



Recall Information Bulletin

No: C1000720 **Issued:** 8/14/2006
NHTSA No: 06V-195
Transport Canada No: 06-131
Re: ALLISON A/T Selector Lever
Group: 23 **Models:** FK/FM

SUBJECT:

Safety Recall C1000720 - ALLISON A/T Selector Lever

MODELS:

FK61F, FM61F, FM64F

VEHICLES INVOLVED:

Certain 2005 through 2006 model year FK61F, FM61F and FM64F vehicles produced from May 25, 2004 through December 27, 2005.

A list of vehicles your Dealership has sold that require this Recall can be found on the Dealer's "Open Campaigns" list supplied by MFTA via Fusonet. Some individual vehicles described above may not need the Recall. Always check the "VIN Inquiry" tab under "Service" or "Warranty" on Fusonet to verify that the VIN requires this Safety Recall.

Important note: It is a violation of Federal law for a dealer to deliver a new or used motor vehicle covered by this Recall Information Bulletin, under a sale or lease, until the Safety Recall has been completed.

OWNER NOTIFICATION:

Owners of affected vehicles will be notified by mail. A copy of the customer notification letter can be found on Fusonet.

CONDITION:

Mitsubishi Fuso Truck of America, Inc. has decided that a defect which relates to motor vehicle safety exists in the ALLISON A/T selector lever. On affected vehicles, the ALLISON A/T selector lever may have been improperly machined, allowing excessive play in the lever, causing improper engagement of the "P" range (park). In the worst case, the transmission could remain in the "R" range (reverse) after shifting the vehicle into park, allowing the vehicle to roll, causing a crash without warning.

MODIFICATION:

The ALLISON A/T selector lever assembly and A/T shift control cable will be replaced. The repair parts are available through normal parts channels in kit form. The contents of the kit (**part number MT-26-A**) are described on page 2.

RECALL CLAIM SUBMITTAL:

Claim parts and labor via the DIN System using the Recall Claim Entry screen. Enter all requested information, including the Recall Number. The system will apply the labor allowance and parts pricing adjustment shown.

Recall Reimbursement					
Campaign Number	Models	Allowances		Labor Description	Part Numbers
C1000720	FK61F, FM61F, FM64F	Labor Time	2.2 hours	A/T selector lever replacement	MT-26-A
		Parts Pricing	US\$1193.01		

RECALL PARTS RETENTION:

All parts that have been removed and replaced must be properly identified and retained, as outlined in the Warranty and Service Policy Manual, section 3.8. The Product Support Manager will inspect each part and authorize its scrapping.

PARTS KIT CONTENTS:

MT-26-A Parts Kit Contents		
Item #	Part Name	Qty.
1	LOWER RANGE SELECTOR COVER	1
2	UPPER RANGE SELECTOR COVER	1
3	RANGE SELECTOR	1
4	LH RANGE SELECTOR BRACKET ASSEMBLY	1
5	RH RANGE SELECTOR BRACKET ASSEMBLY	1
6	CABLE CLAMP	1
7	PIVOT	1
8	A/T CABLE BRACKET	1
9	CLIP	1
10	CLIP	2
11	CABLE BAND	1
12	FLANGE BOLT (10X25)	4
13	FLANGE BOLT (6X12)	4
14	ASSEMBLED SCREW & WASHER (6X16)	4
15	FLANGE NUT (6)	2
16	A/T CABLE	1
17	SHIFT LEVER CONSOLE ASSEMBLY	1
18	ORANGE PROPER PARKING PROCEDURES LABEL	1
19	WHITE PARKING BRAKE WARNING LABEL	1

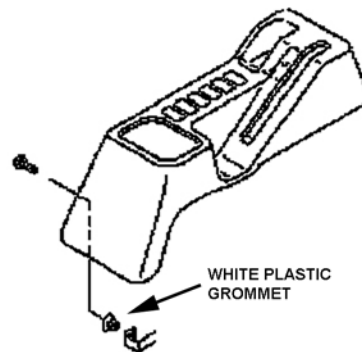
REPAIR PROCEDURE:

1. Park the vehicle on a flat, level surface, shut off the engine, apply the parking brake, chock the wheels and disconnect the battery cables. **CAUTION! Do not remove the wheel chocks or disengage the parking brake until all modification work has been completed.**
2. Perform the Recall using the attached modification procedure, subject to the additional instructions below:
 - Affix the white parking brake warning label (19) on the shift lever console assembly (17), as indicated below in **Photo 1**.
 - Reuse the white plastic grommets when replacing the shift lever console assembly (17), as indicated below in **Illustration 1**.

PHOTO 1



ILLUSTRATION 1



Modification Procedure for Unexpected vehicle movement on FK/FM with ALLISON LCT A/T

MT-26-A RECALL PARTS KIT CONTENTS:

No	Part name	Q'ty / Unit
1	LOWER RANGE SELECTOR COVER	1
2	UPPER RANGE SELECTOR COVER	1
3	SELECTOR RANGE	1
4	LH RANGE SELECTOR BRACKET ASSEMBLY	1
5	RH RANGE SELECTOR BRACKET ASSEMBLY	1
6	CABLE CLAMP	1
7	PIVOT	1
8	A/T CABLE BRACKET	1
9	CLIP	1
10	CLIP	2
11	CABLE BAND	1
12	FLANGE BOLT (10X25)	4
13	FLANGE BOLT (6X12)	4
14	ASSEMBLED SCREW & WASHER (6X16)	4
15	FLANGE NUT (6)	2
16	A/T CABLE	1
17	SHIFT LEVER CONSOLE ASSEMBLY	1
18	ORANGE PROPER PARKING PROCEDURES LABEL	1
19	WHITE PARKING BRAKE WARNING LABEL	1

MODIFICATION PROCEDURE

Preparation for work

1. Chock the wheels securely.
2. Shift A/T Selector lever into "P" Position
3. Loosen the parking brake cable adjustment at the transmission and fully apply the parking brake lever to create clearance for removal of the console

Remark: Since ※ marked parts will be re-used, please verify the installation position before removing and do not throw away.

Removing A/T selector lever ASSY and Shift control cable.

Cab side

1. Loosen four console mounting bolts ※ and remove Selector Lever Console from Cab Floor
2. Disconnect the oil level switch
3. Loosen ○-marked 2 Nuts shown in Figure 1, and remove A/T Shift Control Cable from Selector
4. Disconnect OD Switch Harness Connector and Illumination Lamp Harness Connector.
5. Loosen four Bolts and remove A/T Selector from Cab Floor.
Remove Grommet Screw (2 places) ※ from Selector
6. Tilt the Cab up.
7. Loosen the Bolt for Cable Clip※ under Cab Floor, and remove A/T Shift Control Cable

A/T side

1. Remove Control Cover as shown in Figure1-1. ※
2. Loosen Cable Tightening Nut※ on the Bracket which is on left side of A/T Assy.
3. Remove the A/T Shift Control Cable from Adjuster.

