



NEWCASTLE DOOR

DETAILED INSTALLATION INSTRUCTIONS

Door elevations shown in these instructions are as viewed from the exterior.



XO DOOR

'X' denotes the active or moving panel(s).

'O' denotes the inactive or fixed panel(s).



OX DOOR

NOTE: Newcastle is a pre-assembled door, we recommend removing the panels before moving the door around the construction site. Rough handling may damage the weld joint which could result in reduced product performance. Refer to assembly instructions if removing panels from the frame.

ROUGH OPENING

The rough opening should be made 1" wider and 1/2" higher than the actual door frame size.

Size	Frame			Rough Opening	
	Width	Height	Depth	Width	Height
5068	59-1/2"	79-1/2"	4-7/8"	60-1/2"	80"
6068	71-1/2"	79-1/2"	4-7/8"	72-1/2"	80"
8068	95-1/2"	79-1/2"	4-7/8"	96-1/2"	80"

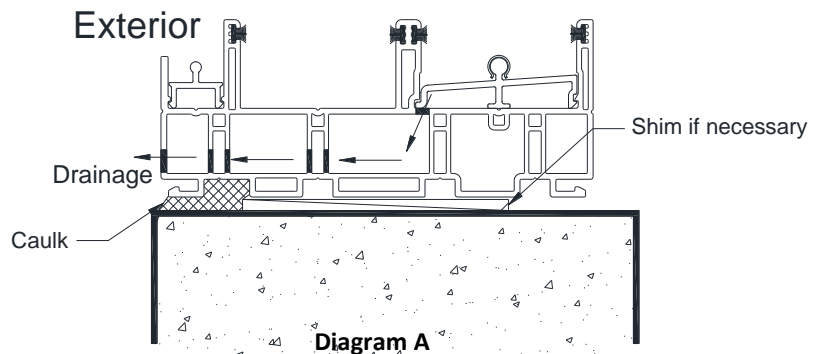
The sill or base of the opening must be solid, level, and of sufficient width and depth to support the entire door sill in a continuous and uniform manner.

It is important that the opening be plumb and square as the door will not perform to its potential if installed into an improperly prepared opening. Diagonal measurement should be $\pm 1/8"$.

FRAME INSTALLATION

The main frame is always installed with the drainage to the outside. **Ensure that the drainage slots are located on exterior.**

The sill must be installed level and uniformly supported from end to end and from front to back. Use a level, and use solid shims if necessary to compensate for unevenness in the opening.



Note: - Installation screws need to be specified with consideration to the building structure. Please refer to the building code in your area.

The jambs must be fastened within 6" of each corner and at mid height on doors up to 80" high.

Set shims behind frame installation holes to make the main frame plumb and square. Temporarily fasten the frame to the surrounding structure. **For doors with nailing fins, insert shims at the jamb corners to square the frame.** Using a level and measuring diagonally, check that the frame is straight, plumb and square. Make adjustments to the shims if necessary, and securely fasten all jamb screws. **Diagonal tolerance is $\pm 1/8"$.**

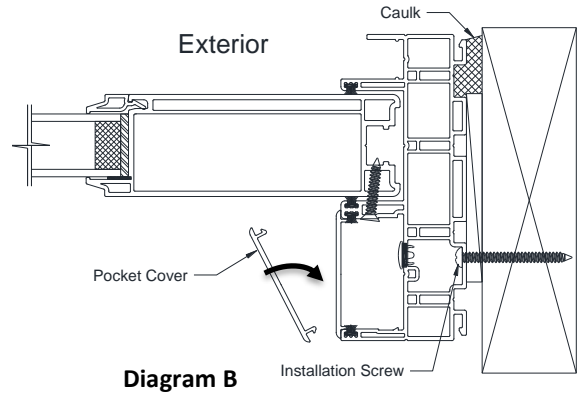


Diagram B

Pre-assembled door comes with interior pocket cover installed from factory. To install installation screw, remove and reinstall pocket cover.

