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IC72-Panel Sculptured Gutter End	
Universal Gutter/Downspout Strap	
4" x 3½" Downspout	
4" x 3 ¹ / ₂ " 90° Elbow	
Downspout Bracket	
Valley	
IC72-Panel Rake	
IC72-Panel Sculptured Rake	
Sculptured Rake End	
Rakewall	
Pitch Break	
Peak	
Counter Flashing	
Reglet Flashing	
Sculptured High Side Eave	
20" Ridge/Hip Cover	
Universal Ridge	
Coping	
Gravel Stop	
Outside Corner	
Inside Corner	
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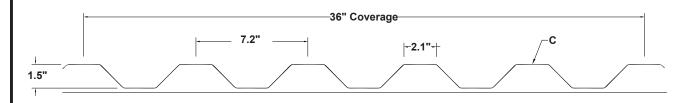
Product

Notes

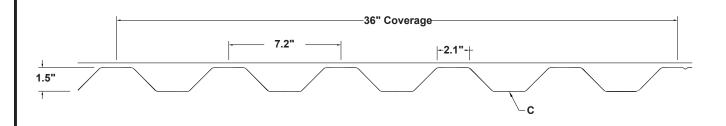
IC72-PANEL

PANEL OVERVIEW

ROOF PROFILE



WALL PROFILE



SLOPE

The minimum recommended slope for IC72-Panel roof panel is 1:12.

SUBSTRATE

IC72-Panel is designed to be utilized over open structural framing, but can easily be used wth a solid substrate. For solid substrate applications, the recommended substrate is 5/8" plywood with a 30 pound felt moisture barrier. To avoid panel distortion, use a properly aligned and uniform substructure.

COVERAGE

IC72-Panel has a coverage of 36" with a 11/2" rib height.

LENGTH

Lengths under 5'-0" are available with some cutting restrictions. Maximum recommended panel length is 45'-0". Longer panels require additional consideration in packaging, shipping and erection. Please consult your Metal Sales branch for recommendations (see PGI-2 and PGI-3 for locations).

AVAILABILITY

26, 24 and 22 Gauge (minimum quantities may apply)

APPLICATION

Commercial and Industrial Panel

FASTENING SYSTEM

Direct Fastened (exposed)

FASTENERS

The fastener selection guide should be consulted for choosing proper fasteners for specific applications. Quantity and type of fastener must meet necessary loading and code requirements (see PGI-12 through PGI-14).

MATERIALS

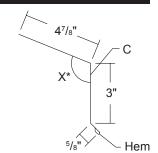
 $26,\,24$ and 22 gauge steel: Grade 50 per ASTM A 792

FINISH

- ► *Acrylic-Coated Galvalume® (ACG), AZ55 per ASTM A 792
- ► Prepainted Galvalume®, AZ50 per ASTM A 792
- ► **PVDF
 - * Differential appearance of Acrylic Coated Galvalume® roofing materials is not a cause for rejection.
 - ** Meets both Kynar 500^{\circledR} and Hylar 5000^{\circledR} specifications.



EAVE



Length 10'-2" - *Specify Slope Angle

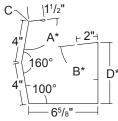
UNIVERSAL GUTTER/

DOWNSPOUT STRAP

-Hems

IC72-PANEL

SCULPTURED GUTTER



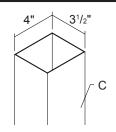
Lengths 10'-2" and 20'-3"
*Specify Slope Angle For A and B, and Length for D.

