

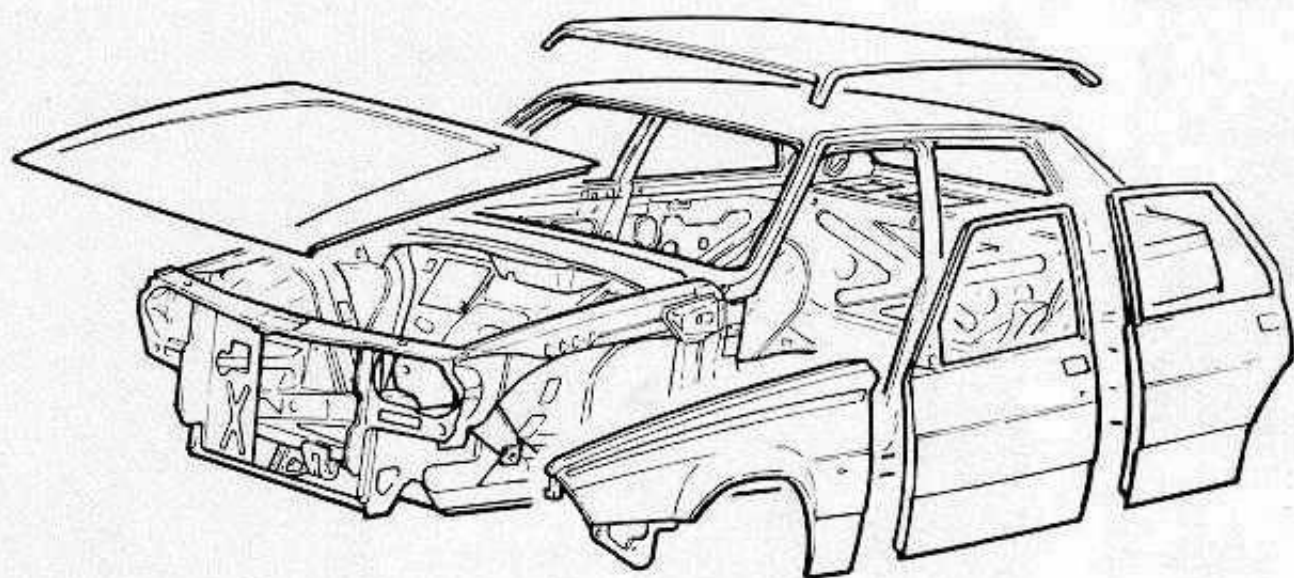
WORKSHOP MANUAL


V6
2.5

milano



body



DIREZIONE ASSISTENZA TECNICA *Alfa Romeo* 

FOREWORD

*This manual is supplementary to the Workshop Manual
PA384300000000.*



1987 model year (50 state version)

It contains instructions for repairing the body-sheet metal panels, and is to be used in the Alfa Romeo Service Organization Workshops.

