

# INSTALLATION GUIDELINES

## Very Important!

**GATES MUST NOT EXCEED 350 LBS**

Install Bottom Pivot 1 X 2 Housing First.

There should be a gap of 2" under the gate to allow the bottom pivot Housing, Pivot screw and Pivot Bearing Plate to be installed, if there is not, you will need to install the bearing plate up into the bottom of the gate. If there is more than 2" Inches, you must move the Bottom Pivot Assembly up to the desired height. Once bottom Pivot housing has been positioned against the hinge post, use a **bubble level** to make sure that it is level.

Once the Bottom Pivot has been tack welded in place on the bottom hinge side of the gate, place the bearing plate on and measure up the length of the gate height and allow 1/8" gap and make a mark on the hinge post. This is where the Closer and Housing will be installed. (It is very important not to exceed 3/16" gap between the top of K-Arm Housing and the bottom of the Closer Housing. They CANNOT touch each other! They must have at least a 1/8" gap between them).

Attach the Bottom Pivot Bearing Plate to the bottom hinge side of gate frame. Use a Carpenters square to make sure it is square to gate frame, not tipping. It should be positioned flush with side of gate.

Install K-Arm and Housing to the Top of the gate. (Housing can be surface mounted and stitch welded to the top of the gate or cut out and inserted into the top rail of the gate on the hinge side.) Make sure that it is flush to the hinge side of gate.

It is important to allow access to the adjustment screws under the closer housing before attaching the gate closer to the hinge post. (If K-Arm Housing is surface mounted there should be about 1" gap between the closer housing and top rail of fence allowing an angle screw driver to make adjustments. If there is no clearance then the top rail of the fence should be drilled to allow access to the adjustment screws.)

Attach closer to the K-Arm with block and Allen head bolts and washers with red plastic shim in-between. Make sure that the gate and closer is in-line with the strike post and that the pan head screw of the K-Arm is in the center of the housing. With gate and closer attached, set the gate on the bottom pivot screw and place in the opening. Use spacers or other metal to align the gate. Use a Level to make sure that the swinging of the gate is level, **it MUST BE level**, to assure proper swinging. With gate in position, TACK Weld Closer Housing, making sure that it is level on hinge post in both directions. (If the closer and housing is not level it will cause the closer to leak oil. Also, it is **VERY IMPORTANT** not to overheat the closer when tack welding in place, this will cause closer to leak.)

