

MIRAGE II

INSTALLATION

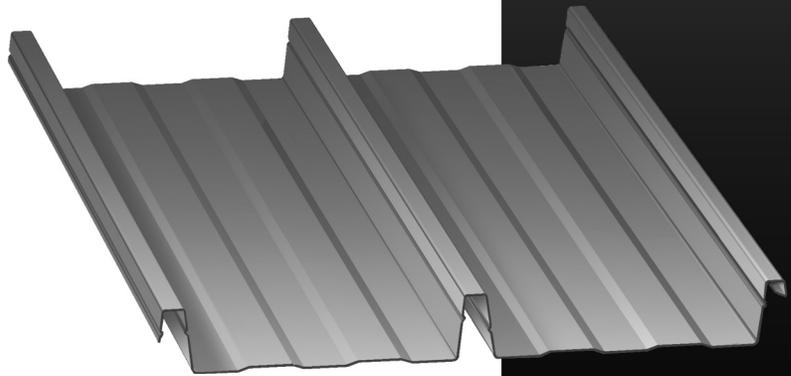


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GENERAL NOTES

The details shown on the following pages are suggestions or guidelines for installing the Mirage II roof panel system. The installation details shown here are proven methods of construction, but they are not intended to cover all building requirements, designs or codes. The details may require changes or revisions due to individual project conditions.

Installation procedures shall be in accordance with the manufacturer's printed instructions, details or approved shop drawings. Installers should thoroughly familiarize themselves with all instructions prior to beginning the installation process.

The designer/installer is responsible to ensure the following:

That the details here meet the particular building requirements.

Awareness of and allowance for expansion/contraction of the roof panels.

That adequate water tightness is maintained.

That a proper uniform substructure is used to avoid panel distortion and that the substructure meets necessary code requirements.

That all supporting members have been examined and are straight, level and plumb.

McElroy Metal can provide all flashings and accessories shown in the installation drawings unless noted otherwise. Panels, flashing and trim shall be installed true and in proper alignment with any exposed fasteners equally spaced for the best appearance. Sealant shall be field applied on a clean, dry surface.

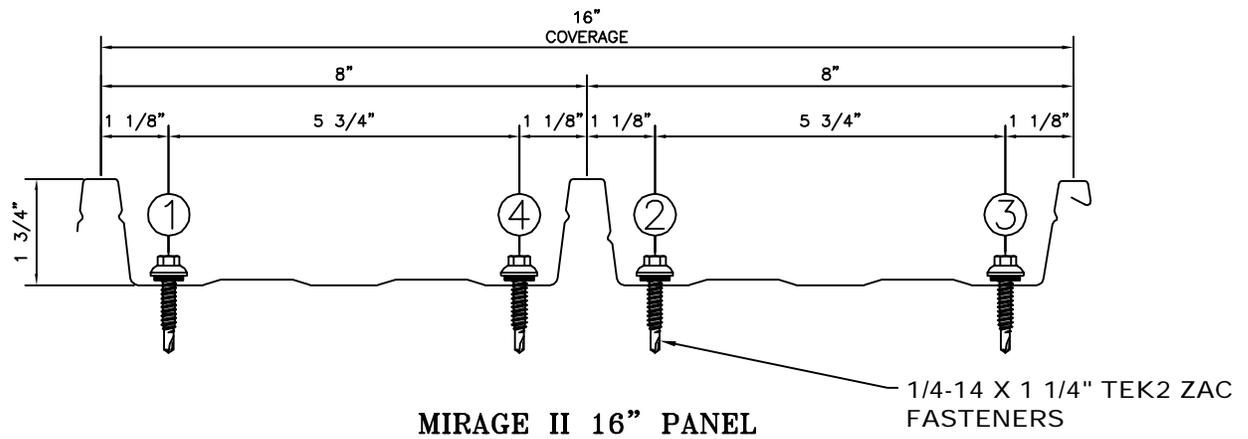
Some field cutting and fitting of panels and flashings is to be expected and to be considered a part of normal installation work. Workmanship shall be of the best industry standards and with installation performed by experienced metal craftsmen.

Oil canning of metal panels is in the product and is not a cause for rejection. Striated panels are recommended as they reduce the appearance of oil canning.

Contents of this manual are subject to change without notice. To confirm this book is the most current copy, please visit McElroy Metal's website at www.mcelroymetal.com.

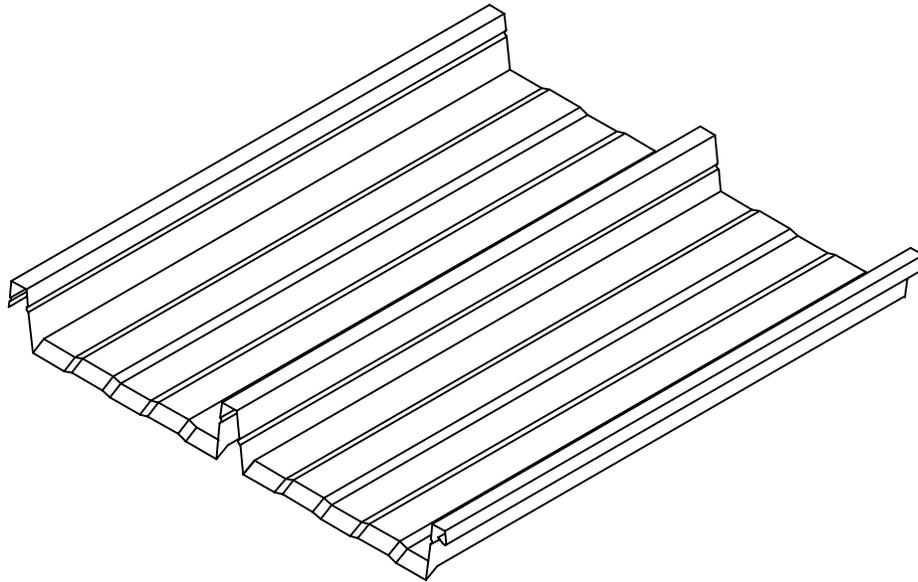
GENERAL INFORMATION

FASTENER PATTERNS

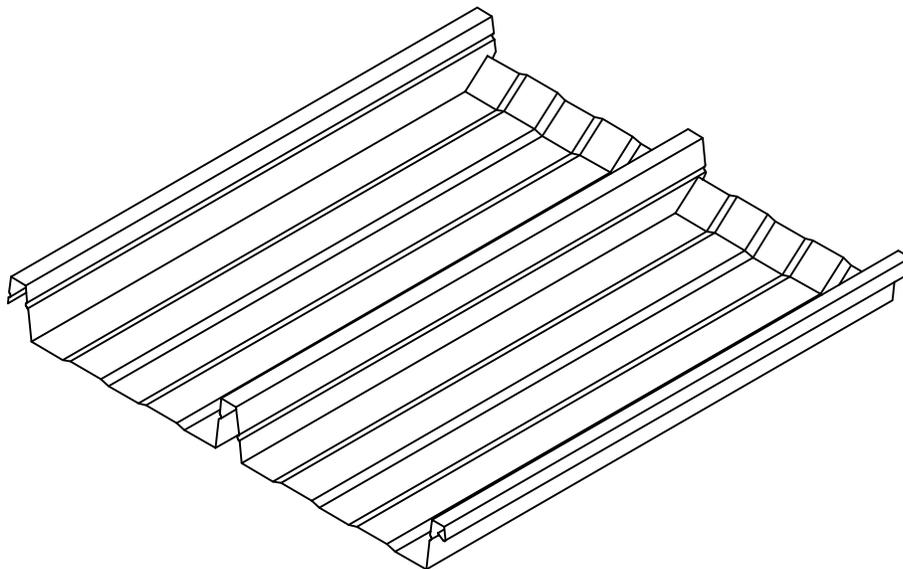


GENERAL INFORMATION

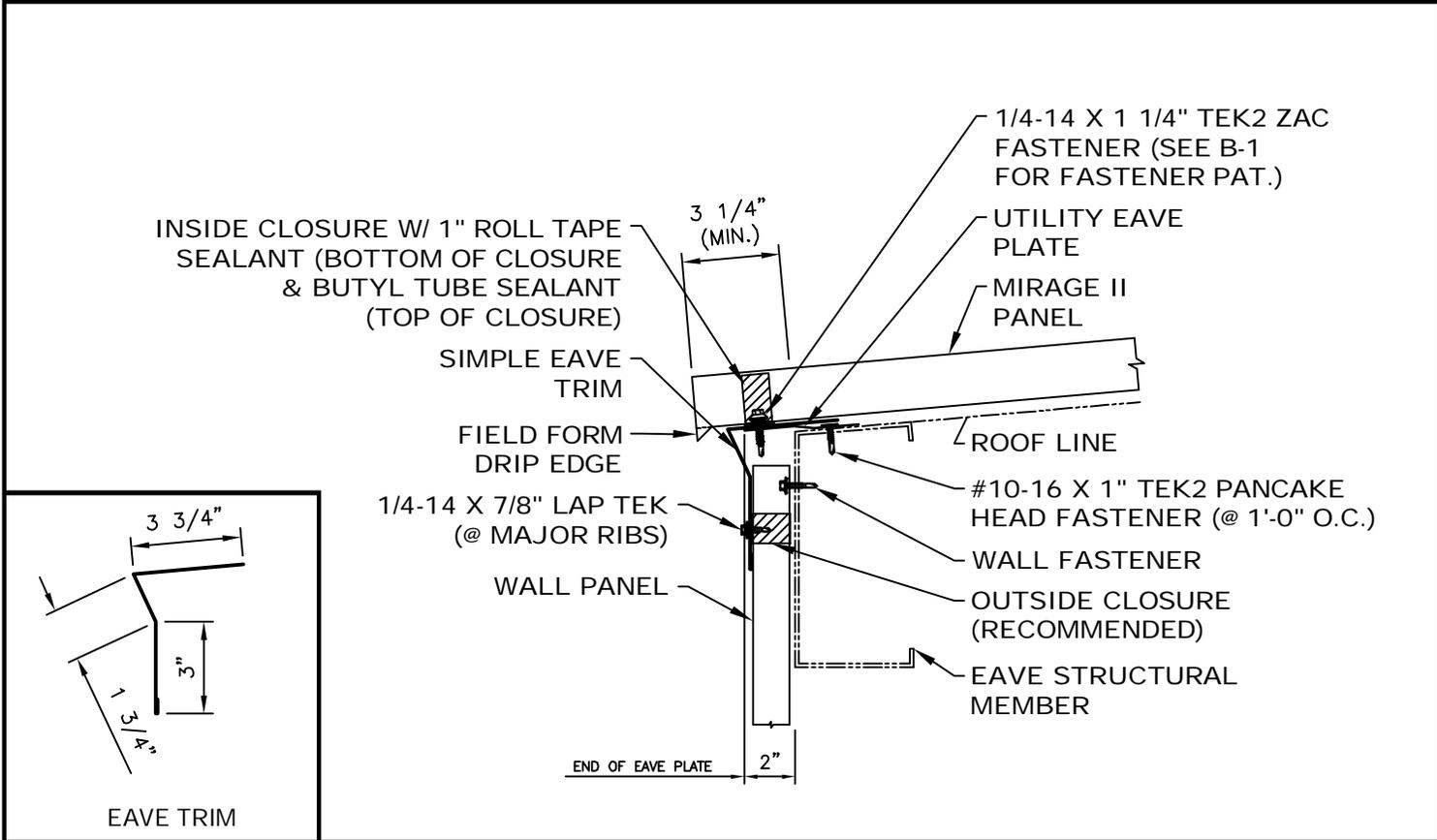
PANEL FOLDING



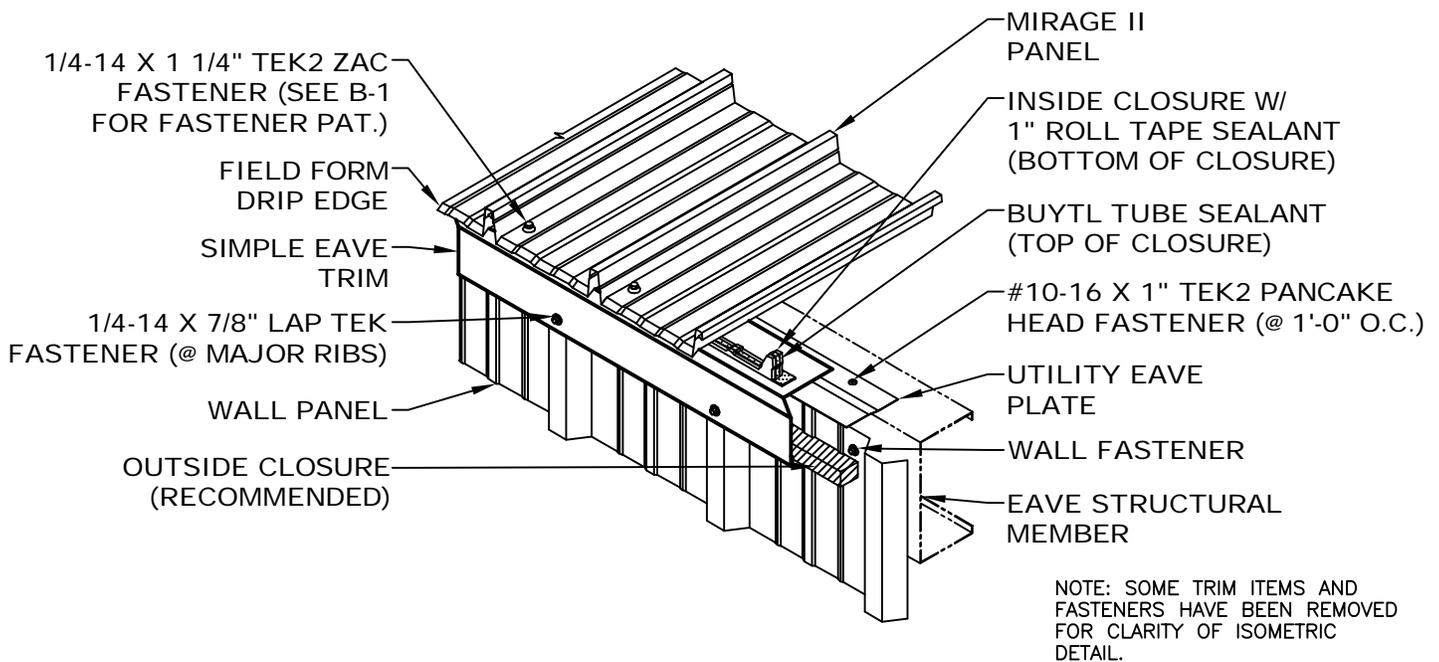
PAN DOWN PANEL
(FORMS DRIP EDGE)
(USED AT SOME EAVE DETAIL LOCATIONS)

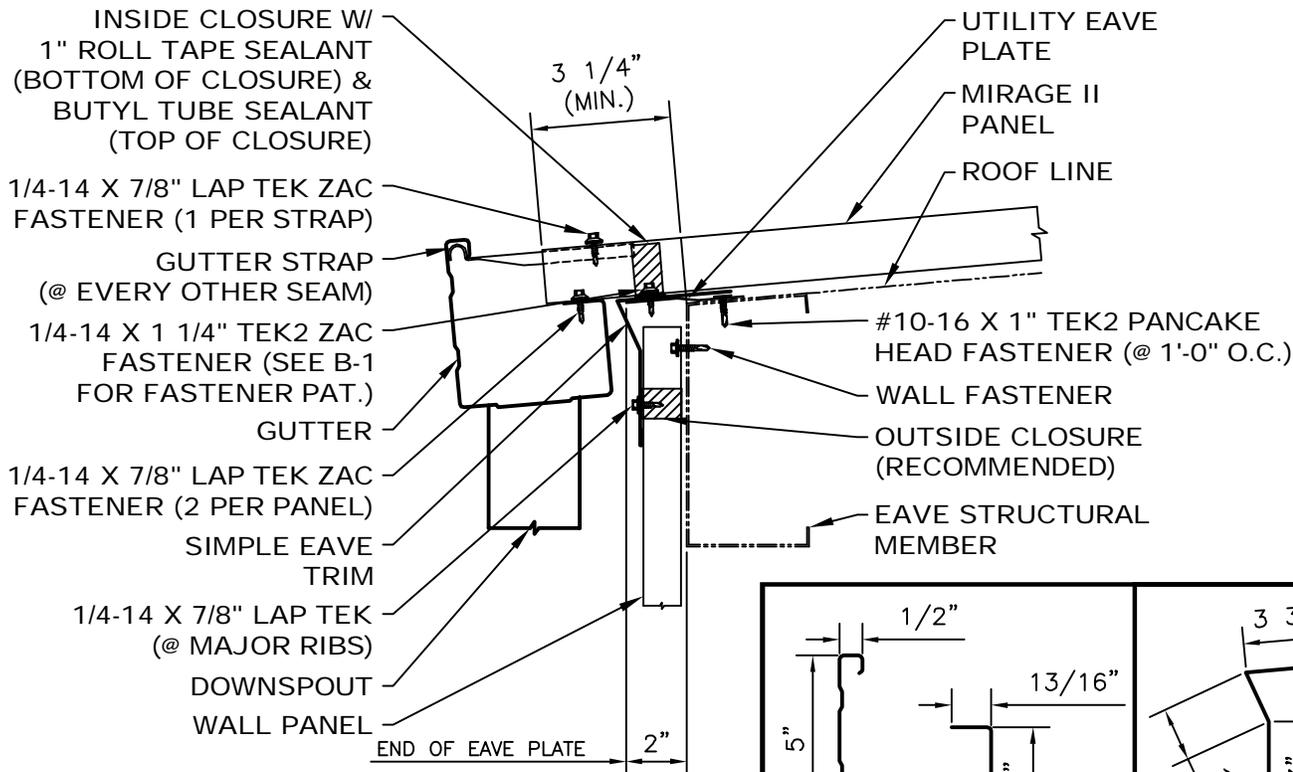


PAN UP PANEL
(FORMS PANEL STOP)
(USED AT HIGH EAVE, HI-SIDE TIE-IN, RIDGE AND HIP LOCATIONS)

