

Motorized Carousel Installation Manual

Includes Models:

R20	R39	R45
T20	T39	T45
S20	S39	S45

For Installation Assistance Call 1-800-210-0141

Motorized_Carousel_Installation_im-1061-03-May2015

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TOOL LIST

Tool.....	Size(s), and additional notes
Combo Wrenches.....	7/16", 1/2", 9/16", 5/8", 11/16", 3/4", 15/16", 1 1/8"
Sockets	7/16", 1/2", 9/16", 5/8", 11/16", 3/4", 15/16", 1 1/8"
Punchs.....	1/4", centre punch
Wire stripper	
Drift/alignment tool	
Hammer	
Pry bar	
Tin snips	
Pliers	
Screw drivers.....	1/8" flat, #1 Robertson, #2 Robertson, #3 Robertson, #2 Phillips
1/4" Impact driver	with 5/16", 3/8" hex driver bits, with socket adapter
Drill	with 3/16", 1/4", 5/16", 3/8", 1/2" bits
1/2" Impact.....	with sockets to fit
Hammer drill.....	5/8" bit
Extension cord.....	50ft
1 Step ladders.....	6ft
Optional:	
2 carts (4 swivel wheels)	
Shop vacuum	

INSTALLATION BOLT SIZES






Bolt Size	Page # and Machine Location	
1/2" x 1 1/2" bolt.....	Page 3, Page 6, Page 7, Page 8	
1/2" x 2 1/2" bolts.....	Page 7, Page 9	
3/8" x 1" bolt.....	Page 14	
3/8" x 3 1/2" bolt.....	Page 15	
5/8" x 5" anchor bolts.....	Page 17	

FIGURE 1 - INSTALLING THE SETUP PIPE ONTO THE END FRAME

- 1. Install set up pipe onto the top cross brace mount or setup pipe mounting plate using (2) 1/2" x 1 1/2" bolts. (A)

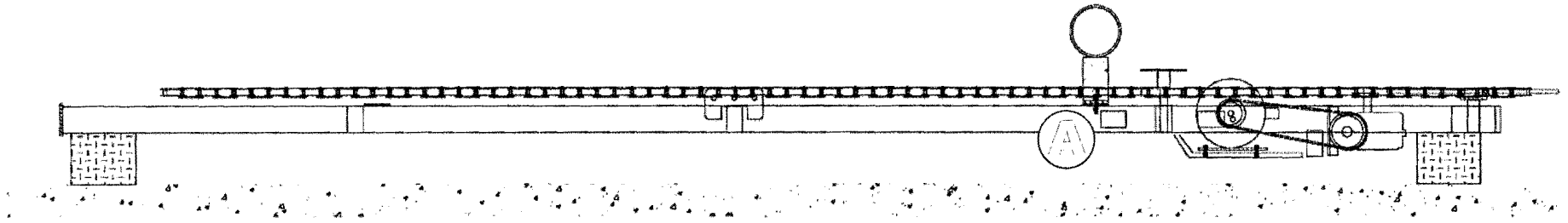
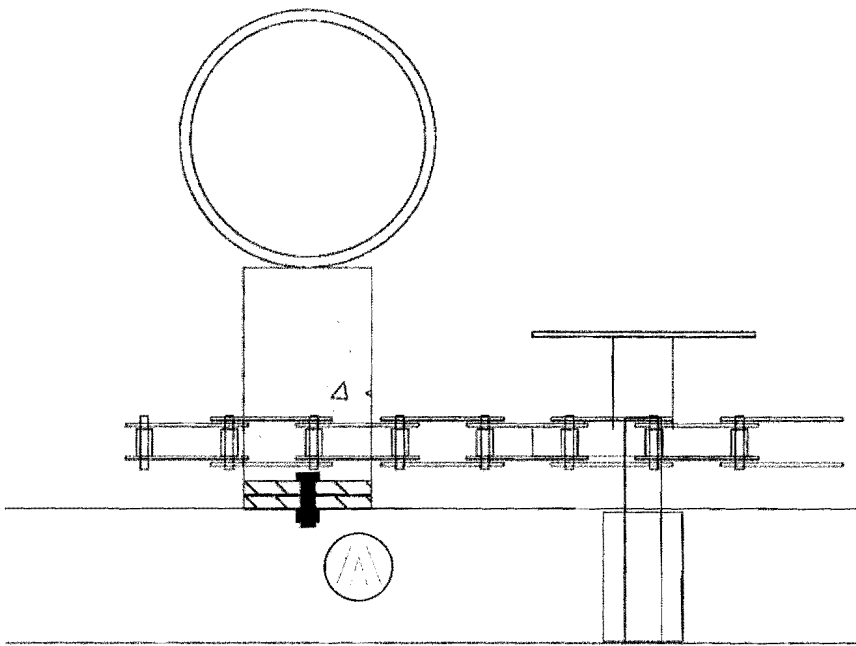


FIGURE 2—INSERTING THE FORKLIFT INTO THE SET UP PIPE

1. Level the forklift forks and insert the outside fork into the setup pipe as far as possible making sure that the end frame clears the fork lift mast. Chain setup pipe onto the forklift mast. (Ensure the end frame is facing the right way)

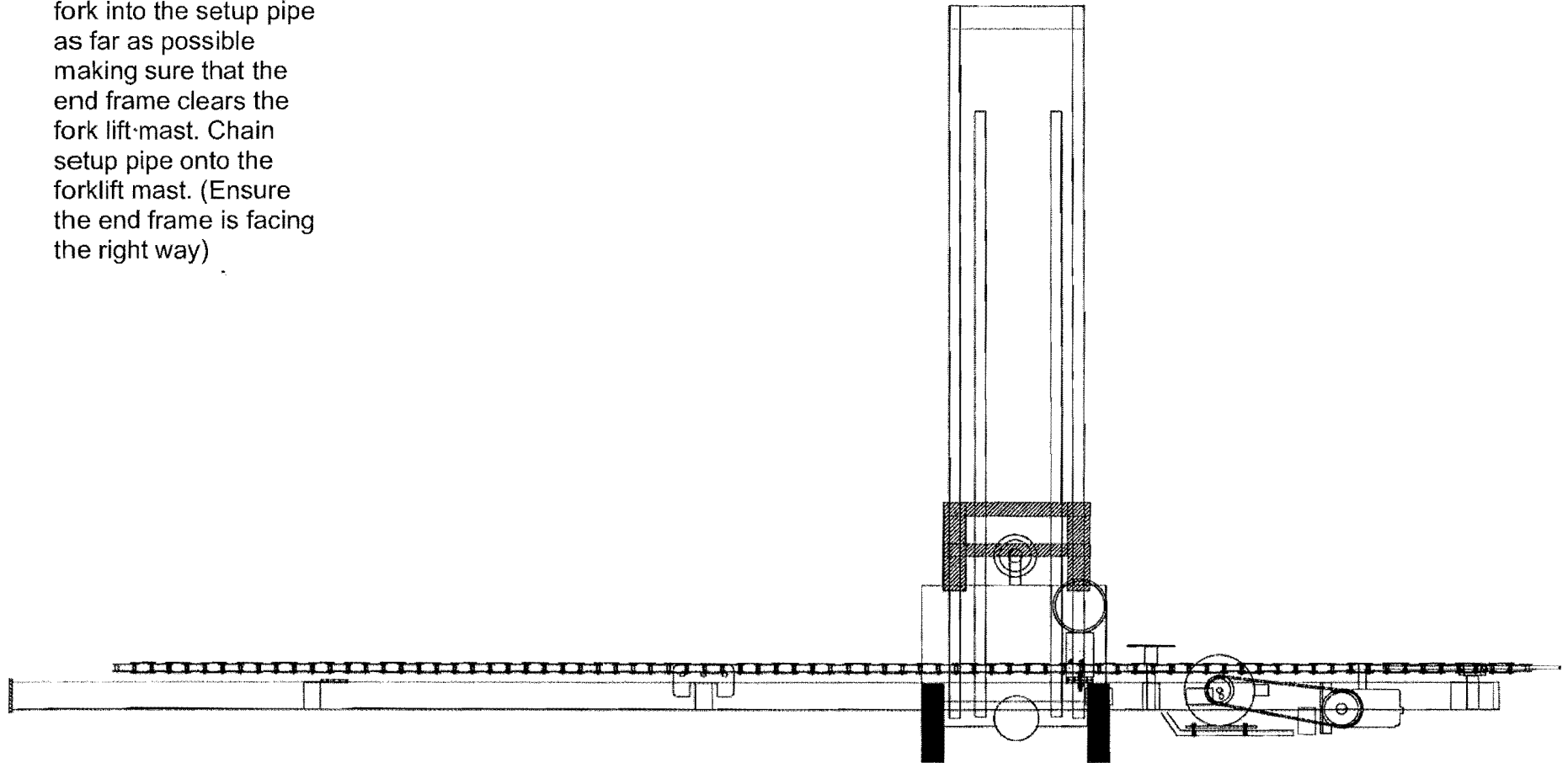


FIGURE 3—RAISING THE END FRAME WITH THE FORKLIFT

1. Carefully raise the end frame till it is a foot above the floor. Push the bottom of the frame out until it is level. Ensure that both feet are the same distance from the floor. **(NOTE: if feet are not level the end frame will level itself when lowered and could cause it to come off the forks)** Gently lower the end frame till the feet are resting on the floor.

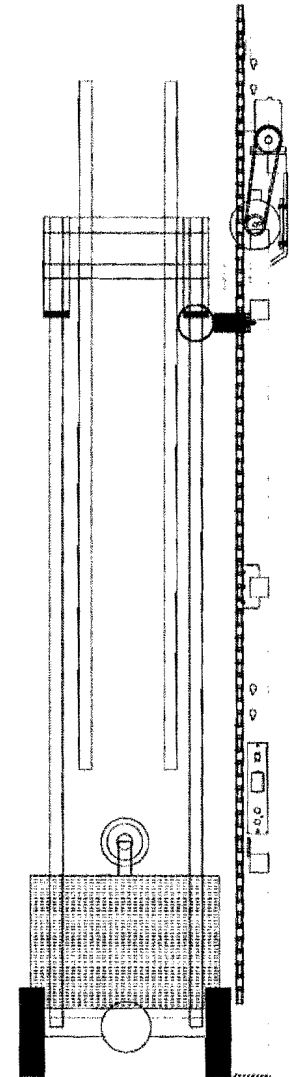




FIGURE 4—INSTALLING AND SUPPORTING CROSS BRACES—DIAMOND BRACES

1. Position the cross brace support stand near the end of the cross brace. Move the cross brace into position. Fasten the bottom cross brace onto the end frame using 1/2" x 1 1/2" bolts, flat washers and flange nuts. 
2. Install one diamond brace to the end frame and to the center of the cross brace using 1/2" x 2 1/2" bolts, flat washers and flange nuts.  (Finger tighten all the bolts until unit is set up and then return to tighten all the bolts.) **Before removing the fork lift position a person to steady the end of the cross brace.**
3. Remove bolts that secure set up pipe to the end frame.
4. Install set up pipe onto the left end frame.

FOR SAFETY REASONS, PARK THE SCISSOR LIFT NEXT TO THE CROSS BRACE AND SECURE THE CROSS BRACE TO THE SCISSOR LIFT.

