# Bicycle Lift Installation Manual Unique patented Design Creates Space and Improves Security







## **Bicycle Lift Installation Manual**

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## What Is the Bicyle Lift?



- The Bicycle Lift is a versatile wall mounted storage lift driven by an electric motor or hand crank.
- Can be used for the storage of clothing, bikes, and more.
- Merchandise is securely and safely out of the way.

## **Safety Features**

- 1. The gearbox and motor features a motor break that prevents the machine from coasting and free falling.
- 2. The machine also features a seat belt re-tracker that will catch the load and preventing the machine from going into free fall.
- 3. Machine also features a safety siren that allows people to hear when it is in motion.



#### **Tools Needed for Installation**



- Safety Glasses
- Work Gloves
- Reflective Safety Vest
- Caution Tape and Safety Cones
- 25-foot Tape Measure
- Cordless Impact Drill
- 3/8" Socket Drive
- 15/16" Wrenches or Ratchet/socket combo (2)
- 5/16" Wrench
- 4.5mm Allen Wrench
- 4mm Allen Wrench
- 3.5mm Allen Wrench
- T30 Star Drive
- 2-foot (minimum) long level

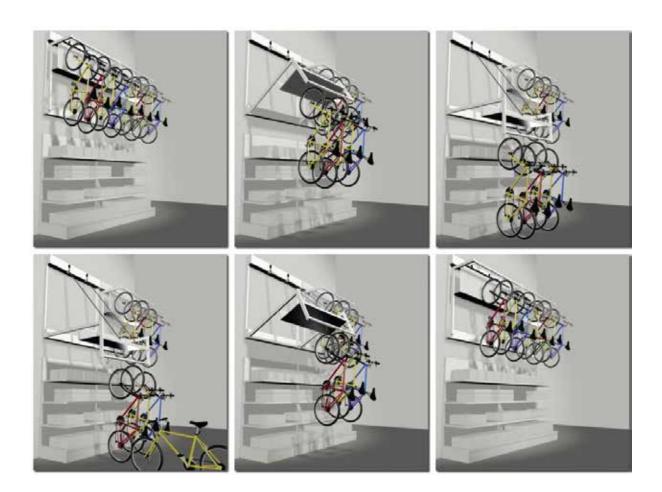
#### **Safety Warnings**

- Do not exceed maximum rated weight limit of 300 lbs.
- Keep areas under the bicycle lift clear and open when operating. Do not allow people to walk under the
  bicycle lift while it is running. Use of traffic cones or barricades may be required when using the bicycle
  lift.
- Always watch the Hang Bar when raising or lowering.
- Do not climb on, hang from, or play on any part of the bicycle lift. This machine is designed to hold merchandise only, not humans.
- Keep all controls away from children.
- The bicycle lift safety systems are not to be bypassed or circumvented. The purchaser is responsible for purchasing the bicycle lift with applicable safety features required by their given area and fulfills their particular needs.
- Any repair or adjustment must be performed by qualified maintenance personnel.



- Before any repair or adjustment are made all hanging items or loads must be removed.
- When not in use, the Hang Bar should be left in the full 'UP' position. This will prevent people from bumping into the hanging goods.
- If you hear a snapping sound and see jerking, STOP the bicycle lift immediately. Cut power and call maintenance.
- Failure to follow safety and operational rules will void all warranties.

## **Bike Lift Diagram**



## **Electrical Requirement**

The bicycle lift requires 120 Volts, 60Hz and 12 gage wire with a 20 Amp Breaker to safely operate.



#### **Frame Installation Instructions**

The following steps below provide you with the instructions necessary to complete the bicycle lift installation.

#### > Determining which type of Screw to use

#### **Cement Walls:**

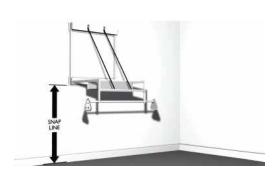
Install 2x6 ledger board on the top and bottom where the mounting bracket will attach using *Tapcon screws*.

