

LIGHTING SYSTEM

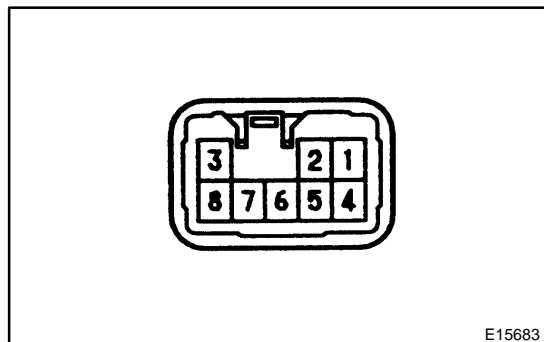
650BI-01

PRECAUTION

1. PRECAUTION OF HEADLIGHT BULB REPLACEMENT

- (a) If the adhered oil is left unremoved from the halogen lamp surface, the lamp service life is shortened as it becomes hot when it is turned on.
- (b) Since the internal pressure of a halogen lamp is high, dropping, hitting or damaging the bulb may cause the glass to scatter. Therefore, handle it with great care.
- (c) When replacing bulbs, do not remove until a new bulb is prepared.
Because if it is left being removed for a long period of time, the lens may be covered with dirt or moisture.
- (d) For replacement, be sure to use a bulb of the same watt.
- (e) Firmly reinstall the socket after bulb replacement. Otherwise, cloudy lens or invasion by water will be caused.

ON-VEHICLE INSPECTION



E15683

1. INSPECT TURN SIGNAL FLASHER CIRCUIT

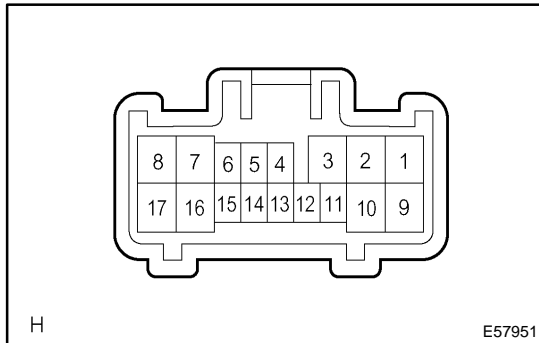
- (a) Measure voltage between terminal as shown in the chart below.

Tester connection	Condition	Specified condition
7 – Ground	Constant	Continuity
1 – Ground	Turn igniton switch ON	Battery positive voltage
1 – Ground	Turn igniton switch OFF	No voltage
4 – Ground	Constant	Battery positive voltage

- (b) Connect the connector to turn signal flasher and inspect the wire harness side connector from the back side as shown in the chart below.

Tester connection	Condition	Specified condition
2 – Ground	Hazard switch OFF → ON	0V → 10 – 14 V (60 to 120 time per minutes)
2 – Ground	Turn signal switch (right turn) OFF → ON	0V → 10 – 14 V (60 to 120 time per minutes)
3 – Ground	Hazard switch OFF → ON	0V → 10 – 14 V (60 to 120 time per minutes)
3 – Ground	Turn signal switch (left turn) OFF → ON	0V → 10 – 14 V (60 to 120 time per minutes)
5 – Ground	Turn signal switch (left turn) OFF → ON	10 – 14 V → 0 V
6 – Ground	Turn signal switch (right turn) OFF → ON	10 – 14 V → 0 V
8 – Ground	Hazard switch OFF → ON	10 – 14 V → 0 V

INSPECTION



1. HEADLAMP DIMMER SWITCH ASSY

(a) Inspect light control switch continuity.

(1) Check that there is continuity between terminals at each switch position as shown in the chart.

Switch operation	Tester connection	Specified condition
OFF	–	No continuity
TAIL	14 – 16	Continuity
HEAD	13 – 16 – 14	Continuity

(b) Inspect headlamp dimmer switch continuity.

(1) Check that there is continuity between terminals at each switch position as shown in the chart.

Switch operation	Tester connection	Specified condition
FLASH	7 – 8 – 16	Continuity
LOW BEAM	16 – 17	Continuity
HI BEAM	7 – 16	Continuity

(c) Inspect turn signal switch continuity.

