



**SERIES 487 CENTER GLAZED
SLIDING DOOR WITH 1-1/2" TRIM
STOCK FRAME KIT
"WALL WRAP"**



GENERAL INSTALLATION NOTES

Recommended Guidelines For All Installations:

1. **REVIEW CONTRACT DOCUMENTS.** Check shop drawings, installation instructions, architectural drawings, and shipping lists to become thoroughly familiar with the project. The shop drawings take precedence and include specific details for the project. Note any **field verified** notes on the shop drawings prior to installing. The installation instructions are of a general nature and cover most conditions.
2. **INSTALLATION.** All materials are to be installed plumb, level, and true. Install operable windows preglazed only.
3. **BENCH MARKS.** All work should start from bench marks and/or column lines as established by the architectural drawings and the general contractor with guaranteed accuracy. Working from these datum points and lines determine:
 - a) The plane of the wall in reference to offset lines provided on each floor.
 - b) The finish floor lines in reference to bench marks on the outer building columns.
 - c) Mullion spacing from both ends of masonry opening to prevent dimensional build-up of daylight opening.
4. **FIELD WELDING.** All field welding must be adequately shielded to avoid any splatter on glass or aluminum. Results will be unsightly and/or structurally unsound. Advise general contractor and other trades accordingly. All field welds of steel anchors must receive touch-up paint (zinc chromate) to avoid rust.
5. **SURROUNDING CONDITIONS.** Make certain that construction which will receive your materials is in accordance with the contract documents. If not, notify the general contractor in writing and resolve differences before proceeding with work.
6. **ISOLATION OF ALUMINUM.** Aluminum to be placed in direct contact with uncured masonry or incompatible materials should be isolated with a heavy coat of zinc chromate or bituminous paint.
7. **SEALANTS.** Sealants must be compatible with all materials with which they have contact, including other sealant surfaces. Consult with sealant manufacturer for recommendations relative to joint size, shelf life, compatibility, cleaning, priming, tooling, adhesion, etc. It is the responsibility of the **Glazing Contractor** to submit a statement from the sealant manufacturer indicating that glass and glazing materials have been tested for compatibility and adhesion with glazing sealants, and interpreting test results relative to material performance, including recommendations for primers and substrate preparation required to obtain adhesion. The chemical compatibility of all glazing materials and framing sealants with each other and with like materials used in glass fabrication must be established. This is required on every project.
8. **FASTENING.** Within the body of these instructions "fastening" means any method of securing one part to another or to adjacent materials. Only those fasteners used within the system are specified in these instructions. Due to the varying perimeter conditions and performance requirements, perimeter and anchor fasteners are not specified in these instructions. For perimeter and anchor fasteners refer to the shop drawings or consult the fastener supplier.
9. **BUILDING CODES.** Due to the diversity in state/provincial local, and federal laws and codes that govern the design and application of architectural products, it is the responsibility of the individual architect, owner, and installer to assure that products selected for use on projects comply with all the applicable building codes and laws. U.S. Aluminum exercises no control over the use or application of its products, glazing materials, and operating hardware and assumes no responsibility thereof.
10. **EXPANSION JOINTS.** Expansion joints and perimeter seals shown in these instructions and in the shop drawings are shown at normal size. Actual dimensions may vary due to perimeter conditions and/or difference in metal temperature between the time of fabrication and the time of installation. Gaps between expansion members should be based on temperature at time of installation.
11. **COORDINATION WITH OTHER TRADES.** Coordinate with the general contractor any sequence with other trades which offset curtain wall installation (i.e. fire proofing, back-up walls, partitions, ceilings, mechanical ducts, converters, etc.)
12. **CARE AND MAINTENANCE.** Final cleaning of exposed aluminum surfaces should be done in accordance with AAMA 609.1 for anodized aluminum and 610.1 for painted aluminum.

HANDLING, STORAGE, AND PROTECTION OF ALUMINUM

The following precautions are recommended to protect the material against damage. Following these precautions will help ensure early acceptance of your products and workmanship.

- A. HANDLE CAREFULLY.**
All aluminum materials at job site must be stored in a safe place, well removed from possible damage by other trades. Cardboard wrapped or paper interleaved materials must be kept dry.
- B. CHECK ARRIVING MATERIALS.**
Check for quantities and keep records of where various materials are stored.
- C. KEEP MATERIALS AWAY FROM WATER, MUD, AND SPRAY.**
Prevent cement, plaster or other materials from damaging the finish.
- D. PROTECT THE MATERIALS AFTER ERECTION.**
Protect erected frame with polyethylene or canvas splatter screen. Cement, plaster, terrazzo, other alkaline solutions, and acid based materials used to clean masonry are harmful to the finish. ***If any of these materials come in contact with the aluminum, immediately remove with water and mild soap.***

IMPORTANT: READ THIS MANUAL THOROUGHLY BEFORE BEGINNING INSTALLATION

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SYSTEM REQUIREMENTS

Maximum wall thickness: 4-7/8" (124 mm).

Maximum weight per sliding door: 100 lbs (45 kg) each.

Maximum unsupported total load on each sill: 50 lbs (23 kg) each.

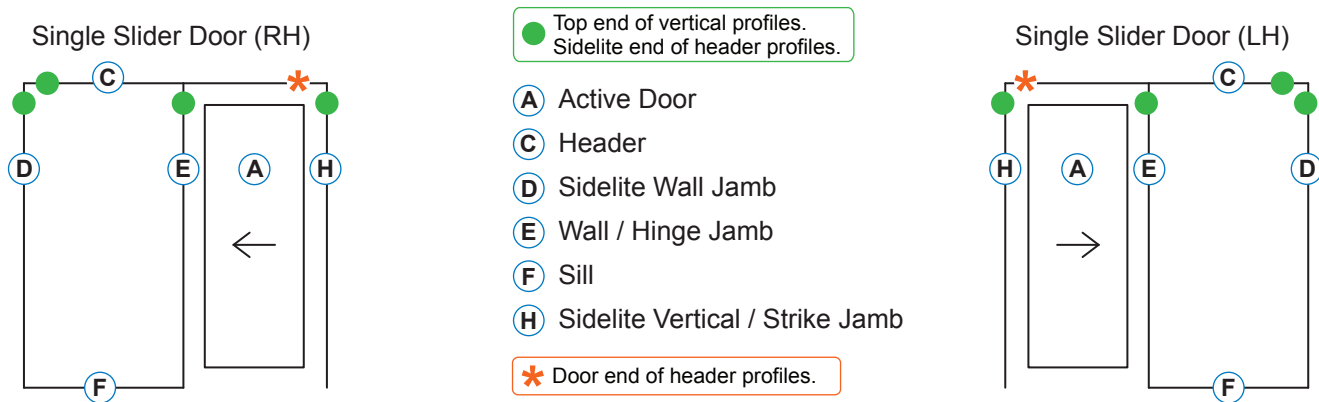
Note: Additional shim support under the sill member is required for any loads over 50 lbs (23 kg).

Interior use only.

EXTRUSION IDENTIFICATION

This kit has been carefully fabricated, inspected, and packaged. We have placed an Indicator Label on the inside or back side of each part before final packaging. Use the Identification Key (below) to organize and lay out your kit before proceeding with the assembly process.

Note: Kits provide finished frame sizes as noted with no field cutting necessary. If modification to frame size is required, profiles may be cut to fit your dimensions. Vertical profiles are marked at the top with a green dot. Header profiles are marked at the sidelite end with a green dot and at the door end with a red dot. Be sure to identify the correct end before beginning. When cutting some extrusions you will also have to do some minor drilling to replace or relocate the prep required for proper installation.



FRAME KIT DIMENSIONS

NOTE: All Frame Kits are available in 11 and 22 Finishes and are fabricated as Left or Right Handed for Wall Wrap Installation. Jamb Kits are fabricated with A/R 1850 Lock, Flush Lock or No Lock. Profiles are cut to dimensions listed below. OAF = Overall Frame. DO = Door Opening

HEAD AND SILL KITS

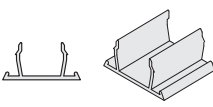
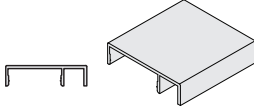
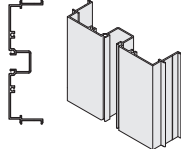
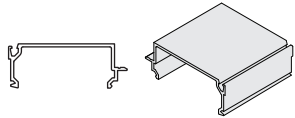
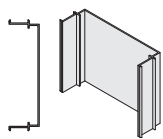
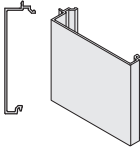
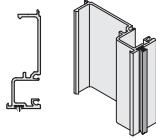
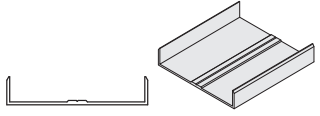
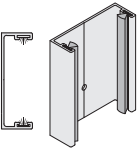
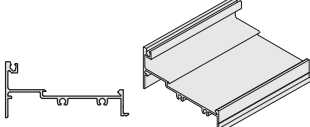
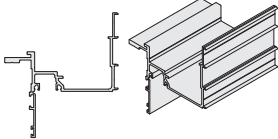
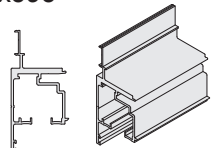


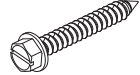


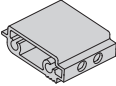
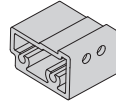

Kit Part Number	OAF Width	DO Width	Header Length	Sill, Glass Stop and Floor Track Length
487SWH84L_ 487SWH84R_	84" (2134 mm)	36" (914 mm)	81" (2057 mm)	42-3/4" (1086 mm)
487SWH120L_ 487SWH120R_	120" (3048 mm)	42" (1067 mm)	117" (2972 mm)	72-3/4" (1848 mm)

