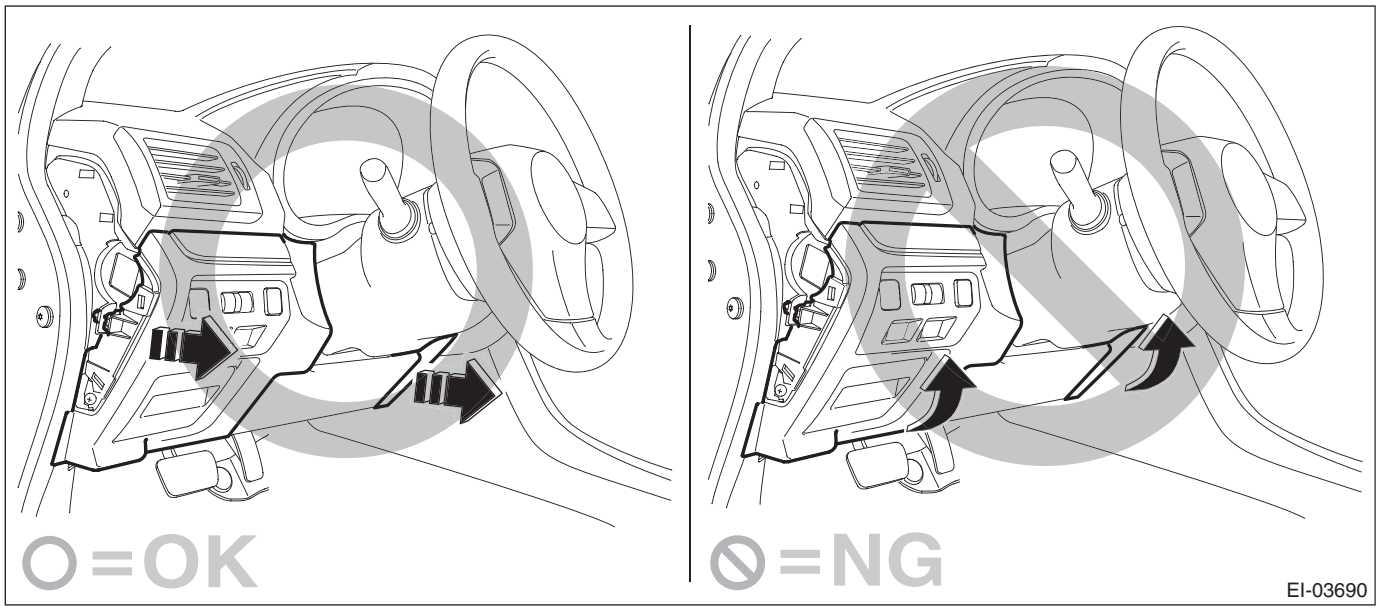
15.Stop Light Switch

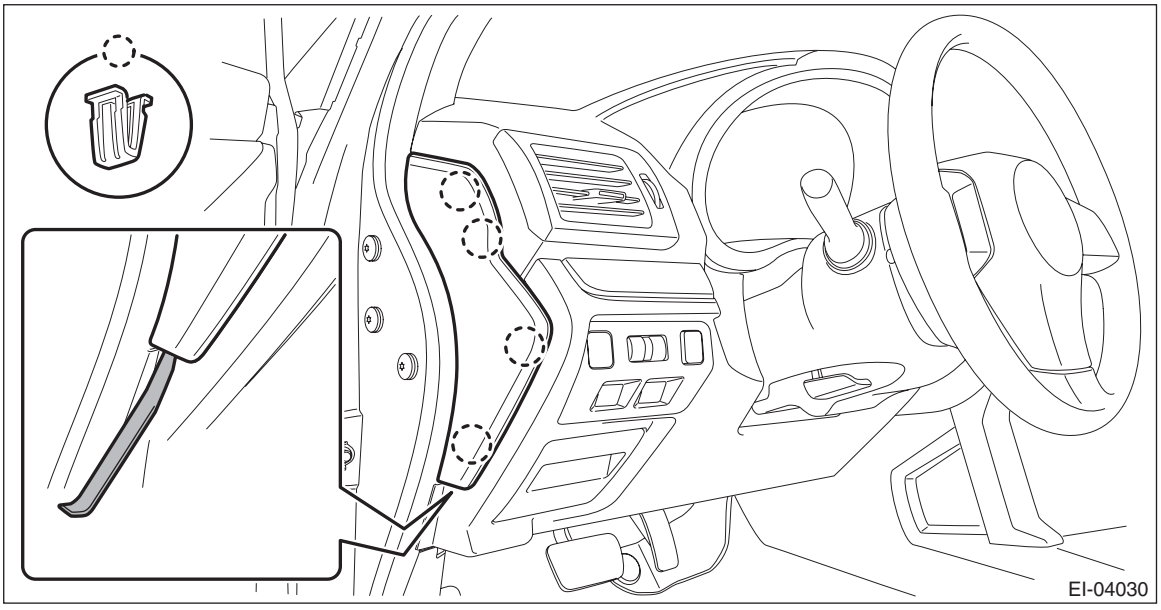
A: REMOVAL

1) Disconnect the ground cable from battery and wait for at least 60 seconds before starting work.
2) Remove the cover assembly - instrument panel LWR driver.

CAUTION:
When removing the cover assembly - instrument panel LWR driver, be sure to pull it toward you. If attempting to remove by turning it upward, the claws may be damaged.

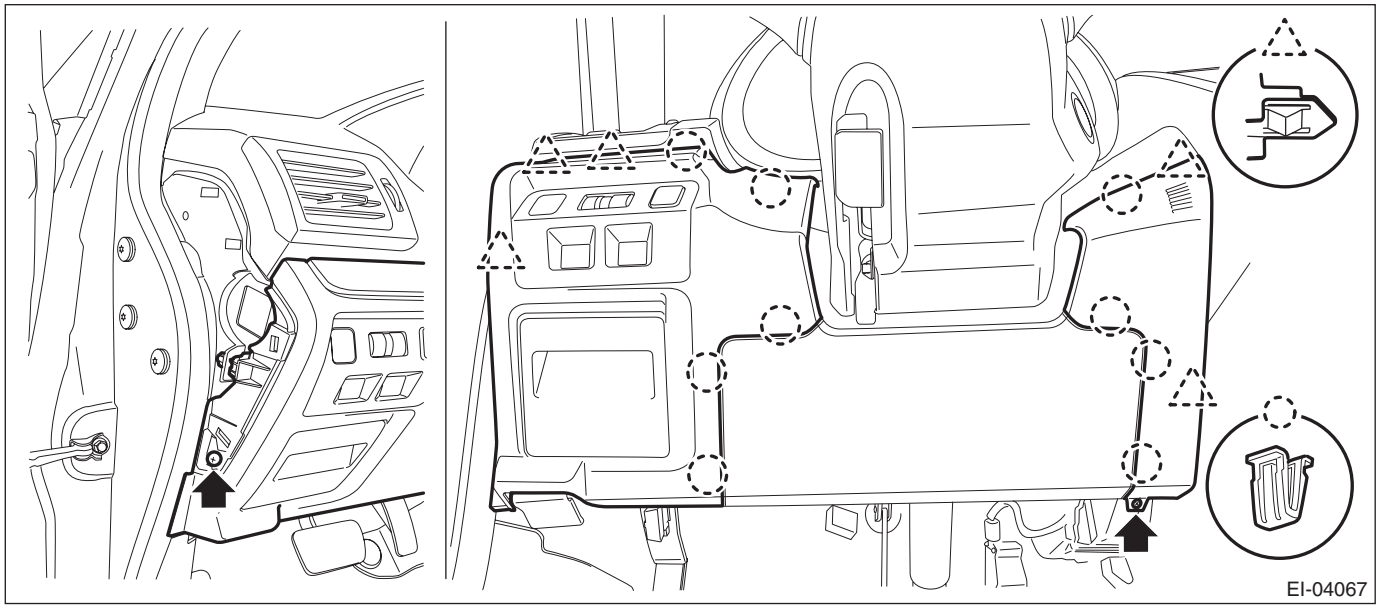


(1) Remove the clips, and remove the cover - instrument panel side LH.