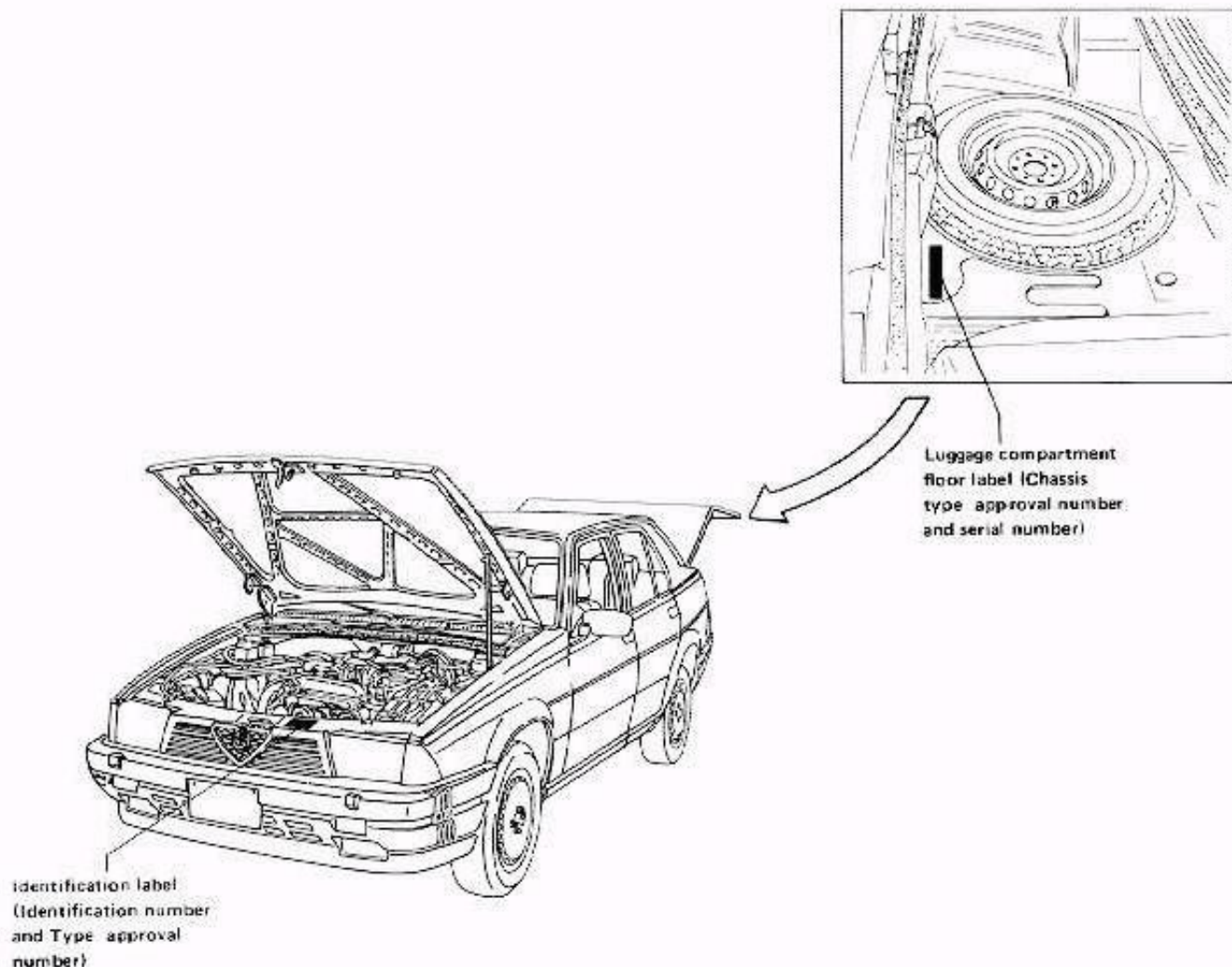
GROUP 49

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GENERAL INFORMATION

IDENTIFICATION DATA



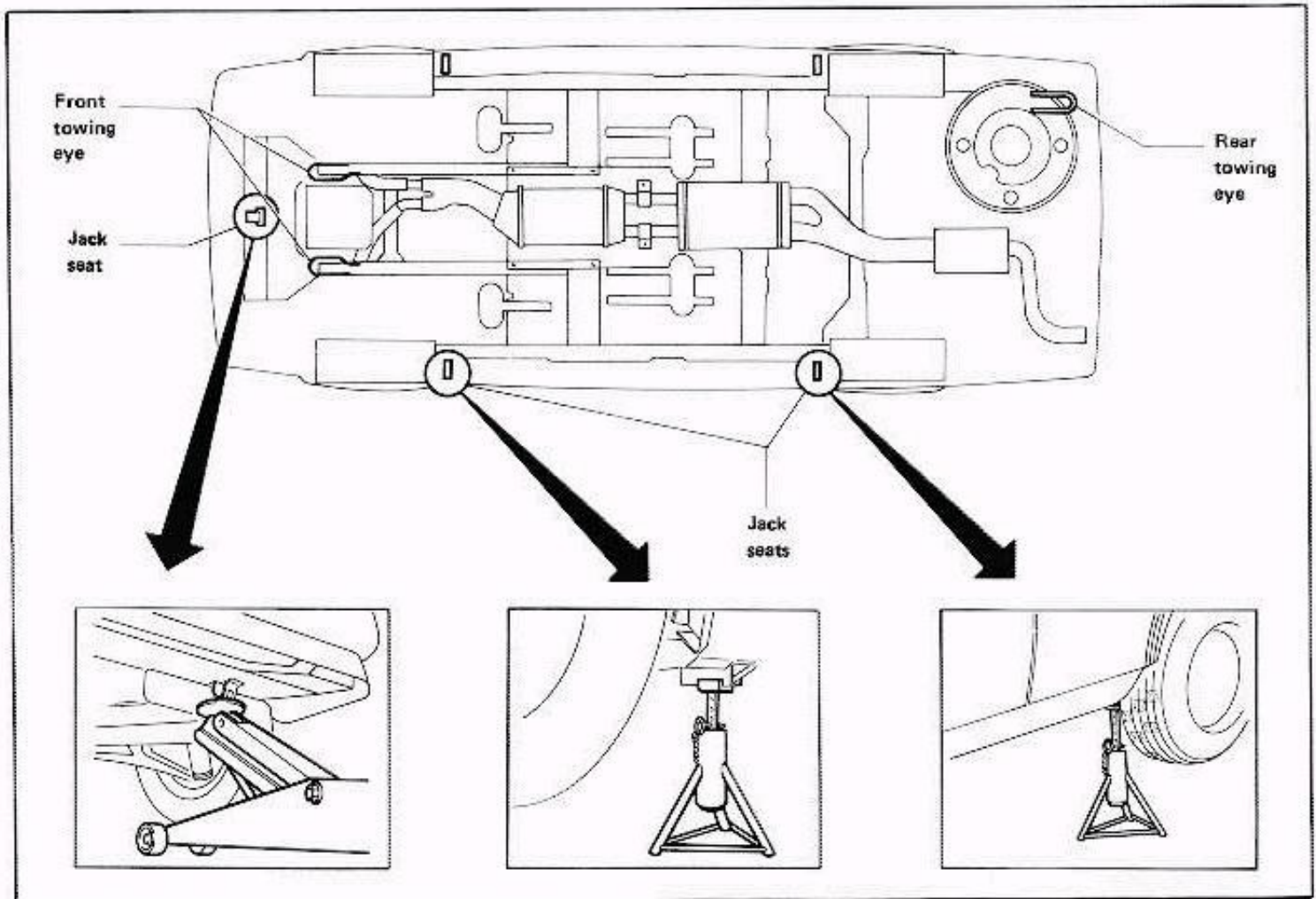
Identification and certification label

Refer to Group 00 - Service and Identification Data

Chassis No. (according to CEE/ISO standard specifications)

Refer to Group 00 - Service and Identification Data

LIFTING POINTS



Jack and safety stands

WARNING:

- a. After lifting the car by means of hydraulic jack, provide to support car weight by means of safety stands.
- b. Before lifting car rear (front) side place wheel chocks by positioning them at front (rear) wheels.

Securely position hydraulic jack and safety stands in the points identified in figure.

WHEEL ALIGNMENT

CAUTION:

The technicians assigned to the repair and replacement operations of sheet panels, shall always take into account, contents of the remaining part of the "Workshop Manual" in order always to maintain original quality and functioning conditions of car as a whole. As restoration of car correct alignment is of particular importance, in the following part are provided the data relevant to geometry of both front and rear suspensions. For any further information, refer to the specific Groups.

1. Front axle and suspension

Toe-out	mm (in)	$E - D = 1 \pm 1$ 10.0394 ± 0.0394
Toe-out angle		$\alpha = 9^\circ$
Rim diameter	mm (in)	$\emptyset = 340$ (13.38)
Camber angle		$\beta = -30^\circ \pm 30'$
Caster angle		$\gamma = 3^\circ 30' \pm 30'$
Steering lock		$\delta = 30^\circ$