NOTE: For installations in high rise buildings or high wind areas, the quantity, size, type, and engagement of the fasteners and the supporting shims must be engineered and is the responsibility of the installation contractor.

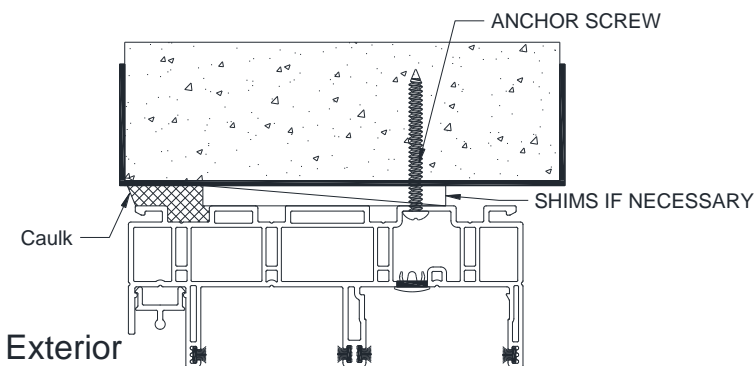


Diagram C

Insert shims between the head and the surrounding structure above the fastening point ensuring that the head frame is true and not bowed. With the operating panel in the fully open position, fasten the head to the surrounding structure through the inner track as shown in Diagram C.

OPERATING PANEL ROLLERS ADJUSTMENT

Using a manual screw driver, adjust the rollers up or down so that moving panel is at same height as fix panel and it slides evenly. Turn the screw clockwise to raise the panel or counter clockwise to lower the panel as shown on Diagram D. **NOTE: We recommend lifting the panel slightly when adjusting the wheels for ease of turning and to prevent thread stripping of the adjustment mechanism.**

Slide the panel in the closing direction to within $1/4"$ of the jamb. The gap between the panel and the jamb should be uniform from top to bottom. If not, adjust the panel up or down at one corner until the

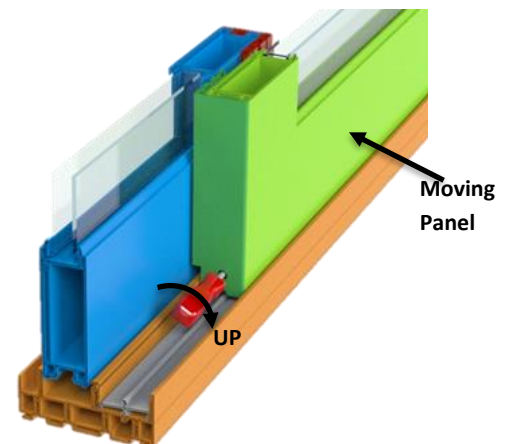


Diagram D

panel aligns to the jamb. If the jamb is bowed, remove the installation screws, adjust the shims, and re-fasten.

LOCK ADJUSTMENT

Lock is fully installed in factory and should not require adjustment.

If moving panel is overly loose or tight after the hook is engaged, the hook can be adjusted with adjustment screw on lock as shown on Diagram E.



Diagram E

SCREEN REMOVAL/ INSTALLATION

Insert the screen in the outside track of the header frame, swing the bottom of the screen towards the sill, then depress the bottom rollers with a flat head screw driver or pry bar to snap the rollers over the sill screen track as shown on Diagram F.

Slide the screen in the closing direction to within $\frac{1}{4}$ " of the jamb. Visually, the joint between the screen and the jamb should be uniform from top to bottom.