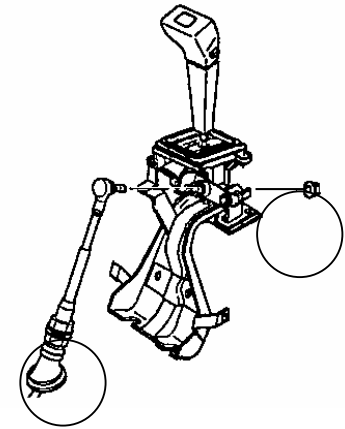


Fig1.Removing Cable Tightening Nut

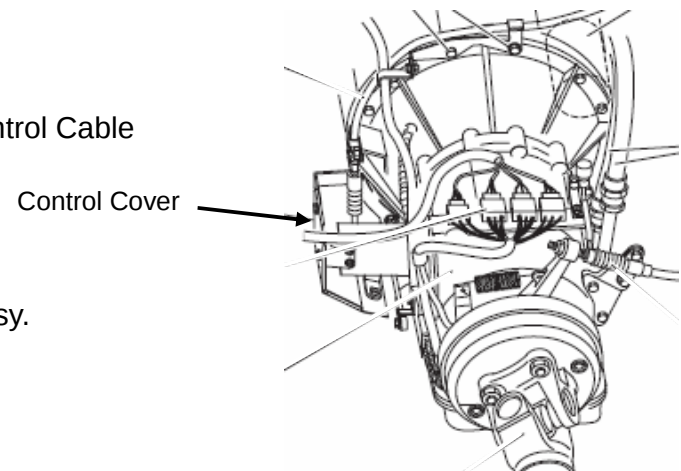


Fig1-1. Control Cover

Chassis side

Remove Clips ※ and A/T Shift Control Cable from chassis by loosening Bolt ※ and Nut ※ which fixing the clip at Radiator, Front Engine Mount and Frame.

Installation of New A/T Shift Control Cable

A/T side

1. Hand tighten the Nut to the A/T Shift Control Cable and insert the Cable into Adjuster, and then hand tighten the other Nut with keeping gap as shown in Figure 2.
2. Fix the new Cable to Cable Bracket by tightening the nut as shown in Figure 2.
(Tightening torque : 15.5 ~ 22.9 ft-lbs {21~31N·m})

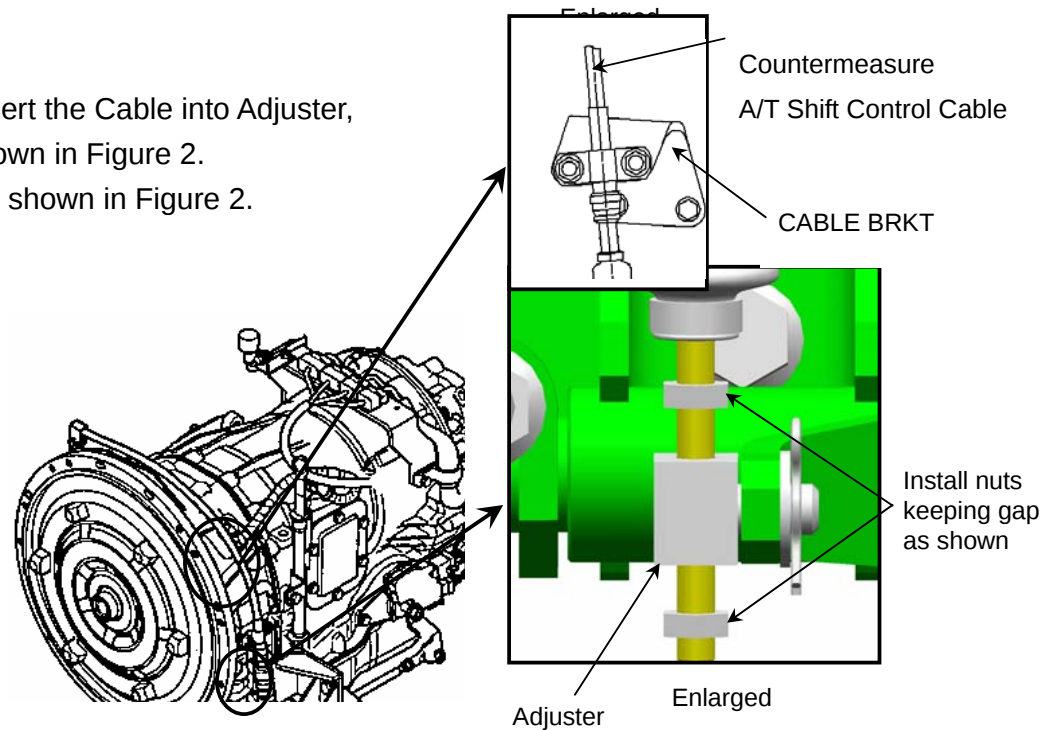
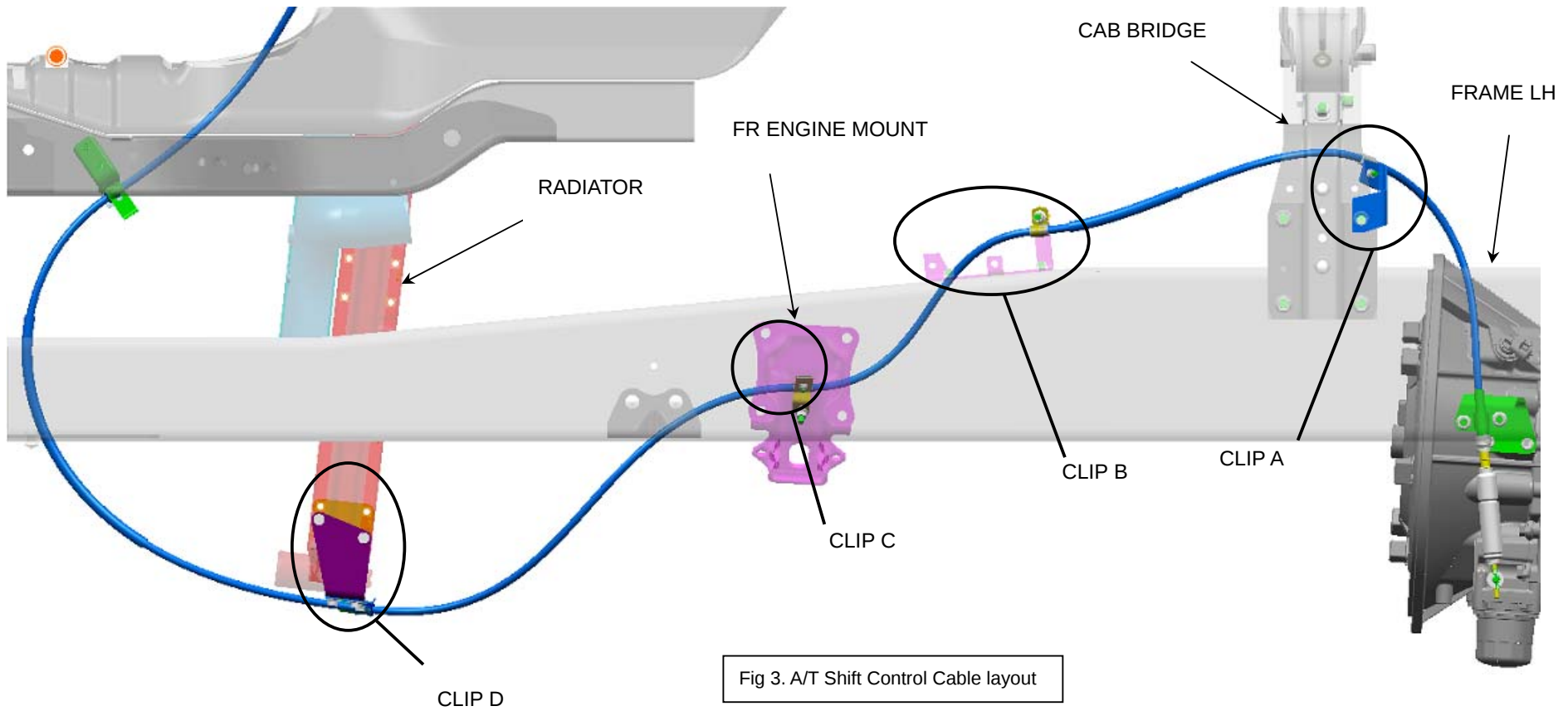


