applications. PAC-CLAD HT underlayment offers protection against water and ice damming while withstanding extreme weather conditions.

The self-adhering qualities of PAC-CLAD HT reduces labor costs and installation times while providing increased protection compared to that of typical felt roofing underlayments. This strong, skid-resistant high-tensile-strength rubberized asphalt membrane is available in either black or white.

### PRODUCT FEATURES

- Protects against water infiltration caused by ice dams and wind-driven rain
- ▶ Resists cracking, drying and rotting
- Resists temperatures up to 250°F without adhesive degradation
- Concealed waterproofing system will not detract from architectural aesthetics
- Exposed rubberized asphalt bead ensures watertightness of lap seams
- ▶ Seals around roofing fasteners
- ▶ Split-release film provides fast and easy installation

#### **TESTING**

- ▶ UL Classified
- ▶ ICC-ES ESR #2206
- ▶ 2009, 2012 and 2015 International Building Code
- ▶ Florida Building Code Approved Product #6785
- ▶ Meets ASTM D1970
- ▶ Miami-Dade County Product Control Approved
- ▶ ASTM E108/UL 790 Class A Fire Resistance
- ▶ 2016 California Green Building Standards, Title 24
- ▶ 2015, 2012 and 2008 ICC 700 National Green Building Standard

#### PRODUCT SPECIFICATIONS

Surface	Black/White Engineered Polyolefin Composite Film with Factory-applied Anti-skid Coating	
Membrane	Rubberized Asphalt	
PRODUCT CHARACTERISTIC	UNITS	RESULTS
Roll Length	feet	66
Roll Weight	lbs	55
Roll Size	sq ft	198
Roll Width	inches	36
PACKAGING INFORMATION		
Boxes (rolls) per pallet		25
TYPICAL PERFORMANCE PROPERTIES	TEST METHOD	RESULTS
Thickness	ASTM D1970	40 mils
Low Temperature Flexibility	ASTM D1970	-45°F
Adhesion to Plywood at 75°F	ASTM D1970	35 lbs/ft
Lap Seam Adhesion at 75°F	ASTM D1970	21 lbs/ft
Sealability Around Nail	ASTM D1970	Pass
Slip Resistance	ASTM D1970	Pass
Thermal Stability	ASTM D1970	Pass
Moisture Vapor Permeance	ASTM D1970	0.02 perms
Water Absorption	ASTM D1970	0.5%
Tensile Strength Machine Direction	ASTM D412	250 psi
Tensile Strength Transverse Direction	ASTM D412	1390 psi
Elongation at Break Machine Direction	ASTM D412	250%
Elongation at Break Transverse Direction	ASTM D412	170%

# **GUTTER AND DOWNSPOUT SYSTEMS**

The design of the PAC-Tite gutters, downspouts and scuppers, improves water management performance while complementing a building's aesthetic qualities. Custom engineering, such as the heavy aluminum gutter strap design, also promotes ease of installation and helps the drainage systems withstand harsh environments. Petersen's PAC-Tite line is the only system that's Factory Mutual approved. It also features ANSI/SPRI GT-1 compliance.

### **GUTTERS**

PAC-Tite Gold gutters offer easy installation, outstanding performance and an attractive appearance. The products include a 2-in. wide external wind strap every 6 feet and gutter hangers every 24 in. O.C. to comply with the ANSI/SPRI GT-1 Standard. The unique, heavy aluminum gutter hanger is designed to eliminate the need for drilling and riveting and allows for full thermal movement of the gutter. Offered with an optional roof flange or slotted drain bars for ballast retention, PAC-Tite Gold gutters offer maximum roof drainage and ease of installation in a one-of-a-kind edge metal solution.

