

Sculling Boat Hoists Assembly and User's Manual



Items in the box:

- (2) Hoist cradles
- (1) Hoist crossbar
- (1) Hoist winch assembly
- (3) 1/4" X 4" Lag screws with 1/4" washers
- (2) Single pulley with eye screw assemblies
- (1) Double pulley with eye screw assembly

Tools Needed:

- (2) 7/16" wrenches
- Pencil
- String and a small weight OR plumb bob
- Stud finder
- Drill with 3/16" bit and 7/16" hex drive bit
- Philips Screwdriver
- Adjustable Wrench
- Wire snips

I. Assembling the hoist frame

- 1. Remove the (2) hoist cradles and hoist crossbar from their boxes.
- 2. Remove the (6) 2 1/2" bolts, (8) flat washers and (2) 1/4" nylock nuts from the parts bag.
- 3. Join the two halves of the hoist crossbar (the (2) 2" square X 48" tubes) using the crossbar coupler (the 1 3/4" X 18" tube), (2) 2 1/2" bolts, (4) flat washers and (2) 1/4" nylock nuts. Tighten the nuts and bolts using the (2) 7/16" wrenches.
- 4. Attach the hoist crossbar to the (2) hoist cradles by using the remaining (4) 2 1/2" bolts and (4) flat washers. The bolts should go through the hoist crossbar and into the threaded inserts at the top of the (2) hoist cradles. The decal on the hoist crossbar should face downward towards the hoist cradles. Tighten the bolts using the a 7/16" wrench.
- 5. Leave the wire bundled for now.

II. Assembling the Winch

- 1. Using the manufacturer's included directions, follow the manufacturers guidelines for installing the winch handle on the Hoist Winch Assembly.
- 2. You will need a 7/16" wrench for assembly.

III.Determining Hoist Location

1. Place your scull on blocks of foam or another soft material approximately 3 inches off the ground. Two cut pieces of pool noodle or two rolled up towels placed under the cockpit of your boat works great. Place your boat in the orientation where you would like it to be positioned in your garage, under your deck or in your boathouse. How your boat is oriented

will be critical in determining where the pulleys anchor in the overhead joists. Allow for a little wiggle room side to side and front to back in the positioning of your scull. Depending upon where the joists are in your ceiling, under your deck or in your boathouse, the final position of the hoist may not be exactly where you have positioned your boat.

- 2. Take your assembled hoist frame and place it under your scull sitting on the ground. The padded supports of the hoist cradles should sit directly fore and aft of the cockpit of your boat. If installing in a garage, make sure the open side of the hoist cradles is facing outwards towards the garage door.
- 3. Determine the location of the closest joists in the ceiling or under your deck using a stud finder and a weighted length of string OR plumb bob. We like to use a bit of cotton string with washers attached. Other substitutions can include fishing line with weights attached. Hang your weighted string directly over the centers of the hoist cradles. The center will be directly between the two bolts that connect the hoist crossbar to the hoist cradles on each end of the hoist crossbar OR where the wire is swaged together. The weighted string will insure that you have a straight line from the hoist cradles to the ceiling. Bring the string all the way up to the ceiling and make a small pencil mark, making sure the whole time that the weighted end of the line remains over the center of the hoist support.
- 4. Use a Stud Finder to locate the closest joists to each of the pencil marks on each end of the assembled hoist frame. This will determine where you mount the pulleys. Keep in mind that if the joists are to the right of the pencil marks, the position of the scull will be further to the right. If the joists are to the left of the pencil marks, the position of the scull will be further to the left. Plan accordingly so that you do not have to reposition your scull once you have fully installed your hoist. There is usually more than one place that you can install the pulleys. This is why a little wiggle room was needed as mentioned above in Step 1.
- 5. Using a drill with a 3/16" drill bit, drill pilot holes into the joists at your predetermined marks in your ceiling. Please note that the pulleys ABSOLUTELY MUST be mounted into a wood joist. DO NOT mount the pulleys into bare drywall or plywood. Only a wood joist will give the hoist system enough strength to lift and hold your boat.
- 6. Remove the (2) single pulley with eye screw assemblies from the parts bag. Using a screwdriver for leverage, twist the eye screws attached to the pulleys into the joists. Make sure the eye of the eye screw is as deep into the joist as possible. Rotate the eye screw until it is flush with the joist or the drywall.
- 7. Unbundle the wire attached to the hoist supports and feed it through the installed pulleys.