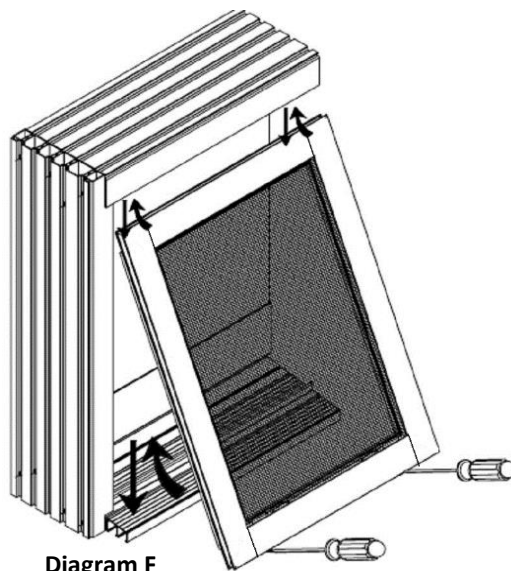


Diagram F

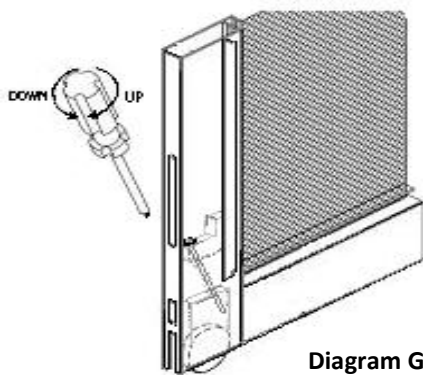


Diagram G

Using a screwdriver adjust the rollers on the bottom of the screen upwards or downwards to align the screen as shown on Diagram G. Adjust the top rollers just enough to snug the screen in the top track and allow easy rolling.

With the latch hook in the open position, slide the screen close to the jamb (or astragal mullion on OXO doors), mark the location of the top of the striker in the jamb, and position the keeper within the jamb so that the latch hook will cleanly engage the keeper. Attach the keeper to the jamb using the self-drilling screws provided. Ensure the latch securely holds the screens locked and adjust the keeper up or down as necessary.

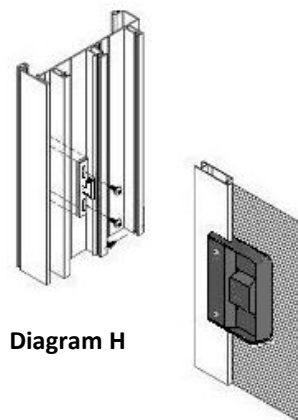


Diagram H

CAULKING

Use a good quality building sealant that is compatible with the vinyl surfaces of the sliding door and the surrounding structure. It is important that all surfaces to be caulked are free of dirt, dust, or grease and are well cleaned with an isopropyl alcohol solution followed by a clean dry wipe. Depending on the sealants being used, a primer may also be necessary. Check the application with your sealant supplier.

CAUTION: If expanding foam insulation is used between the door frame and surrounding structure, window-grade low expanding foam products are required. **Expanding foam can bow and deform framing members resulting in poor performance and difficult operation of the door.**

CLEANING: Vacuum all debris from the sill. Using a mild soap and water solution, clean all vinyl and glass surfaces.

NEWCASTLE DOOR

ASSEMBLY INSTRUCTIONS

INSTALLING THE FIX PANEL

Lift the fix panel into exterior pocket of header and lower it onto 2 small pieces of fix panel support in the exterior pocket of sill. Make sure interlock hook is toward interior side.