Fig 2. Installation of A/T Control Cable into A/T

Chassis side

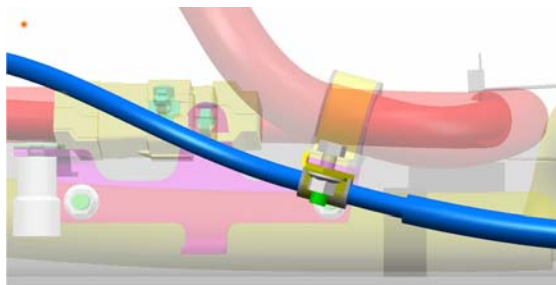
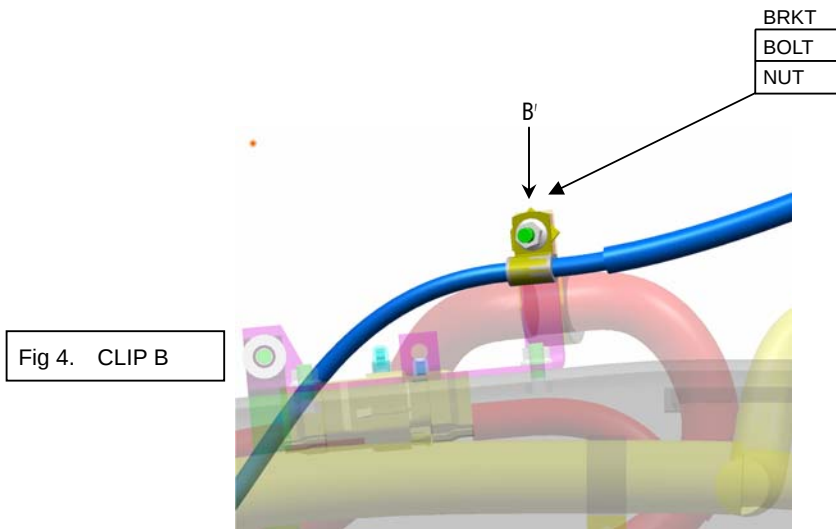
1. Install the A/T Shift Control Cable as shown in Figure 3
2. Install the Cable in the Clips in the following order: A→B→C→D.



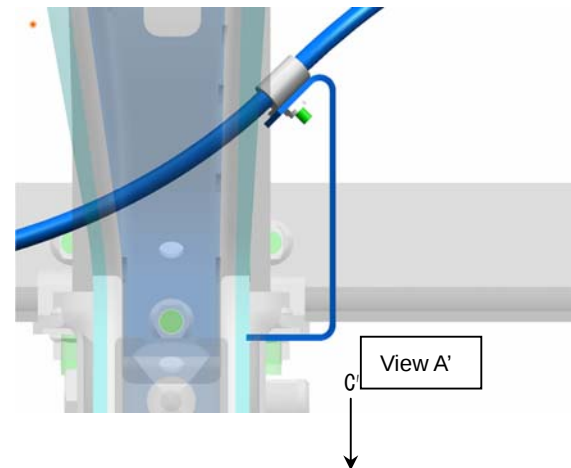
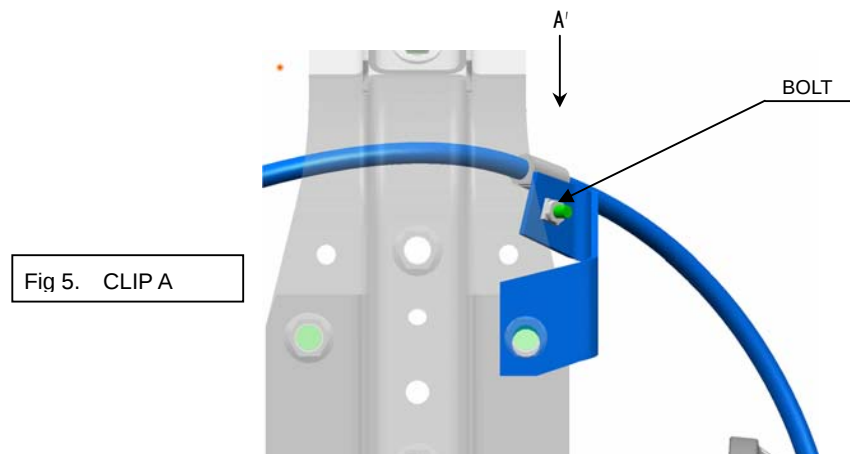
3. At Clip A, B and C, fix the cable so as to align the center of Clips and the matching white tape mark on the cable.

4. Fix the Cable Clips in the direction as shown in Figure 4~7.

(Fixing Bolt and Nut Tightening torque : 3.0~4.4ft-lbs {4~6N·m})



View B'



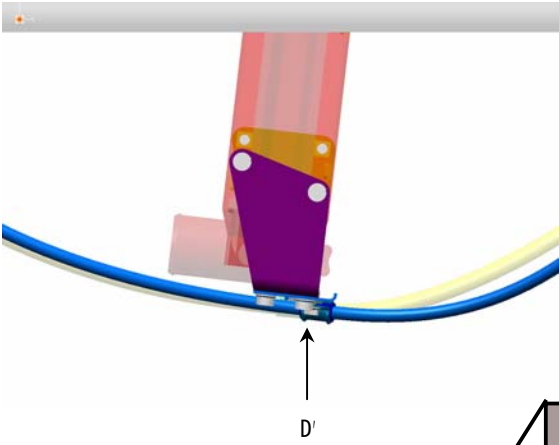
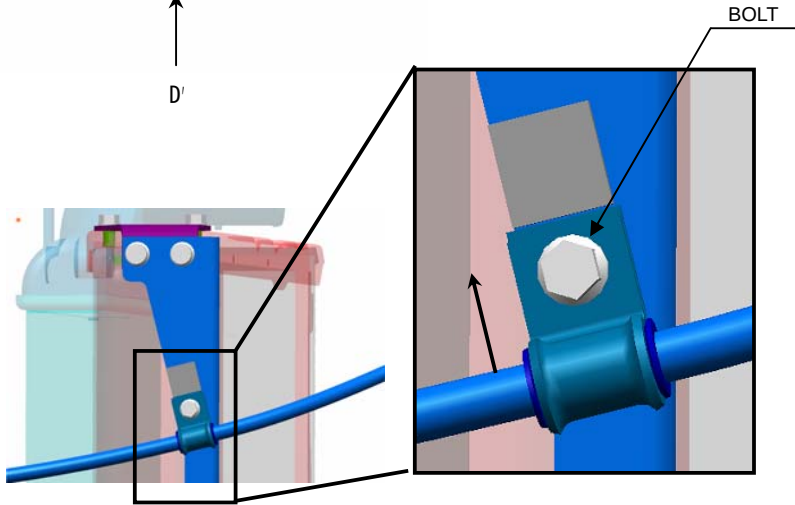


Fig 6. CLIP D



View D'

