

INSTALLING ENCLOSED LIMIT SWITCH KIT

Read entire instruction guide before attempting installation.

(A) Ensure That All Components and Tools are Present Before Installation.

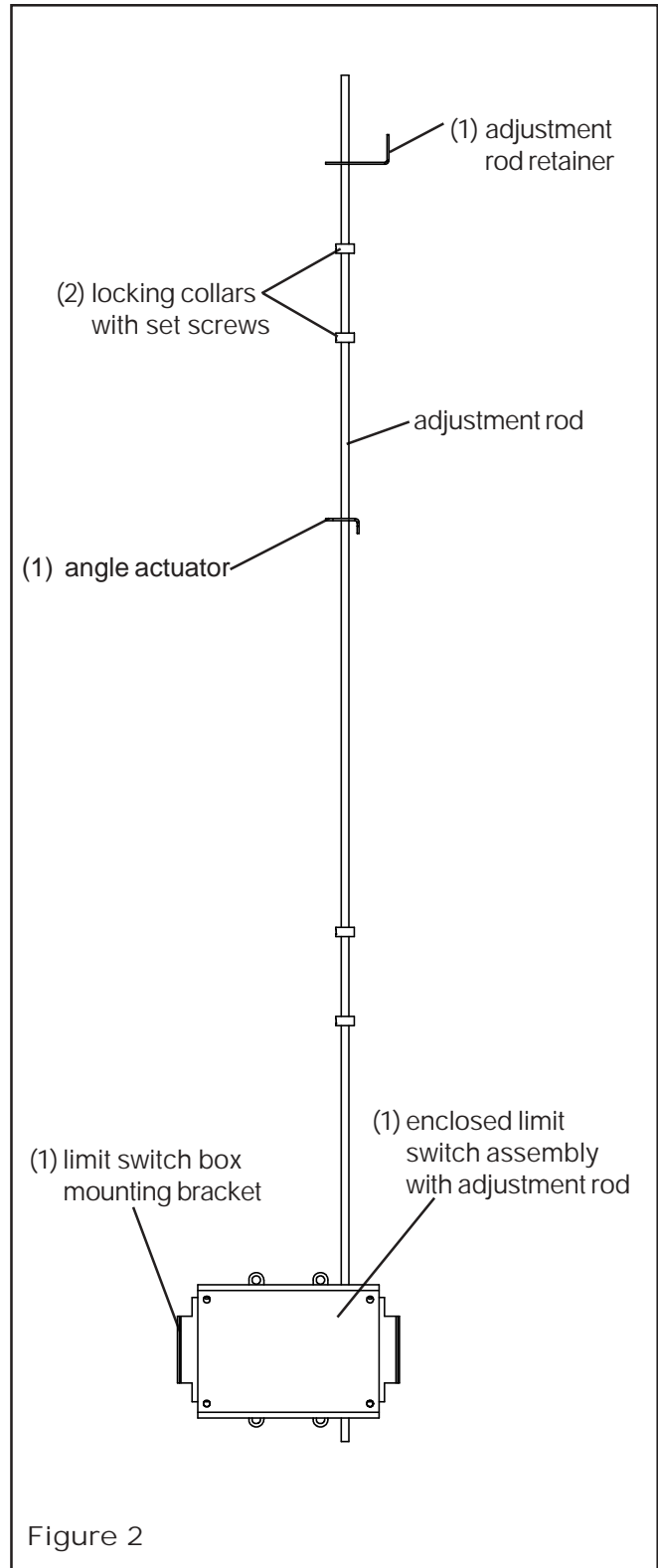
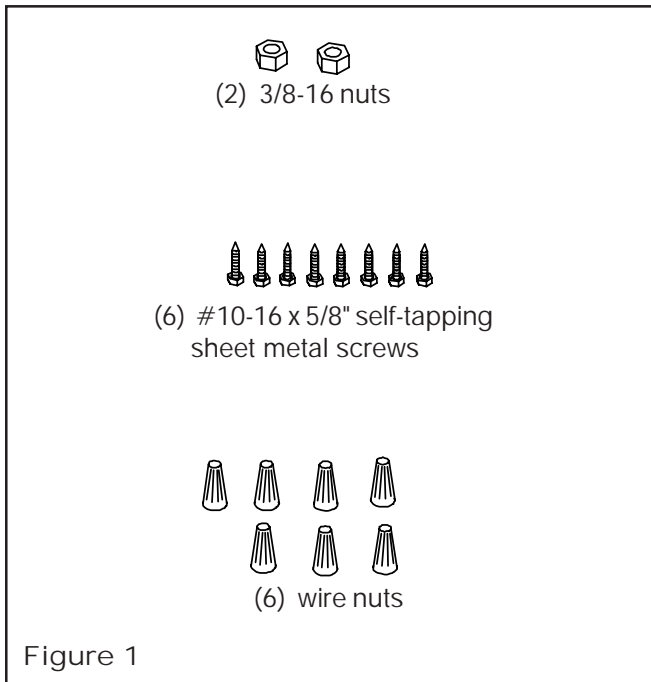
If parts are missing, please notify your dealer. See the following packing and tool lists.