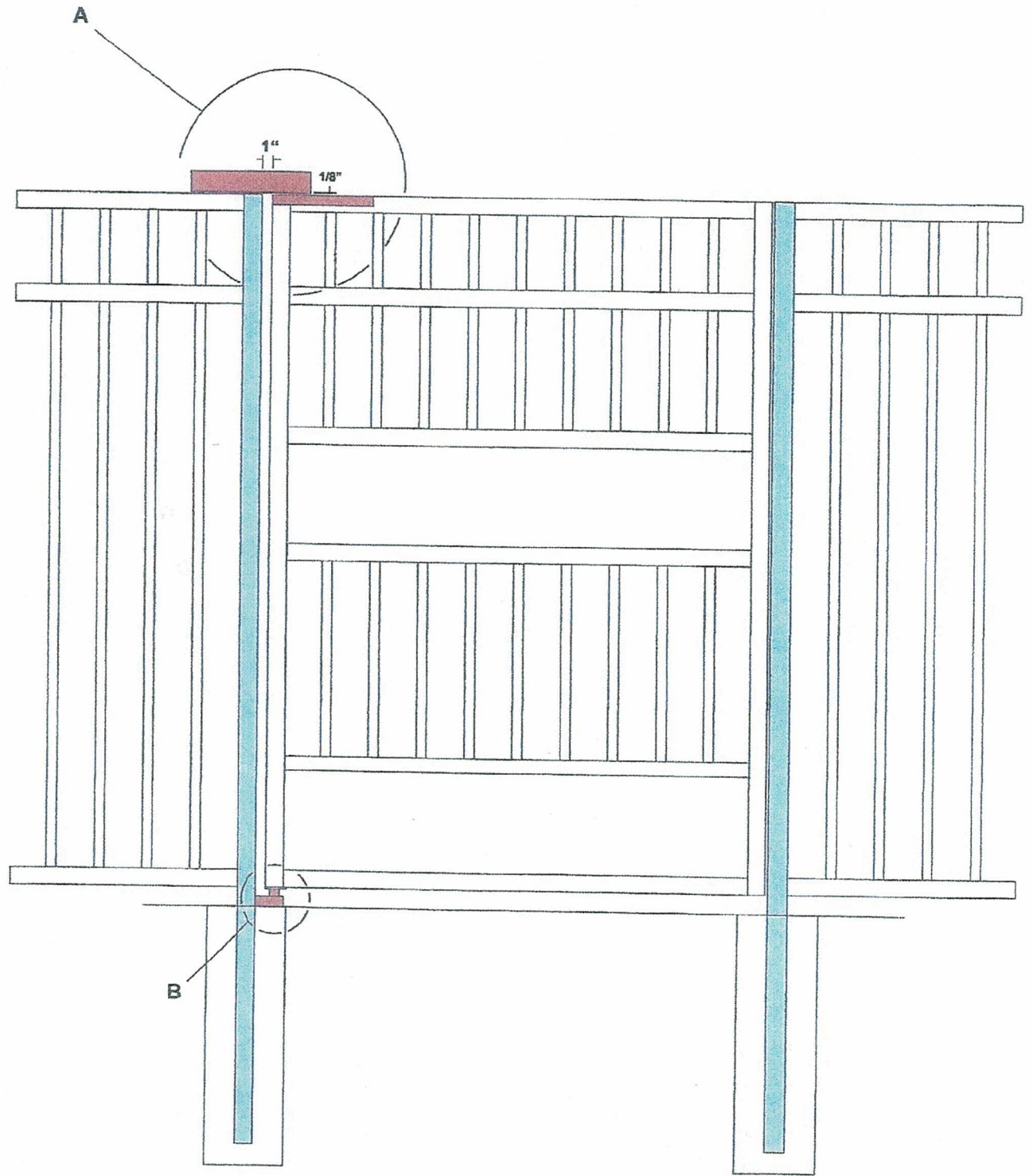
Once everything has been positioned properly and tacked to hinge post, try opening the gate and making sure it is working well. Remove the gate. With gate removed, remove the closer from its housing and finish welding the housing to the hinge post, let cool to the touch, and reinstall the closer in the housing. Re-attach gate.

It is **very important to stop the gate travel at 90 degrees**. (Gate CANNOT exceed 100 degrees!) A stop is included with the closing system. If the stop is not installed or it is improperly installed, it will damage the closer and void the warranty!

After gate has been installed you can now adjust the gate sweep and latch on the closer. (See Page 4 for instructions.) The valve closest to the back of the closer housing is the latching valve, the other is the sweep valve. Small adjustment less than ¼ turn at a time, swing gate and allow oil to cycle. It is very important that you allow access to these valves. Reminder: If the closer is sitting on top of the fence, before installing the closer housing, cut a small area out of the top portion of the fence rail that will be covered by the closer housing. Drill small access holes under fence top rail to allow a small screw driver to access valves. (Closers with valves on top are available, if access is not possible)

