

INSTALLATION INSTRUCTIONS

MODELS 780-CD, AND 790-CW ROLL-UP DOORS, WITH SIDE MOUNT OPERATOR



The Genuine. The Original.



This installation manual provides the trained door technician information required to install this door.

READ COMPLETE INSTRUCTIONS BEFORE INSTALLING DOOR.

Some installation tasks listed in this document are found in other documents.

Please refer to the appropriate document(s) as directed;

**Expansion Anchor Requirement
500436-0001 found on
Ribbon Connect**

**41510.00119 Installation Instructions
for Motor Enclosure (Included)**

This manual is intended ONLY for professional use by a trained door systems technician. All others please refer to the end user manual provided to you.

The Genuine. The Original.



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SECTION 1 - SAFETY INFORMATION

IMPORTANT SAFETY INSTRUCTIONS

⚠ WARNING

ROLLING DOORS ARE LARGE, HEAVY OBJECTS THAT MOVE WITH THE HELP OF ELECTRIC MOTORS. SINCE MOVING OBJECTS AND ELECTRIC MOTORS CAN CAUSE INJURIES, YOUR SAFETY AND THE SAFETY OF OTHERS DEPENDS ON YOU READING THE INFORMATION IN THIS MANUAL. IF YOU HAVE ANY QUESTIONS OR DO NOT UNDERSTAND THE INFORMATION PRESENTED, YOU SHOULD CONSULT A LICENSED PROFESSIONAL OR CALL TECHNICAL SUPPORT AT 1-800-764-1457.

DEFINITION OF KEY WORDS USED IN THIS MANUAL:

⚠ DANGER INDICATES A HAZARDOUS SITUATION THAT, IF NOT AVOIDED, WILL RESULT IN DEATH OR SERIOUS INJURY.

⚠ WARNING INDICATES A HAZARDOUS SITUATION THAT, IF NOT AVOIDED, COULD RESULT IN DEATH OR SERIOUS INJURY.




⚠ CAUTION INDICATES A HAZARDOUS SITUATION THAT, IF NOT AVOIDED, COULD RESULT IN MINOR OR MODERATE INJURY.

NOTICE

INDICATES INFORMATION CONSIDERED IMPORTANT, THAT IT IS NOT RELATED TO INJURY, BUT MAY RESULT IN PROPERTY DAMAGE.

IMPORTANT: Required key step for proper door operation.

NOTE: Information only.

Potential Hazard	Effect	Prevention
 <p>MOVING DOOR</p>	<p>⚠ WARNING COULD RESULT IN DEATH OR SERIOUS INJURY</p>	<p>Keep people clear of opening while Door is moving.</p> <p>Do NOT allow children to play with the Door Operator.</p> <p>Do NOT operate a Door that jams or one that has a broken spring.</p>
 <p>ELECTRICAL SHOCK</p>	<p>⚠ WARNING COULD RESULT IN DEATH OR SERIOUS INJURY</p>	<p>Turn OFF electrical power before wiring switch and door operator to supply.</p>
 <p>HIGH SPRING TENSION</p>	<p>⚠ WARNING COULD RESULT IN DEATH OR SERIOUS INJURY</p>	<p>Do NOT try to remove, install, repair or adjust springs or anything to which door spring parts are fastened, such as, wood blocks, steel brackets, cables or other like items.</p> <p>Installations, repairs and adjustments must be done by a trained door system technician using proper tools and instructions.</p>

SECTION 4 - PRE-INSTALLATION CHECK LIST

Verify that the door installation can be accomplished before proceeding:

- Locate the work order "DOOR INSTALLATION DATA" sheet, see FIG 2, inside the door hardware box.
- Does the wall opening shown in FIG 3 match the Opening Width and Height shown on the "Door Installation Data" sheet?
- Are the guides you received suitable for the jambs? Compare the guides type shown on the "Door Installation Data" sheet with FIG 4.
- Can the guides be installed plumb?
- Check the sill for level. If sill is not level, mark the high sill location on the low side jamb.
- Guides are designed to rest on sill.
- Consult the factory if the actual opening width is greater than shown on the packing slip more than 1-1/2 inches.
- Bracing may be required to prevent light weight building jambs from twisting.
- Bottom bar and weatherseal will remain exposed in opening (approx 4") below header when door is fully raised.

OPERATION	DOOR TYPE	C*	D*	E*	F**	G*
PUSH UP	790	10"	10"	6"	6"	12"
	780	10"	10"	4"	4"	8"
REDUCED CHAIN DRIVE	790	10"	10"	4"	6"	10"
	780	10"	10"	4"	8"	12"
OPERATOR	790	10"	10"	4"	4"	8"
	780	10"	10"	4"	6"	10"

* Excess shaft may be cut off of non-drive sides of doors for additional clearance. It is recommended that at least 1" of shaft be retained past the headplate to facilitate spring tension adjustment.
 ** Dimension "F" applies to Drive End only. RH shown, LH opposite.

OPENING HEIGHT		HEAD PLATE HEIGHT		AXLE SETTING		BACK ROOM	
OVER	UP TO	RECOMMENDED	MINIMUM	RECOMMENDED	MINIMUM	RECOMMENDED	MINIMUM
-	7' 8"	10"	8"	9-1/8"	SAME	18-1/8"	SAME
7' 9"	9' 4"	10-1/2"	8-1/2"	9-1/8"	SAME	18-3/8"	SAME
9' 5"	11' 0"	11"	10"	10-1/4"	SAME	19-3/4"	SAME
11' 1"	12' 8"	11-1/2"	10-1/2"	10-1/4"	SAME	20-1/4"	SAME
12' 9"	14' 3"	12"	11"	10-1/2"	SAME	20-1/2"	SAME
14' 4"	16' 0"	13"	12"	10-1/2"	SAME	21"	SAME

