■ FUNCTION

1. General

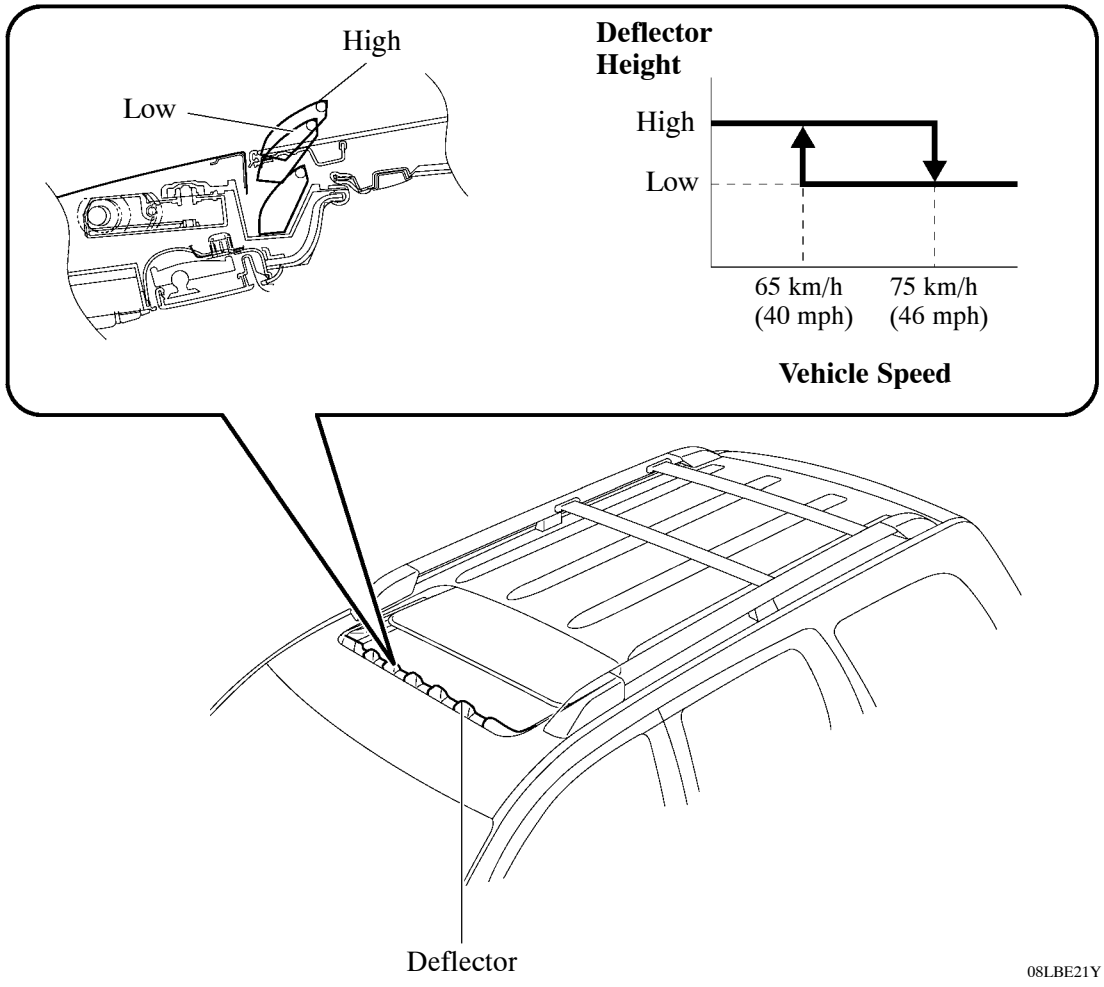
The sliding roof system has following functions:

Function	Outline
Manual Open-and-close	This function causes the sliding roof to open or close while the slide switch is being operated. The sliding roof stops as soon as the switch is released.
One Touch Auto Open-and-close	This function enables the sliding roof to be fully opened or closed using a brief touch of the slide switch.
Manual Tilt Up-and-down	This function causes the sliding roof to tilt up or tilt down while the tilt switch is being operated. The sliding roof stops as soon as the switch is released.
One Touch Auto Tilt Up-and-down	This function enables the sliding roof to be fully tilted up or down using a brief touch of the tilt switch.
Deflector Height Control [See Page BE-123]	When the sliding roof is fully open, this function controls the deflector height to 2 steps in accordance with the vehicle speed.
Jam Protection [See Page BE-124]	The “jam protection” function automatically stops the sliding roof and moves it open halfway or fully tilts it up if a foreign object gets jammed in the sliding roof during close or tilt down operation.
Key-off Operation	The “key-off operation” function makes it possible to operate the sliding roof for approximately 43 seconds after the ignition switch is turned to ACC or OFF, if either front door is not opened.
Key-linked Open-and-close	When the ignition key is not in the key cylinder, the driver’s door is locked, and the key in the driver’s door is turned and maintained in the lock direction for 1.5 seconds or more, the sliding roof ECU activates the sliding roof motor to close the sliding roof while the key is turned. Similarly, when the driver’s door is unlocked, turning and maintaining the driver’s door key in the unlock direction for 1.5 seconds or more will cause the sliding roof to be opened.
Sliding Roof Open Warning	When the ignition switch is turned from ON to OFF and the driver’s door is opened with the sliding roof open, the buzzer in the combination meter sounds once.
Customized Body Electronics	For details, see page BE-17.

2. Deflector Height Control Function

When the sliding roof is fully open, this function controls the deflector height to 2 steps in accordance with the vehicle speed, as described below.

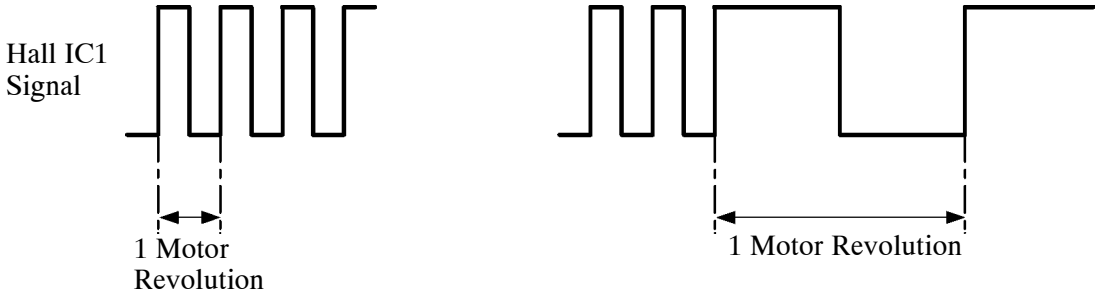
- At low vehicle speeds, the deflector is set to the high position to prevent wind throb.
- At high vehicle speeds, the deflector is set to the low position to reduce wind noise.



3. Jam Protection Function

To control the jam protection function, the sliding roof ECU monitors the amount of movement and judges jamming of the sliding roof based on the pulse signals from the Hall IC1, and the moving direction of the sliding roof from the phase difference between the pulses from Hall IC1 and Hall IC2.

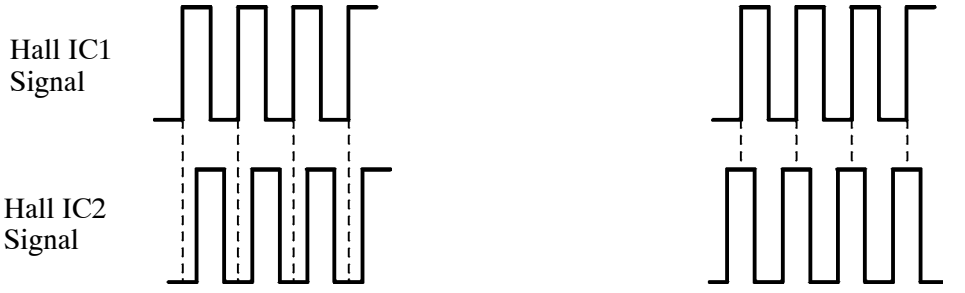
▶ Monitoring Amount of Movement Judgment of Jamming ◀



Normal **Jammed**

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▶ Judgment of Movement Direction ◀



OPEN/TILT UP **CLOSE/TILT DOWN**

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