PACKING LIST:

- (2) 3/8-16 nuts
- (8) #10-16 x 5/8" self-tapping sheet metal screws
- (7) wire nuts
- (4) locking collars with set screws
- (1) limit switch box mounting bracket
- (1) angle actuator
- (1) adjustment rod retainer
- (1) enclosed limit switch assembly with adjustment rod

TOOL LIST:

- (1) 3/8" nut driver
- (1) 3/32" allen wrench
- (1) 9/16" deep-well socket
- (1) ratchet



(B) Remove Existing Limit Switch System:

- Step 1: **Disconnect & lockout all power sources!** Cut the micro switch wires ((2) black, (2) red,(1) green, and (2) black with white stripe) at the limit switches.
- Step 2: Remove the micro switch bracket by removing the (4) sheet metal screws in the limit switch box.
- Step 3: Loosen the adjustment collar set screws allowing the collar to move freely.
- Step 4: Remove the adjustment rod out of the drive block and adjustment rod retainer while removing the adjustment collars.
- Step 5: Remove the upper adjustment rod retainer on the right side of the frame.
- Step 6: Remove electric box mounting plate located above bearing block assembly.

(C) Install Enclosed Limit Switch System:

- Step 1: Loosen the two 3/8" nuts that secure the angle actuator on the drive block. Move actuator to a more vertical position. Do not retighten nuts at this time.
- Step 2: Install the new electric box mounting plate into the machine in the same location as the old one. (See Photo 1)
- Step 3: Install the new limit switch assembly by inserting the adjustment rod through the angle actuator on the drive block. Slide the electric box assembly into position on the electric box mounting plate. Align the hole in the limit switch plate, electric box, and the electric box mounting plate. Then install the four sheet metal screws provided. (See Photo 2)



Photo 1 - Install mounting plate.

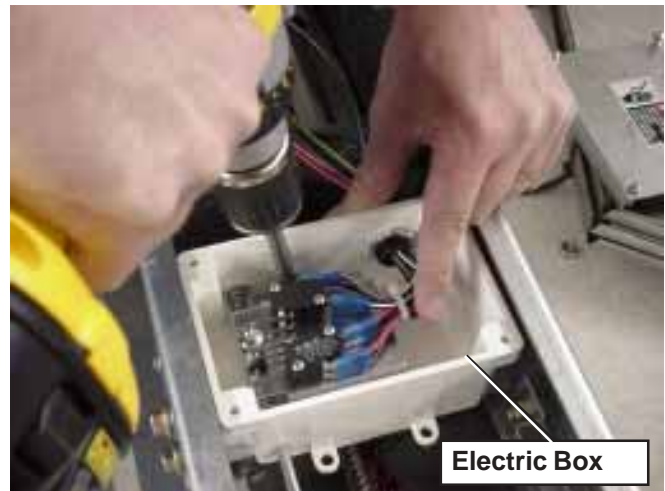


Photo 2 - Installing new electric box.

(C) Install Enclosed Limit Switch System (*cont.*)

Step 4: Install 2 adjustment rod locking collars over the top of the adjustment rod.

Step 5: Install the new limit switch rod angle bracket by sliding it over the limit switch rod and attaching it to the bolt where the old bracket was attached. (See Photo 3)

Step 6: Align the angle actuator on the drive block so that the actuator rod is centered in the hole of the actuator. Tighten the two 3/8" nuts at this time.

Step 7: Align the top locking collar with the orange adjustment line decal on the curtain machine. Set the two collars above and below the drive block to the correct position to be determined by the installer. (See Photo 4)

Step 8: Position (if needed) the limit switch actuator pin in the center of the limit switch arms. (See Photo 5)

Step 9: Wire-nut the enclosed limit switch leads to the existing leads color to color (See Figure 3 on page 4 for wiring diagram.)

Step 10: Install the box cover and gasket.

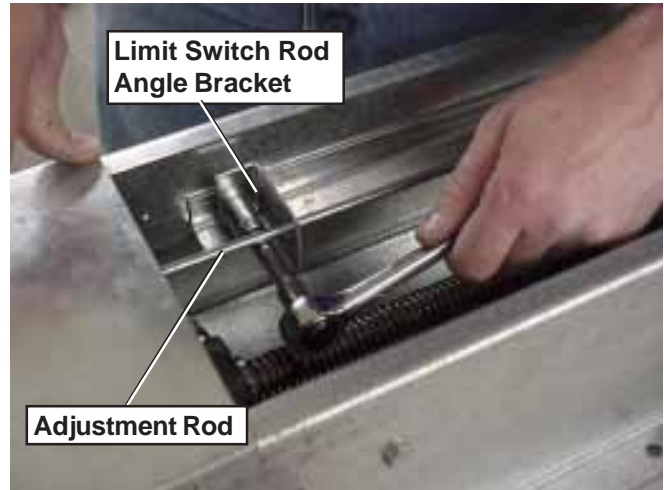


Photo 3 - Installing limit switch rod angle bracket.