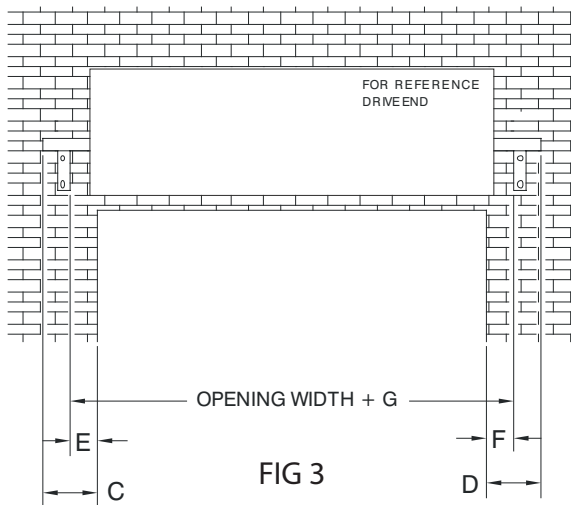


FIG 3

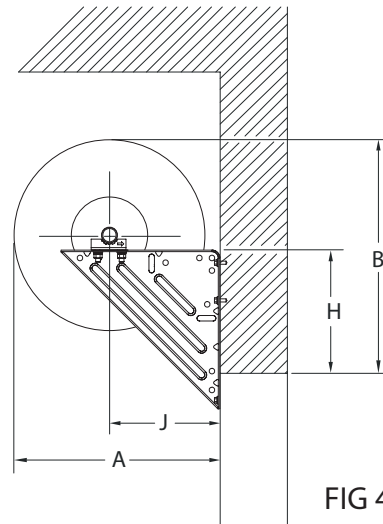


FIG 4

OPENING HEIGHT		HEAD ROOM	
OVER	UP TO	RECOMMENDED	MINIMUM
-	7' 8"	20-1/4"	18-1/4"
7' 9"	9' 4"	21"	19"
9' 5"	11' 0"	21-3/4"	20-3/4"
11' 1"	12' 8"	22-3/4"	21-3/4"
12' 9"	14' 3"	23-1/4"	22-1/4"
14' 4"	16' 0"	24-3/4"	23-3/4"

SECTION 4 - PRE-INSTALLATION CHECK LIST

Read the installation instructions thoroughly to become familiar with the names of the various components and their relation to each other. It is necessary for the installer to determine the following:

- Type of jamb material (wood, masonry, or steel) on which the door guides will be mounted.
- The dimensions for the opening width, opening height, headroom, and side room.

TOOLS

Commonly used tools for proper installation are:

- Electric drill with 3/8" or 1/2" chuck with nut driver and drill bits.
- Masonry drill or impact hammer and bits.
- Ladders and/or scaffolding.
- Hammer and pliers.
- Center punch and Screwdrivers.
- Wrenches, vise grips, and C-clamps.
- Tape measure and a water level.

UNPACKING DOORS

Before removing the door from any packaging, inspect the packaging for visible signs of damage. If damage is noted, file a freight claim with the freight company immediately. Remove the door from the packaging.

WARNING

DO NOT CUT TAPE THAT HOLDS DOOR IN A ROLL UNTIL INSTRUCTED TO DO SO.

NOTE: Right and Left Hand is determined by facing the door opening, on the coil side.

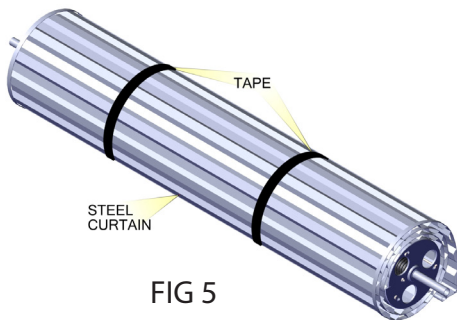


FIG 5

TABLE 1 - HEADPLATE FASTENER TABLE

Jamb Condition	Fasteners	Drill Size	Fastener Specifications
Steel	3/8" Bolt	7/16" Dia.	-
Concrete/ Masonry	3/8" Exp. Anchor	*3/8" Dia.	Use ANSI B95.12 carbide tipped drill bit.
Wood	3/8" Lag Screw	5/16" Dia.	-

*Drill size for supplied fasteners.
For others, refer to manufacturer's specified installation method.
See Page 6 For illustration.

FASTENER TABLE

Jamb	DOOR MODELS	DOOR WIDTH	FASTENER	SPACING
STEEL	780CD	Up to 16'0"	1/4" Screw	Every other hole
	790CW	Up to 20'0"	1/4" Screw	Every hole
CONCRETE/ MASONRY	780CD	Up to 16'0"	1/4" Masonry Screw (3/16" Drill Size, 2-1/4" Deep)*	Every other hole
			Optional 1/4" Expansion Anchor (1/4" Drill Size)	
	790CW	Up to 16'0"	3/8" Expansion Anchor	Every hole
		Over 16'0" to 20'0"	1/2" Expansion Anchor	Every hole
WOOD	780CD	Up to 16'0"	1/4" Lag Screw	Every other hole
	790CW	Up to 16'0"	3/8" Lag Screw	Every hole
		Over 16'0" to 20'0"	1/2" Lag Screw	Every hole

SECTION 5 - DOOR INSTALLATION

STEP 1 INSTALL CURTAIN GUIDES TO JAMB

- Mount curtain guides to the surface using supplied fasteners. See FIG 6.
- Check Dimensions as illustrated in FIG 4 on page 6. Dimensions must match your "DOOR INSTALLATION DATA" sheet.
- Both guides **MUST** be on a level line and both guides **MUST** be plumb.
- The Dimensions must be held within 1/8" over the entire height of the guides.