4" 100°

65/8"

SCULPTURED GUTTER END

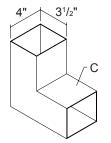
4" x 31/2" DOWNSPOUT



Lengths 10'-2" and 20'-3" (6" x 4" is also available)

4" x 3¹/₂" 95⁰ ELBOW

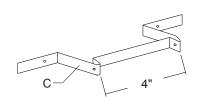
IC72-PANEL



(6" x 4" is also available)

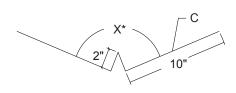
DOWNSPOUT BRACKET

16'



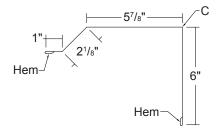
(6" is also available)

VALLEY



Lengths 10'-2" and 20'-3" *Specify Slope Angle

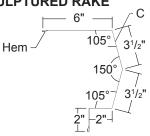
IC72-PANEL RAKE



Lengths 10'-2" and 20'-3"

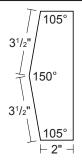
IC72-PANEL

SCULPTURED RAKE

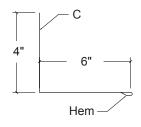


Lengths 10'-2" and 20'-3"

SCULPTURED RAKE END

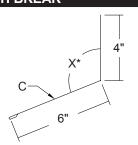


RAKEWALI



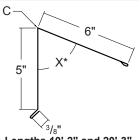
Length 10'-2"

PITCH BREAK



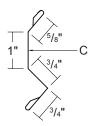
Length 10'-2" - *Specify Slope Angle

PEAK



Lengths 10'-2" and 20'-3" *Specify Slope Angle

COUNTER FLASHING



Length 10'-2"

SCULPTURED **HIGH SIDE EAVE**

-Hem

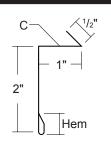
150°

105°

Lengths 10'-2" and 20'-3"

*Specify Slope Angle

REGLET FLASHING



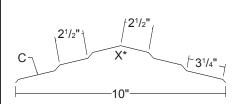
Length 10'-2"

UNIVERSAL RIDGE

OUTSIDE CORNER

IC72-PANEL

INSIDE CORNER



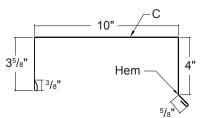
Length 10'-2" - *Specify Slope Angle

Lengths 10'-2" and 20'-3"

51/2"

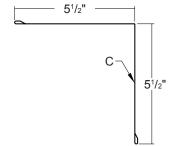
51/2"

COPING



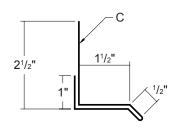
Lengths 10'-2" and 20'-3"

INSIDE CORNER



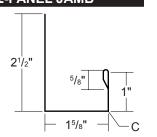
Lengths 10'-2" and 20'-3"

1.5" SILL/HEAD



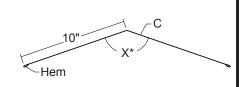
Length 10'-2"

IC72-PANEL JAMB



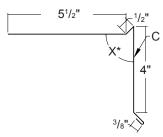
Lengths 7'-3", 10'-2" and 14'-2"

20" RIDGE/HIP COVER



Lengths 10'-2" and 20'-3" *Specify Slope Angle

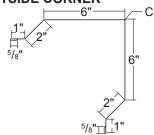
GRAVEL STOP



Lengths 10'-2" and 20'-3" *Specify Slope Angle

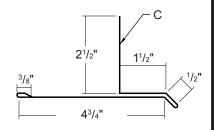
IC72-PANEL

OUTSIDE CORNER



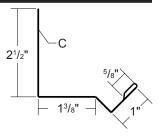
Lengths 10'-2", 14'-2" and 20'-3"

1.5" SILL TO SOFFIT



Length 10'-2"

HEAD CHANNEL



Length 10'-2"

35/8"

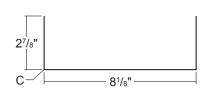
Lengths 10'-2", 14'-2" and 20'-3"

IC72-PANEL C-CLOSURE

15/8"

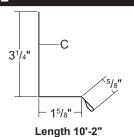
IC72-PANEL FLASHING PROFILES (CONT.) / ACCESSORY PROFILES

HEAD/JAMB COVER

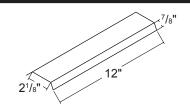


Lengths 10'-2" and 14'-2"

BASE



IC72-PANEL GUTTER HANGER

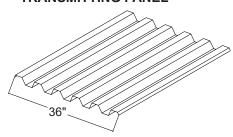


Length 1'-0"