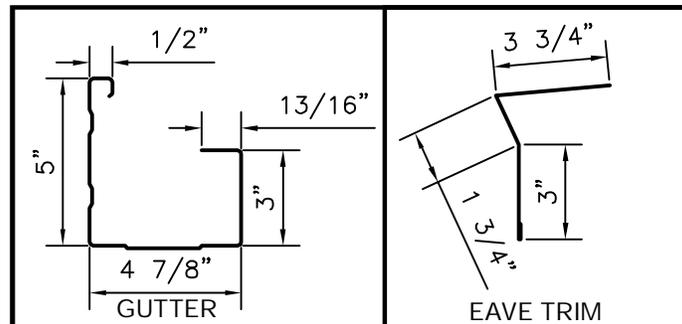


- NOTES: 1. Eave Plate to run from steel line to steel line. Attach to Eave Structural Member with #10-16 x 1" Pancake Head Fasteners at 1'-0" O.C.
2. Simple Eave Trim to run from out of wall to out of wall. Attach to Eave Plate with #10-16 x 1" Pancake Head Fasteners at 5'-0" O.C.
3. Install Inside Closure with continuous run of 1" Roll Tape Sealant on bottom and Butyl Tube Sealant on top.
4. Attach roof panel to Eave Plate with 1/4-14 x 1 1/4" TEK2 ZAC. Fasteners must penetrate sealant.
5. Field form Drip Edge on panel using panel bending tool.

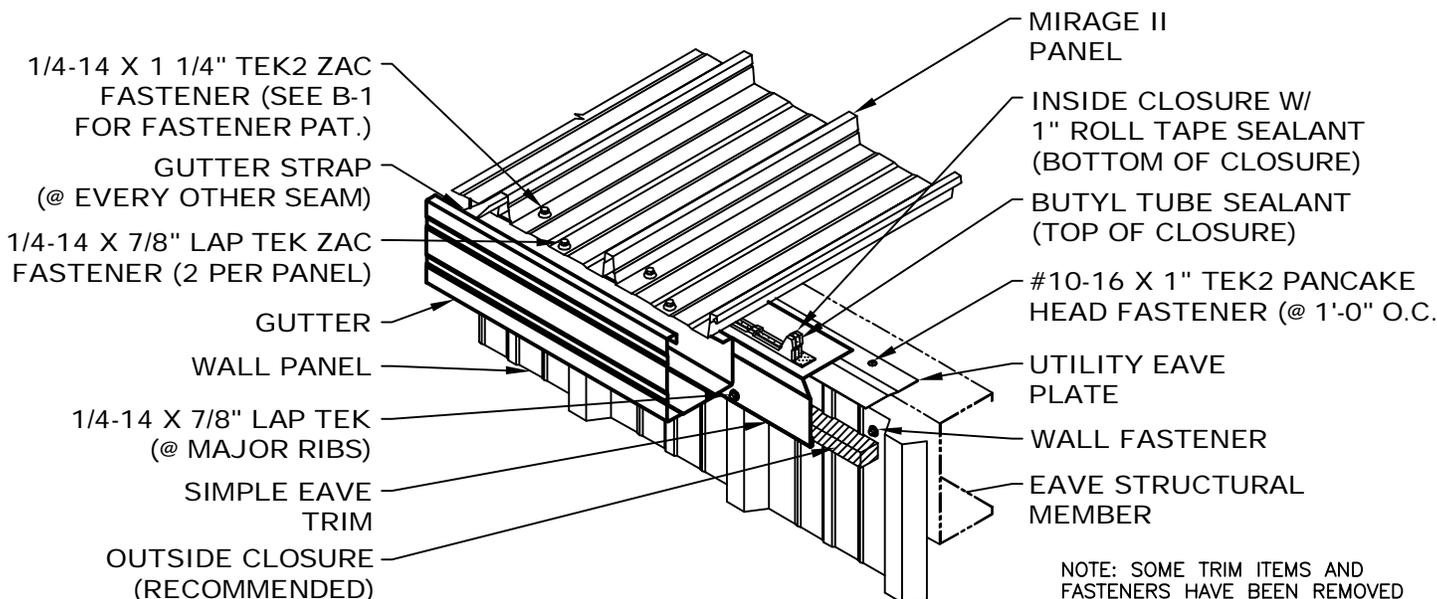




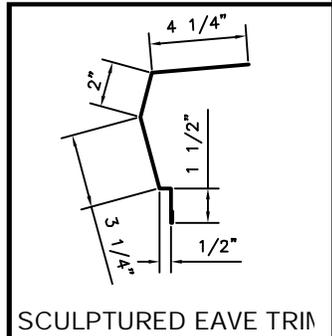
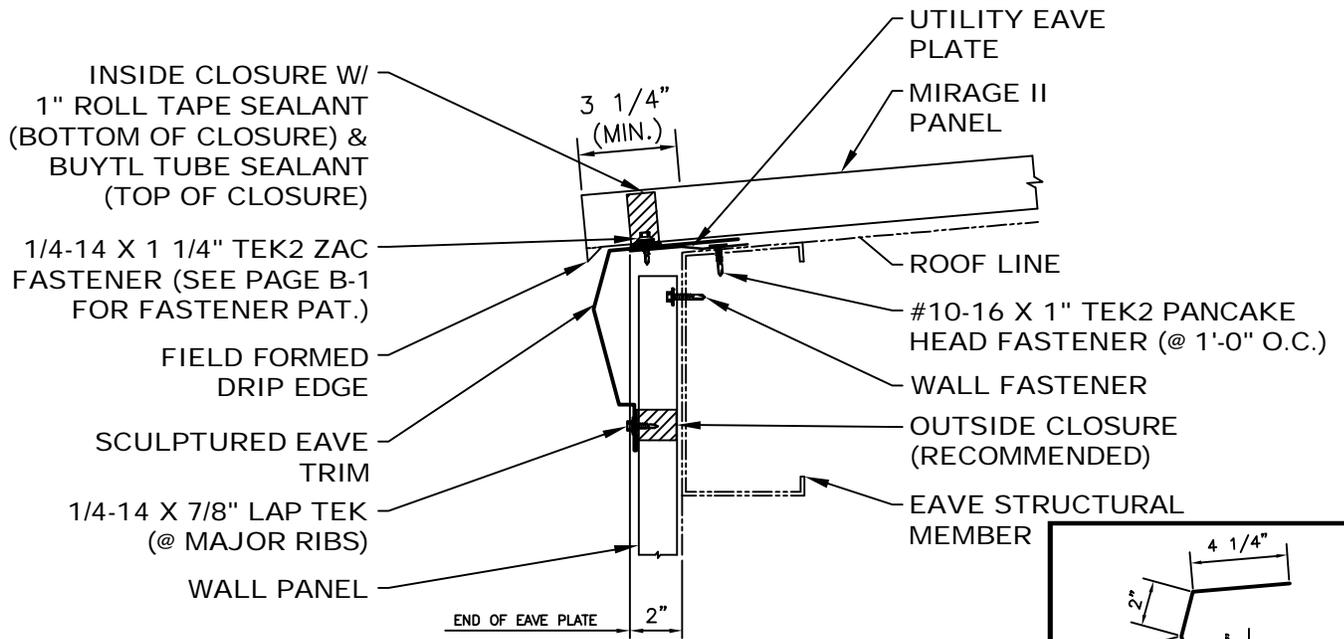
NOTE: SLIDING SNOW AND ICE COULD CAUSE DAMAGE TO GUTTER SYSTEM.



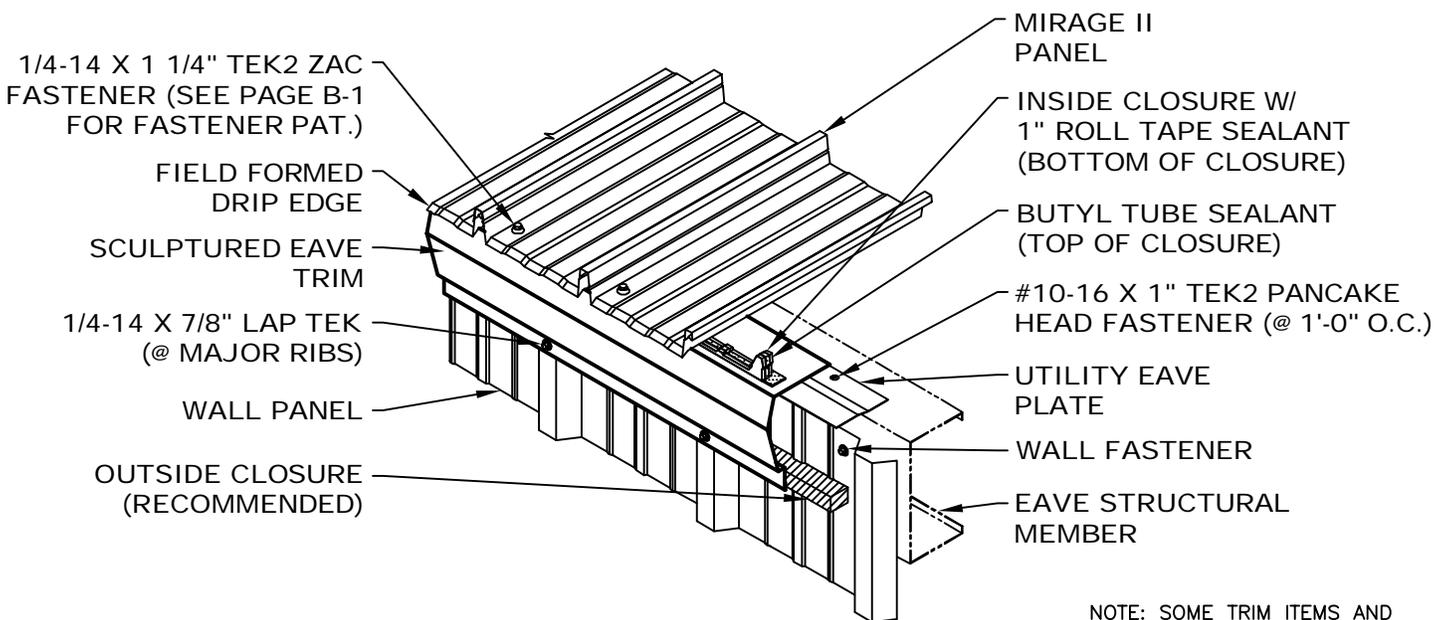
- NOTES:
1. Eave Plate to run from steel line to steel line. Attach to Eave Structural Member with #10-16 x 1" Pancake Head Fasteners at 1'-0" O.C.
 2. Simple Eave Trim to run from out of wall to out of wall. Attach to Eave Plate with #10-16 x 1" Pancake Head Fasteners at 5'-0" O.C.
 3. Install Inside Closure with continuous run of 1" Roll Tape Sealant on bottom and Butyl Tube Sealant on top.
 4. Attach roof panel to Eave Plate with 1/4-14 x 1 1/4" TEK2 ZAC. Fasteners must penetrate sealant.
 5. Gutter straps are to be placed between the two roof sheets and in line from end to end as show.
 6. The gutter is not required to be fastened to the gutter straps on pitches less than 2:12.



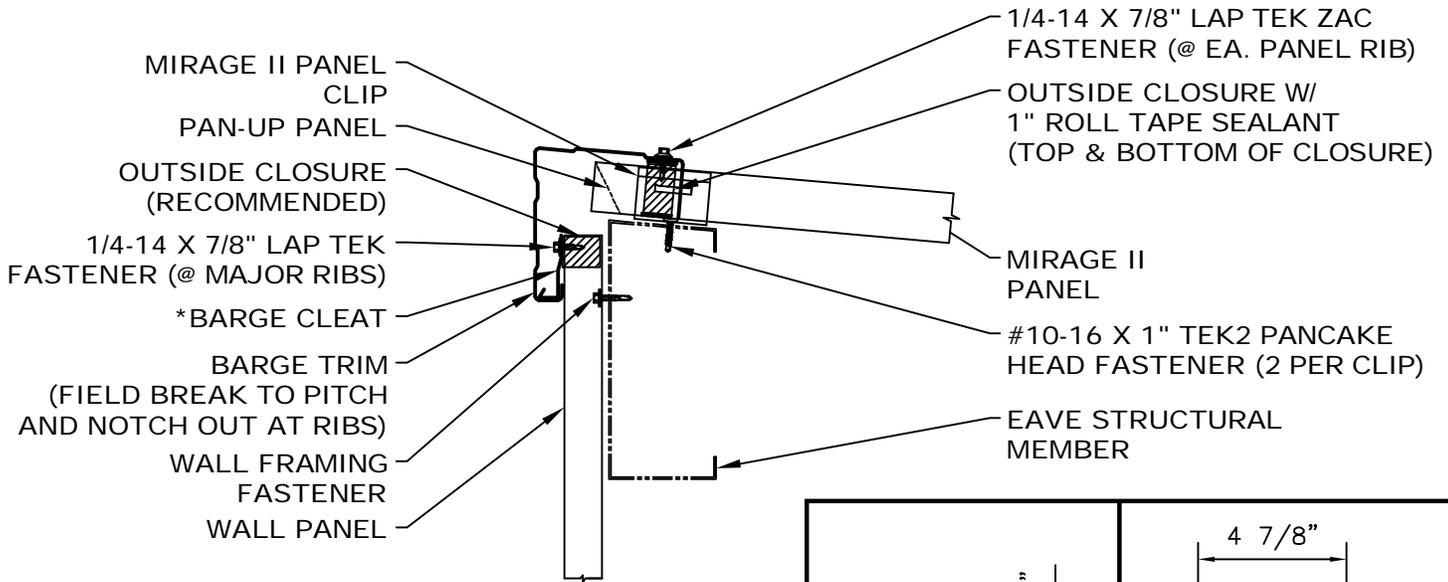
NOTE: SOME TRIM ITEMS AND FASTENERS HAVE BEEN REMOVED FOR CLARITY OF ISOMETRIC DETAIL.



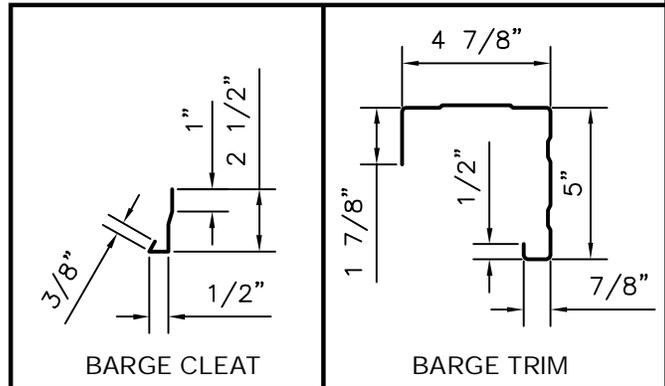
- NOTES: 1. Eave Plate to run from steel line to steel line. Attach to Eave Structural Member with #10-16 x 1" Pancake Head Fasteners at 1'-0" O.C.
2. Sculptured Eave Trim to run from out of wall to out of wall. Attach to Eave Plate with #10-16 x 1" Pancake Head Fasteners at 5'-0" O.C.
3. Install Inside Closure with continuous run of 1" Roll Tape Sealant on bottom and Butyl Tube Sealant on top.
4. Attach roof panel to Eave Plate with 1/4-14 x 1 1/4" TEK2 ZAC. Fasteners must penetrate sealant.
5. Field form Drip Edge on panel using panel bending tool.