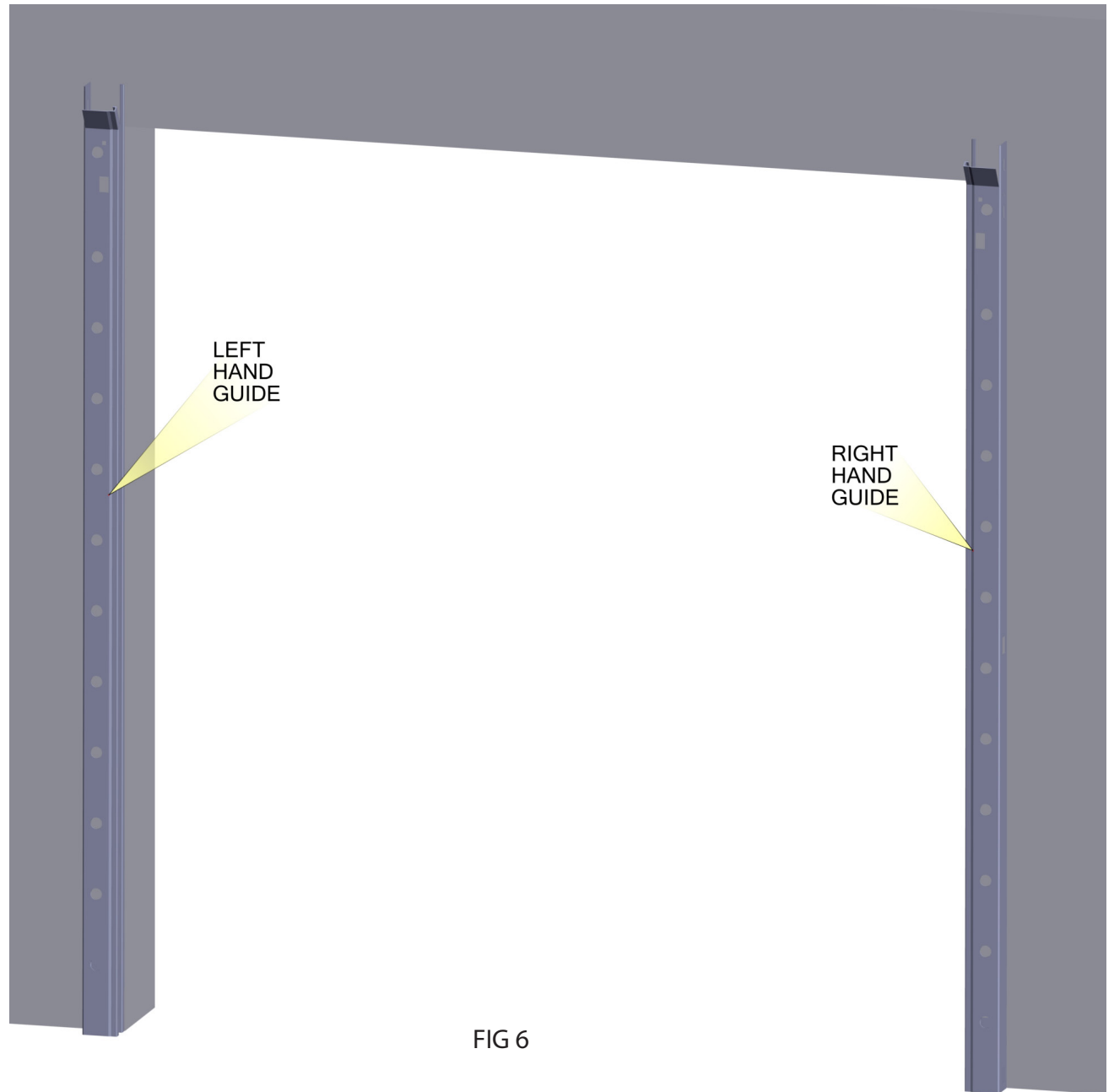


FIG 6

SECTION 5 - DOOR INSTALLATION

STEP 2 INSTALL SUPPORT BRACKETS

- From the Dimension Tables on page 6, mark the width location of each bracket by using dimension "A" for the operator side and 5" for the non-operator side. If the actual opening width varies from the packing slip width, adjust these dimensions by adding or subtracting 1/2" of the difference to each dimension. Subtract if the opening is larger and add if smaller. Mark the height location of the brackets by using dimension "C". Verify the ceiling clearance minimum from dimension "B". Use a string and a level to verify that the brackets are level with each other. Adjust bracket height as needed to level. Drill anchor holes and fasten the brackets with the anchors provided.

IMPORTANT: BRACKETS MUST BE LEVEL TO EACH OTHER WITH RESPECT TO HEIGHT. FAILURE TO LEVEL BRACKET HEIGHTS WILL PREVENT DOOR FROM OPERATING PROPERLY.

⚠ WARNING

KEEP LOOSE CLOTHING, FINGERS, HANDS AND ARMS AWAY FROM ALL MOVING MECHANISMS, OR SERIOUS INJURY OR DEATH COULD RESULT.