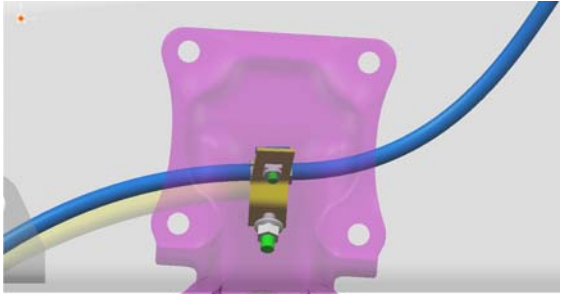
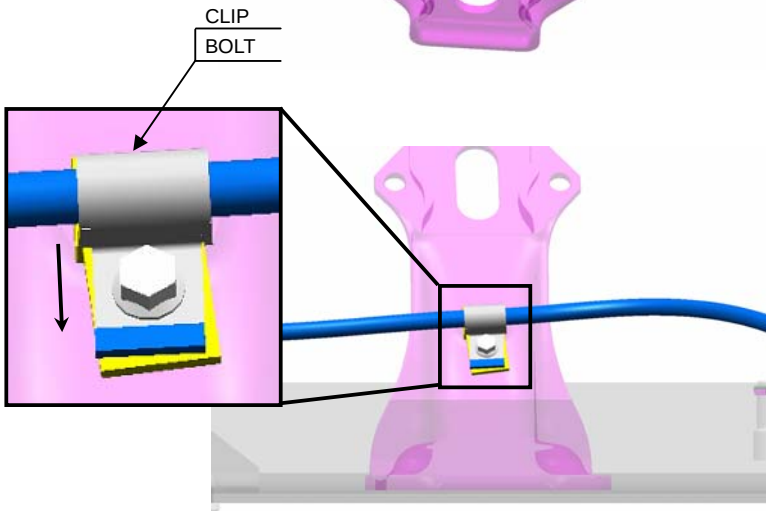


Fig 7. CLIP C



View C'

Cab side

1. Reposition the Plug ※ from Cab inner hole to Cab outer hole.
2. Insert the Cable through Cab inner hole.

Note: New Cable goes through inner Hole from current one as shown in Figure 8.

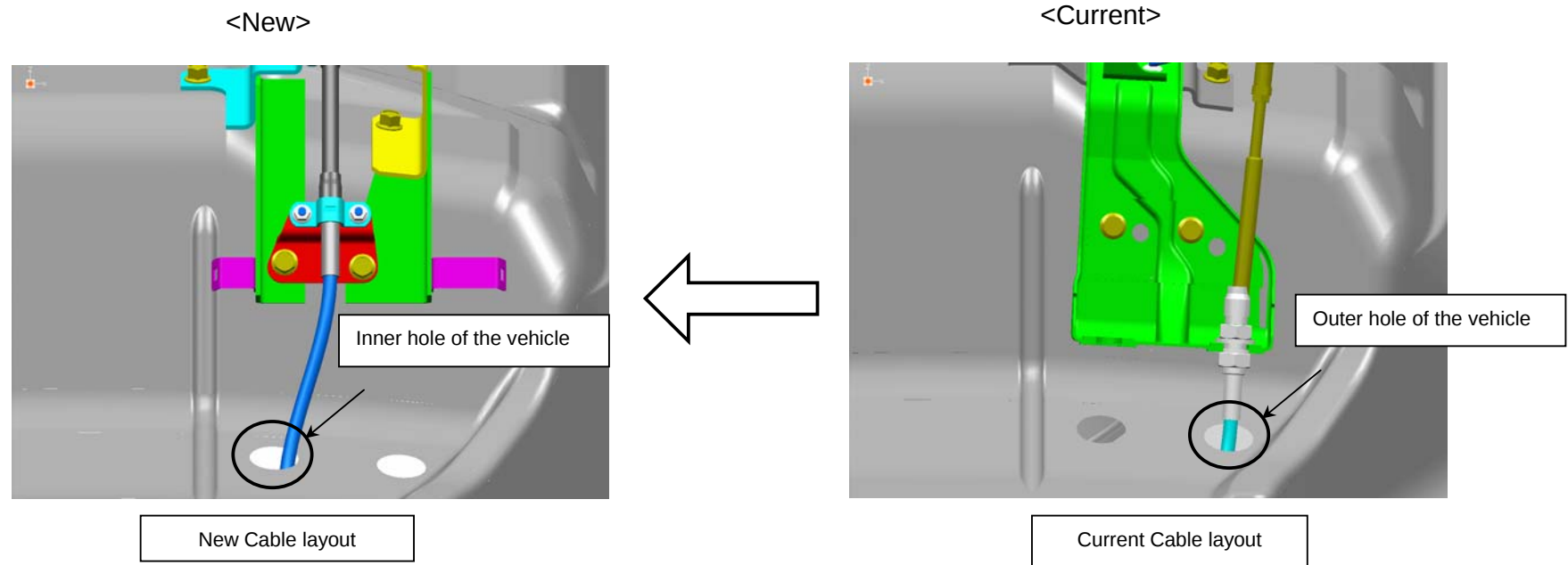


Fig 8. Cable layout in the hole on Cab Floor (Front View)

