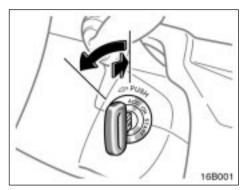
# <u>SECTION 1-7</u>

# OPERATION OF INSTRUMENTS AND CONTROLS

Ignition switch, Transmission and Parking brake

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# Ignition switch



"START"—Starter motor on. The key will return to the "ON" position when released.

For starting tips, see page 142.

"ON"—Engine on and all accessories on.

This is the normal driving position.

"ACC"—Accessories such as the radio operate, but the engine is off.

If you leave the key in the "ACC" or "LOCK" position and open the driver's door, a buzzer will remind you to remove the key.

"LOCK"—Engine is off and the steering wheel is locked. The key can be removed only at this position.

You must push in the key to turn the key from "ACC" to the "LOCK" position. On vehicles with an automatic transmission, the selector lever must be put in the "P" position before pushing the key.

When starting the engine, the key may seem stuck at the "LOCK" position. To free it, first be sure the key is pushed all the way in, and then rock the steering wheel slightly while turning the key gently.

Approximately five hours after the engine is turned off, you may hear a sound coming from underneath the luggage compartment for several minutes. This is normal operation and does not indicate a malfunction. (See "Leak detection pump" on page ix.)

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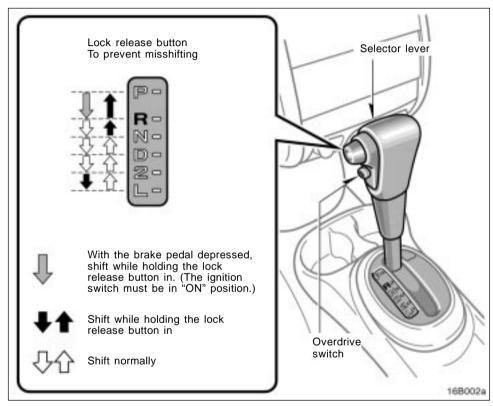
For manual transmission:

Never remove the key when the vehicle is moving, as this will lock the steering wheel and result in loss of steering control.

# NOTICE

Do not leave the key in the "ON" position if the engine is not running. The battery will discharge and the ignition could be damaged.

# Automatic transmission



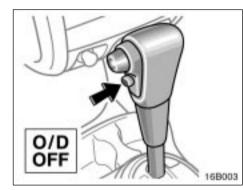
Your automatic transmission has a shift lock system to minimize the possibility of incorrect operation. This means you can only move out of "P" position when the brake pedal is depressed (with the ignition switch in "ON" position and the lock release button depressed).

#### (a) Selector lever

The shift position is also displayed on the instrument cluster.

- P: Parking, engine starting and key removal
- R: Reverse
- N: Neutral
- **D:** Normal driving (with overdrive on)
- 2: Stronger engine braking
- L: Maximum engine braking

# 05.05.20



#### (b) Overdrive switch

You can select either third gear (with overdrive off) or fourth gear (with overdrive on) by pushing this switch.

To turn the overdrive off, push the switch. The "O/D OFF" indicator light should come on. To turn the overdrive on again, push the switch again. The "O/D OFF" indicator light should go off.

Always drive your vehicle with the overdrive on for better fuel economy and quieter driving.

If the engine is turned off when the overdrive is off and restarted, the overdrive will automatically be on.

#### (c) Normal driving

- Start the engine as instructed in "How to start the engine" on page 142. The transmission must be in "P" or "N".
- 2. With your foot holding down the brake pedal, shift the selector lever to "D".

When the lever is in the "D" position, the automatic transmission system will select the most suitable gear for running conditions such as normal cruising, hill climbing, hard towing, etc.

Always turn the overdrive on for better fuel economy and quieter driving. If the engine coolant temperature is low, the transmission will not shift into overdrive gear even with the overdrive on.

# 

Never put your foot on the accelerator pedal while shifting.

3. Release the parking brake and brake pedal. Depress the accelerator pedal slowly for smooth starting.

#### (d) Using engine braking

To use engine braking, you can downshift the transmission as follows:

- Push the overdrive switch. The "O/D OFF" indicator light will come on and the transmission will downshift to third gear.
- Shift into the "2" position. The transmission will downshift to second gear when the vehicle speed drops down to or lower than 89 km/h (55 mph), and stronger engine braking will be enabled.
- Shift into the "L" position. The transmission will downshift to first gear when the vehicle speed drops down to or lower than 44 km/h (27 mph), and maximum engine braking will be enabled.

# 

Be careful when downshifting on a slippery surface. Abrupt shifting could cause the vehicle to skid or spin.

# (e) Using "2" and "L" positions

The "2" and "L" positions are used for strong engine braking as described previously.

With the selector lever in "2" or "L", you can start the vehicle in motion as with the lever in "D".

With the selector lever in "2", the vehicle will start in first gear and automatically shift to second gear.