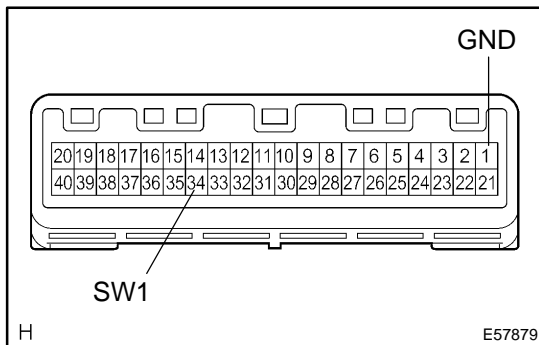
(1) Check that there is continuity between terminals at each switch position as shown in the chart.

Switch operation	Tester connection	Specified condition
Right turn	2 – 3	Continuity
Neutral	–	No continuity
Left turn	1 – 2	Continuity

(d) Inspect front fog light switch continuity.

(1) Check that there is continuity between terminals at each switch position as shown in the chart.

Switch operation	Tester connection	Specified condition
OFF	–	No continuity
ON	10 – 11	Continuity

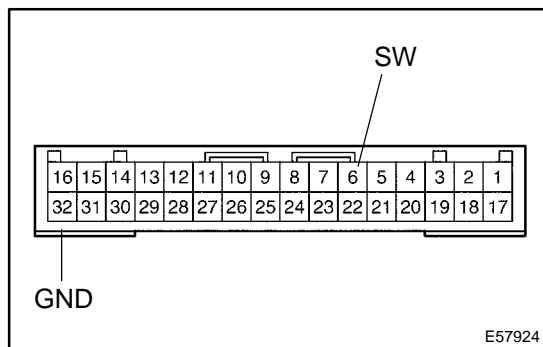


2. HEATER CONTROL HOUSING SUB-ASSY

(a) Auto A/C:

Inspect hazard warning signal switch.

Switch operation	Tester connection	Specified condition
OFF	1 – 34	No continuity
ON	1 – 34	Continuity

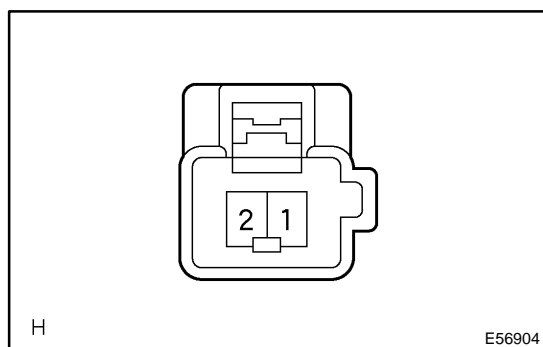


- (b) Manual A/C:
Inspect hazard warning signal switch.

Switch operation	Tester connection	Specified condition
OFF	6 - 32	No continuity
ON	6 - 32	Continuity

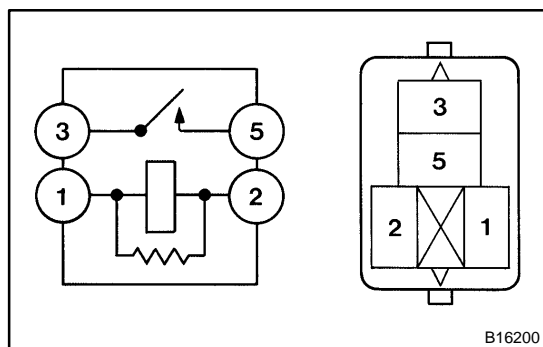
3. BACK UP LAMP SWITCH ASSY

- (a) Inspect back-up lamp switch continuity.
(1) Check that there is continuity between terminals upon switch operation.
Standard:
OFF (When ball is not pressed): No continuity
ON (When ball is pressed): Continuity



4. LUGGAGE COMPARTMENT DOOR LOCK ASSY

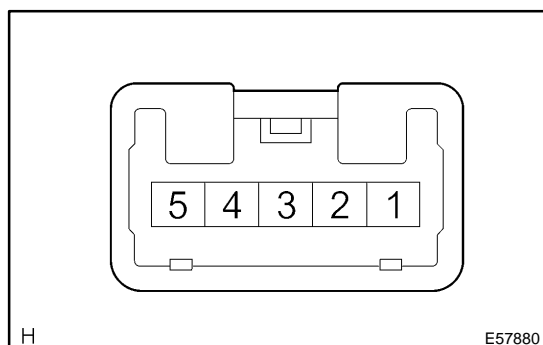
- (a) Inspect luggage compartment door courtesy lamp switch continuity.
(1) Check that there is continuity between terminal 2 and body ground when switch is operated.
Standard:
ON (When shaft is pressed): No continuity
OFF (When shaft is not pressed): Continuity



