

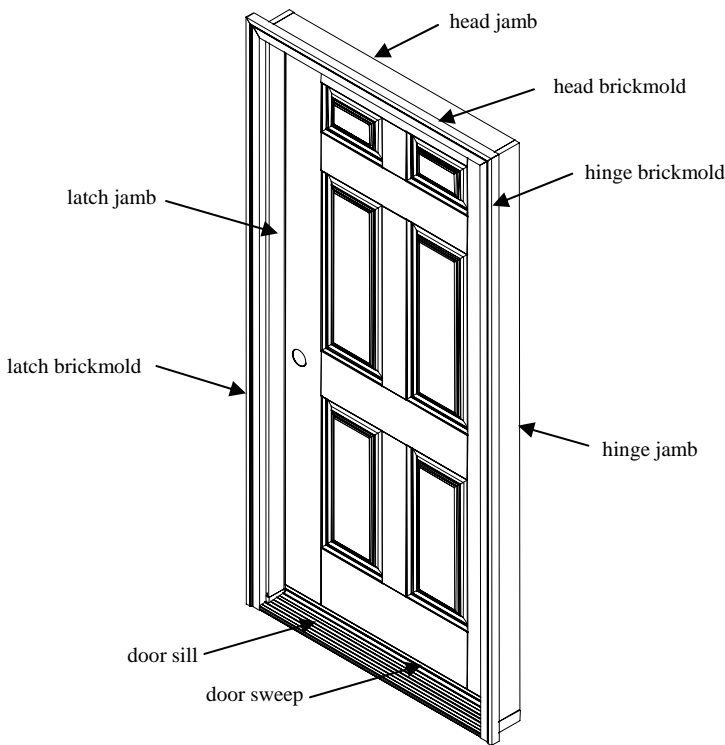
Thank you and congratulations. You have just purchased a premier fiberglass entry door system. If you have purchased an unfinished door system, we recommend that you paint/stain before installation. Refer to the finishing instruction section in this document. Please follow the instructions carefully for proper installation.

**CAUTION: Some door units are heavy and may require two people to lift and install. Use proper lifting techniques and follow safe working practices.**

**Tools and materials needed:**

Tape measure, Hammer, Square, Level, Wooden shims, #10 x 3" PFH wood screws, 3/16" x 2 3/4" & 3 3/4" Tapcon concrete screws, #3 Phillips screwdriver, #8 x 3" Drywall screws, Power drill with Phillips drill bit, Safety glasses, Rubber gloves, Caulking gun with quality exterior sealant, Putty

**PARTS OF A DOOR SYSTEM**



**Before you begin:**

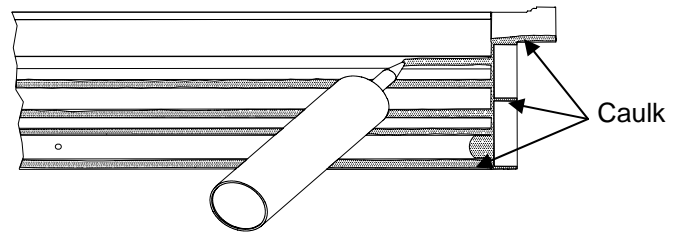
1. Do not remove the plastic door plug until instructed to do so. This is used to keep the door system closed and aligned. For the door unit that has handles on the latch and hinge jambs, remove them. If you need to extend the width of the jambs for a thicker wall, you need to purchase a jamb extender kit. Also, cover the door sill to protect against harmful particles or scratches during installation or between long period of building construction and occupation. Note that a contact with wet cement or cement powder will damage the sill finish.

2. Make sure that the new door will properly fit your frame opening. Note that the rough opening for the High Wind Velocity Area installation is different from the standard rough opening. The rough opening should be 1/2" wider and 1/4" higher than the prehung door unit. Resize the opening if needed. Verify that the frame opening is level, square and plumb. Minor out of level conditions can be corrected by using shims but major misalignments need to be corrected before installation.