#### Wooden Stud Walls:

Install 2x6 ledger board on the top and bottom where the mounting bracket will attach using *lag screws*.

#### Metal Walls:

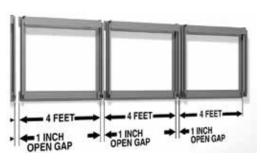
Install 2x6 ledger board on the top and bottom where the mounting bracket will attach using <u>1/4" - 14x4" tek screws</u>.



#### ➤ Snap Line

The snap line will mark where the bottom of the bicycle lift Frame will be. For normal setups your snap line should be at a predetermined height. Your actual height may be different.

#### > Space Between Machines

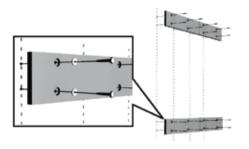


Leave a one inch open space between every bicycle lift frame.

Note: If you are mounting several in a row, you will probably
want to use long 2x6 boards instead of several shorter boards.

Special note: If you ever intend to change these units over to use
4 or 6 foot hangbars, you will want to leave 13 inches between
each unit.



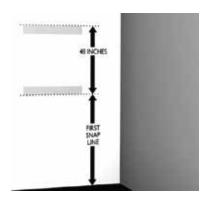


#### ➤ Mounting 2x6 Ledger Board to Stud Wall

Important: Make sure you check with your construction expert to make sure you mounting to a wall of high quality.

- 1. Use a stud finder to locate the studs you will be mounting to.
- 2. Mark each 2x6 for drilling. Use 8 lag bolts along with 8 flat washers to mount every 2x6.
- 3. Counter sink the holes big enough for the flat washers and deep enough to contain the bolt heads.

Note: Please see the section titled "determining which type of screw to use" if you are installing the bicycle lift on a different style wall.



#### How to mount the lower 2x6:

Your snap line should be 72 inches off the floor. Use this snap line for the lower edge of your lower 2x6.

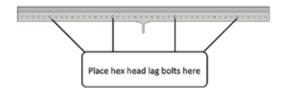
#### How to mount the upper 2x6:

Measure up 48 inches to get your second snap line. This snap line will be for the top edge of the upper 2x6.

The TiltNStore Frame will mount flush with the *bottom* edge of this 2x6.

Note: Use your level to make sure you are mounting the 2x6 ledger board straight and level.

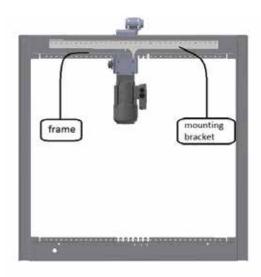
## ➤ Placing the Mounting Brackets on the top 2x6



Place the mounting bracket level and 2.5 inches in from the end of the 2x6 with the mounting bracket top held *flush* to the *top* of the 2x6 ledger board.

For each bracket, use 4 equally spaced hex head lag bolts to secure the mounting brackets level and to the ledger board.



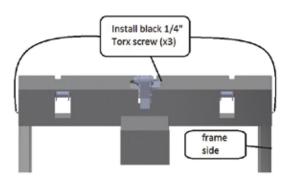


#### > Hanging the bicycle lift

Once the mounting brackets are securely fashioned to the top and bottom ledger boards, lift the bicycle lift above the mounting brackets and slide the frame down until it catches on the brackets. The tongue of the Mounting Brackets can be placed in any of the cut out positions on the frame to allow easy placement of each bicycle lift.

Once the mounting bracket tongue is placed in the desired location on the bicycle lift, Secure the bicycle lift to the ledger board using 4 hex head lag bolts for the top and 4 hex head lag bolts for the bottom.

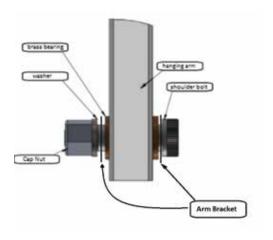
Note: Ensure that the bicycle lift is level when installed.



#### > Installing the Motor/Drive Assembly Cover

The Motor/Drive Assembly Cover should be placed over the top of the bicycle lift Top Frame piece and motor.

