

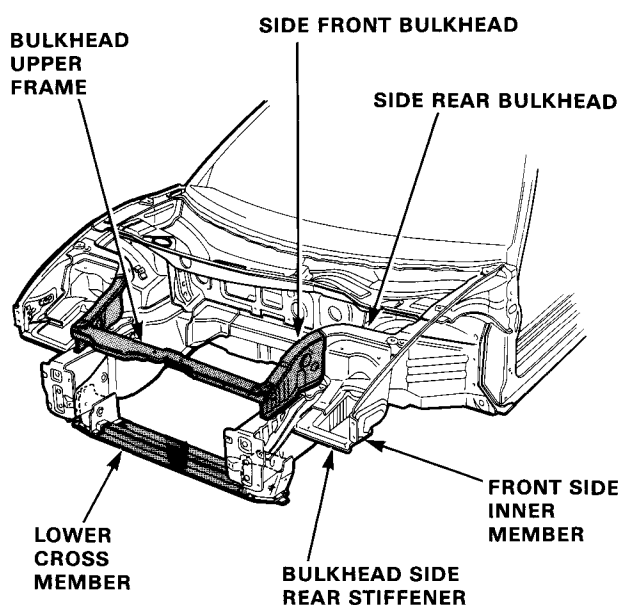
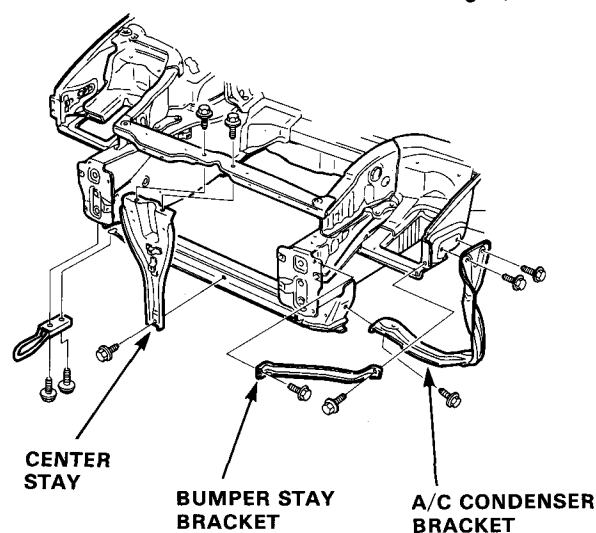
Front Bulkhead

Replacement

1. Remove the related parts.
 - Front bumper
 - Hood
 - Right and left headlights
 - Right and left front fenders
 - Radiator
 - Hood latch
2. Remove the bulkhead center stay, condenser and bumper stay brackets.

☆: CORROSION RESISTANT BOLT

Mounting Bolts Torque:
 ☆ 6 x 1.0 mm 13 N·m (1.3 kg-m, 9.4 lb-ft)



3. Pull out and straighten the damaged area.
 - Check the damage to the front wheelhouse and front side frame before removing the front bulkhead. Use the frame straightener to roughly pull out and repair the damaged bulkhead before removing the bulkhead.
 - When the buckled section is large, heat up the damaged section with an acetylene welder and pull it out.
 - The aluminum alloy does not change much in color. Use the thermo paint which color changes at 230°F (110°C) to check for the heating limit. Pull out the damaged section when the color of the paint changes (see page 2-31).

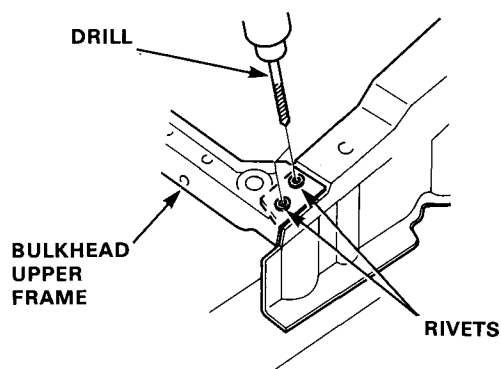
NOTE: Check the fit of the door, taking care not to pull the damaged area out more than necessary.

- Use the Honda underbody clamps and attach the car to the frame straightener at the clamping points securely. Before fixing with the corrector, be sure to set a piece of aluminum plate at each clamp point to protect the car.
- After pulling, check the damper housing and side frame position using body dimensional drawing (see section 6).

4. Keep the body, level.
 - Jack up the body, and place safety stands at the four designated places of the side sills.

NOTE: Refer to the NSX Service Manual for safety stand location points.