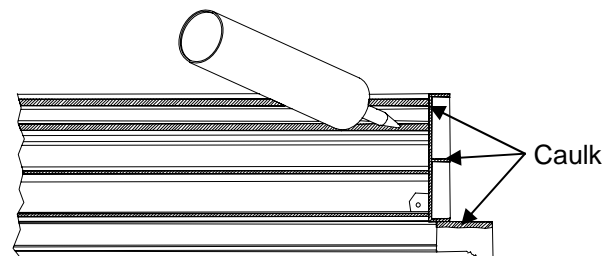
**1 INSTALLATION:**

**For Florida and Texas, please see pg 5 for installation drawings to be used for anchoring.**

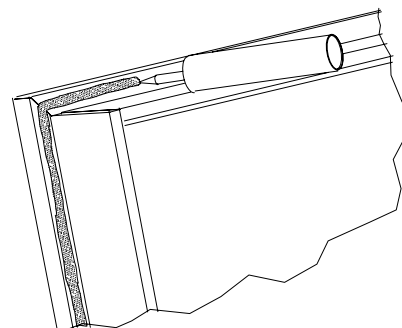
**IMPORTANT:** Before setting the door unit to the rough opening, apply generous beads of caulk to the underside of the door sill at locations shown in figures 1a or 1b including the plastic sill-key and brickmold. Make sure that at least 4 lines of bead seal the full width of the sill. Also apply a continuous and generous of bead of caulk to the back side of brickmolds as shown in figure 1c.



**Figure 1a (In-swing)**



**Figure 1b (Out-swing)**



**Figure 1c**

**2** For a single door, remove the bolt from the plastic door plug. From outside, set the door unit and tilt it into place into the opening per figure 2a. For a heavier door system, get help when lifting, setting and aligning.

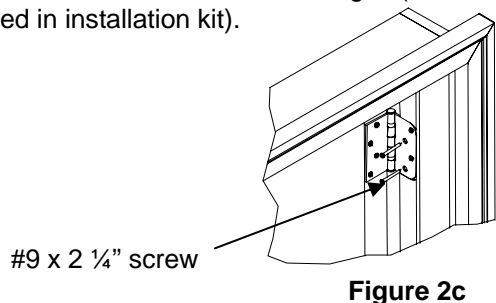
From the side of the hinge knuckles, place a solid shim directly behind each hinge between the hinge jamb (or approx. same level as hinges on sidelite jamb) and opening frame per figure 2b. Shims should not be more than 1/4" thick. Keep the door unit level, square and plumb on all four sides. Remove the plastic door plug completely.

Temporarily secure the door unit to the frame with two #8 x 3" drywall screws. Fasten at about 2" below the top hinge and 2" above the bottom hinge through the jamb to the opening frame.

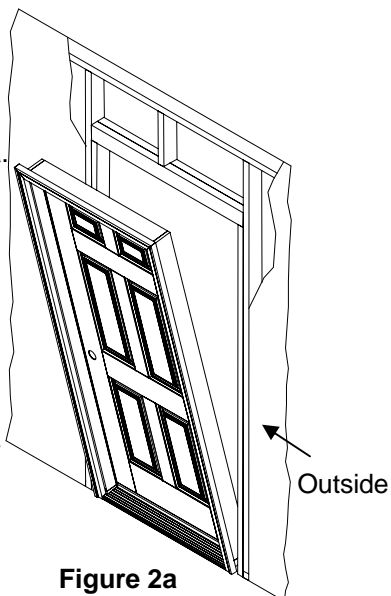
Make sure weatherstrip contact and margin are equal all around. Make further adjustments for level, square and plumb. Use solid shims between the latch jamb and opening frame per figure 2b. Additional shims may be used to keep the door aligned. Test to ensure proper operation of the door.

Permanently fasten #10x3" phillips flathead (PFH) wood screws through the jambs into the shim and the frame per anchoring detail on page 4. Use concrete screws for masonry opening. *Do not use drywall screws or nails.* Do not overtighten the screws. Overtightening may cause jambs to bow. Remove excess shims and temporary fasteners.

