

### Elevator Hinge Fabrication

Start by finding the 36" piece of stainless piano hinge from your kit.

Remove the pin and reverse the hinge (as per diagram), reinstall the pin.

Measure this piece into 5" sections, you should have 7 parts total (one extra).

**REMOVE THE PIN** and cut the piano hinge, clean and debur all edges.

Drill 5 evenly spaced 1/8" pilot holes in each of the pieces you just made, these holes should be drilled inline with the rolled portions of the hinge to give the most material.

Once all are drilled and the spacing looks correct, drill these holes out with a #10 drill bit (3/16 is not enough for the rivets used).

Cut the hinge pin into 4.5" pieces, you will need 6 of them.

Now you are ready to work on the elevators and horizontal tails.



### Fit Hinges to Horizontal Tail

Make sure that the "Horizontal tail Prep" has been completed prior to this.

Start with the left tail; Measure 1 inch in from the outboard end and mark, measure 2 inches in from the inboard end and mark, now split the difference between them and mark the center position.

Take one hinge and align it with the outboard mark, now make a mark at the other end of hinge.

Complete the same step for the inboard mark.

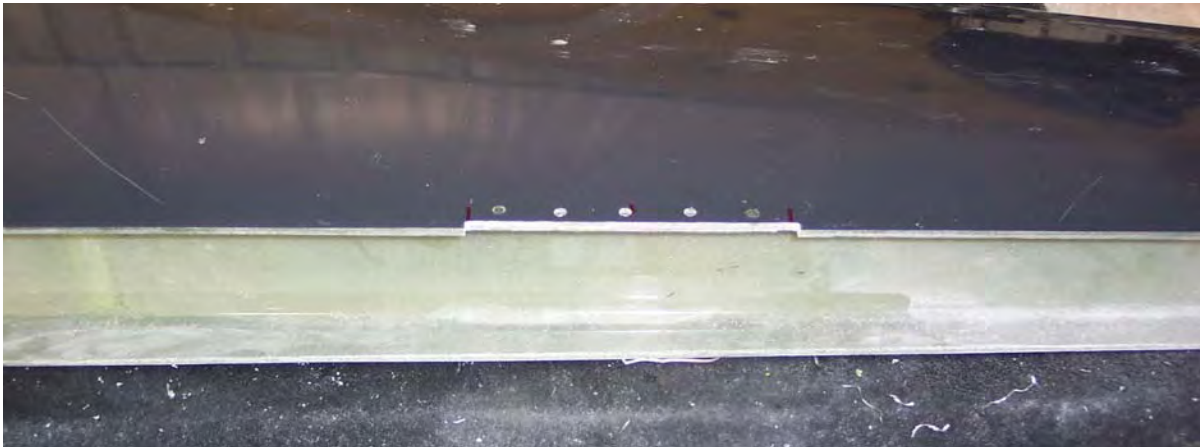
Measure the center of the hinge to be used for the center hinge, align this mark with the center mark on the tail, this is where the center hinge will go.



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Now sand or cut out the area between the marks where the hinge will be placed, the inset should be about 1/8”.



Next mark each hinge to a specific position .

Clamp the hinge in place, the hinge is fitted to the bottom of the top skin, and back drill the holes.

### **Fit hinges to Elevator**

The hinges need to be temporarily attached the horizontal tail, clecos or bolts will do fine.

To insure that the elevator will not contact the stab tape a spacer to the end cap, needs to be 1/8”.

Hold the elevator up to the stab where it would be attached, with the hinge half for the elevator on top of it.

When satisfied with the position mark the ends of the hinges.

Transfer these marks to the front face of the elevator.

Disassemble the hinges, **Make sure to mark each hinges position, Do not mix them up they will be specific to location when finished.**

Place the hinge in its correct location, use a straight edge or scrap piece of wood over the hinge being fitted, this keeps the hinge from sitting to high.

Drill thru the hinge and elevator

Complete each hinge this way.

When all are drilled, rivet the hinge to the elevator using the 3/16” stainless steel rivets



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Complete the same task for the right Horizontal tail and elevator