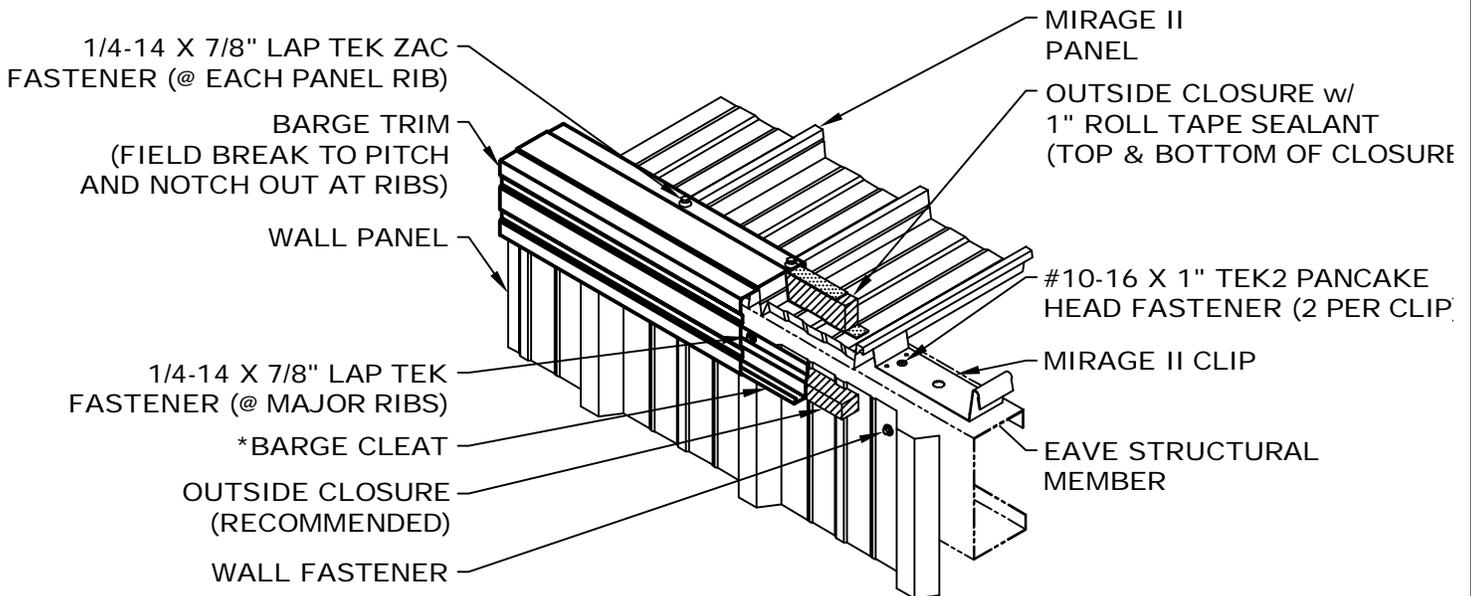
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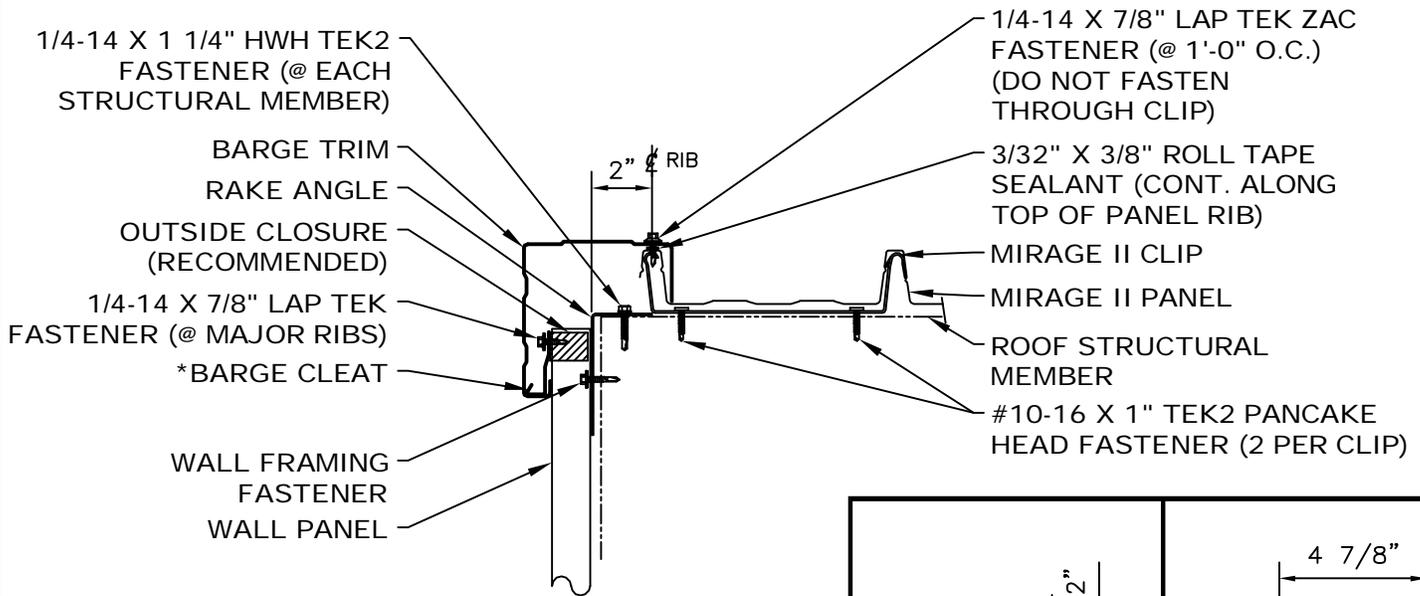
*NOTE: THERE IS NO BARGE CLIP FOR THE 5 1/2" BARGE TRIM. INSTALLER MUST USE BARGE CLEAT AS SHOWN IN DETAIL. WHEN USING 7" BARGE TRIM, INSTALLER MAY USE EITHER BARGE CLEAT OR BARGE CLIP.



- NOTES: 1. Field form End Dam using End Dam tool.
 2. Attach Barge Cleat to wall panels with 1/4-14 x 7/8" Lap Tek fasteners at each major rib.
 3. Notch Barge Trim around ribs of roof panels and attach with 1/4-14 x 7/8" Lap Tek Zac at Major Ribs. Fasteners must penetrate tape sealant.



NOTE: SOME TRIM ITEMS AND FASTENERS HAVE BEEN REMOVED FOR CLARITY OF ISOMETRIC DETAIL.



1/4-14 X 1 1/4" HWH TEK2 FASTENER (@ EACH STRUCTURAL MEMBER)

BARGE TRIM

RAKE ANGLE

OUTSIDE CLOSURE (RECOMMENDED)

1/4-14 X 7/8" LAP TEK FASTENER (@ MAJOR RIBS)

*BARGE CLEAT

WALL FRAMING FASTENER

WALL PANEL

1/4-14 X 7/8" LAP TEK ZAC FASTENER (@ 1'-0" O.C.) (DO NOT FASTEN THROUGH CLIP)

3/32" X 3/8" ROLL TAPE SEALANT (CONT. ALONG TOP OF PANEL RIB)

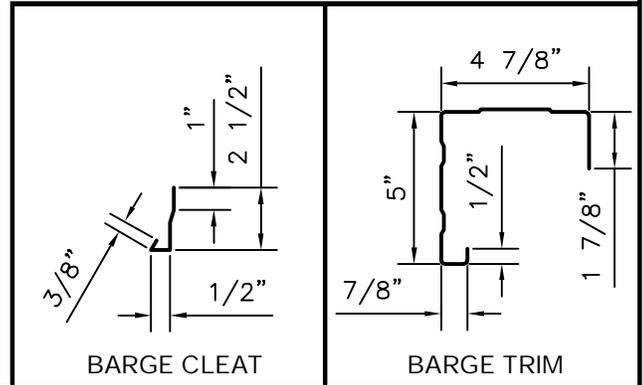
MIRAGE II CLIP

MIRAGE II PANEL

ROOF STRUCTURAL MEMBER

#10-16 X 1" TEK2 PANCAKE HEAD FASTENER (2 PER CLIP)

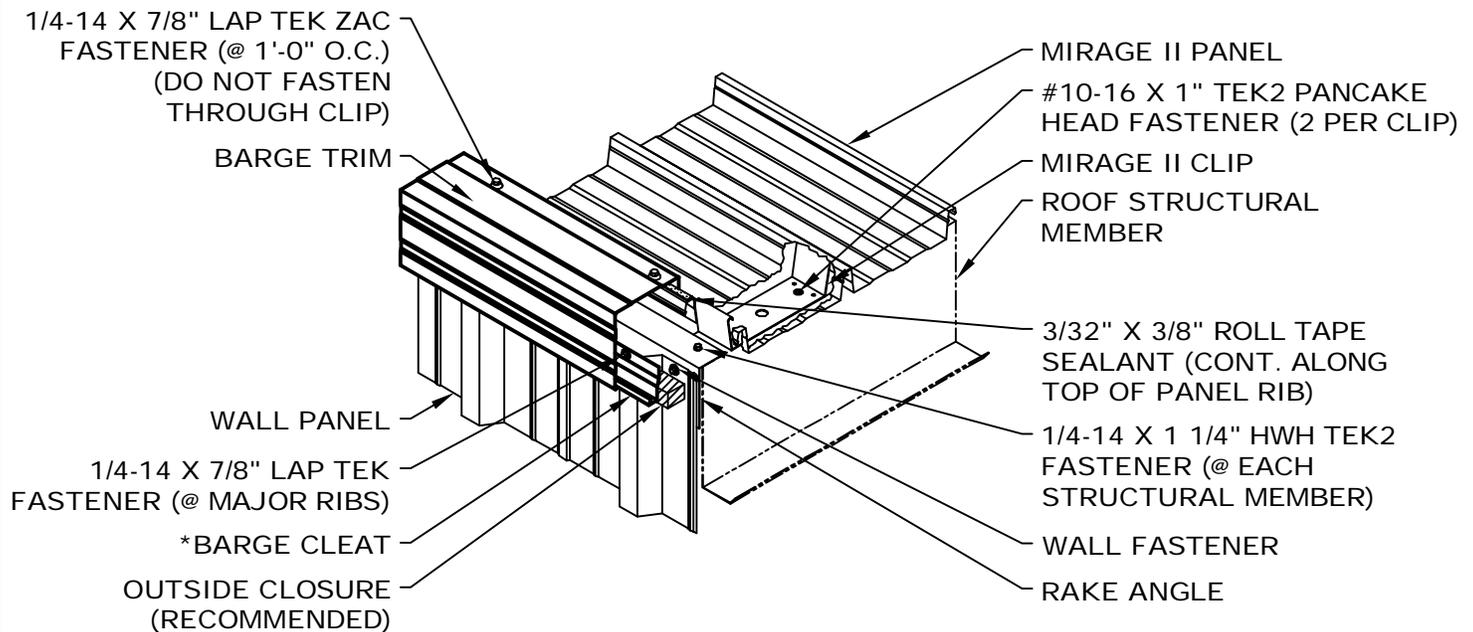
*NOTE: THERE IS NO BARGE CLIP FOR THE 5" BARGE TRIM. INSTALLER MUST USE BARGE CLEAT AS SHOWN IN DETAIL. WHEN USING 7" BARGE TRIM, INSTALLER MAY USE EITHER BARGE CLEAT OR BARGE CLIP.



BARGE CLEAT

BARGE TRIM

- NOTES: 1. Place continuous run of Roll Tape Sealant on top of panel rib.
 2. Install Barge Cleat to wall panel at major ribs with (1) 1/4-14 x 7/8" Lap Tek fastener.
 3. Attach Barge Trim to roof panel at 1'-0" O.C. using 1/4-14 x 7/8" Lap Tek ZAC fasteners.



1/4-14 X 7/8" LAP TEK ZAC FASTENER (@ 1'-0" O.C.) (DO NOT FASTEN THROUGH CLIP)

BARGE TRIM

WALL PANEL

1/4-14 X 7/8" LAP TEK FASTENER (@ MAJOR RIBS)

*BARGE CLEAT

OUTSIDE CLOSURE (RECOMMENDED)

MIRAGE II PANEL

#10-16 X 1" TEK2 PANCAKE HEAD FASTENER (2 PER CLIP)

MIRAGE II CLIP

ROOF STRUCTURAL MEMBER

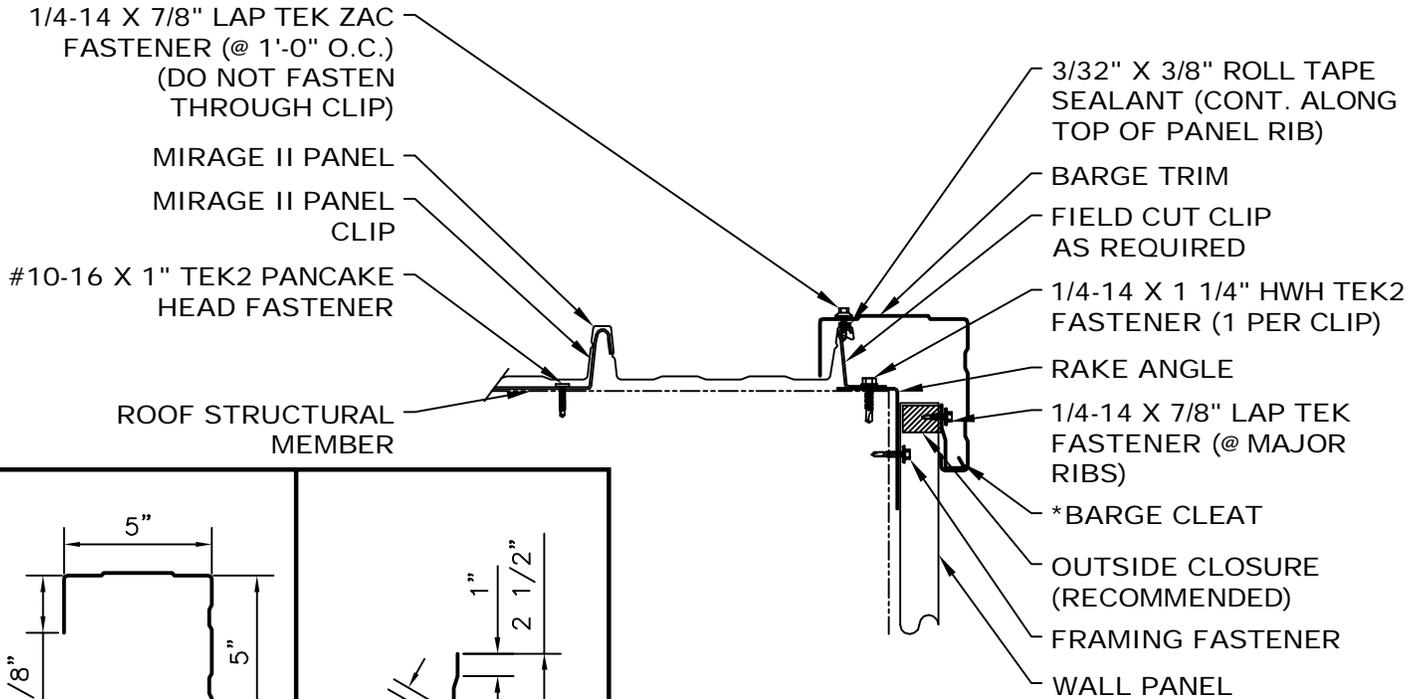
3/32" X 3/8" ROLL TAPE SEALANT (CONT. ALONG TOP OF PANEL RIB)

1/4-14 X 1 1/4" HWH TEK2 FASTENER (@ EACH STRUCTURAL MEMBER)

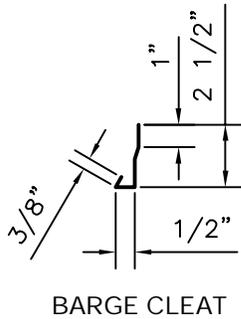
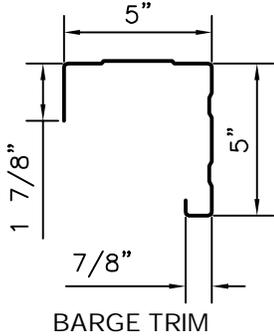
WALL FASTENER