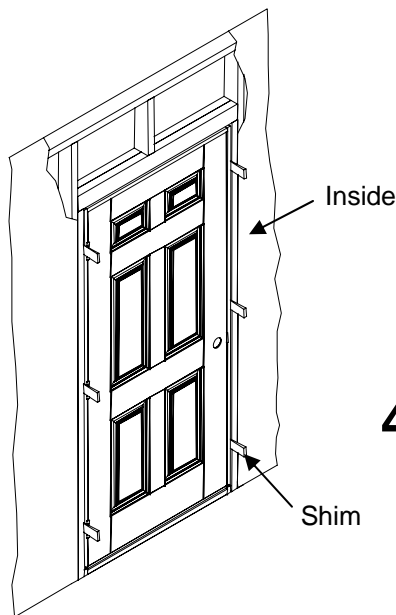
For single, double and single sidelite doors, install 2 screws at the location shown in Figure 2c on the top hinge and 1 each on the lower 2 hinges (screws included in installation kit).



**Figure 2c**



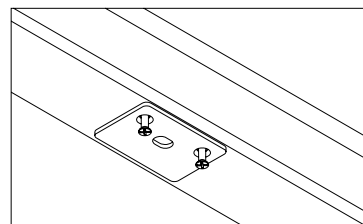
**Figure 2a**  
(shown in-swing door)



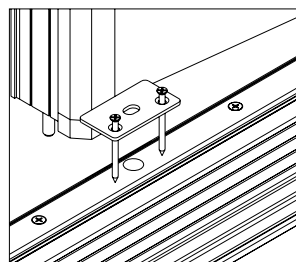
**Figure 2b**

### **3** Additional Anchoring and Drilling for Double Door Unit

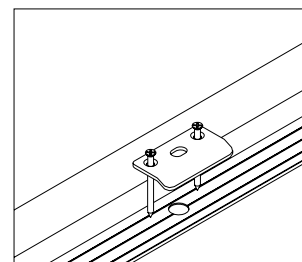
After checking to make sure that the double door is properly aligned, use the astragal bolts at the inactive door to mark and drill 3/8" diameter x 1 3/8" minimum deep holes through the head jamb and the sill per Figures 3a, 3b and 3c. Pre-drill 1/16" pilot holes for the mounting screws. Install the retaining plates (included) at both head jamb and sill. Use the #8x 2 1/4" screws included in the installation kit to mount the retaining plates.



**Figure 3a**  
(In-swing/Out-swing header)



**Figure 3b**  
(In-swing sill)

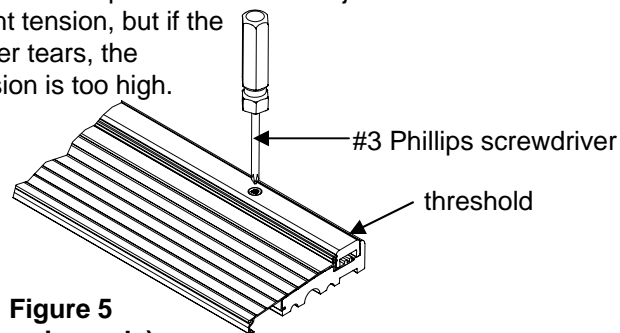


**Figure 3c**  
(Out-swing sill)

**4** Anchor the prehung unit to wooden or masonry floor per the anchoring detail on page 4. Countersink the sill as needed. Use wood screws for wood floor and Tapcon concrete screws for masonry floor. Single door does not need to be anchored at the sill.

For the lockset hardware, use grade II latch and deadbolt. Shim the jamb behind the latch and deadbolt strike plates as needed and secure the strike plates to the jamb using #8x2" PFH wood screws. Make sure that the deadbolt engages fully. You should feel the bolt roll and click as it engages. If the bolt does not engage fully, you may need to deepen the strike bore.

**5** For an in-swing door with adjustable threshold, adjust the threshold as shown in Fig. 5 so that there is even contact between the door sweep and the threshold. To test, put a sheet of paper between door sweep and threshold, close the door and pull. The correct adjustment would have slight tension, but if the paper tears, the tension is too high.



