



Oldcastle BuildingEnvelope™

***FG-3000 Storefront for High Design
Pressure and Shuttered Applications***
INSTALLATION AND GLAZING MANUAL

*Note: Installation and Glazing Manuals are product specific. **FOR REVIEW ONLY!***

TABLE OF CONTENTS

	Page No
General Information	1 - 2
FRAME FABRICATION	
Measuring Opening and Sizing Frame	3 - 4
Assembly	5
Head & Sill Anchor Hole Fabrication	6
Jamb Anchor Hole Fabrication	7
Reinforcement Steel Fabrication	8
Subsill Installation	9
Frame Installation	10
Glazing Procedure	11
Sill Installation and Perimeter Seals	12
FG-3000 Parts, Extrusions and Accessories	13

GENERAL INFORMATION

GENERAL INFORMATION:

Oldcastle BuildingEnvelope FG-3000 (2" x 4 1/2") storefront system represents the latest in product development technology complemented by dealer on-the-job input and experience. Proper use of these systems will assure optimum results in erection and long term performance.

Oldcastle BuildingEnvelope does not control the application nor selection of its product configurations, sealant or glazing materials and assumes no responsibility thereof. It is the responsibility of the owner, architect, and installer to make these selections in strict compliance with applicable laws and building codes.

PROTECTION AND STORAGE:

Handle the material carefully. Do not drop from the truck. Stack with adequate separation so that the material will not rub together. Store material off the ground. Protect against the elements and other construction hazards by using a well ventilated covering. Remove material from package if it is wet or is located in a damp area.

CHECK MATERIAL:

Check all material upon arrival for quality and to assure against shipping damage. Any visible damage must be noted on the freight bill at the time of receipt. If a claim is required, then the receiving party must process a claim with the freight company. Completely check construction which will receive your materials against contract documents. Notify the general contractor by letter of any discrepancies before proceeding with the work. Failure to do so constitutes acceptance of work by other trades. Check shop drawings and installation instructions to become familiar with the project. The shop drawings take precedence and include specific details for the project. The installation instructions are of a general nature and cover the most common conditions. Due to varying job conditions, all sealants used should be approved by the sealant manufacturer to insure they will function for conditions shown on instructions and shop drawings. They must be compatible with all surfaces in which adhesion is required including other sealant surfaces. Use primers where directed by manufacturer of sealants. Be sure to properly store sealants at recommended temperatures and check sealant for remainder of shelf life before using.

FIELD CONDITIONS:

Do not install wall if there is a walk way with a downslope towards an entrance or a storefront
All materials to be installed plumb, level, and true. Aluminum to be placed in direct contact with the masonry or incompatible materials should be isolated with a heavy coat of zinc-chromate or bituminous paint.

After sealant is set and a representative amount of the wall has been glazed (250 square feet or more), run a water hose to check installation. On large jobs hose test should be repeated during glazing operation. Test should be conducted in accordance with AAMA 501.2 specifications.

Coordinate protection of installed materials with general contractors and other trades.

GENERAL INFORMATION

MATERIAL HANDLING:

SHOP

1. Cardboard wrapped or paper interleaved material must be kept dry.
2. Check arriving materials for quantity and keep record of where various materials are stored.

JOB SITE

1. Material at job site must be stored in a safe place well removed from possible damage by other trades.
2. Cardboard wrapped or paper interleaved materials must be kept dry.
3. Keep record of where various materials are stored.
4. Protect materials after erection. Cement, plaster, and other alkaline solutions are very harmful to the finish.

CLEANING

Aluminum shall be cleaned with plain water containing a mild detergent, or a petroleum product such as white gasoline, kerosene, or distillate. No abrasive agent shall be used.

GENERAL CONSTRUCTION NOTES

- A. Study these instructions, shop drawings, erection drawings and architectural drawings before starting any work.
- B. All materials are to be installed plumb and level.
- C. All work should start from an established benchmark and column centerlines established by the architect and the general contractor.
- D. Completely check construction which will receive your materials against contract documents. Notify the general contractor by letter of any discrepancies before proceeding with your work since this constitutes acceptance of work by other trades.
- E. Protect all aluminum to be placed directly in contact with uncured masonry or incompatible materials with a heavy coat of zinc chromate or bituminous paint.
- F. Follow installation and glazing instructions.
- G. After sealant is set and a representative amount of the wall has been glazed (500 square feet or more), run a water hose test to check installation. On large jobs, hose test should be repeated during glazing operation. Test should be conducted in accordance with AAMA 501.2 specifications.

FRAME FABRICATION

Establish Frame Size & Cut Metal to Length

Measure width of rough opening.