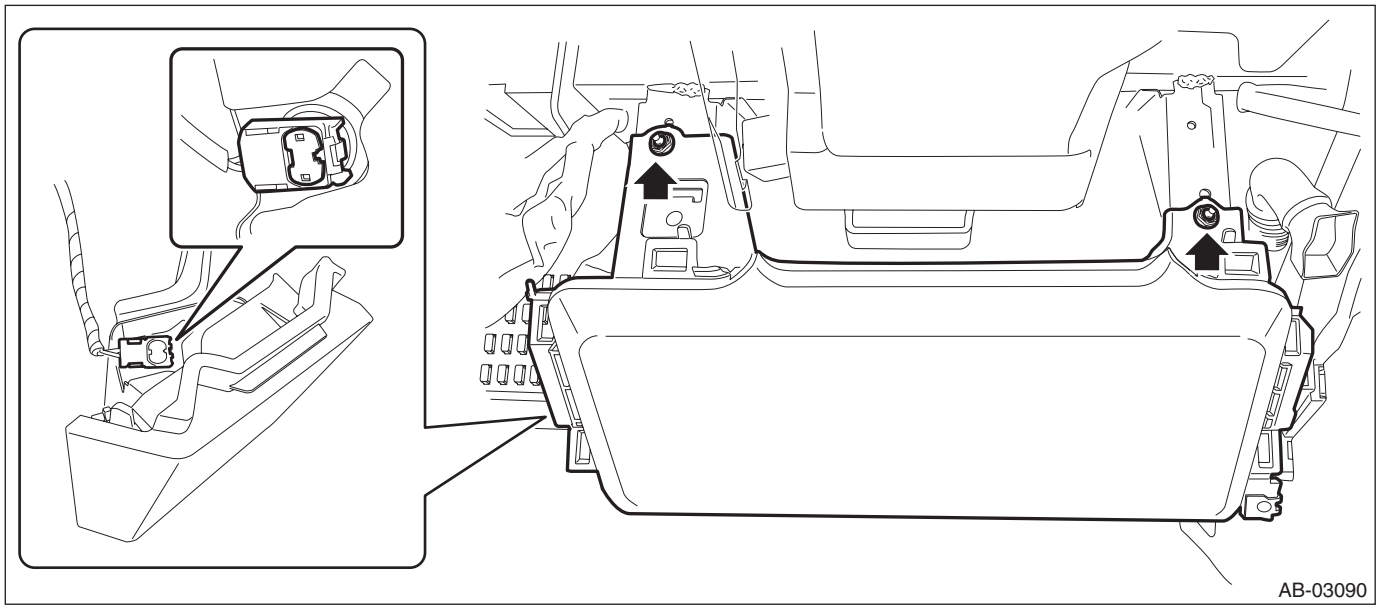


NOTE:
Using a plastic remover, open the cover - instrument panel side LH.

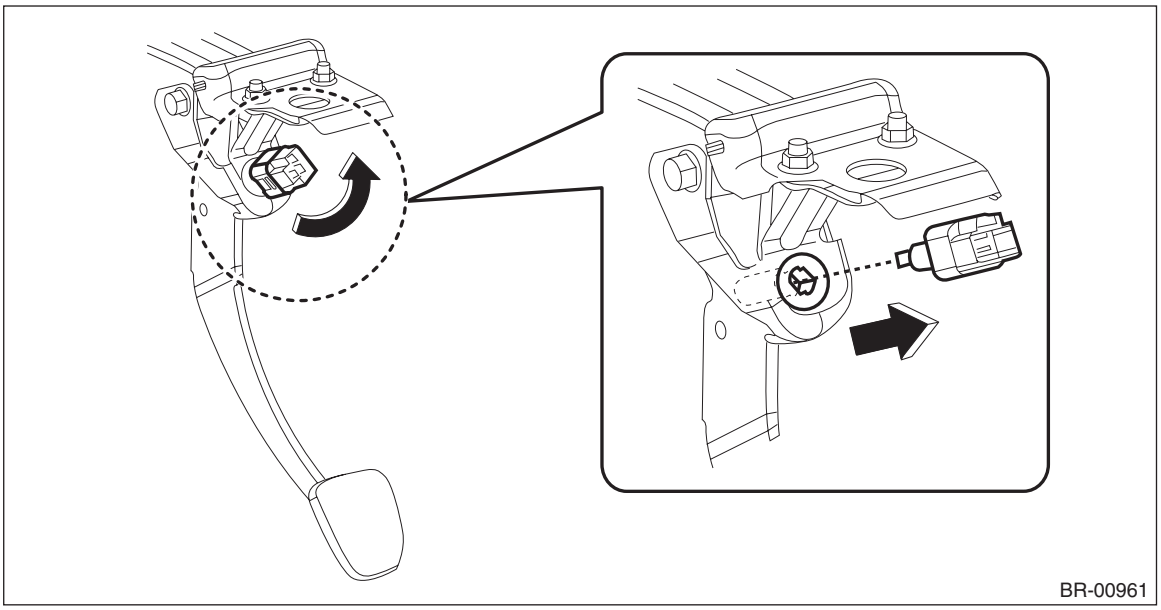
(2) Remove the screws and release the clips and claws.
(3) Disconnect the harness connectors, and remove the cover assembly - instrument panel LWR driver INN and OUT.