IC72-PANEL Accessory profiles

IC72-PANEL LIGHT

TRANSMITTING PANEL

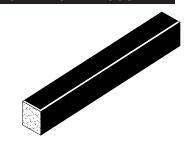


IC72-PANEL CLOSURES



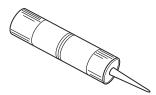
Inside and Outside Polyethylene Foam

UNIVERSAL CLOSURE



1" x 1¹/₂" x 50' Polyethylene Foam 1" x 1¹/₂" x 10' Polyethylene Foam

TUBE SEALANT



10.3 oz. Cartridge Urethane

TAPE SEALANT



3/8" X 3/32" X 50' Single Bead Tape Sealant Butyl - Gray

RUBBER ROOF JACK



Mini ('/4" to 11/8" O.D. Pipe) #2 (13/4" to 3" O.D. Pipe) #4 (3" to 6" O.D. Pipe) #6 (6" to 9" O.D. Pipe) #8 (7" to 13" O.D. Pipe)

RETRO ROOF JACK



#801 RETRO (3/4" to 23/4" O.D. Pipe) #802 RETRO (2" to 71/4" O.D. Pipe) #803 RETRO (31/4" to 10" O.D. Pipe)

RUBBER ROOF

FLASH KIT



12" x 50'-0" Flash Kit 18" x 50'-0" Flash Kit

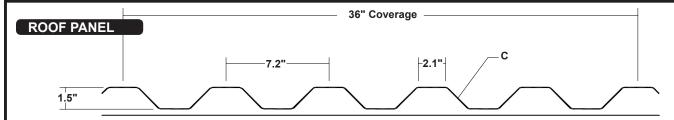
TOUCH-UP PAINT



Available in 2 oz Bottles PVDF / MS Colorfast45®

C- Indicates color side of flashing.

IC72-PANEL Section Properties and General Information



SECTION PROPERTIES						ALLOWABLE UNIFORM LOADS psf (3 or More Equal Spans)													
	\A/: al4la	Viald	NA/a i aub 4	Top In Compression Bottom In Compression			Inward Load				Outward Load								
Ga	Width	Yield ksi	Weight psf	lxx	Sxx	lxx	Sxx	iliwald Load Od				itwai	valu Loau						
		I NOI	Poi	in⁴/ft	in³/ft	in⁴/ft	in³/ft	5'	6'	7'	8'	9'	10'	5'	6'	7'	8'	9'	10'
26	36	50	0.88	0.0706	0.0817	0.0653	0.0663	58	41	31	24	19	15	70	50	37	29	22	16
24	36	50	1.15	0.1000	0.1208	0.0987	0.1076	97	68	50	39	29	21	108	76	56	42	29	21
22	36	50	1.51	0.1408	0.1757	0.1391	0.1557	142	100	73	54	38	28	160	112	82	55	38	28

- 1. Theoretical section properties have been calculated per AISI 2012 "Specifications for the Design of Cold-formed Steel Structural Members." Ixx and Sxx are effective section properties for deflection and bending.
- 2. Allowable load is calculated in accordance with AISI 2012 specifications considering bending, shear, combined bending and shear and deflection. Allowable load considers the 3 or more equal span condition. Allowable load does not address web crippling, fasteners/support connection or load testing. Panel weight is not considered.
- 3. Deflection consideration is limited by a maximum deflection ratio of L/180 of span.
- 4. Allowable loads do not include a 1/3 stress increase in uplift.

ATTACHMENT DETAIL

1/4"-14 x 7/8" Stitch Screw

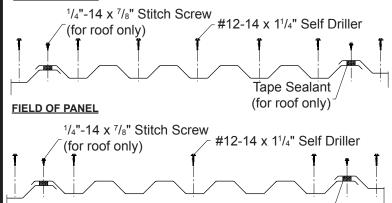
(for roof only)

#12-14 x 11/4" Self Driller

Tape Sealant
(for roof only)

FASTENING PATTERNS

ENDS OF PANEL



Tape Sealant (for roof only)

GENERAL INFORMATION

▶ Slope

The minimum recommended slope for IC72-Panel is 1:12. Metal Sales recommends that in all roof applications sealants be used on all sidelaps with stitch screw 1'-0" on center.