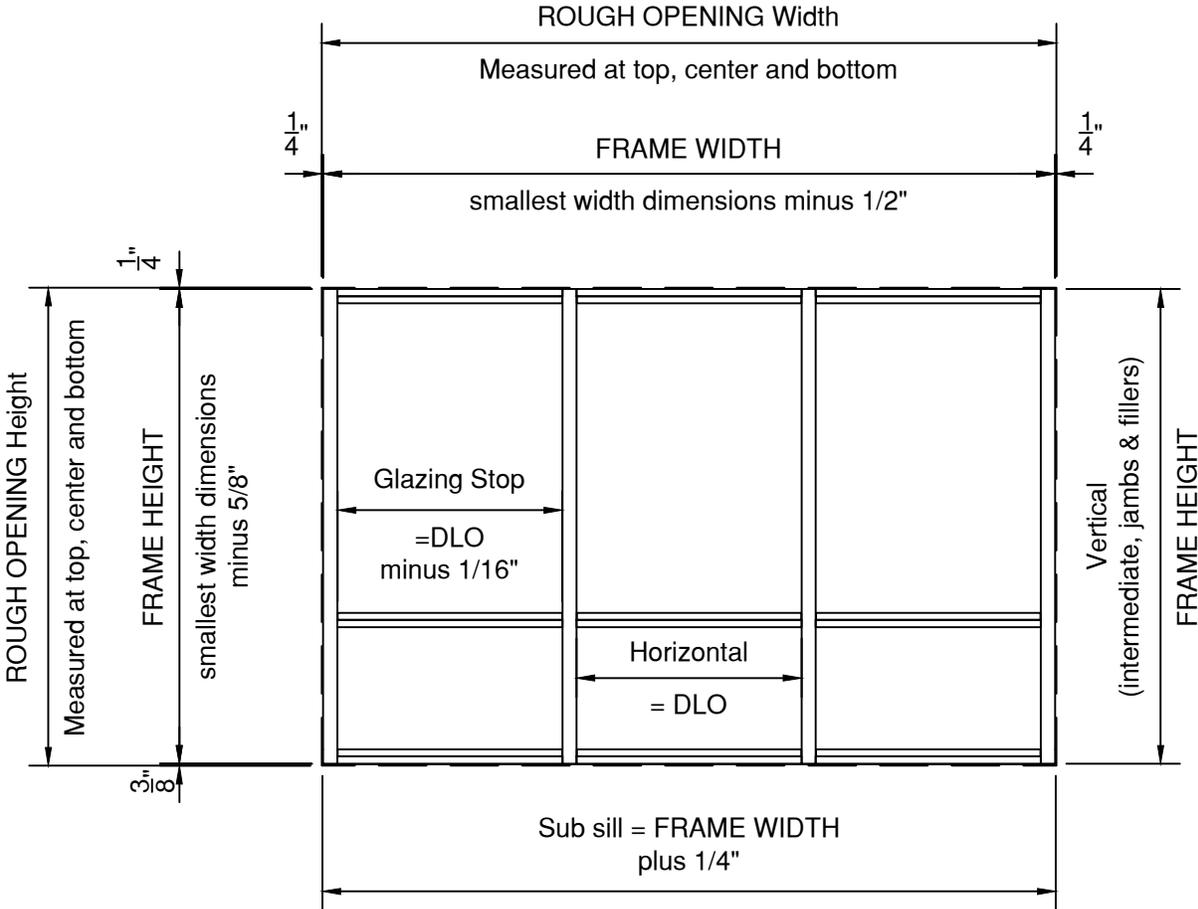
- A. Measure opening at bottom.
- B. Measure opening at center.
- C. Measure opening at top.

The frame width will be the smallest dimension less 1/2" allowing for a 1/4" caulk joint at each jamb.

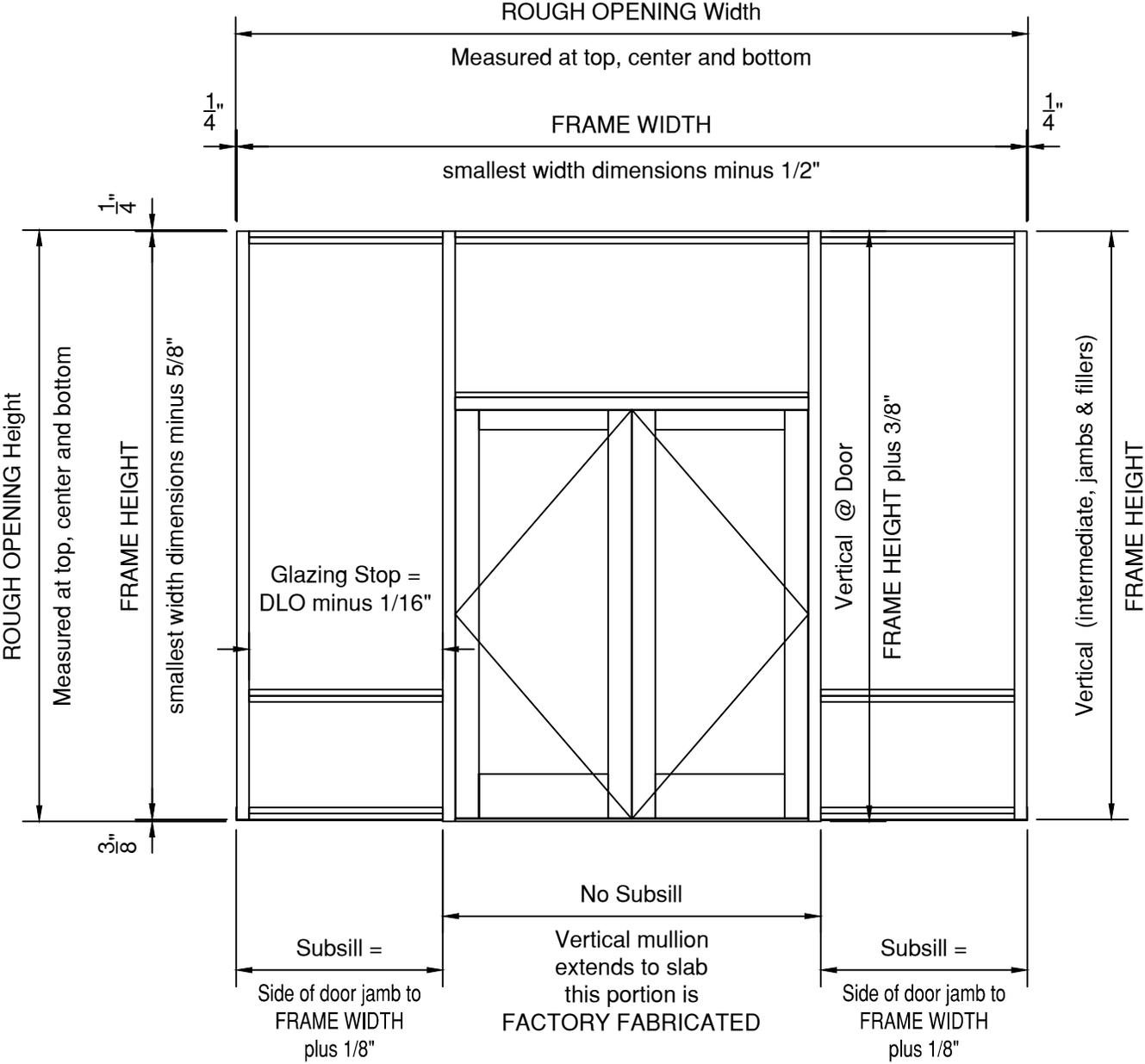
Repeat process to determine frame height.