3. Affix the Cable to the Bracket under Cab Floor as shown in Figure 9.
(Tightening Torque : 3.0~4.4ft-lbs {4~6N·m})

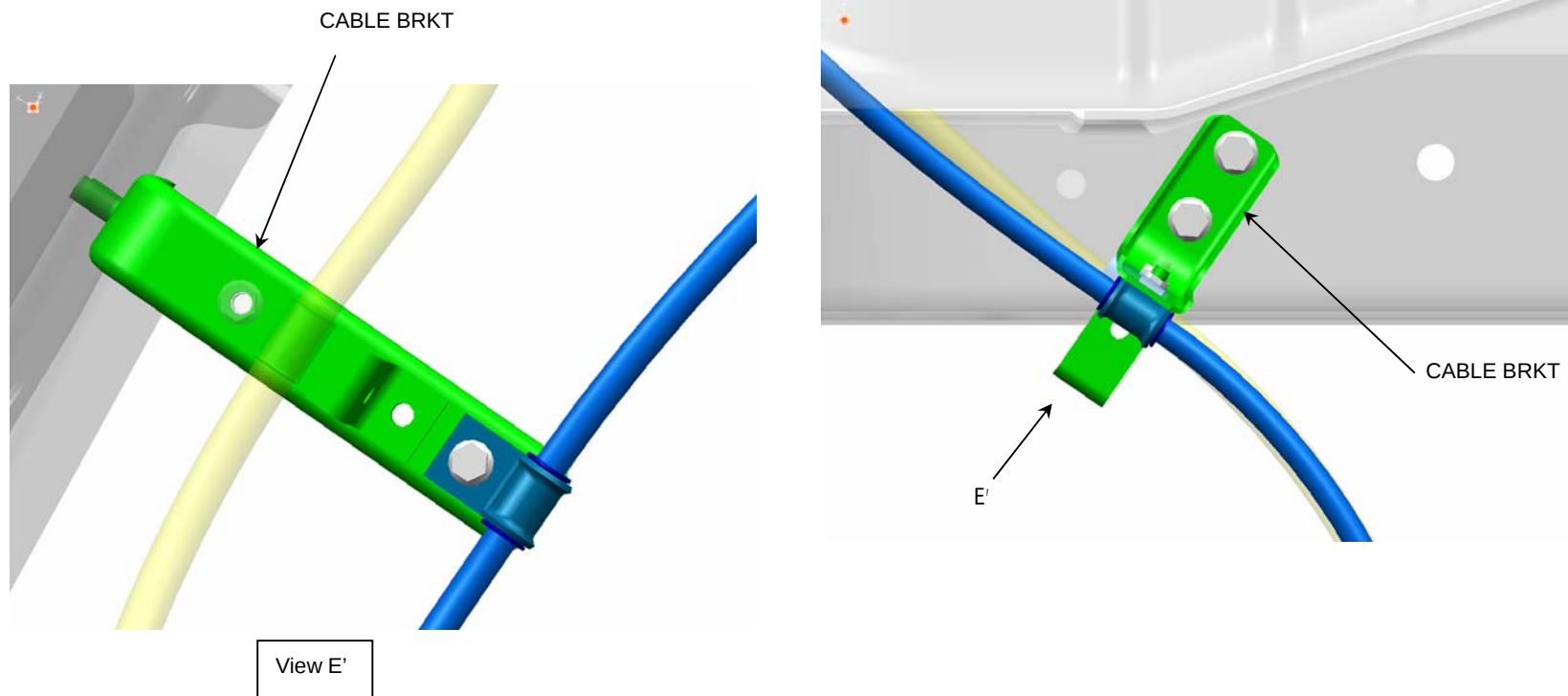


Fig 9. Installation of Cable under the Cab

4. Tilt the Cab down.

INSTALLATION OF COUNTERMEASURE A/T SELECTOR Lever

1. Transfer the white plastic grommets for the console mounting screws to the RH and LH brackets **(4 & 5)**
2. Install LH RANGE SELECTOR BRACKET on the Cab Floor as shown in Figure 10. (Tighten rearward Bolt fully, hand tighten Forward Bolt)
LH RANGE SELECTOR BRACKET ASSEMBLY **(4)**
FLANGE BOLT [10X25] **(12)** (Tightening torque : 36.9~47.9ft-lbs {50~65N·m})
3. Install Selector Bracket RH on the A/T Selector as shown in Figure 11.
RANGE SELECTOR **(3)**
RH RANGE SELECTOR BRACKET ASSEMBLY **(5)**
FLANGE BOLT [6X12] **(13)** (Tightening torque : 5.9~8.9ft-lbs {8~12N·m})

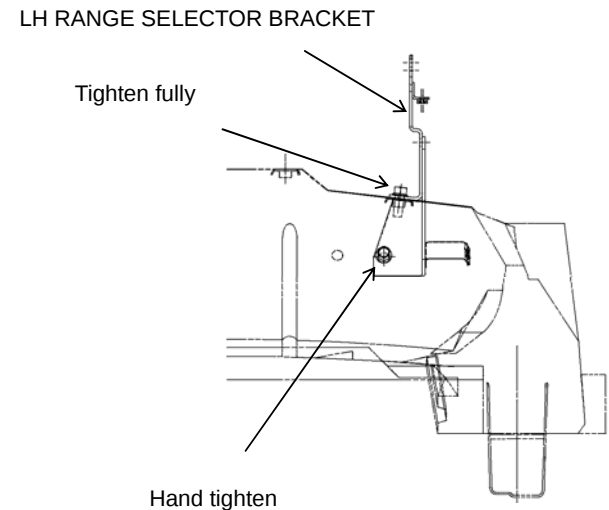


Fig 10. Installation of LH Bracket (Front View)

3. As shown Figure 11, install the pivot **(7)** on the new A/T Shift Control Cable **(16)** and tighten the set screw when the pivot **(7)** aligns with the hole in the range selector **(3)** (the set screw should not protrude from the top surface of the pivot **(7)**).

PIVOT **(7)** (Tightening torque : 1.4~2.2ft-lbs {2~3N·m})

4. Shift the Selector Lever into "L" Position and insert the pivot **(7)** into the Hole of the Lever from right side as shown in Figure 11

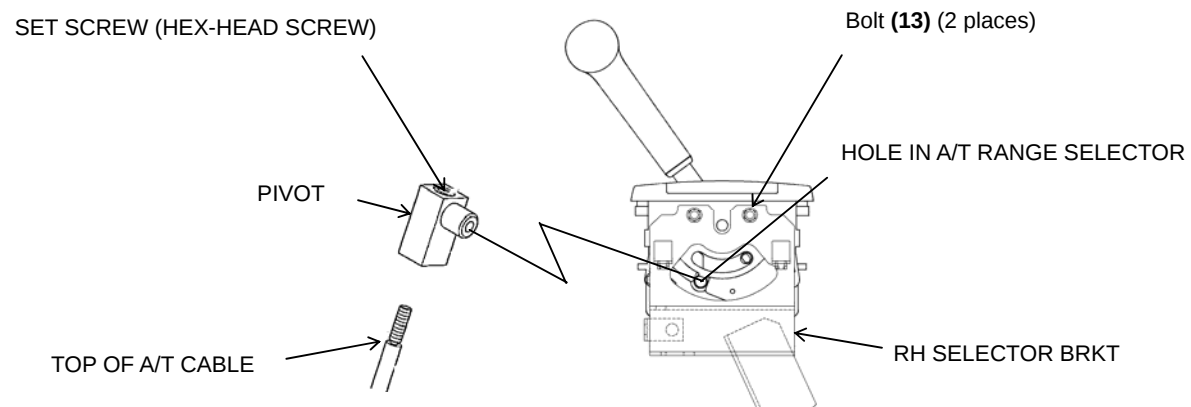


Fig 11. Installation of RH Bracket and A/T Cable. (Right side View)

5. Shift the Selector Lever into “N” Position, and install the Selector and the LH Bracket as shown in Figure 12.

FLANGE BOLT [6X12] **(13)** (Tightening torque: 5.9~8.9ft-lbs {8~12N·m})

6. Install the Selector Bracket to Cab Floor. Tighten Selector Bracket together with the Cable Bracket as shown in Figure 12.

A/T CABLE BRACKET **(8)**

FLANGE BOLT [10X25] **(12)** (Tightening torque: 36.9~47.9ft-lbs {50~65N·m})

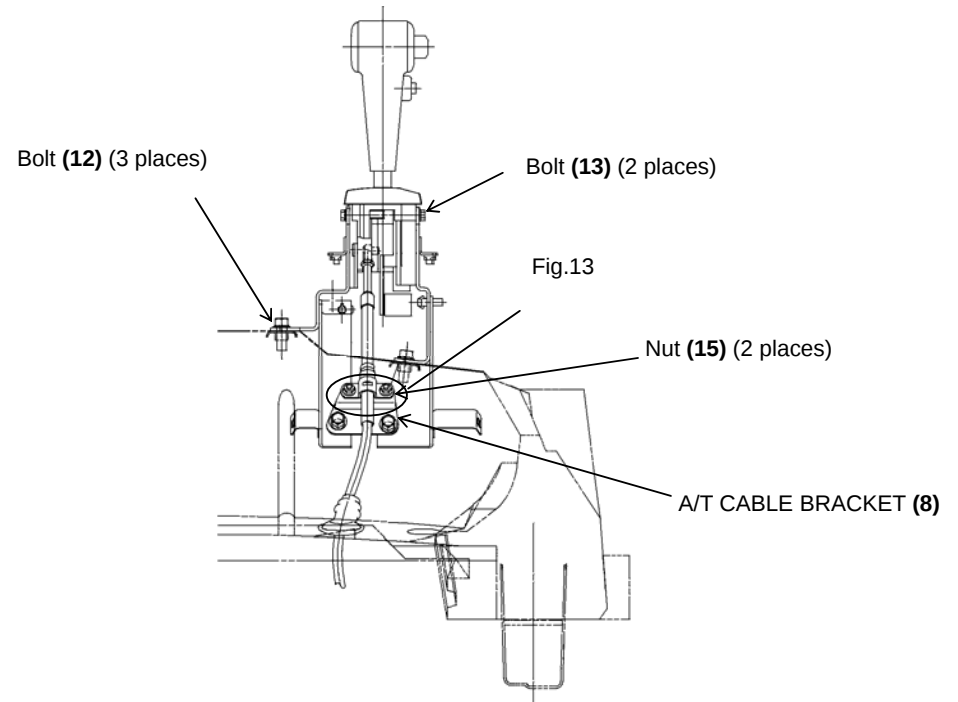


Fig 12. Installation of Selector (Front View)

7. Align the projection of the Cable Clip into the groove on Casing Cap on the Cable, and install the Cable Clip into the Cable Bracket as shown in Figure 12, 13.