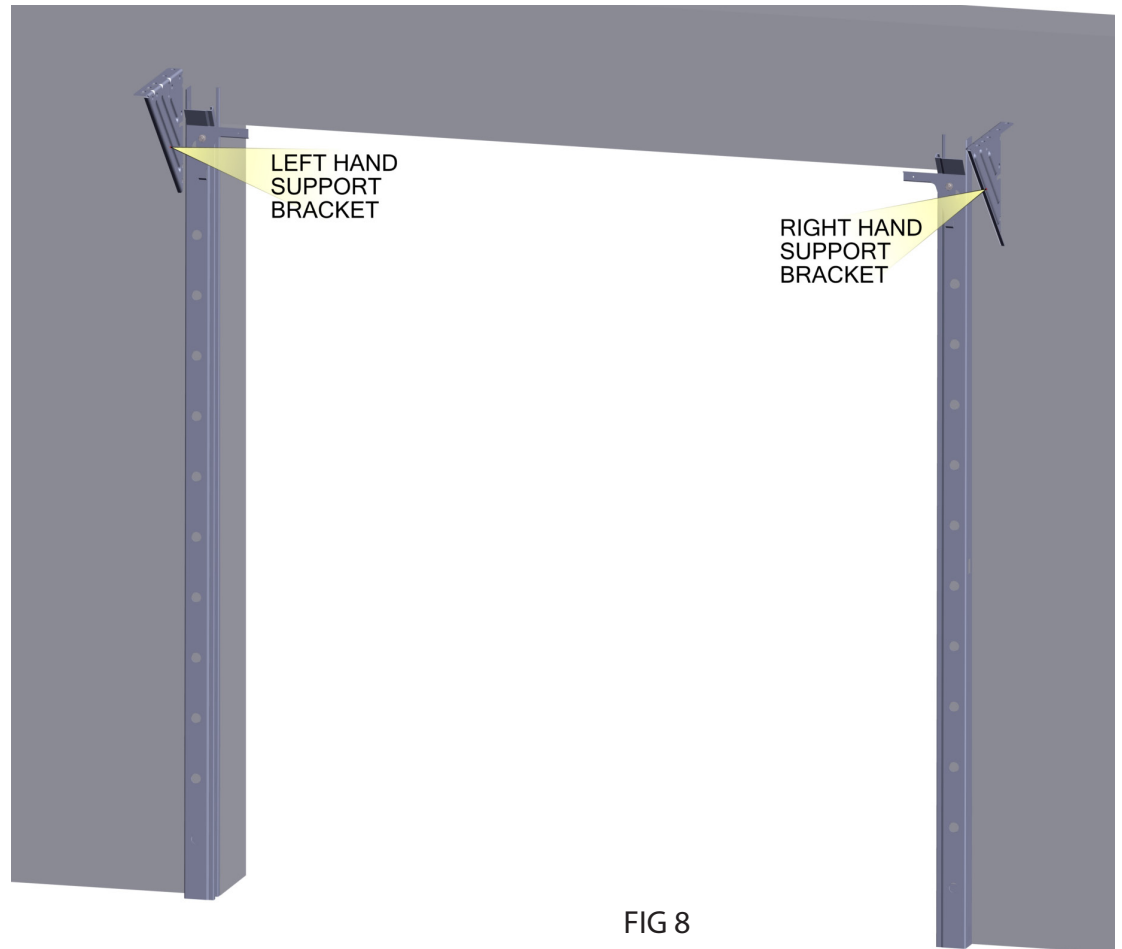


FIG 8

SECTION 5 - DOOR INSTALLATION

STEP 3 INSTALL BRACKETS

- Assemble the sprocket, bearing, and the sprocket bracket together using 3/8"-16 x 1" hex head bolts, 3/8" lock washers, and 3/8" flat washers. See FIG 8A and FIG 8B.
- Position the assembly up against the drum wheel of the curtain assembly. One the holes are aligned secure it with 3/8"-16 x 1" hex head bolts, 3/8" lock washers, 3/8" flat washers, and 3/8"-16 hex nuts. See FIG 8A and FIG 8C.

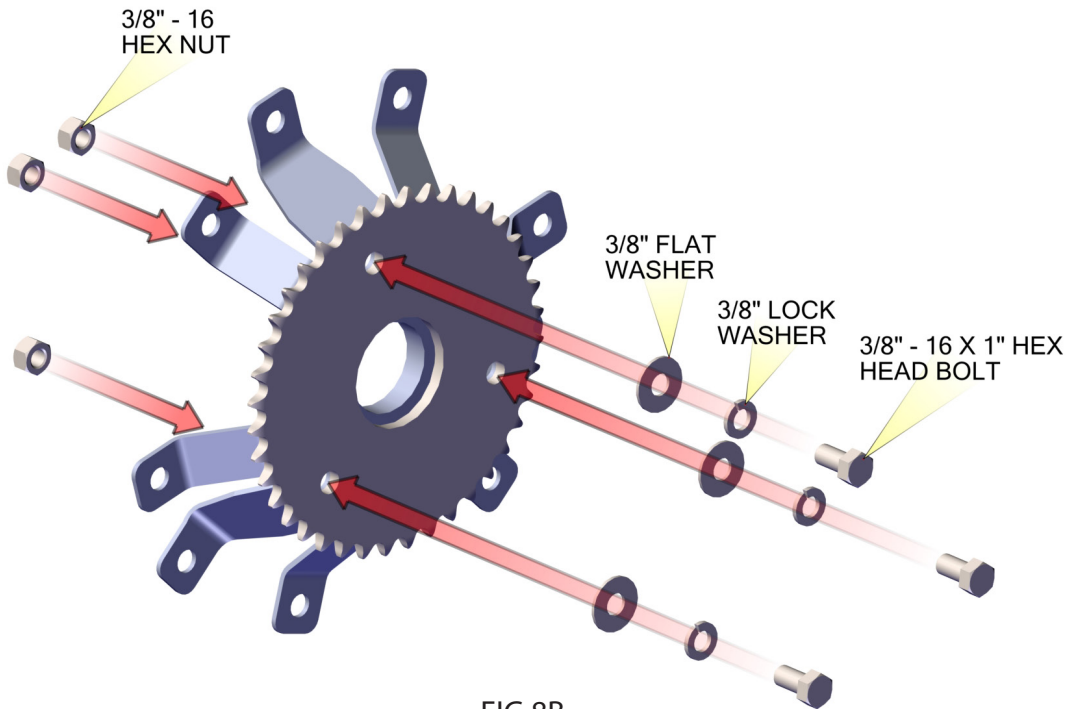


FIG 8B

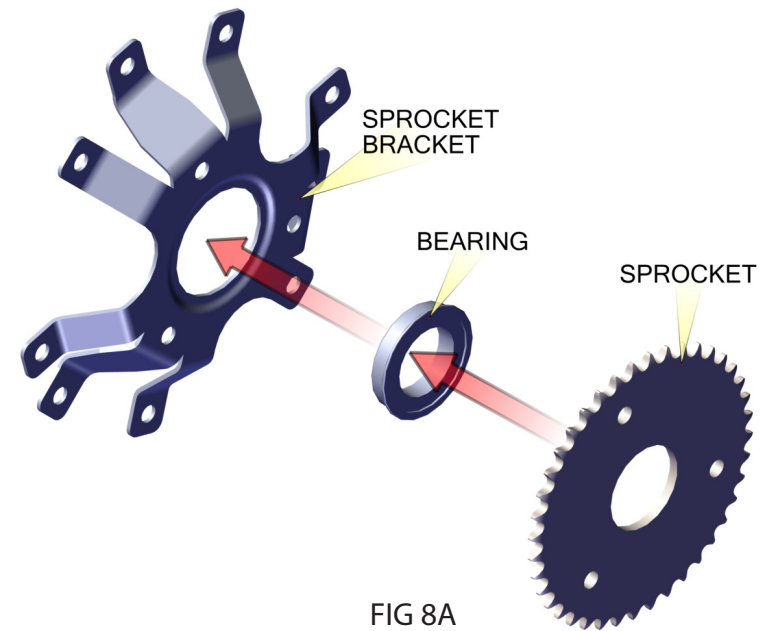


FIG 8A

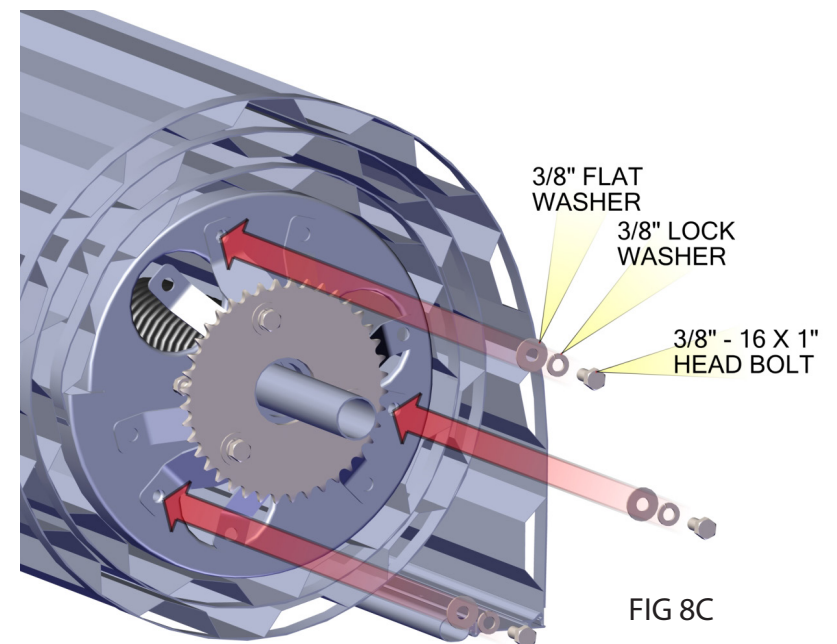


FIG 8C

SECTION 5 - DOOR INSTALLATION

STEP 4 LIFTING THE CURTAIN AND SECURING CURTAIN ASSEMBLY

⚠ WARNING

CURTAIN ASSEMBLY IS HEAVY. ALLOWING CURTAIN ASSEMBLY TO FALL WHILE LIFTING, COULD RESULT IN SEVERE OR FATAL INJURY.