RAKE ANGLE

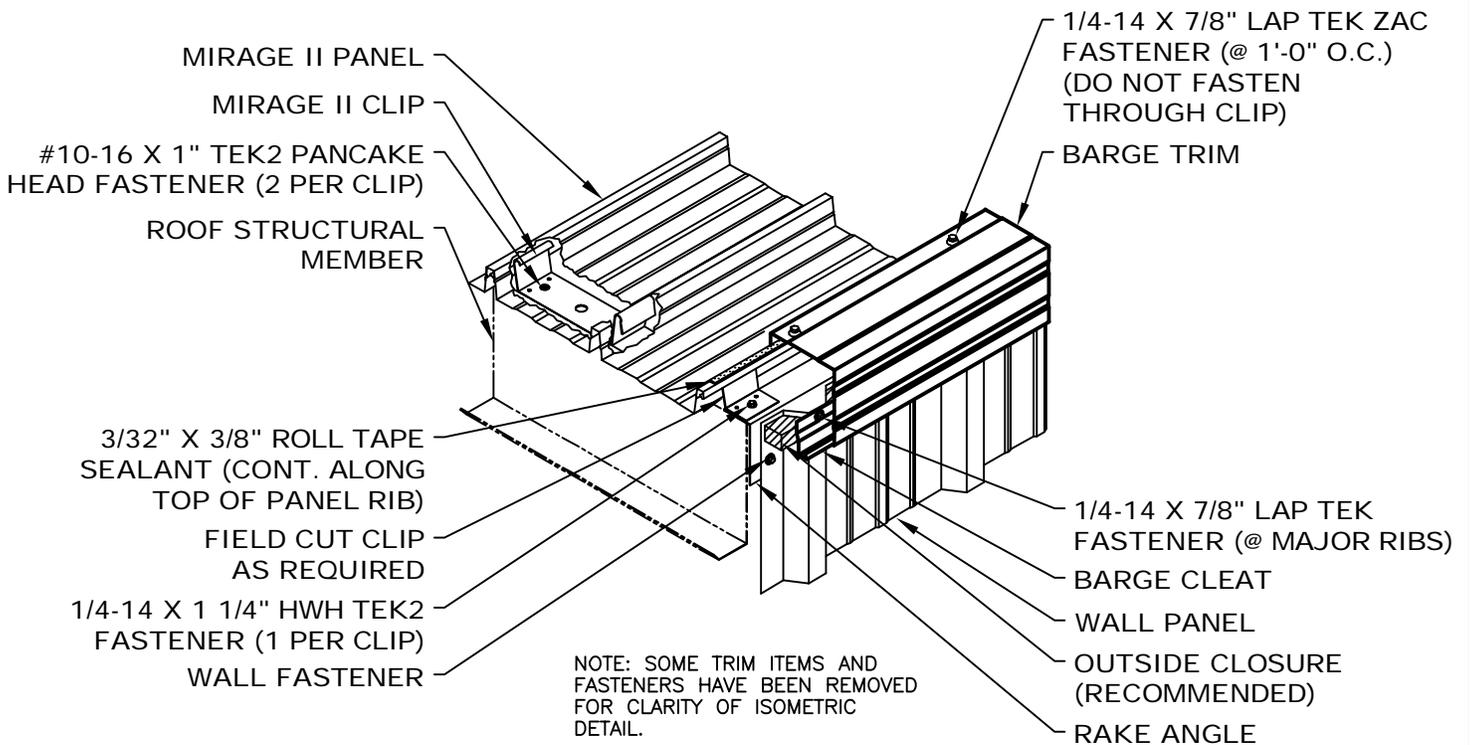
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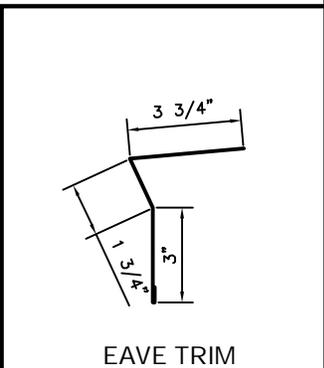
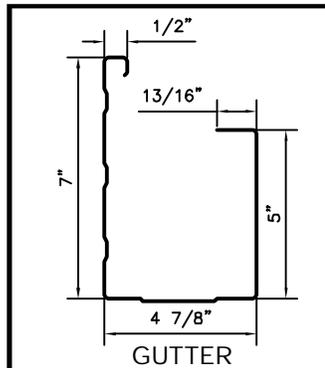
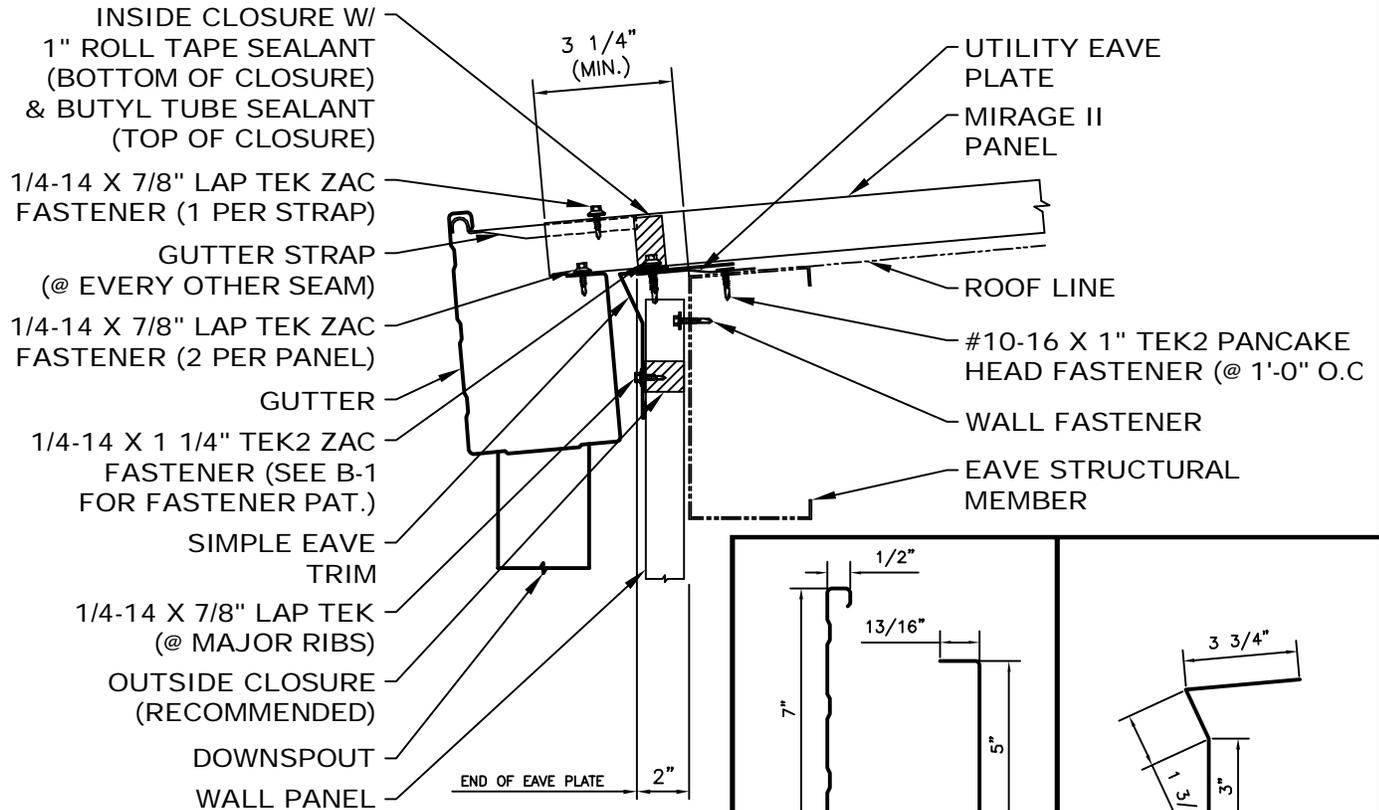
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- NOTES: 1. Place continuous run of Roll Tape Sealant on top of panel rib.
 2. Install Barge Cleat to wall panel at major ribs with (1) 1/4-14 x 7/8" Lap Tek fastener.
 3. Attach Barge Trim to roof panel at 1'-0" O.C. using 1/4-14 x 7/8" Lap Tek fasteners.

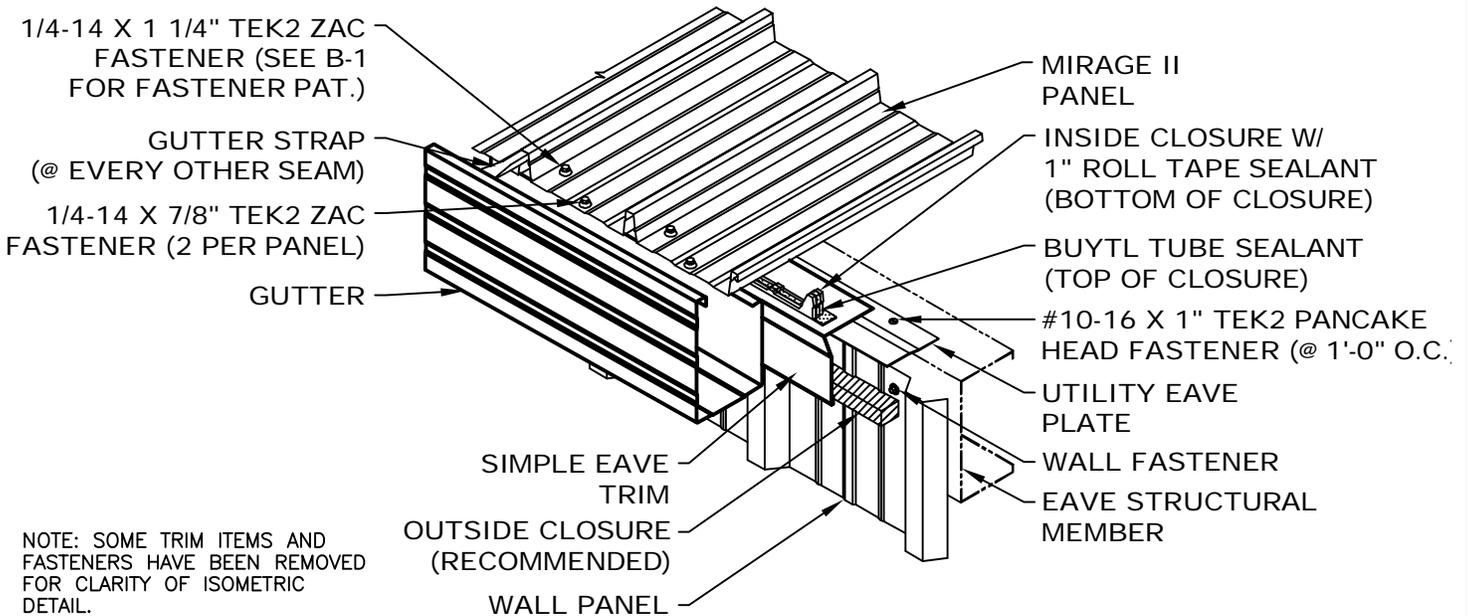


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 2. Simple Eave Trim to run from out of wall to out of wall. Attach to Eave Plate with #10-16 x 1" Pancake Head Fasteners at 5'-0" O.C.
 3. Install Inside Closure with continuous run of 1" Roll Tape Sealant on bottom and Butyl Tube Sealant on top.
 4. Attach roof panel to Eave Plate with 1/4-14 x 1 1/4" TEK2 ZAC. Fasteners must penetrate sealant.
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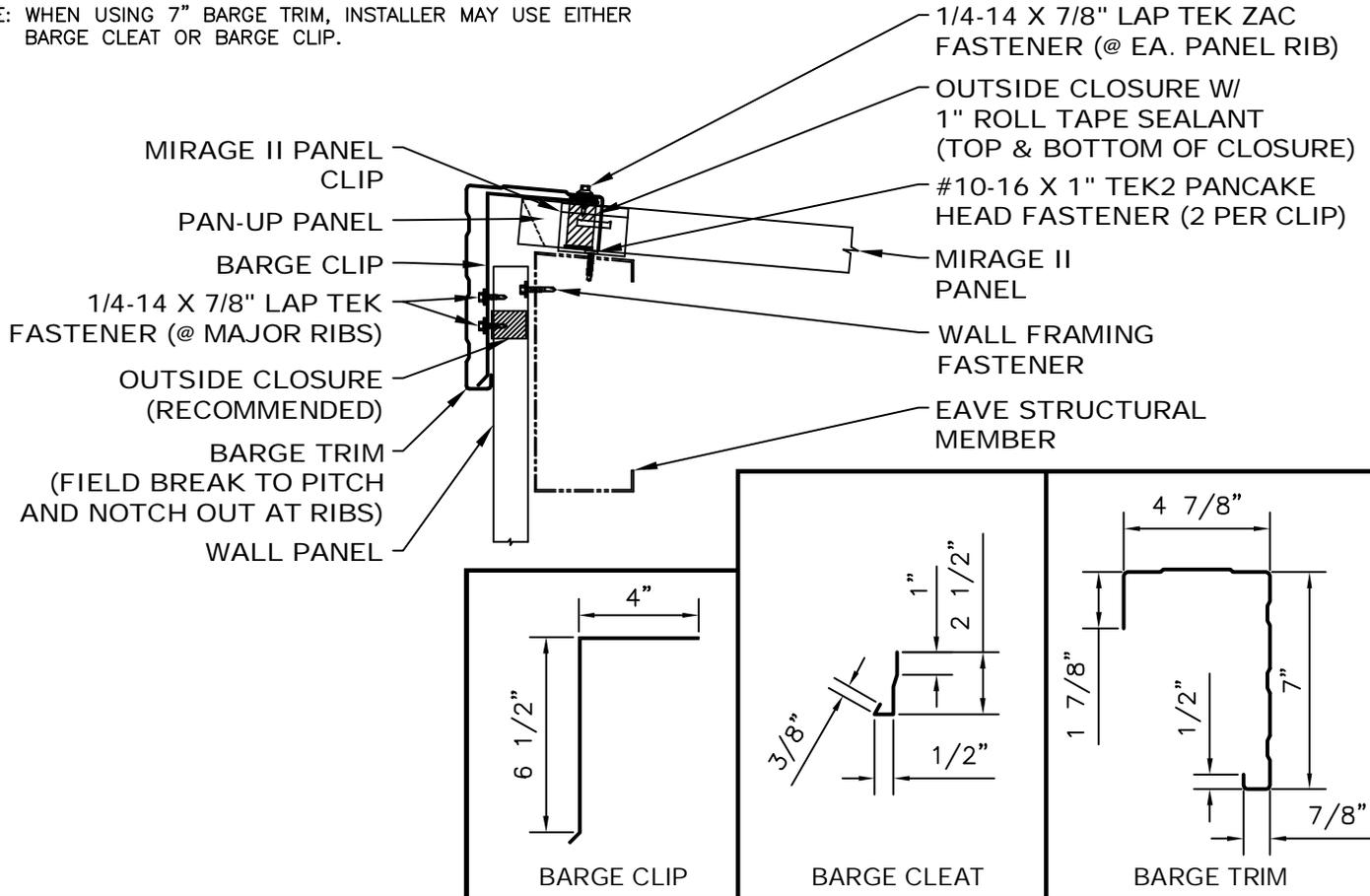


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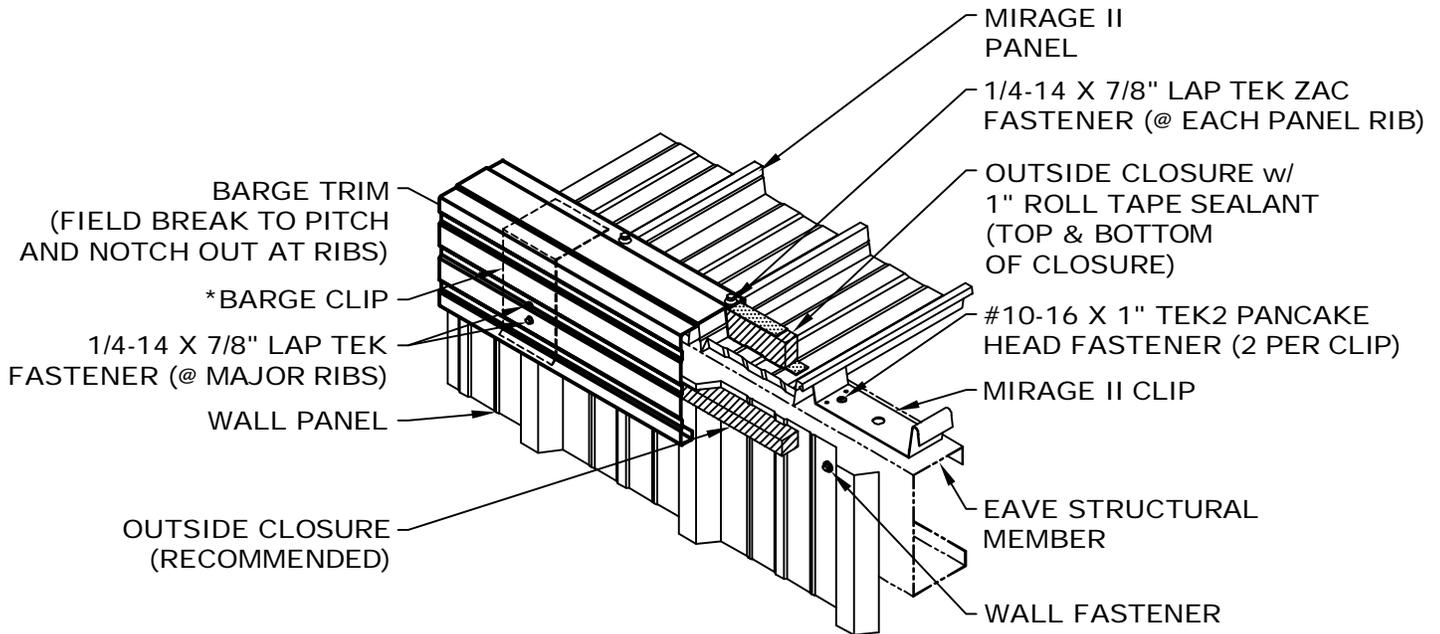
MIRAGE II

HIGH-SIDE EAVE DETAIL - 7" BARGE

NOTE: WHEN USING 7" BARGE TRIM, INSTALLER MAY USE EITHER BARGE CLEAT OR BARGE CLIP.