JAMB KITS

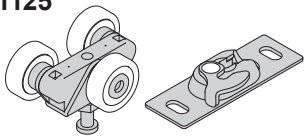
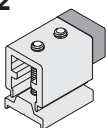
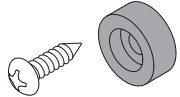
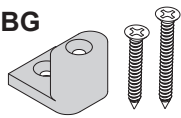
Kit Part Number	OAF Height	DO Height	Wall Jamb Length	Intermediate Vertical Length	Receiver Length
487SWJ96AL_ 487SWJ96AR_ 487SWJ96FL_ 487SWJ96FR_ 487SWJ96L_ 487SWJ96R_	100-3/4" (2559 mm)	96" (2438 mm)	99-3/4" (2534 mm)	97-3/4" (2483 mm)	96" (2438 mm)
487SWJ120AL_ 487SWJ120AR_ 487SWJ120FL_ 487SWJ120FR_ 487SWJ120L_ 487SWJ120R_	124-3/4" (3169 mm)	120" (3048 mm)	123-3/4" (3143 mm)	121-3/4" (3093 mm)	120" (3048 mm)

PARTS IDENTIFICATION


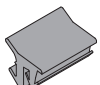
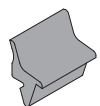
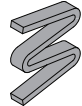
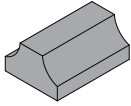
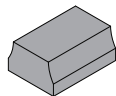
PART NUMBERS INCLUDED IN HEAD / SILL AND JAMB KITS

<p>P050</p>  <p>1/4" Pocket Insert</p>	<p>487x015</p>  <p>1-1/2" Trim Strip</p>	<p>487x501</p>  <p>Wall Jamb</p>	<p>487x504</p>  <p>Glazing Stop</p>
<p>487x509</p>  <p>Door Jamb</p>	<p>487x573</p>  <p>Intermediate Vertical</p>	<p>487x572</p>  <p>Door Jamb</p>	<p>487x575</p>  <p>Floor Track</p>
<p>487x576*</p>  <p>Door Receiver</p>	<p>487x580*</p>  <p>Sill</p>	<p>487x594</p>  <p>Interior Main Header (Wall Wrap)</p>	<p>487x595</p>  <p>Sliding Door Header (Wall Wrap)</p>
<p>20061601</p>  <p>#6-20 X 1/2" PHP SDS</p>	<p>ST206</p>  <p>#8 X 1/2" PH SMS for Shear Block</p>	<p>ST266</p>  <p>#12 X 1" HWH SMS</p>	<p>ST286</p>  <p>#12 X 2" HWH SMS</p>
<p>6X158DWS</p>  <p>#6 X 1-5/8" FHF SPDS</p>	<p>487SBF</p>  <p>Small Shear Block</p>	<p>487SBTT</p>  <p>Large Shear Block</p>	<p>22027045BK</p>  <p>Felt for Mullions</p>

PART NUMBERS INCLUDED IN HARDWARE KIT

<p>1125*</p>  <p>Wheel with Mounting Bracket</p>	<p>487TTS22</p>  <p>Door Stop</p>	<p>58X14RB</p>  <p>Rubber Bumper</p>	<p>487SBG</p>  <p>Door Guide (1/4-20 Fasteners Not Included)</p>
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GLAZING PART NUMBERS NOT INCLUDED (ORDER SEPARATELY AS NEEDED)

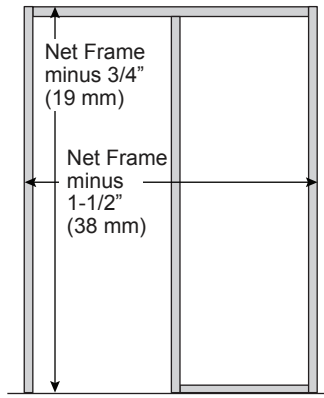
<p>NP225</p>  <p>for 1/4" Sidelite Glass</p>	<p>NP238</p>  <p>for 3/8" Sidelite Glass</p>	<p>NP563</p>  <p>for 9/16" Sidelite Glass</p>	<p>WB452</p>  <p>Edge Block</p>
<p>SB513</p>  <p>for 1/4", 3/8" Sidelite Glass</p>	<p>SB514</p>  <p>for 1/2", 9/16" Sidelite Glass</p>	<p>* Available through Technical Sales at (323) 588-1281 Ext. 15305</p>	

DRYWALL PREPARATION

When framing, position all metal studs so that the open side faces the rough opening. Use two sets of studs, stacked and finished for head. The icons in the illustrations below show the correct orientation.

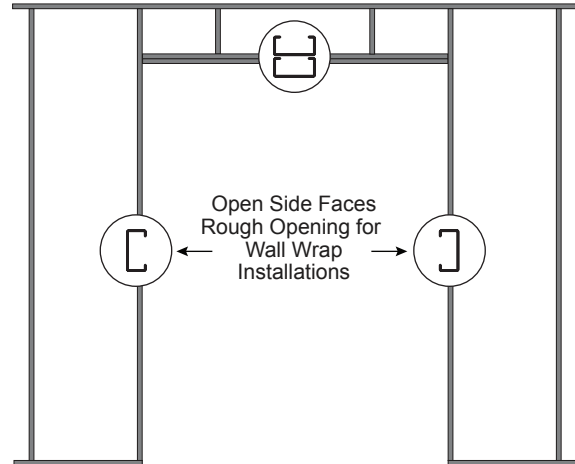
Refer to the CRL Shop Drawings for overall layout and to confirm dimensions. Contact Technical Sales for other situations at (800) 421-6144.

Rough Opening Calculation



Door with Sidelite

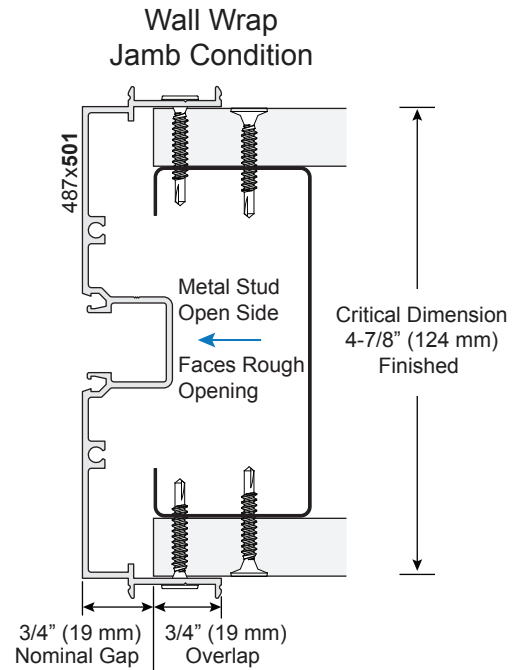
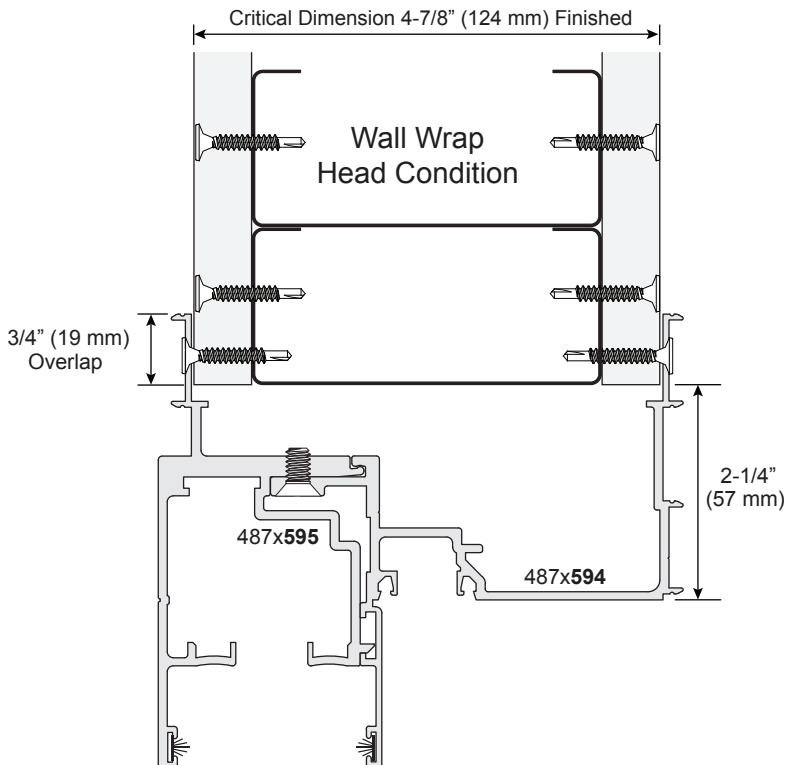
Metal Stud Orientation