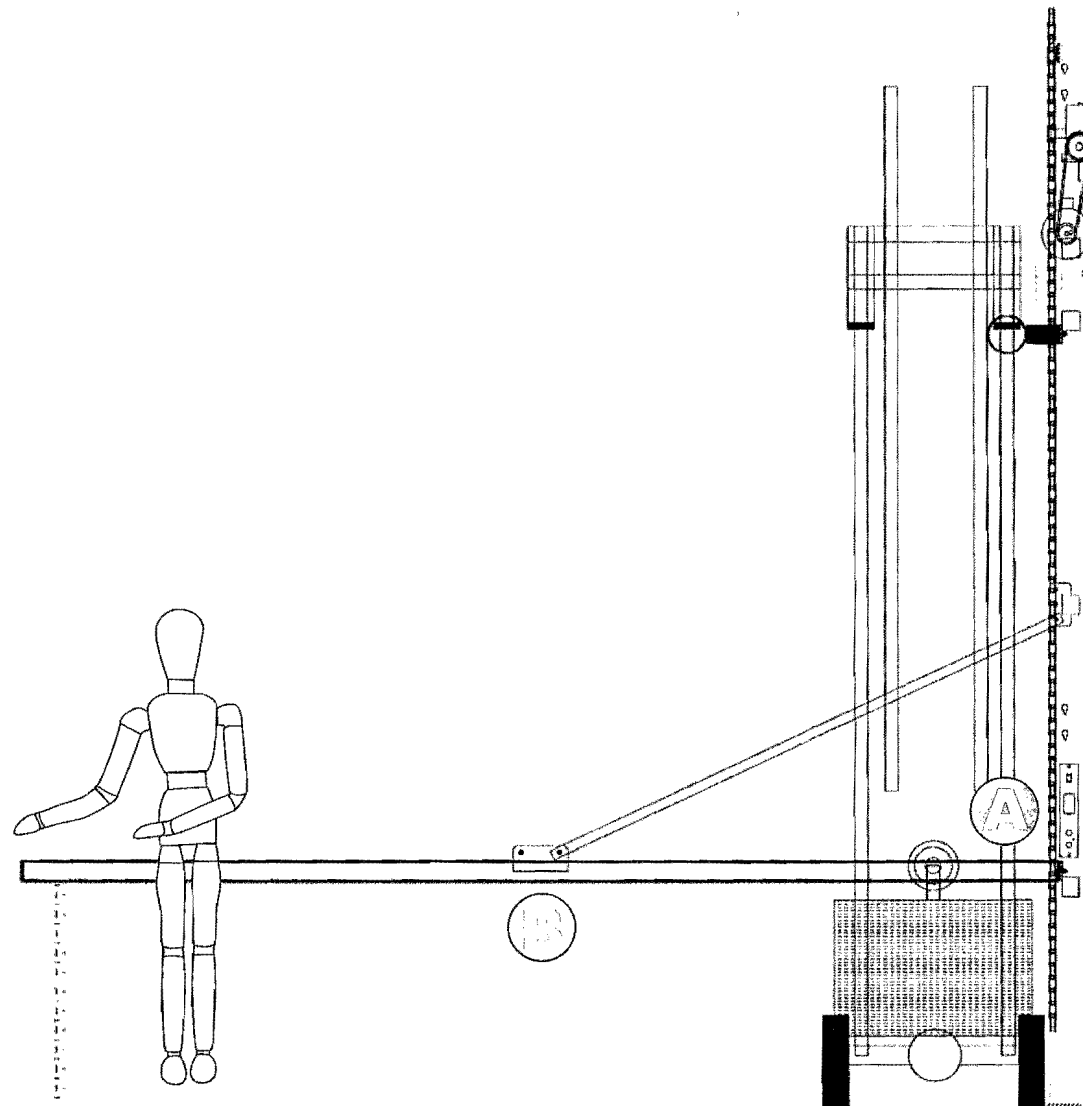


FIGURE 5—INSTALLING LEFT END FRAME

1. Fasten the bottom cross brace onto the end frame using 1/2" x 1 1/2" bolts, flat washers and flange nuts. ⓐ
2. Carefully guide the end frame past the end of the cross brace.
3. Install side diamond brace to the end frame and to the center of the cross brace using 1/2" x 2 1/2" bolts, flat washers, and flange nuts. ⓑ

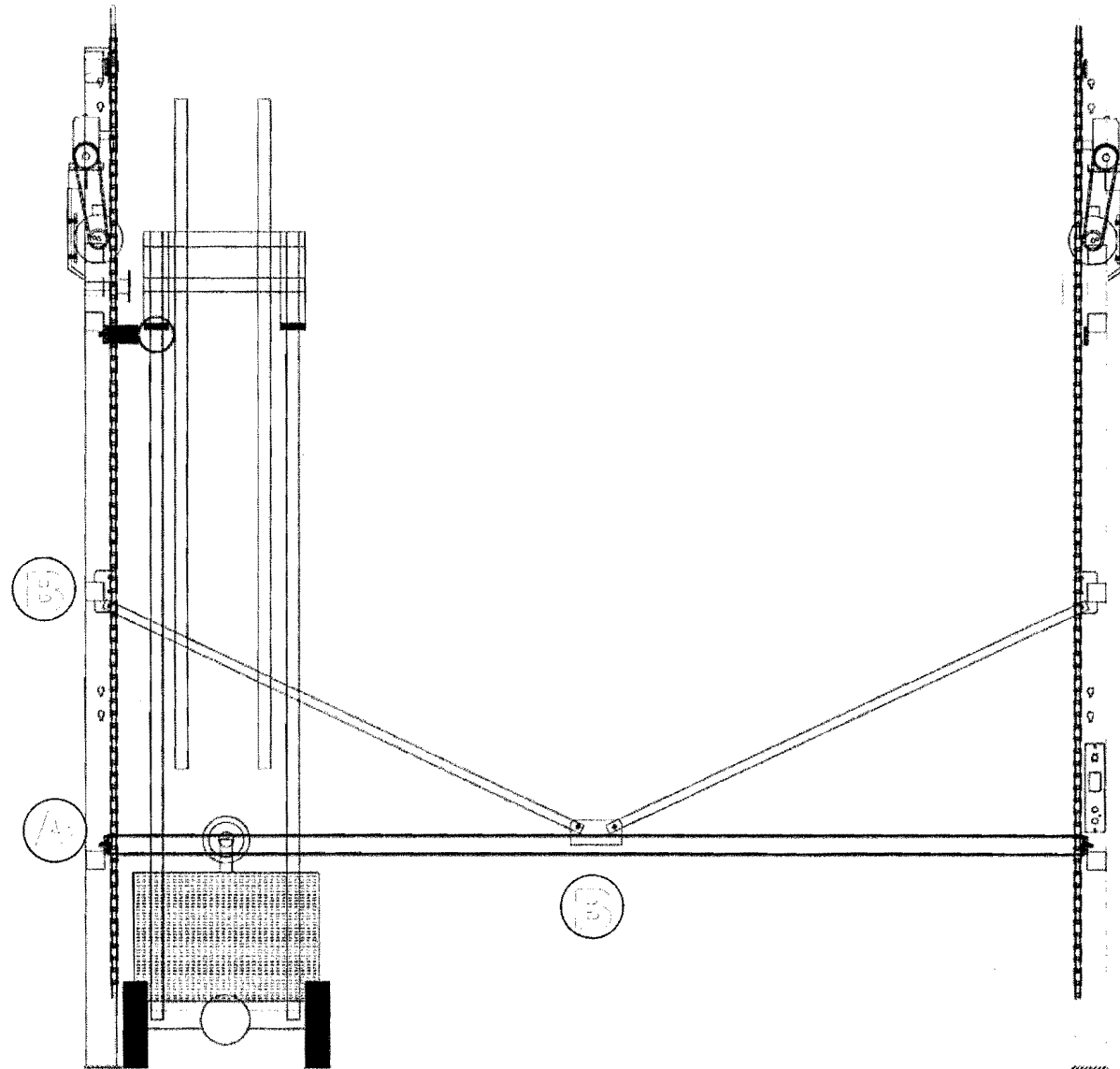



FIGURE 6—REMOVE THE FORKLIFT AND SET UP PIPE, INSTALL THE TOP CROSS BRACE

1. Remove the fork lift by backing away carefully.
2. Remove set up pipe.
3. Position the top cross brace and fasten with (4) 1/2" x 1 1/2" bolts with flat washers and flange nuts. 