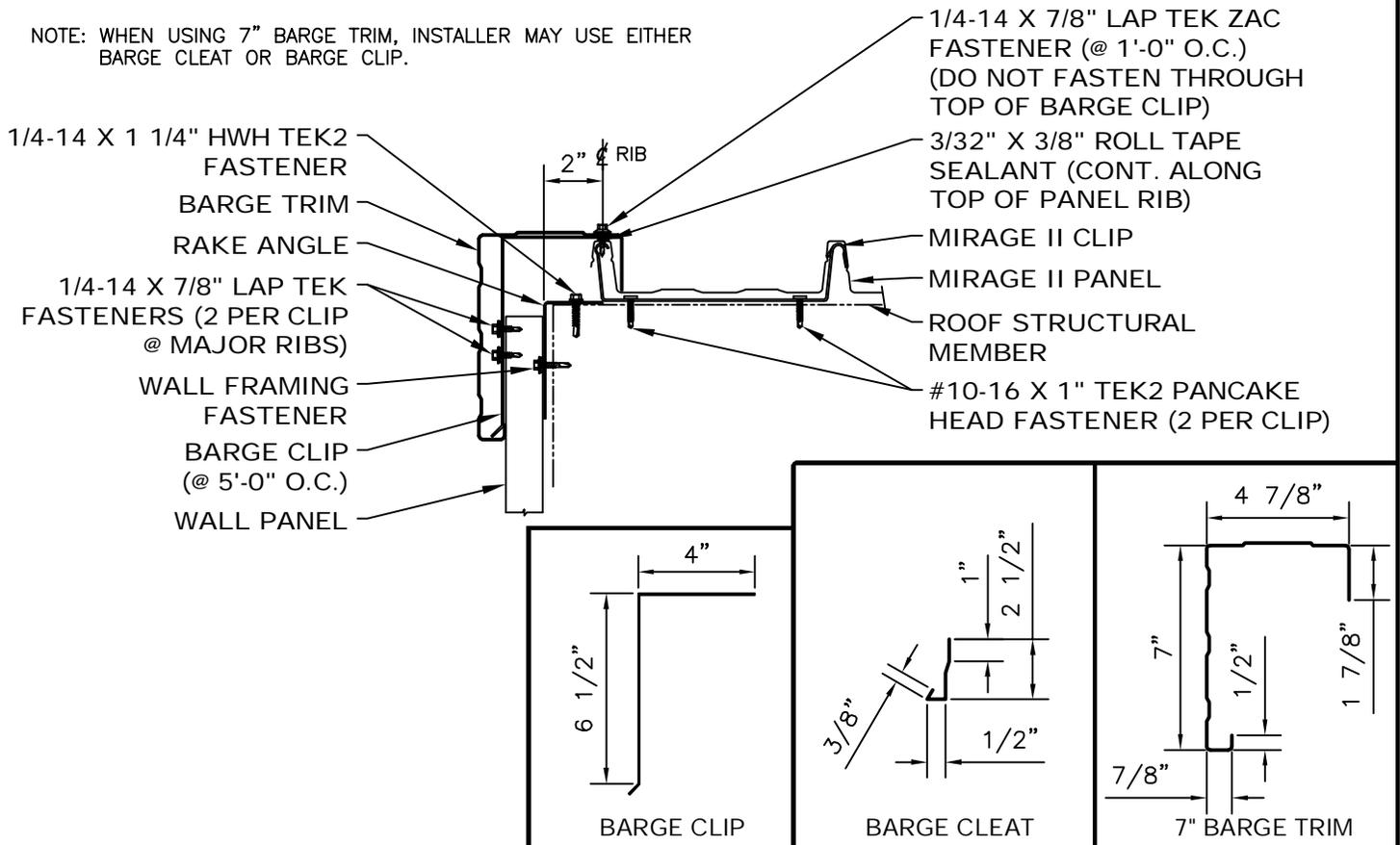


- NOTES: 1. Field form End Dam using End Dam tool.
 2. Attach Barge Clip to wall panels with 1/4-14 x 7/8" Lap Tek fasteners at each major rib.
 3. Notch Barge Trim around ribs of roof panels and attach with 1/4-14 x 7/8" Lap Tek Zac at Major Ribs. Fasteners must penetrate tape sealant.

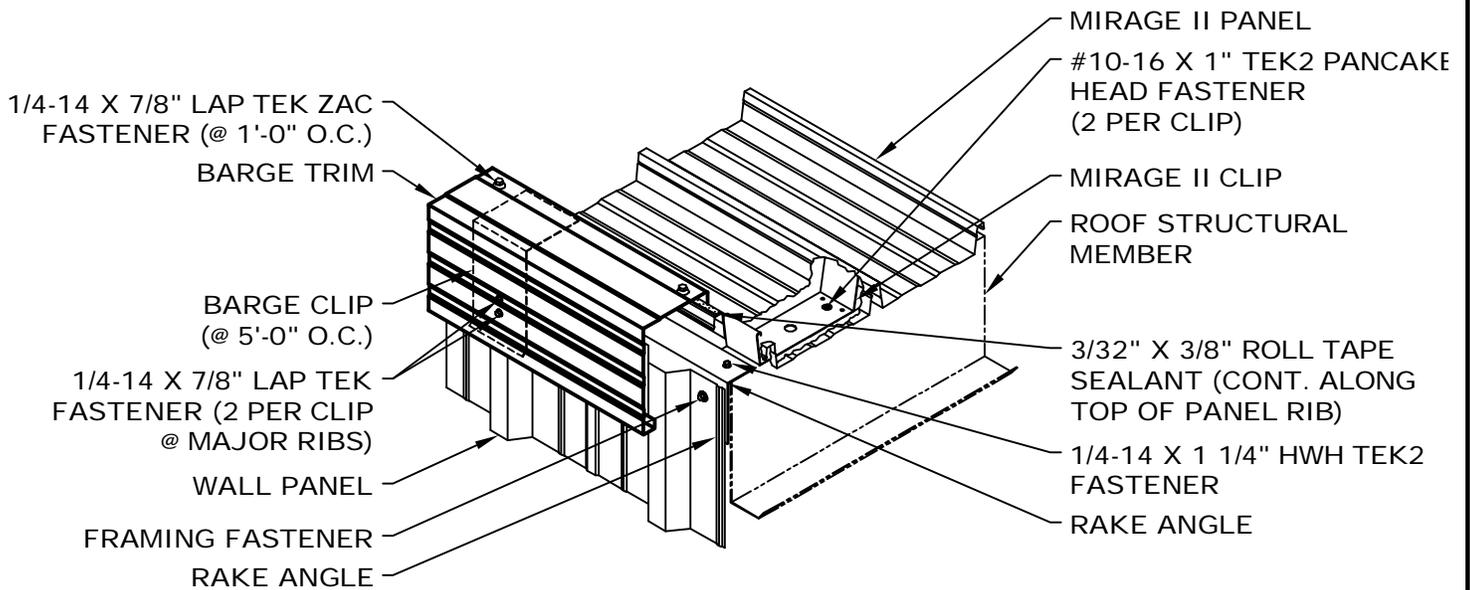


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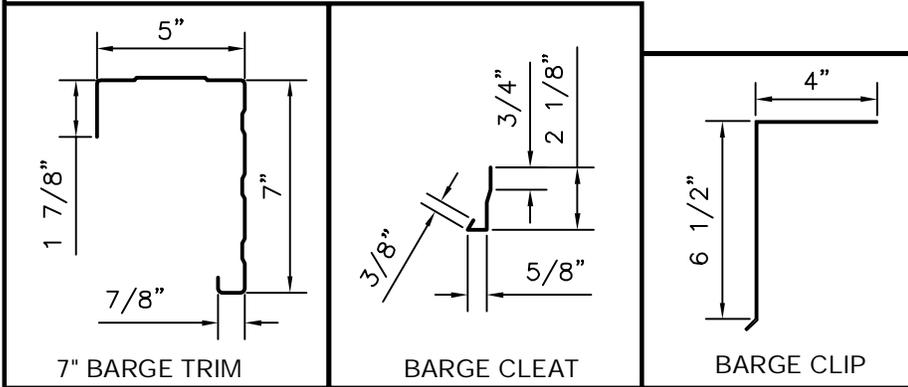
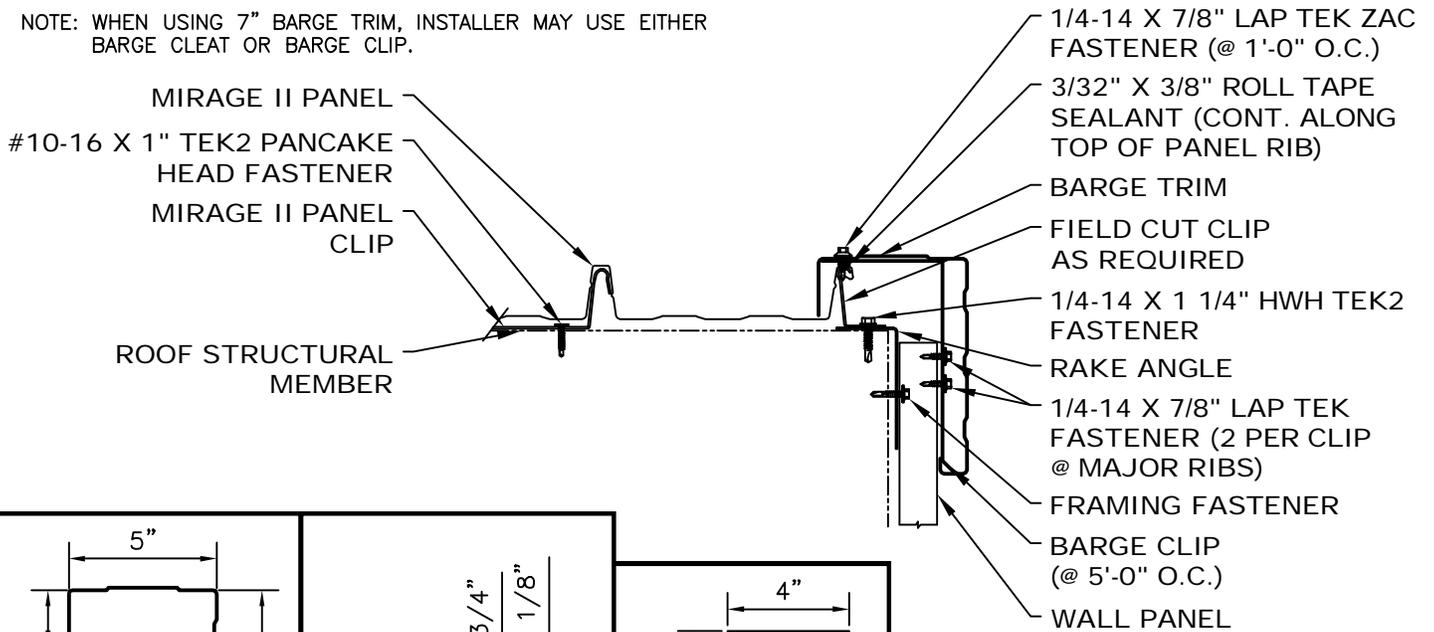


- NOTES: 1. Place continuous run of Roll Tape Sealant on top of panel rib.
 2. Install Barge Clip to wall panel at 5'-0" O.C. with (2) 1/4-14 x 7/8" Lap Tek fastener.
 3. Attach Barge Trim to roof panel at 1'-0" O.C. using 1/4-14 x 7/8" Lap Tek ZAC fasteners. **DO NOT ATTACH TO CLIPS.**