- A. Beginning on left side of opening, measure dimension from top to bottom.
- B. Repeat at center.
- C. Repeat at right side of opening.

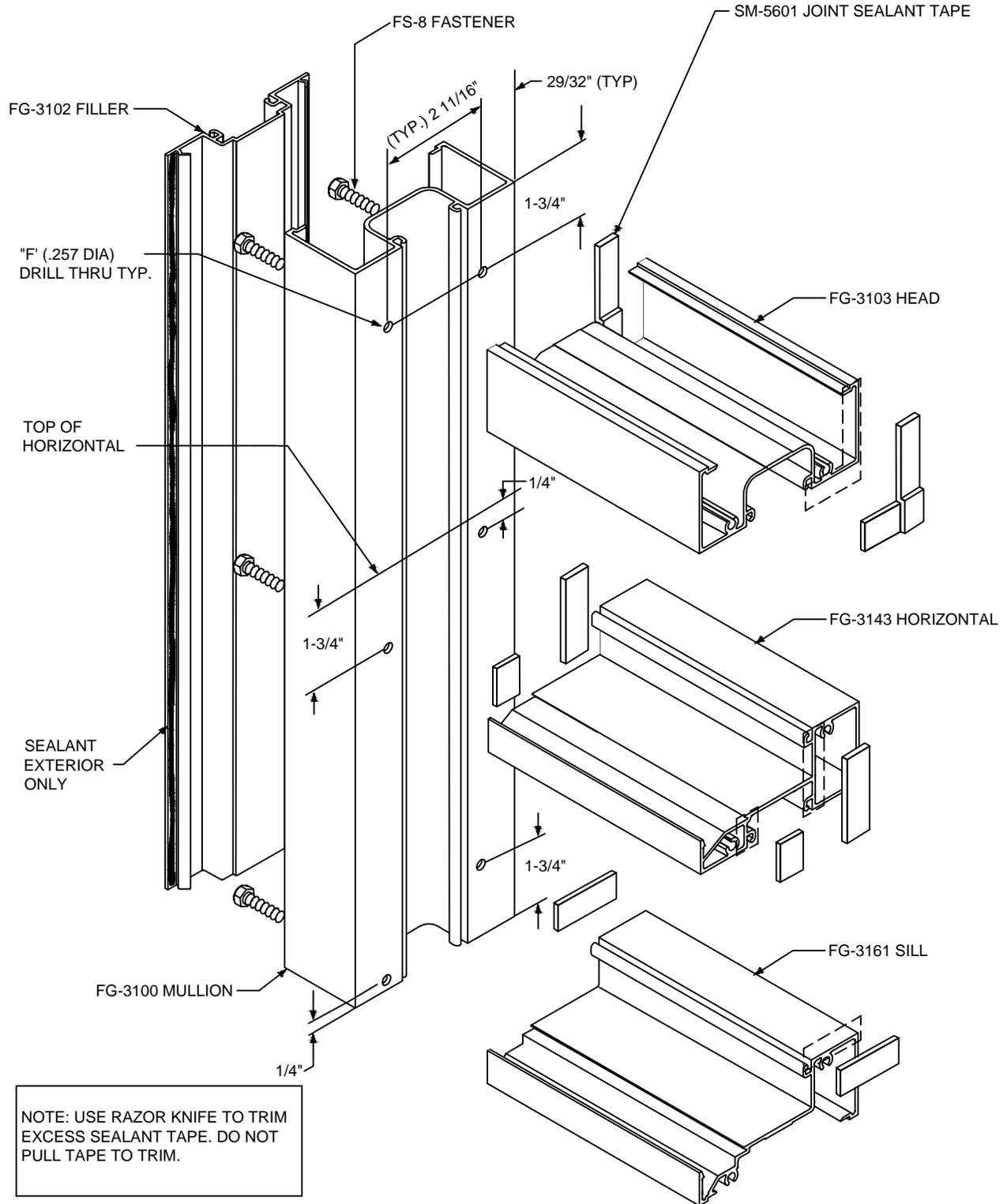
The frame height will be the smallest dimension less 5/8" to allow for subsill and a 1/4" caulk joint at the head and sill.



FRAME FABRICATION



OUTSIDE GLAZED-SCREW SPLINE-FRAME ASSEMBLY



FRAME FABRICATION

ANCHOR HOLE FABRICATION

Fabricate head and sill for anchor holes, the number of anchors vary based on substrate material. Reference shop drawings for number of anchor holes and locations for each substrate. First hole is always 4" from end, each additional fastener hole are at required minimum spacing.