DRYWALL INSTALLATION

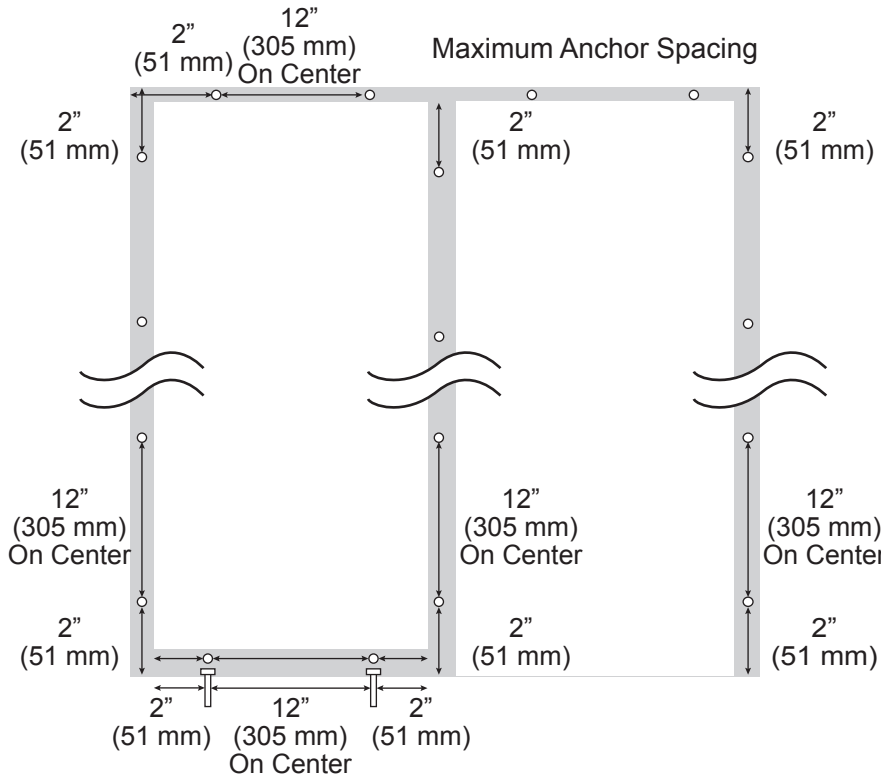
Ensure drywall thickness finishes at a standard 4-7/8" (124 mm). Cut the wallboard flush with the metal stud. Ensure the drywall is square and plumb. Note: The critical limitation for the finished wall is 4-7/8" (124 mm).

IMPORTANT: Provide adequate structural support for system.



INSTALLATION NOTES

The 487x504 glass stops should only be installed during the glazing process to avoid damage to the stops. The maximum unsupported load limit for each sill is 50 lbs (23 kg). Note: Additional shim support under the sill member is required for any loads over 50 lbs (23 kg).



50 lb. maximum load on sill without additional support.

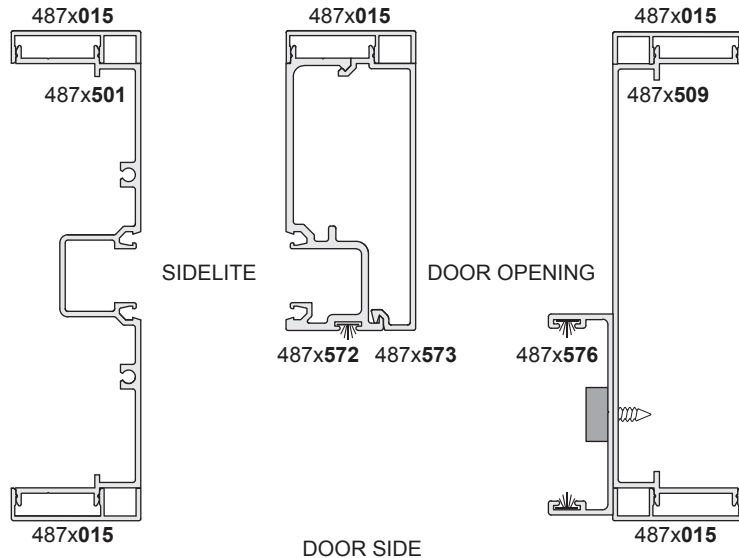


200 lb. maximum load per door.

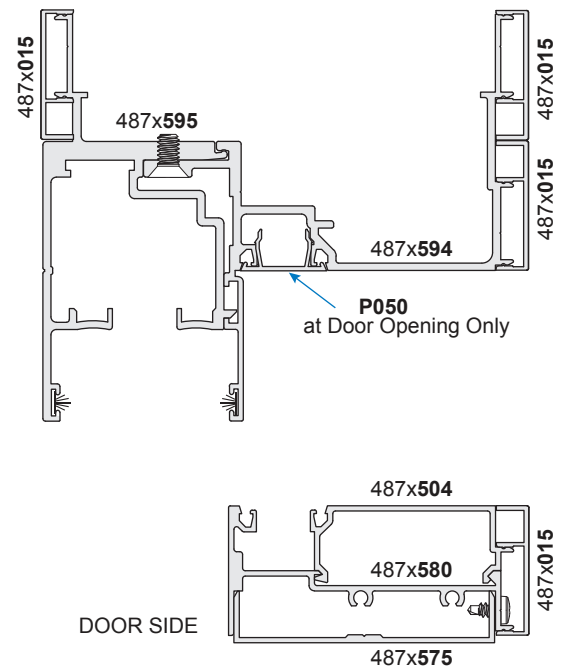
TYPICAL ASSEMBLED COMPONENTS

NOTE: Right Handed Sliding Door is shown in the illustrations in this manual. Door is at exterior.

VERTICALS



HEAD AND SILL

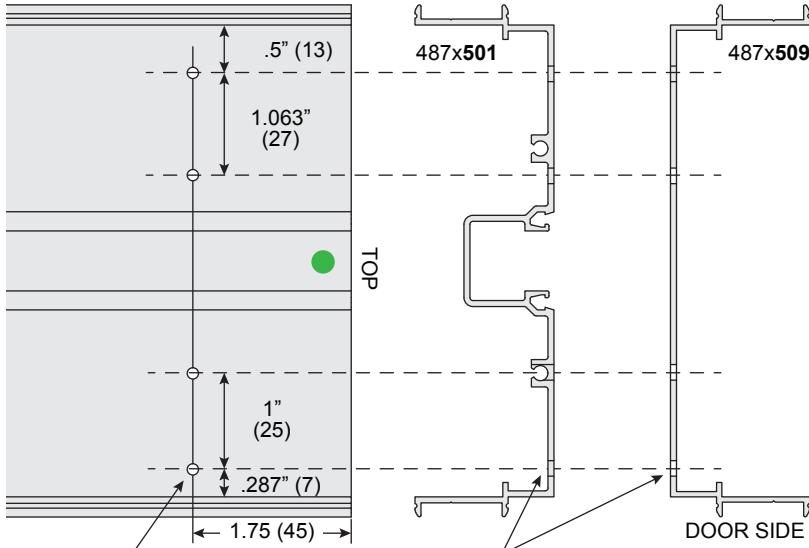


OPTIONAL FABRICATION: VERTICALS

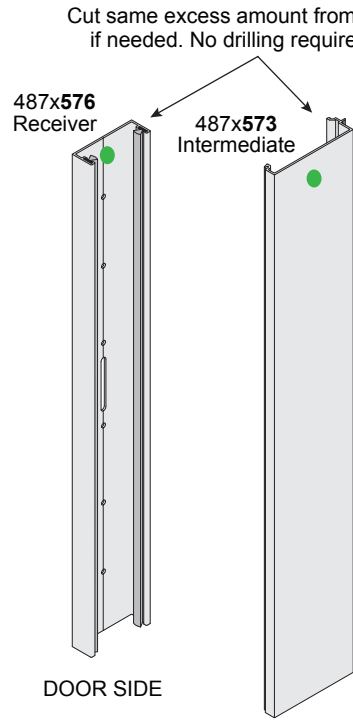
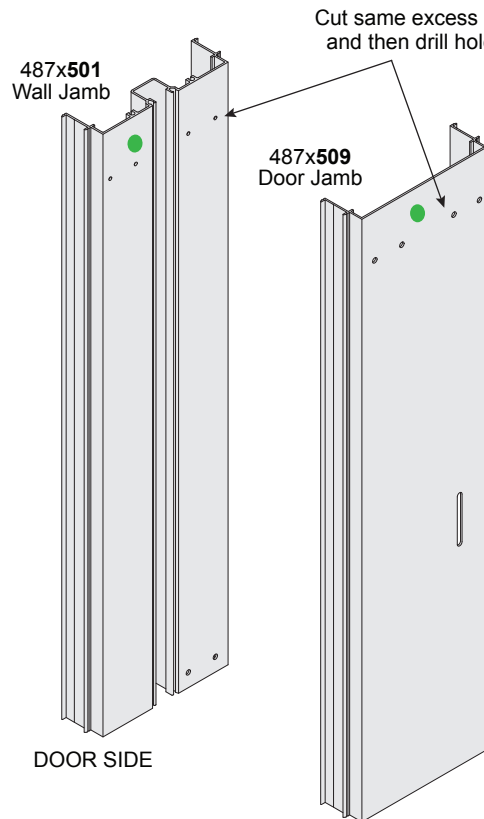
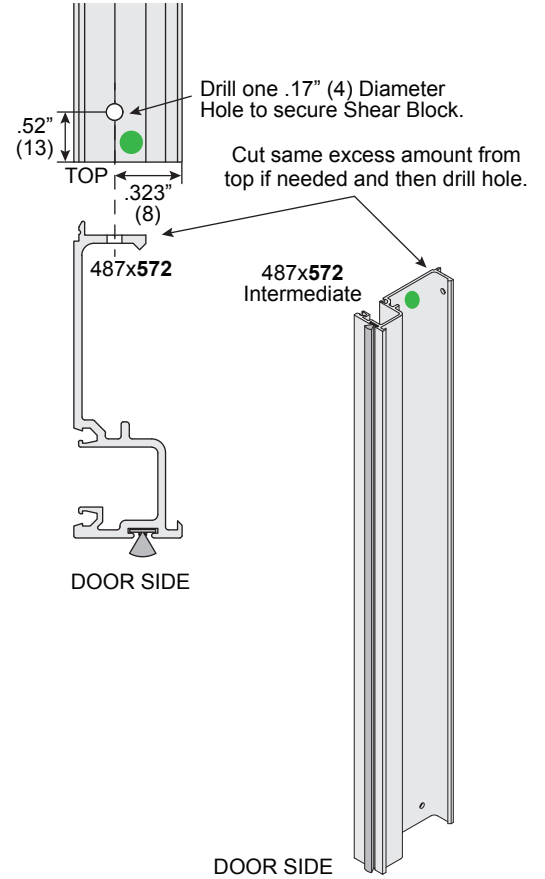
All verticals are cut to the correct height for either a 96" (2438) or 120" (3048) Door Opening, depending on the kit. If your Opening Height is less, **cut the same excess amount from the top** of the 487x509 Door and 487x509 Wall Jambs, 487x576 Door Receiver, and 487x572 and 487x573 Intermediate Verticals. When the frame is correct height for your installation, drill profiles at top as shown. **Look for the green dot placed at the top of vertical profiles. Cut and drill from this end only.**

ADJUSTING FRAME HEIGHT

IMPORTANT: Look for a Green dot placed at top of vertical profiles before starting.