Photo 4 - Align locking collars.



Photo 5 - Center limit switch actuator pin between limit switch arms.

WIRING DIAGRAM FOR 110V 60Hz

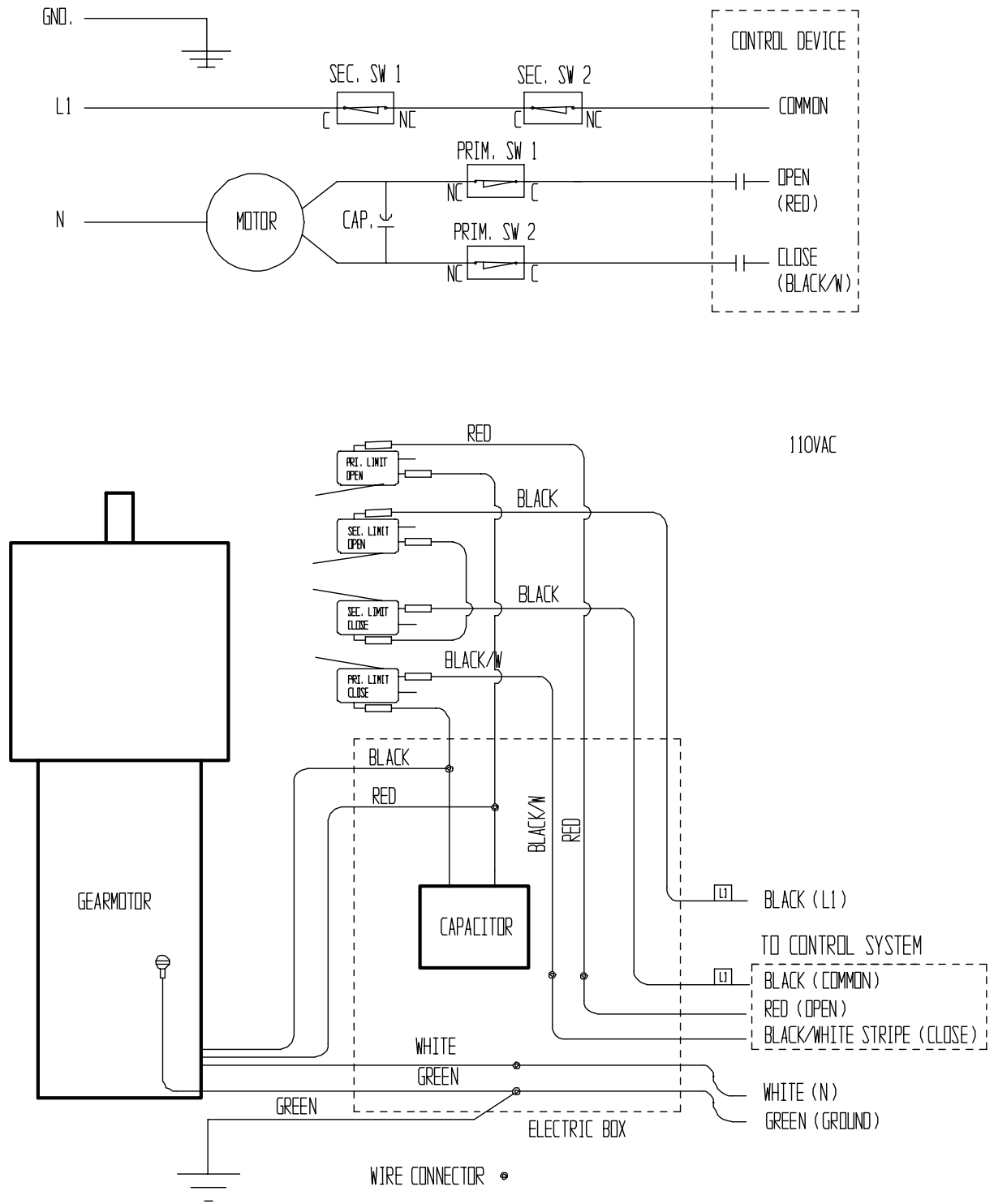


Figure 3

(D) Test Switches for Proper Operation

Note: To insure your safety and the integrity of the machine, it is recommended that one person should test the limit switches while another person is available to disconnect the power supply in the event of limit switch failure.

Step 1: Operate the machine in the close mode (drive block will be traveling towards the motor). While the machine is closing, pull **down** on the adjustment rod (towards the motor) to activate the limit switch and the motor ***should stop**.

Step 2: Operate the machine in the open mode (drive block will be traveling away from the motor). While the machine is opening, push **up** on the adjustment rod (away from the motor) to activate the limit switch and the motor ***should stop**.

****If the machine does not stop, disconnect and lockout power to the machine immediately. After power is disconnected, check the wiring and connections and repeat Step 1 and Step 2.***



Photo 6

**P.O. Box 20
1004 E. Illinois St.
Assumption, IL 62510-0020
Phone: 217-226-4421
Fax: 217-226-4420**

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