GENERAL INFORMATION
Once assembled, this system is designed to allow a limited amount of flex under stress or load. It is expected that the rubber connectors will stretch to help the system, and its appliances, absorb shock or extreme pressures.

MAINTAINING YOUR EZ DOCK SYSTEM
Cleaning: Dock sections may be easily cleaned with a brush and water. Use a diluted bleach solution for stubborn stains. Algae growth on the docks below the water line is normal and will not harm the system.

Ice: The dock sections float high enough that ice pressure won't affect them. However, if your shoreline area has ice pressure pushes, wind blown ice, or other ice flows, you may need to remove the docks or disconnect them from the moorings. You may also need to remove pipes or piles so they won't be bent by ice pressure.

Removal: If you remove your docks, they should not be dragged over rough gravel or other sharp objects as this could unnecessarily scratch their surface areas. The sections may be stored on edge or right side up outdoors without any other special care.

ASSEMBLY OVERVIEW
- Please familiarize yourself with the instructions before beginning.
- Although the assembly instructions picture a 40" wide dock section, the same assembly methods are used for the 60" and 80" wide units.
- The system may be assembled on the ground, on a sufficiently thick ice sheet, or on open water. It is easiest to attach most of the hardware to the floats before putting them in the water. However, since each 40" unit weights 160 lbs. (60" model 260 lbs., 80" model 375 lbs.), it is not recommended that more than two floats be connected to each other before they are moved to the water.
- Plan your layout before you begin assembly, and check to make sure that you have the right tools.

Recommended tools:
- One bar of ordinary hand soap.
- One 3/8" hex key (included).
- One 3/4" and one 15/16" open end or socket wrenches.
- 3/8" drill bit for 2-1/2" auger attachment. 1/2" drill bit for 3-1/2" auger.
- Large #3 Phillips screw driver for tie-up cleats or curbs.
- Nylon rope to help secure dock while positioning for anchoring.
- Pipe wrench (if using augers on pipes.)

Coupler Installation
A coupler pair consists of one top coupler, one bottom coupler (with rectangular recess), a coupler rod, and 3/8" socket coupler nut. We recommend couplers be installed whenever pockets meet at adjoining dock sections.

Helpful hint: Make assembly and disassembly easier, rub a bar of hand soap on the coupler rod threads to lubricate them. Avoid tightening the coupler nut onto the rod by more than 15 ft./lbs.

1) Align dock sections so coupler pockets are adjacent to each other.
2) Slide bottom coupler with rectangular recess facing down onto the coupler rod until the rectangular flange is fully seated in the coupler recess.
3) Push the bottom coupler and rod assembly into the selected pockets on the bottom area of the dock sections. The rod should now be protruding through the pockets on the top side of the dock.
4) Finish the assembly by aligning the hole in the top coupler over the rod and pushing the coupler into the pocket opening until it is completely flush with the decking surface. Thread the 1/2" coupler nut onto the rod. Using a 3/8" hex key, draw the couplers together by turning the nut until it has flushed with the top of the coupler. The couplers should be pukered inwardly when the connection is tight.

Coupler Installation Tool (Optional)
Helpful Hint: Ballast the opposing ends of the floats to keep the adjoining ends from dipping. This can be easily done by having someone stand on the opposite ends of the sections, or by standing on a 2" x 12" x 8' board placed perpendicular to span the seam being connected.

1) Align and butt together dock sections to be connected.
2) Attach the bottom coupler and rod assembly firmly on the base of the coupler installation tool.
3) Hold the top handle and lower the tool and coupler into the water until the rod is completely below the bottom surface of the float sections (if the rod hits the floats the coupler may be knocked off the base).
4) While maintaining that depth, slide the tool between the sections until you reach the pockets to be connected.
5) Lift the tool upward, being sure to align the rod so that it will come through the opening between the pockets.
6) The tool has a 1/2" hole on the long flat part of the handle that may be seen above the dock area and will indicate that the bottom coupler is properly in position. Insert a rod or screwdriver into this hole to hold the tool and coupler in place while connecting the top coupler.
7) Place the top coupler in position, attach the coupler nut, and draw the connections together tightly.
8) To release the coupler tool remove the screwdriver or rod from the hole in the handle and push the tool downward away from the couplers. Now slide the tool from between the floats to begin your next connection.
Heavy-duty Polyethylene Pipe Bracket Installation

(2" and 3" model): A 2" bracket is designed to use pipe that measures 2.5" in outside diameter. A 3" bracket is for pipe that measures 3.5" in outside diameter. Assembly procedure is the same for either the 2" or 3" pipe bracket.