**Figure 5**  
(In-swing only)

**6 IMPORTANT:** For in-swing doors, install two corner seal pads (included in the installation kit) at each of the jamb bottom per figure 6a. The corner seal pad should be tucked underneath the weatherstrip. Caulk at the intersection of the jambs, brickmolds, threshold and floor. For out-swing doors, also caulk at the intersection of the jambs, brickmolds, threshold and floor per figure 6b.

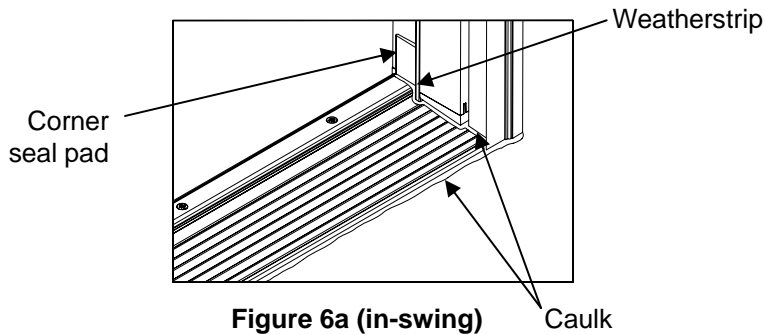


Figure 6a (in-swing)

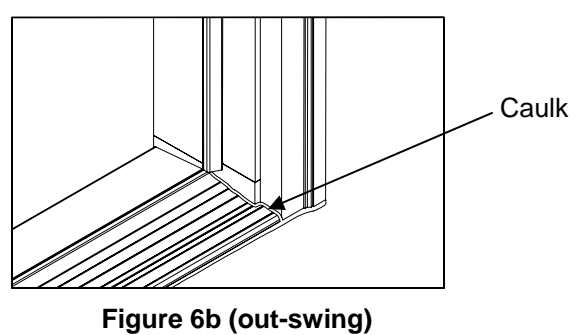


Figure 6b (out-swing)

## FINISHING INSTRUCTIONS

Staining or painting an unfinished Trinity Glass International® fiberglass door has never been easier. Our fiberglass door does not require special stain kits or primer. Use the same exterior stain or paint you would use for finishing your home's other trims. Note that a tan woodgrain and white smooth door must be finished within 6 months after the door is purchased. When finishing, remove the door from the frame and place door in a flat level surface off the floor. Sidelites need to be finished while attached to the frame.

**Caution: Paint or stain in a well ventilated area. Keep combustible paint, stain and topcoat away from heat and flame. Keep out of reach of children.**

### Stain Finish

All surfaces of a tan woodgrain door are stainable. Our patented textured fiberglass door surface yields superior stain adhesion without sanding. Select a high quality water-based stain from Minwax® or Behr® or a high quality gel stain from Minwax® or Olympic®. Or, select a high quality oil-based stain from Ace®, Minwax®, or Zar®. Before applying a stain, wipe the fiberglass door and door lite frame with a damp cloth to remove any dirt, oil, or debris. Allow the surface to fully dry before staining. Apply an even amount of stain with a brush or lint-free cloth in the direction of the wood grain as shown in Figure 7. Work the stain into the surface. Lighten stain and remove excess through wiping with a clean rag before stain dries completely. For a darker appearance, apply a second coat after first coat dries. Follow the application instructions on the stain container label. After stain has dried for at least 24 hours, apply three coats of high quality exterior grade satin or low gloss polyurethane in the direction of the wood grain. Follow the label's drying time between coats.

**Important:** Use polyurethane with ultraviolet (UV) inhibitors.

### Paint Finish

Tan woodgrain or white smooth fiberglass doors are both paintable with most high quality oil based exterior paints. For the smooth doors, we recommend sanding with 600-grit sandpaper for the best results. Before applying a paint, wipe the fiberglass door and door lite frame with a damp cloth to remove any dirt, oil, or debris. Allow the surface to fully dry before painting. Paint the door in the directions shown in Figure 7. Apply at least two coats of paint. Follow the brand's recommended drying time between coats.

