

Component Procedures: Sunroof / Moonroof Motor

Table of Contents

1. Parts and Labor (itype_189)
2. Sunroof Motor - Repair Procedures (Article 44640)

Component Procedures: Sunroof / Moonroof Motor

Parts and Labor (itype_189)

Parts

Qualifier	Part #	Name	Price	Note
Sunroof	81631F2000	Motor	637.85	

Labor

Operation	Qualifier Path	Skill	Std Hrs	Wty Hrs
Remove & Replace	Sunroof > Motor, R&R	B	2.6	0.0

Sunroof Motor - Repair Procedures (Article 44640)

- Inspection
- Disconnect the negative (-) battery terminal.
- Remove the roof trim .
- Disconnect the sunroof motor (A) connector.



- Ground the terminals as below table, and check that the sunroof unit operates. When inspecting the sunroof motor operation, sunroof motor and roller blind motor always should be connected.
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NOTICE

- When inspecting the sunroof motor operation, sunroof motor and roller blind motor always should be connected.

Terminal Position	3	4	2	10
Manual close	⊕			⊖
Tilt up	⊕	⊖		
Manual open	⊕		⊖	

- Make these input tests at the connector. If any test indicates a problem, find and correct the cause, then recheck the system. If all the input tests prove OK, the sunroof motor must be faulty; replace it.

Terminal Test condition Test : Desired result

3 IG2 ON Check for voltage to ground : There should be battery voltage. 1 Under all conditions Check for continuity to ground : There should be continuity. 6 Under all conditions Check for voltage to ground : There should be battery voltage.

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6 Under all conditions Check for voltage to ground : There should be battery voltage.

- Resetting the Sunroof
- Turn the ignition key to the ON position and then close the sunroof completely.
- Release the sunroof control lever.
- Press and hold the CLOSE button for more than 10 seconds until the sunroof closed and it has moved slightly.
- Press and hold the CLOSE button once again within 5 seconds until the sunroof do as follows; Tilt → Slide Open → Slide Close Then release the lever.
- Tilt → Slide Open → Slide Close Then release the lever.
- Reset procedure of panorama system is finished.

Protecting Motor From Overheating

- The sunroof ECU detects the Run- time of motor
- Motor can be operated continuously for the 1st run-time (120 ± 10sec.).
- The continuous operation of motor stops after the 1st Run-time (120 ± 10sec.).
- Then Motor is not operated for the 1st Cool-time (18 ± 2sec.).
- Motor is operated for the 2nd Run-time (10 ± 2sec.) at the continued motor operation after 1st Cool-time (18 ± 2sec.)
- The continuous operation of motor stops operating after the 2nd Run-time (10 ± 2sec.)
- Motor is not operated for the 2nd Cool-time (18 ± 2sec.).
- Motor repeats the 2nd run-time and 2nd cool-time at the continued motor operation. In case that motor is not operated continuously, the run-time is increased. The Run-Time of motor is initialized to "0" if the battery or fuse is reconnected after being disconnected, discharged or blown. T1 : 120 ± 10 sec., T2 : 18 ± 2 sec., T3 : 10 ± 2 sec., T4 : 18 ± 2 sec.
- In case that motor is not operated continuously, the run-time is increased.
- The Run-Time of motor is initialized to "0" if the battery or fuse is reconnected after being disconnected, discharged or blown.