CABLE CLAMP **(6)**

FLANGE NUT [6] **(15)** (Tightening torque : 3.0~4.4ft-lbs {4~6N·m})

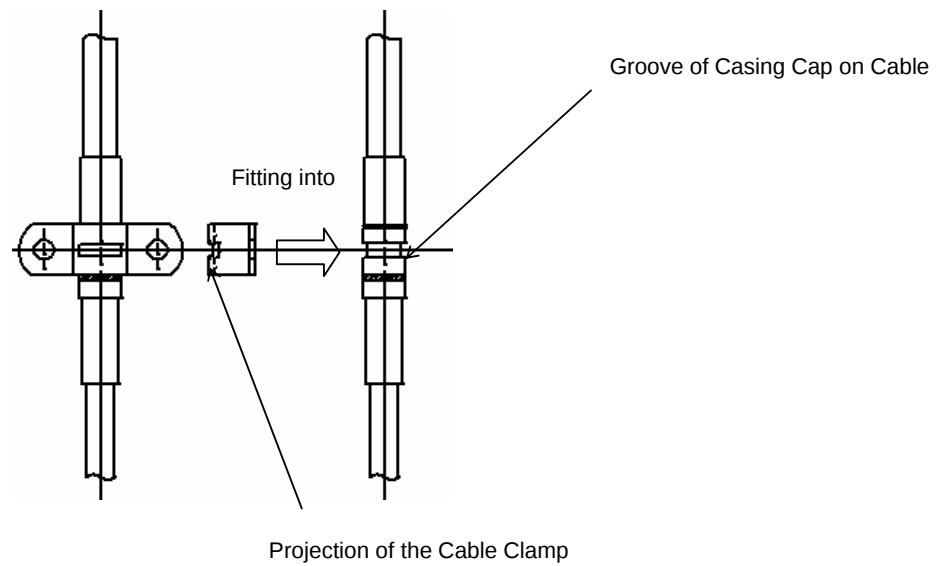
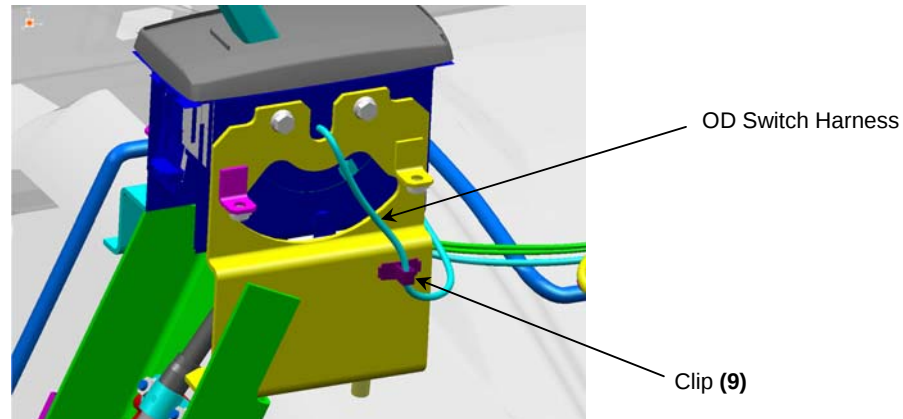


Fig 13. Fitting Clip into groove

8. Install the Clip into Selector Bracket LH and route O/D Switch Harness as shown in the Figure 14.

CLIP (9)

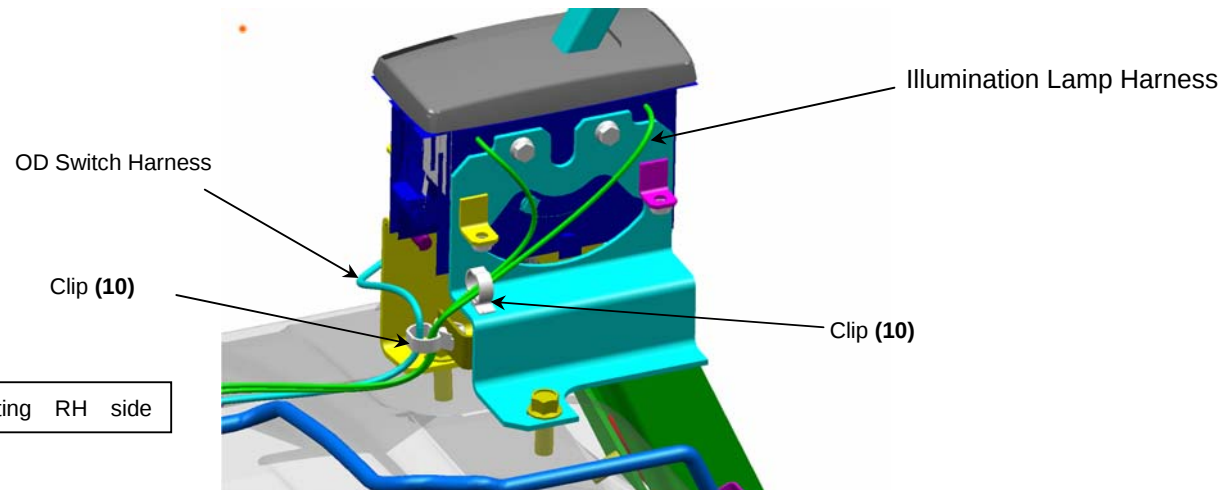
Fig 14. Routing LH side Harness



9. Install the Clip into RH Selector Bracket and route O/D Switch Harness and Illumination Lamp Harness as shown in the Figure 15.

CLIP (10) (2 PLACES)

Fig 15. Routing RH side



10. Reconnect OD Switch Harness Connector and Illumination Lamp Harness Connector to the cab side Connector as shown in Figure 16.

OD-OFF Indicator comes on when OD-Switch activated.

Illumination in Selector comes on when Combination Switch activated.

Secure extra length of Harness with Tie-Wrap Band.