5. FOG LAMP RELAY

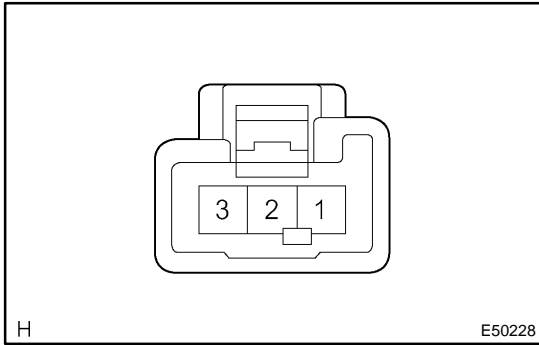
- (a) Inspect relay continuity.

Condition	Tester connection	Specified condition
Constant	1 - 2	Continuity
Apply B+ between terminals 1 and 2.	3 - 5	Continuity



6. ROOF CONSOLE BOX ASSY

- (a) Inspect map lamp continuity.
(1) Check that there is continuity between terminal 1 and 5 when switch is operated.
Standard:
ON: Continuity
OFF: No continuity



7. ROOM LAMP ASSY NO.1

- (a) Inspect room lamp assy No. 1 continuity.
 (1) Check that there is continuity between terminals at each switch position as shown in the chart.

Standard:

Switch operation	Tester connection	Specified condition
OFF	–	No continuity
DOOR	1 – 2	Continuity
*1 ON	2 – 3	Continuity
*2 ON	1 – 3	Continuity

*1: TMMK Made

*2: TMC Made

8. GLOVE BOX LAMP ASSY

- (a) Inspect glove box lamp assy continuity.
 (1) Check that there is continuity between terminals when switch is operated.

Standard:

ON (When shaft is pressed): No continuity

OFF (When shaft is not pressed): Continuity

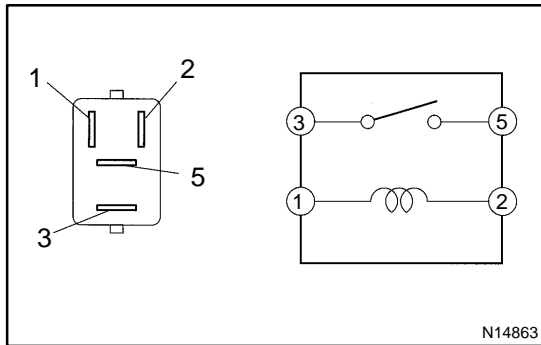
9. LUGGAGE COMPARTMENT LAMP ASSY NO.1

- (a) Inspect luggage compartment lamp assy No. 1.
 (b) Check that there is continuity between terminals when switch is operated.

Standard:

ON: Continuity

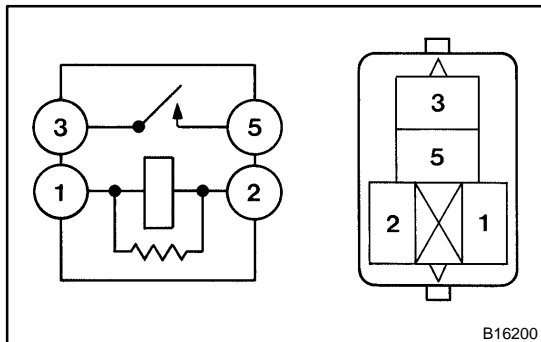
OFF No continuity



10. TAIL LAMP RELAY

- (a) Inspect relay continuity.

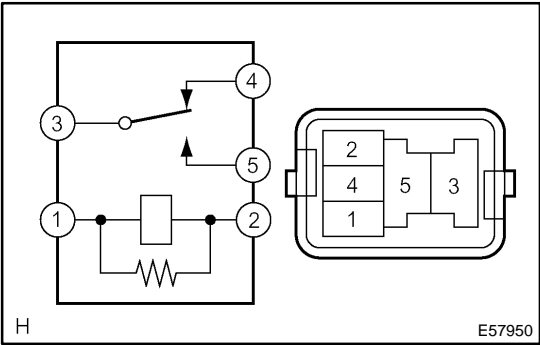
Condition	Tester connection	Specified condition
Constant	1 – 2	Continuity
Apply B+ between terminal 1 and 2	3 – 5	Continuity



11. DAY TIME RUNNING LIGHT RELAY NO.2

- (a) Inspect relay continuity.