IV. Determining Winch Location

- 1. Install the winch in a location where the wires will run PARALLEL to the length of your scull. This ultimately will put less tension on the wires and pulleys and make for smoother operation.
- 2. Determine where you will ultimately install your winch. Use a Stud Finder to locate the nearest stud in the wall.



- 3. Place the hoist winch assembly against the stud with the round drum of the winch facing towards the ground. Use a drill with a 3/16" drill bit to drill pilot holes directly through the mounting holes of the Hoist Winch Assembly and into a wood stud. If you need to place the winch in a location in between studs, use a thick board to span the distance between two studs and then attach your winch to the board as shown in the corresponding figure. Additional screws will be required.
- 4. Use your drill and a 7/16" hex drive bit to screw the 1/4" X 4" lag screws and flat washers through the mounting holes of the hoist winch assembly and into the stud. Your hoist winch assembly MUST be securely anchored to a wooden stud and NOT in drywall alone.
- 5. Double check that the winch is secure to the wall by grabbing it and giving it a good shake to make sure there is no wiggle and that you can not pull it out of the wall.
- 6. Find the nearest ceiling joist directly above the newly mounted winch.
- 7. Use your drill with a 3/16" drill bit to drill a pilot hole directly into the joist.
- 8. Remove the double pulley with eye screw assembly from the parts bag. Using a screwdriver for leverage, twist the eye screw attached to the pulleys into the joists. Make sure the eye of the eye screw is as deep into the joist as possible. Rotate the eye screw until it is flush with the joist or the drywall.

V. Final Assembly

1. Take the two loose ends of your wire and finish feeding them through the double pulley with eye screw assembly and down to the winch.



- 2. Feed the wires through the back side of the winch (the base side of the winch) and through the wire clamp on the winch drum. Do not tighten the clamp just yet.
- 3. Take the slack out of the wires such that the hoist raises the few inches that your boat is currently sitting off of the ground. Make sure you take the slack out of the two wires evenly so that the hoist sits level. Tighten the wire clamp on the winch drum using an adjustable wrench to clamp the wires in place.
- 4. Use a pair of wire snips to cut the excess length of wire. Your winch comes with (2) 33 foot long lengths of wire. If you require longer lengths of wire, please contact us directly. BE ABSOLUTELY SURE YOU HAVE MOUNTED YOUR HOIST WHERE YOU WANT IT AND THAT THE SLACK IS EVENLY TAKEN OUT OF BOTH LINES BEFORE CUTTING ANY EXCESS WIRE.



5. Rotate the handle on the winch slowly to lift your scull about a foot off of the ground. Double check that the brake on the winch works correctly by rotating the handle backwards and lowering your scull back to the ground. If the brake works, go ahead and rotate the handle on your winch until your boat is fully lifted.