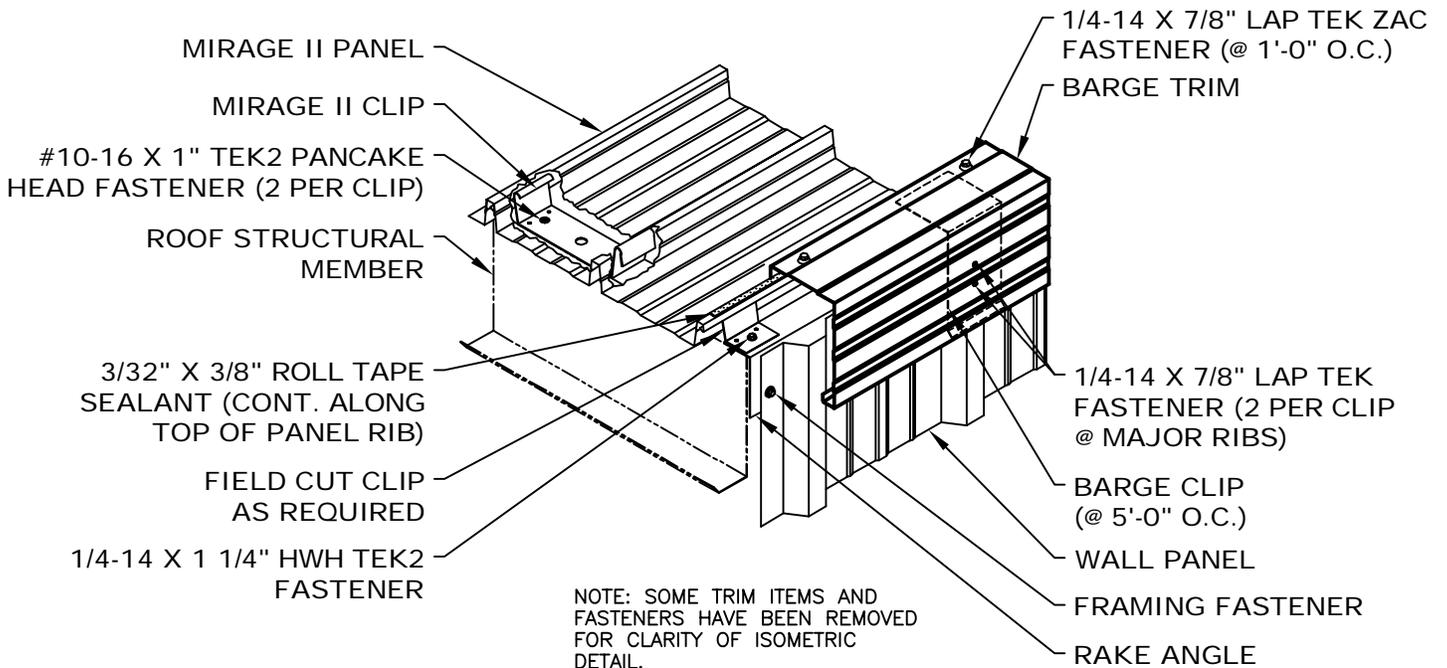


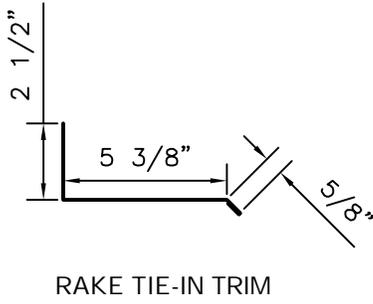
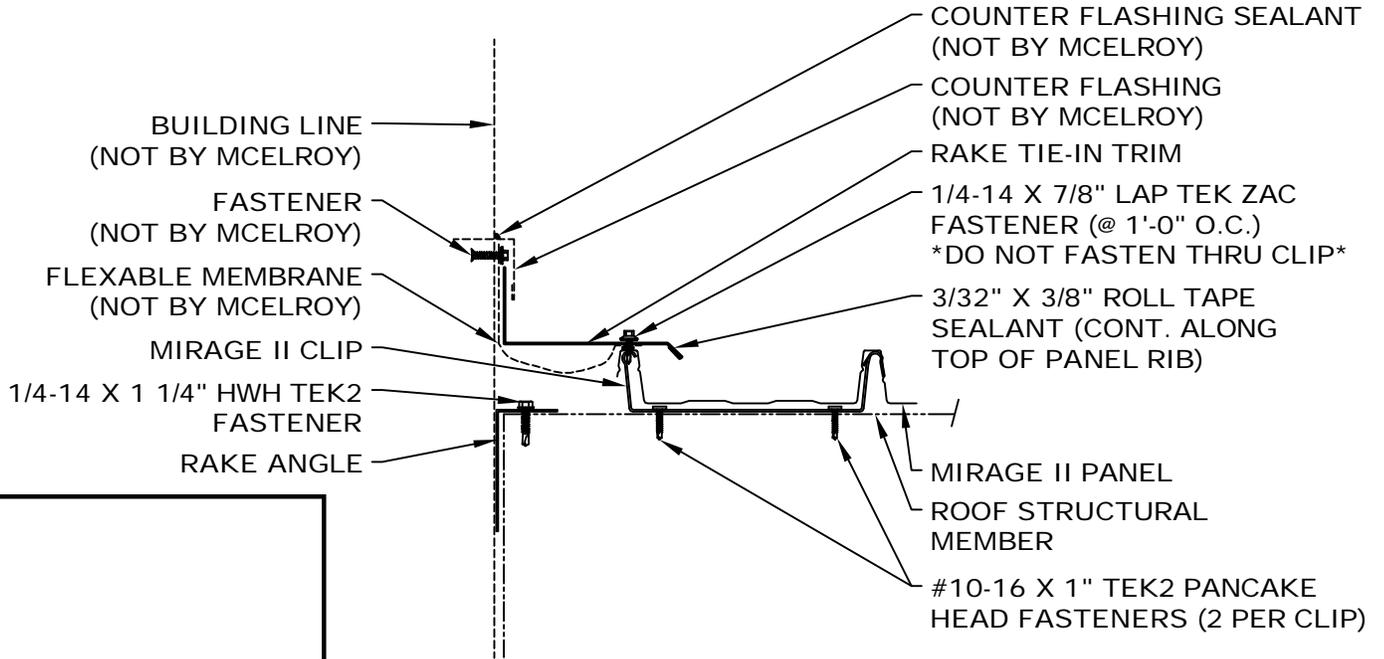
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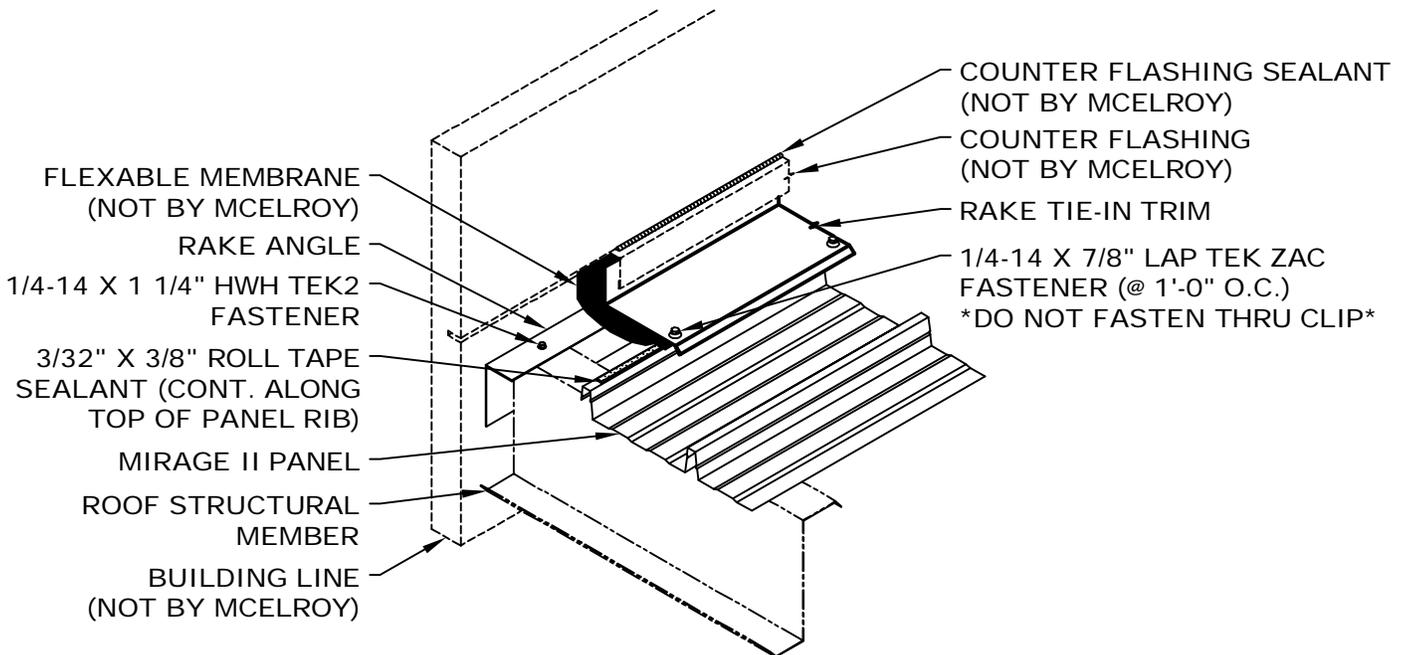


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 2. Install Barge Clip to wall panel at 5'-0" O.C. with (2) 1/4-14 x 7/8" Lap Tek fastener.
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 DO NOT ATTACH TO CLIPS.

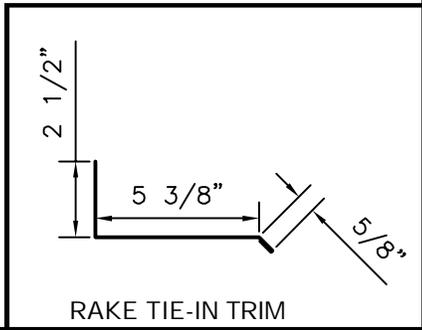
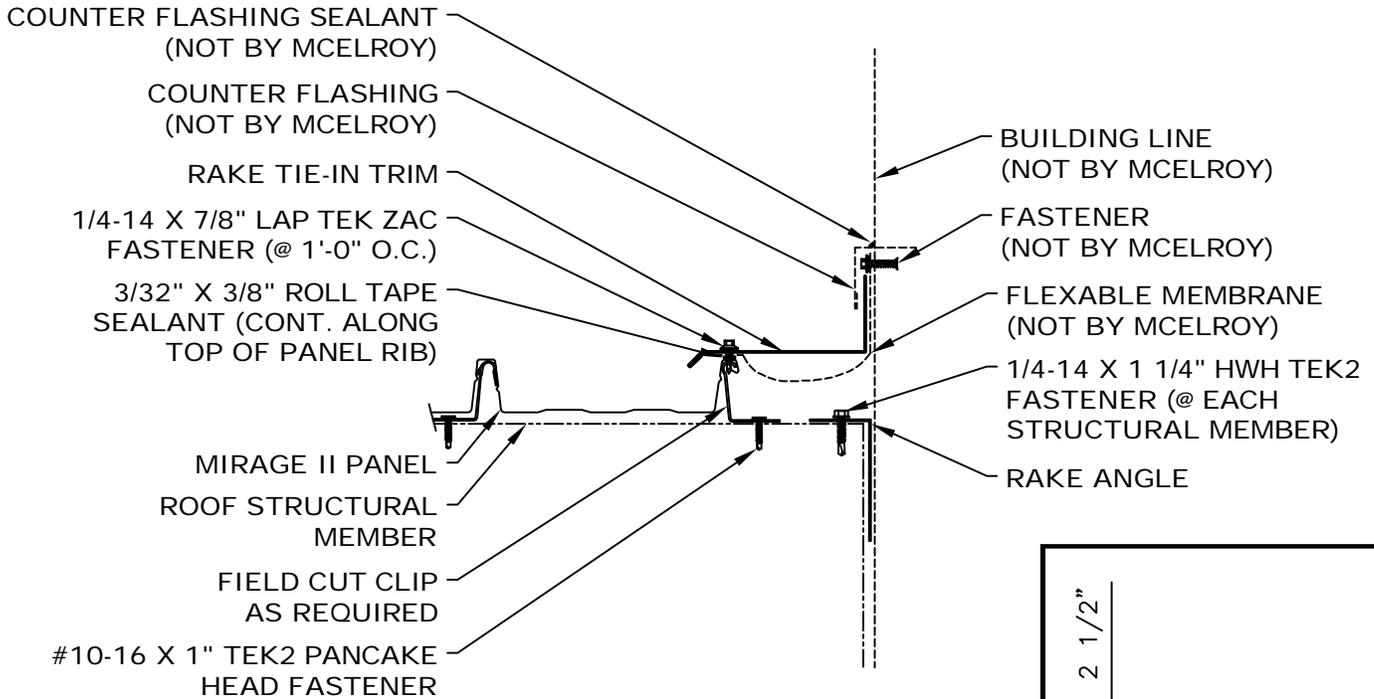




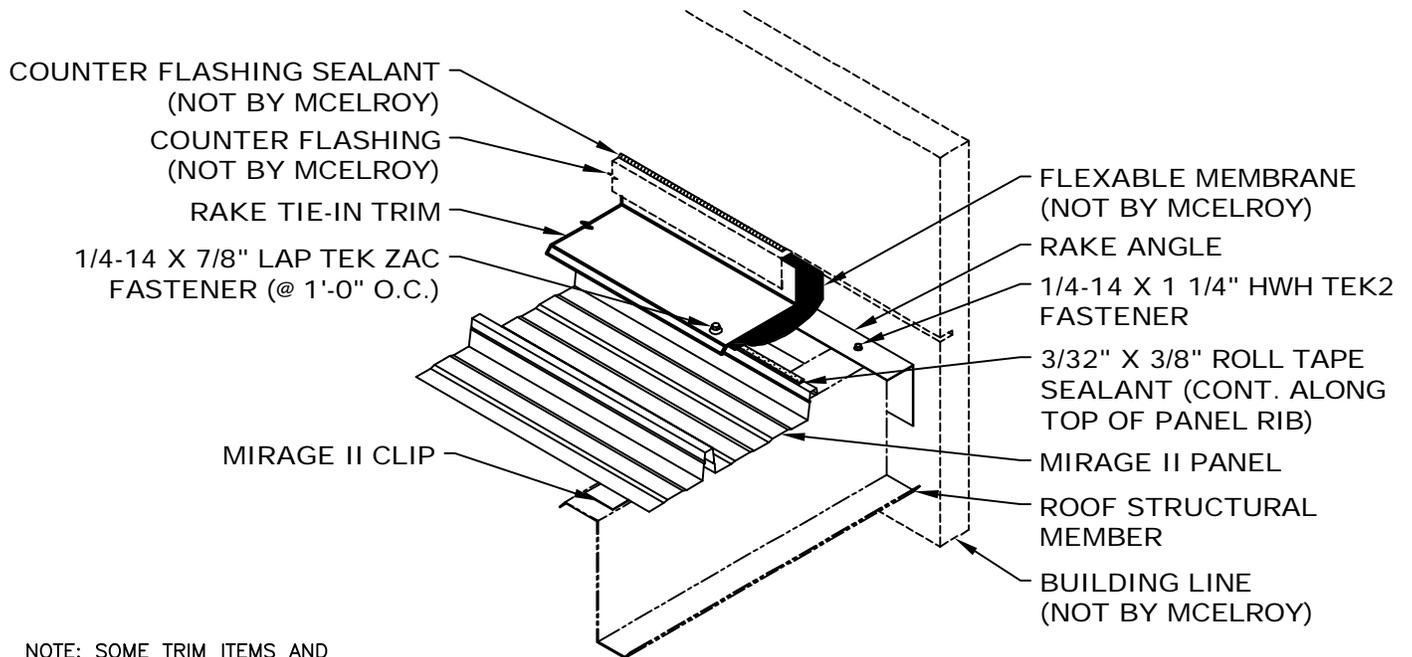
NOTES: 1. Place continuous run of Roll Tape Sealant on top of panel rib.
 2. Install Rake Tie-In Trim to panel rib with 1/4-14 x 7/8" Lap Tek ZAC fastener at 1'-0" O.C.
 DO NOT ATTACH TO CLIPS.