#### Benefits include:

- ANSI/SPRI GT-1 tested to comply with the standard for gutter systems
- ▶ FM-approved for wind uplift protection
- Variety of colors, sizes and metal gauges
- Prefabricated miters and accessories to eliminate the need for field fabrication



Prince Frederick Fire Department #2, Prince Frederick, MD (See page 32 for details)

# DOWNSPOUTS

The PAC-Tite industrial downspout is available in a variety of standard sizes, or it can be fabricated to meet specific job requirements. The open-face design makes clearing out debris an easy task. Downspouts are manufactured with simple connection configurations and include three attachment straps per 12-foot section, which enables fast and easy installation.

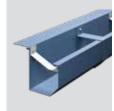
# SCUPPER, COLLECTION BOX

The PAC-Tite water drainage line includes a variety of custom-designed scuppers and collection boxes that meet performance requirements that architects and contractors want. Their unique design provides maximum protection against leaks, and is a decorative and functional means of water control.

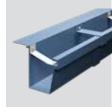
#### **GUTTERS**



PAC-TITE Gold Gutter IGG-1



PAC-TITE Gold Gutter IGG-2



PAC-TITE Gold Gutter IGG-3



PAC-TITE Gold Gutter IGG-B



PAC-TITE LT K-Style Gutter

SCUPPER. COLLECTION BOX

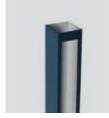


PAC-TITE LT Half Round Gutter

# DOWNSPOUTS



Industrial Downspout (Closed)



Industrial Downspout (Open)



Corrugated Rectangular Downspout



Round Downspout



Thru-Wall Scupper



Thru-Wall Collection Box

# COLORGARD® SNOW RETENTION SYSTEM



Petersen is stocking the patented ColorGard snow retention system. ColorGard is the only product available which will precisely match the color of any Petersen roof panel. ColorGard achieves this by utilizing a strip of the roof material, which is then mounted directly into ColorGard for a perfect match. This strip can be cut in the field or at Petersen's factory.

ColorGard utilizes the patented S-5! Clamp for its strength. The S-5! technology involves gripping the seam in such a way that there is no penetration of the panel material. S-5! utilizes round-point set screws for attachment which are specially made for the S-5! ColorGard or SnoFence  $^{\text{TM}}$  snow retention system. These systems eliminate minimum temperature installation requirements and messy adhesives to apply. ColorGard can be installed at any temperature. For more information regarding ColorGard please contact your local Petersen representative.

# PAC-CLAD® FLASHING AND TRIM

Petersen maintains complete flashing fabrication capabilities in three of its plant locations to produce trim. Fabrication capabilities include press-breaking, shearing, welding and notching (notching available only from the Illinois facility).

Each trim accessory is factory-formed in a gauge appropriate to the end-use application. Precisely matched color and finish quality is assured. For projects in which installer fabrication is preferred, flat sheet is available for immediate shipment.

A complete set of flashing details for each panel profile is available at pac-clad.com, and includes detailed drawings for many flashing conditions. These flashing details should be followed, especially for any projects requiring a

weathertightness warranty. Assistance with difficult or unusual flashing conditions is available by contacting the local factory.

In addition to standard details, Petersen can provide custom fabrication to meet the most exacting requirements. Please contact Petersen for assistance with custom architectural elements.

Vinyl masking is recommended on all fabrication applications where extra handling is expected. NOTE: The strippable vinyl film must be removed immediately after installation.

Minimum bending radius is 2T; consult rep for details.

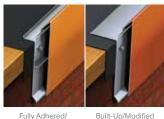


# FASCIA SYSTEMS

Designed with strength and performance in mind, PAC-Tite fascia products are tested to ANSI/SPRI/FM 4435-ES-1 standards for full compliance with the specification. Available in a multitude of steel and aluminum gauges and face heights, PAC-Tite fascia can meet the needs of any project condition. A lifetime 215 mph warranty is available for PAC-Tite fascia products. For additional design options, Petersen provides the PAC-LOC and the Snap Edge fascia systems.