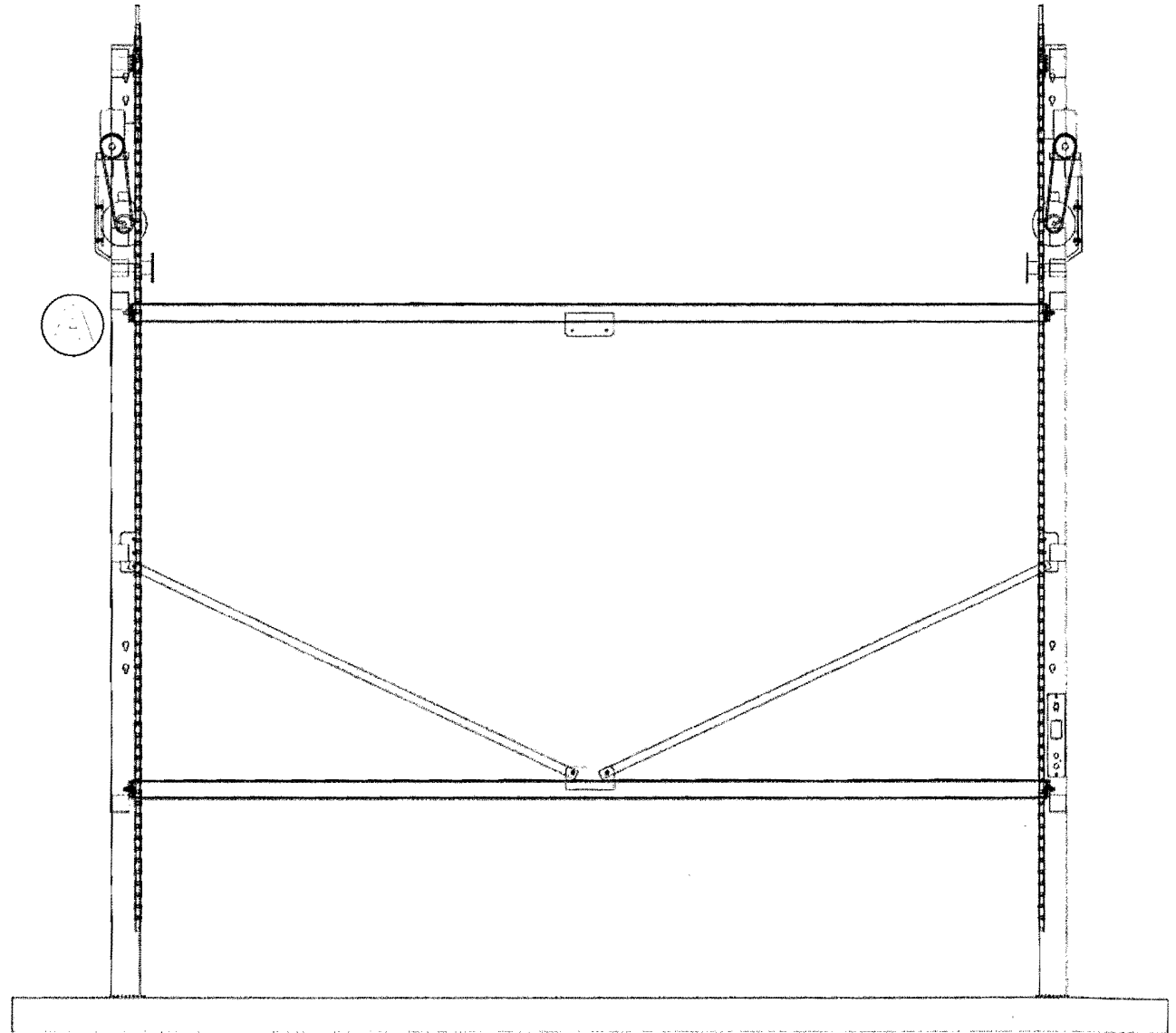



FIGURE 7—INSTALLING THE TOP DIAMOND BRACES

1. Position and install (2) top diamond braces, fasten with (4) 1/2" x 2 1/2" bolts, flat washers and flange nuts. 

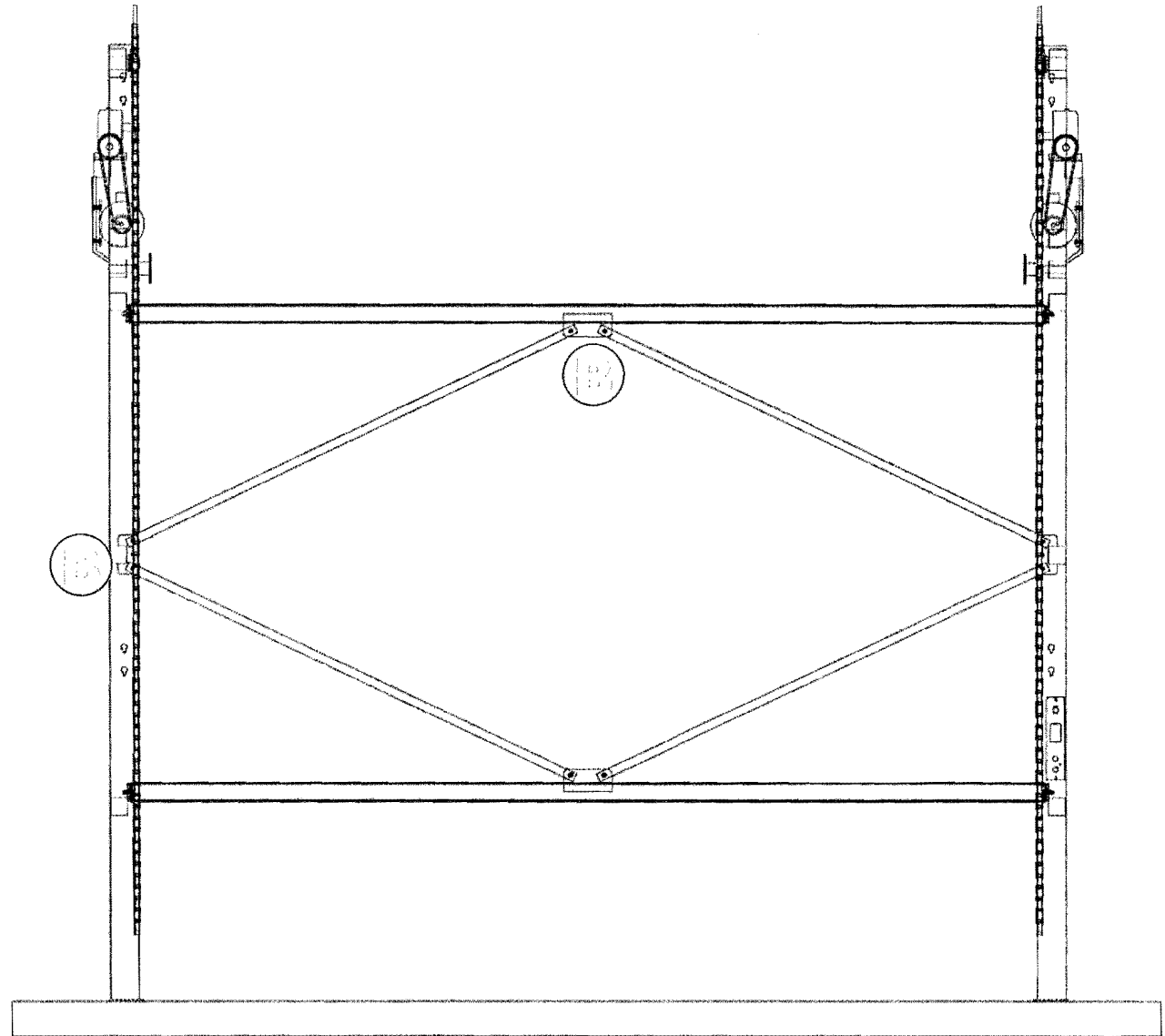


FIGURE 8—LEVELING THE CHAIN HOOKS

1. Align the chain hooks by measuring the distance from the floor to the hook on each end frame. The distance must be the same at both ends.
2. To correct the distance turn the drive pulley by hand until the hook distance is the same from the floor on each end frame.

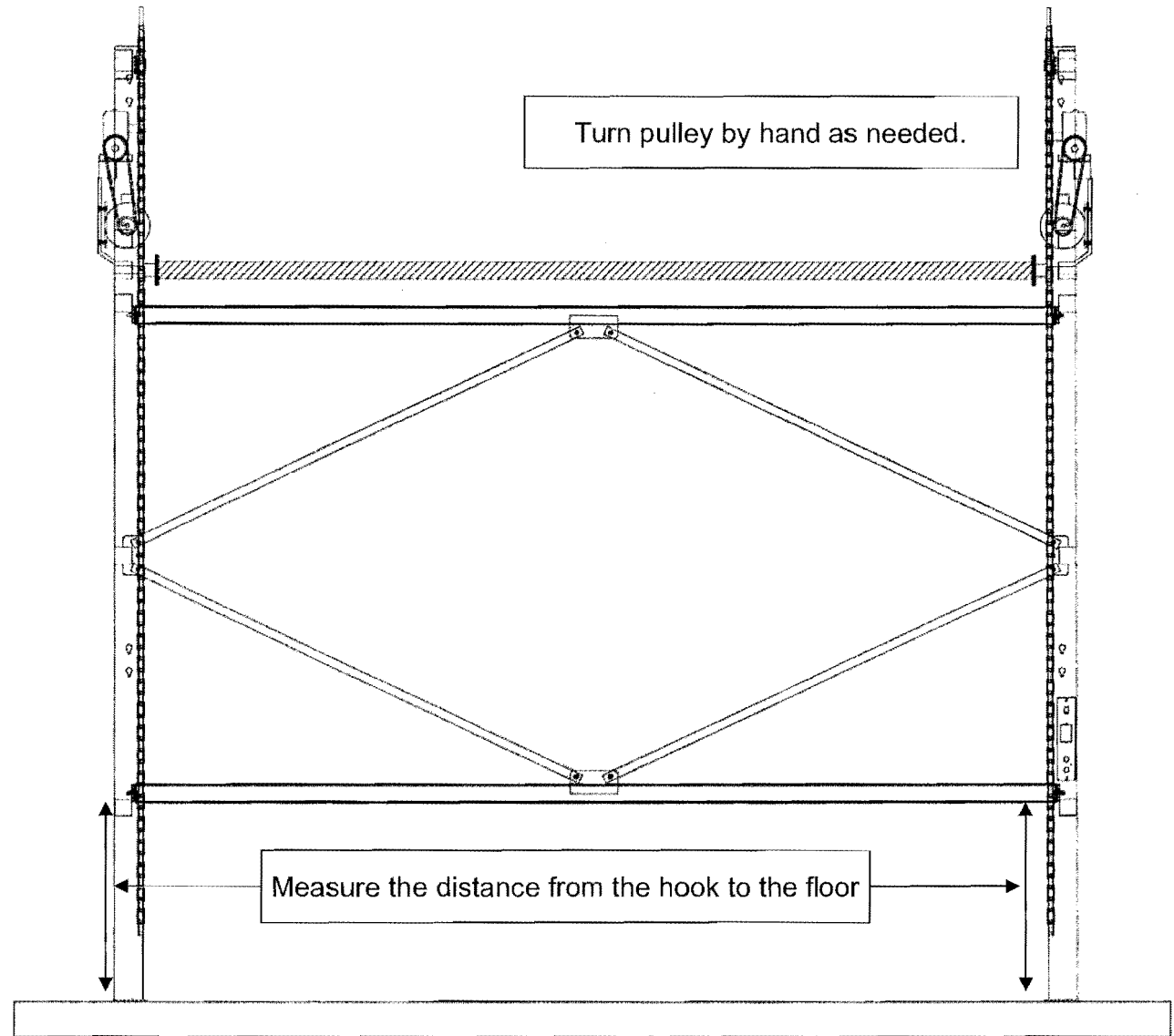


FIGURE 9—INSTALLING THE DRIVE SHAFT

1. Position and install the drive shaft.
2. Fasten both ends using (2) coupler chains. Wrap the coupler chains around the (2) narrow sprockets and secure by installing #80 connector link.

Note: If the sprockets are misaligned turn the drive pulley by hand to align. After installing the drive shaft double check that the hooks are within 1/2" from side to side.

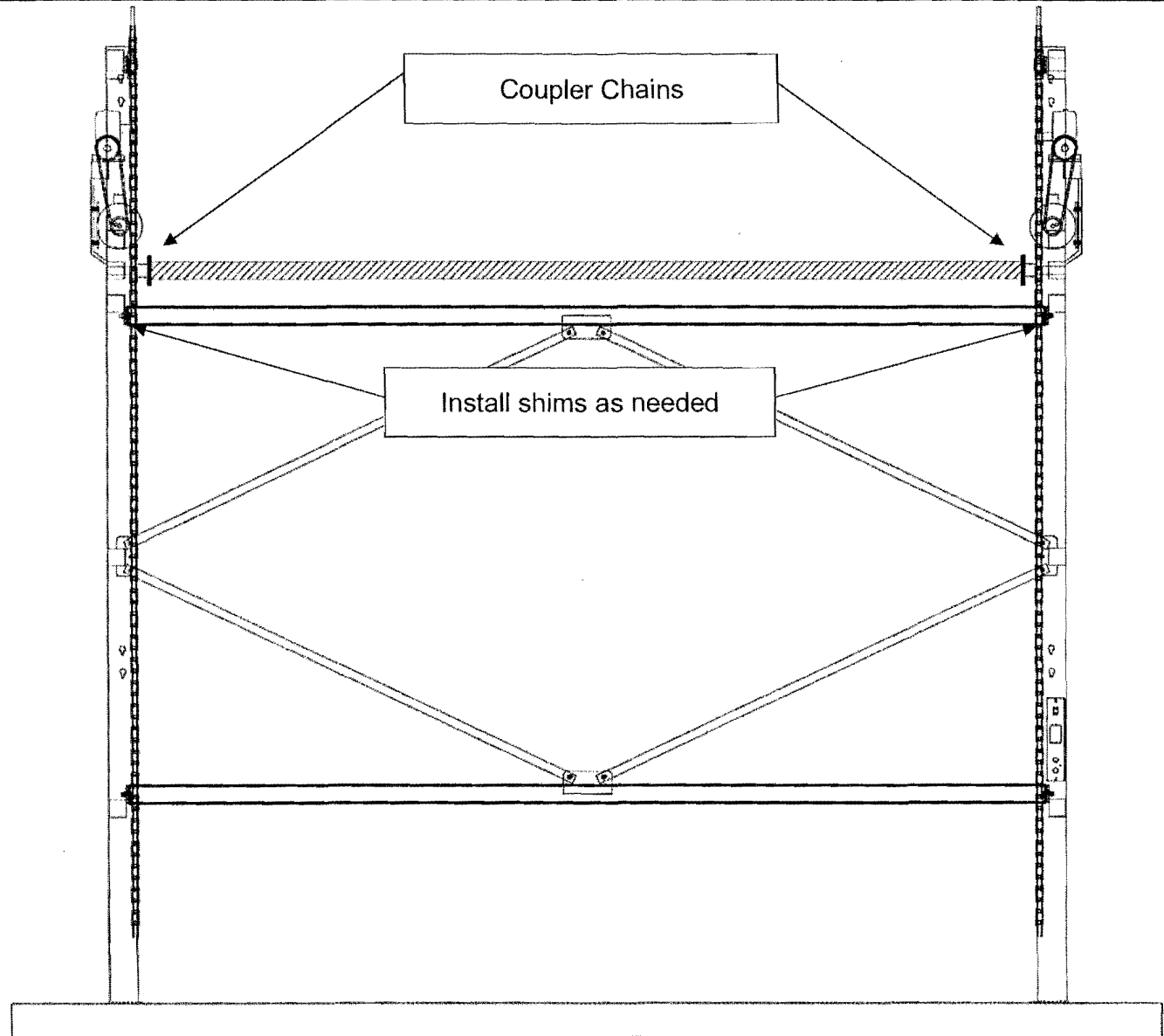


FIGURE 10—WIRING THE LEFT SIDE MOTOR

1. To wire the left side motor, insert the coiled up wire cable into the bottom hole of the top cross brace.
2. Push it through to the other side and route through the holes provided.
3. Insert the wire end into the knock provided on the motor wiring connection box.
4. Be sure to match the wire numbers with labels on the motor wires.
5. Secure the connections and close the electrical box.
6. **TIGHTEN ALL THE BOLTS ON THE MACHINE.**