⚠ WARNING

TO AVOID SEVERE OR FATAL INJURY, NEVER WALK, STAND, OR WORK BELOW CURTAIN ASSEMBLY BEFORE IT IS SECURED TO HEADPLATES.

NOTE: Be sure that the door is able to revolve without scraping against door header or guides.

- Lift the curtain assembly up to the support brackets. See Figure 9A.
- Curtain must be centered on door opening.
- Install saddle clamps at both ends of door shaft as shown in Figure 9B and Figure 9C. Ensure the bottom saddle clamps' arrows are pointing toward the mounting wall and the top saddle clamps arrows are pointing away from the mounting wall. With the bottom bar on the curtain hanging down, tighten the saddle clamps to headplates.

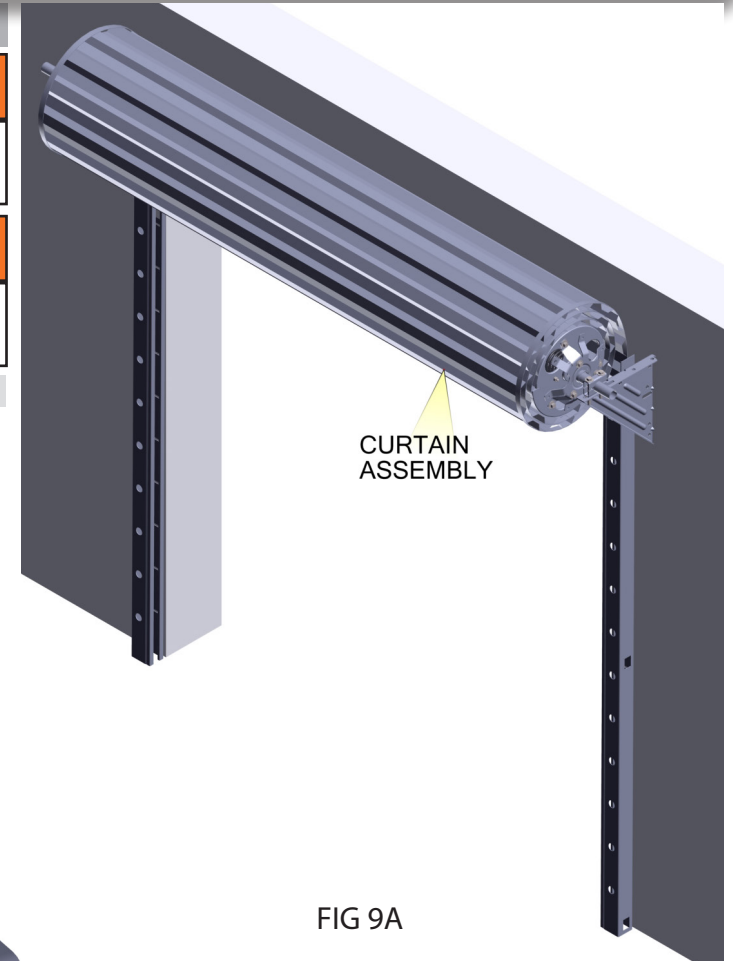


FIG 9A

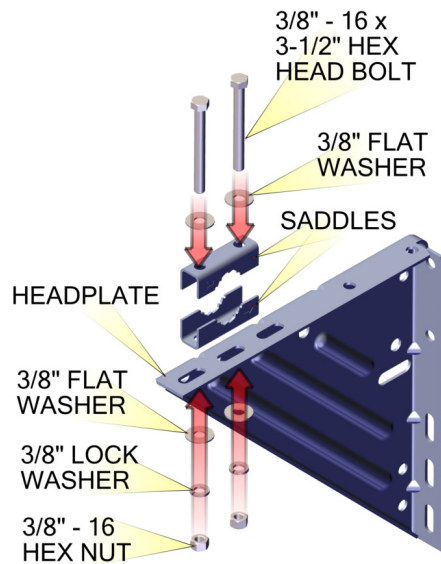


FIG 9B

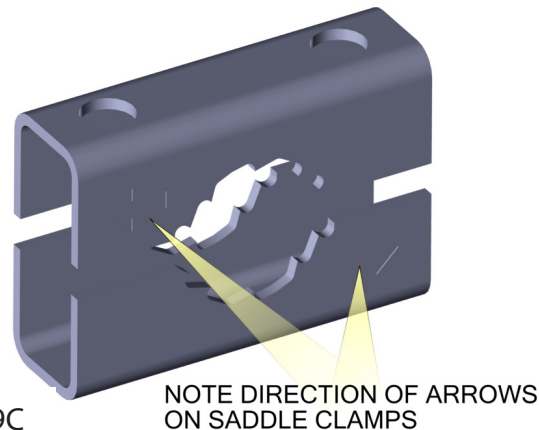


FIG 9C

SECTION 5 - DOOR INSTALLATION

STEP 5 APPLY INITIAL TENSION TO THE DOOR SPRINGS

- Secure bottom bar to prevent curtain from unwinding and remove retaining bands
- With the door shaft clamped into position, rotate the curtain to add spring tension as indicated in FIG 10. Rotate the curtain 2 times to create 2 initial turns of spring tension.
- Lower bottom bar into guide openings and lower curtain to the floor.
- Install bottom bar stops as shown in Figure 10. Make certain the head of the bolt is on the inside of the guides for proper door operation.
- Make sure radius at top of guides leads curtain into guides smoothly. If necessary, bend radius to adjust.
- Lift and lower the door to test spring tension. If the door is easy to close but hard to open, more initial turns of spring tension is needed. If the door is easy to open but hard to close, less initial turns of spring tension is needed.
- To change the initial turns, open the door with control until the curtain is completely coiled. Bind the coiled curtain with a rope to prevent unraveling. Rotate the curtain with control to remove spring tension 2 times to achieve 0 initial turns of spring tension. If a partial initial turn is needed, loosen the saddle clamps, rotate the entire curtain assembly so the bottom bar is in the position of the desired initial turn indicated in FIG 10. While holding the curtain in this position, tighten the saddle clamps. Rotate the curtain to add spring tension to the desired initial turns. Remove the rope around the curtain, lower the bottom bar into the guides, and test spring tension. Repeat with a different initial turn amount if necessary.
- Do not let go of the coiled curtain when spring tension is applied.