- ▶ Superior, efficient design for ease of installation
- ▶ Extensively tested for reliable, long-term performance
- ▶ Welded corners and scuppers available (for aluminum products only)
- Wide variety of colors and finishes
- ▶ Pre-punched, slotted holes for precise fastener placement

# PAC-TITE ANGULAR FASCIA



(BUM)

Mechanically Attached Single-Ply (FA)

PAC-TITE WT FASCIA



Mechanically Attached



Built-Up/Modified (BUM)

PAC-TITE WT EXTENDED FASCIA



Mechanically Attached Single-Ply (FA)



Built-Up/Modified (BUM)

PAC-TITE WT CANTED FASCIA



WT Extended Canted Fascia w/ Galvanized Waterdam



WT Canted Fascia w/ Galvanized Waterdam

PAC SNAP EDGE FASCIA



Fully Adhered/ Single-Plv (FA)



Stone Ballast Single-Ply (SB)



Built-Un/Modified

# PAC EXTENDED SNAP EDGE FASCIA



Fully Adhered/ Built-Up/Modified Mechanically Attached (BUM) Single-Ply (FA)



PAC-LOC FASCIA

# PAC-LOC FASCIA



PAC-LOC FASCIA

# **PAC-TITE COPING**





Existing Slope with Nailer

# PAC-TITE **GOLD COPING**



PAC-CONTINUOUS **CLEAT COPING** 

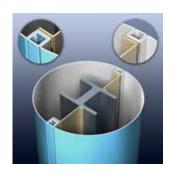


# **COPING SYSTEMS**

As a key protective element, roof edge and perimeter products are necessary to maintain the integrity of all flat roofing systems. Petersen offers a line of coping products to meet the most stringent engineering requirements as well as provide the ideal finishing touch for superior aesthetics.

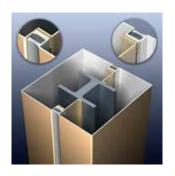
- Superior, efficient design for ease of installation
- Extensively tested for reliable, long-term performance
- ▶ Welded corners and scuppers available (for aluminum products only)
- Wide variety of colors and finishes
- ▶ Pre-punched, slotted holes for precise fastener placement
- Non-penetrating design maintains watertightness integrity

# **COLUMN COVERS**



# 1000 SERIES

- ▶ PAC-1000F (Flush Joint)
- ▶ PAC-1000C (Caulk Joint)
- PAC-1000R (Reveal Joint)



### 2000 SERIES

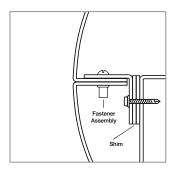
- ▶ PAC-2000F (Flush Joint)
- PAC-2000C (Caulk Joint)
- PAC-2000R (Reveal Joint)

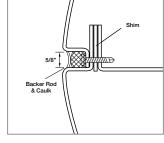
#### PAC-1000 & 2000 SERIES

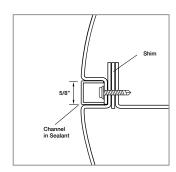
The design of the PAC-1000 and 2000 "F" Series Column Covers allows for a clean, precise installation, revealing a hairline joint. The column sections are assembled using a rivnut/ keyhole system to provide a tight, inconspicuous vertical seam.

The PAC-1000 and 2000 "C" and "R" Series Column Covers are designed to leave a small open vertical reveal where the sections meet. Backer rod and caulk are applied to the vertical reveal joint to complete the installation of the "C" Series Column Cover. For the "R" Series Column, a metal channel filler is fabricated to fit into the vertical joint, and is set in sealant.

Projects may require column or section designs that are not shown here. Column Covers are available in 16 gauge stainless steel, and .090 and .125 aluminum, but check with rep to confirm. Finishes include custom colors, PAC-CLAD colors shown on pages 4-7, plus anodized options and composite material. Maximum length can vary. Petersen's fabrication capabilities offer flexibility and go far beyond what is displayed on this page. Please contact Petersen with fabrication needs.







FLUSH JOINT

**CAULK JOINT** 

REVEAL JOINT

\*NOTE: Consult factory if tighter radius for Reveal or Caulk Joint is required.