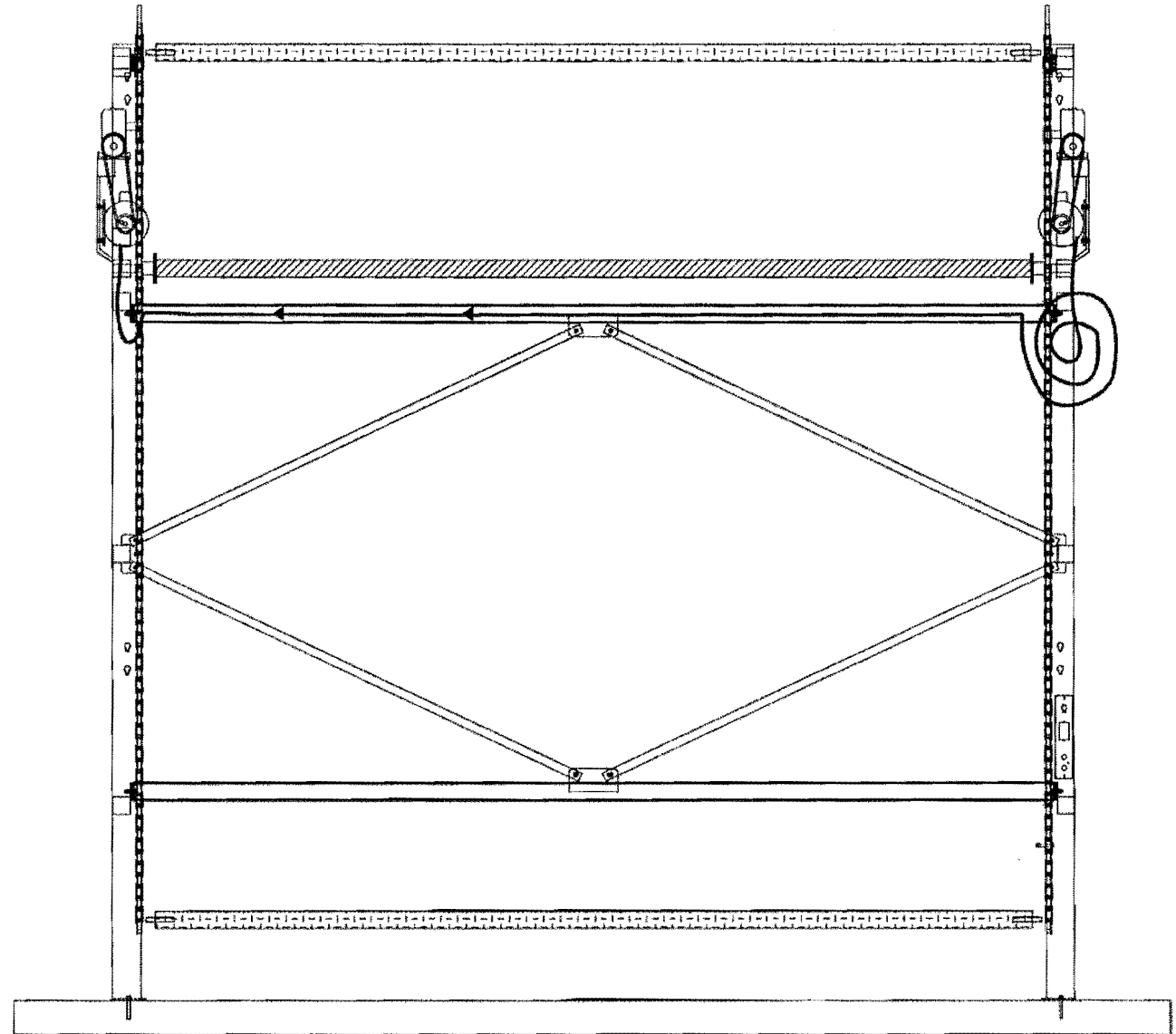


FIGURE 11—SQUARING THE CAROUSEL

1. Square the machine, measure the distance between the chains. (Bottom front and rear and top front and rear). The front and back chain measurement should be within $1/8"$. Install a roller on the front side and ensure that the hooks at both ends have a clearance between the hook and the chain of $3/16"$ to $1/2"$.

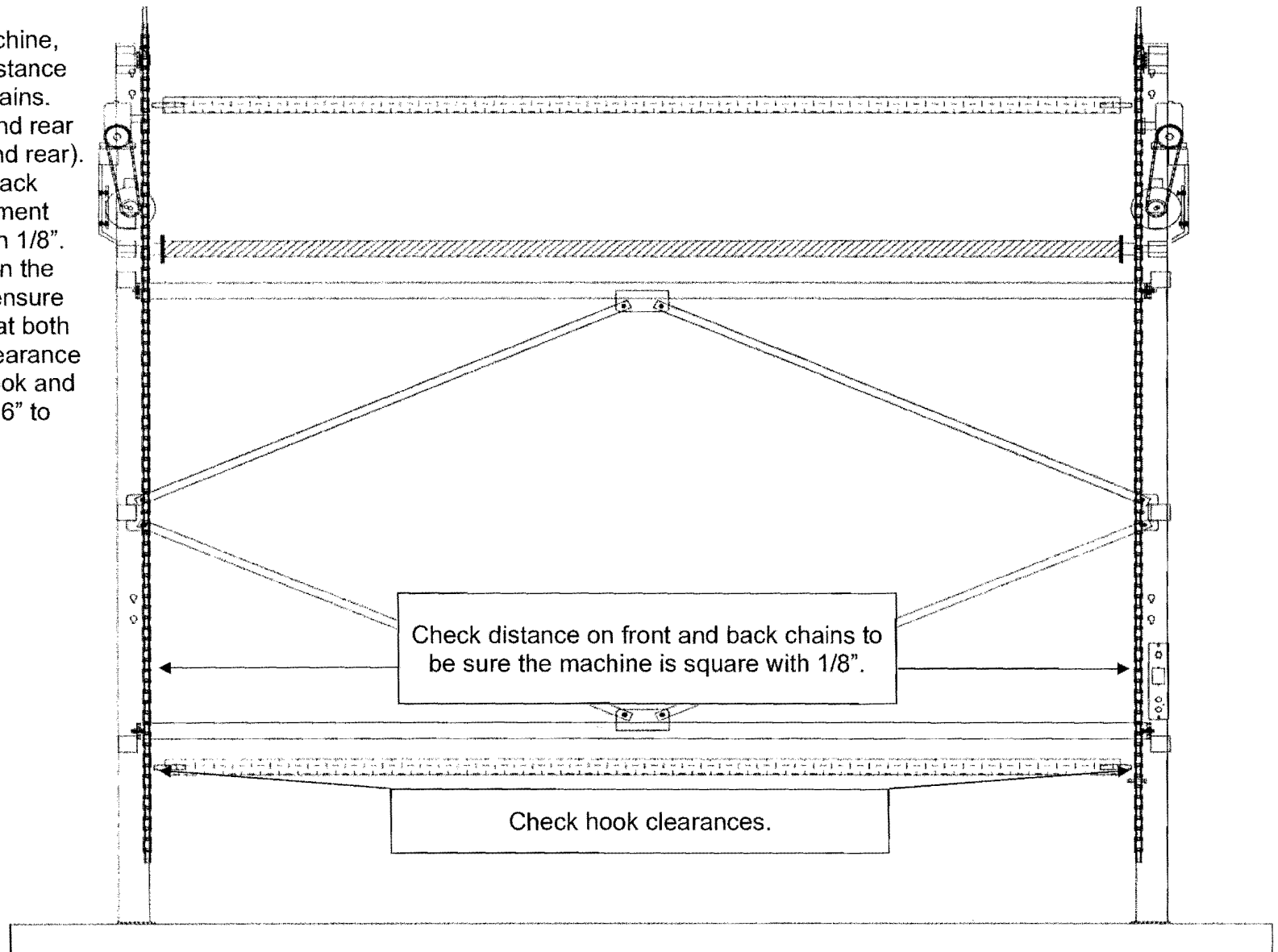



FIGURE 12—INSTALL CROSS GUARDS

1. Install the rear and front cross guards.
(shown in grey)
Note:The upright guard mounting holes face to the top of the cross guard.
2. Use (4) 3/8" x 1" carriage bolts with flange nuts to secure each guard. 

Insert carriage bolts with heads to the outside and fasten nuts loosely.

3. Position top cross guard in front of key hole slots and drop them into the frame. Repeat above step for the bottom cross guard.

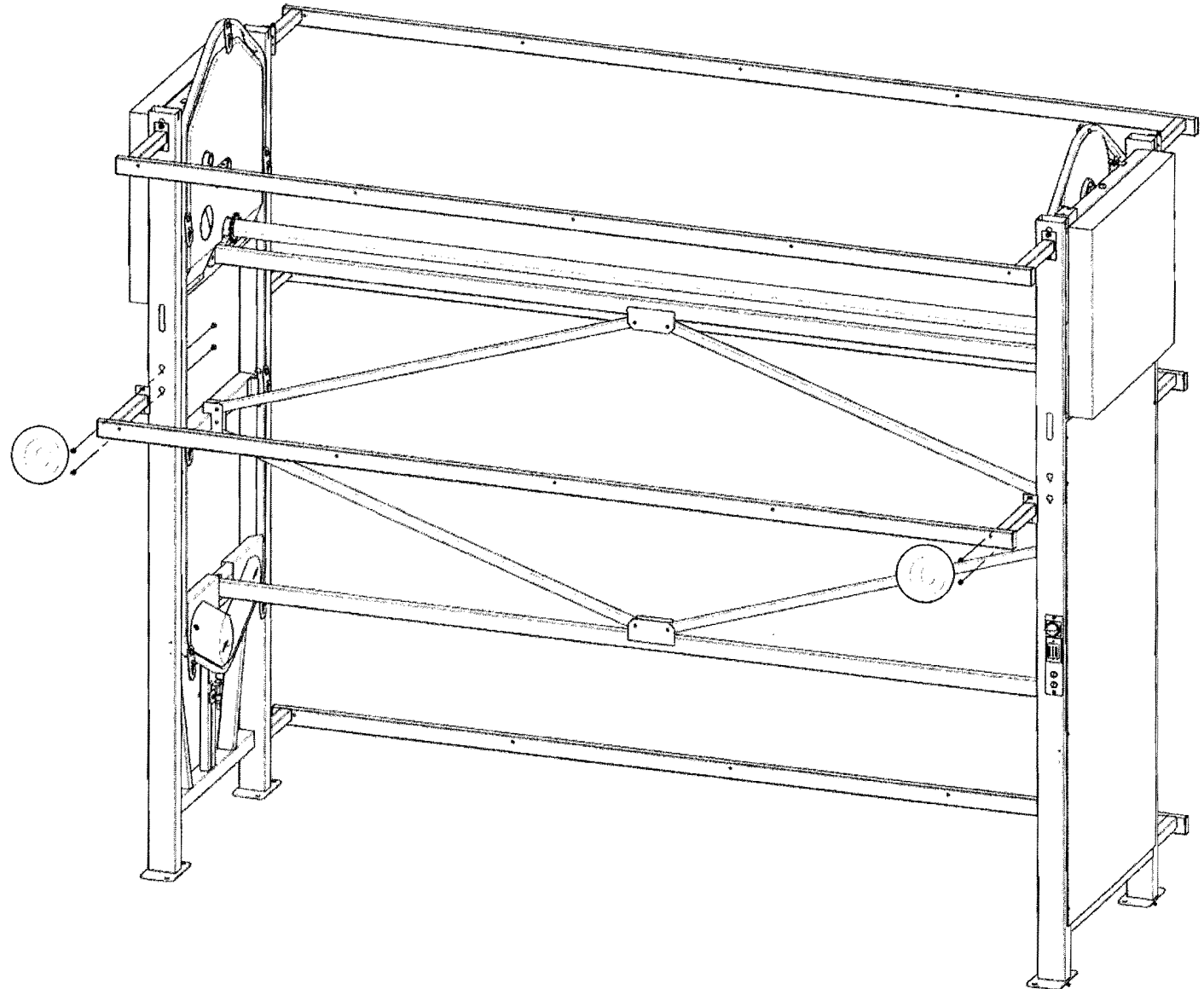


FIGURE 13—INSTALL UPRIGHT GUARDS

1. Next position guard uprights in front of the cross guards (outside of machine) and secure with (2) $3/8"$ x $3 1/2"$ bolts, washers and flange nuts. (D)

Install a guard upright on each set of holes. Tighten all bolts securely.