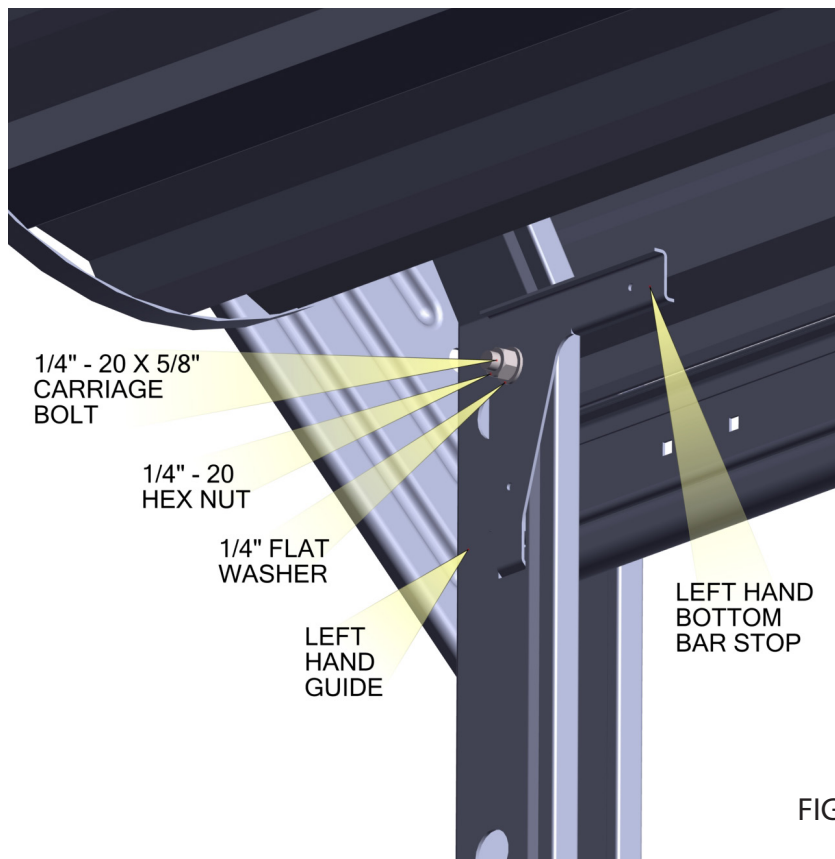
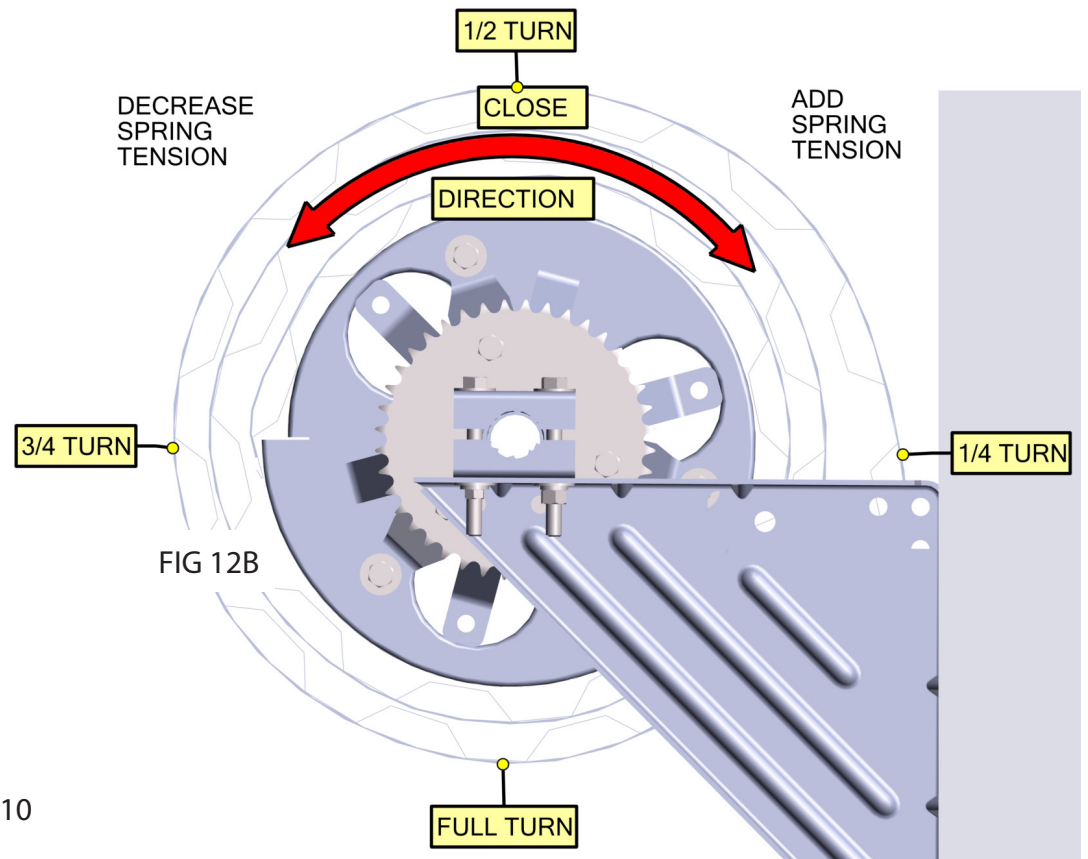


FIG 10



SECTION 5 - DOOR INSTALLATION

STEP 6 INSTALLING LIFT HANDLE AND SLIDE BOLT LOCKS

- Install a lift handle (if included) on the bottom bar weight, centered on the coil or inside of the door using 1/4" - 20 x 1-1/2" carriage bolts and 1/4" - 20 flange hex nuts to assemble the lift handle, bottom bar, and bottom bar weight together.
- Install slide locks to bottom bar as shown in Figure 12.