With the selector lever in "L", the transmission is engaged in first gear.

# NOTICE

Be careful not to over-rev the engine. The approximate maximum allowable speed for each position is given below for your reference:

> "2"..... 107 km/h (66 mph) "L"..... 58 km/h (36 mph)

Do not continue hill climbing for a long time in the "2" or "L" position. This may cause severe automatic transmission damage from overheating. To prevent such damage, "D" position should be used in hill climbing.

# (f) Backing up

1. Bring the vehicle to a complete stop.

2. With the brake pedal held down with your foot, shift the selector lever to the "R" position.

## NOTICE

Never shift into reverse while the vehicle is moving.

#### (g) Parking

- 1. Bring the vehicle to a complete stop.
- 2. Pull the parking brake lever up fully to securely apply the parking brake.
- 3. With the brake pedal pressed down, shift the selector lever to the "P" position.

# **AUTION**

While the vehicle is moving, never attempt to move the selector lever into "P" position under any circumstances. Serious mechanical damage and loss of vehicle control may result.

#### (h) Good driving practice

If the transmission repeatedly shifts up and down between third gear and overdrive when climbing a gentle slope, the overdrive switch should be turned off. Be sure to turn the switch on immediately afterward.

# 

Always keep your foot on the brake pedal while stopped with the engine running. This prevents the vehicle from creeping.

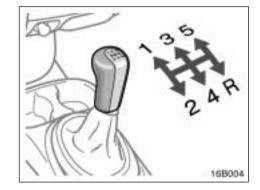
# NOTICE

Always use the brake pedal or the parking brake to hold the vehicle on an upgrade. Do not attempt to hold the vehicle using the accelerator pedal, as this can cause the transmission to overheat.

#### (i) If you cannot move the selector lever out of "P" position

If you cannot shift the selector lever from "P" position even though the brake pedal is depressed, use the shift lock override button. For instructions, see "If you cannot shift automatic transmission selector lever" on page 170.

# Manual transmission



# The shift pattern is conventional as shown above.

Press the clutch pedal down fully while shifting, and then release it slowly. Do not rest your foot on the pedal while driving, because it will cause clutch trouble. Do not use the clutch to hold the vehicle when stopped on an uphill grade—use the parking brake.

#### Recommended shifting speeds

The transmission is fully synchronized and upshifting or downshifting is easy.

For the best compromise between fuel economy and vehicle performance, you should upshift or downshift at the following speeds:

gear	km/h (mph)
1 to 2 or 2 to 1	24 (15)
2 to 3 or 3 to 2	40 (25)
3 to 4 or 4 to 3	64 (40)
4 to 5 or 5 to 4	72 (45)

Downshift to the appropriate gear if acceleration is needed when you are cruising below the above downshifting speeds.

Upshifting too soon or downshifting too late will cause lugging, and possibly pinging. Regularly revving the engine to maximum speed in each gear will cause excessive engine wear and high fuel consumption.

## Maximum allowable speeds

To get on a highway or to pass slower traffic, maximum acceleration may be necessary. Make sure you observe the following maximum allowable speeds in each gear:

gear	km/h (mph)
1	47 (29)
2	88 (55)
3	128 (79)

## NOTICE

Do not downshift if you are going faster than the maximum allowable speed for the next lower gear.

#### Good driving practice

If it is difficult to shift into reverse, put the transmission in neutral, release the clutch pedal momentarily, and then try again.

# 

Be careful when downshifting on a slippery surface. Abrupt shifting could cause the vehicle to skid or spin.

## NOTICE

Make sure the vehicle is completely stopped before shifting into reverse.

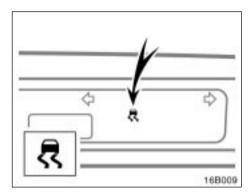
# **Traction control system**

The traction control system automatically helps prevent the spinning of front wheels when the vehicle is started or accelerated on slippery road surfaces.

When the ignition key is turned to "ON" position, the system automatically turns on.

# 

Under certain slippery road conditions, full traction of the vehicle and power against front wheels cannot be maintained, even though the traction control system is in operation. Do not drive the vehicle under any speed or maneuvering conditions which may cause the vehicle to lose traction control. In situations where the road surface is covered with ice or snow, your vehicle should be fitted with snow tires or tire chains. Always drive at an appropriate and cautious speed for the present road conditions.



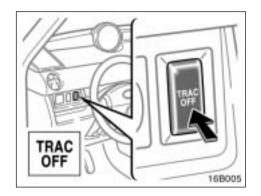
#### NORMAL DRIVING MODE

Leave the system on during the ordinary driving so that it can operate when needed.

You may hear a sound in the engine compartment for a few seconds just after the vehicle begins to move. This means that the traction control system is in the self-check mode, but does not indicate a malfunction. When the traction control system is operating, the following conditions occur:

- The system controls the spinning of the front wheels. At this time, the slip indicator light blinks.
- You may feel vibration or noise in your vehicle, caused by operation of the brakes. This indicates the system is functioning properly.