# COIL AND FLAT SHEET



In addition to offering the industry's widest selection of 70% PVDF finishes in steel and aluminum, Petersen also provides mill finish sheet and coil in a variety of gauges and widths. Stock includes 5005-H34, as well as 3105 H24, in gauges .032 to .125 for all applications that require fabrication and post-finishing. With its state-of-the-art, cut-to-length and slitting equipment, Petersen can provide flat sheet and coil to exact specifications.

# BENDING GUIDELINES

#### METAL BENDING GUIDELINES

Proper bending techniques must be followed when fabricating PAC-CLAD steel and aluminum. Failure to follow bending guidelines can result in product and/or paint failure. To remain in compliance with Petersen's finish warranty for PAC-CLAD metal, follow the guidelines outlined in this document.

# **BENDING TOLERANCES**

The PAC-CLAD finish is engineered to be durable, but it can be stretched, cracked or exhibit compromised adhesion if bent beyond its tensile strength limits. Additionally, metal can crack, fracture or become weakened if bent improperly. The following tolerances apply when bending PAC-CLAD metal into 180-degree angles.

MATERIAL THICKNESS	BEND TYPE	
.032" aluminum	2T	
.040" aluminum	2T	
.050" aluminum	2T	
.063" aluminum	2T	
22 gauge steel	2T	
24 gauge steel	2T	

# FINISH WARRANTY COMPLIANCE

Reference to proper bending of Petersen's PAC-CLAD metal can be found in Part II, Section 3 of the 35-year finish warranty as follows:

"This warranty does not apply to failure of the coating in the following additional circumstances: forming where the bend is tighter than 2T, forming which involves severe reverse bending, or which subjects the coating to alternate compression and tension..."

### **TERMINOLOGY**

Metal bends are given descriptions such as OT, 1T, 2T, etc., where T refers to the thickness of metal. These designations are used to measure the inner radius of the bend applied to sheet metal in 90 and 180-degree bends.

## **OUESTIONS**

Consult factory representative with questions or concerns.

#### TYPICAL BENDS

# 90° 2T (TWO-T) BEND •

The **outside** radius of the bend is equal to 2x the metal thickness.

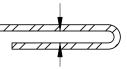


RECOMMENDED -

2x the metal thickness

# 180° 2T (TWO-T) BEND •

The **inside** radius of the bend is equal to 2x the metal thickness.



2x the metal thickness

#### **VOIDS WARRANTY** -

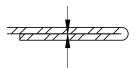
# 90° BEND 🛇

The **inside** angle of the bend is 90 degrees. The thickness at the bend is less than the thickness of the material. Example: If using .040 aluminum the outside radius must be .080 or greater.



# 180° OT (ZERO-T) BEND ♥

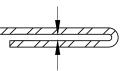
The **inside** radius of the bend is zero. The legs of the bend are fully compressed together.



0x the metal thickness

# 180° 1T (ONE-T) BEND ♦

The **inside** radius of the bend **Z** is equal to 1x the metal thickness.



1x the metal thickness

# **GENERAL CONSIDERATIONS**

The following is a summary of conditions and considerations that Petersen considers important when specifying PAC-CLAD metal products. For project-specific information, please call 800-PAC-CLAD.

#### FINISHES

PAC-CLAD panels are available standard with a 70% PVDF finish. Please refer to the color information on pages 4 through 7 for guidance of color selection. Samples and photo-accurate color charts are available for your assistance.

### **CUSTOM COLORS**

Custom colors are available for most applications of greater than 10,000 sq. ft. and may be applied to either aluminum or Galvalume steel. Contact Petersen for information concerning costs and availability.

#### INSTALLATION

Special care must be taken to ensure that panels are installed over a flat substrate. For roofing applications, panels typically are installed over 5%" or 3/4" plywood decking with ice and water shield horizontally overlayed from the eave to the ridge. It is recommended that clips be installed on 18" centers for all applications except Snap-Clad, PAC-150, PAC T-250, Tite-Loc Plus and Tite-Loc (consult specific UL Construction assemblies for clip spacing). Consult a local architect/engineer for requirements of local codes and conditions.