3) Remove the nuts to remove the knee airbag module and disconnect the harness connector. <Ref. to AB-22, DRIVER'S AIRBAG MODULE, KNEE AIRBAG MODULE, CURTAIN AIRBAG MODULE AND PRETENSIONER, PROCEDURE, Airbag Connector.>



4) Remove the switch - stop light.
(1) Disconnect the switch - stop light connector.
(2) Remove the switch - stop light by turning it counterclockwise.

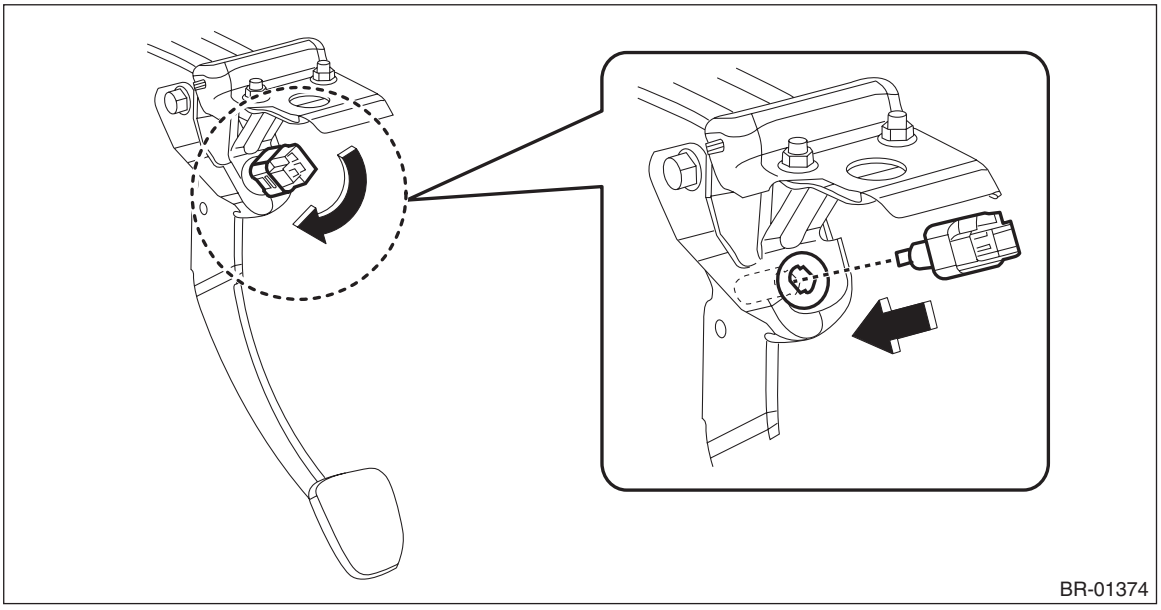

BR-00961

B: INSTALLATION

1) Install the stop light switch.

CAUTION:
- **Turn the stop light switch clockwise when installing so that it can return backward by approximately 1 mm (0.04 in) and clearance is automatically adjusted.**
- **If it is hard to turn, reduce the switch pushing force and turn it again.**

(1) While pulling up the brake pedal toward you, contact the stop light switch to the stopper and temporarily install it by rotating it clockwise.
(2) Adjust the stop light switch position, and install it. <Ref. to BR-73, ADJUSTMENT, Stop Light Switch.>
(3) Install the stop light switch connector.