Condition	Tester connection	Specified condition
Constant	1 – 2	Continuity
Apply B+ between terminal 1 and 2	3 – 5	Continuity



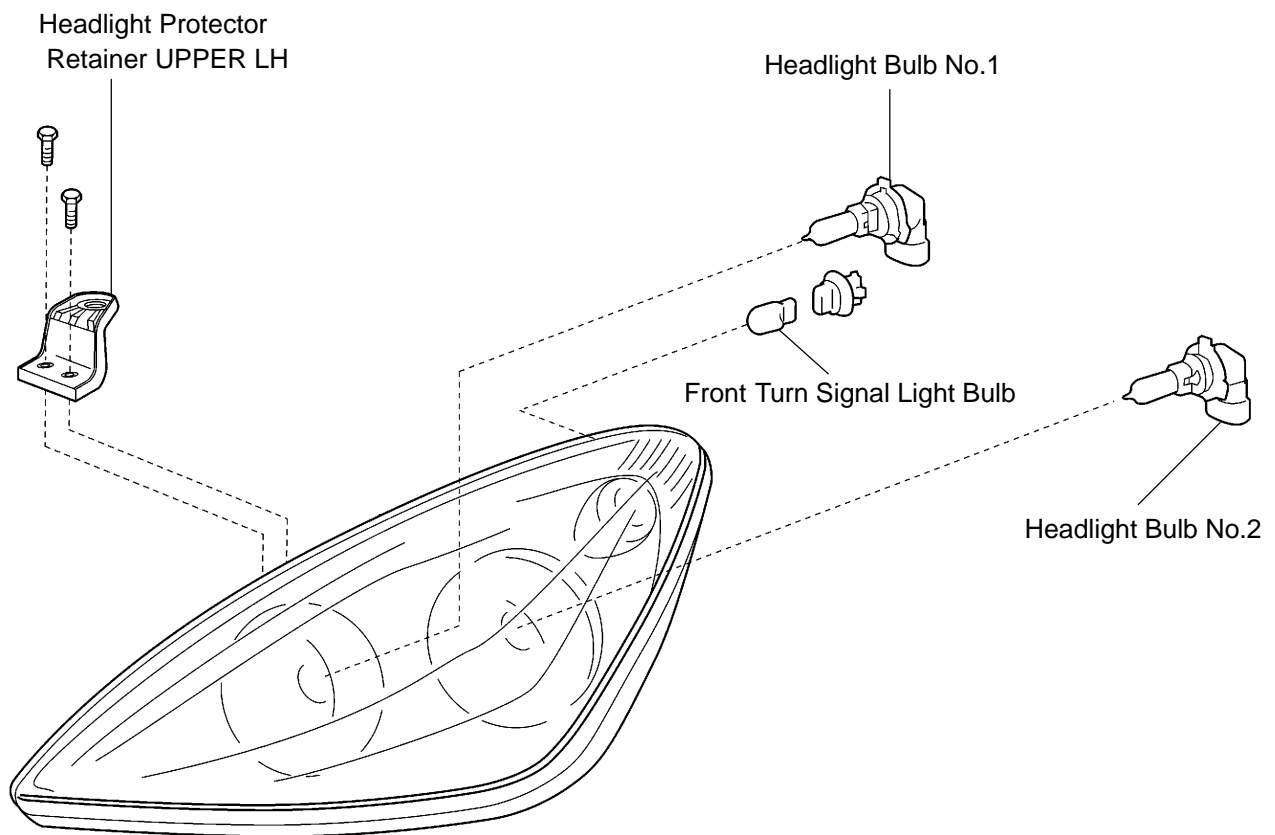
12. RUNNING LIGHT RELAY

(a) Inspect relay continuity.