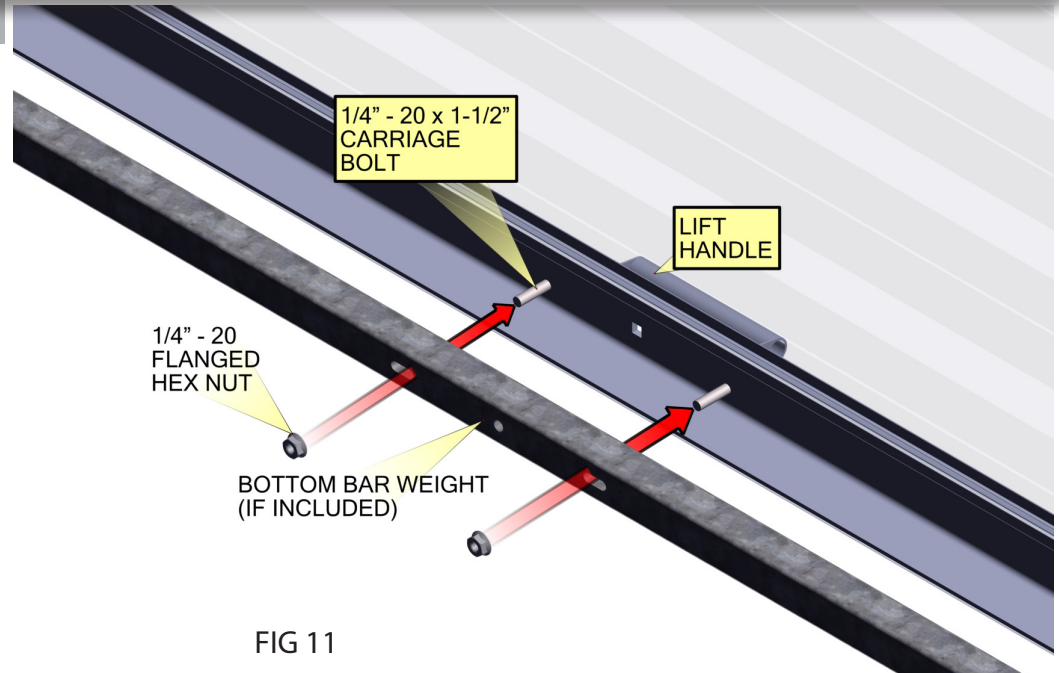


FIG 11

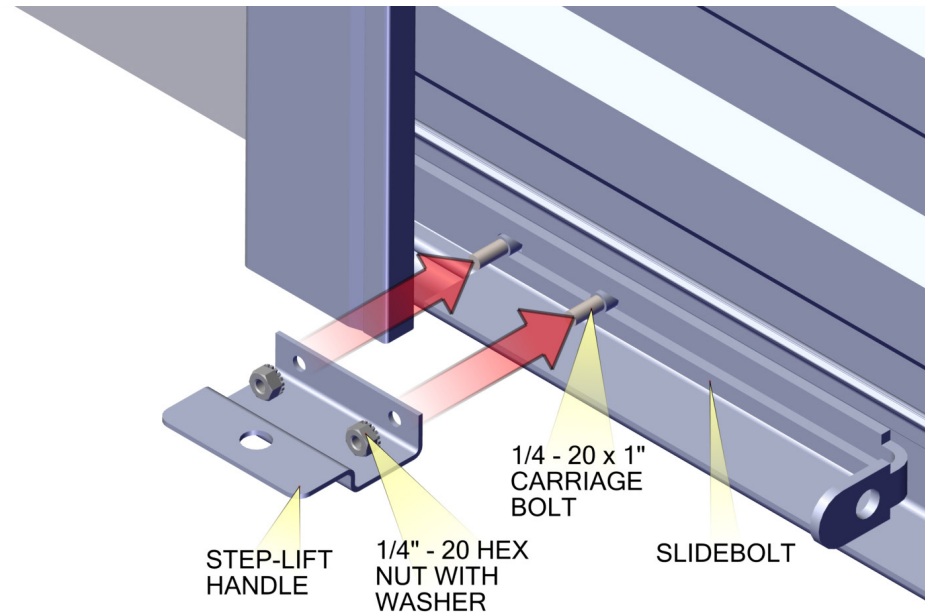


FIG 12

SECTION 5 - DOOR INSTALLATION

STEP 7 INSTALLING OPTIONAL TOP DRAFT

- With door closed, mark attachment point for header seal on curtain (Figure 13).
- Raise curtain until attachment point is accessible holes for rivets on 12" centers using a number 29 drill.
- Hold header seal along attachment point and drill.
- Secure header seal to curtain using 1/8" diameter, large flange rivets.

NOTE: Top draft stop may not seal on the header if not installed on a corrugation, as shown.