Secure the Assembly cover by installing 3 black ¼" Torx screws.



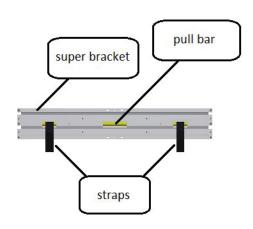
#### Attaching Hanging Arms to the frame

Tap in 2 brass bearings on either side of each hanging arm.

Next, place the hanging arm into the arm bracket and slide the shoulder bolt through to secure the hanging arm to the frame.

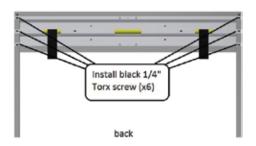
Once the shoulder bolt is through, place a washer over the threaded end and install the cap nut.





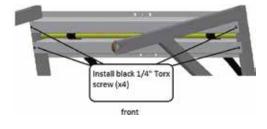
#### Connecting Straps to the Super Bracket

Loop the straps around the pull bar as you slide the pull bar into the super bracket.



#### ➤ Mounting the Super Bracket to the Hanging Arms

Attach the hanging arms to the Super Bracket near the top of the hanging arms by lining up the screw holes and securing the super bracket by installing 6 black ¼" Torx screws on the back and 4 black ¼" Torx screws on the front of the super bracket.



## ➤ Mounting the Nameplate



With the super bracket installed on the hanging arms, you can install the nameplate. The nameplate attaches to the top of the hanging arms and super bracket and is held on by 4 black  $\frac{1}{4}$ " Torx screws.

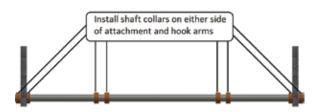




#### **➤** Mounting the Super Bracket Cover

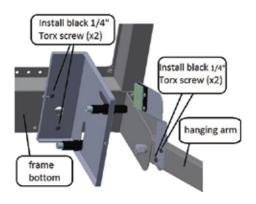
The Super Bracket Cover is installed on the load side of the bicycle lift. It is attached by 8  $\frac{1}{2}$ " Torx screws as shown on the left.

#### Mounting Hang Bar and Load Attachment



When installing the hang bar, place shaft collars on either side of the attachment and on either side of each hanging arm.

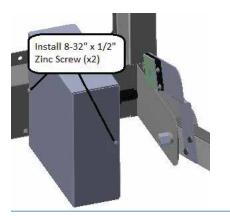
NOTE: Ensure that the attachment is centered



#### Mounting and Adjustment of Eye Sensors and Reflector

Mount the Eye Sensor box to the lower frame on the side with the wire hole by installing 2 black ¼" Torx screws.

Attach the reflector arm to the hanging arm by installing 2 black  $\frac{1}{2}$ " Torx screws.



#### ➤ Installing Eye Sensor Cover

Mount the Eye Sensor cover to the Eye Sensor box by placing the cover over the eye sensor box as shown on the left and installing 2 Zinc Screws.





#### ➤ Where to Mount the Control Box

The control box should be mounted at a location with the bicycle lift in plain sight and hardwired in by an electrician.



#### > Configuring Motor with Control Panel

Connect control box wires with motor wires as displayed. Control box wires are connected with corresponding colors to the motor box (green-green, white-white, black-black).



#### Wiring Motor and Eye Sensor to Control Box

Wiring from the motor and eye sensors to the control box must be completed by a certified electrician.

### **Troubleshooting**

Problem: The machine will not run.

Solution: Call maintenance and have them check:

1. The Control Box is receiving power.

- 2. The bicycle lift motor and eye sensor are securely fashioned in the correct location of the control box.
- 3. If the problem persists call us directly at 800-803-1083.

Problem: The machine will not go up completely.

Solution: Call maintenance and have them check:

- 1. Ensure that there is not excess glare coming from any part of the reflector arm to the eye sensors
- 2. The bicycle lift may be overloaded. The maximum load for the bicycle lift is 250-300 pounds depending on wall. Remove the load and try again.
- 3. If the problem persists call us directly at 800-803-1083.

