

## Battery

Job Nos.
54-8 to 54-10

The general remarks about the battery, the removal and installation procedures, and the battery servicing instructions given for Model 190 also apply to Models 180 to 220 SE.

Models 180 is equipped with a battery of an operating voltage of 6 volts and a capacity of 84 Ah.

On Models 180 D and 190 D the battery capacity is likewise 84 Ah.

## Removal and Installation of Instrument Cluster

Job No.
54-11

### I. Models 180, 180 a, 180 b, 180 D, 180 Db, 190 D, 190 Db, 220 a, and 219

On these models the removal and installation procedures for the instrument cluster are the same as on Model 190.

### II. Models 220 S and 220 SE

The removal and installation procedures are essentially the same as on Model 190, but before the instrument cluster is removed unscrew the pull-button for the trip recorder on the instrument panel, unscrew the retaining nut and the lock nut and pull the trip recorder cancelling cable out of the rubber grommet from the engine side.

### III. Model 190 SL

#### A. Removal and Installation of Speedometer or Revolution Counter

##### Removal:

1. Loosen the milled nut of the speedometer drive shaft behind the instrument panel by hand and pull the speedometer drive shaft out of the instrument.
2. Unscrew the two milled nuts above the fixing strap and remove the fixing strap from the instrument.

3. Take the instrument out of the instrument panel and disconnect the two connections for the instrument light.

##### Installation:

4. Installation is the reverse of the removal procedure.

#### B. Removal and Installation of Oil-Pressure Gage

##### Removal:

1. Remove the rotary light switch (see Job No. 82-15). Push the electric leads behind the instrument panel to one side to make the rear of the oil-pressure gage accessible.

2. Disconnect the oil-pressure gage lead at the instrument.
3. Unscrew the two milled nuts and remove the holding strap.

4. Pull the oil-pressure gage out of the instrument panel and disconnect the electric leads for the instrument light.

**Installation:**

5. Installation is the reverse of the removal procedure.

### **C. Removal and Installation of Fuel Gage**

**Removal:**

1. Unscrew the two milled nuts behind the fuel gage and remove the holding strap.
2. Pull the fuel gage out of the instrument panel and disconnect the electric leads.

**Installation:**

3. Installation is the reverse of the removal procedure.

**Note:** Align the instrument so that the dial figures are vertical.

### **D. Removal and Installation of Cooling Water Thermometer**

**Removal:**

1. Disconnect the capillary tube at the engine and push it inside the car through the cowl.
2. Unscrew the two milled nuts behind the cooling water thermometer and remove the holding strap.

3. Pull the cooling water thermometer out of the instrument panel and disconnect the electric lead for the instrument light.

**Installation:**

4. Installation is the reverse of the removal procedure.