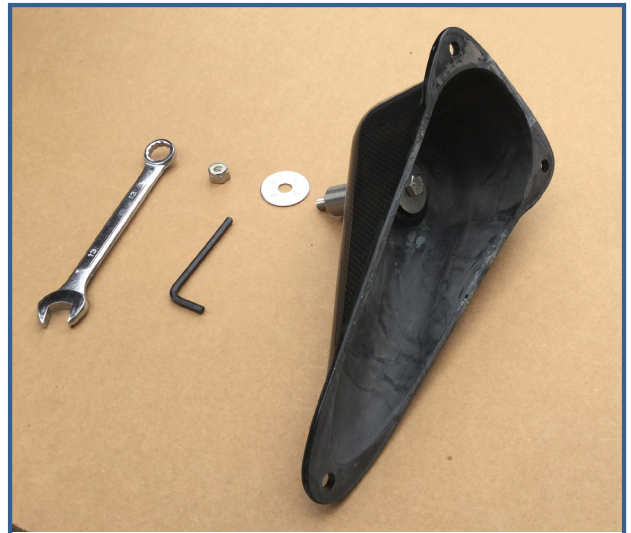


Trogear Bowsprit Side Mount Installation Manual

Congratulations on your purchase of the Trogear Bowsprit which can be installed on most sailboats. The installation of Side Mounts is similar to any other boat hardware, but ***please read the instructions thoroughly first, and if in doubt contact us or your boat rigger with any questions.***

Materials and Tools Recommended

- Six 5/16"(8MM) SS Bolts, 6 nuts & 12 washers, Backing plates (if needed)
- Marker or pencil
- Tape measure
- Wrench (13mm / .5")
- Allen wrench
- Drill Bit (5/16" or 8mm)
- Drill Motor
- Structural Epoxy –West System Six10 or similar (if needed)
- Marine grade sealant such as 3M Marine 5200 Sealant.



Procedure

Determine location of the Attachment Holes:

Attach the mounts to the bowsprit and place the bowsprit on the hull. Have a helper mark the location of the holes on the hull.

(FIG: 1)

Make sure that the mounting locations are symmetrical from side to side.

Drill the Holes & Install Mounts

Drill the holes, then install the mounts using three 5/16"(8MM) SS Bolts on each side. Seal the 6 bolts with the marine grade sealant.

During installation, keep the Titanium stub shafts inserted in the spherical bearing – the end with the bolt faces inboard and the opposite end with the threaded stud faces outboard.

Note for cored hulls: The mounting holes should be reinforced with structural Epoxy surrounding the hole periphery area. Use large size washers or backing plates inside the hull.

Attach Bowsprit:

After the Mounts are bolted to the hull, slide the bowsprit over the mounts aligning the holes in the ends with the stub shafts.

Pull out the stub shafts carefully (do not damage the thread on the studs).

Place a washer on the protruding stud and then a nut, and use an allen wrench to prevent stud rotation when tightening the nuts. **(FIG: 2)**

Carefully tighten the nuts. Torque until snug, but do not overtorque.



Fig. 1: Place bowsprit with mounts attached on the hull to determine location



Fig. 2: Use allen wrench to prevent stud rotation

F) Rigging the Bowsprit:

There are many ways to rig the Trogear Bowsprit. (For more rigging details, see our rigging example section online).

1. Permanently Fixed Bowsprit:

The simplest rigging is when the Trogear Bowsprit is used in a permanently extended position without the need for adjustment. Use a fixed length Bobstay with one end attached to the U Bolt and the other attached to the tip of the Bowsprit.

2. Adjustable Bowsprit – hinged attachment:

The Trogear bowsprit's main design feature is the hinged attachment, which allows it to rotate up and down. We recommend a 2:1 Bobstay purchase with the control line leading to a clutch and winch in the cockpit. This allows you to take full advantage of our unique design and adjust the sail luff tension or bring the Bowsprit to an upright position (for stowing or changing sails only) (Fig. 3).

IMPORTANT NOTE: The Trogear Bowsprit should be close to a horizontal position when flying the sails. See our use instructions enclosed with your purchase or online for more details.