Drill four .166" (4) Diameter Holes to install Shear Blocks at top of Jambs. Note orientation of profiles for your installation. Right Hand Sidelite shown.



NOTE: The Door Jamb and Receiver are prepped for either A/R 1850, Flush, or no Lock, depending on your order. There are no cutouts for kits ordered without locks. The cutouts for the two locks are shown below:

A/R 1850 Lock Flush Lock

Flush Lock is shown in this manual.

NOTE: Dimensions in parentheses () are millimeters unless otherwise noted.

OPTIONAL FABRICATION: HORIZONTALS

All horizontals are cut to the correct length for either a 36" (914) or 42" (1067) Door Opening, depending on the kit. **To adjust the width of your sidelite, cut the same excess amount from the sidelite end of the 487x594 Main Header and 487x595 Door Header. Cut the same excess amount from either end of the 487x504 Glass Stop, 487x580 Floor Track and 487x575 Sill.** When the frame is correct width, drill 487x594 Main Header at sidelite end.

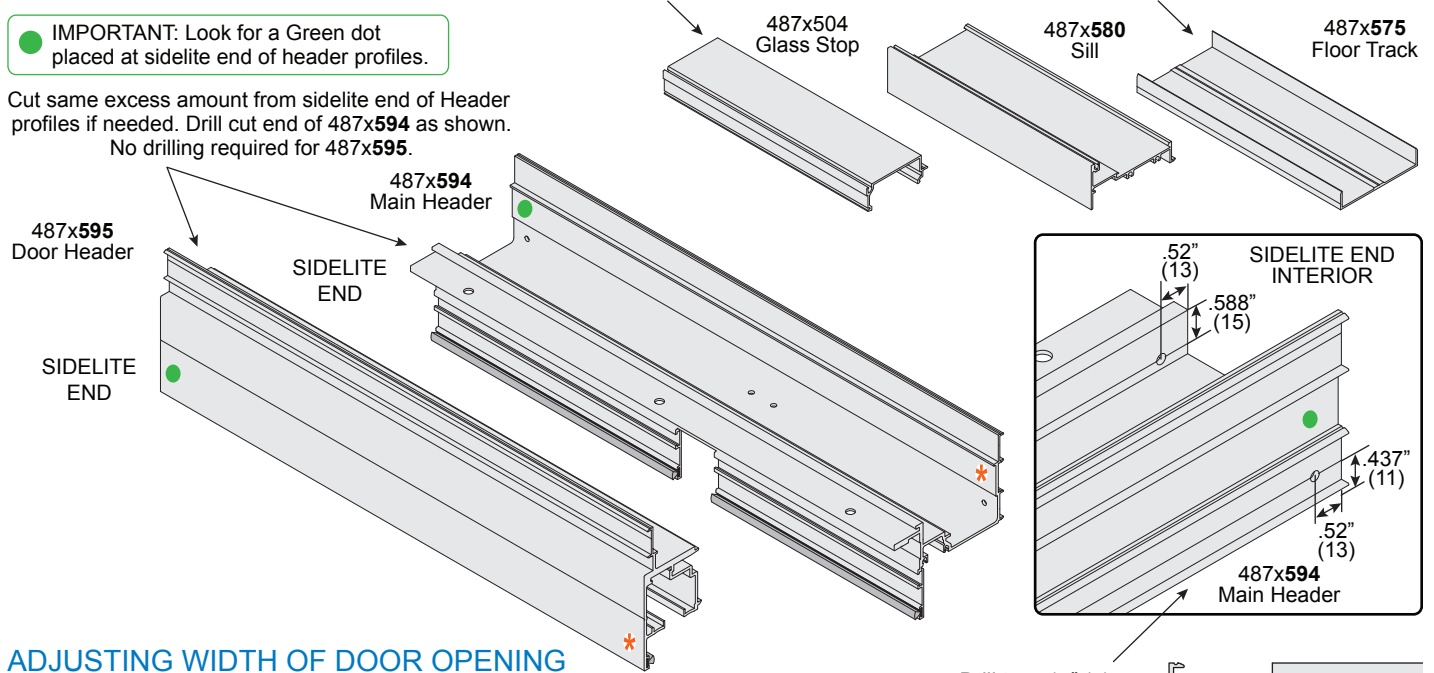
To Adjust the width of your door opening, cut the same excess amount from the door opening end of the 487x594 Main Header and 487x595 Door Header and drill 487x594 Main Header at door opening end. Do not cut the other profiles. **Look for a green dot placed at the sidelite side and a red dot placed on the door end of header profiles before beginning.**

ADJUSTING WIDTH OF SIDELITE

● IMPORTANT: Look for a Green dot placed at sidelite end of header profiles.

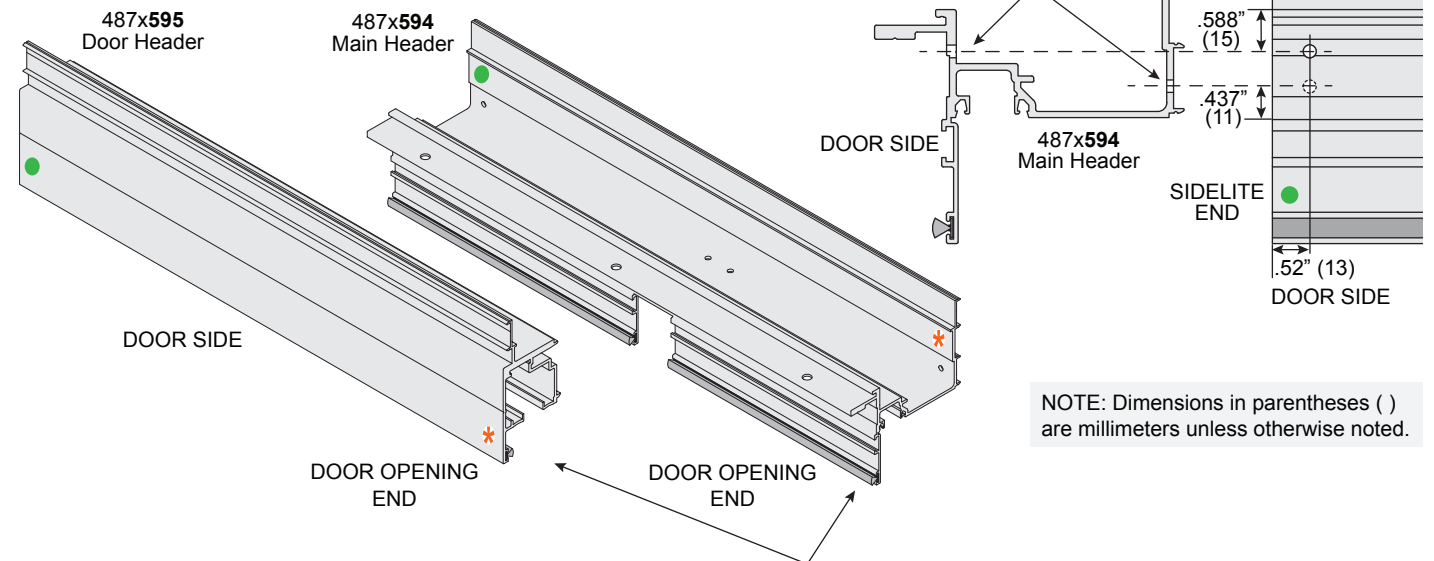
Cut same excess amount from sidelite end of Header profiles if needed. Drill cut end of 487x594 as shown. No drilling required for 487x595.

Cut same excess amount from one end of profiles if needed. No drilling required.



ADJUSTING WIDTH OF DOOR OPENING

*** IMPORTANT:** Look for a Red dot placed at door opening end of header profiles.



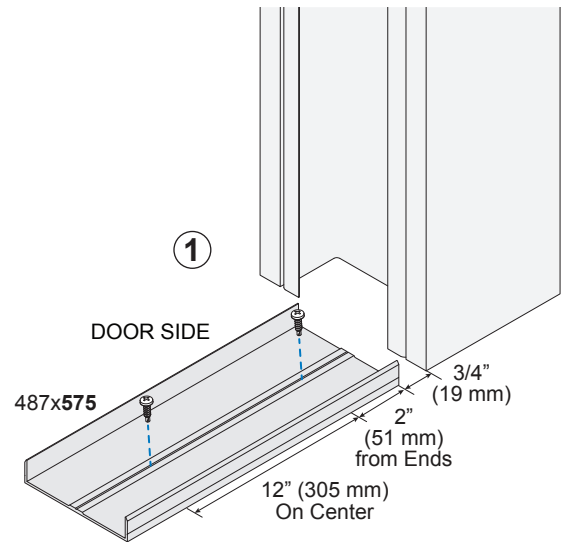
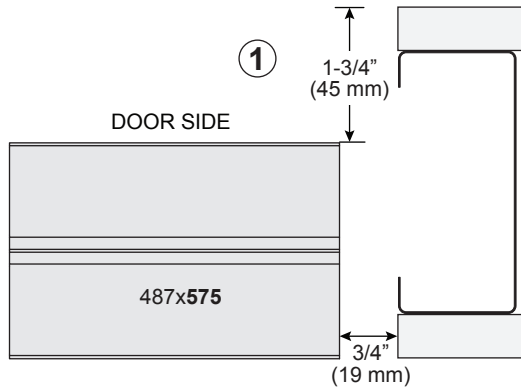
NOTE: Dimensions in parentheses () are millimeters unless otherwise noted.