5. Drill the rivets of the bulkhead upper frame with a 5 mm (3/16") drill, then remove the bulkhead upper frame.

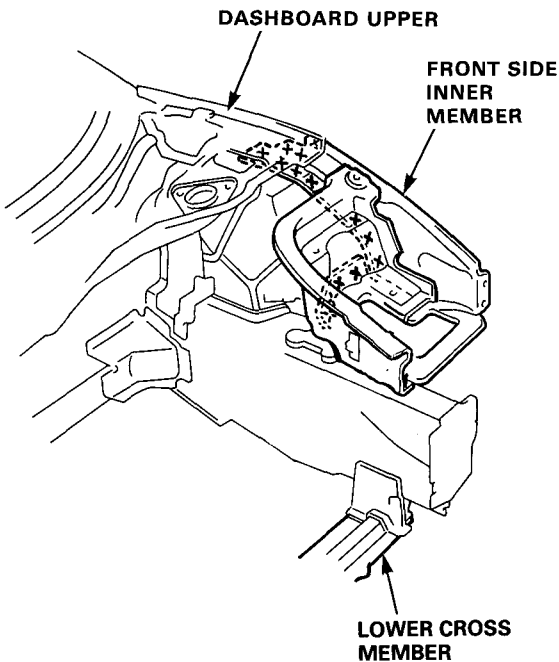


6. Remove the side front bulkhead, front side inner member and lower cross member.

- Strike a center punch around the spot weld imprints.
- Drill the spot welds of the side bulkhead using a 10 mm (3/8") spot cutter.

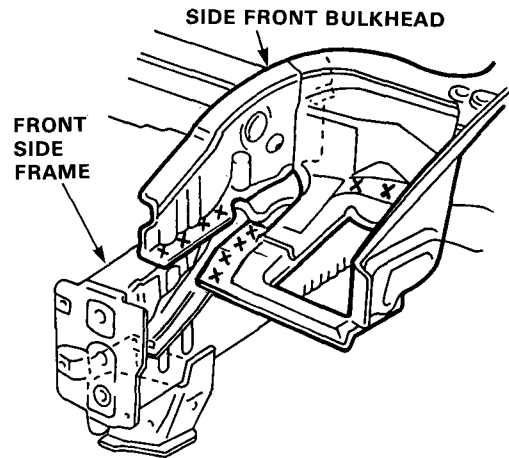
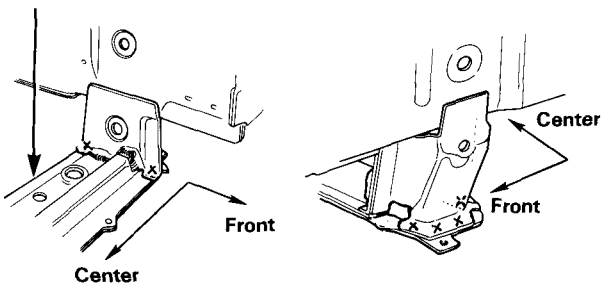
NOTE: When drilling holes be careful not to drill down to the wheelhouse and front side frame themselves.

- Cut off the side bulkhead with an air chisel, leaving the welding flanges intact.

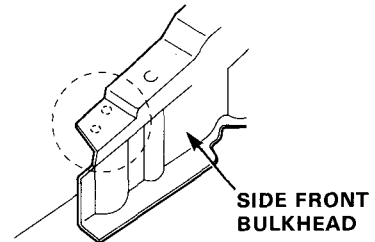


- Grind the fillet welds of the lower cross member-and-side frame joint using a rotary cutter.

LOWER CROSS MEMBER



- When reusing the side front bulkhead, fill drilled holes by MIG welding.
- Level the weld beads with a belt sander.

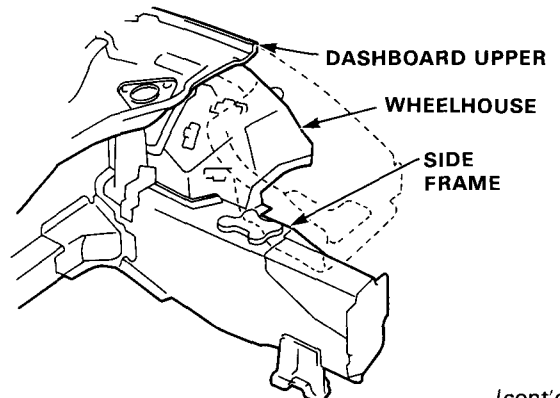


- Level and finish the burrs from the pried off spot welds with a disc sander.