### **ACCESSORIES**

Most applications require additional metalwork including fascia, storefront trim, copings, gravel stops, downspouts, etc. Such metalwork may be specified for fabrication by manufacturer or for fabrication from flat sheet as provided by manufacturer. Flashings properly fabricated from PAC-CLAD flat sheet are fully covered under Petersen's 35-year finish warranty.

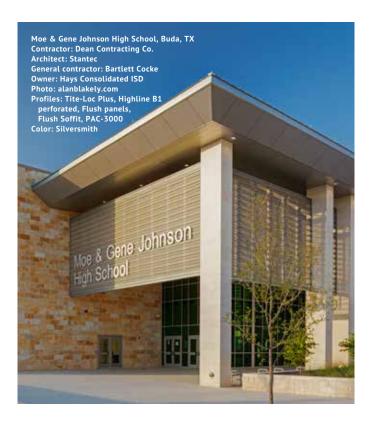
PAC-CLAD flat sheet provides an exact color match to PAC-CLAD panels. PAC-CLAD flat sheets, coil and fabricated trim accessories are available with a strippable vinyl masking applied. This masking is recommended on all applications requiring extra handling. NOTE: This strippable vinyl film must be removed immediately after installation.

### PANEL CONDITIONS/VARIATIONS

Pencil ribs and striations must be requested by the customer.

## PANEL DIMENSIONS

All dimensions appearing in this catalog are nominal. Consult Petersen rep for more information.



# LENGTHS

All panels are cut to custom lengths before roll-forming and are available in lengths up to 64'. See specific product pages for maximum panel lengths. Minimum length is 4'. Consult factory for longer lengths. Lengths are accurate to 1/4". Custom cut-to-length service is available at no cost and helps to improve project economy.

### PANEL WIDTHS

Most PAC-CLAD panels are available in non-standard on-center dimensions. Contact Petersen for product availability and cost. PAC-CLAD panel standard widths are nominal and could vary.

# PITCH

Tite-Loc and PAC T-250 panels are designed for a roof pitch of ½:12 or greater. PAC-150 minimum pitch is 1:12. Snap-Clad panels have been designed to be installed on applications as low as 2:12 pitch. Redi-Roof panels and Snap-On panels have been designed for a minimum 3:12 pitch. Greater pitch may be required in snow country and in areas of extreme climate conditions.

#### FIRE RATINGS

PAC-CLAD panels have been evaluated by Underwriters
Laboratories for inclusion in a variety of fire-rated
"P-Assemblies" and are classified in section CETW of the UL
Fire Resistance Directory - Vol. 1. Several panel assemblies
have been evaluated as Class A fire-rated. Contact Petersen for
complete information on components and assemblies.

# **OIL CANNING**

All Petersen material is prime-quality aluminum or Galvalume steel. All materials are specified for roll-forming applications. Panels are inspected in the plant for flatness before shipment. Jobsite conditions such as temperature variation, unlevel substrate and/or improper installation may promote oil canning. Oil canning does not affect the finish or structural integrity of the panel and is therefore not cause for rejection.

### WARRANTY

A 35-year finish warranty is available covering cracking, peeling and color fade on all PAC-CLAD applications. PAC-CLAD is a 70% PVDF finish and therefore carries the highest-quality 35-year non-prorated finish warranty available. Finish warranty terms for Cardinal Red, Award Blue, Weathered Copper, Weathered Steel and all metallic finishes vary. Please refer to pac-clad.com for further details.

Petersen also offers a coastal finish warranty for projects located in the vicinity of the coast or within saltwater environments. Aluminum substrates, with stainless steel clips and fasteners, must be used to qualify for the coastal warranty.

For projects utilizing Snap-Clad, Tite-Loc, Tite-Loc Plus, PAC-150 and PAC T-250 factory-formed standing-seam panels, weathertightness warranties for terms up to 20 years are available. Projects must be approved for warranty by Petersen prior to ordering.