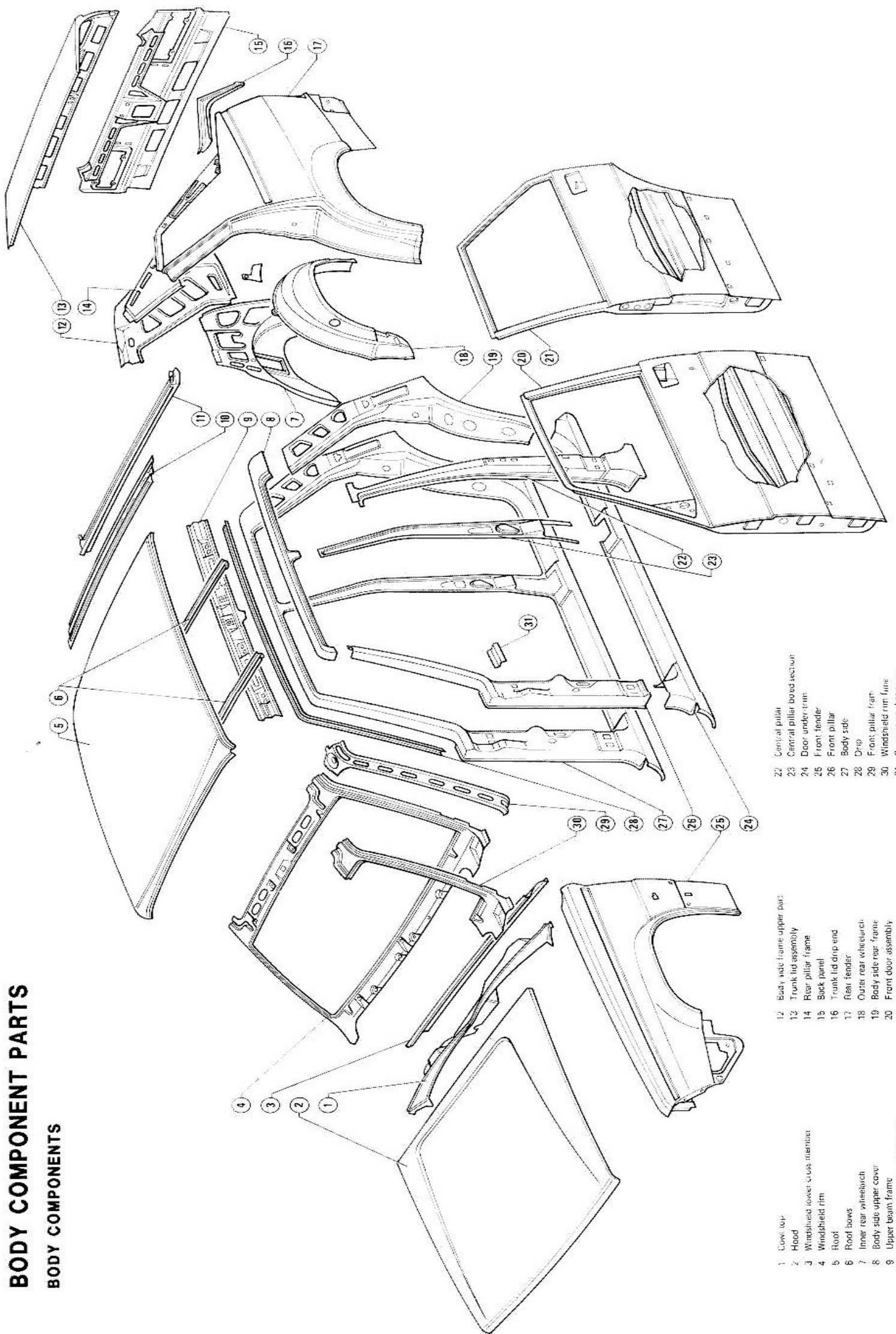
2. Rear axle and suspension

Toe-in angle		$\alpha = 0^\circ \pm 10'$
Camber angle		$\beta = 0^\circ \pm 30'$

N.B. Wheel alignment is measured with car under nominal height (refer to Group 00 - Mechanical Components and Body Maintenance - Wheel Alignment).

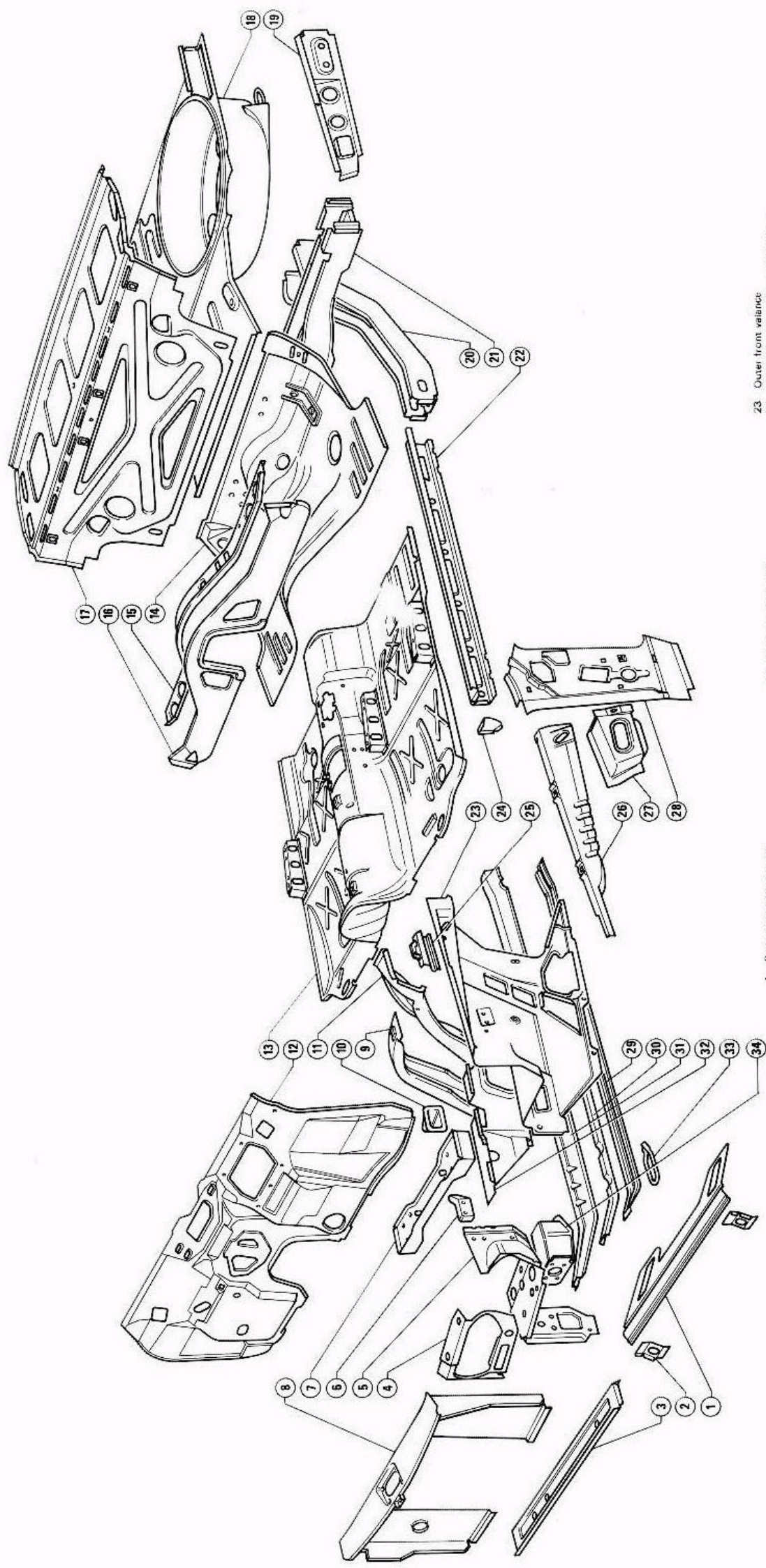
BODY COMPONENT PARTS

BODY COMPONENTS



- 1. Cove top
- 2. Hood
- 3. Windshield lower cross member
- 4. Windshield trim
- 5. Roof
- 6. Roof bows
- 7. Inner rear wheelarch
- 8. Body side upper cover
- 9. Upper beam frame
- 10. Rear window upper cross member
- 11. Front pillar
- 12. Body side frame upper part
- 13. Trunk lid assembly
- 14. Rear pillar frame
- 15. Back panel
- 16. Trunk lid drip end
- 17. Rear fender
- 18. Outer rear wheelarch
- 19. Body side rear frame
- 20. Front door assembly
- 21. Rear door assembly
- 22. Central pillar
- 23. Central pillar boxed section
- 24. Door under-trim
- 25. Front fender
- 26. Front pillar
- 27. Body side
- 28. Drip
- 29. Front pillar frame
- 30. Windshield rim frame
- 31. Connection sheet panel