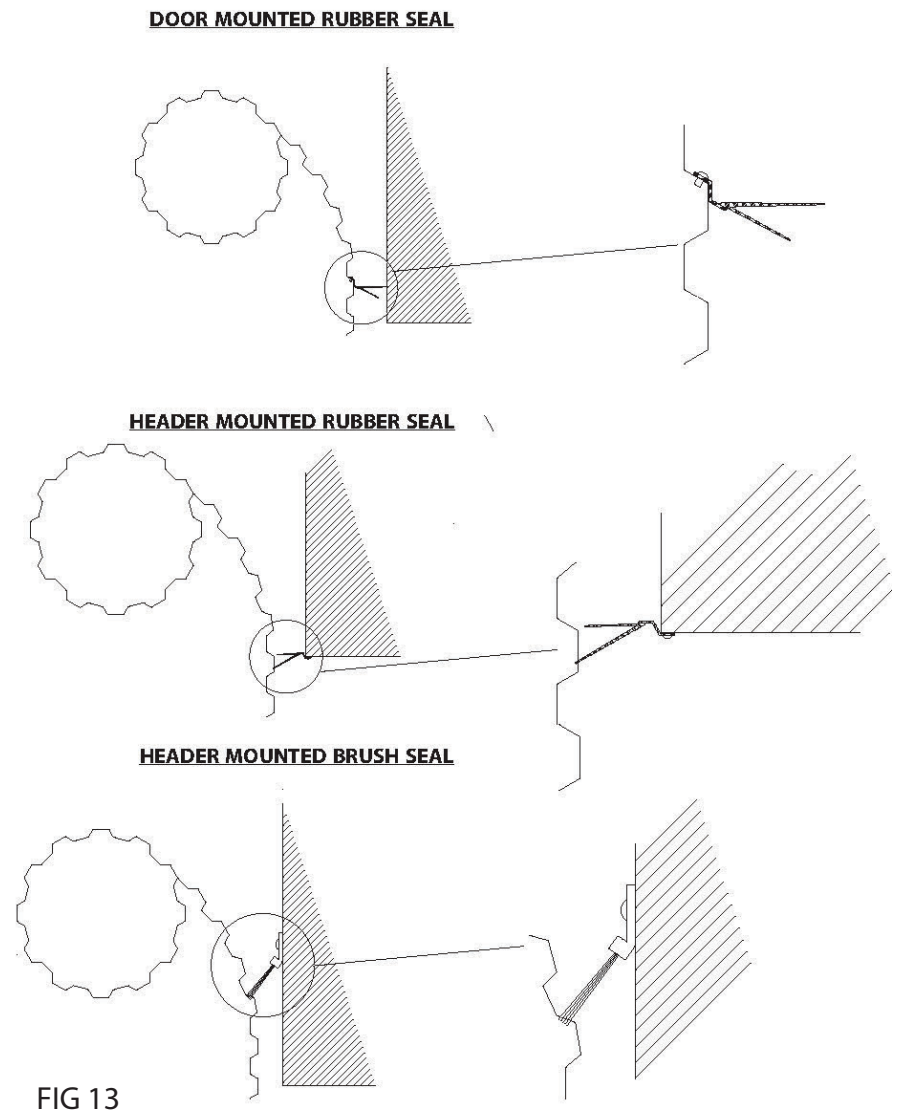


FIG 13

SECTION 6 - TROUBLESHOOTING

SYMPTOM	POSSIBLE CAUSE
1. Door is easy to close, but hard to open...	- Insufficient spring tension.
2. Door is easy to open, but hard to close...	- Excessive spring tension.
3. Door is hard to operate...	<ul style="list-style-type: none"> - Mounting brackets are not level. - Curtain assembly is not parallel to opening. - Door assembly incorrect distance from wall. - Guide leads are improperly adjusted. (Adjustment must be made with door fully closed). - Guides may be damaged. - Insufficient clearance between curtain and inside of guide. (Check Figure 6 for required clearance on both sides). - Mounting brackets too low. Check Figures 3 & 4 for proper location.
4. Bottom weatherseal does not contact floor evenly...	<ul style="list-style-type: none"> - Floor is not level. - Mounting brackets are not level. - Guides are not plumb. - Spring tension too high. See Page 12, Figure 10 for tension Adjustment procedures.
5. Door telescopes or rolls up unevenly...	<ul style="list-style-type: none"> - Mounting brackets are not level, or are too low. - To straighten door curtain: <ul style="list-style-type: none"> A. Adjust mounting brackets to the correct position (Figures 3 and 4). B. While positively retaining door curtain to prevent unwinding of spring, remove guides from jambs. C. Lower curtain to floor, and carefully raise, to square the curtain back up on the barrel. (DO NOT remove positive hold on curtain until guides are back in place). Repeat as necessary. D. Replace guides and bottom bar stops.
6. Door operates stiffly or curtain rattles over guide leads...	<ul style="list-style-type: none"> - Guides are too long. - Door assembly is mounted too far from opening. <ul style="list-style-type: none"> A. Adjustment must be made with door fully open. B. Loosen saddle clamp bolts on one end. C. Push curtain assembly toward header until correct setting has been obtained. See dimension "J" on Page 6. D. Retighten saddle clamp bolts. E. Repeat procedure for other end of curtain. Assembly MUST BE parallel with header. - Add shim behind top guide attachment to wall. - Mounting brackets too low: <ul style="list-style-type: none"> A. Raise brackets, or B. Cut track from bottom. (Door will hang in opening).

770-SS, 780-CD 790-CW Roll-Up Sheet Door Limited Warranty

Overhead Door Corporation ("Seller") warrants to the original purchaser of the Series 790-CW, 780-CD or 770-SS Rolling Sheet door identified below (the "Product"), subject to all of the terms and conditions hereof, that the Product and all components thereof will be free from defects in materials and workmanship under normal use for the following period(s), measured from the date of installation:

- **ONE (1) YEAR ON ALL PARTS AND COMPONENTS**

Seller's obligation under this warranty is specifically limited to repairing or replacing, at its option, any part which is determined by Seller to be defective during the applicable warranty period. Repair or replacement labor for any defective Product part or component is included for a period of one (1) year from the date of installation. After that, any labor charges are excluded and will be the responsibility of the purchaser.

This warranty is made to the original purchaser of the Product only, and is not transferable or assignable. This warranty does not apply to any unauthorized alteration or repair of the Product, or to any Product or component which has been damaged or deteriorated due to misuse, neglect, accident, failure to provide necessary maintenance, normal wear and tear, or acts of God or any other cause beyond the reasonable control of Seller.

This warranty does not apply to any damage or deterioration caused by exposure to salt water, chemical fumes or other corrosive or aggressive environments, whether naturally occurring or man-made, including, but not limited to, environments with a high degree of humidity, sand, dirt or grease. This warranty specifically excludes any damage resulting from scratching, abrasion or impact by any hard object, and any fading or color change which may not be uniform due to unequal exposure of the curtains to sunlight or other elements. Wearing away of the painted surfaces of the Product is a common occurrence resulting from the curtain repeatedly coiling upon itself and uncoiling during normal usage (See DASMA #274), and is specifically excluded from this warranty.

THIS WARRANTY IS EXCLUSIVE AND IN LIEU OF ANY OTHER WARRANTIES, EITHER EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

IN NO EVENT SHALL SELLER BE RESPONSIBLE FOR, OR LIABLE TO ANYONE FOR, SPECIAL, INDIRECT, COLLATERAL, PUNITIVE, INCIDENTAL OR CONSEQUENTIAL DAMAGES, even if Seller has been advised of the possibility of such damages. Such excluded damages include, but are not limited to, loss of goodwill, loss of profits, loss of use, cost of any substitute product, interruption of business, or other similar indirect financial loss.

Claims under this warranty must be made promptly after discovery, within the applicable warranty period, and in writing to the Seller or to the authorized distributor or installer whose name and address appear below. The purchaser must allow Seller a reasonable opportunity to inspect any Product claimed to be defective prior to removal or any alteration of its condition. Proof of the purchase and/or installation date, and identification as the original purchaser, may be required.

ORIGINAL PURCHASER: _____
INSTALLATION ADDRESS: _____
SELLER: _____
SELLER'S ADDRESS: _____
FACTORY ORDER #: _____
DATE OF INSTALLATION: _____
SIGNATURE OF SELLER: _____