NOTE: When using pipes to secure the dock system, it is recommended that the pipes be sufficiently driven or screwed (using augers) into the lake bottom or river bed. Do not expect the dock to hold the pipe upright, the pipe should remain vertical and hold the dock in place.

1) Slide the insert sleeve over the top and down the pipe to be installed until it is at water level.
2) Align the pipe next to the dock where it will be secured. It should be placed so that the sleeve is centered between two pockets. Screw or drive the pipe into the soil until it will stand by itself.
3) Slide the insert sleeve up the pipe far enough so that you can bring the mainframe past the pipe and into position against the dock.
4) Attach the polyethylene main frame using a coupler set as shown.
5) Slide the insert sleeve down the pipe and into the polyethylene main frame. Secure with the two 5/16" machine screws provided.
6) Finish driving or screwing pipe into the soil so that it is solidly in place.

Polyethylene Pipe Bracket Installation

(2" and 3" model): A 2" bracket is designed to use pipe that measures 2.5" in outside diameter. A 3" bracket is generally intended for use with schedule 80 PVC pipe (3.5" outside diameter) in salt water applications. Assembly procedure is the same for either the 2" or 3" pipe bracket.

NOTE: When using pipes to secure the dock system, it is recommended that the pipes be sufficiently driven or screwed (using augers) into the lake bottom or river bed. Do not expect the dock to hold the pipe upright, the pipe should remain vertical and hold the dock in place.

Hint: If augers will be used on the anchoring pipes, slide the Poly Pipe bracket halves over the top of the pipe before attaching the bracket halves to the dock.

1) Install the bottom half of the bracket (the bottom half has T-nuts imbedded at the connection points). Insert the molded in coupler into the bottom pocket of the dock.
2) Attach the top bracket half by inserting its molded in coupler into the top pocket of the dock.
3) Secure the two halves together with the two 5/16" Phillips head screws.

Floating Dock Adapter Hinge Kit

The Hinge Kits are sold in pairs and may be used in multiples to secure docks or EZ Ports to other floating structures.

1) Measure the freeboard of the fascia where the connection will be made.
2) Determine the best position for the hinge adaptor plate. Above, perpendicular or directly in front of the hinge adaptor bracket.
3) If attaching to a wooden structure, use carriage bolts to anchor adaptor plate. If attaching to steel or aluminum structure, it may be necessary to first attach a 2" x 8" wooden fascia.
4) With adaptor hinge plate securely in place, float EZ Dock section or EZ Port into position and secure with hinge pins.
Piling Bracket Installation

Recommended for deep water installations, or more severe conditions like heavy wave or wind action, or when larger vessels will be moored to the dock system. Be certain there is sufficient clearance between the hoop and piling so the dock can move freely with water level changes.

1) Loosely attach two hardware connectors (tapered side up) to the inside/bottom of the piling bracket mainframe using the 5/8" lock nuts.
2) Place two hardware connectors into the top pockets of the dock where the pipe bracket is to be positioned.
3) Now guide the bracket so that the lower hardware connectors are brought fully up into the bottom pockets.
4) Move the bracket in toward the dock so the top hardware connector bolts will protrude through the corresponding holes in the mainframe. Secure by fully threading with 5/8" lock nuts (do not over tighten).
5) Install piling, or if existing piling, move to next step.
6) Slide hoop connection bolt sleeves into hoop, secure with bolts and nuts.
7) Attach the piling hoop by tilting it so the bottom rods will insert through the appropriate holes in the bottom of the mainframe. Then tilt the hoop inward toward the dock so that the bolts of the connection sleeves come through the holes at the top of the bracket mainframe.
8) Secure with 5/8" lock nuts.

