

2022 CHEVROLET CORVETTE SERVICE MANUAL

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1. **Body Repair**
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Body Side Inner Panel Reinforcement Replacement (Convertible)

Materials

- Structural Adhesive Aluminum Panel Bonding
- Flow Drill Screws (M6) Fastener Specifications if required.
- RPR Markers Special Tools if required.

Removal Procedure

1. [Click here for full size](#)
2. **Warning:**

Refer to Approved Equipment for Collision Repair Warning
3. **Warning:**

Refer to Collision Sectioning Warning
4. **Warning:**

Refer to Glass and Sheet Metal Handling Warning
5. **Note:**

The body side inner panel reinforcement is 5000 series stamped aluminum sheet. Aluminum
6. **Note:**

Left shown, right similar.
7. **Note:**

Three dimensional measuring equipment required for installation.
8. Disable the SIR system. SIR Disabling and Enabling
9. Remove all related panels and components.
10. Remove the sealers and anti-corrosion materials from the repair area as necessary. Anti-Corrosion Treatment and Repair
11. [Click here for full size](#)
12. Remove flow drill screws (1). [2X] Fastener Specifications
13. [Click here for full size](#)
14. **Note:**

Record the number, location and length of aluminum MIG welds for installation.
15. **Note:**

Do not damage or cut attaching panels and reinforcements.
16. Remove MIG welds (1) using a cut off wheel or equivalent tool. [3X]
17. [Click here for full size](#)
18. **Warning:**

When separating the aluminum panels during collision repair, be sure to adhere to the following precautions:

- Do not use an open flame
- Focus heat onto panel being replaced and do not exceed 200°C (392°F) for 3 consecutive minutes
- Use care not to damage adjacent panel while prying the panels apart

Failure to follow the precautions may lead to vehicle damage or personal injury.

19. Apply heat to release adhesive (1).

20. [Click here for full size](#)

21. Note:

Excessive prying force may damage surrounding structure.

22. Remove body side inner panel reinforcement (1) from vehicle.

23. Note:

Do not damage body structure when removing adhesive.

24. Remove remaining adhesive from body structure.

Installation Procedure

1. [Click here for full size](#)

2. Note:

Aluminum body RPR markers are used to mark clearance holes for flow drill screws.

3. Note:

If attaching to existing structure, use aluminum body RPR markers.

4. Install aluminum body RPR markers into existing flow drill screw holes (1) on vehicle. [2X] Special Tools

5. [Click here for full size](#)

6. Note:

Temporarily install replacement part.

7. Position body side inner panel reinforcement on vehicle using three-dimensional measuring equipment and clamp into place.

8. Using aluminum body RPR markers, locate and mark clearance holes (1) on body side inner panel reinforcement. [2X]

9. If attaching to new component with no existing flow drill screw holes, drill 5.4mm pilot holes (1) for service flow drill screws (M6) through both panels. [2X]

10. [Click here for full size](#)

11. Remove body side inner panel reinforcement (1) from vehicle.

12. [Click here for full size](#)

13. Drill 7 mm (9/32") clearance holes (1) on body side inner panel reinforcement at marked locations. [2X]

14. [Click here for full size](#)

15. Note:

Accurate and timely assembly methods must be used in order to meet proper bonding requirements.

16. Note:

Dry fit all parts with proper clamping devices prior to final assembly to ensure full understanding of the assembly process.

17. Note:

When using adhesive, ensure all necessary tools and materials are in place prior to final assembly.

18. Note:

Only remove E-coat where adhesive will be applied.

19. Note:

Ensure all bare metal is covered.

20. Clean and prepare mating surfaces on structure and replacement part according to adhesive manufacturer's recommendations. Aluminum Panel Bonding

21. Apply structural adhesive (1) to mating surfaces on structure and replacement part according to adhesive manufacturer's recommendations. Aluminum Panel Bonding

22. [Click here for full size](#)

23. Install body side inner panel reinforcement (1) on vehicle and clamp into place.

24. Note:

Ensure screw is fully seated with a minimum torque of 5N-m (4 lb ft) and not stripped.

25. Install flow drill screws (2). [2X]

26. [Click here for full size](#)

27. Note:

Duplicate the number, location and length of aluminum MIG welds as noted in removal.

28. Install MIG welds (1) using Pulse MIG welder. [3X] Aluminum

29. Remove excess adhesive.

30. Apply the sealers and anti-corrosion materials to the repair area as necessary. Anti-Corrosion Treatment and Repair

31. Paint the repaired area. Basecoat/Clearcoat Paint Systems

32. Install all related panels and components.

33. Enable the SIR System. SIR Disabling and Enabling