A **Bungee cord** is used to hold the Bowsprit in an upright position or pop it up when the bobstay is released (similar in function to a Pole Topping lift). We recommend the MiniShackle™ from Davis but others can be suitable as well. (Fig. 4)

A **Stop strap** is used to keep the bowsprit from pivoting past a predefined angle in case the sail drops to the water. **A bungee cord is NOT strong enough for this safety purpose. Please use Flat nylon webbing or similar.** (Fig. 5)

See next page for more rigging details.



Fig 3: Bowsprit in upright position to attach a furler.

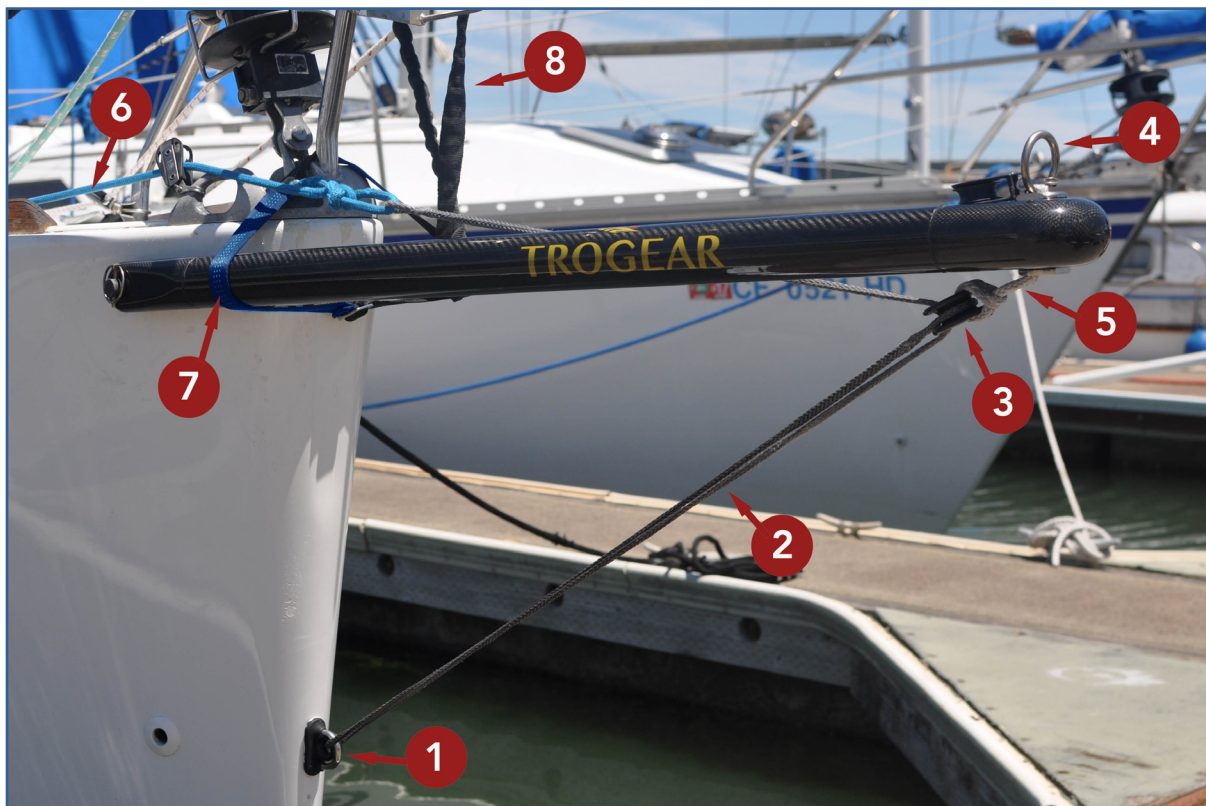


Fig 4: Showing Bungee Cord and Stop Strap.



Fig 5: Showing flat nylon webbed Stop Strap.

Rigging Example: (each yacht owner can configure the rigging that is most suitable for their needs.)



1. U Bolt (shown here with low friction ring)
2. Bobstay Dyneema - 2:1 purchase
3. Low friction ring
4. Stainless steel ring for furler attachment or with block for tack line
5. Dyneema loop lead through the bowsprit bushing connects stainless steel ring (#4) and low friction ring (#3)
6. Bobstay control line led through a clutch to a winch in the cockpit.
7. Stop strap - flat nylon webbing
8. Bungee cord

1. Furler attached to stainless steel ring.
2. Block for tack line
3. Bobstay Dyneema