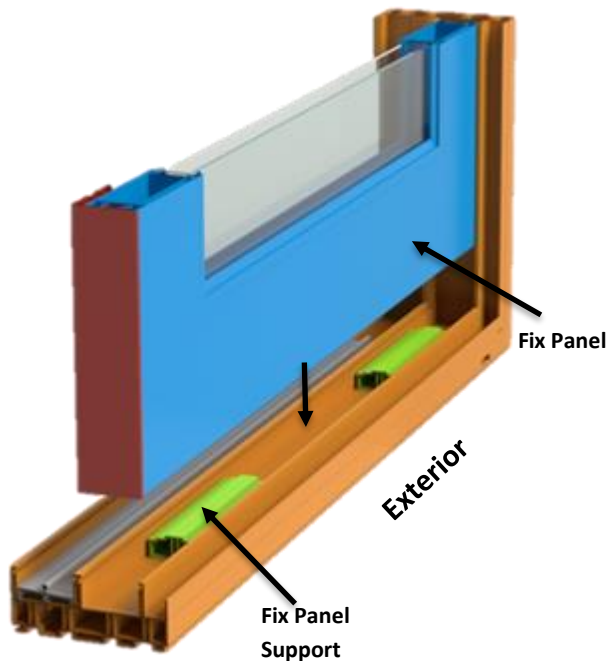


Diagram I

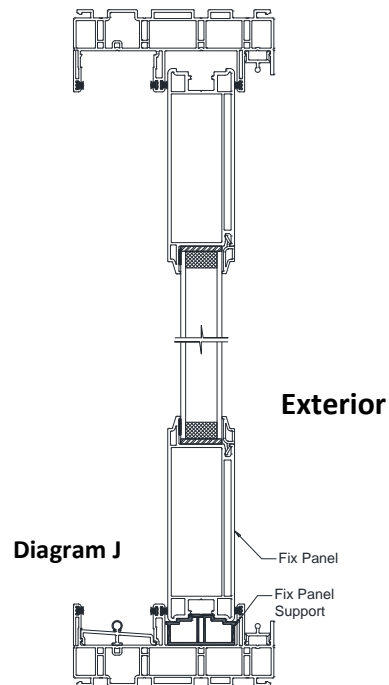


Diagram J

Apply temporary blocking to securely hold the panel snug in the jamb and fasten the fixed panel to the jamb by using five #8 X 1" flathead screws through weather-stripping channel into the jamb leg as shown in Diagram K. Ensure that no more than 4" of the panel is revealed beyond the plane of the jamb legs.

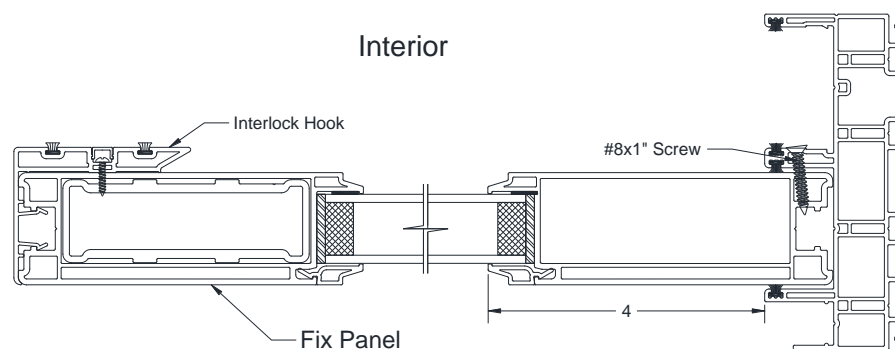


Diagram K

INSTALLING THE OPERATING PANEL

Firstly, depending on the handing or the door, install the rollers into the bottom of the operating panel in the pre-drilled holes provided using the #8 X ½" screws provided. Ensure that the adjustment screw head on the roller assembly is facing outwards towards the end of the panel.

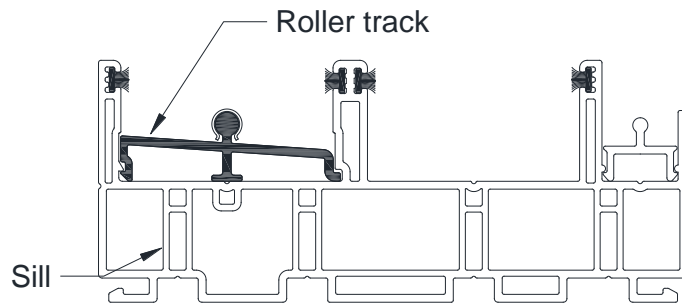


Diagram L

Lift the active panel into the inside track of the frame head and carefully lower the panel onto the roller track of the sill frame as shown on Diagram M.

Try to lock the moving panel and if needed, perform lock adjustments as shown on Diagram E

Make Sure the roller track is properly seated in the sill track as shown in Diagram L, if not use a rubber hammer to snap fit it into sill track.