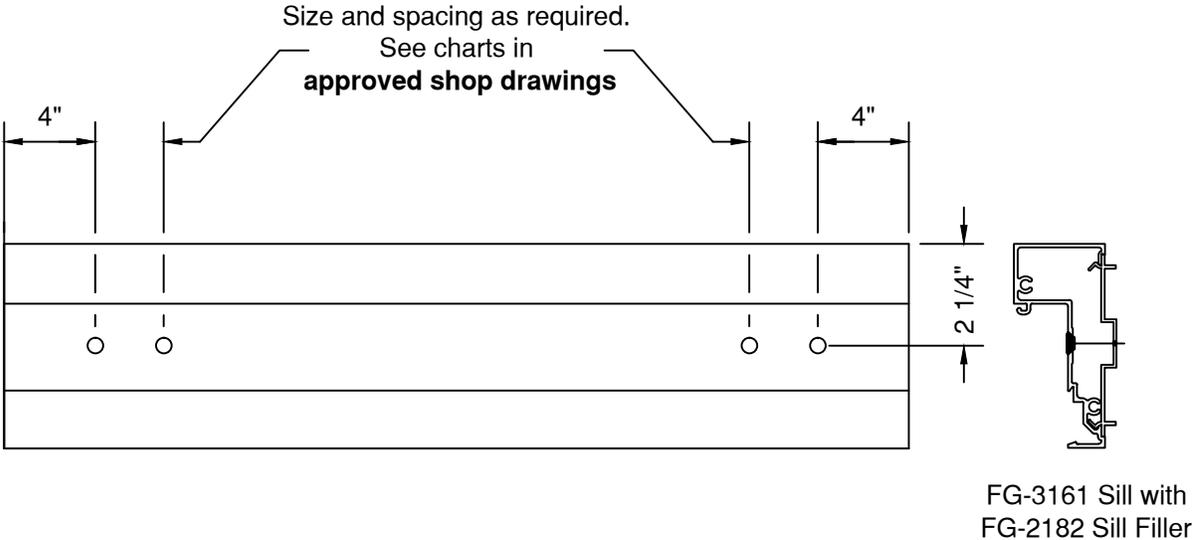
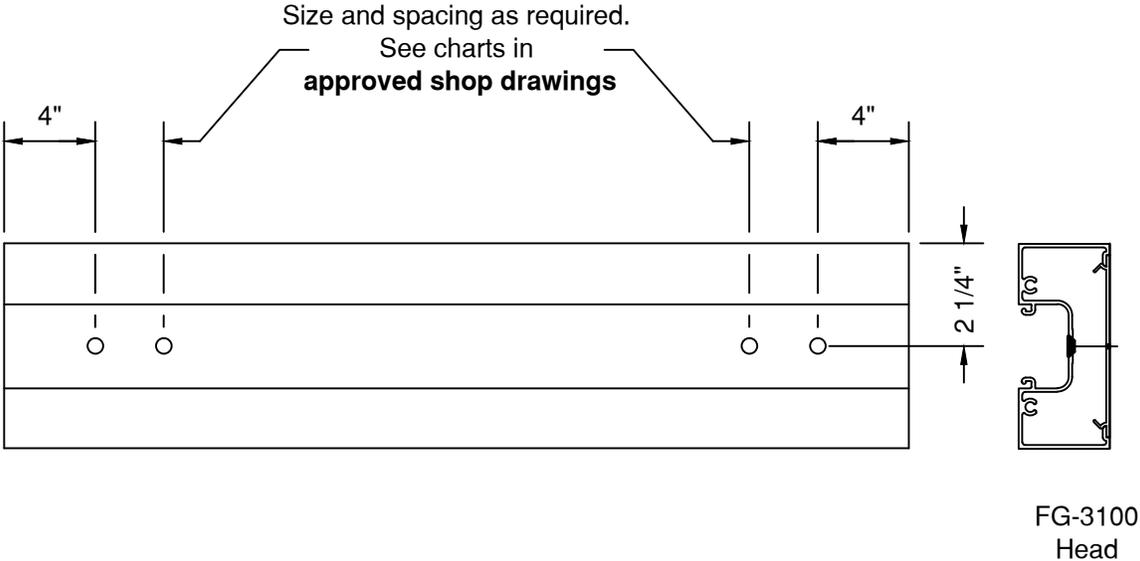


Figure 3
Head and Sill Fabrication

FRAME FABRICATION

JAMB ANCHOR HOLE FABRICATION

Fabricate wall jamb for anchor holes. number of anchors vary based on substrate material. Reference approved shop drawings, for locations for each substrate.