BR-01374

2) Install the knee airbag module and the cover assembly - instrument panel LWR driver.

Tightening torque:
7.5 N·m (0.76 kgf-m, 5.5 ft-lb)

3) Connect the battery ground terminal.

4) Check that the brake light operate properly.
5) Check the stop light switch operation.
   (1) Turn to IG OFF and connect the Subaru Select Monitor.
   (2) Start the engine and warm it up to a sufficient temperature.

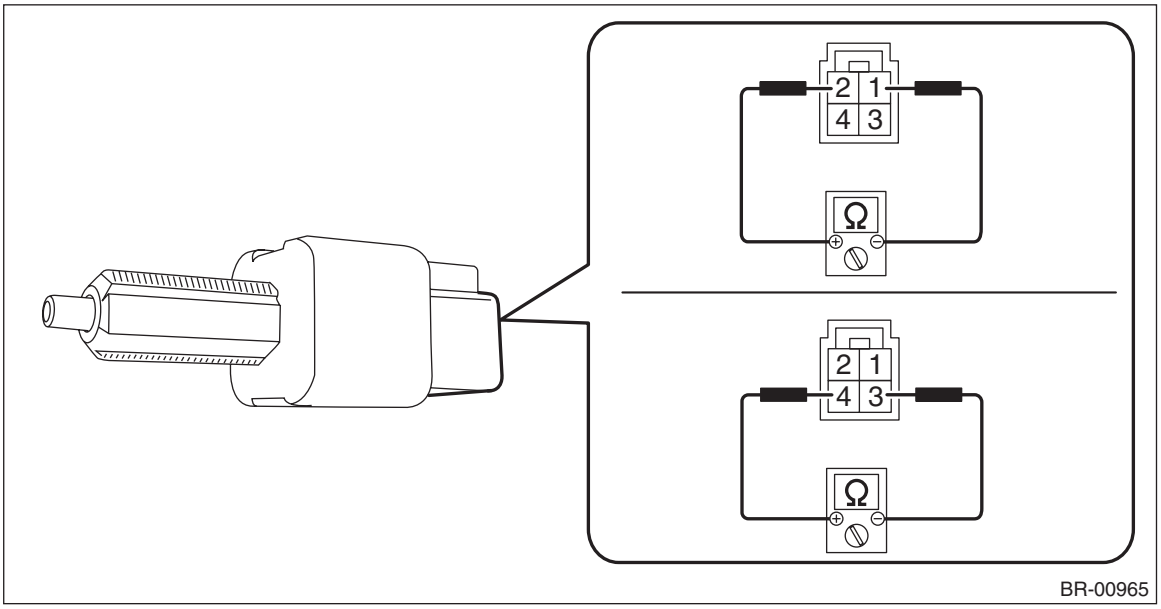
NOTE:
Perform the following operations with the engine running.
   (3) Display the data of the “Brake Switch” and “Pressure Sensor Output” according to the Subaru Select Monitor display.
   (4) Check that the stop light switch is ON with the brake pedal not depressed.
   (5) Quickly depress the brake pedal 5 times.
   (6) Slowly release the brake pedal depressed at the fifth time and check that the master cylinder pressure is within the standard value when the stop light switch changes from ON to OFF.

Specification:
Less than 1 Mpa (10 bar)

C: INSPECTION

1) Disconnect the stop light switch connector.
2) Measure the resistance between stop light switch terminals.