### Finishing Wood components

Both the pre-finished and unfinished fiberglass doors come with factory finished prime coat on the jambs and brickmolds, unless clear wood components are specified in the order. We recommend staining the clear jambs, brickmolds and other clear wood components per above stain finish instructions. Apply 2 or 3 coats of exterior grade polyurethane with ultraviolet (UV) inhibitors. Lightly sand with 600-grit sandpaper between coats for smoother finish. If painting is desired over primed wood components, use quality exterior grade acrylic latex or oil-base paint. Use wood filler to putty the nail marks on the wood components before staining or painting. Wood components must be stained or painted with 2 weeks after installation.

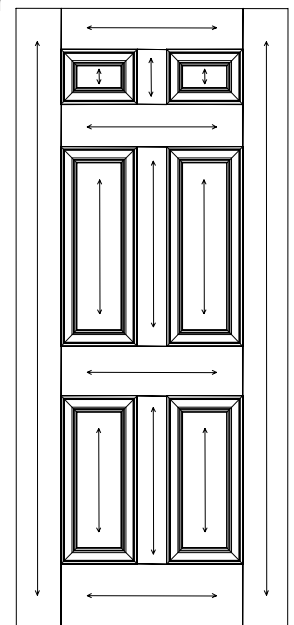
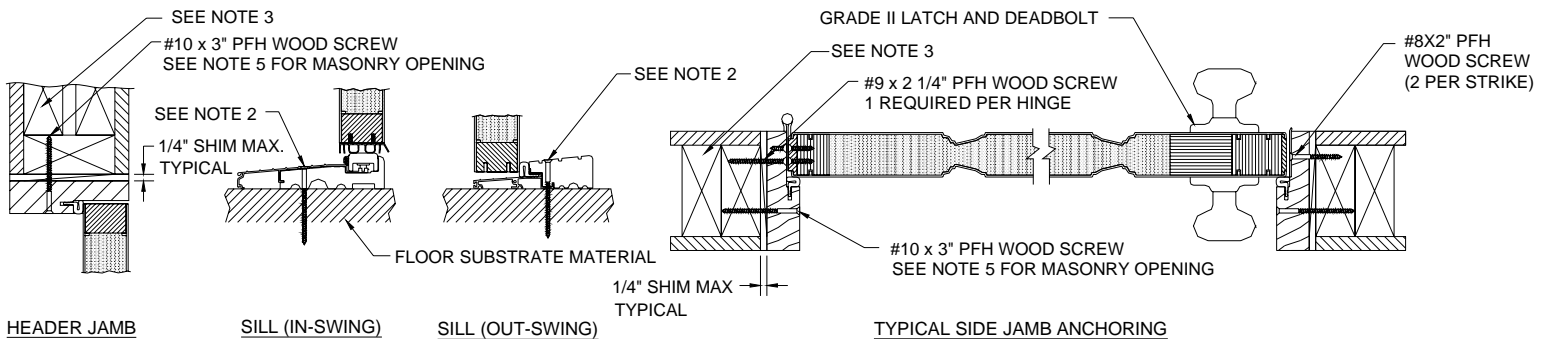
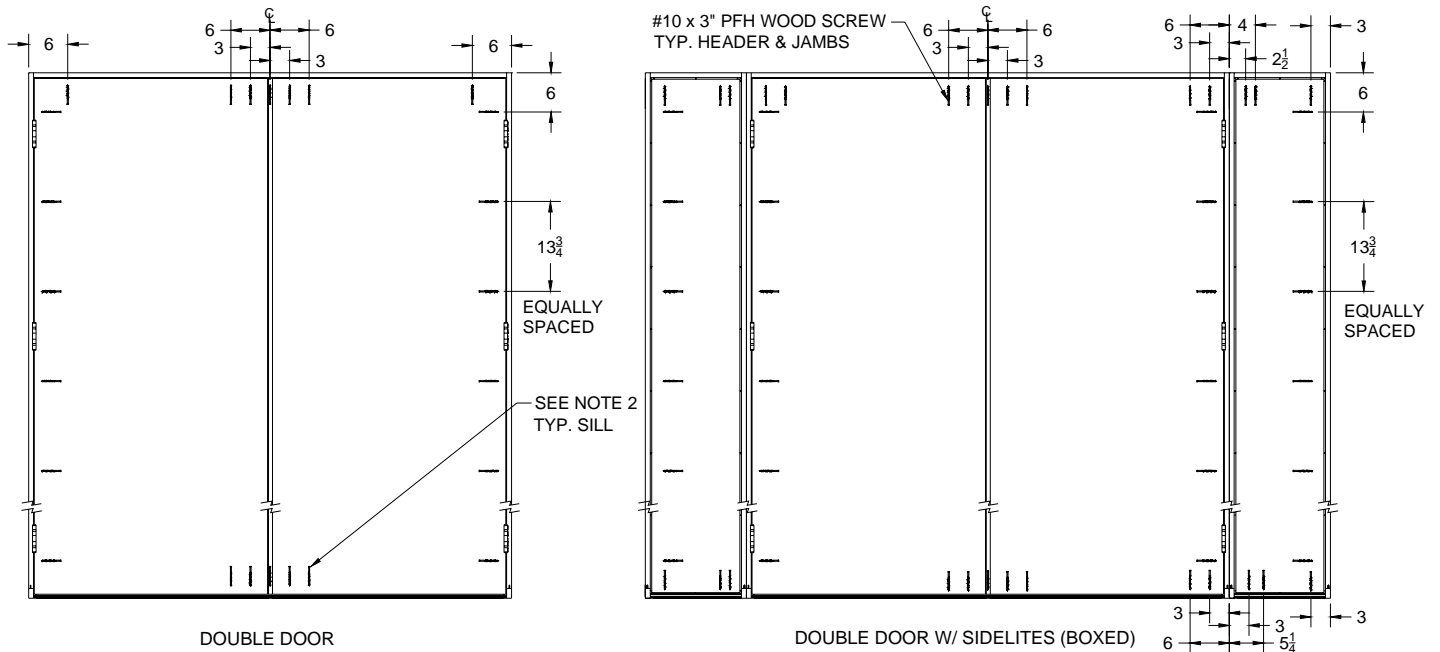
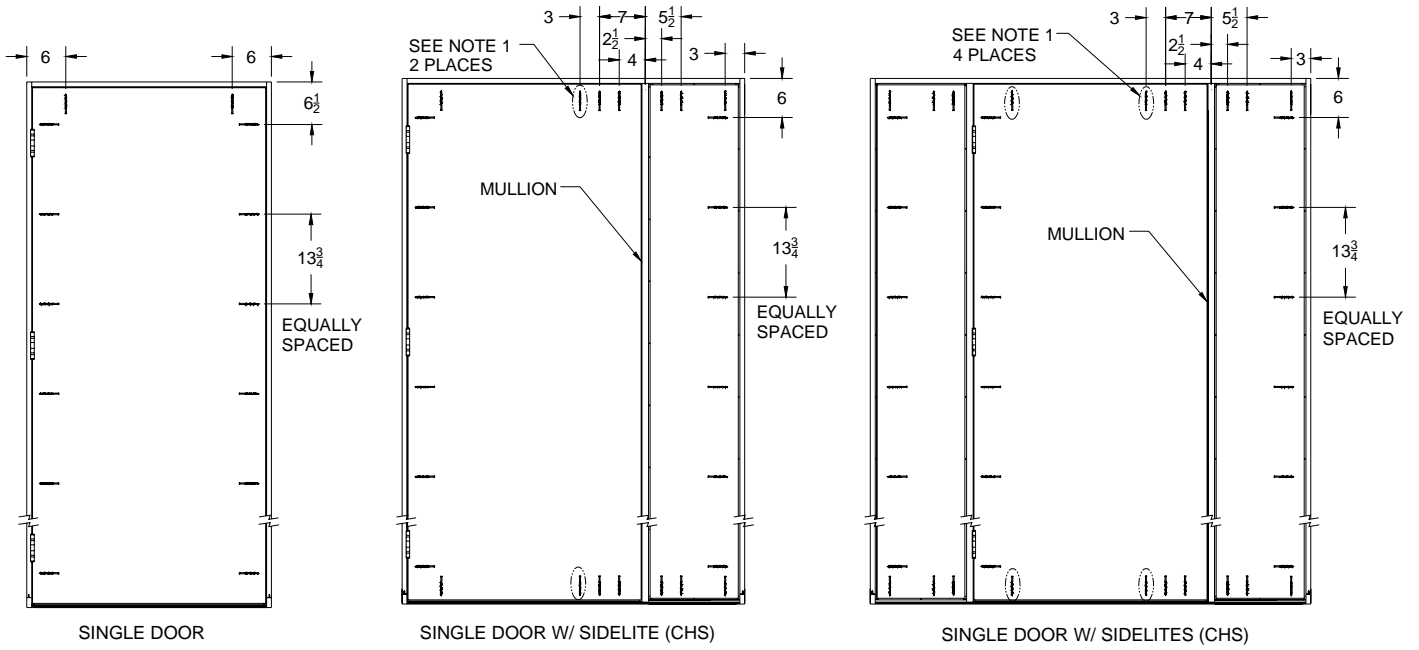