Condition	Tester connection	Specified condition
Constant	1 – 3, 2 – 4	Continuity
Apply B+ between terminal 1 and 3	4 – 5	Continuity

LH HEADLAMP ASSY COMPONENTS

650BN-01



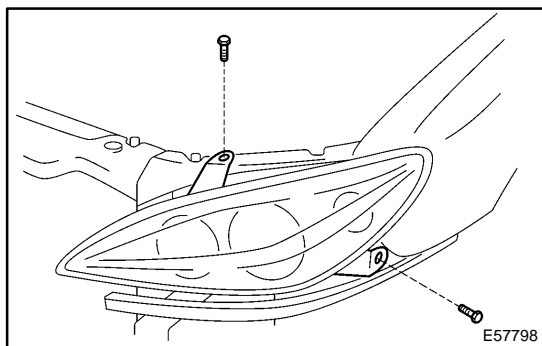
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REPLACEMENT

HINT:

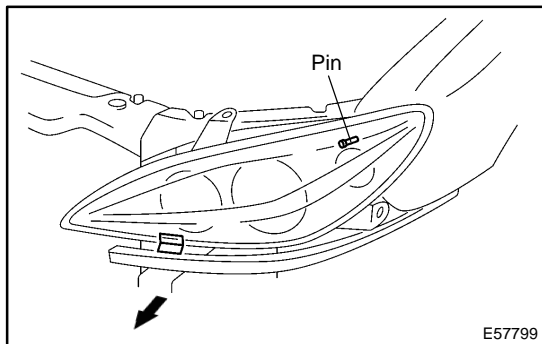
COMPONENTS: See Page 65-7

1. REMOVE ENGINE UNDER COVER LH
(See Page 76-2)
2. REMOVE ENGINE UNDER COVER RH
(See Page 76-2)
3. REMOVE FRONT FENDER LINER RH
(See Page 76-2)
4. REMOVE FRONT FENDER LINER LH
(See Page 76-2)
5. REMOVE FRONT BUMPER COVER
(See Page 76-2)



6. REMOVE LH HEADLAMP ASSY

- (a) Remove the 2 bolts.
- (b) Disconnect the connectors.

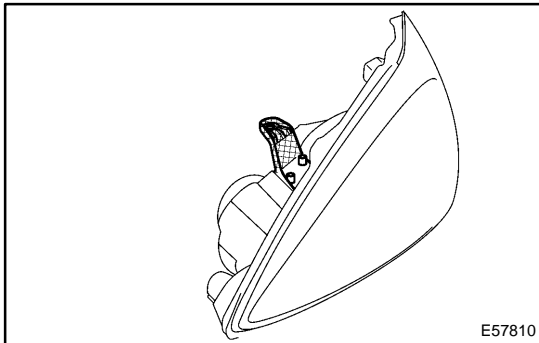


- (c) Pull out the headlight unit forward.
- (d) Remove the headlight assy.

7. REMOVE HEADLAMP PROTECTOR RETAINER UPPER LH

HINT:

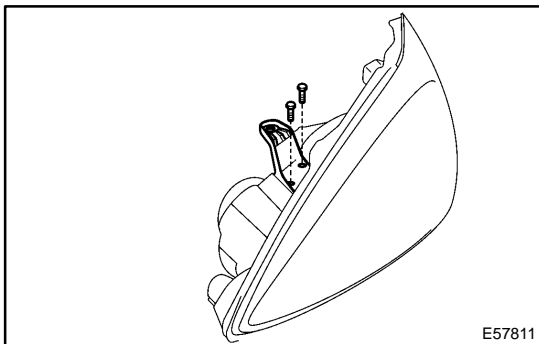
When only the installation part of the headlight unit assy LH is damaged, it can be repaired inexpensively by using a headlight protector retainer UPPER LH. In this case, however, the headlight unit assy LH itself should not be damaged.



- (a) Cut off the part shaded in the illustration and sand smooth with sandpaper.

NOTICE:

After cutting off the part roughly, place the headlight protector retainer UPPER LH against the bosses and gradually file any interfering part until the proper condition for installation is made.



- (b) Install the headlight protector retainer UPPER LH with the 2 screws.