Preparation tool:
Circuit tester



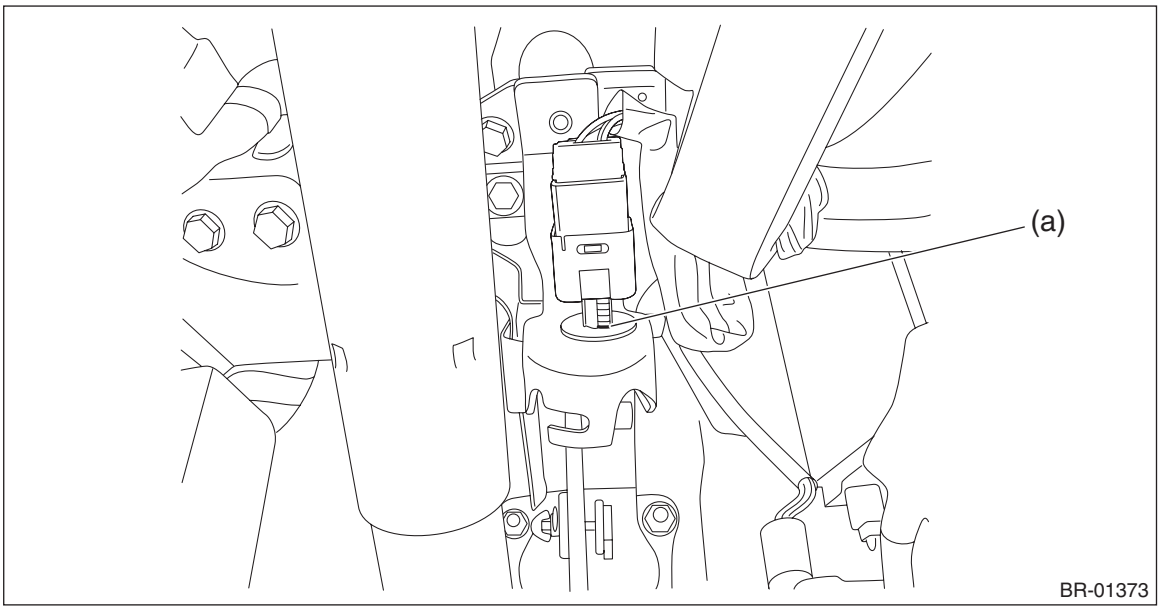
Terminal No.	Inspection conditions	Standard
1 — 2	When brake pedal is depressed	1 MΩ or more
	When brake pedal is released	Less than 1 Ω
3 — 4	When brake pedal is depressed	Less than 1 Ω
	When brake pedal is released	1 MΩ or more

3) Replace the stop light switch if the inspection result is not within the standard value.