CABLE BAND (11)

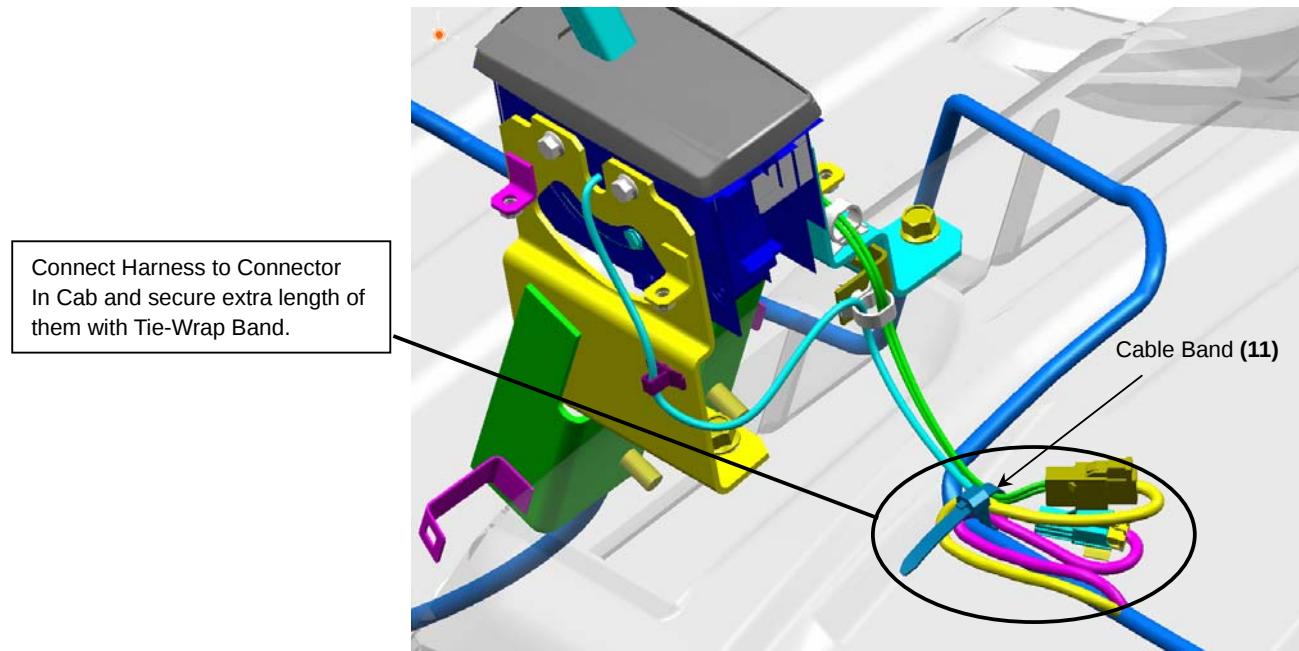


Fig 16. Connecting and securing Harness

11. Transfer the oil level switch and switch blank to the new console.

12. Reconnect the oil lever switch.

13. Install Shift Lever Console as shown in Figure 17.

SHIFT LEVER CONSOLE ASSEMBLY (17)

Install the Grommet Screws into the holes on Selector Bracket (Both LH and RH, 2 places).

Install Console with Tapping Screw.

SHIFT LEVER CONSOLE (17)

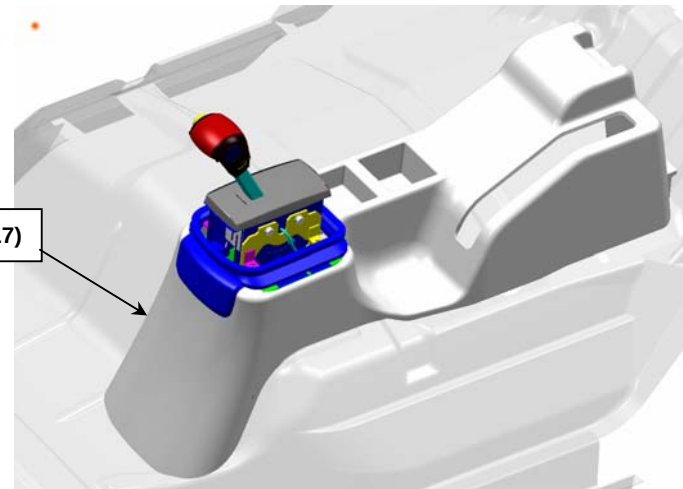


Fig 17. Installation of Shift Lever Console (17)

14. Install Selector Cover as shown in Figure 18.

Install Selector Cover Lower to the Selector (Both LH and RH) Bracket with 4 Screws.

LOWER RANGE SELECTOR COVER (1)

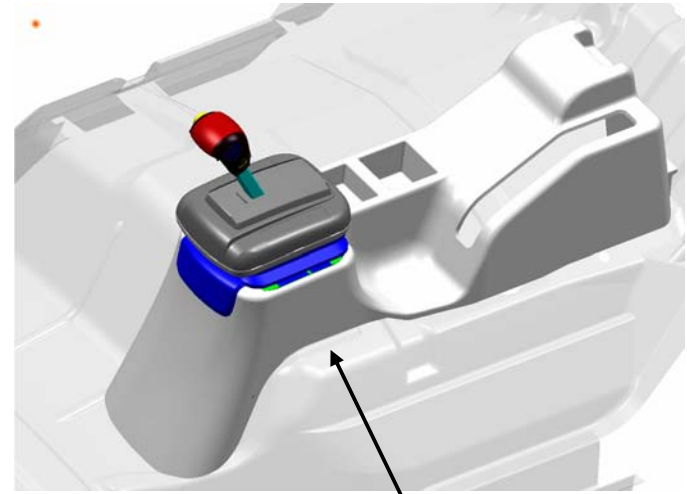
ASSEMBLED SCREW & WASHER [6X16] (14)

(TIGHTENING TORQUE : 3.0~4.4ft-lbs {4~6N·m})

Install Selector Cover Upper into the Selector Cover Lower.

UPPER RANGE SELECTOR COVER (2)

15. Adjust parking brake cable following Service Manual procedures.



F'