VI: Use and Operation

- 1. The Sculling Boat Hoist is made to allow for easy one person loading/unloading. To load/unload, lift your boat from the center balance point and rest your scull on the hoist cradles so that they are directly fore and aft of the cockpit of your boat. While you can load/unload your scull overhead or at shoulder level, it is recommended for safety purposes that you load/unload at waist level.
- 2. Your hoist should naturally lean backwards so that the openings to the hoist cradles are more accessible when loading. Once your scull is loaded, the hoist cradles should level out, but still retain a small amount of backwards lean. This design is a safety feature to keep your scull from accidentally falling out.
- 3. When loading/unloading your scull from your hoist, remember to attach the safety bungees to keep your scull secured in the cradles.
- 4. When lowering the hoist, make sure that the brake engages on the winch by rotating the winch handle counter clockwise and then rotating the winch handle a partial turn clockwise until it produces an audible click. This click denotes that the brake is engaged and it is safe to remove your hand from the winch handle. If your brake fails to engage, remove your scull from your hoist and discontinue use. Contact Revolution Rowing immediately for service.
- 5. When raising and lowering your hoist, allow the wire to spool on and off the drum of the winch evenly from side to side. Periodically check the wires for wear. Remove your scull and discontinue use if any wear is found. Wear can include frays, cuts or knicks in the wire. Contact Revolution Rowing immediately for service.
- 6. Periodically check all other hardware for wear, corrosion and fatigue. This includes the nuts/bolts/washers that hold the hoist frame together, the lag screws that hold the hoist winch assembly to the wall and the eye screws that hold the pulleys to the ceiling. Remove your scull and discontinue use if any wear is found. Contact Revolution Rowing immediately for service.
- 7. If needed, service and replacement parts can be obtained from Revolution Rowing at info@revolutionrowing.com or 7705619995.

Hoist Use Guidelines

When using Revolution Rowing Sculling Boat Hoists, there are precautionary measures that the user must follow. The following list will guide you to use your product in a safe manner.

- Only use approved fasteners and mounting hardware provided by Revolution Rowing to assemble and Sculling Boat Hoists. Fasteners and hardware should be inspected periodically for wear, corrosion and fatigue.
- Never exceed the manufacturer's recommended weight limit for your Sculling Boat Hoists. Total load weight is the sum of the weight of your scull plus the weight of accessories. Total weight should not exceed 100 lbs.
- Check your braking winch periodically for smooth operation of the brake. Replace winch immediately if the braking feature does not work.
- Consult Revolution Rowing if you have any questions about the operation or limitations of Revolution Rowing products.

Limited 30 Day Warranty

Effective September 3, 2015

Revolution Rowing will warranty all Revolution Rowing brand Sculling Boat Hoists manufactured by Revolution Rowing for a period of 30 days after purchase. This warranty is available to the original retail purchaser and will terminate if the purchaser transfers the product to any other person.

Subject to the limitations and exclusions described in this warranty, Revolution Rowing will remedy defects in materials or workmanship by repairing or replacing, at its option, a defective product without charge for parts or labor. In addition, Revolution Rowing may elect, at its option, not to repair or replace a defective product but rather issue to a purchaser a refund equal to the purchase price paid for the product, minus shipping charges.

No warranty is given for defects caused by normal wear and tear, cosmetic rust, scratches, accidents, unlawful storage, or modification of, or any types of repair of, a Revolution Rowing storage product other than those authorized by Revolution Rowing.

No warranty is given for defects resulting from conditions beyond Revolution Rowing's control including, but not limited to, misuse, overloading, or failure to assemble, mount or use the product in accordance with Revolution Rowing's written instructions or guidelines.

No warranty is given for Revolution Rowing products purchased outside of the United States.

In the event that a product is defective, the purchaser should contact Revolution Rowing via the contact information available at the web address at the bottom of this page.

In the event that a product needs to be returned to Revolution Rowing, Revolution Rowing will provide the purchaser with the appropriate mailing address and any additional instructions. Please note that the purchaser will be responsible for the cost of mailing the product to Revolution Rowing.

Disclaimer of Liability

Repair or replacement of a defective product or the issuance of a refund or credit (as determined by Revolution Rowing) is a purchaser's exclusive remedy under this warranty. Damage to a purchaser's vehicle, cargo and/or to any other person or property is excluded.

This warranty is expressly made in lieu of any and all other warranties, express or implied.

Revolution Rowing's sole liability to any purchaser is limited to the remedy set forth above. In no event will Revolution Rowing be liable for any lost profits, lost sales, or for any consequential, direct, indirect, incidental, special, exemplary, or punitive damages or for any other damages of any kind or nature.