8. HEADLIGHT AIM ONLY(See Page 65-10)

ADJUSTMENT

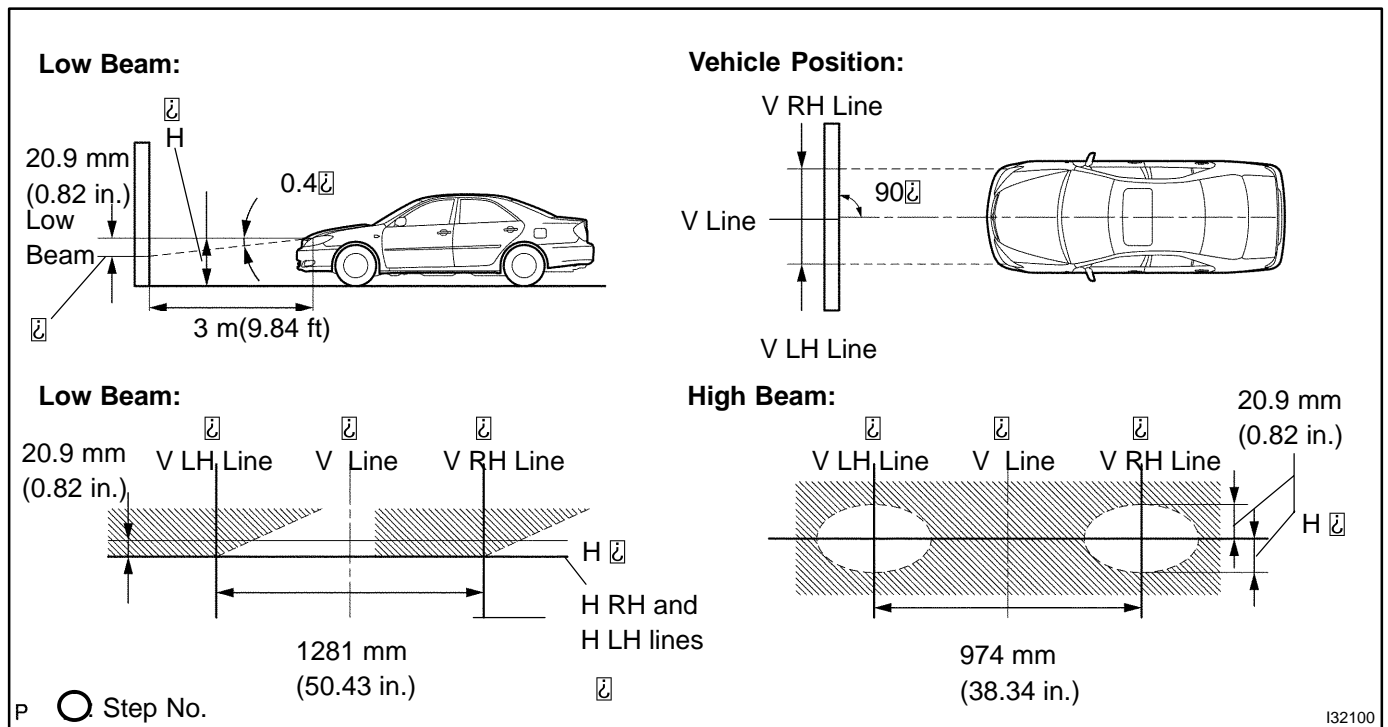
1. HEADLIGHT AIM ONLY

- (a) Place the vehicle with the following conditions.
 - The area around the headlight is not deformed.
 - The vehicle is parked on a level surface.
 - Tire inflation pressure is in the specified value.
 - A driver is in the driver's seat and the vehicle is in a state ready for driving (with a tank full).
 - The vehicle has been bounced several times.
- (b) Check the headlight aiming.
 - (1) Prepare a thick white paper.
 - (2) Stand the paper perpendicular to the ground at the position 9.84 ft away from the headlights.
 - (3) Ensure that the center line of the vehicle and the paper face forms a 90-degree angle as shown in the illustration.
 - (4) Draw a horizontal line (H line) on the paper, showing where the headlights should strike.
 - (5) Draw a vertical line (V line) to where the center line of the vehicle is to be.
 - (6) Draw 2 vertical lines to where the both headlights should strike (V RH and V LH lines).
 - (7) Draw a horizontal line (by connecting the both low beam center marks) to where the headlights should strike (H RH and H LH lines).
 - (8) Take appropriate measures to prevent any influence of other lights.

