

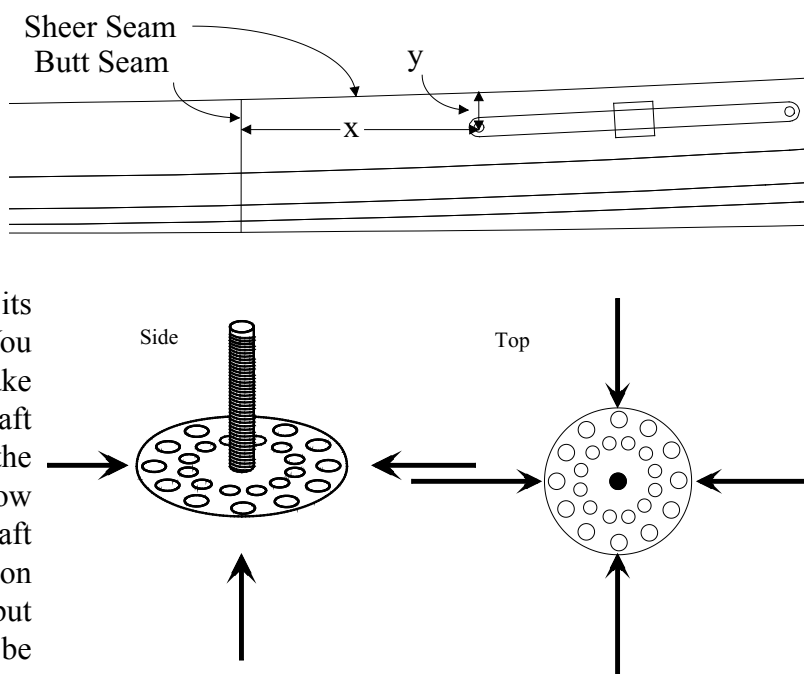
# Internal Footbrace Stud Installation

## Overview

The footbrace studs you have purchased allow you to install your footbraces without drilling a hole in the side of your hull. The standard method of drilling is both sturdy and watertight. This alternative is only an aesthetic one and has a known limitation. If you plan to use a rudder on your boat you will be limited to the Smart Track Rudder with a vertical adjustment plate. The studs will NOT work with a typical slider style rudder footbrace assembly.

## Installation

The footbrace studs are best installed prior to attaching your deck. At the end of these instructions is a set of measurements for each boat. The numbers pertain to the aft (stern) end of the footbrace rail. You will measure the forward position using your footbrace rail. (**Note:** If more than 72 hours has passed since you last applied epoxy to the area that the footbrace studs will be applied, you must sand the area to assure a solid bond.) First, determine the location of the aft stud, measuring from the butt seam and down from the sheer. Mark the spot. (**Note:** If you are over 6' or under 5' 6" tall you should measure the proper distance yourself. Call for more information.) Prop your hull on its side. Make sure that the boat is steady. You don't want your footbrace studs to move. Take your footbrace rail and studs and place the aft stud over the mark for the aft end. Position the forward end of the rail the same distance below the sheer at the distance specified for the aft end. Holding the rail firmly, trace the position of the foot brace studs. Remove the rail but leave the studs in place. Shortly, you will be applying thickened epoxy over the marks you just made and will need to reposition the studs. To do this, make some lines pointing to the center of the stud as shown in the diagram.



Wrap the footbrace rails in plastic wrap or wide packing tape. Puncture a hole at each end for the bolts. Set them aside. Take the 16" strip of 4" fiberglass tape and cut it into four 4" x 4" squares. Take each of these squares and fold them in half twice, once vertically and once horizontally. Take your scissors and snip a SMALL hole at the center corner. This will enable the glass tape to be laid over the stud post.

Mix up a small amount of epoxy and thicken it with wood flour to the consistency of soft serve ice cream. Lay a thin layer over the tracings of the stud base on the inside of your hull. Carefully align studs with the lines you have drawn and press the base into place. If the holes in the base are not completely filled, putty some more thickened epoxy into the holes. Likewise, enough epoxy should squeeze out around the perimeter so that there is not a pronounced edge. Once both studs are in place, check the alignment by carefully sliding the rail over the stud posts. Adjust if necessary. Remove the rails.

Place one 4" x 4" square of glass tape over each stud. Mix up a small batch of un-thickened epoxy and carefully wet out the tape. Before leaving the epoxy to cure, carefully place the foot brace onto the

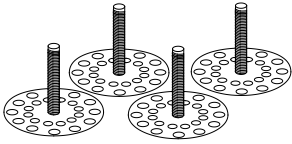
studs.

Once the epoxy has set up, repeat this process for the other side of your boat.

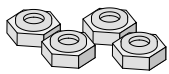
You may bolt your foot braces in before your deck is attached or wait until the boat is completed. Remember to place the foot pad on the rail before attaching them.

## Parts List

\_\_\_ 4 Stainless Footbrace Studs



\_\_\_ 4 10-32 Stainless Lock Nuts



\_\_\_ 16" Four inch wide fiberglass tape

<b>Boat</b>	<b>"x"</b>	<b>"y"</b>
Arctic Tern 14	27"	1.75"
Arctic Tern 17	9.5"	1.75"
Arctic Tern Hi	9.5"	1.75"***
Arctic Tern 17*	12.5"	1.75"
Borealis XL	5.0"	1.75"
Coho w/recessed rear cockpit 3"		1.75"
Coho Hi	3"	1.75"***
Coho*	5.5"	1.75"
Osprey Standard	18.25"	1.75"
Osprey HP	4.75"	1.75"
Osprey 13	28.5"	1.75"
Osprey Double Bow	29.5"	3"
Osprey Double Stern **	56.25"	3"
Osprey Triple Bow	37.25"	3"
Osprey Triple Mid	-7.5"	3"
Osprey Triple Stern**	42.5"	3"
Pinguino Sport	30.5"	1.75"
Pinguino 14.5	22"	1.75"
Queen Charlotte Standard	28.5"	3"
Queen Charlotte 19	37"	3"
Queen Charlotte XL	28.5"	3"

\* Use these numbers if you do not have the recessed rear coaming.

\*\* These positions usually have rudders. Please see the overview.