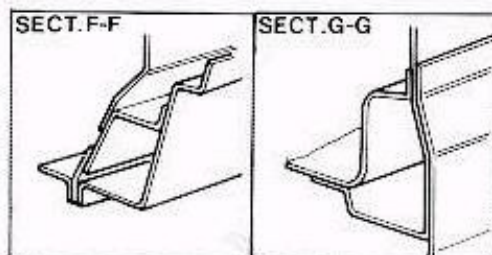
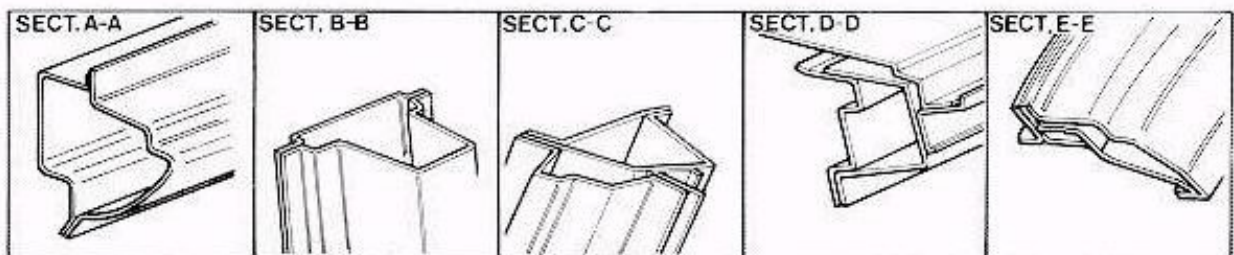
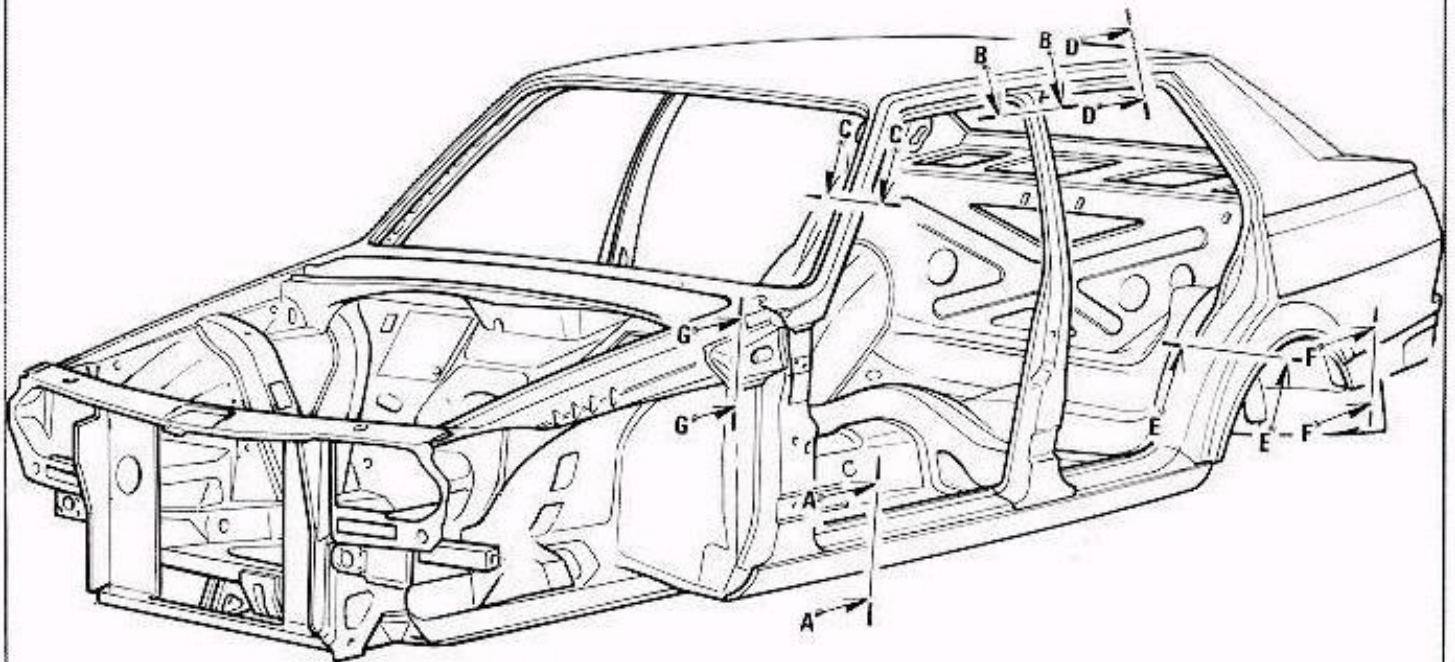
UNDERBODY COMPONENTS



- | | |
|----|---|
| 1 | Connection sheet panel |
| 2 | Connection angular panel |
| 3 | Radiator support cross member |
| 4 | Headlight support plate |
| 5 | Valance extension |
| 6 | Reinforcement |
| 7 | Rack support cross member assembly |
| 8 | Front cross member assembly |
| 9 | Central pillar |
| 10 | Strut anchor bracket |
| 11 | Lower reinforcement between dashboard and valance |
| 12 | Dashboard sidewall |
| 13 | Central floor |
| 14 | Rear floor |
| 15 | Rear cross member |
| 16 | Under-seat front cross member |
| 17 | Bulkhead behind the seat back |
| 18 | Luggage compartment floor |
| 19 | Bumper connection reinforcement beam |
| 20 | Rear side member extension assembly |
| 21 | Cross member connecting bars |
| 22 | Inner side member |
| 23 | Outer front valance |
| 24 | Body side lower side member frame |
| 25 | Reaction plate unit |
| 26 | Outer valance reinforcement |
| 27 | Bracket connecting body side to beam |
| 28 | Dashboard sidewall |
| 29 | Central beam cover |
| 30 | Lower lever reinforcement |
| 31 | Central beam |
| 32 | Inner front valance |
| 33 | Tow hook |
| 34 | Bumper attachment plate |

BODY CONSTRUCTION

BOXED PART SECTIONS



BODY SEALING

DESCRIPTION

The following figures, show the body areas which are sealed by Manufacturer.

The sealings applied to these areas, must be smooth and free from scratches or gaps.

Take care not to apply too much sealing and not to allow other unaffected parts to come in contact with the sealing.