⚠ WARNING To prevent eye injury, wear goggles or safety glass whenever sanding, cutting or grinding.

7. Mold the related parts.
 - Use a hammer and dolly to mold the damaged areas of the front wheelhouse and side frame.
 - Even out the welding flanges with a hammer and dolly.

NOTE: Check the reshaped parts for cracks (see page 2-29).



(cont'd)

Front Bulkhead

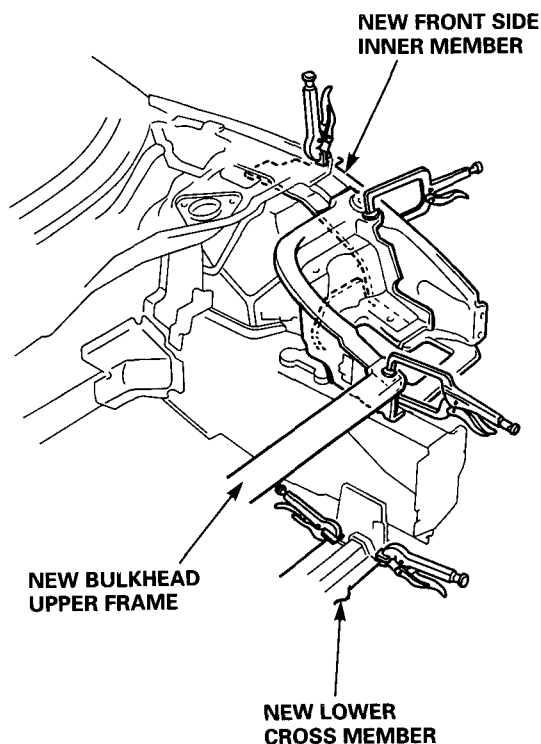
Replacement

8. Set the new side front bulkhead, lower cross member and bulkhead upper frame.

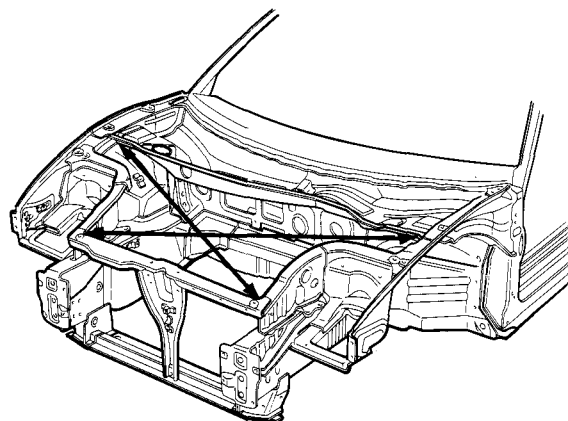
- Drill the 8–10 mm (5/16"–3/8") plug weld holes in the welding flange of the new side bulkhead.
- Grind both sides of the welding section of the bulkhead with a sander to remove the undercoat from it. Grind and expose the aluminum alloy base.
- Before setting the bulkhead, clean the welding section with a shop towel soaked with wax and grease remover.
- Remove the paint film with a disc sander, etc.

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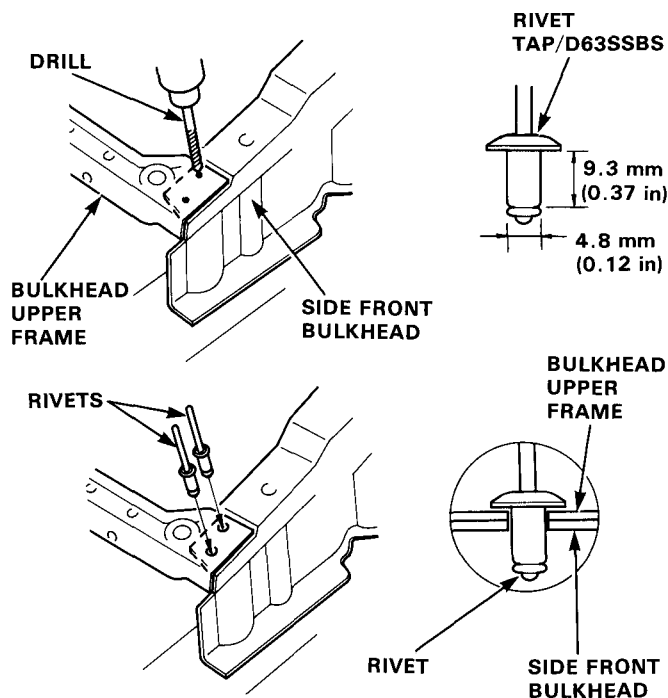
- Clean the aluminum alloy base with a stainless steel wire brush just before welding.
- Use the grind stone, paper, and wire brush or aluminum plate only.
- Clamp both the right and left sides with the vise-grips and pliers as shown.