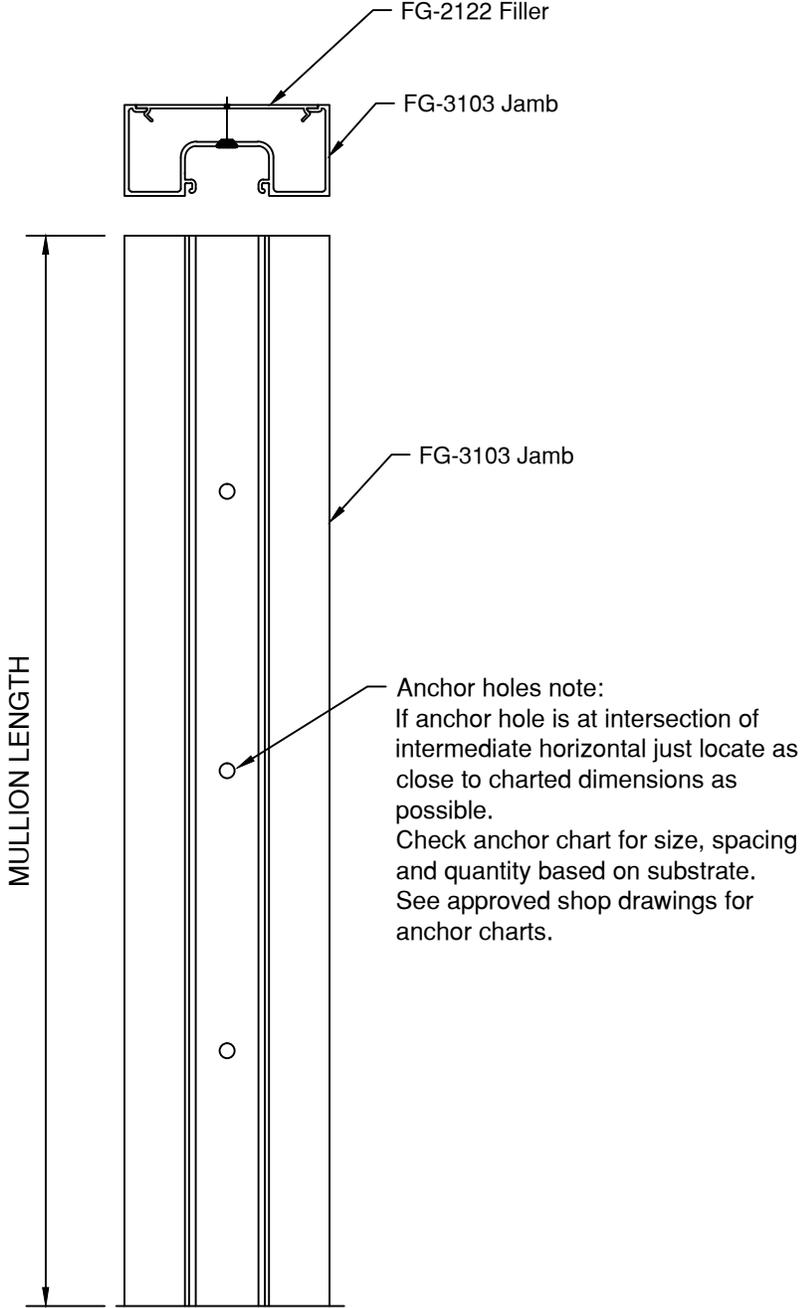


Figure 4
Jamb Fabrication

FRAME FABRICATION

Fabricate steel reinforcement where required. Fabrication for the (2) steel options are identical.