HINT:

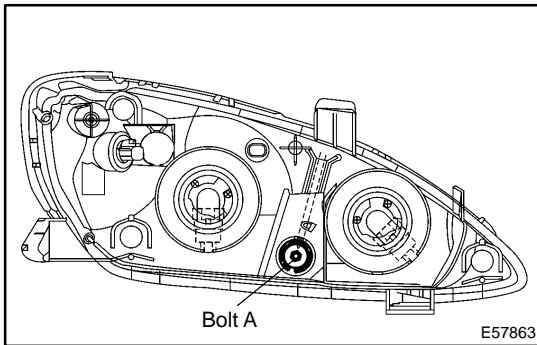
The H RH and H LH line is 0.4° below the horizontal line (H line) of the light axis.

- (9) Start the engine.
- (10) Turn the headlights ON.
- (11) Check that the headlights properly strike the position shown in the illustration.
- (12) If not, adjust the lights in the vertical direction.



HINT:

- As shown in the illustration, adjust each aim of the RH and LH lights.
- Since it is impossible to adjust the horizontal direction, the value of the "Low Beam" aim is reference value.



- (c) When adjusting it in the vertical direction:
- (1) High Beam:
Using adjusting bolt A, adjust the headlight aim to be within the specified range.
 - (2) Low Beam:
Using adjusting bolt A, adjust the headlight aim to be within the specified range.

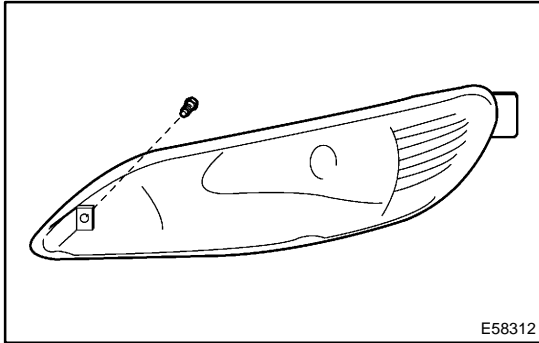
HINT:

The optical aim moves upward when turning a screwdriver clockwise, while it moves downward when turning a screwdriver counterclockwise.

FOG LAMP ASSY LH REPLACEMENT

65080-01

1. REMOVE ENGINE UNDER COVER LH
(See Page [76-2](#))



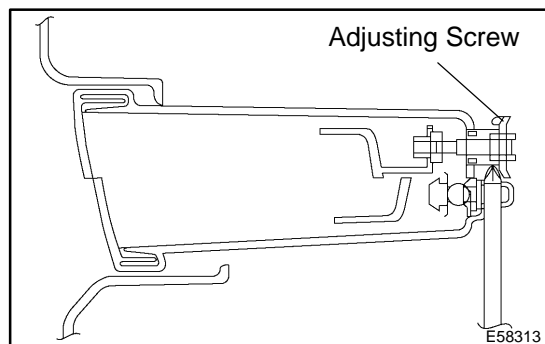
2. REMOVE FOG LAMP ASSY LH

- (a) Detach clip and pull out the fog light assy LH forward.

ADJUSTMENT

1. PUT VEHICLE THESE CONDITIONS

- (a) Tire inflation pressure is in the specified value.
- (b) Start the engine.



2. ADJUST FOG LIGHT AIM

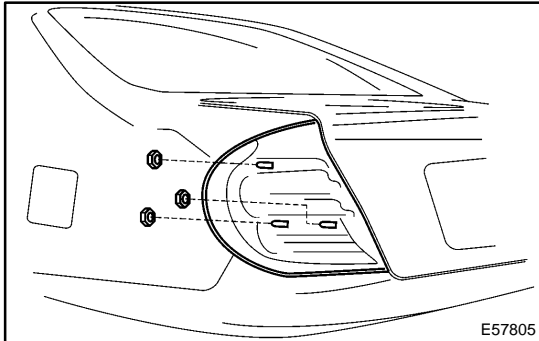
- (a) The fog light aim can be adjusted by turning the aiming screw in the vertical direction.

HINT:

The optical aim moves upward when turning a screwdriver clockwise, while it moves downward when turning a screwdriver counterclockwise.