Body components sealing

Paint seal, after priming or painting, and then sleek by means of a brush along all sheet joints in order to remove

possible sealing faults

ICIR: Paraflex Alpha 3 M

8531/E

8536/E

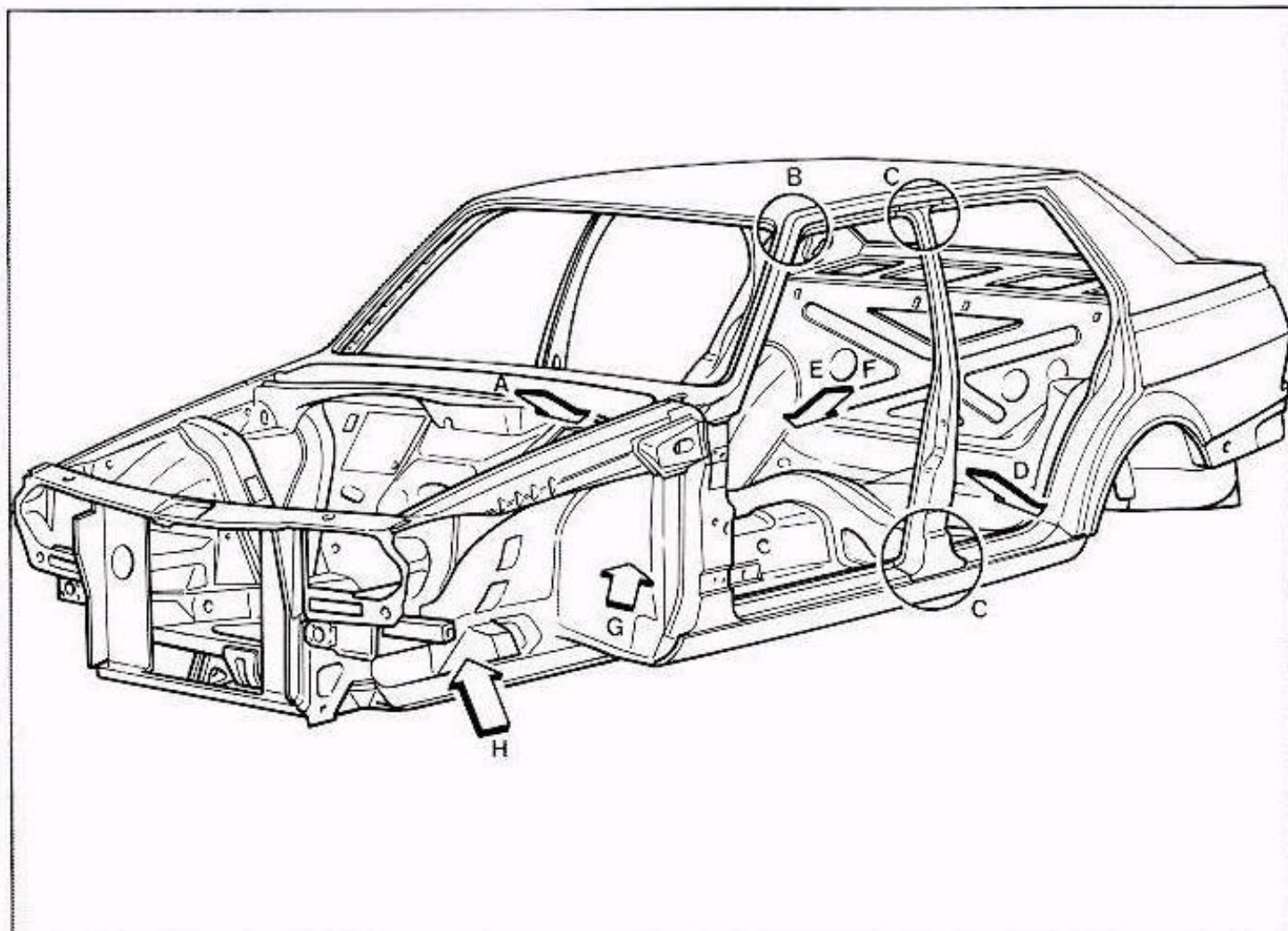
Alternative.

Std. no. 3522-00014

Sealant for bolted joints

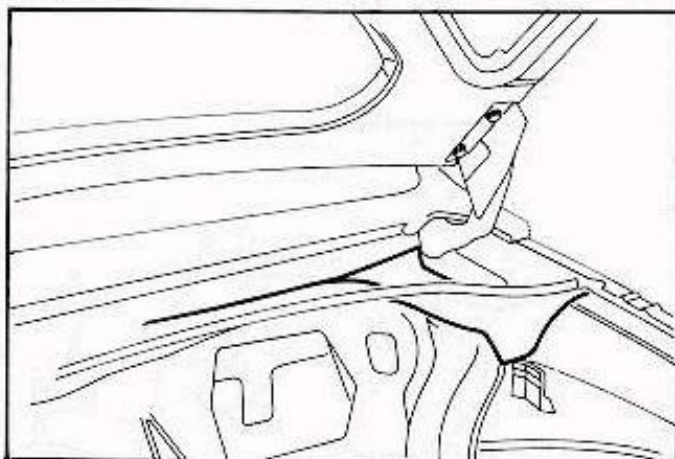
Sealant for joints between panels assembled by bolting.

3M - Autosealer 8573E - Std. no. 3522-00045.