▶ Substructure

IC72-Panel is designed to be utilized over open structural framing or a solid substrate. To avoid panel distortion use a properly aligned and uniform substructure.

▶ Coverage

IC72-Panel is available in a $1^{1}/_{2}$ " rib height with a 36" width coverage.

► Length

Minimum factory cut length is 5'-0". Maximum recommended panel length is 45'-0". Longer panels require additional consideration in packaging, shipping, and erection. Please consult Metal Sales for recommendations.

▶ Fasteners

The fastener selection guide should be consulted for choosing the proper fastener for specific applications. Quantity and type of fastener must meet necessary loading and code requirements.

NOTE: All panels are subject to surface distortion due to improperly applied fasteners. Overdriven fasteners will cause stress and induce oil canning across the face of the panel at or near the point of attachment.

Availability

Finishes: Acrylic-Coated Galvalume® and PVDF Gauges: 26 ga, 24 ga and 22 ga

FASTENER INSTALLATION TECHNIQUE

Recommended Tool Type - Use depth locating nose or adjustable clutch on screw gun to prevent overdrilling and strip out. **Do not use impact tools or runners.**

Seating the washer - Apply sufficient torque to seat the washer - do not overdrive the fastener.

	CORRECT Sealing material slightly visible at edge of metal washer. Assembly is watertight.	TOO LOOSE Sealing material is not visible; not enough compression to seal properly.	TOO TIGHT Metal washer deformed; sealing material pressed beyond washer edge.
SELF DRILLER			
WOODSCREW			

To prevent wobbling - Make sure fastener head is completely engaged in the socket. If the head does not go all the way in the socket - tap the magnet deeper into the socket to allow full head engagement. Metal chips will build up from drilling and should be removed from time to time.

Protect drill point - Push only hard enough on the screw gun to engage clutch. This prevents excess friction and burn out of the drill point. Correct pressure will allow screw to drill and tap without binding.

Drilling through sheet and insulation - Ease up on pressure when drilling through insulation to avoid striking the purlin or girt with the point - apply more pressure after drill point contacts purlin or girt.

Drilling through purlin overlaps - Drilling through lapped purlins requires extra care. Excessive voids between purlins sometimes damages drill points and two self-drillers might be necessary to complete the operation. It is sometimes advantageous to predrill.

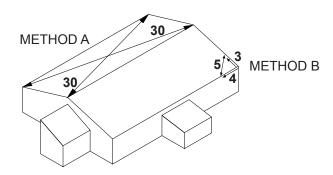
CONDITION OF SUBSTRUCTURE

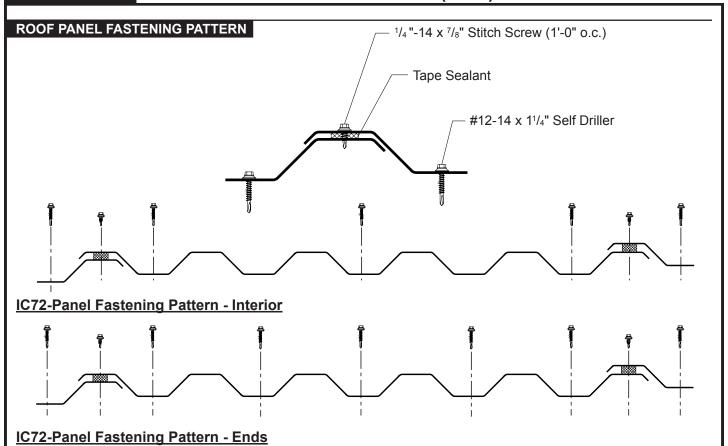
Whether over solid substrate or open structural framing, panel distortion may occur if not applied over properly aligned and uniform substructure.

The installer should check the roof deck for squareness before installing IC72-Panels. Several methods can be used to verify squareness of the structure for proper installation of the panels.