Cut same excess amount from door opening end of header profiles if needed. Drill cut end of 487x594 using dimensions shown above. No drilling is required for 487x595. NOTE: Do not cut other horizontal profiles unless you are adjusting the width of the sidelite.

FRAME INSTALLATION

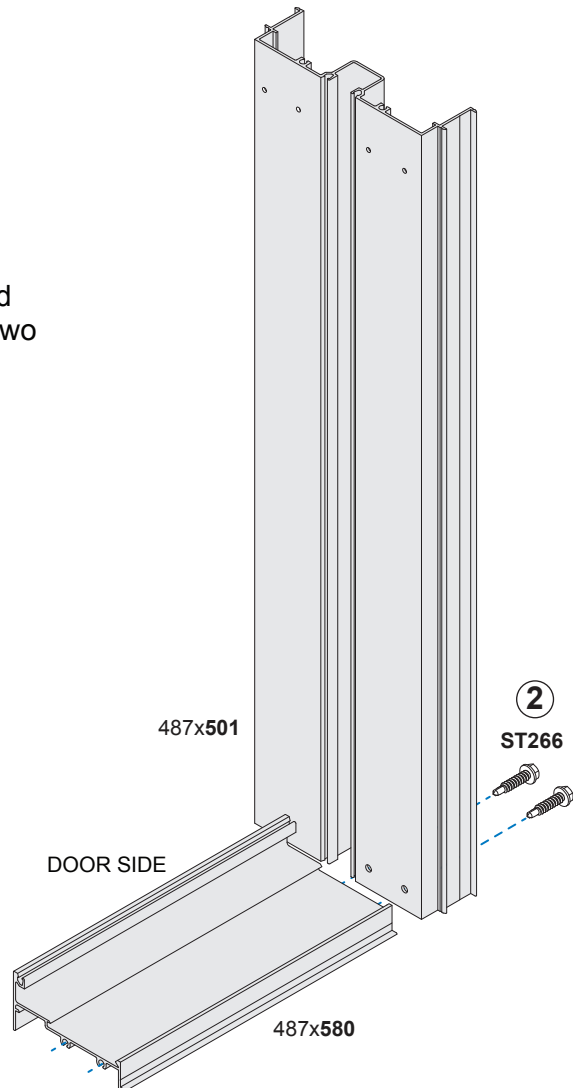
Install Floor Tracks

- ① Position Floor Track for each Sidelite as shown. Use fasteners appropriate for job site conditions to secure.



Attach Sill to Wall Jamb

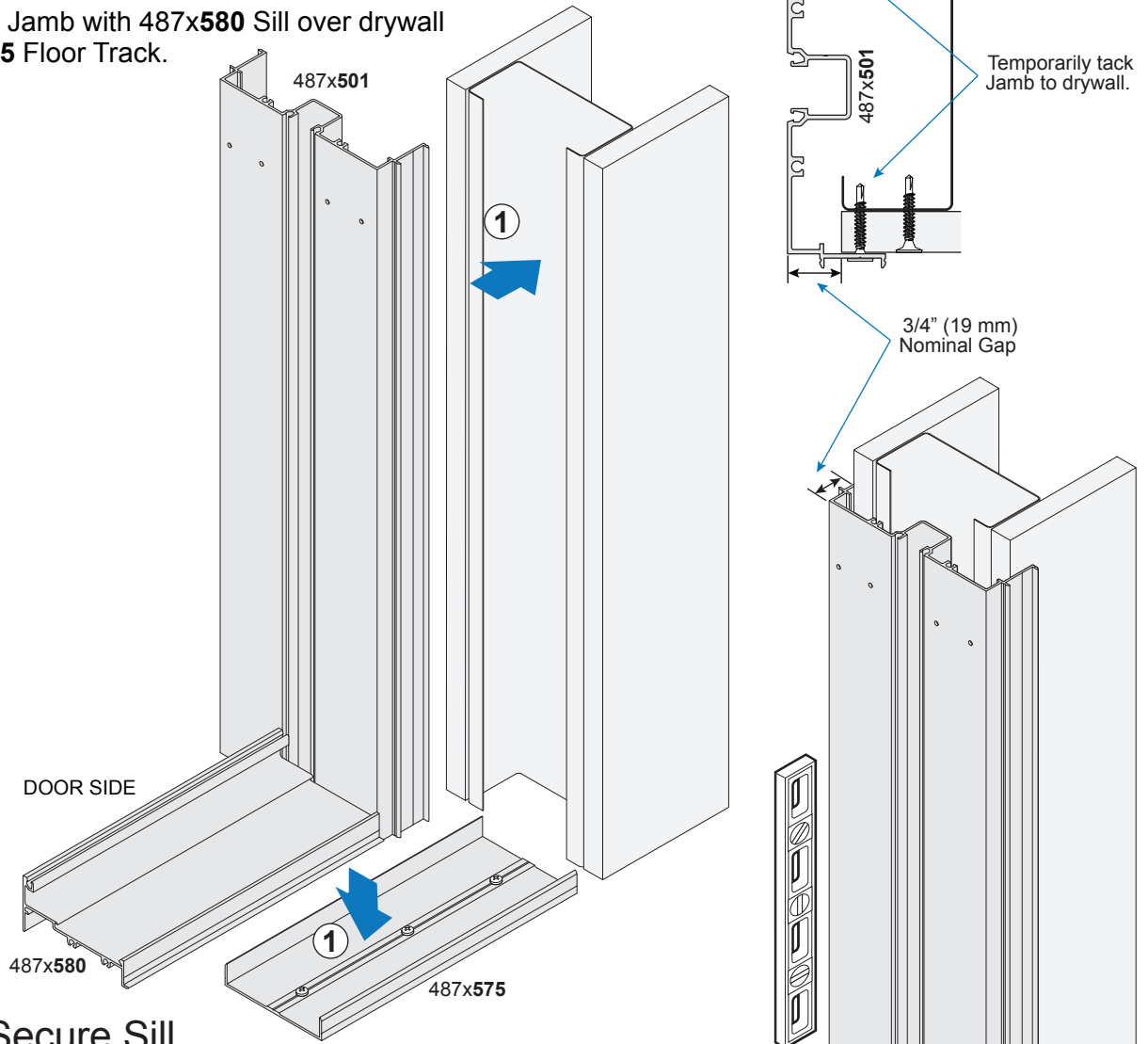
- ② Align screw races in 487x580 Sill to factory drilled pilot holes in 487x501 Wall Jamb. Secure using two **Cat. No. ST266** #12 x 1" HWH SMS.



FRAME INSTALLATION (CONTINUED)

Install Wall Jamb

- ① Fit 487x501 Jamb with 487x580 Sill over drywall and 487x575 Floor Track.

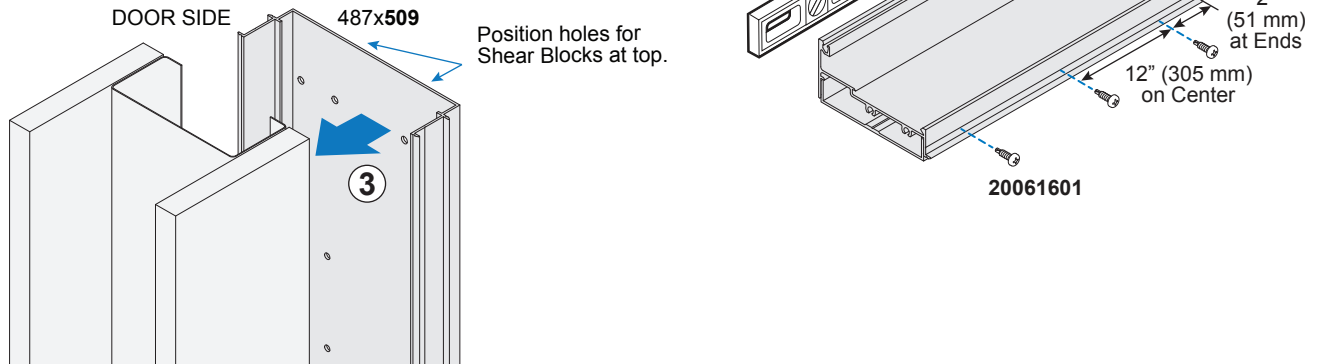


Level and Secure Sill

- ② Level Jamb and temporarily hold in place. Level Sill and secure to Floor Track using **Cat. No. 20061601** Self Drilling Screws.