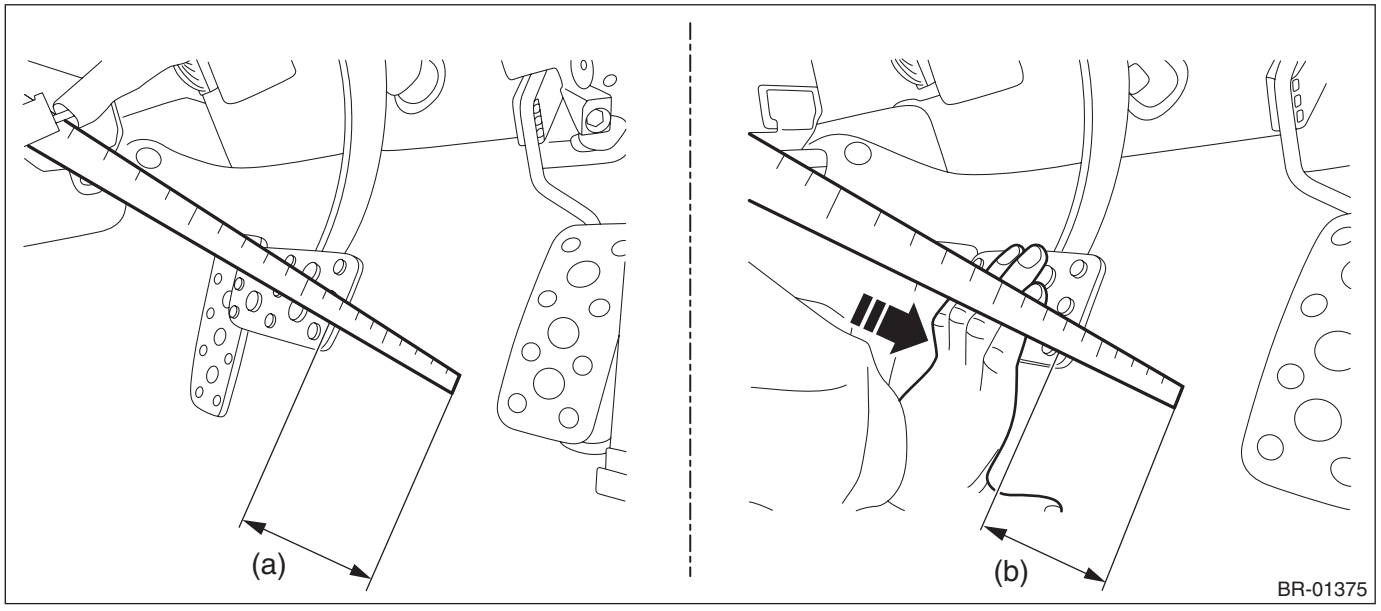
D: ADJUSTMENT

CAUTION:
- **Turn the stop light switch clockwise when installing so that it can return backward by approximately 1 mm (0.04 in) and clearance is automatically adjusted.**
- **If it is hard to turn, reduce the switch pushing force and turn it again.**
- **After adjustment, if the pedal stroke is less than 3 mm (0.12 in), it may lead to an incorrect light illumination by vibrations etc.**

1) Mark the threaded portion of the stop light switch (a).



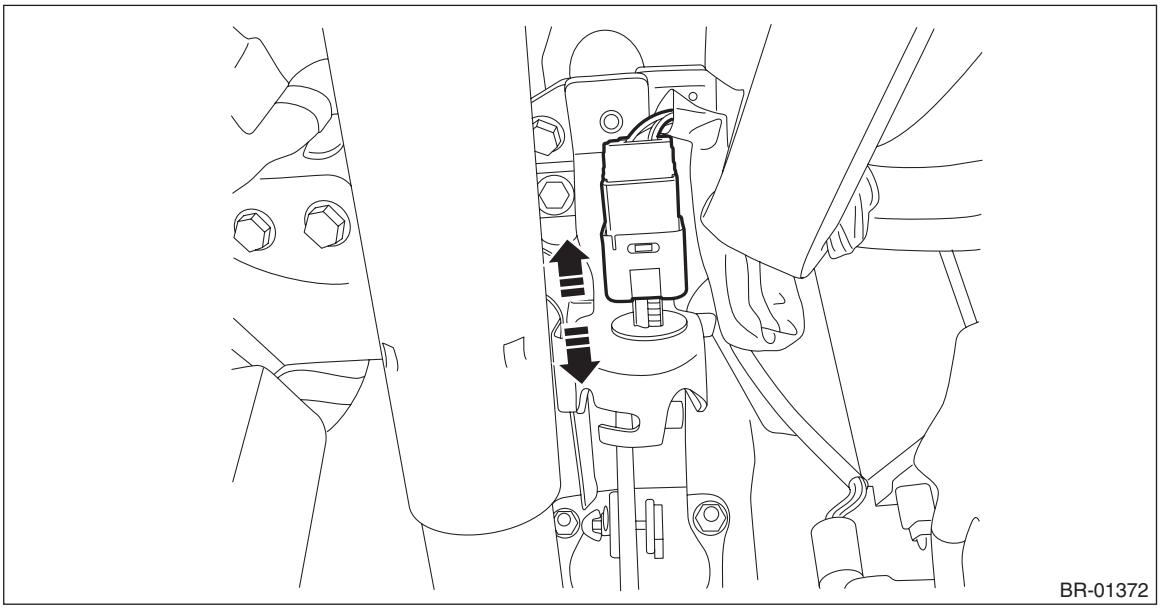
2) Measure the brake pedal stroke which turns on the stop light switch.
   (1) Measure the distance (a) from the floor mat to the end of brake pedal pad.
   (2) Hold the pedal to a position that the stop light illuminates, and measure the distance (b) from the floor mat to the end of brake pedal pad.
   (3) Calculate the difference (stroke value) between the values (a) and (b) measured as above.



3) Adjust so that the calculated difference of stroke value fit within the specified value, and install the stop light switch.

Tightening torque:
3 mm (0.12 in) or more, less than 8 mm (0.31 in)

NOTE:
Pedal stroke volume per a pitch becomes approx. 4 mm (0.16 in).



4) After adjustment, make sure that the stop light switch illuminates normally.