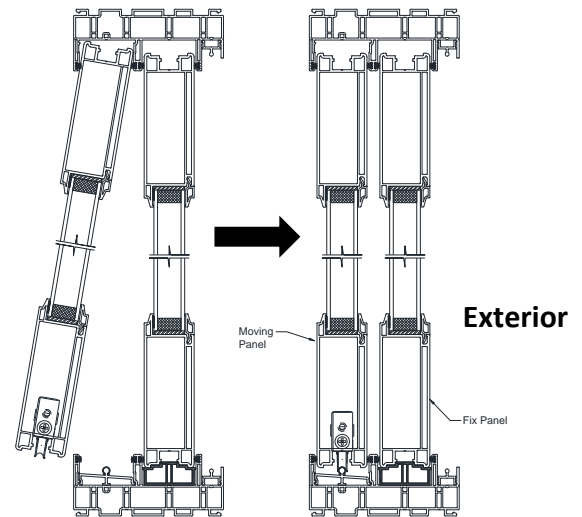


Diagram M

INSTALLING BUMPERS AND POCKET COVERS

Install bumpers into sill and header track beside the fixed jamb.

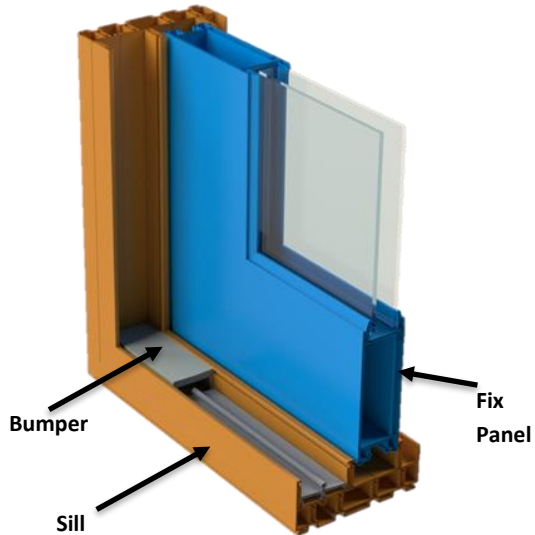


Diagram N

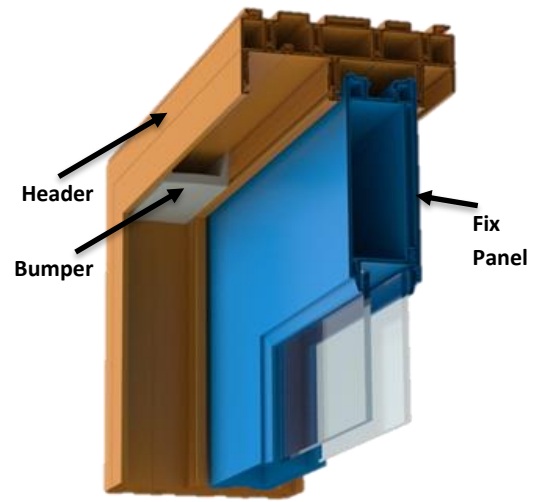


Diagram O

Install both jamb pocket covers.