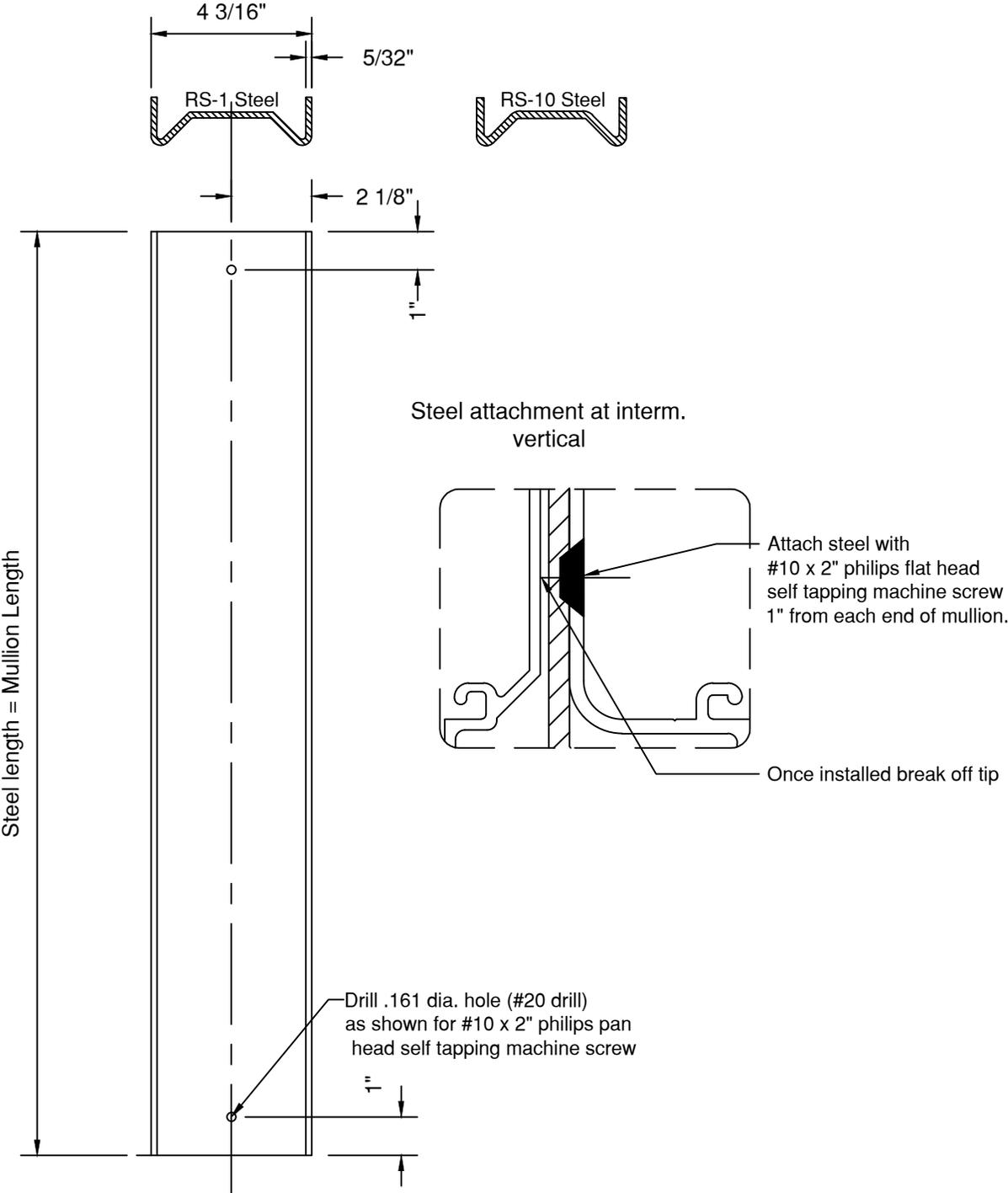
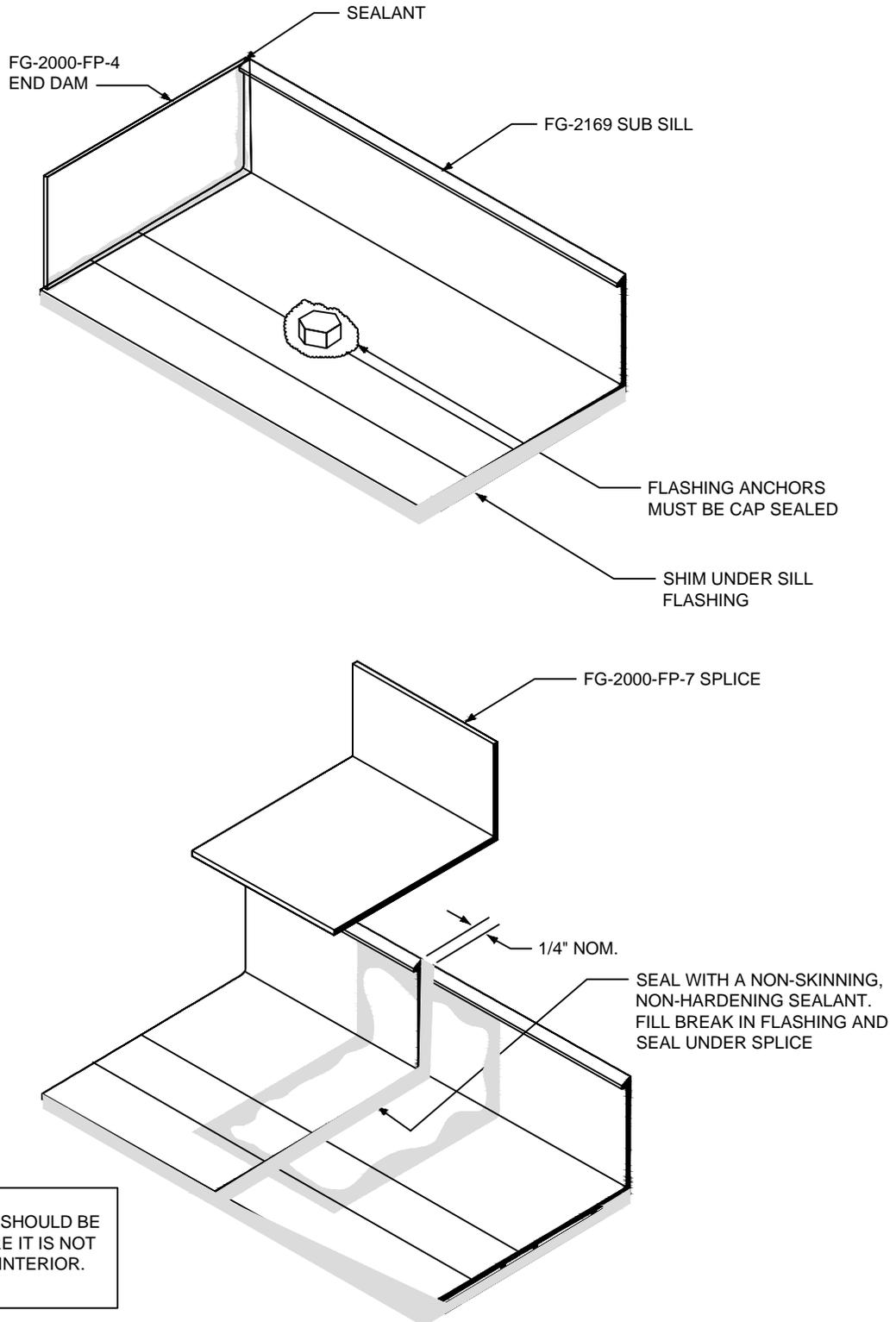