Figure 7

## CARE AND MAINTENANCE

Over time, harsh weathering will degrade even the best fiberglass finish. We recommend reapplying a UV topcoat over the existing topcoat every 3-4 years. We do not recommend stripping the finish. In locations of severe weather exposure, more frequent maintenance may be required. Repaint your doors, jambs and brickmolds as soon as deterioration occurs. Replace weatherstrip, door sweep or sealant when deterioration is apparent.

# Anchoring Detail (For Florida and Texas, see page 5 for installation drawings)



**NOTE:**

1. 3RD SCREW ADJACENT TO MULLION IS ONLY REQUIRED FOR DP RATINGS GREATER THAN 65 PSF.
2. FOR WOODEN SUBSTRATE MATERIAL, USE #10 X 3" PHILLIPS FLATHEAD(PFH) WOOD SCREWS. FOR MASONRY SUBSTRATE MATERIAL, USE 3/16" X 2 3/4" TAPCON CONCRETE SCREWS. 3/16" TAPCON SCREWS REQUIRE A MINIMUM 2" CLEARANCE TO MASONRY EDGES.
3. 2X ("2 BY") FRAMING OF 2X4 OR GREATER IS TO BE USED. CONSULT ENGINEER OR ARCHITECT OF RECORD CONCERNING FASTENING THE PREHUNG UNIT TO THE REST OF THE BUILDING STRUCTURE.
4. USE THE #8, #9 AND #10 WOOD SCREWS SPECIFIED IN THE ANCHORING DETAILS. ANY DEVIATION MAY AFFECT THE STRUCTURAL PERFORMANCE.
5. FOR MASONRY OPENING, USE 3/16" x 3 3/4" TAPCON CONCRETE SCREWS.

## Installation drawings for Florida and Texas

Installation drawings for Florida, Miami/Dade County and Texas may be downloaded from Feather River Doors website.

Go to [www.featherdoor.com](http://www.featherdoor.com) , click performance data tab for a listing of installation drawings for each area. Note that some areas require that these drawings to be available at the time of inspection. So print and save these drawings for inspector. Please make sure that the door is installed as specified in the drawing.

If you do not have access to the internet, please call customer service (1-800-375-8120) and request a copy of the drawing.

### Drawings to Use

- For Florida customers who live in Dade/Broward County or High Velocity Hurricane Zone (HVHZ) areas, please use Miami/Dade County approved NOA drawings. If NOA drawings are not available for your system, use Florida state approved drawing that complies with HVHZ.
- All other Florida customers, please use Florida state approved drawings. But for 6-8 flush-glazed and opaque IMPACT doors, use Miami/Dade County approved NOA drawings.
- For Texas customers, used Texas Department of Insurance (TDI) approved drawings.