REAR COMBINATION LAMP ASSY LH REPLACEMENT

650BQ-01



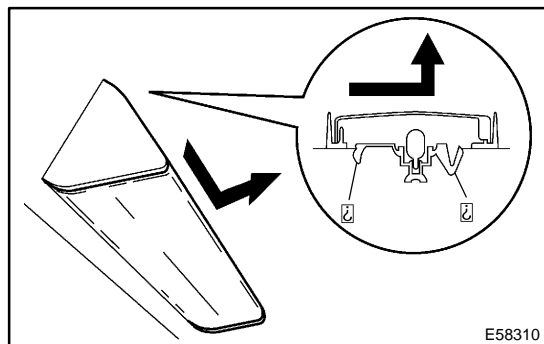
1. REMOVE REAR COMBINATION LAMP ASSY LH

- (a) Remove the service hole cover.
- (b) Remove the 3 nuts and disconnect the connector of rear combination light.
- (c) Pull the rear combination light assy to the back of the vehicle, and remove the rear combination light assy.

LICENSE PLATE LAMP ASSY REPLACEMENT

650BR-01

1. REMOVE LUGGAGE COMPARTMENT DOOR COVER
(See Page 76-16)
2. REMOVE LUGGAGE COMPARTMENT DOOR GARNISH SUB-ASSY OUTSIDE
(See Page 76-16)

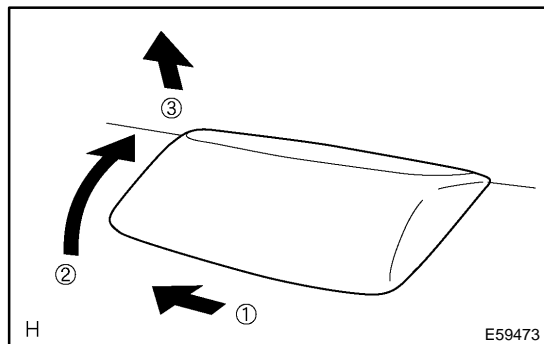


3. REMOVE LICENSE PLATE LAMP ASSY

- (a) Pull the license plate light assy to the side of vehicle as shown in the illustration and release the claw, then disconnect the connector.

CENTER STOP LAMP ASSY REPLACEMENT

650BS-01



1. REMOVE CENTER STOP LAMP ASSY(W/O REAR SPOILER LED)

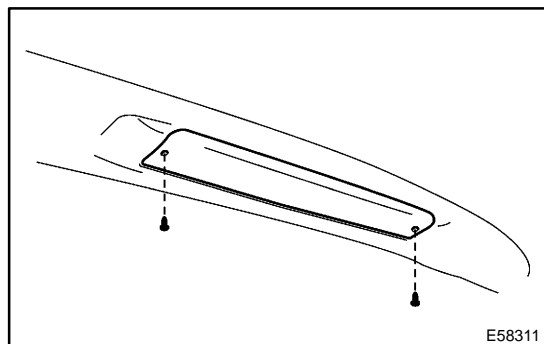
- (a) Pull out the center stop light assy shown in the illustration.
- (b) Disconnect connector.

2. REMOVE LUGGAGE COMPARTMENT DOOR COVER(W/ REAR SPOILER LED)

(See Page 76-6)

3. REMOVE REAR SPOILER SUB-ASSY(W/ REAR SPOILER LED)

(See Page 76-6)



4. REMOVE CENTER STOP LAMP ASSY(W/ REAR SPOILER LED)

- (a) Remove the 2 screws and center stop light assy.

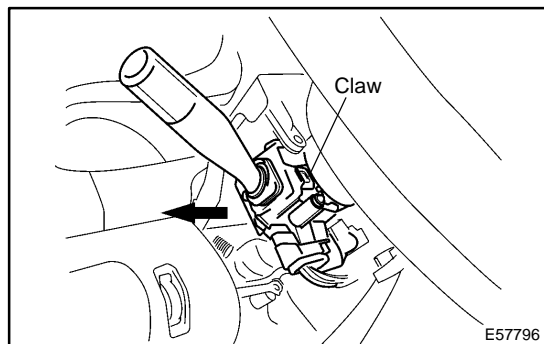
5. INSTALL REAR SPOILER SUB-ASSY(W/ REAR SPOILER LED)

(See Page 76-6)

HEADLAMP DIMMER SWITCH ASSY REPLACEMENT

650BT-01

1. REMOVE STEERING COLUMN COVER
(See Page 50-9)



2. REMOVE HEADLAMP DIMMER SWITCH ASSY

- (a) Disconnect the connector.
- (b) Using a screwdriver, release the claw and pull out the headlight dimmer switch Assy.

NOTICE:

Pressing the claw hard breaks the claw.

HINT:

Tape the screwdriver tip before use.