2. Next Position the rear upright guards and assemble using the joiner. Install on the machine using (3) $3/8"$ x $3 1/2"$ bolts, washers and flange nuts. (D)

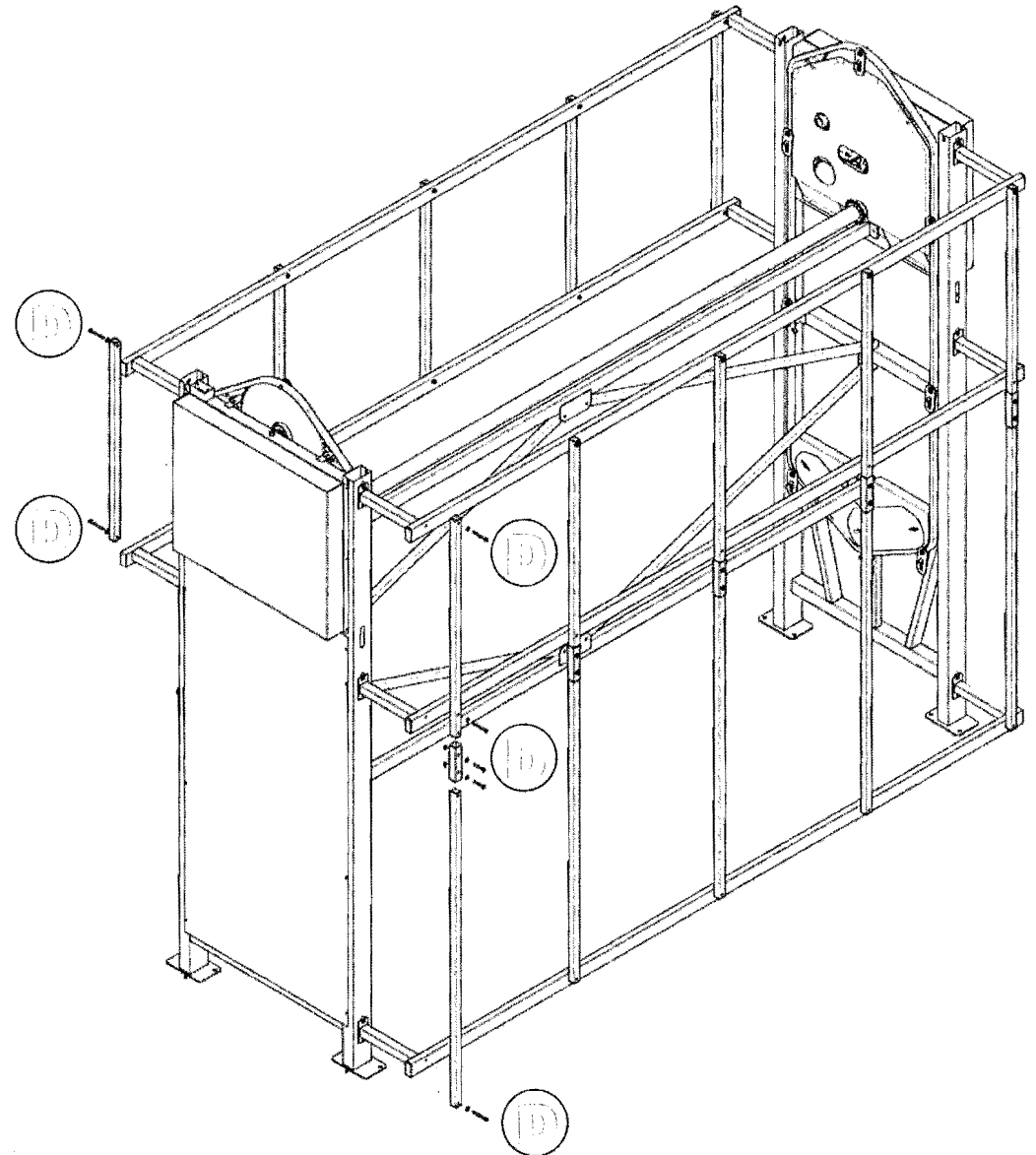


FIGURE 14—INSTALL WIRE MESH

1. Secure the wire mesh with fastening clips using self-drilling screws (1/4" x 1") placing them every 18" on each guard upright.

ROLLED GOODS CAROUSELS

-Install the REAR wire mesh on the outside of the rear guard uprights.

SHELVING/TIRE CAROUSELS

-Install the wire mesh on the inside of the guard uprights on the FRONT and REAR uprights.

WIRE CAROUSELS

-Install the wire mesh on the inside of the guard uprights on the FRONT and REAR uprights.

-Install sheet metal on the inside of the back cross guards.

NOTE: Please refer to the assembly instructions in the bolt box for mesh installation for each specific machine.

FIGURE 15—SQUARE AND ANCHOR THE CAROUSEL

1. Move the carousel into place as per the floor plan and/or the General Contractor.
2. Check the carousel again to be sure it is square.
3. Drill two 5/8" holes 6" deep into the concrete.
4. Install two 5/8" x 5" anchor bolts in each foot plate and tighten securely. Ⓜ