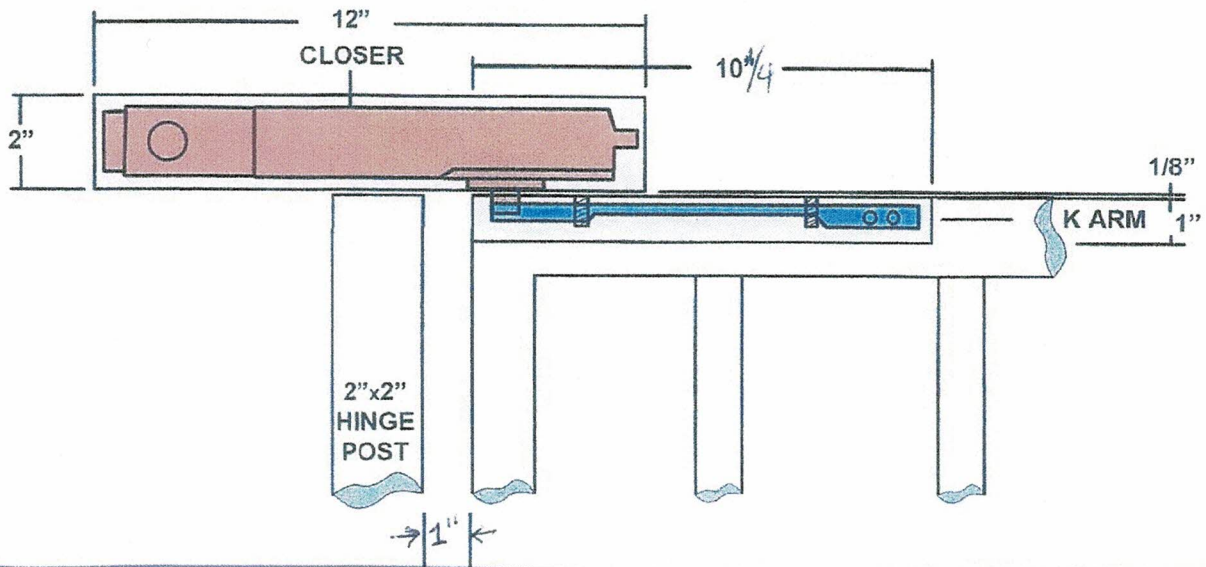
- It is important to install the 2 - 2 ¼ x ¼ x 20 screws and nuts in the closer housing (that go through top and bottom of PFGCS end cap) and remove the 1 ½ screws that were sent for shipping purposes only.
- **Gates exceeding 350 lbs. should NOT use our closing devise**

If you follow these instructions closely your installation will go well!