Deadman Bracket Installation

Recommended for use when deep water or mucky bottom prevents the use of pipes or pilings. This bracket is designed so that the dock may be held in place by attaching it with chain to a submerged object sufficient in weight to prevent dock from moving laterally.

1) Loosely attach two hardware connectors (tapered side up) to the inside/bottom of the deadman bracket mainframe using the 5/8" lock nuts.
2) Place two hardware connectors into the top pockets of the dock where the bracket is to be positioned.
3) Now guide the bracket so that the lower hardware connectors are brought fully up into the bottom pockets.
4) Move the bracket in toward the dock so the top hardware connector bolts will protrude through the corresponding holes in the mainframe. Secure by fully threading with 5/8" lock nuts (DO NOT OVER TIGHTEN).
5) Thread the chain up through the bottom hoop and then through the top hoop. The chain can be secured using the slot in the top hoop.
6) Adjust the chain to the desired degree of tension. (If the dock is subject to water level changes, it will be necessary to adjust the slack in the chain to compensate for the level change).

Assembling Pipe and Auger

If anchor pipes are used (except in rocky or shale bottoms) we recommend augers to make the job easier.

1) Determine length and size of pipe needed.
2) Insert auger butt into one end of the pipe and drill a 3/8" hole through pipe and auger butt at the same time.
3) Insert bolt provided through the hole and tighten with lock nut provided.

*For an additional charge we will supply predrilled pipe and auger assemblies

Installation of Pipe with Auger

We recommend installing the gangway before putting pipes in, as this gives you a better idea of dock positioning.

1) Position docks on the water and secure them in place with ropes or other methods.
2) Place the pipe vertically against the pipe bracket inside clamps and allow the auger to rest on the bottom.
3) Plumb with a level then turn pipe into the bottom like a corkscrew using a pipe wrench or by predrilling the pipe and using a T-handle. Pipes have to be in the bottom material at least three feet to be effective.
4) Secure the pipe with two outside pipe clamps and 1/2" x 1 1/2" bolts and lock nuts (see pipe bracket installation diagram, pg. 2).
**Gangway Assembly**

Wider gangways weigh more than narrower ones of the same length and will cause the first dock section to list if they are too long. As a general rule, a 2-plank wide gangway may be up to 12' long, a 3-plank unit may be up to 16' long, and a 5-plank model may be up to 20' long without special provisions. Lengths are based on their being attached to a system containing at least three dock sections. Aluminum gangways weigh less than wood units and can be longer. These too, however, require special considerations in longer lengths. See steps 6 and 7 only for aluminum gangway attachment.

1. For wooden gangways, begin by cutting all planks to equal length.
2. Lay the planks side by side as they will be when assembled.
3. Place the hinge-to-plank bracket, shore-end stiffener and middle stiffener on the planks and mark the holes for bolt locations.
4. Drill 1/2" holes through the planks at each of the locations marked.
5. Attach the stiffeners at shore end and at the mid-point as shown using the carriage bolts, washers and nuts provided.
6. Attach the hinge-to-float bracket to the dock section by fully threading the 5/8" lock nuts onto the hardware connectors (do not over-tighten).
7. Align the sleeves of the hinge-to-plank bracket (on gangway), and the hinge-to-float bracket (on dock) and slide the hinge pin through all the sleeves. Secure hinge pin with the hitch pin clip.

**Curb installation**

It is possible to use plastic or treated lumber to accomplish a raised curb along the perimeter of the dock walkway. 2½" wide x 3½" high material is recommended.

1. Attach curb to the deck where T-nuts have been imbedded into the surface edge of the dock section. Use 5/16" flathead machine screws no more than 3/8" longer than the curb is thick.

**Rail Installation**

While there are several styles of railing, all are attached using this method.

1. Loosely attach hardware connectors to railing legs at the lowest location.
2. Put hardware connectors in the corresponding pockets of the dock.
3. Tilting the railing outward and away from the dock at the top, bring the bottom couplers up and into the bottom pockets.
4. With the bottom couplers fully up and in the bottom pockets, bring the top of the railing back toward the dock so the upper holes in the railing legs fit over the bolts in the hardware couplers on the top edge of the dock.
5. Secure by fully threading the nuts on all hardware connectors (do not over-tighten).