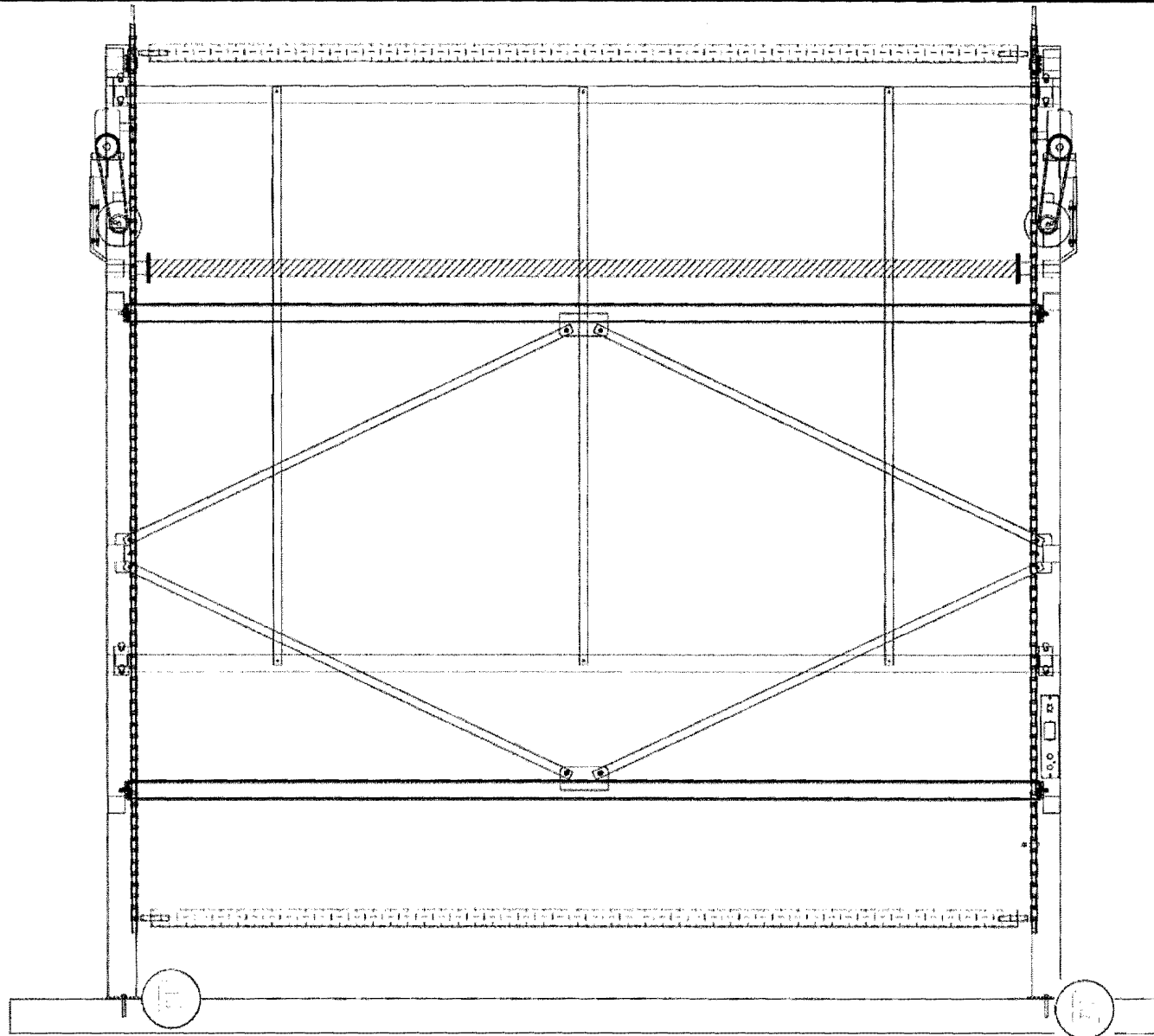


FIGURE 16(A)—TIRE CARRIER ASSEMBLY

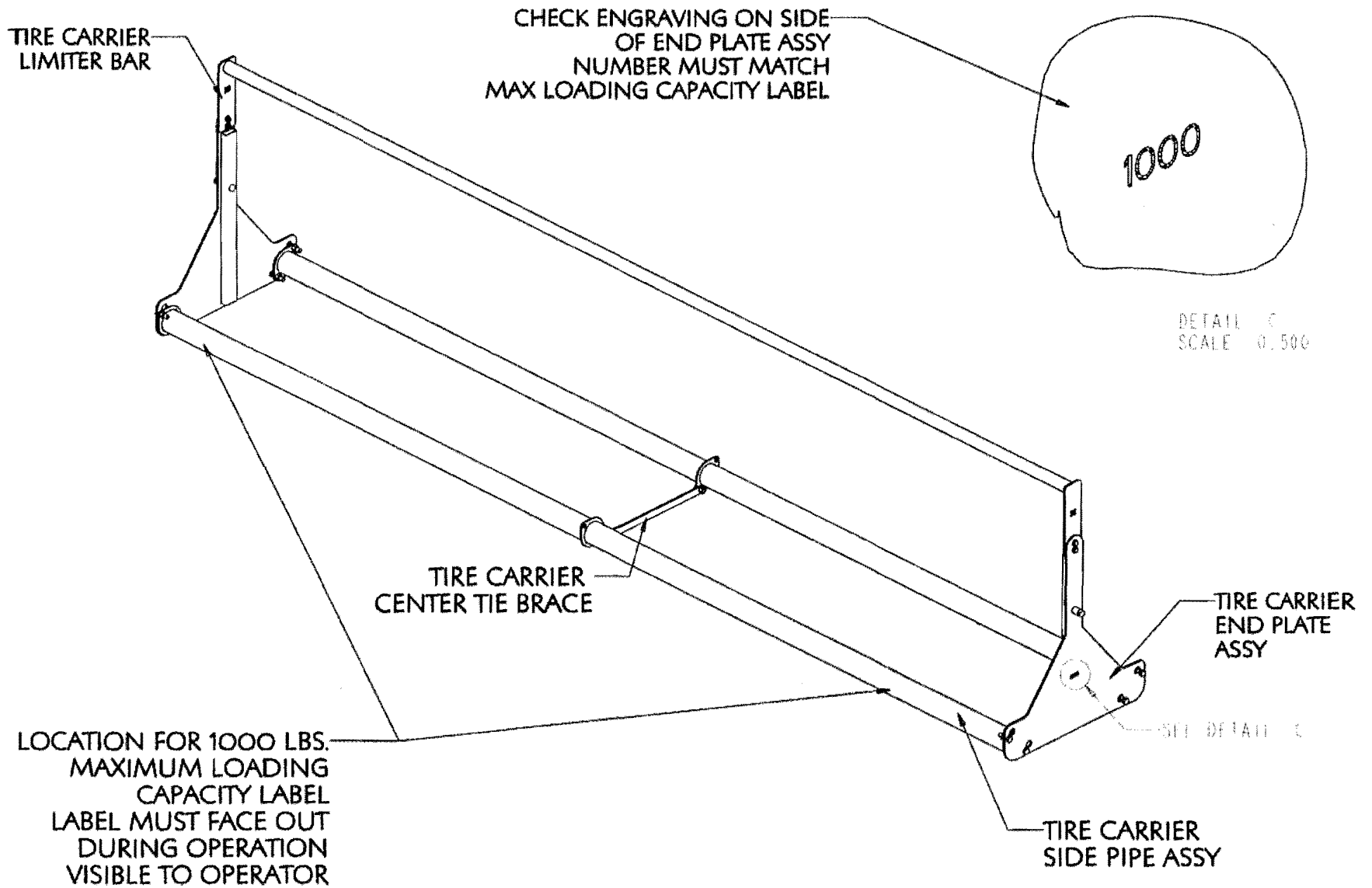


FIGURE 16(B)—TIRE CARRIER ASSEMBLY

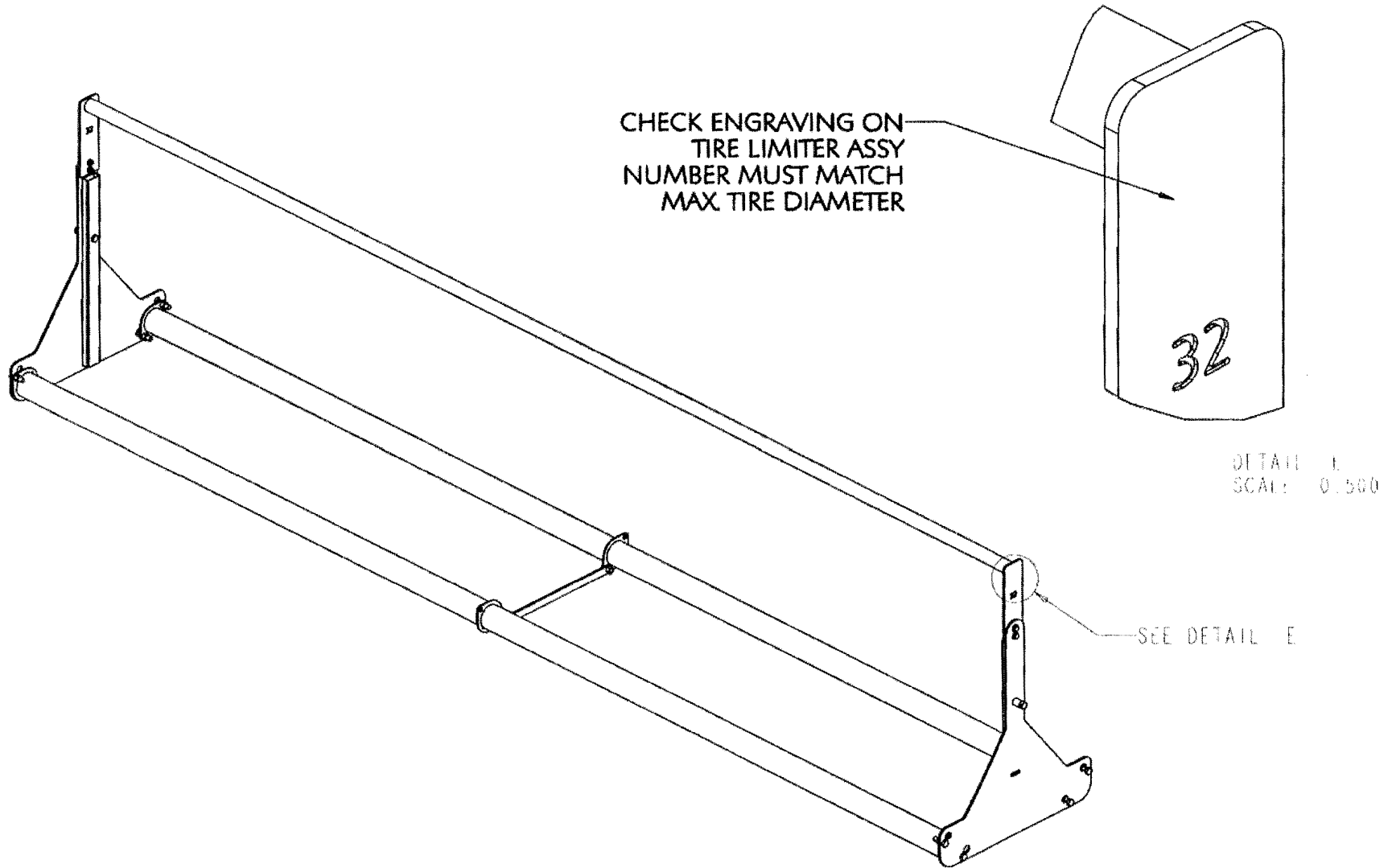
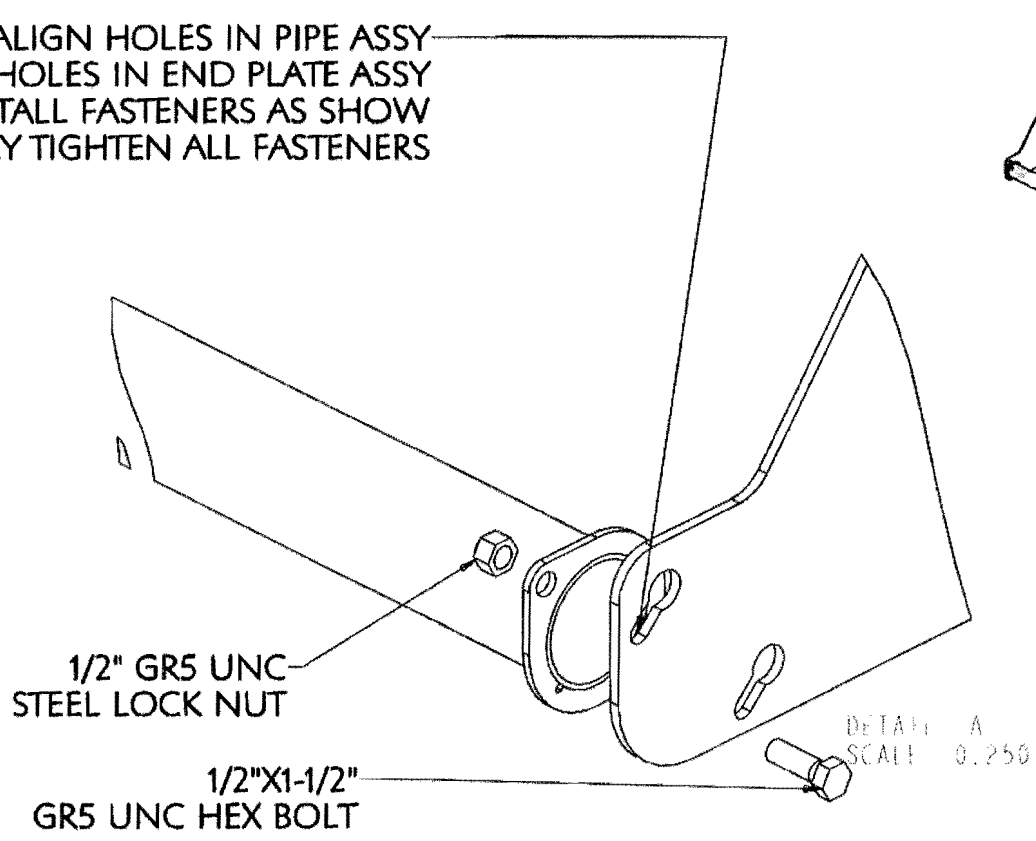


FIGURE 16(C)—TIRE CARRIER ASSEMBLY

ALIGN HOLES IN PIPE ASSY
TO HOLES IN END PLATE ASSY
INSTALL FASTENERS AS SHOW
FULLY TIGHTEN ALL FASTENERS



FASTEN CENTER TIE BRACE
AS SHOWN BOTH SIDES
OF CARRIER USING
1/2" X 1-1/2" GR5 UNC HEX BOLTS
WTH WASHER
AND 1/2" GR5 UNC
STEEL LOCK NUT

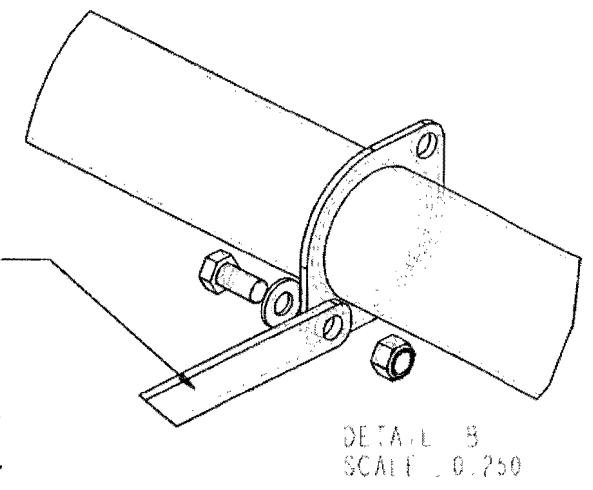
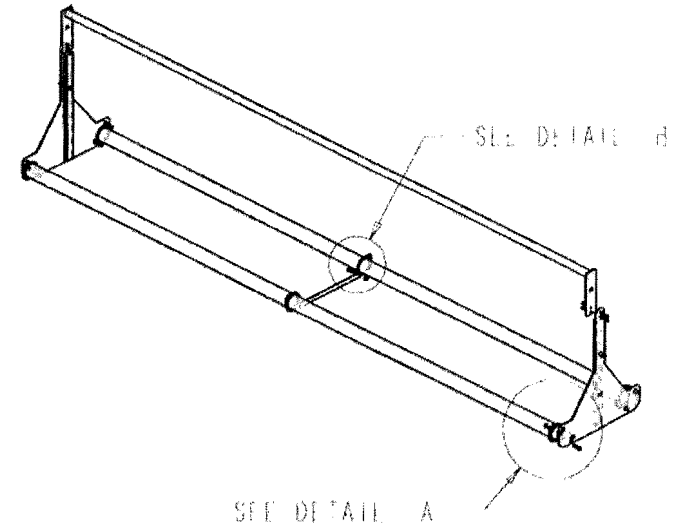