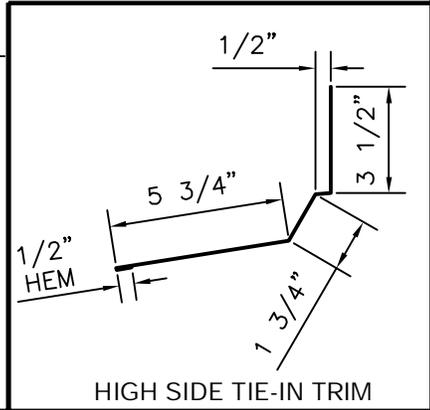
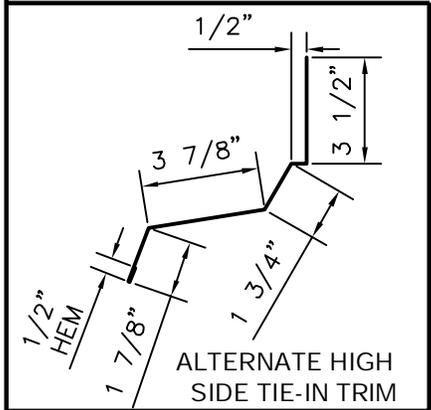
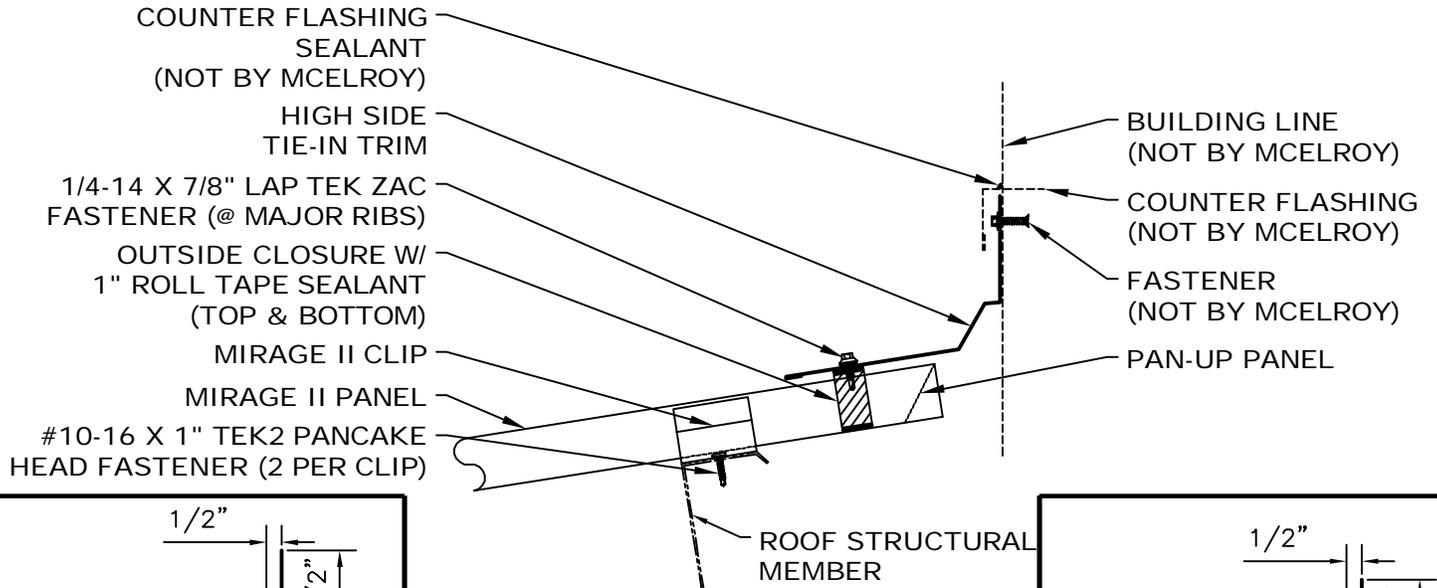
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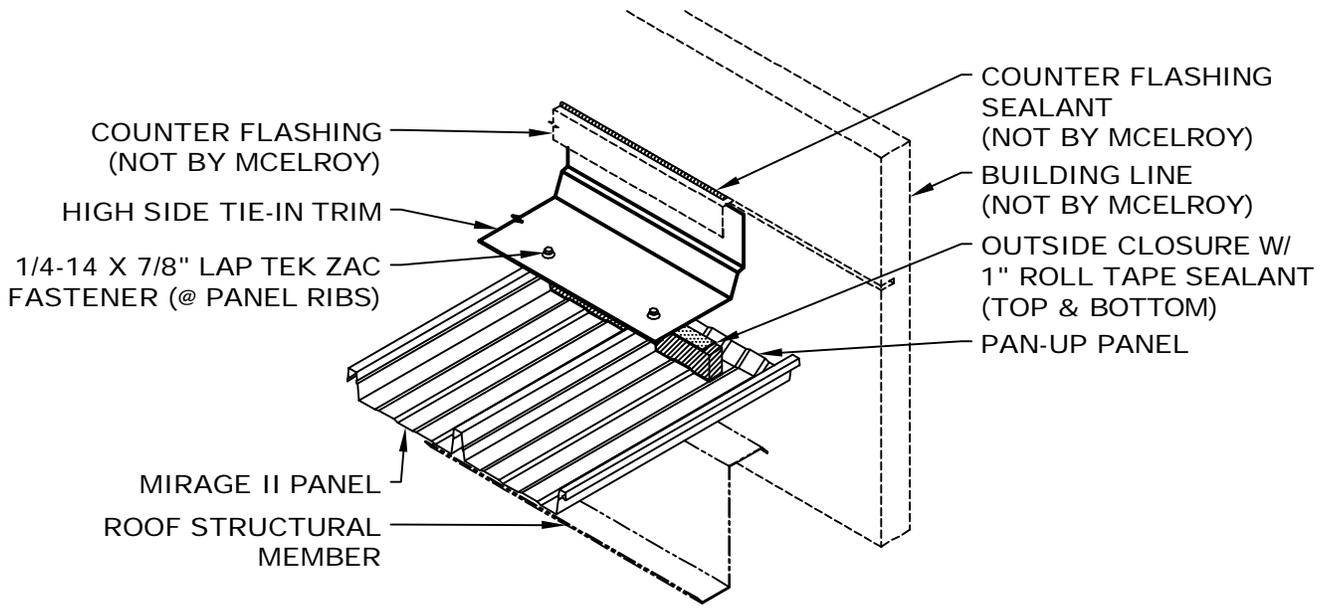
NOTES: 1. Place continuous run of Roll Tape Sealant on top of panel rib.
 2. Install Rake Tie-In Trim to panel rib with 1/4-14 x 7/8" Lap Tek ZAC fastener at 1'-0" O.C.
 DO NOT ATTACH TO CLIPS.



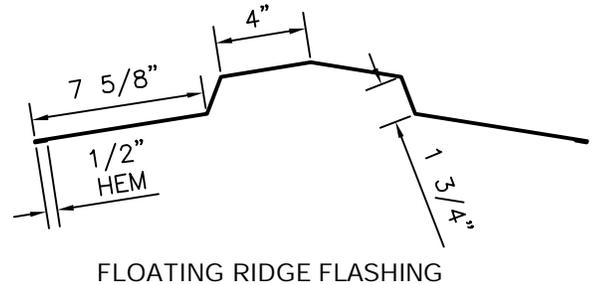
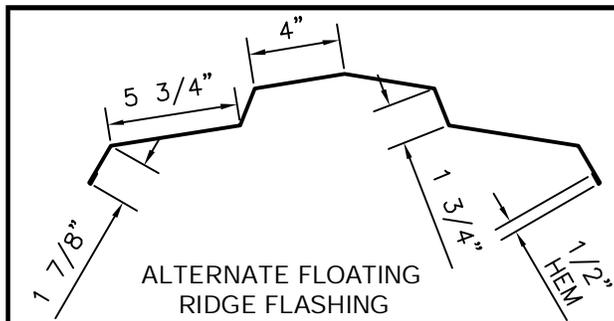
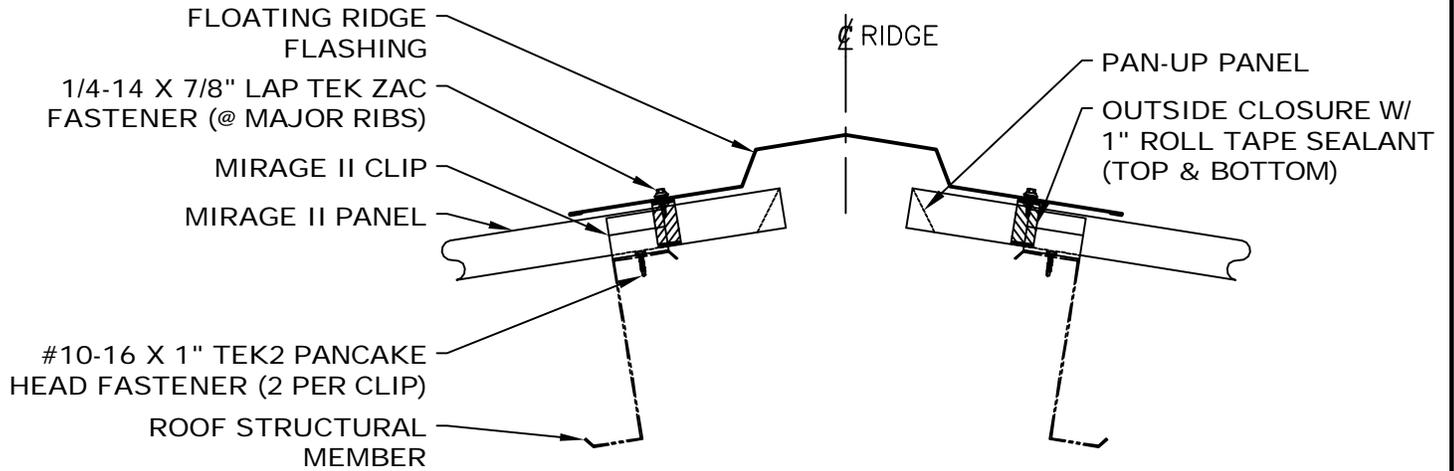
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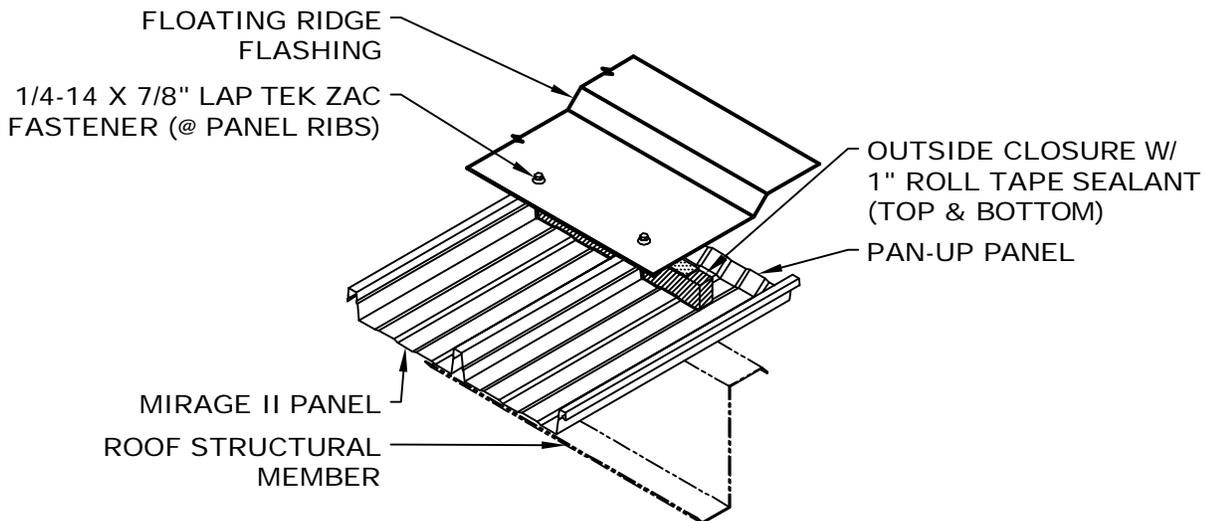
- NOTES: 1. Place continuous run of 1" Roll Tape Sealant on panels where Outside Closures will be installed.
 2. Install Outside Closures and place a continuous run of 1" Roll Tape along top of Outside Closures.
 3. Install High Side Tie-In Trim and fasten to each panel rib with 1/4-14 x 7/8" Lap Tek ZAC fasteners. Fasteners must penetrate sealant.



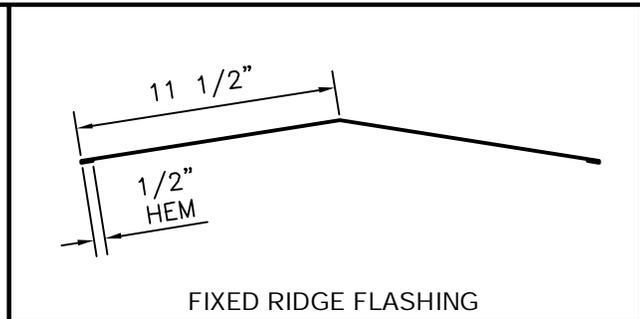
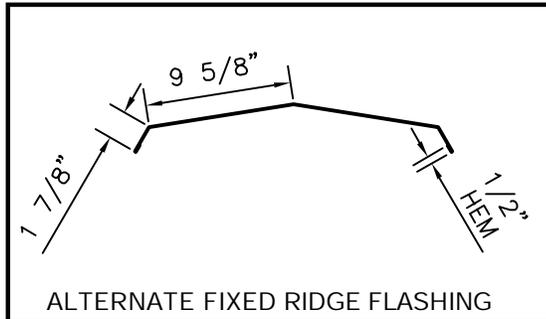
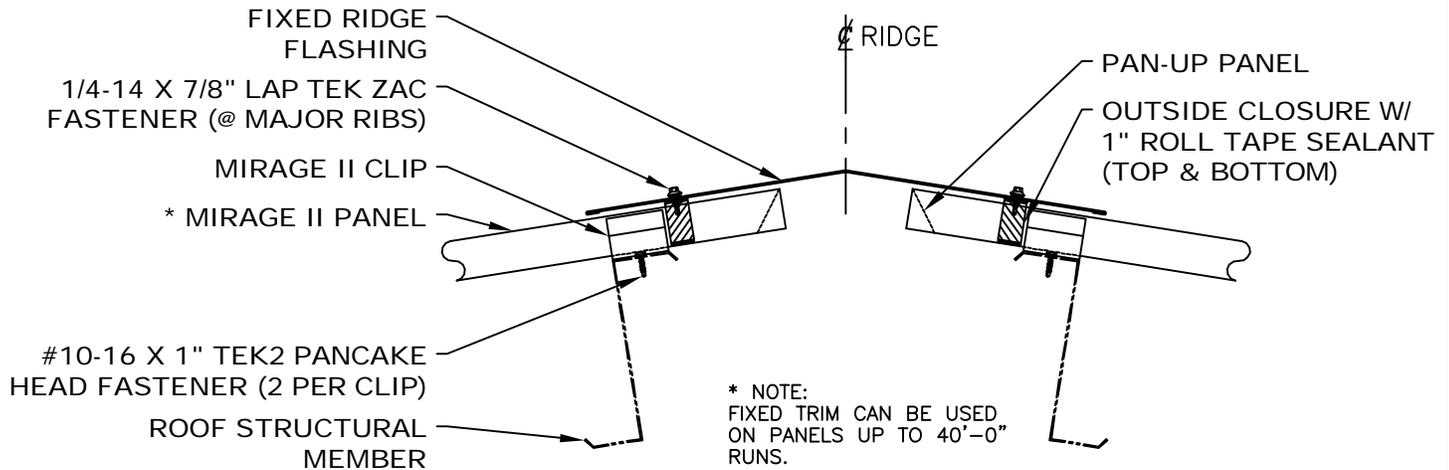
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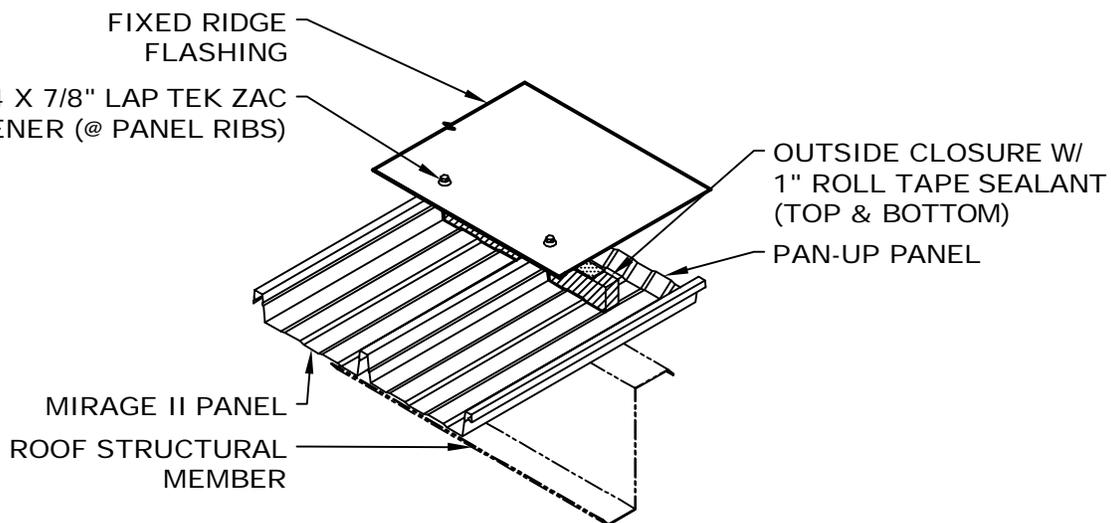
- NOTES: 1. Place continuous run of 1" Roll Tape Sealant on panels where Outside Closures will be installed.
 2. Install Outside Closures and place a continuous run of 1" Roll Tape along top of Outside Closures.
 3. Install Ridge Flashing and fasten to each panel rib with 1/4-14 x 7/8" Lap Tek ZAC fasteners. Fasteners must penetrate sealant.