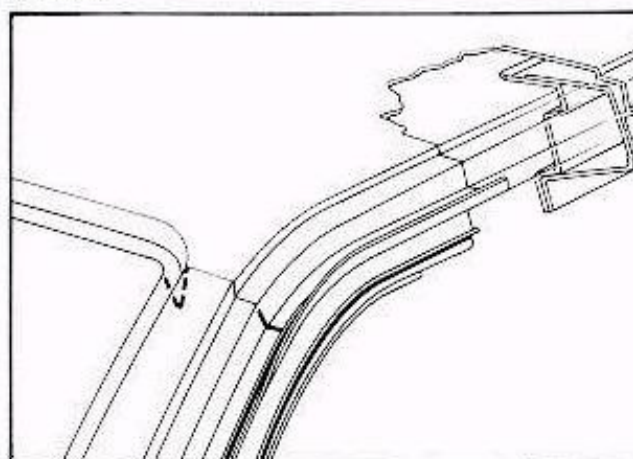


BODY - SHEET METAL PANELS

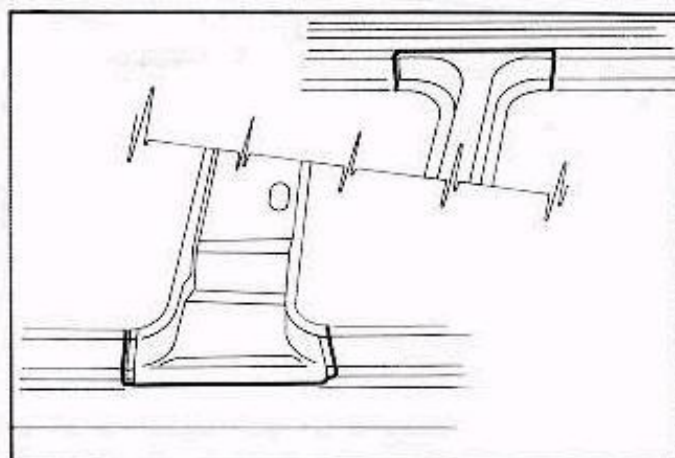
View from A



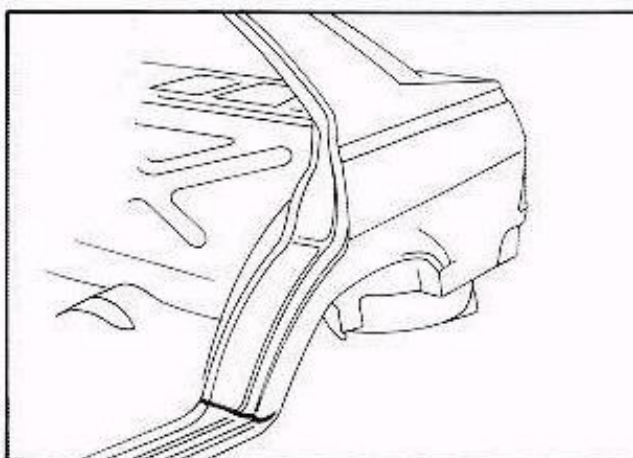
Detail B



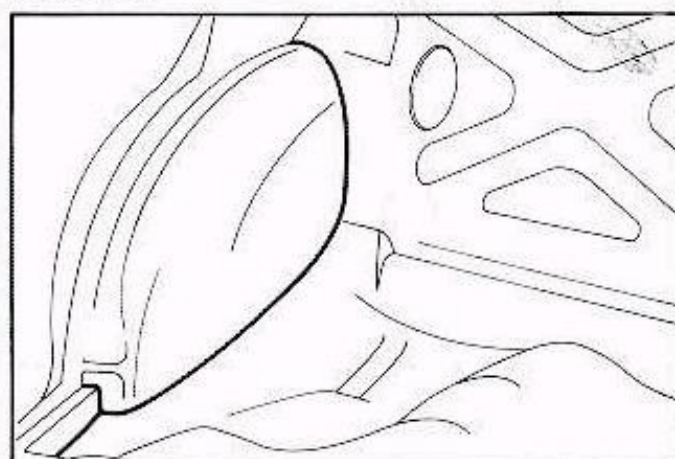
Details C



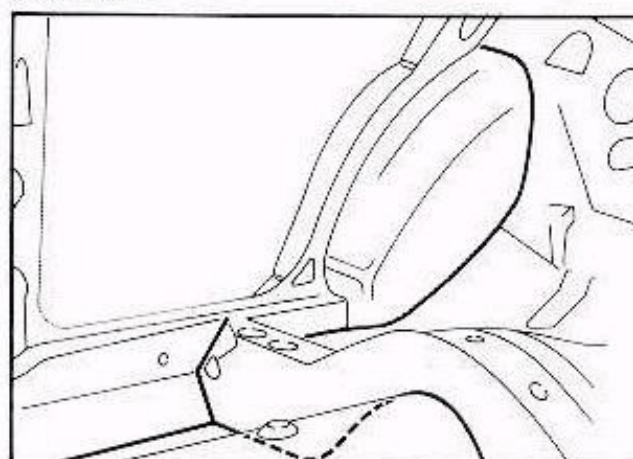
View from D



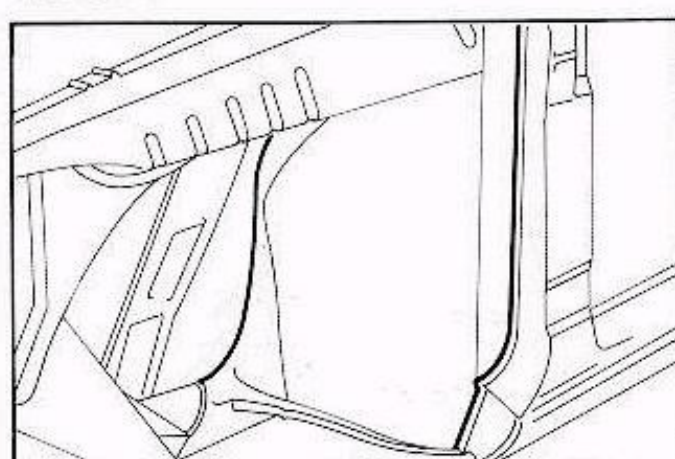
View from E



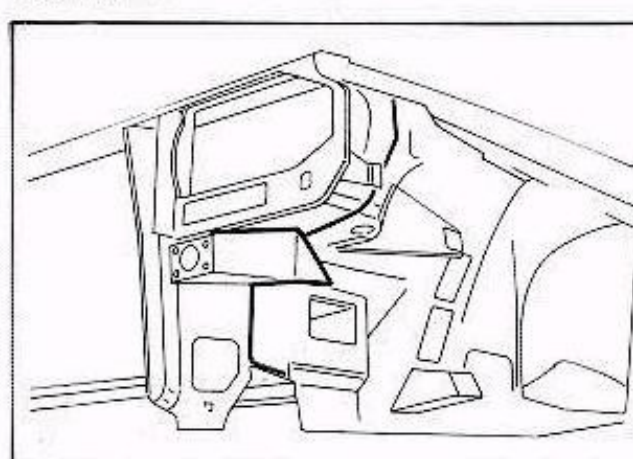
View from F



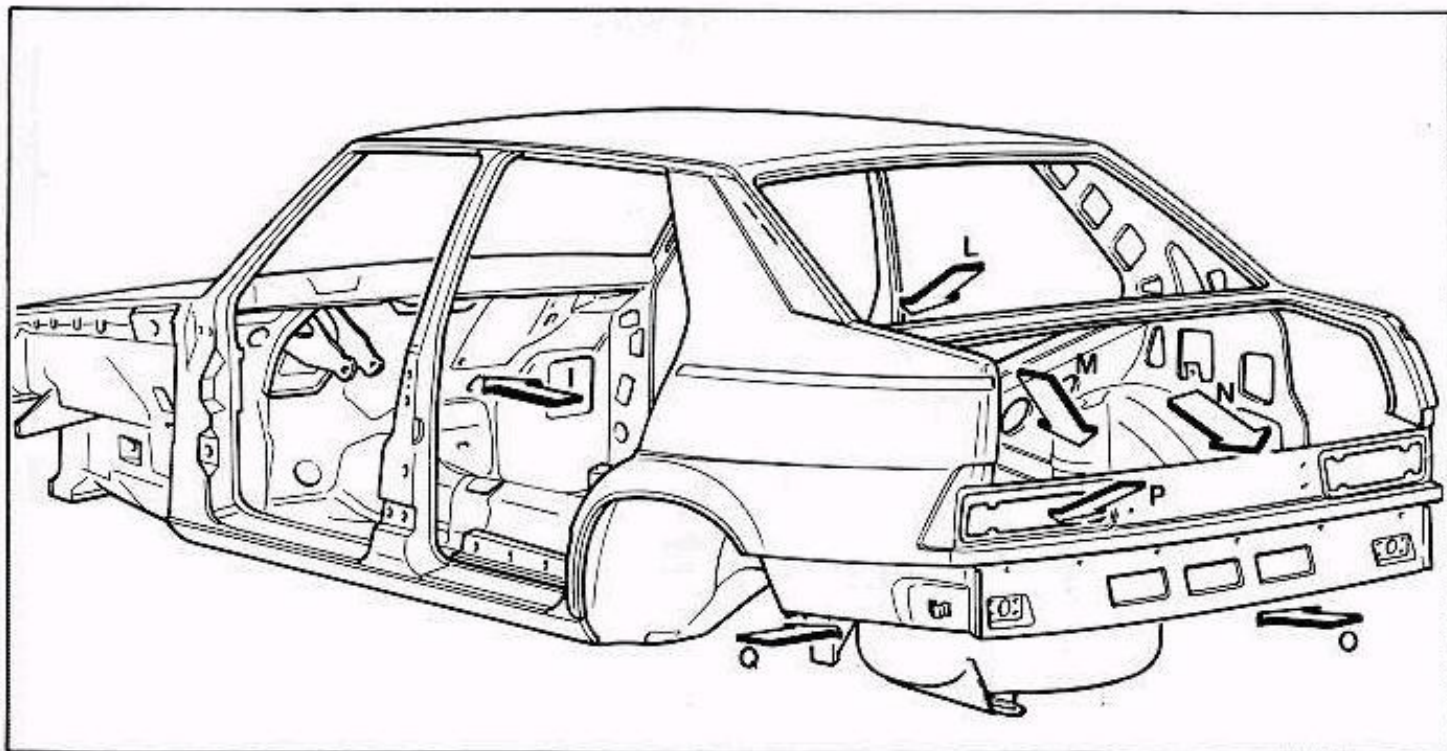
View from G



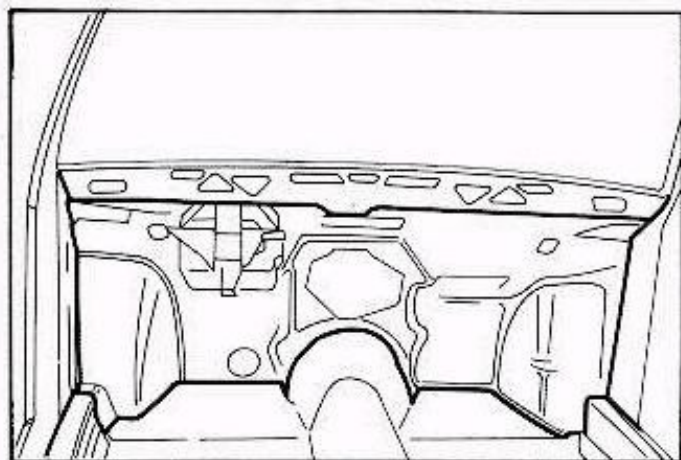
View from H



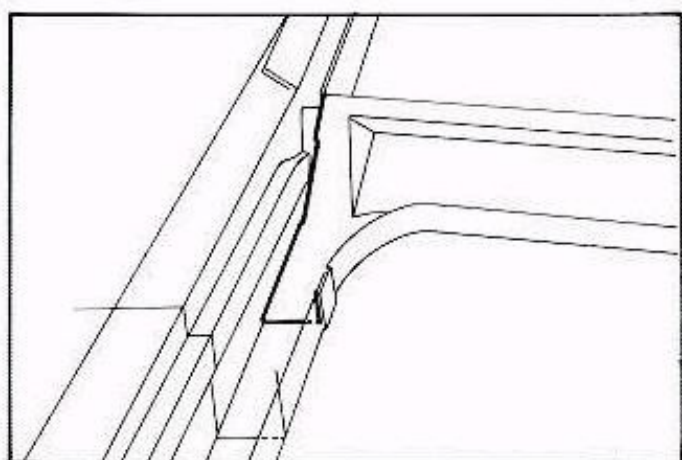
BODY - SHEET METAL PANELS



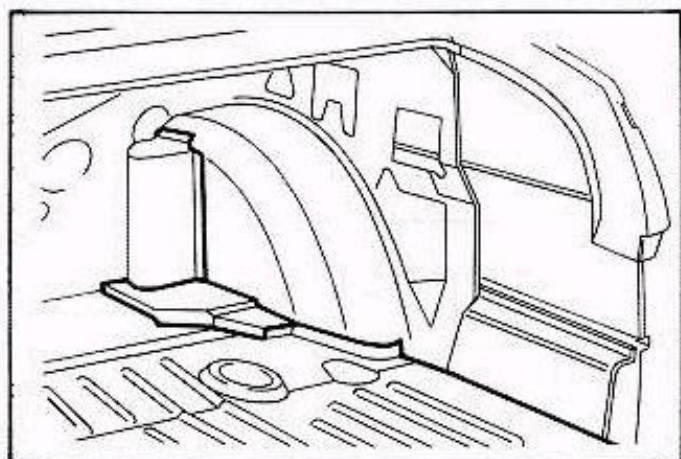
View from I



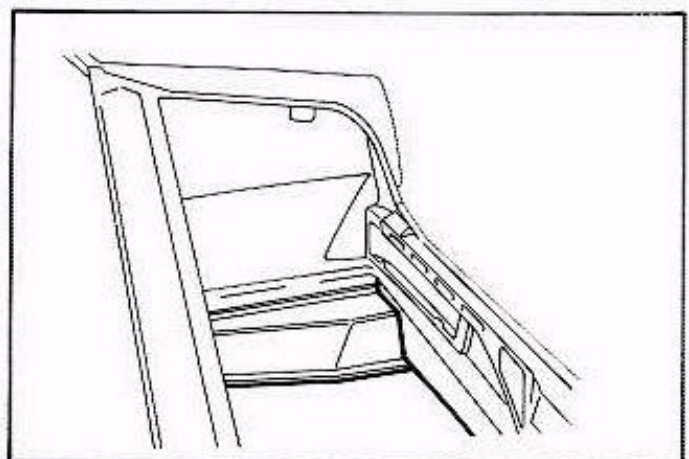
View from L



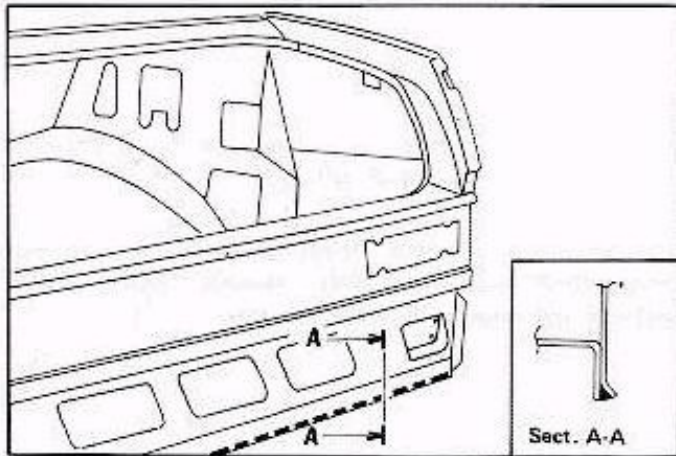
View from M



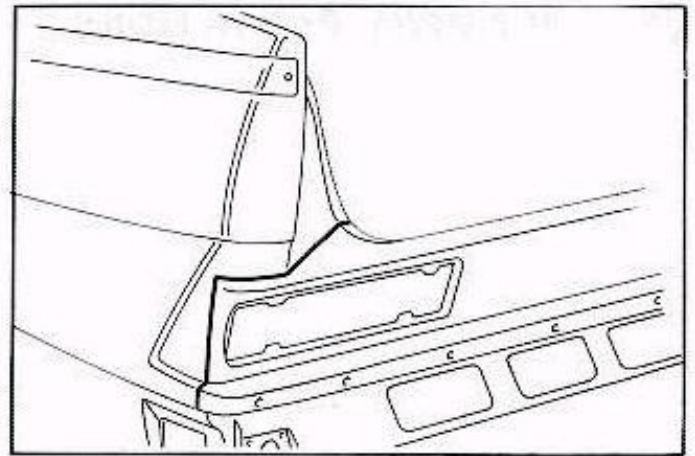
View from N



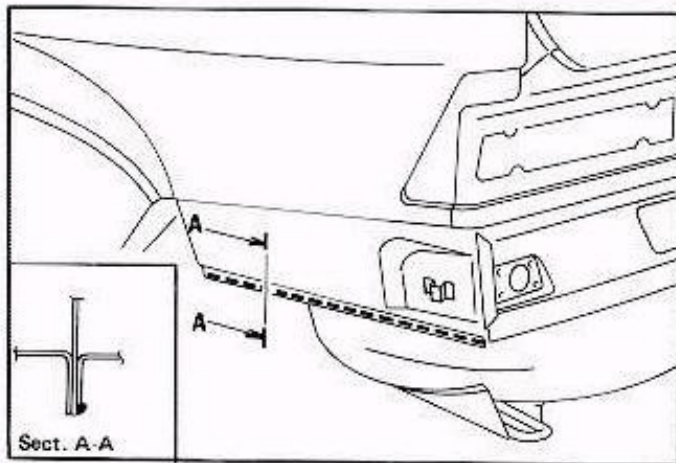
View from O



View from P



View from Q



BODY ALIGNMENT

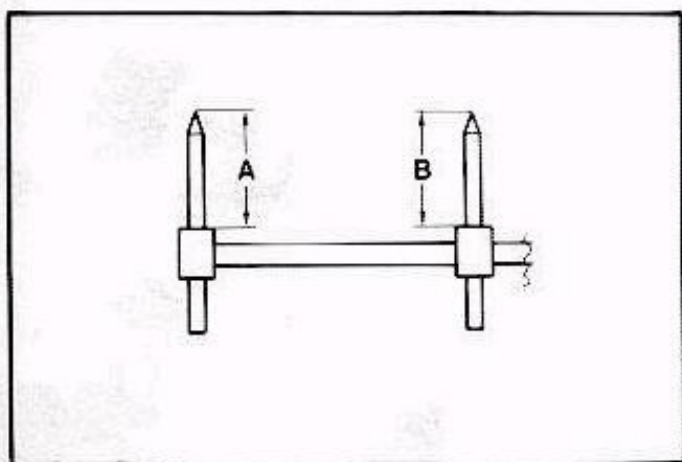
MEASUREMENT OPERATIONS