The slip indicator light comes on for a few seconds when the ignition key is turned to "ON" position. If the indicator light does not come on when the ignition is turned on, contact your Scion dealer.



## TRACTION CONTROL OFF MODE

When getting the vehicle out of mud or newly fallen snow, etc., turn off the traction control system. This system that controls engine performance interferes with the process of freeing your wheels.

To turn off: Push "TRAC OFF" switch.

The "TRAC OFF" indicator light will come on.

The vehicle stability control system is always activated, even if the traction control system is turned off.

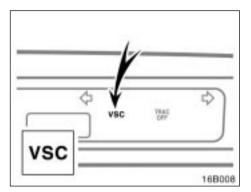
To turn on: Push "TRAC OFF" switch once again.

The "TRAC OFF" indicator light will go off.

"TRAC OFF" indicator light comes on for a few seconds when the ignition key is turned to "ON" position. It will come on again when you push the "TRAC OFF" switch to turn off the system.

In the following cases, contact your Scion dealer:

- When the ignition key is turned to "ON" position, the light does not come on or remains on.
- The indicator light comes on with the normal driving mode while driving.



#### "VSC" warning light

This light warns that there is a problem somewhere in the traction control system or the vehicle stability control system.

The light will come on when the ignition key is turned to "ON" position and will go off after a few seconds.

If the light comes on while driving, the traction control system and vehicle stability control system do not work. However, as conventional braking operates when applied, there is no problem to continue your driving. In the following cases, contact your Scion dealer:

- When the ignition key is turned to "ON" position, the light does not come on or remains on.
- The warning light comes on while driving.

The "TRAC OFF" indicator light will come on when the "VSC" warning light comes on even if the "TRAC OFF" switch is not pushed.

# Vehicle stability control system

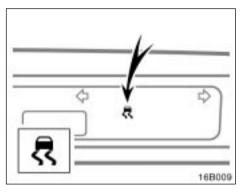
The vehicle stability control system helps provide integrated control of the systems such as an anti-lock brake system, traction control, engine control, etc. This system automatically controls the brakes and engine to help prevent the vehicle from skidding when cornering on a slippery road surface or operating steering wheel abruptly.

This system activates when the vehicle speed is about more than 15 km/h (9 mph).

You may hear a sound in the engine compartment for a few seconds just after the vehicle begins to move. This means that the system is in the self-check mode, but does not indicate a malfunction.

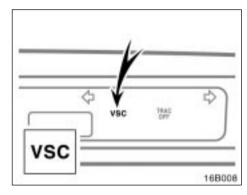
# 

- Do not rely excessively on the vehicle stability control system. Even if the vehicle stability control system is operating, you must always drive carefully and attentively to avoid serious injury. Reckless driving will result in an accident. If the slip indicator light flashes, sounding an alarm, special care should be taken while driving.
- Only use tires of specified size. The size, manufacturer, brand and tread pattern for all 4 tires should be the same. If you use the tires other than specified, or different type or size, the vehicle stability control system may not function correctly. When replacing the tires or wheels, contact your Scion dealer. (See "Checking and replacing tires" on page 201.)
- In situations where the road surface is covered with ice or snow, your vehicle should be fitted with snow tires or tire chains.



If the vehicle is going to skid during driving, the slip indicator light blinks and an alarm sounds intermittently. Special care should be taken while driving.

The slip indicator light comes on for a few seconds when the ignition key is turned to "ON" position. If the indicator light does not come on when the ignition is turned on, contact your Scion dealer.

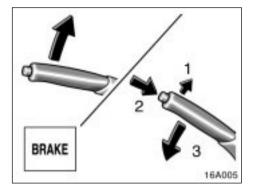


In the following cases, contact your Scion dealer:

- When the ignition key is turned to "ON" position, the light does not come on or remains on.
- The warning light comes on while driving.

The "TRAC OFF" indicator light will come on when the "VSC" warning light comes on even if the "TRAC OFF" switch is not pushed.

# Parking brake



# When parking, firmly apply the parking brake to avoid inadvertent creeping.

To set: Pull up the lever. For better holding power, first depress the brake pedal and hold it while setting the parking brake.

To release: Pull up the lever slightly (1), press the lock release button (2), and lower (3).

To remind you that the parking brake is set, the parking brake reminder light in the instrument cluster remains on until you release the parking brake.

# "VSC" warning light

This light warns that there is a problem somewhere in the vehicle stability control system or the traction control system.

The light will come on when the ignition key is turned to "ON" position and will go off after a few seconds.

If the light comes on while driving, the vehicle stability control system and traction control system do not work. However, as conventional braking operates when applied, there is no problem to continue your driving. 05.05.20

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Before driving, be sure the parking brake is fully released and the parking brake reminder light is off.