Install Door Jamb

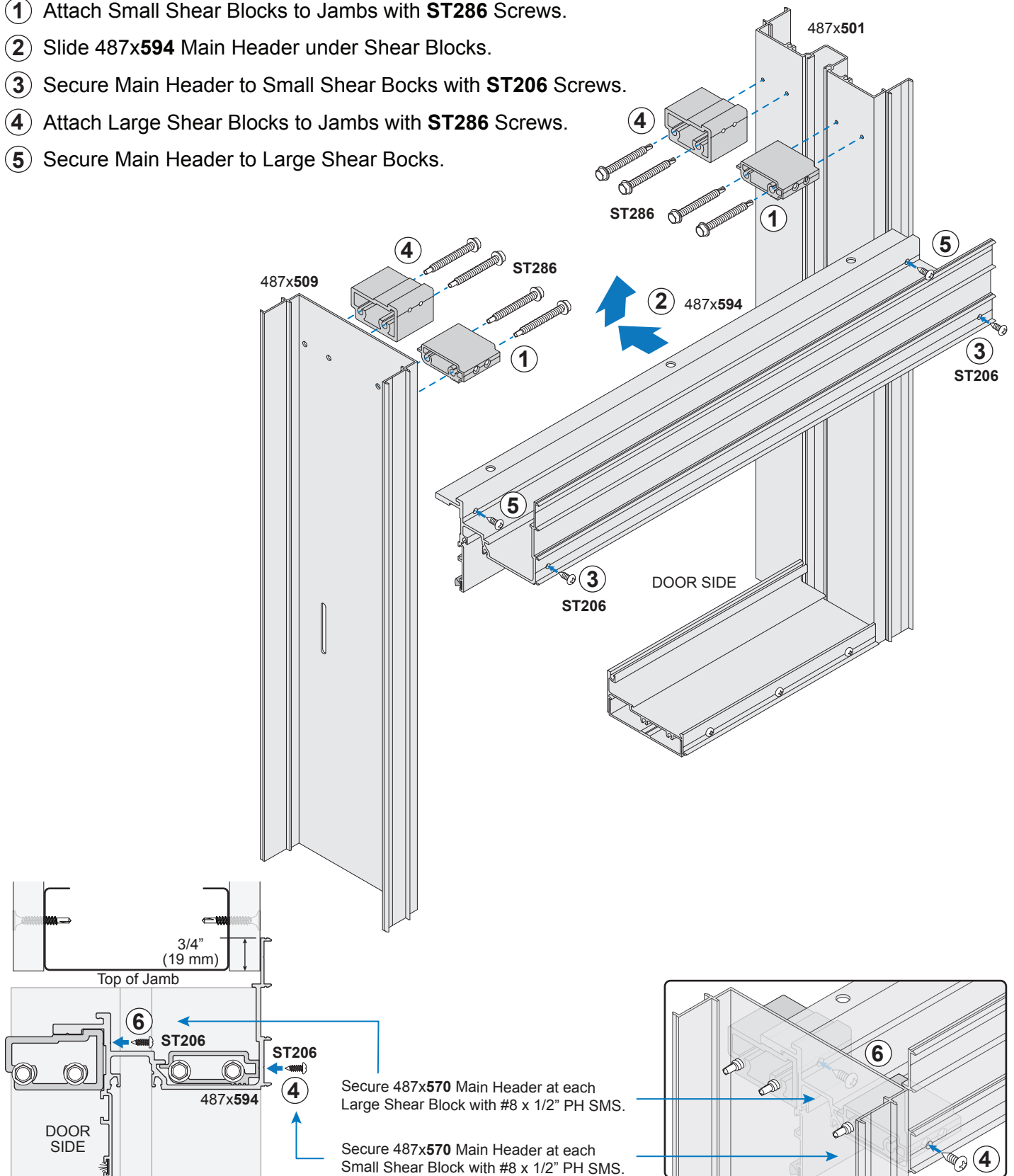
- ③ Fit 487x509 over drywall and temporarily hold in place.



FRAME INSTALLATION (CONTINUED)

Install Main Header

- ① Attach Small Shear Blocks to Jambs with **ST286** Screws.
- ② Slide 487x594 Main Header under Shear Blocks.
- ③ Secure Main Header to Small Shear Bocks with **ST206** Screws.
- ④ Attach Large Shear Blocks to Jambs with **ST286** Screws.
- ⑤ Secure Main Header to Large Shear Bocks.

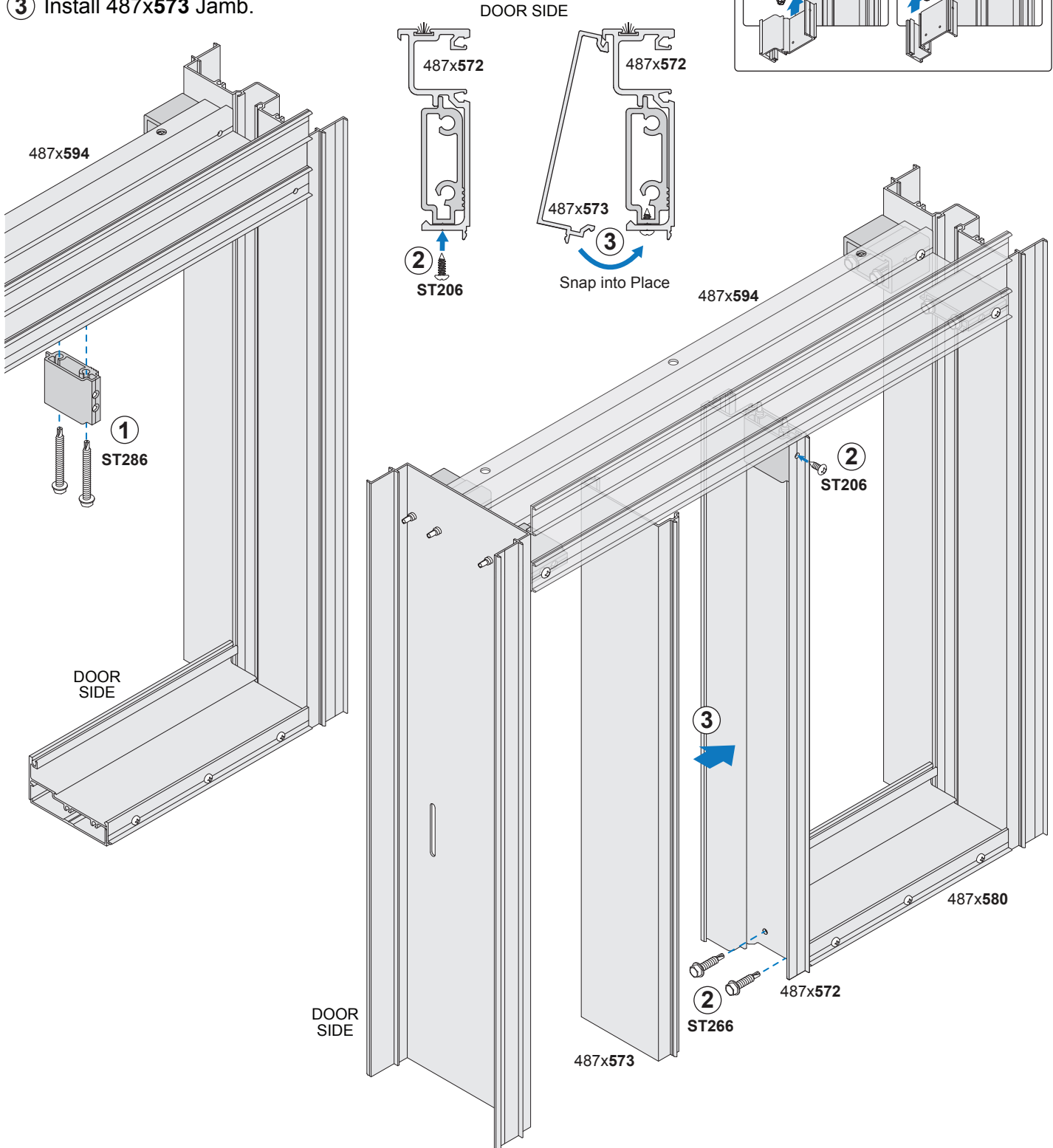
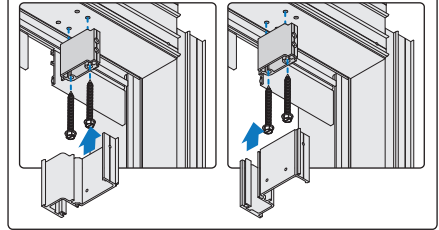


FRAME INSTALLATION (CONTINUED)

Install Sidelite Vertical and Door Jamb

- ① Attach Small Shear Blocks to 487x594 Main Header.
- ② Install 487x572 and secure at Shear Block and 487x580 Sill.
- ③ Install 487x573 Jamb.