Method of measurement operation

- When a tram tracking gauge is used, adjust pointers (A) and (B) to equal lengths as shown in the following figure.
Check pointers and gauge itself in order to make sure that no clearance is present.

- When a measuring tape is used, verify there is no elongation, twisting or bending.

If, during measurement operations, tape interferes with one or more parts of car body, accurate measurement of distance and length will not be possible.



BODY — SHEET METAL PANELS

		L	L'	T	T'	T''
Front suspension lower arm attachments	1	520 ± 2 (20.47 ± 0.08)		35.5 (1.40)	187 (6.57)	
Front suspension upper arm attachments	2	97 ± 1 (3.82 ± 0.04)		51 ± 0.5 (2.01 ± 0.02)		
Caster control link attachments	3	7 ± 2 (0.28 ± 0.08)		334.5 ± 2 (13.17 ± 0.08)		
Steering box attachments	4	180 (1) (7.81) (1) 135 (2) (3) (5.31) (2) (3)	135 (1) (5.31) (1) 180 (2) (7.81) (2)	160 (6.30)	80 (3.15)	74 (2.91)
Front engine support	5	396.5 ± 0.1 - 2 (15.61 ± 0.08)		27.5 ± 1 (1.08 ± 0.04)	22 ± 0.5 (0.87 ± 0.02)	