FIGURE 16(D)—TIRE CARRIER ASSEMBLY

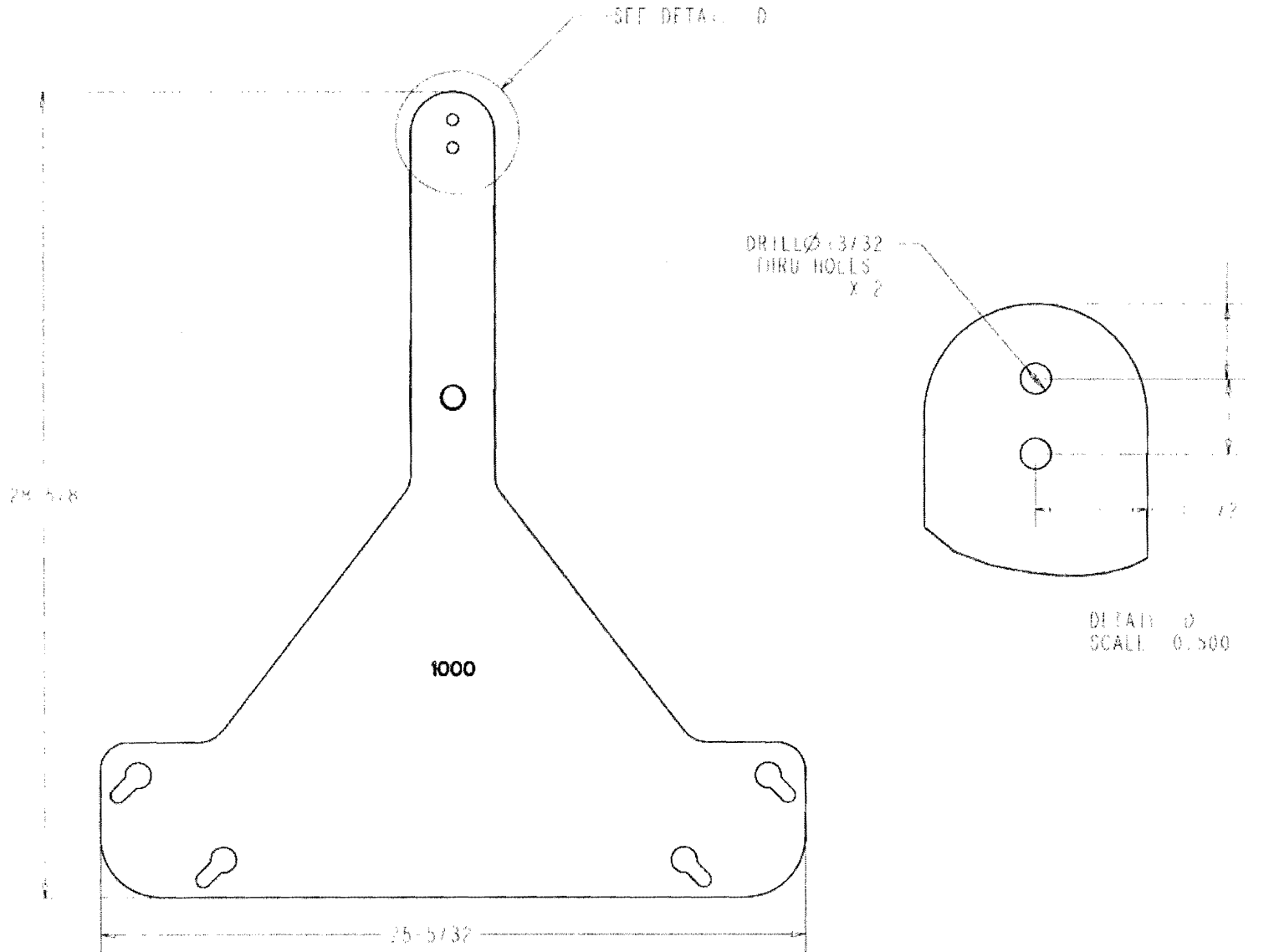


FIGURE 16(E)—TIRE CARRIER ASSEMBLY

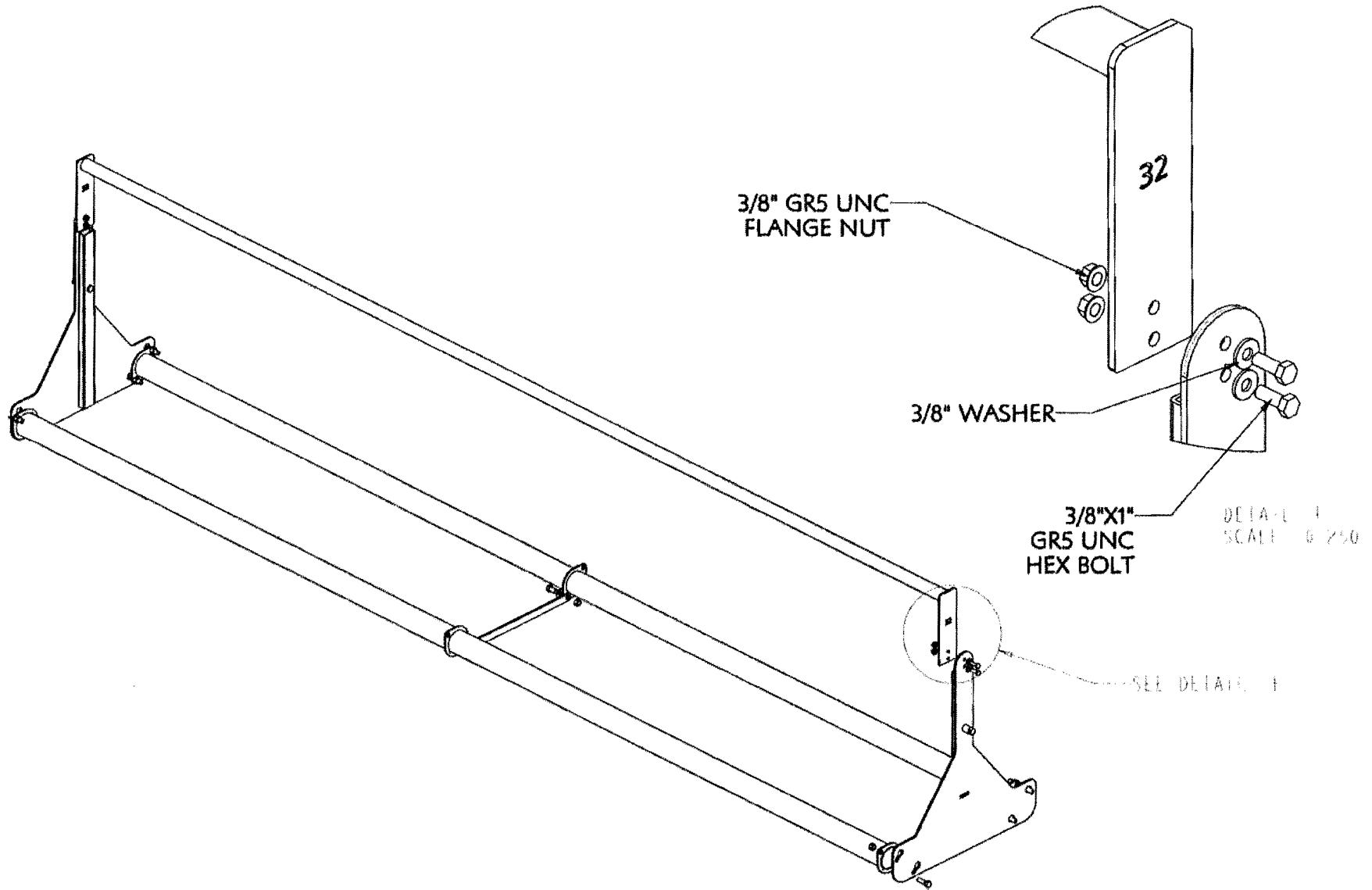


FIGURE 17—HEAVY DUTY TIRE CARRIER ASSEMBLY

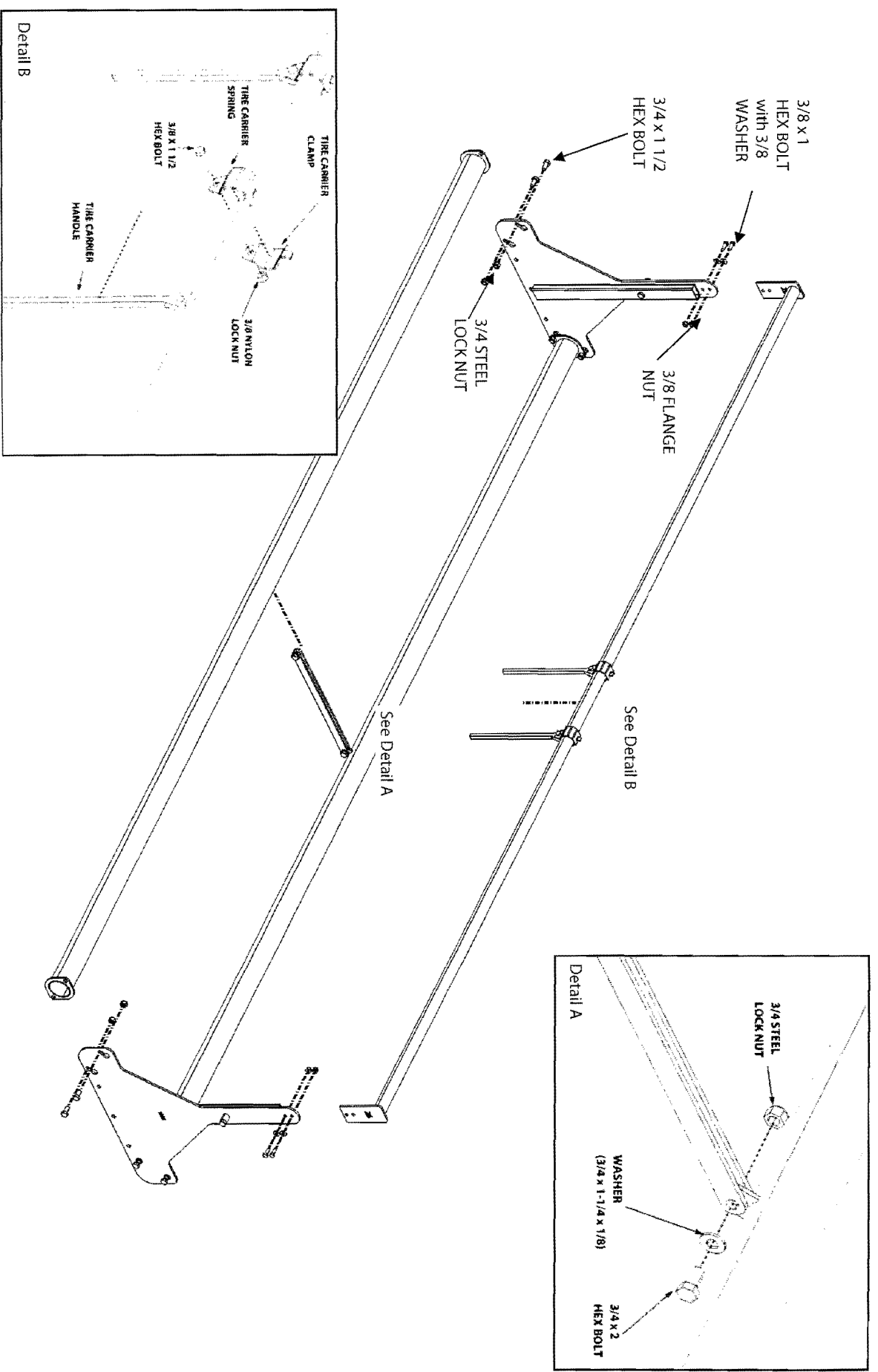


FIGURE 18—INSTALLING TIRE CARRIERS

1. Install carriers into carousel onto the hooks on the chains.
2. Apply carrier weight capacity decals as shown.

Decals for Tire Carousel include:

- 2 of 110-0018EF, or F
- 1 of 110-0178EFS
- 2 of 110-0227EF
- Several of 110-0272