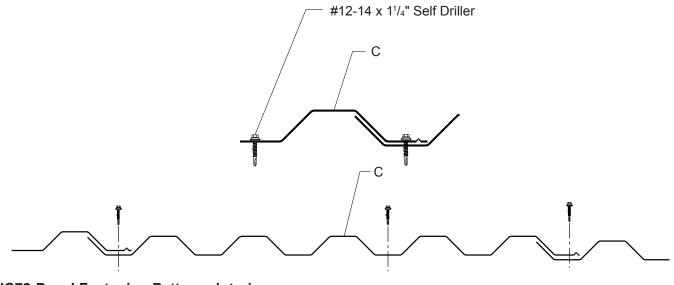
METHOD "A" - One method for checking the roof for squareness is to measure diagonally across one slope of the roof from similar points at the ridge and eave and obtain the same dimension.

METHOD "B" - The 3-4-5 triangle system may also be used. To use this system measure a point from the corner along the edge of the roof at a module of three (3). Measure a point from the same corner along another edge at a module of four (4). Then by measuring diagonally between the two points established, the dimension should be exactly a module of five (5) to have a square corner. Multiple uses of this system may be required to determine building squareness. If the endwall cannot be made square, the roof system cannot be installed as shown in these instructions.

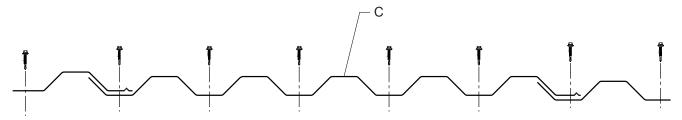




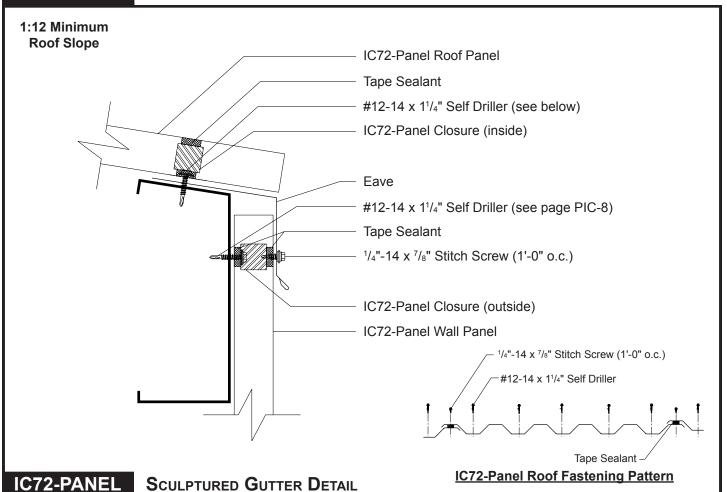
WALL PANEL FASTENING PATTERN



IC72-Panel Fastening Pattern - Interior

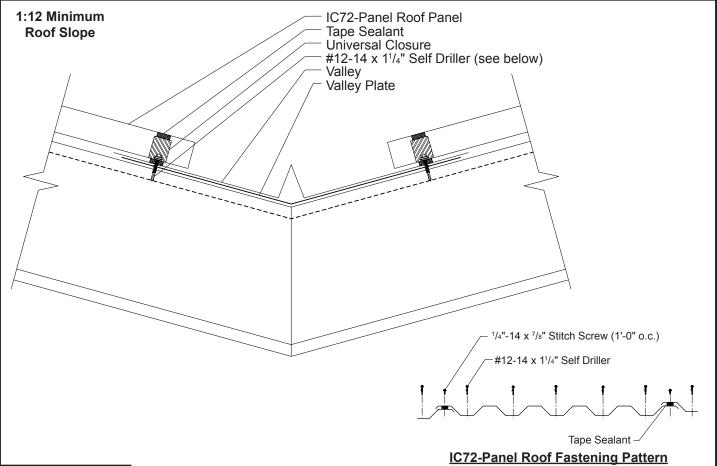


IC72-Panel Fastening Pattern - Ends

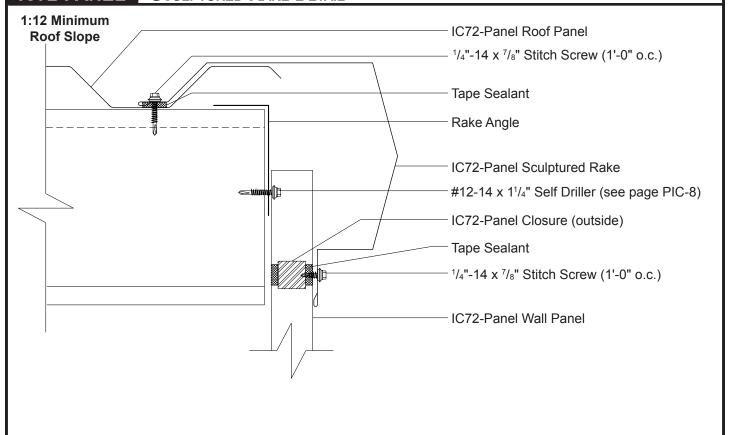


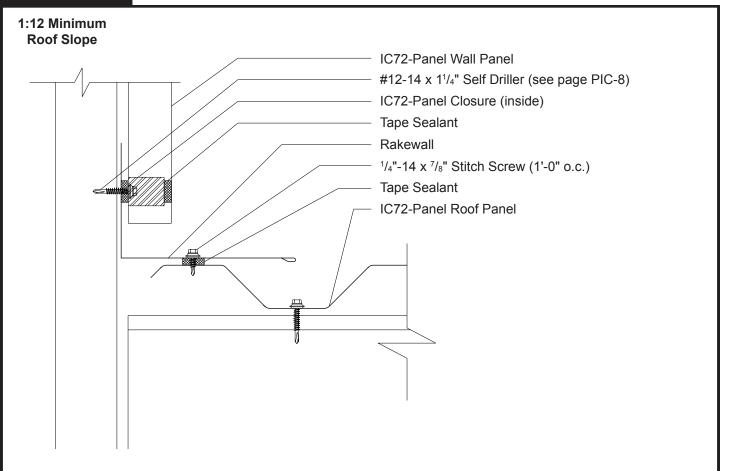
IC72-Panel Roof Panel 1:12 Minimum **Roof Slope** Tape Sealant #12-14 x $1^{1}/_{4}$ " Self Driller (see below) IC72-Panel Closure (inside) ¹/₄"-14 x ⁷/₈" Stitch Screw (1 per Gutter Hanger) ¹/₄"-14 x ⁷/₈" Stitch Screw (1'-0" o.c.) IC72-Panel Sculptured Gutter IC72-Panel Gutter Hanger Tape Sealant IC72-Panel Closure (inside) #12-14 x 1¹/₄" Self Driller (see page PIC-8) IC72-Panel Wall Panel 1/4"-14 x 7/8" Stitch Screw (1'-0" o.c.) #12-14 x 11/4" Self Driller Tape Sealant IC72-Panel Roof Fastening Pattern