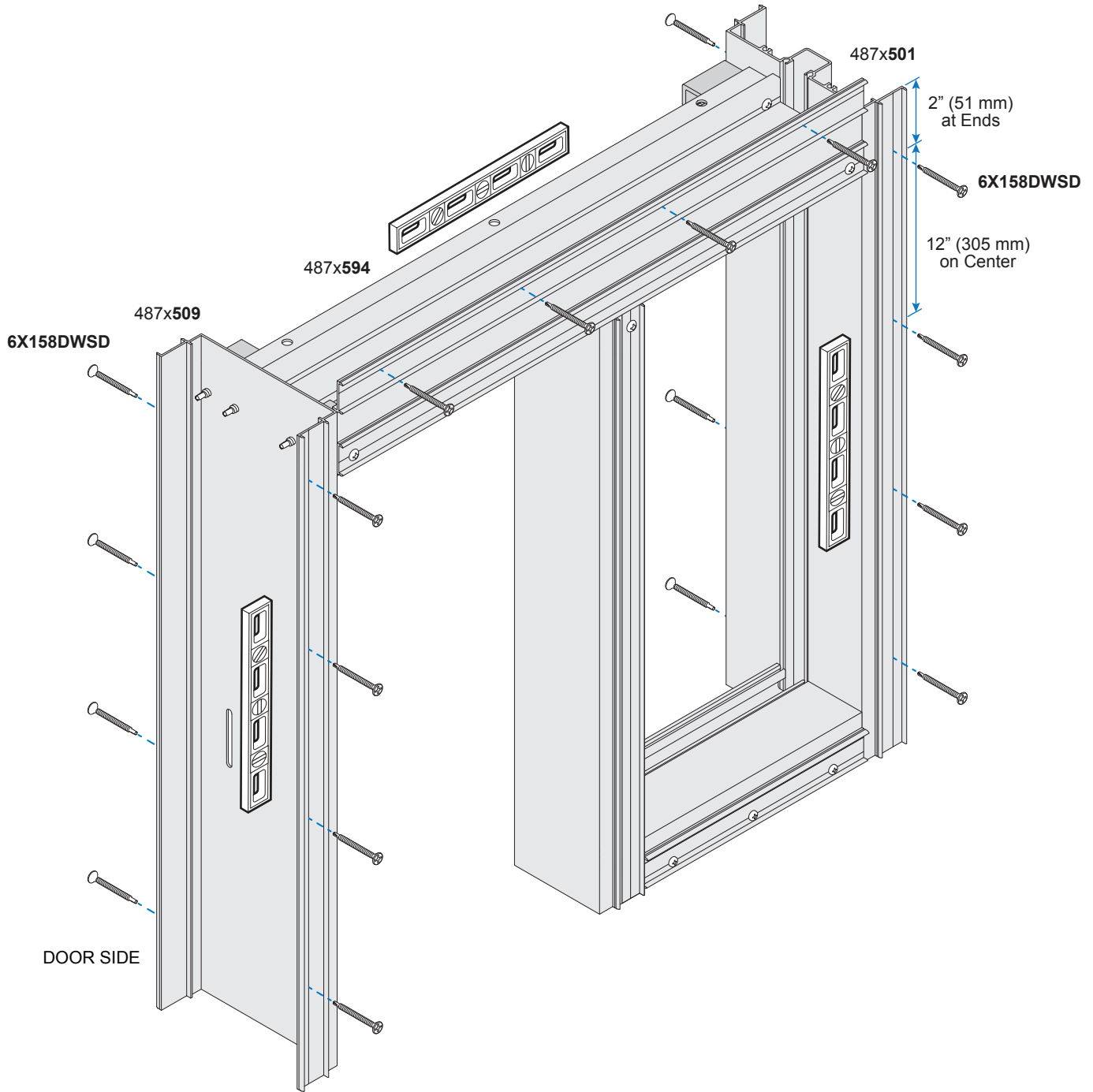
NOTE: Main Header fabricated for left and right sliding doors. Use appropriate 2 holes to install Shear Bocks for your installation.



FRAME INSTALLATION (CONTINUED)

Square Frame and Secure

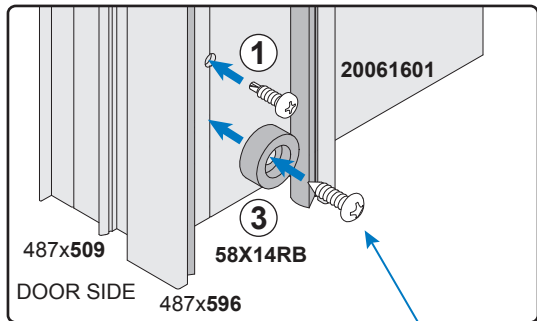
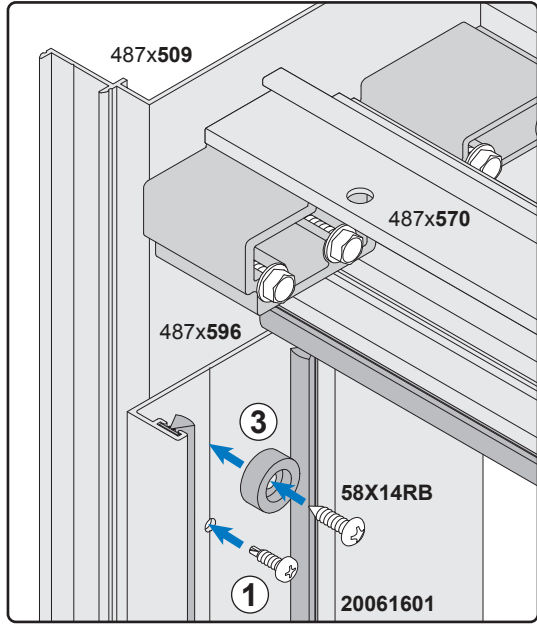
Use **Cat. No. 6X158DWSD** Drywall Screws to secure 487x509 and 487x501 Jambs at door side and interior and 487x594 Main Header at interior. Space screws 2" (51 mm) at ends and 12" (305 mm) on center.



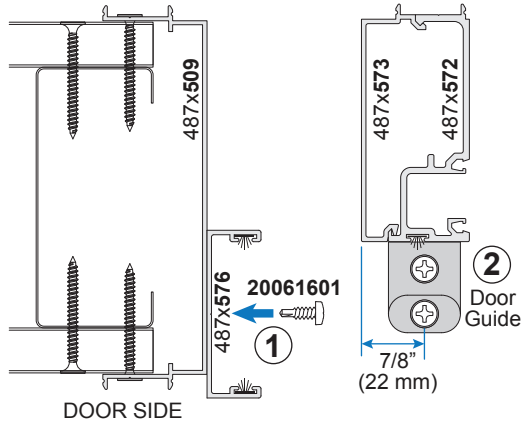
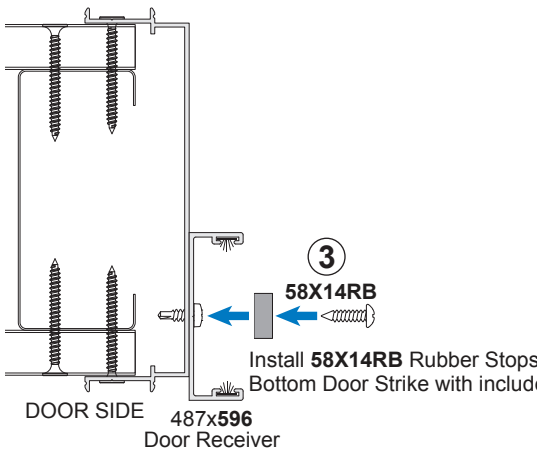
FRAME INSTALLATION (CONTINUED)

Install Door Receiver and Guide

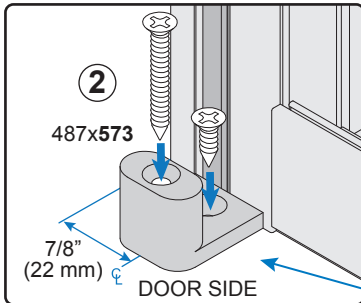
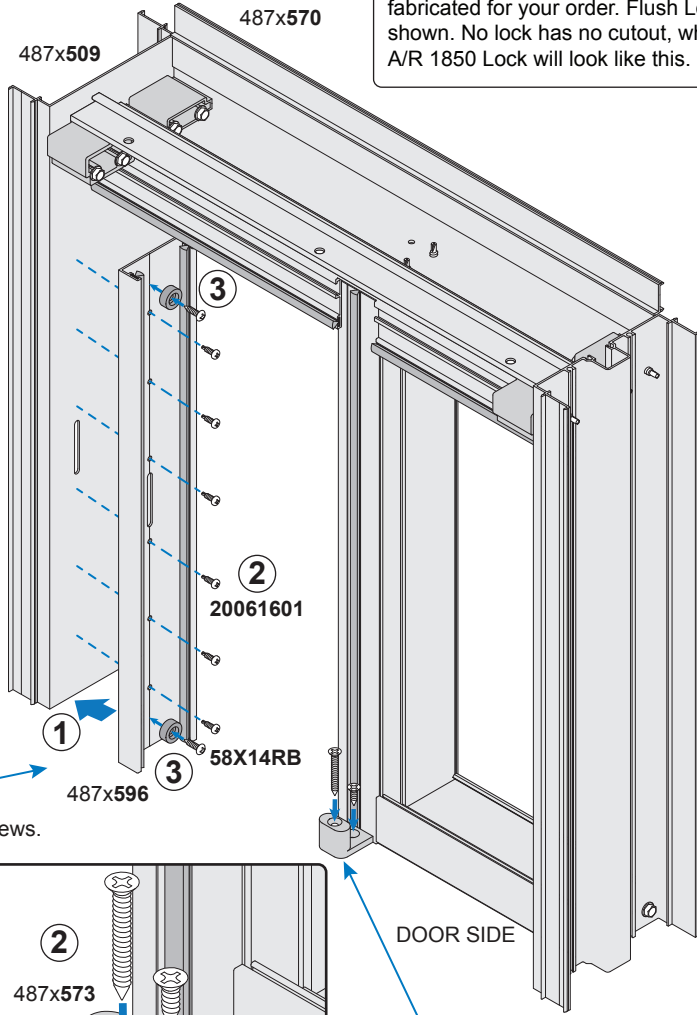
- ① Install 487x596 Door Receiver.
- ② Install Door Guide.
- ③ Install **58X14RB** Rubber Stops.



Match factory drilled holes and secure with **20061601** Screws.



NOTE: Door Jamb and Receiver fabricated for your order. Flush Lock shown. No lock has no cutout, while A/R 1850 Lock will look like this. →



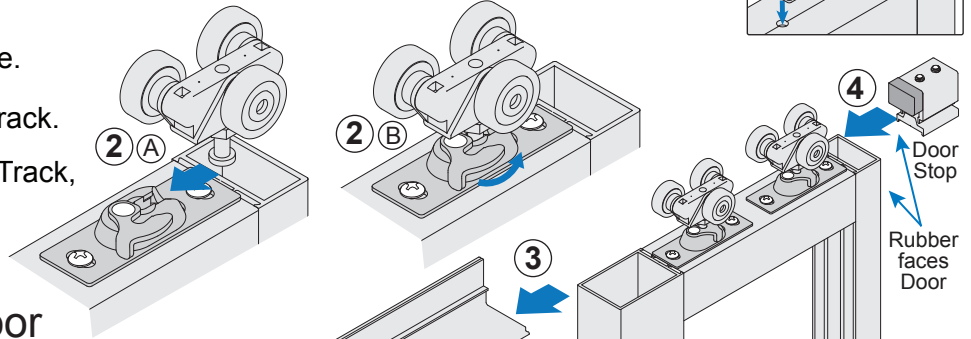
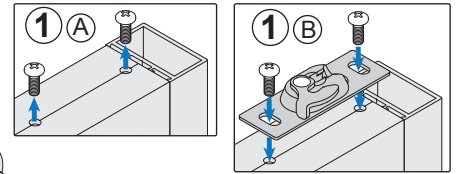
Place Door Guide Base tight to face of 487x573 Door Jamb with centerline inset 7/8" from edge. Secure with proper fasteners for your application (not included).