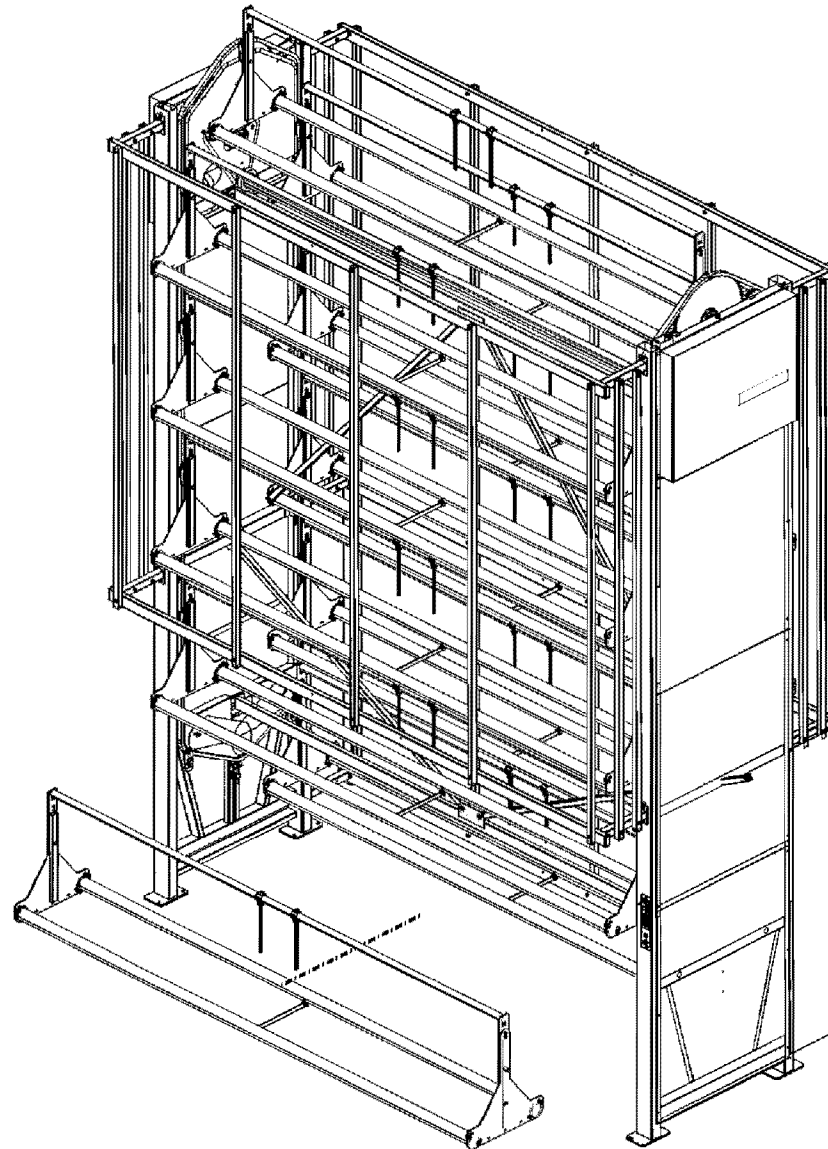


FIGURE 19—INSTALLING ROLLED GOODS CARRIERS

1. Hang all rollers on the product hooks.

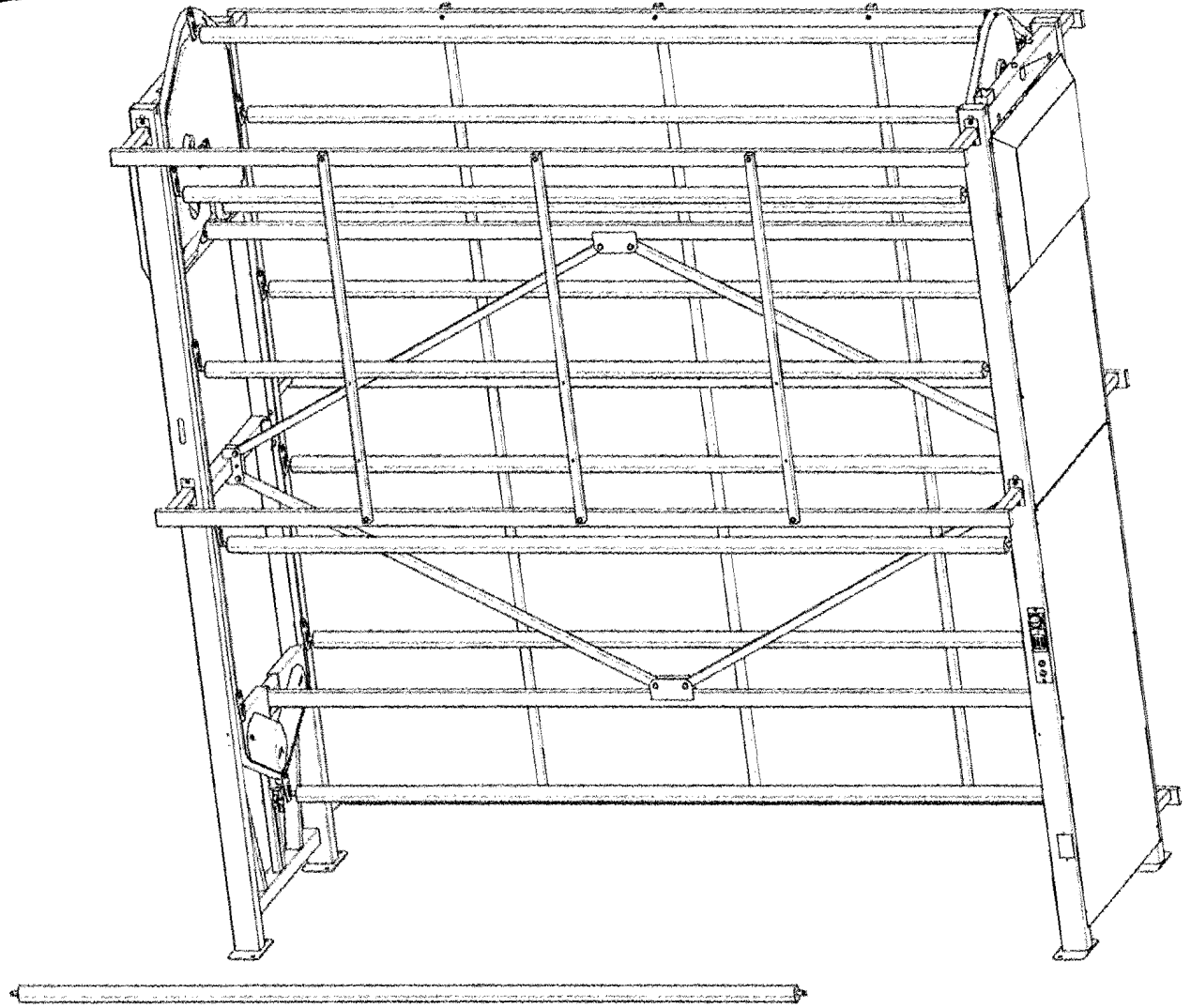


FIGURE 20—INSTALLING SHELF CARRIERS

1. Install shelves into carousel onto the hooks on the chains.

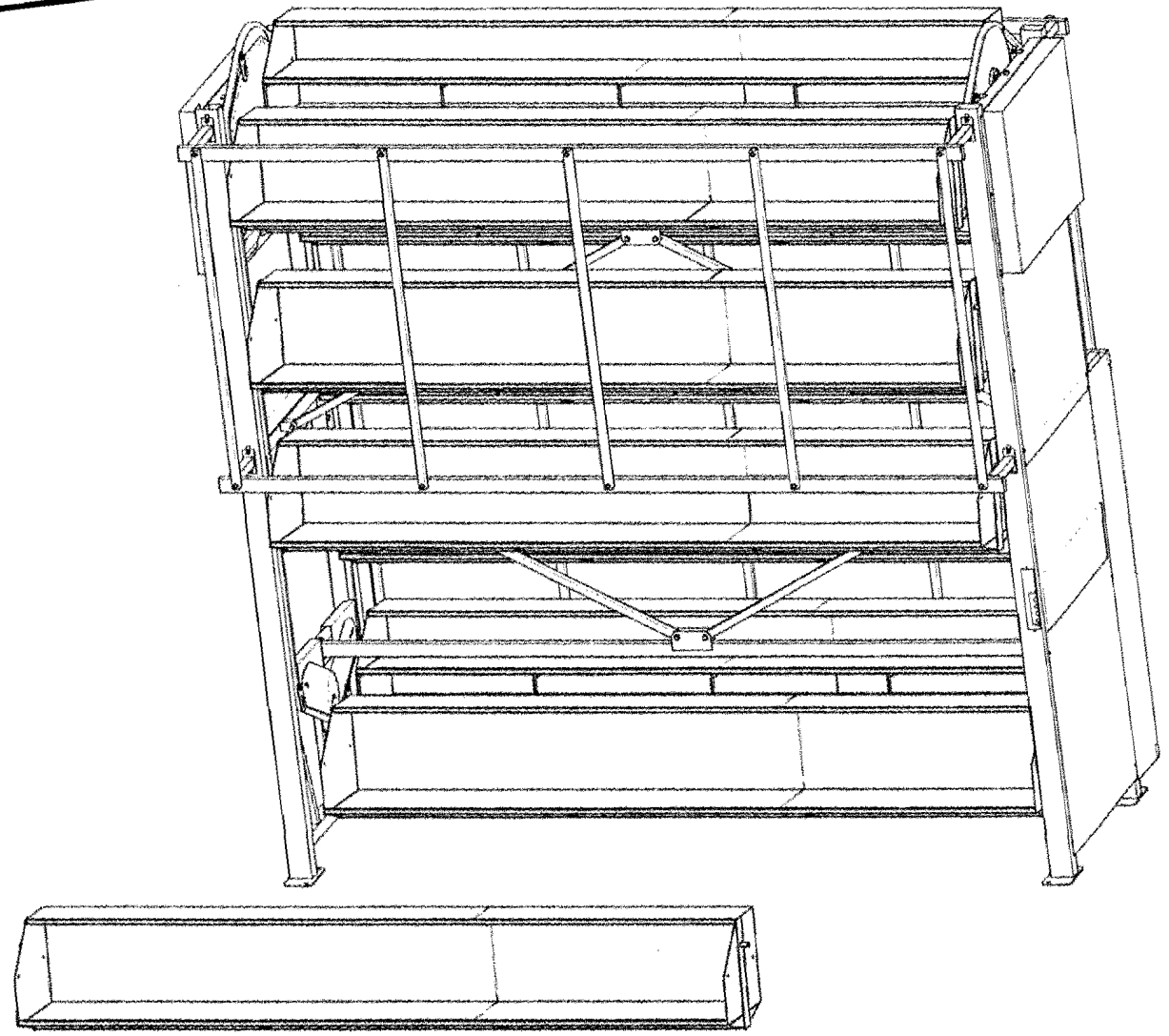


FIGURE 22—INSTALLING WIRE CARRIERS

1. Hang wire bays on the product hooks.

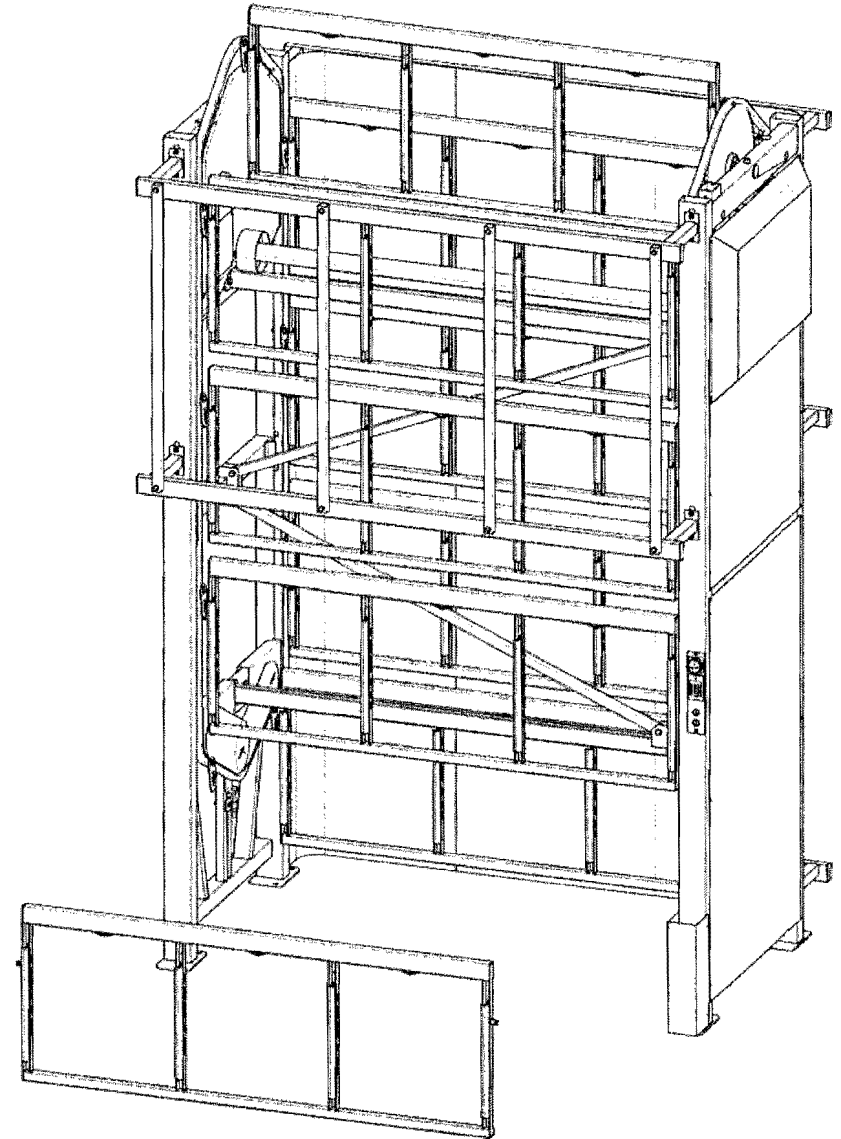


FIGURE 22—FINAL INSTALLATION STEPS

1. Electrician will need to connect the power to the machine. Test run the machine 2 full rotations in each direction checking for any noises or interferences. Machine should run smoothly and quietly. Make sure the rotation is correct, if not have the electrician swap incoming phases.
2. Clean and touch up the carousel as required.
3. Fasten Loading bars to the front of the machine if it has them.
4. Fill out the installation checklist.

If there are any questions or concerns please contact the
Installation Manager:

Toll Free: 1-800-210-0141

Cell (After Hours): 1-204-641-1222