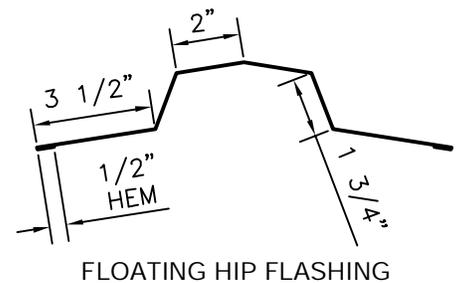
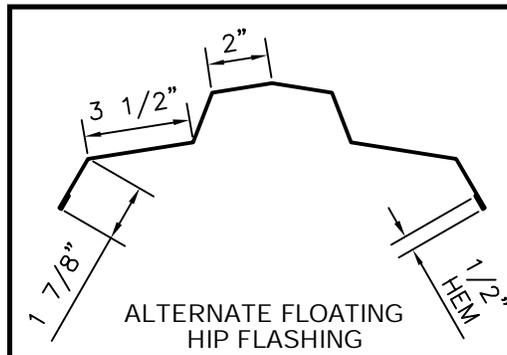
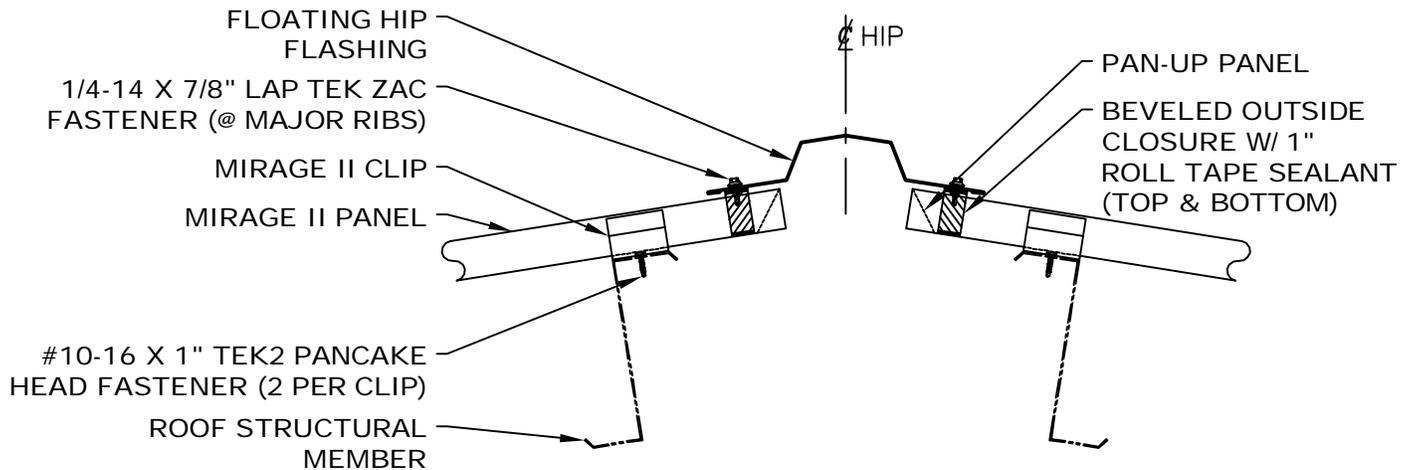
NOTE: SOME TRIM ITEMS AND FASTENERS HAVE BEEN REMOVED FOR CLARITY OF ISOMETRIC DETAIL.



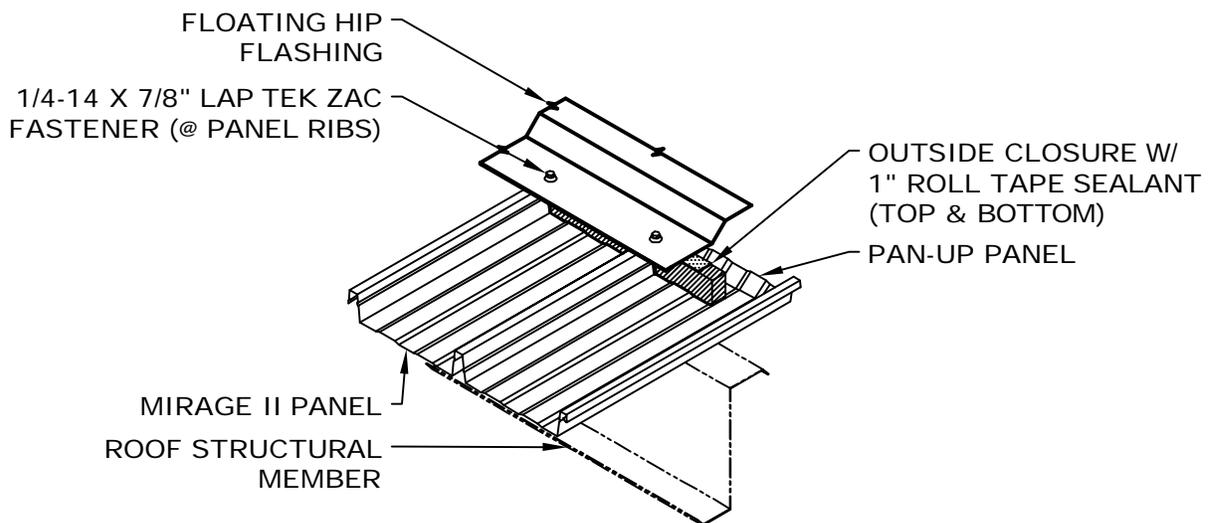
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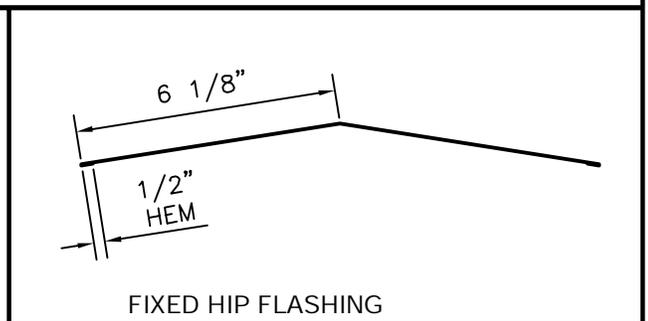
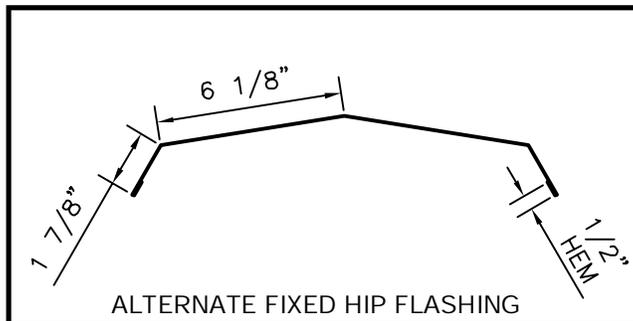
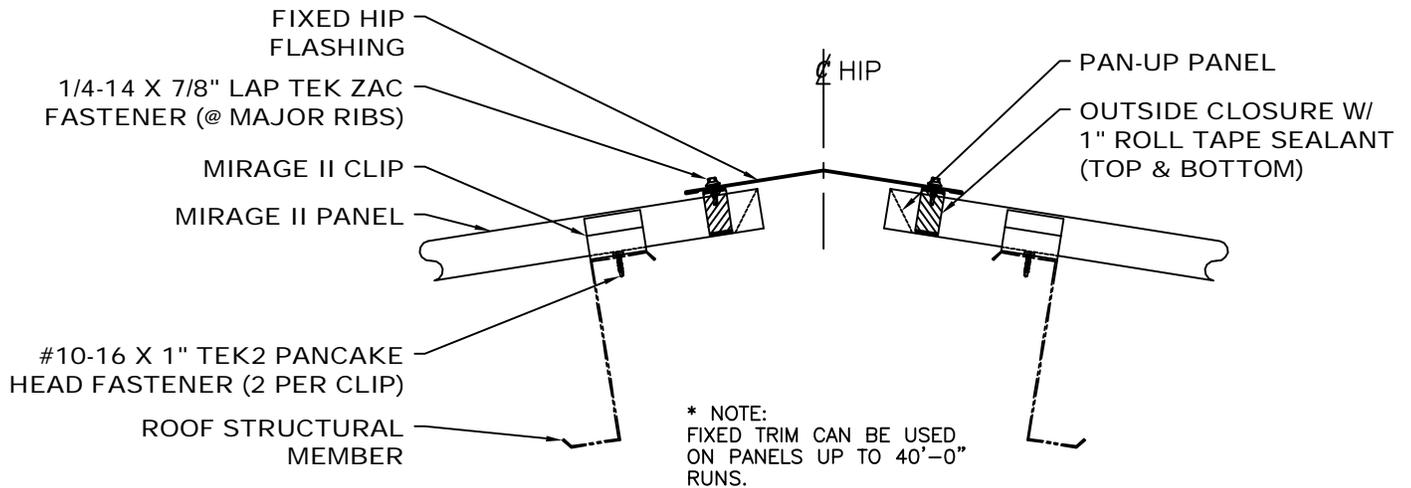
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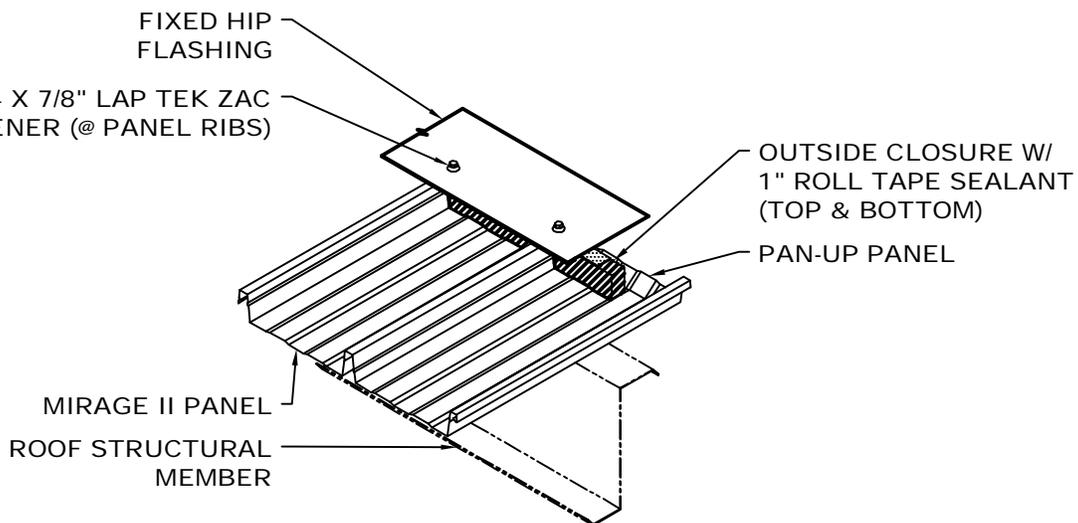
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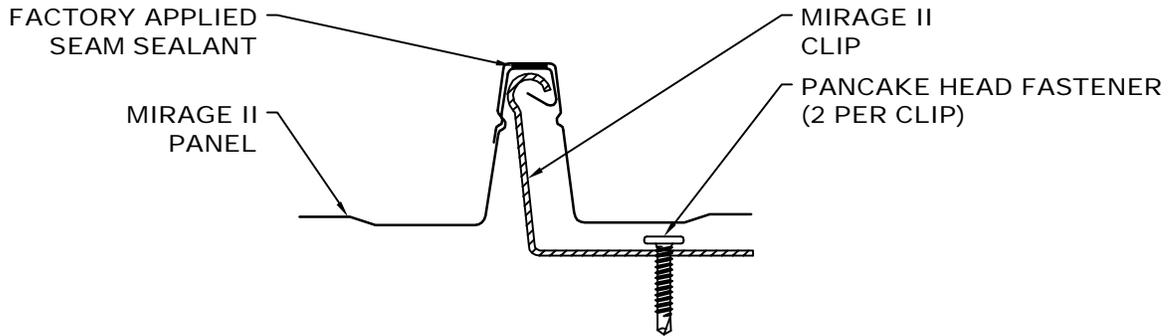


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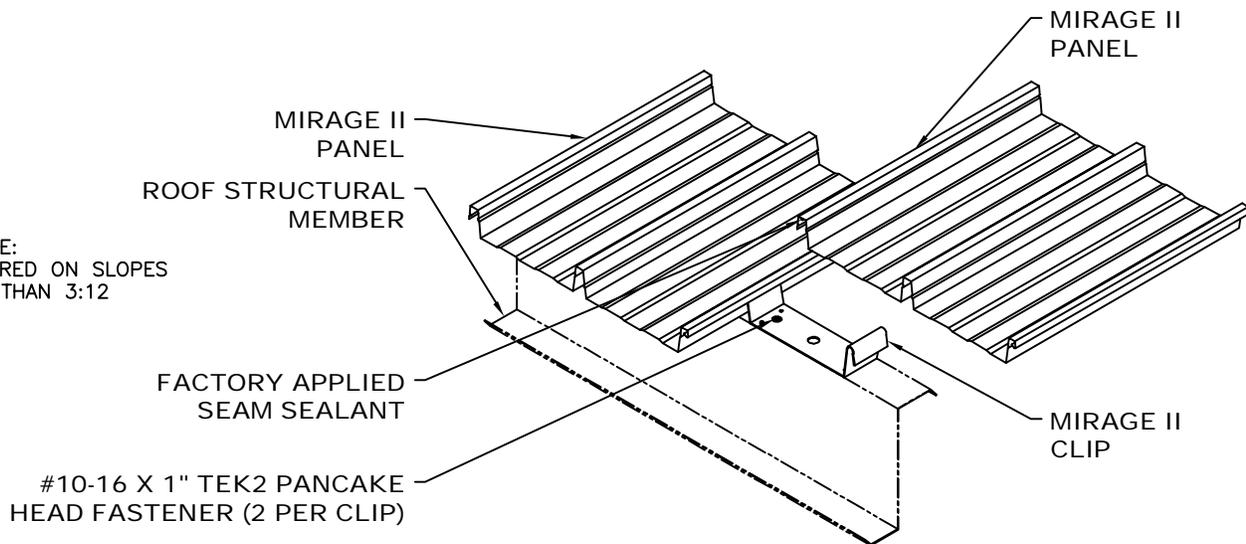


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**NOTE:
REQUIRED ON SLOPES
LESS THAN 3:12

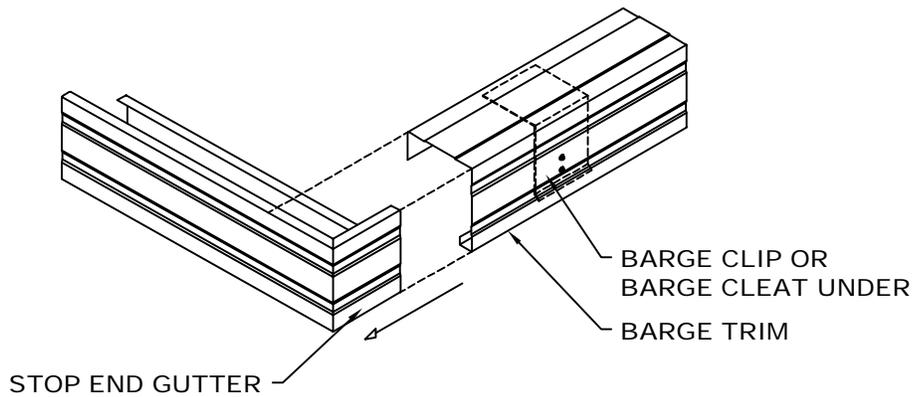


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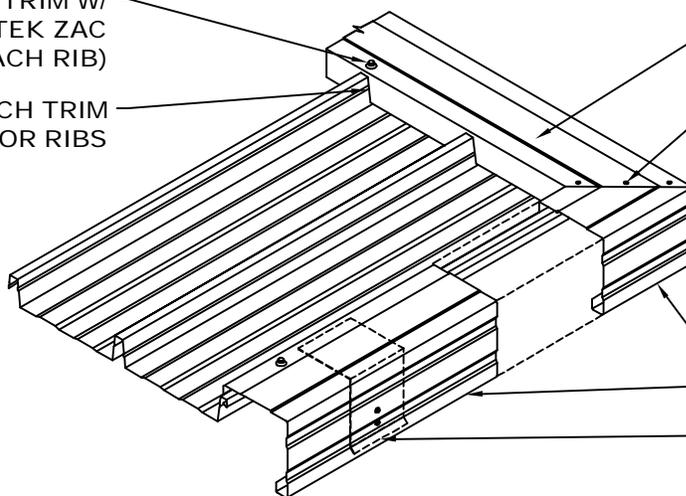
DETAIL SHOWN OVER OPEN FRAMING.
DETAILS OVER SOLID DECKING OR
RIGID INSULATION ARE SIMILAR.



GUTTER/BARGE JUNCTION
 STOP END GUTTER AS SHOWN AND EXTEND 5/8" PAST END OF BUILDING. CUT BARGE TO ALLOW GUTTER END OVERLAP. CUT AWAY ROLL EDGE OF BARGE AND FASTEN TO GUTTER WITH RIVETS.

ATTACH TRIM W/
 1/4-14 X 7/8" LAP TEK ZAC
 FASTENER (@ EACH RIB)

FIELD NOTCH TRIM
 AS NEEDED FOR RIBS



STOP END SHEETS
 UNDER TRIM

POP RIVET TOPS
 TOGETHER AFTER
 ASSEMBLY

BARGE TRIM

BARGE CLIP OR
 BARGE CLEAT UNDER

NOTE: SOME TRIM ITEMS AND
 FASTENERS HAVE BEEN REMOVED
 FOR CLARITY OF ISOMETRIC
 DETAIL.



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1500 HAMILTON RD.
BOSSIER CITY, LA 71111

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