Shock absorbers upper connection	6	443.5 (17.46)		8 (0.31)		
Anti-roll bar attachments	7	680 (26.77)			70 ± 0.15 (2.76 ± 0.006)	
Engine rear support	8	72 (2.83)	66 (2.60)	588.5 ± 2 (22.93 ± 0.08)		
Torsion bar brace attachment	9	592 ± 2 (23.31 ± 0.08)		1,084 ± 2 (42.7 ± 0.08)		
Axle support cross member attachment	10	331 ± 1 (13.03 ± 0.04)	318 ± 1 (12.54 ± 0.04)	1,917.5 ± 1 + 3 (75.49 ± 0.04) + 0.12	55 (2.17)	
Rear gearbox support	11	59 (2.32)		715 ± 2 (28.15 ± 0.08)		
Watt links attachments	12	514 ± 1.5 (20.24 ± 0.06)		115 (4.53)	110 (4.33)	
Steering column support	13			222.5 ± 1 (8.76 ± 0.04)	408.5 ± 2 (16.08 ± 0.08)	
Rear shock absorbers support	14	452 ± 2 (17.79 ± 0.08)		2,461 (96.89)		
Front bumper attachment	15			557.5 ± 2 (21.95 ± 0.08)	123 (4.84)	
Rear bumper attachment	16	1,377 (54.21)		40 (1.57)	70 (2.76)	

- (1) Value for LH drive vehicles
 (2) Value for RH drive vehicles
 (3) Value for vehicles equipped with power steering

SECT. X - X