IC72-PANEL VALLEY DETAIL



IC72-PANEL SCULPTURED RAKE DETAIL



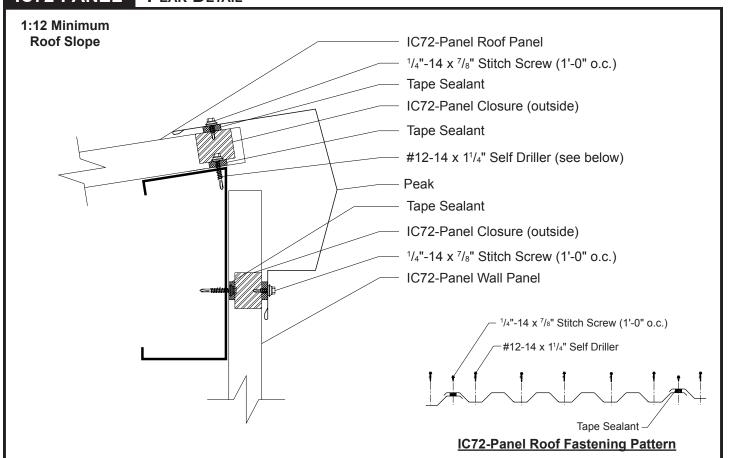


1:12 Minimum **Roof Slope** IC72-Panel Wall Panel #12-14 x 11/4" Self Driller (see page PIC-8) IC72-Panel Closure (inside) Tape Sealant Pitch Break ¹/₄"-14 x ⁷/₈" Stitch Screw (1'-0" o.c.) Tape Sealant IC72-Panel Closure (outside) #12-14 x 11/4" Self Driller (see below) IC72-Panel Roof Panel 1/4"-14 x 7/8" Stitch Screw (1'-0" o.c.) #12-14 x 11/4" Self Driller Tape Sealant **IC72-Panel Roof Fastening Pattern**