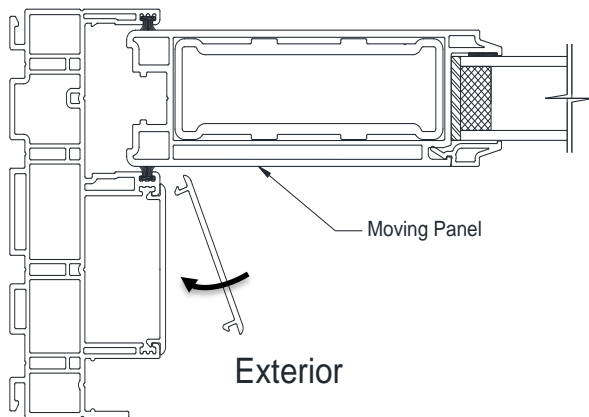


Diagram P

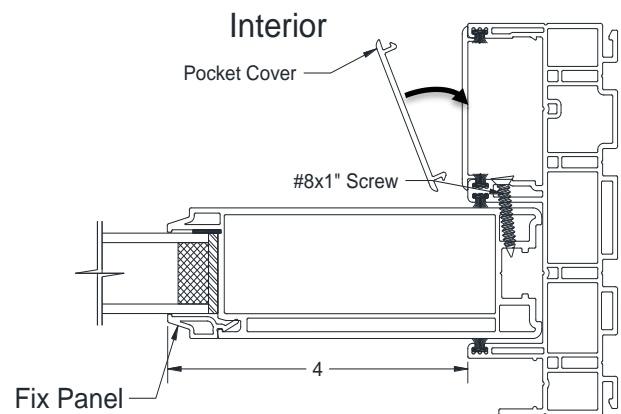


Diagram Q

Install Sill and Header pocket covers between fix panel and moving side jamb.

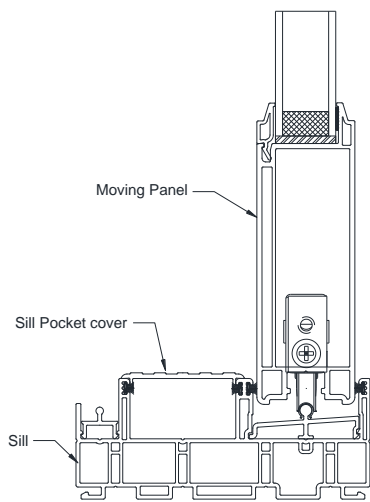


Diagram R

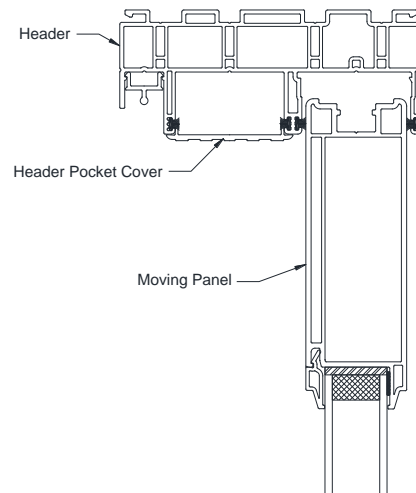
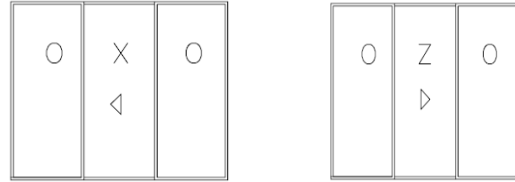


Diagram S

3 PANEL OXO AND OZO

ASSEMBLY INSTRUCTIONS



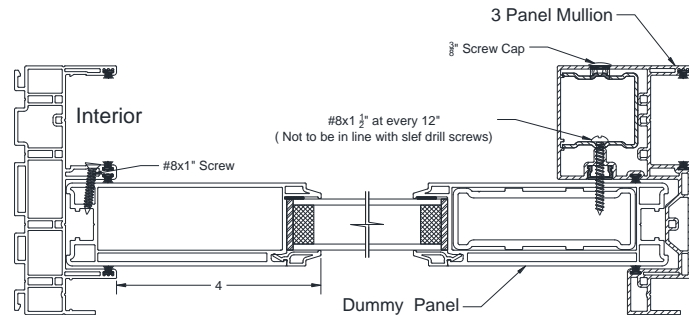
INSTALLING THE FIXED PANELS

OXO/OZO doors require the use of a mullion that is attached to the third (dummy) panel in order to provide a locking position for the active moving panel. The dummy panel has no lock cutouts or interlocking rail.

For regular fixed panel follow the same procedure as with 2 panel doors.

Lift the dummy panel into the center track of the frame head and carefully lower onto the fixed panel support on sill. Push the dummy panel securely into the jamb and install like a regular fixed panel.

Attach the OXO/OZO mullion to the rail of the dummy panel using #8x1 1/2" screws through pre-drilled holes. Use 3/8" screw caps to cover holes.



Install Sill and Header pocket covers between fix panel and 3 panel mullion as shown on Diagram R and S

(NOTE: The mullion is machined to be applied in only one way and is not reversible. OXO mullion is a mirror image of OZO mullion).

