

# Replacement

## Installation

1. Straighten any damaged parts.

### ⚠ WARNING

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

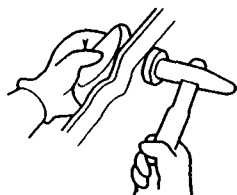
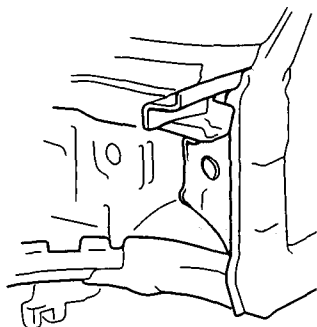
- Fill any holes by MIG welding and even out with a hammer and dolly.

### ⚠ WARNING

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

- Level and finish the burns on the welding flanges with a disc sander or belt sander.

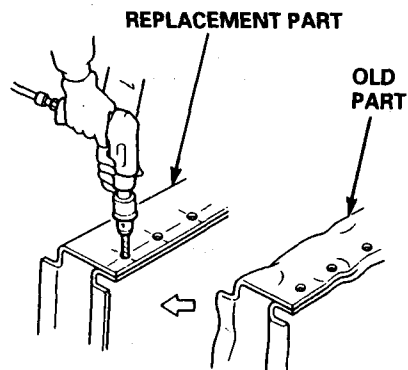
NOTE: Do not use the same sanding tools for both aluminum alloy sheets and steel plates.



NOTE: Check the reshaped parts for cracks (see page 2-39).

2. Prepare to install replacement parts.
  - 1) Drill the 8 ~ 10 mm (0.3 ~ 0.4 in.) holes for plug welding in the welding flange of the replacement parts.

  - To locate the area you need to drill holes, refer to old parts or to the Mass Production Body welding Diagram (see section 3).



- 2) Sand and degrease the welded surfaces.

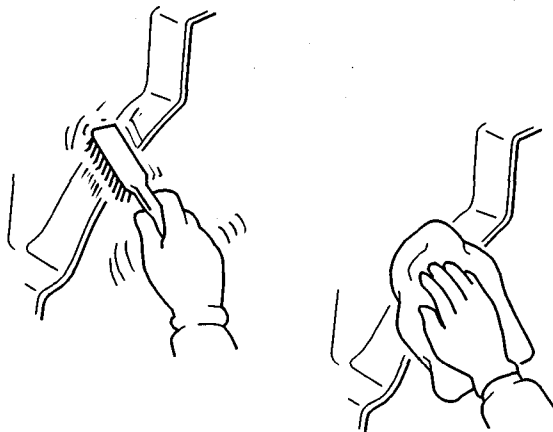
### ⚠ WARNING

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

- Remove the undercoat from both sides of the welding section and expose the aluminum alloy base using a disc sander.
- Remove the paint film from welding section of the body.

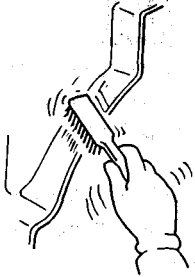
NOTE: Do not use the same sanding tools for both aluminum alloy sheets and steel plates.

- Clean any oil and any dirt from the welding surface with wax and grease remover.



3. Set the repair parts.

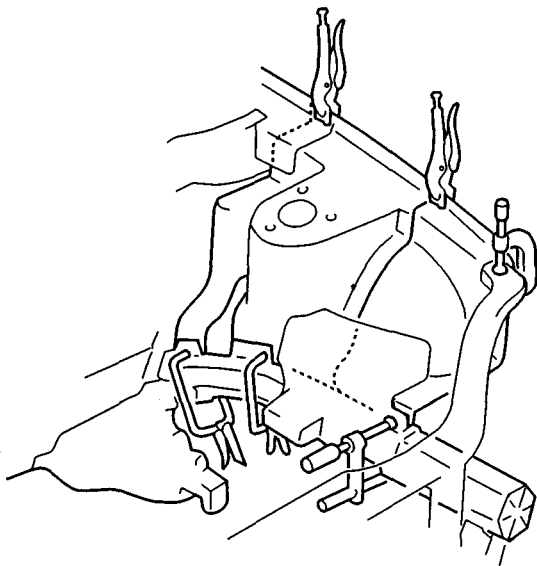
- Before setting the repair part, remove the oxide film from the welding surfaces of the repair parts and body using a stainless steel wire brush.



- Clamp the new part and check its position using the body dimensional drawings (see [section 4](#)).
- Tack weld the clamped section.

**⚠ WARNING**

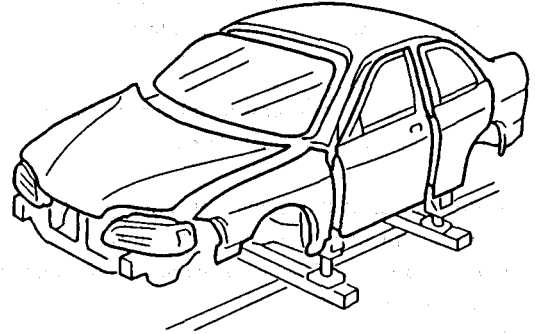
To prevent eye injury and burns when welding, wear an approved welding helmet, gloves and safety shoes.



4. Check the alignment of the exterior body parts.

- Temporary install the exterior body parts, windshield and rear window glass, and check for differences in level and clearances.

NOTE: Check the fit of the front fender, door and the rear fender, and make sure the body lines flow smoothly.



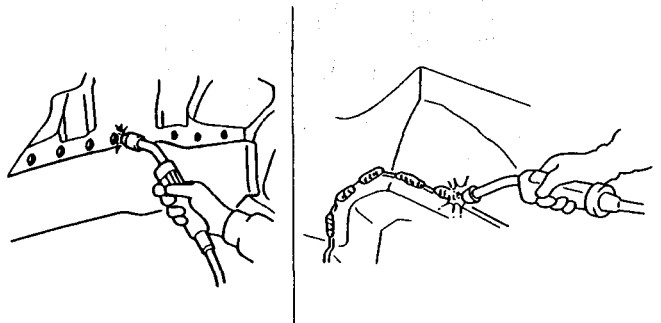
5. Main welding the repair parts.

- Use proper welding methods (see pages [2-23](#), [2-35](#)).

**⚠ WARNING**

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

- Weld as much as possible with the jig still mounted.
- Before main welding, perform the trial welding following the welder manufacturer's instructions (see page [2-15](#)).
- Before welding, clean the welding surfaces with a stainless steel wire brush, and clean off any oil or dirt with wax and grease remover.



NOTE: Check the welding section for cracks (see page [2-39](#)).

(cont'd)

# Replacement

## Installation (cont'd)

6. Finishing the welded areas (see page 2-38).

### **⚠ WARNING**

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

NOTE: Do not use the same sanding tools for both aluminum alloy sheets and steel plates.

- Roughly grind the welds with a disc grinder. Be sure to leave a finishing allowance.
- Finish grind the finishing allowance with a disc sander until it is smooth.
- Take care not to grind the aluminum alloy base while grinding the welds.
- Do not press on the sanding tools excessively. If the disc face is clogged with aluminum alloy particles, replace it with a new disc.
- Smooth out welded door and hatch areas, and window opening flanges with a hammer and dolly.
- Fill the deformed area and smooth out the welded areas with body filler.