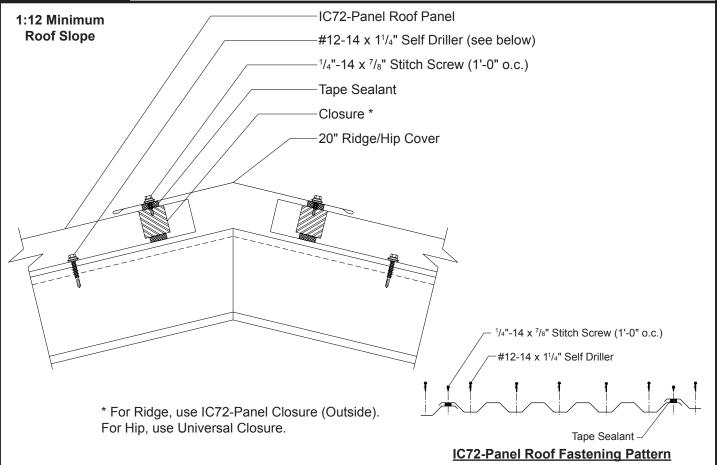
IC72-PANEL

ENDWALL DETAIL

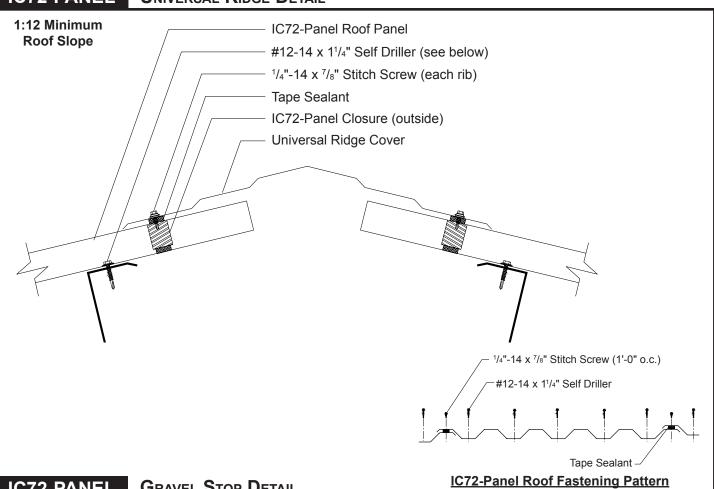
IC72-PANEL PEAK DETAIL



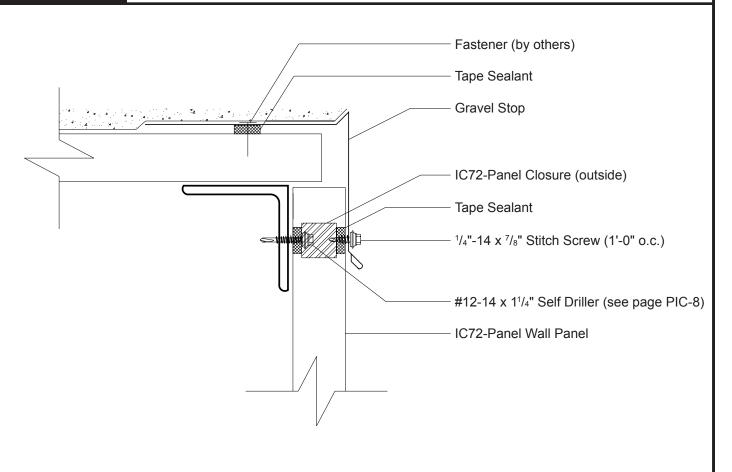
IC72-PANEL RIDGE/HIP DETAIL

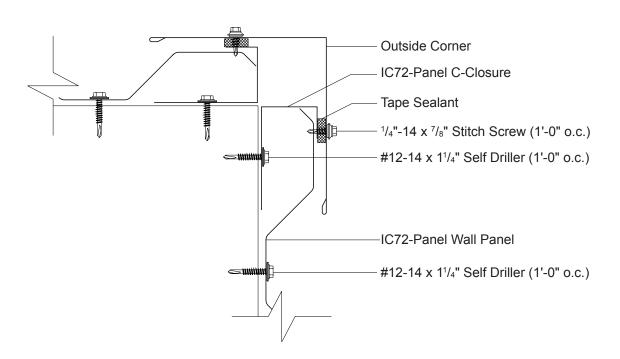


IC72-PANEL UNIVERSAL RIDGE DETAIL