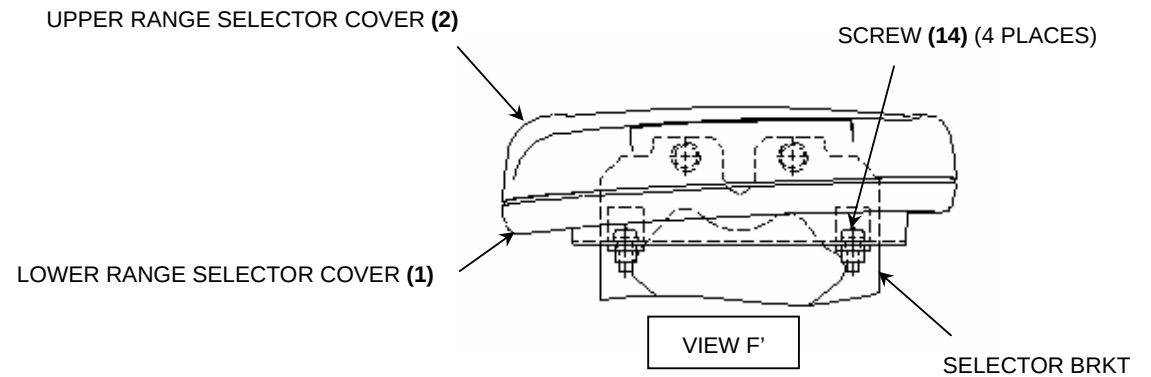


Fig 18. installation of Selector Cover

16. Replace the orange Proper Parking Procedures warning label with countermeasure label **(18)** as shown in Figure 19.

ORANGE PROPER PARKING PROCEDURES LABEL **(18)**

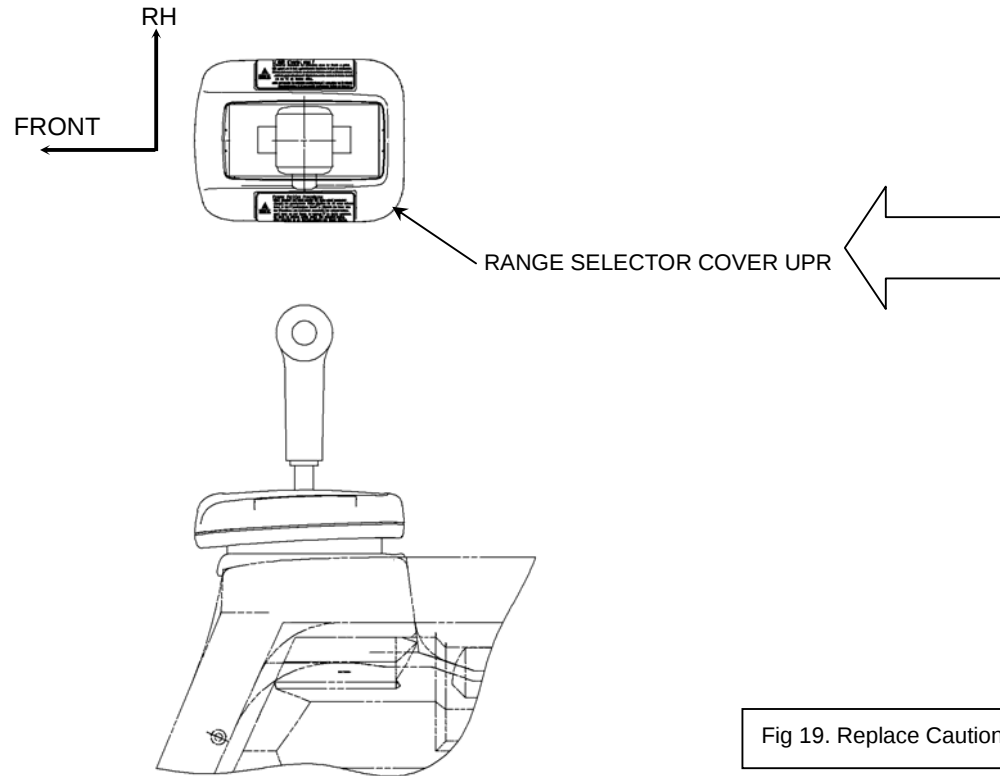
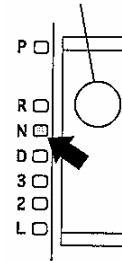


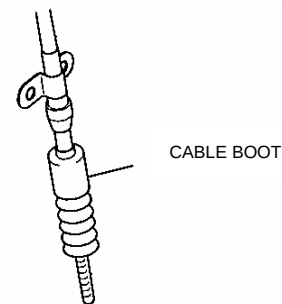
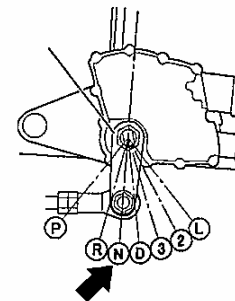
Fig 19. Replace Caution Plate

INSTALL ADJUSTER PART OF THE CABLE

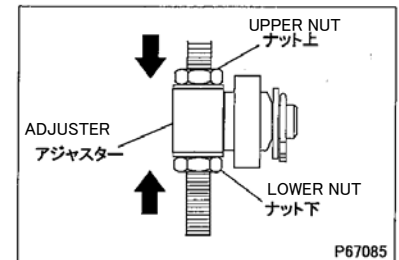
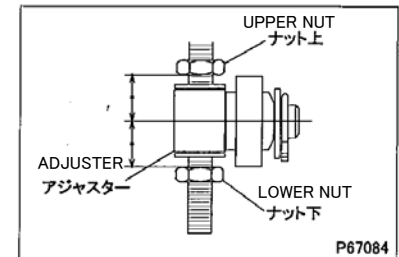
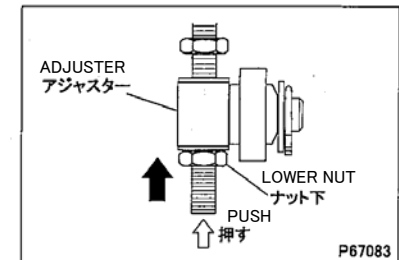
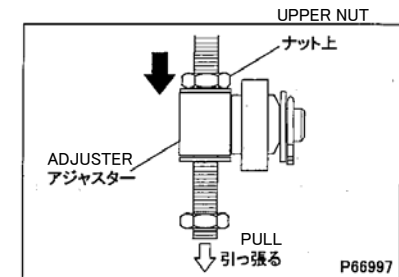
1. Align Control lever on A/T Assy. into "N" Position, and then align Selector lever into "N" Position
If the Cable Boot is twisted, straighten the Boot.
2. Pull down the end of the Wire of A/T Shift Control Cable.
3. While pulling the Wire, tighten the upper Nut by hand until the Nut touches the Adjuster.
4. Push the Wire end up using the same force as pulling down.
5. While pushing the Wire, tighten lower Nut by hand until the Nut touches to Adjuster.
6. Release the load and align the Adjuster at the center of the upper and the lower Nuts.
7. Tighten the upper Nut by hand until it touches to Adjuster
8. Tighten the lower Nut by hand until it touches to Adjuster.
9. Torque upper or lower Nut.
(tightening torque : 3.0~4.4ft-lbs {4~6N·m})

RANGE
SELECTOR

CONTROL LEVER



CABLE BOOT



CAUTION: When tightening the nut, do not move the position of the adjuster.

Cable Adjustment Procedure

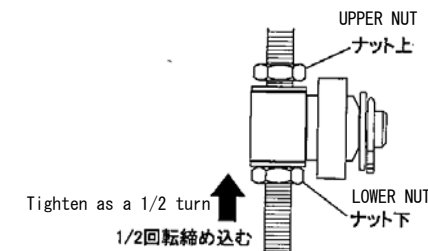
1. Park the Vehicle on a flat ground. Apply the Parking Brake and chock the wheels securely.
2. Shift Selector Lever to "P" Position.
3. Turn the starter switch to ON. (Do not start the engine.)
4. Shift the Selector Lever from "P" to "R" Position, and ensure that Back-up Buzzer sounds.
5. Shift the Selector Lever very slowly from "R" to "P" Position and ensure that Back Buzzer stops to sound.
6. Shift Selector Lever from "P" to "L" Position and from "L" to "P" Position, and check the operating forces (from "P" to "L" Position) and (from "L" to "P" Position) are same. And also, check the smoothness and click stop feeling.
7. If there are no problem, install Control Cover and finish. (Bolt and Nut tightening torque : 7.4~11.1ft-lbs {10~15N·m})
If there are any problem, perform Cable adjustment after mentioned

Adjustment

In case of any symptom below is found, please try below step 1, 2 and 3.

- ① Back-up Buzzer sounds when Selector Lever is in "P" Position.
- ③ Firm gear selection engagement is lacking when shifting the Selector from the "L" to "P" range direction.

1. Loosen the upper Nut, and tighten the lower Nut by 1/2 turn.
2. Tighten the upper Nut. (tightening torque : 3.0~4.4ft-lbs {4~6N·m})
3. Re-perform the inspection described previously again and repeat the adjustment if there are any problem.



In case of any symptom below is found, please try below step 1, 2 and 3.

①the indication in Allison's diagnosis tool shows misalignment toward "P" position.

②Back Buzzer does not sound when Selector Lever is in "R" Position.

③click stop feeling is lacking in pushing Selector when shifting the selector from "P" to "L" range direction.

1. Loosen the lower Nut, and tighten the upper Nut by 1/2 turn.
2. Tighten lower Nut. (tightening torque : 3.0~4.4ft-lbs {4~6N·m})
3. Perform the inspection described previously again and repeat the adjustment if there are any problem.