9. Check the bulkhead position using the body dimensional drawings (see [section 6](#)). Measure the front compartment diagonally with a tracking gauge or convex tool as shown to check it for twisting or bending.



10. Drill 5 mm (3/16") holes through the bulkhead upper frame and side front bulkhead.



- Remove the bulkhead upper frame and sand the drill holes at bottom surface of it.
- Install the bulkhead upper frame.
- Make sure the bulkhead upper frame and side front bulkhead are contacted securely.
- Set the rivets.

11. For temporary welding, plug weld the clamped sections.

⚠ WARNING To prevent eye injury and burns when welding, wear an approved welding helmet, gloves and safety shoes.

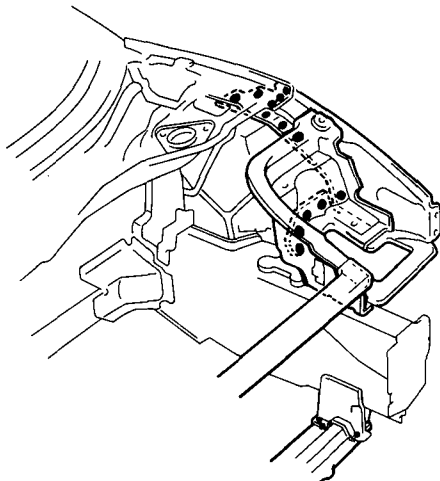
NOTE: Make sure that the right and left bulkheads are in line with each other.

12. Temporarily assemble the hood, headlight and front fender, then check the clearances and level differences.

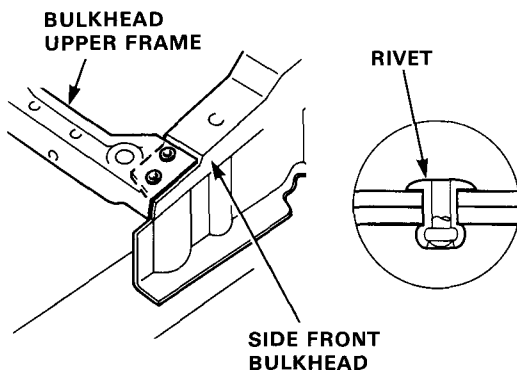
13. Perform the main welding.

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- Perform a trial welding first following the welder manufacturer's instructions.
- Before welding, remove the oxide film from the welding face using a stainless steel wire brush.



- Fasten the bulkhead upper frame and side front bulkhead with a rivets.



- Check the welding section for cracks (see page 2-29).

14. Finish the welds.

- Roughly grind the welds with a disc grinder. Be sure to leave the finishing allowance this time.
- Finish grind the finishing allowance with a disc sander until it is smooth.

⚠ WARNING To prevent eye injury, wear goggles or safety glasses whenever sanding or grinding.

- Smooth the flanged section of the front bulkhead with a hammer and dolly, and attach it closely to the front wheelhouse and front side frame.
- Take care not to grind the aluminum alloy base while roughly grinding the welds.
- Take care not to grind excessively.
- Do not press on the sanding tools excessively. If the disc face is clogged with the aluminum alloy particles, replace with a new disc.

15. Attach the front fender.

16. Lower the body.

NOTE: Tighten the wheel nuts to the specified torque.
Torque: 110 N m (11 kg-m, 80 lb-ft)

17. Apply the paint.

See Paint Repair section.

⚠ WARNING

- Ventilate when spraying paint. Most paint contains substances that are harmful if inhaled or swallowed. Read the paint label before opening paint container.
- Avoid contact with skin. Wear an approved respirator, gloves, eye protection and appropriate clothing when painting.
- Paint is flammable. Store in a safe place, and keep it away from sparks, flames or cigarettes.

18. Install the related parts.

19. Inspect, check, and make adjustments.

- Adjust the headlight aim. Check that the electrical components light up and operate properly.
- Replenish radiator liquids and inspect for leaks.