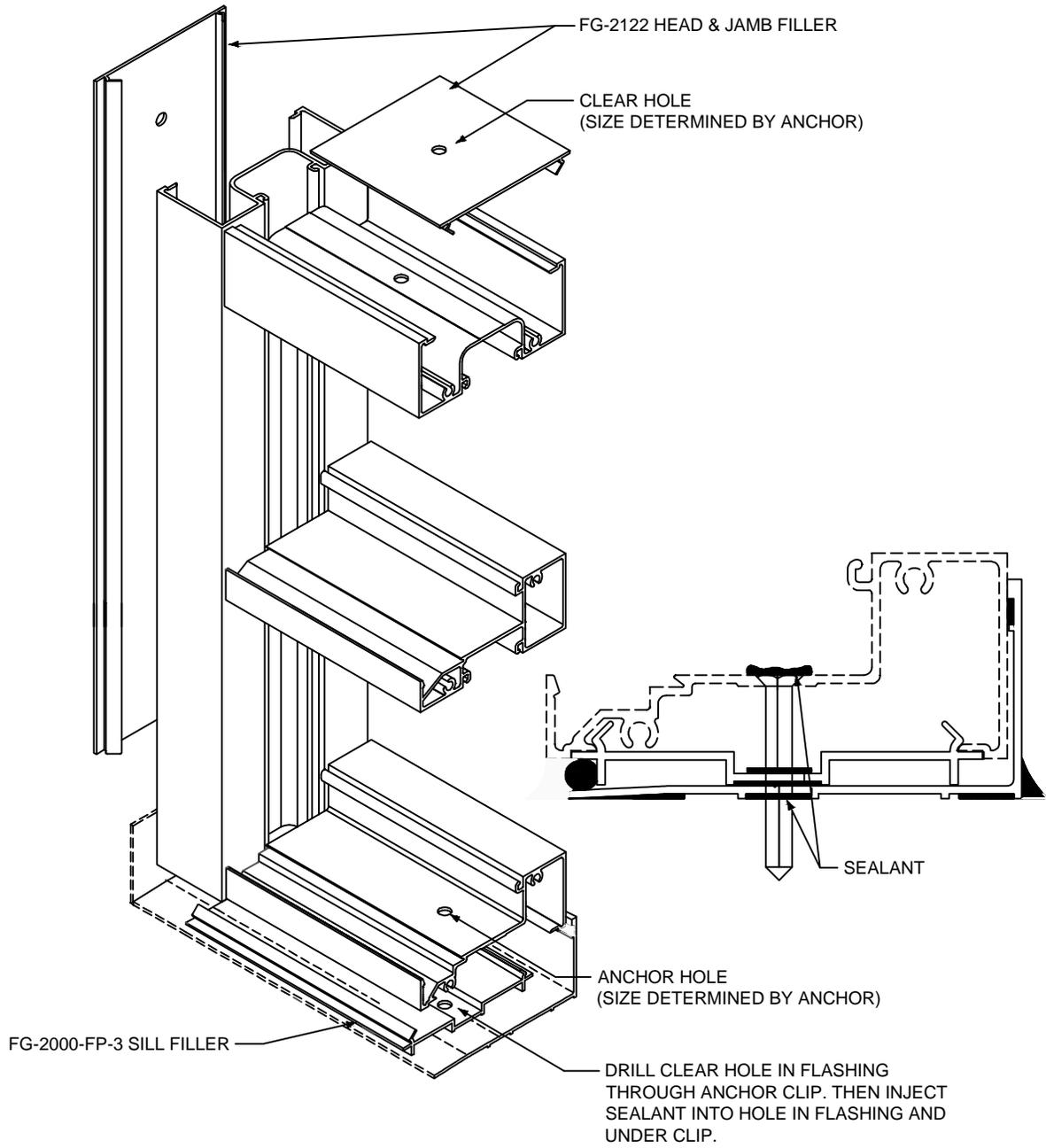
Figure 5
Steel Reinforcing

OUTSIDE GLAZED-SILL FLASHING INSTALLATION

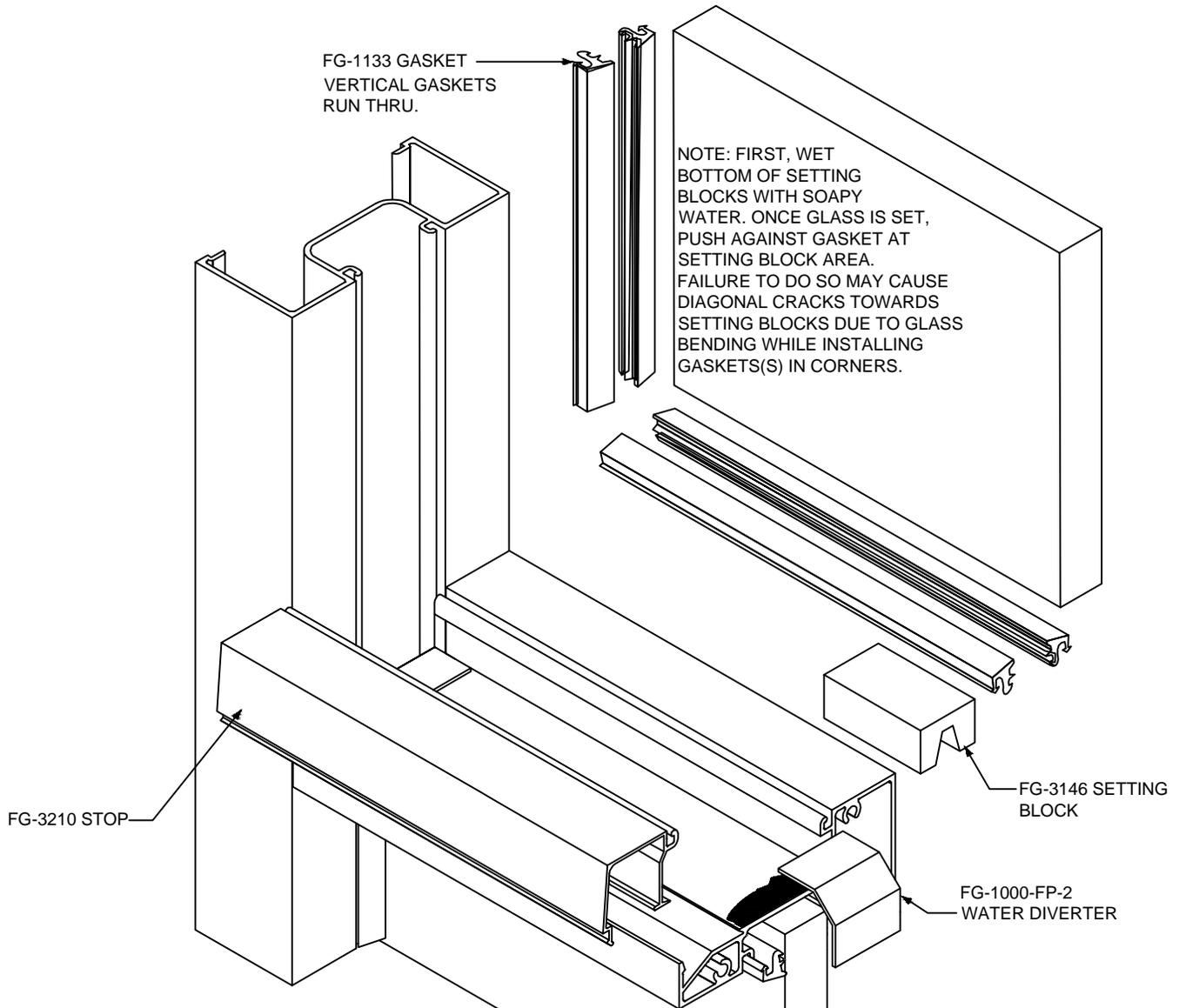


NOTE: SILL FLASHING SHOULD BE LEVEL AND MAKE SURE IT IS NOT TILTED TOWARD THE INTERIOR.