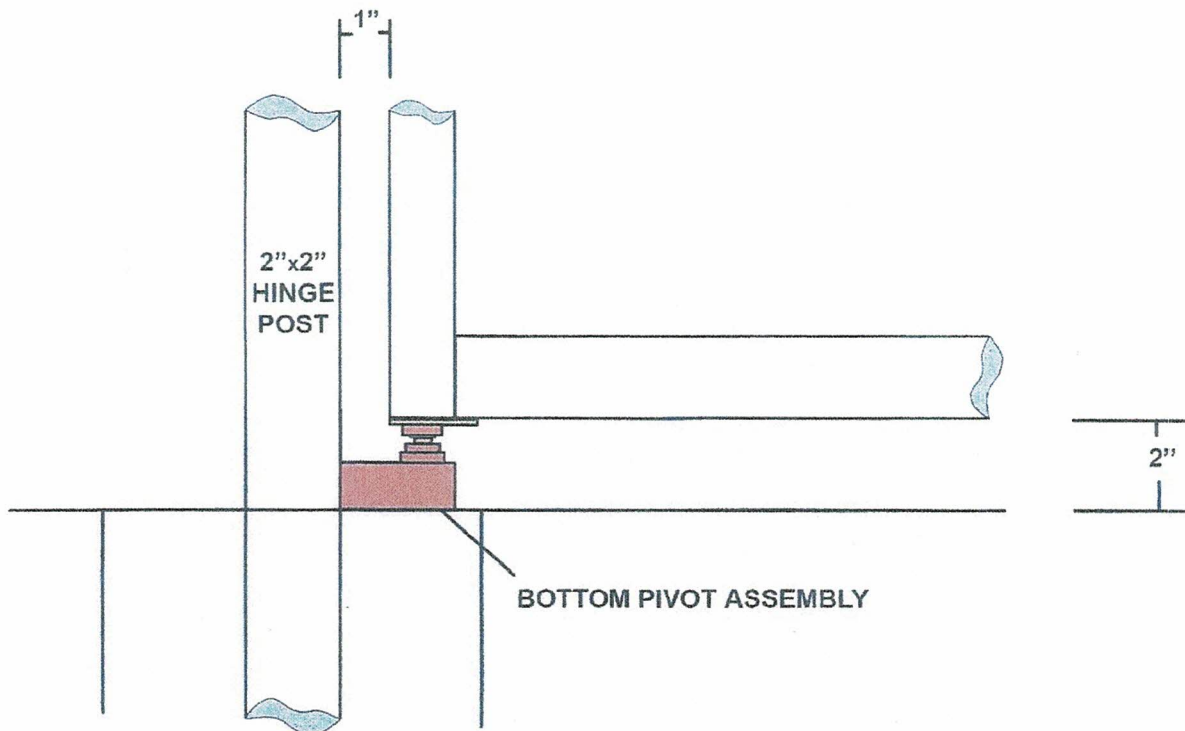
# A

## INSIDE VIEW

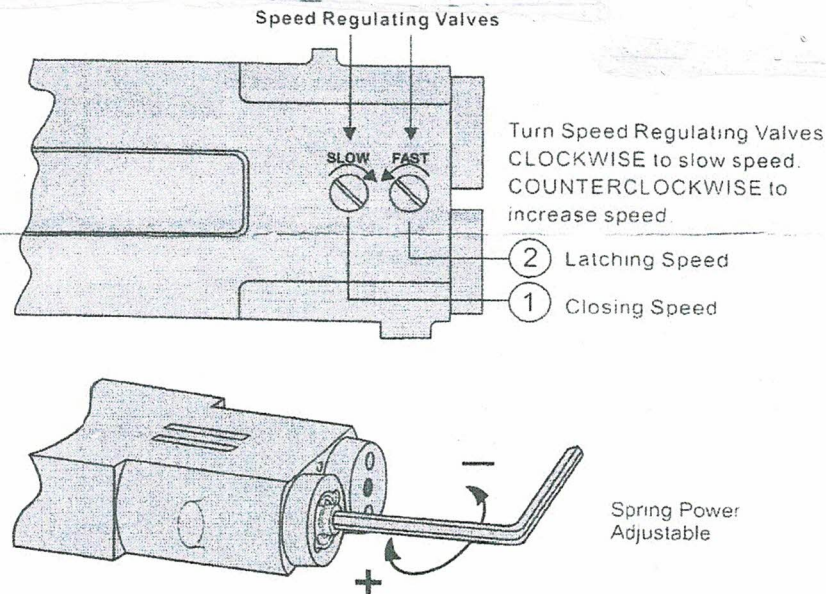


# B

## B.1 STANDARD BOTTOM PIVOT ASSEMBLY CLOSE UP



## HOW TO PROPERLY ADJUST THE POSITIVE FORCE GATE CLOSING SYSTEM



Spring Power adjustable from 5 lbs of Opening Force (at '0' turns) to Medium Spring Tension (at '9' Turns).

The Positive Force Gate Closing System uses an overhead concealed hydraulic closer that has been used in the glass door industry for 40 years. When we supply the PHD-3311-100-S or R, the housing has been prepped to allow access to the speed regulating valves on the bottom of the closer housing. One valve, closest to the end of the housing is the Latching valve which regulates about the last 10 degrees of the closing of the gate. The other valve, farthest from the end of the housing, regulates the Sweep travel, from 100 to about 10 degrees of closing of gate. It is important that the installer allows access to these valves. If the housing is welded directly to the top rail of the fence, an area of the top rail should be removed, (large square which is wider than the valve area is fine. This area removed should not extend past the housing. Two small holes on the bottom of the top rail should be drilled to allow a small screwdriver to adjust the valves.

When adjusting the valves, small adjustments are best, 1/8 to 1/4 turns. When adjustments are done, open the gate fully and allow the oil inside to cycle a few times, then make further adjustments are needed. The gate should travel smoothly from full opening to latching. IT SHOULD NOT BOUNCE WHEN SWITCHING FROM SWEEP TO LATCHING! It should vary from 12 to 20 seconds to fully latch the gate. The latching speed should be set a little faster to allow momentum to securely latch the gate. Do not be too critical on adjusting the gates perfectly, size and weight of gates could affect speeds.

A third adjustment on this model closer has a Spring Power Adjustment. This adjustment allows the closer to be adjusted to a stronger spring when wind or weight of the gate requires it. See Illustration.

If you are experiencing problems please call 714 394-5706 and we will try to help with any questions or concerns

Thank You for using the Positive Force Gate Closing System