INSTALLING THE OPERATING PANEL – 3 PANEL DOORS

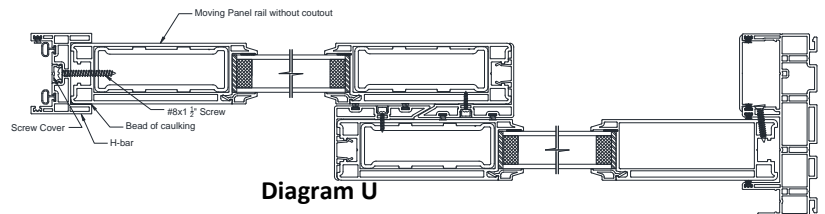
For OXO/OZO doors, adjust the operating panel and wheels in the same manner as for a two panel door aligning the operating panel to the mullion astragal.

4 PANEL OXXO

ASSEMBLY INSTRUCTIONS

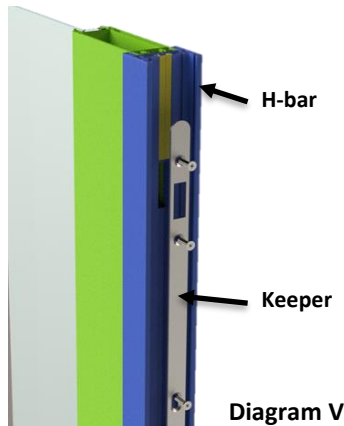
INSTALLING THE OPERATING PANEL OXXO

For OXXO doors, install and adjust the panels in a similar manner as two panel doors aligning the two operating panels to each other. Apply a continuous bead of caulking into the bi-parting astragal H- bar and push it on to the vertical rail without the cutout for the operating hardware using the #8X 1 1/2" screws provided as shown in Diagram. Install 2 pieces of screw cover so that slots machined in H-bar cover, see Diagram V.



do not get covered by screw

HARDWARE AND KEEPER INSTALLATION



For OXXO doors, align the slots in steel keeper to machined slots in H-bar and use #10x 1" flat head screws to install keeper to H-bar, see Diagram V.

Try to lock both moving panels and if need adjust the lock hock as per Diagram E

SCREEN INSTALLATION – OXXO DOORS

Load the screens into the frame as per the 2 panel door instructions. Slide the screens in the closing direction to within 1/4" of each other. Visually, the joint between the two screens should be uniform from top to bottom. Using a screwdriver adjust the rollers on the bottom of the screens upwards or downwards to align the screens. Adjust the top rollers just enough to snug the screen in the top track and allow easy rolling.

With the striker latch in the open position, slide the screens close to each other, mark the location of the top of the striker in the screen "H"-bar, and position the keeper within the "H"-bar so that the striker will cleanly engage the keeper. Attach the keeper to the "H"-bar using screws provided. Ensure the latch securely holds the screens locked and adjust the keeper up or down as necessary.

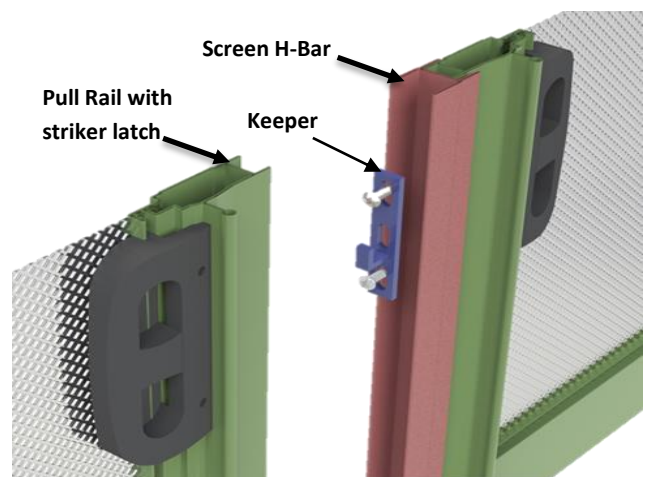


Diagram W