FRAME INSTALLATION (CONTINUED)

Prepare Door

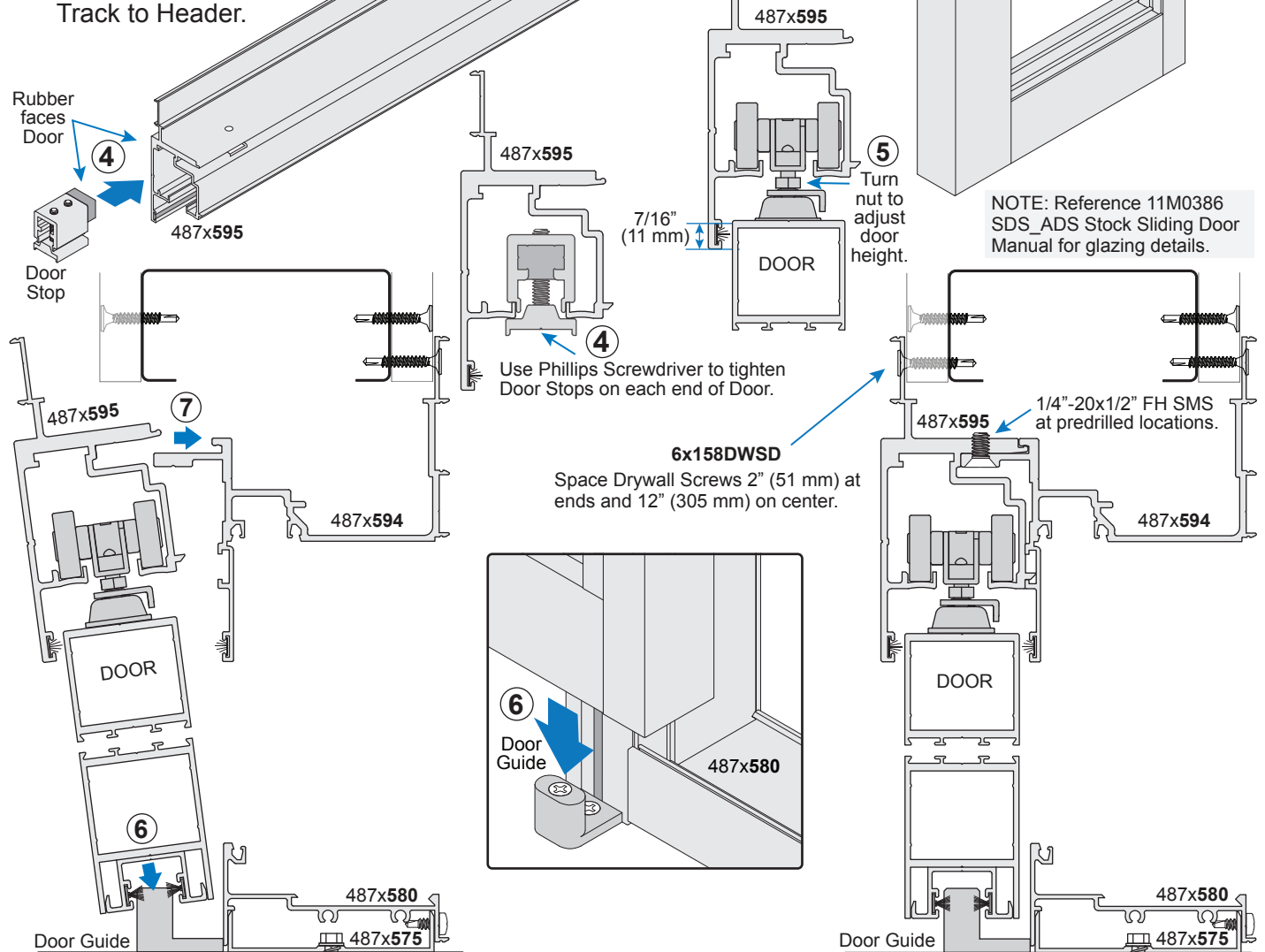
- ① Install Wheel Brackets.
- ② Install Wheels and lock in place.
- ③ Slide Door into 487x595 Top Track.
- ④ Slide two Door Stops into Top Track, one on each side of door.
- ⑤ Adjust door height.

NOTE: Fasteners are factory installed in SDS/ADS Stock Doors. Remove and use to install Brackets.



Install Top Track with Door

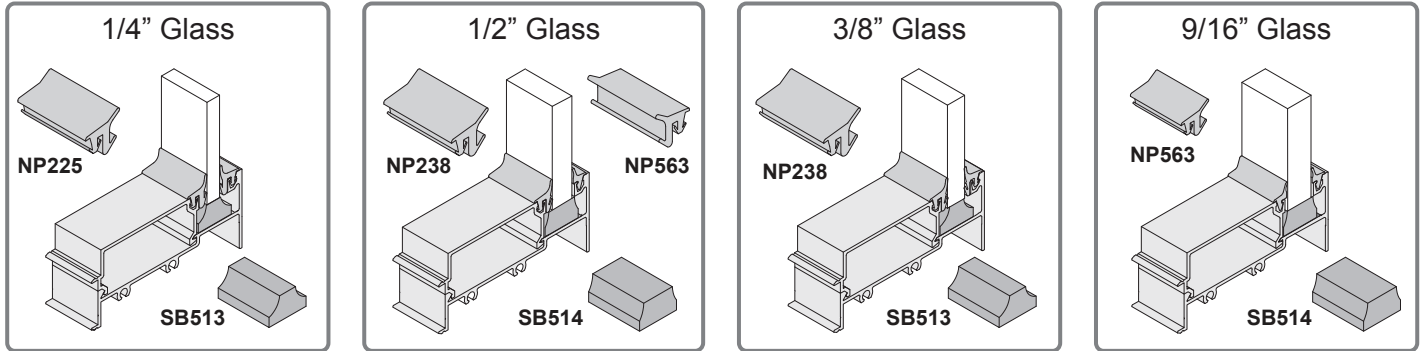
- ⑥ Place bottom of Door onto Door Guide.
- ⑦ Fit Top Track with Door into 487x595 Main Header.
- ⑧ Use included 1/4"-20x1/2" FHSMS to secure Track to Header.



SIDELITE GLAZING

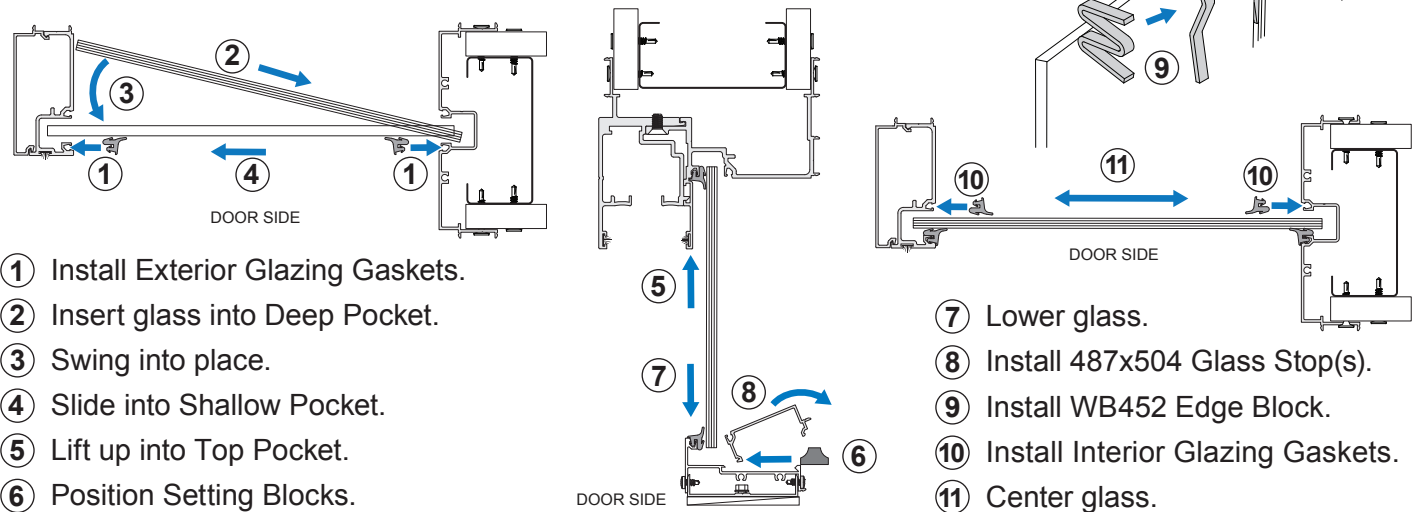
Glass Sizing and Glazing Components

GLASS SIZE = D.L.O. + 5/8" or 5/16" GLASS BITE EACH POCKET



Sidelite Glazing Sequence

Important: Maximum 50 lbs (23 kg) each Sidelite. Note: Additional shim support under the sill member is required for any loads over 50 lbs (23 kg).



POCKET FILLER AND TRIM INSTALLATION

NOTE: Refer to 11M0386 Stock Door Kit Manual to glaze door and install hardware before installing trim.