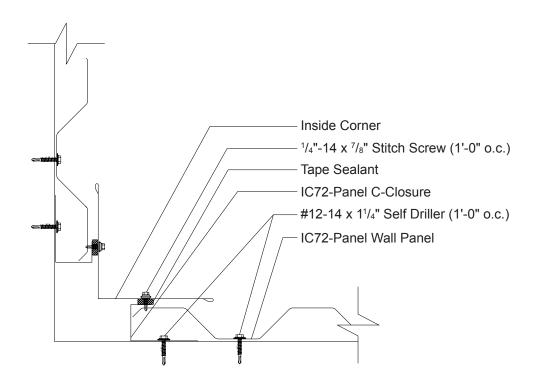


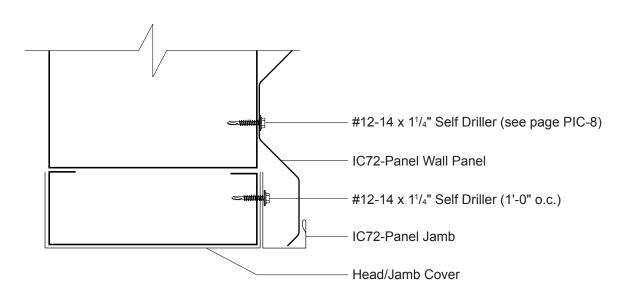
GRAVEL STOP DETAIL IC72-PANEL



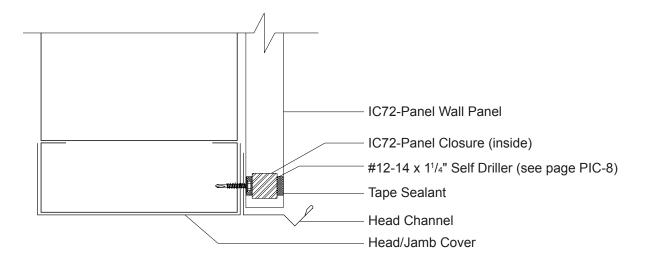


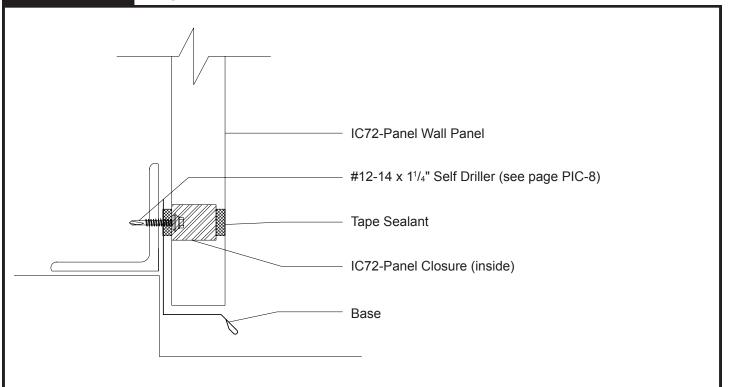
INSIDE CORNER DETAIL





IC72-PANEL HEAD DETAIL





IC72-PANEL	Notes