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# 20679-1031 & 20679-1032 1967-69 Camaro Billet Hood Hinge Kit Installation Instructions

Thank you for purchasing your set of billet hinges from Ringbrothers - the innovators of the billet hinges. What you have purchased is an original and not a copy.

If you plan to disassemble the hinges before installation for polishing or plating you should know that all the bolts are assembled with blue Loctite. This should be done again when hinges are reassembled.

Also, note when disassembling the hinges, that there are two small washers to provide clearance for the pivot bearings on the forward support arms. Make sure that they are replaced when the hinges are reassembled.

## Packing List:

- 1 Right hinge assembly
- 1 Left hinge assembly
- 4 3/8" x 1" button head bolts with washers for attaching hinge body to inner fender
- 4 3/8" x 1-1/4" button head bolts with washers for attaching hinge bracket to hood
- 2 Gas springs

**CAUTION:** Make sure ALL bolts are not too long for your application.

#### **Tools Needed:**

9/16" Socket, open end or box end for removing factory hinges 7/32" Allen wrench for installing 3/8" button head bolts

#### **Installation Steps**

- 1. Remove hood
- 2. Remove factory hinges and try to hand tighten a button head bolt where each hinge bolt was removed. If the threads are damaged or corroded re-tap them with a 3/8"-16 tap.
- 3. Position each hinge on the correct side and attach the hinge body to the inner fender with the 3/8" x 1" button head bolts. Before tightening the bolts completely, move the hinge body up or down so the bolt is centered in the slot.

- 4. Each hinge has a gas spring to hold the hood open.
  - **NOTE:** When installing the gas spring the barrel of the spring should always be above the rod to keep the lubrication on the rod and not ruin the spring. The spring should be installed after the hinge is mounted to the fender but before the hood in installed
- 5. Before you attach the hood you need to make sure that the hinges will close square. Measure the hood to hinge mounting holes. Measuring across the hood, record the length between the front two mounting holes. Then record the measurement between the rear two mounting holes on the hood. With the hinges mounted to the car you will need to measure and record the length between the front two holes on the hood bracket. Do the same for the rear two holes on the hood bracket just as you did on the hood. You are making sure that the measurements are close because the hinges will NOT FLEX.

NOTE: it may be necessary to loosen the inner fender bolts to adjust the hinge mounting surface in or out.

## NOTE: HINGES MUST CLOSE SQUARE! THEY WILL NOT FLEX!

- 6. Attach the hood to the hinges with the 3/8" x 1-1/4" button head bolts. Slide the hood forward as far as possible tightening the bolts. This will assure that the hood will not hit the cowl as it is lowered. Lower the hood **carefully**, watching the clearance front and back as well as both sides. Adjust the hood on the hinge brackets as needed for the correct clearance.
- 7. Adjust the hood height. Once the hood closes completely, check the height of the hood at the rear corners.

Any questions please call 608-588-7399 Enjoy your new Ringbrothers Billet Hinges!

### Note:

The hinge holes on the factor Camaro hood, measured side-to-side, are 44-9/16" on center. If you are using something other than a factory hood measure that hole spacing on your hood.

OPTION 1: Hole spacing is narrower than 44-9/16"

Use washers, on both attachment bolts to space each hinge away from the inner fender. Use washers with as large a diameter as possible to maximize contact the area.

Calculate the difference and use half that amount in washer thickness on each side.

Example: If the holes are  $\frac{1}{4}$  too far apart use enough washers to space each hinge  $\frac{1}{8}$ .

Attach both hinge bodies to the inner fenders and with the hinges in the lowered position, measure the side-to-side hole spacing in the brackets that attach to the hood to verify that it is the same as the hole spacing in the hood.

OPTION 2: Hole spacing is wider than 44-9/16"

Drill and tap new holes in the hood. Fiberglass hood normally have molded in aluminum that are drilled and tapped for the hinge bolts. Examine the hood to make sure that the aluminum pieces extend into the areas where new holes are needed. There is a possibility that you may have to locate the new holes far enough to clear the existing holes, that you may have to use spacers on the hinge bodies explained above.

Drill and tap new holes being careful not to go through the top surface of the hood.