OUTSIDE GLAZED-FRAME INSTALLATION



OUTSIDE GLAZED-GLAZING PROCEDURE



GLAZING INSTALLATION INSTRUCTIONS

GLASS SIZING:

5/8" OVER DAY LIGHT OPENING

SETTING BLOCK:

SET AT 1/4 POINT OR 1/8 POINT OF HORIZONTAL LENGTH
DEPENDING ON LITE SIZE.

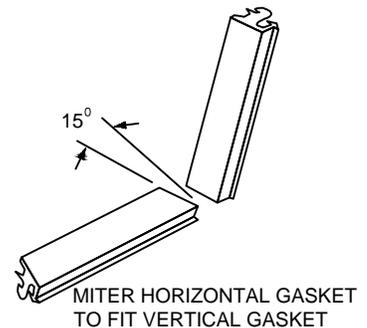
WATER DIVERTERS:

GLAZE FROM BOTTOM TO TOP. INSTALL WATER DIVERTERS IN HORIZONTAL
ABOVE, AFTER LITE BELOW IS IN POSITION.

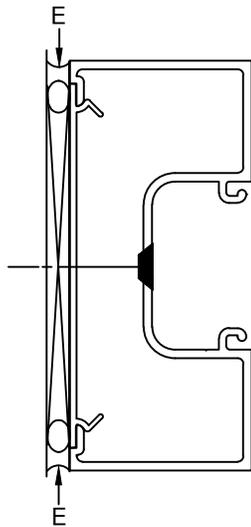
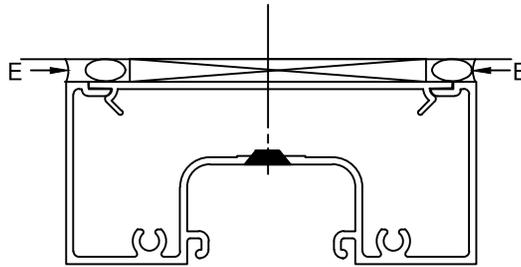
GLAZING GASKET:

GASKET MAY BE INSTALLED ON ONE OR BOTH SIDES SIMULTANEOUSLY.
PROVIDE 3/8" ADDITIONAL GASKET FOR EACH FOOT OF DAYLIGHT OPENING
TO PROVIDE ADEQUATE COMPRESSION FOR THE GLAZING INFILL .

NOTE: CLEAN GASKET WITH ISOPROPYL ALCOHOL PRIOR TO SEALING
CORNERS.



OUTSIDE GLAZED-SILL INSTALLATION AND PERIMETER SEAL

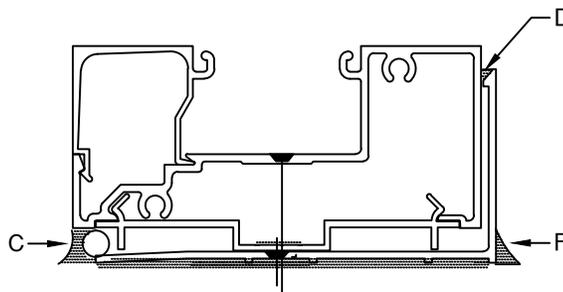


SHIM UNDER SILL FLASHING

SPACE BETWEEN SILL AND FLASHING (C) TO BE CONTINUOUSLY SEALED EXCEPT FOR 1/2" - 3/4" SPACE UNDER VERTICAL MULLIONS FOR WEEPAGE. ONCE THE WALL IS SECURED, SEAL GROOVE (D) BETWEEN SILL FLASHING AND BACK OF SILLS.

THE QUALITY OF THE INSIDE AND OUTSIDE PERIMETER SEALS (C AND E) MAY BE IMPROVED BY USING FG-2122 FILLER. THE PART MAY BE USED IN FULL LENGTHS. ITS PURPOSE IS TO PROVIDE SUPPORT FOR THE BACKER ROD REGARDLESS OF JOINT SIZE. PERIMETER SEAL (F) IS THE COSMETIC PURPOSES AND IS OPTIONAL.

NOTE: 1/2" - 3/4" WEEP HOLE REQUIRED IN SEALANT AT FLASHING (C) AT CENTER LINE OF MULLION.



STANDARD FRAMING

ITEM	DESCRIPTION
 FG-2122	Filler
 FG-2169	Sub Sill
 FG-2182	Sill Filler
 FG-3100	Jamb Mullion
 FG-3101	Mullion
 FG-3102	Pocket Filler
 FG-3103	Head/Jamb
 FG-3142	Horizontal
 FG-3161	Sill
 FG-3164	Pocket Filler
 FG-3210	Glass Stop

PARTS LIST

STANDARD ACCESSORIES

ITEM	DESCRIPTION
 FG-1133	Exterior Glazing Gasket
 FG-3146	Setting Block
 FS-8	#14 x 1" HHSTS B point Assembly Screw
 FG-1000-FP-2	Water Diverter for Flush Glazed Horizontals
 FG-2000-FP-4	Sill Flashing End Dam
 RS-1	Steel Reinforcement
 RS-10	Steel Reinforcement
 SM-5601	Joint Sealant Tape 1/8" x 1/2" x 30' roll