#### STORAGE

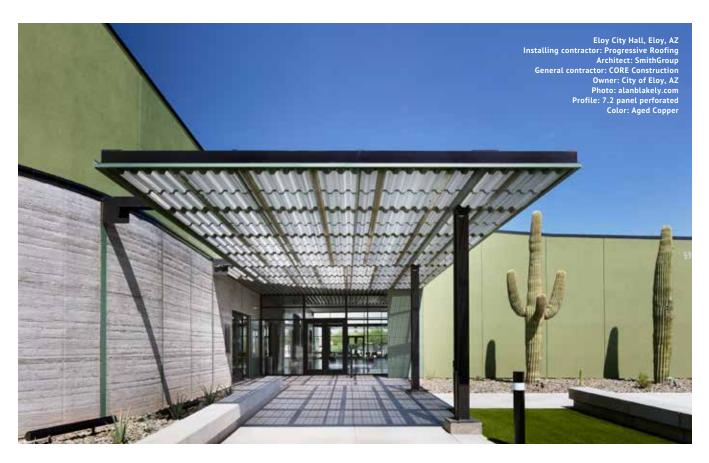
Clean, dry facilities for storage and protection of material should be provided at the job site. Store materials out of traffic areas to prevent dents, bending, abrasion, etc.

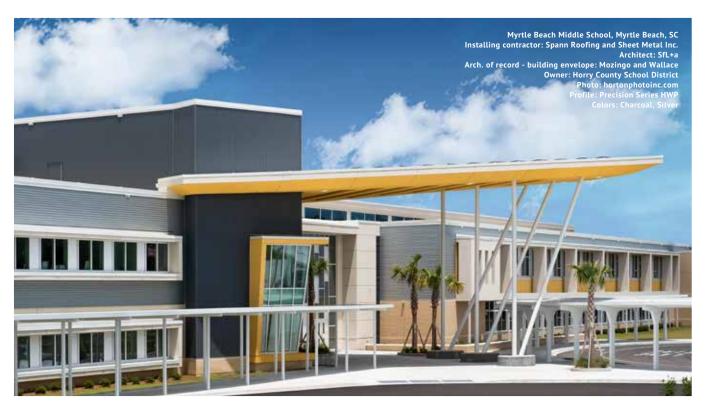
#### LIMITATIONS ON LIABILITY

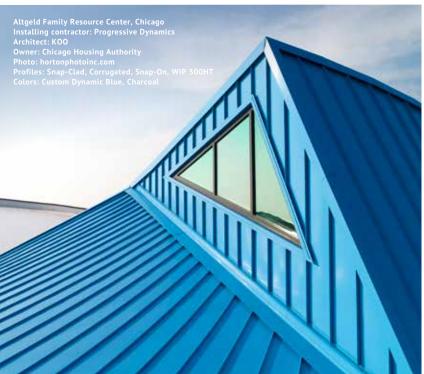
Neither Petersen nor its customer shall be liable for special, indirect or consequential damages. The liability of Petersen in the event of the sale of its products shall be limited to replacement of any defective or nonconforming products or refund of the purchase price.

### BENDING LIMITS

Bending limitations apply to PAC-CLAD metal. Bending beyond the approved 2T limit will void warranty. Refer to page 45, consult a Petersen rep for more information or visit pac-clad.com.







- ► PRECISION SERIES WALL PANELS
- FLUSH AND REVEAL PANELS
- **EXPOSED FASTENER PANELS**
- ► PERFORATED METAL
- ► SNAP-CLAD PANELS
- ► TITE-LOC PANELS
- ► SNAP-ON PANELS
- ► REDI-ROOF PANELS
- ► PAC-150 PANELS
- ► PAC T-250 PANELS
- **SOFFIT PANELS**
- ► FASCIA SYSTEMS
- COPING SYSTEMS
- ► GUTTER AND DOWNSPOUT SYSTEMS
- COIL AND FLAT SHEET



A CARLISLE COMPANY

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