

## 2001 MY for Shift Solenoid "B" Electrical (Shift Solenoid Valve S2) Monitor (P0758)

## 2001 MY for Pressure Control Solenoid "B" Electrical (Shift Solenoid Valve SL2) Monitor (P0758)

To return to monitor description, see page [Cm-271](#).

|                             |            |                           |
|-----------------------------|------------|---------------------------|
| Required sensors/Components | Main       | Shift solenoid valve No.2 |
|                             | Sub        | None                      |
| Frequency of operation      | Continuous |                           |
| Duration                    | 0.5 sec.   |                           |
| MIL operation               | Immediate  |                           |
| Sequence of operation       | None       |                           |

### TYPICAL ENABLING CONDITIONS

| Item                                                              |  | Specification                  |         |
|-------------------------------------------------------------------|--|--------------------------------|---------|
|                                                                   |  | Minimum                        | Maximum |
| The monitor will run whenever the following DTCs are not present. |  | See page <a href="#">In-39</a> |         |

| Engine family                                                                       | Item                                 | Specification |         |
|-------------------------------------------------------------------------------------|--------------------------------------|---------------|---------|
|                                                                                     |                                      | Minimum       | Maximum |
| 1MZ-FE (CAMRY, CAMRY SOLA-<br>RA), 5VZ-FE, 3UZ-FE, 2JZ-GE,<br>1ZZ-FE, 1NZ-FE, 5S-FE | <b>Range check (Low resistance)</b>  |               |         |
|                                                                                     | Solenoid                             | ON (2 times)  |         |
|                                                                                     | <b>Range check (High resistance)</b> |               |         |
|                                                                                     | Solenoid                             | OFF (2 times) |         |

|                                        |                               |               |                |
|----------------------------------------|-------------------------------|---------------|----------------|
| 1MZ-FE (RX300, SIENNA, AVA-LON, ES300) | Range check (Low resistance)  |               |                |
|                                        | Solenoid                      | ON (2 times)  |                |
|                                        | Range check (High resistance) |               |                |
|                                        | Solenoid                      | OFF (2 times) |                |
|                                        | Range check (A)               |               |                |
|                                        | Battery voltage               | 10 V or more  | Less than 12 V |
|                                        | Target duty                   | -             | Less than 75 % |
|                                        | Starter                       | OFF           |                |
|                                        | Range check (B)               |               |                |
|                                        | Battery voltage               | 12 V or more  | -              |
|                                        | Starter                       | OFF           |                |
|                                        | Range check (C)               |               |                |
|                                        | Starter                       | OFF           |                |
|                                        | Range check (D)               |               |                |
|                                        | Battery voltage               | 11 V or more  | -              |
|                                        | Starter                       | OFF           |                |
|                                        | Range check (E)               |               |                |
|                                        | Battery voltage               | 11 V or more  | -              |
|                                        | CPU commanded duty            | 19 % or more  | -              |
|                                        | Starter                       | OFF           |                |
| 2ZZ-FE, 1AZ-FE                         | Battery voltage               | 11 V or more  | -              |
|                                        | CPU commanded duty            | 19 % or more  | -              |
|                                        | Starter                       | OFF           |                |
| 1MZ-FE (HIGH LANDER)                   | Condition (A)                 |               |                |
|                                        | Battery voltage               | 10 V or more  | Less than 12 V |
|                                        | Target duty                   | -             | Less than 75 % |
|                                        | Starter                       | OFF           |                |
|                                        | Condition (B)                 |               |                |
|                                        | Battery voltage               | 12 V or more  | -              |
|                                        | Starter                       | OFF           |                |
|                                        | Condition (C)                 |               |                |
| Starter                                | OFF                           |               |                |
| 2AZ-FE                                 | Range check (Low resistance)  |               |                |
|                                        | Solenoid                      | ON (2 times)  |                |
|                                        | Range check (High resistance) |               |                |
|                                        | Solenoid                      | OFF (2 times) |                |
|                                        | Range check                   |               |                |
|                                        | Battery voltage               | 11 V or more  | -              |
|                                        | CPU commanded duty            | 19 % or more  | -              |
|                                        | Starter                       | OFF           |                |
| 2UZ-FE                                 | Range check (Low resistance)  |               |                |
|                                        | Solenoid                      | ON (2 times)  |                |
|                                        | Range check (High resistance) |               |                |
|                                        | Solenoid                      | OFF (2 times) |                |
|                                        | Range check                   |               |                |
|                                        | Output duty                   | 90 % or more  | -              |

## Component T/M Outputs – Solenoid

|        |                               |               |   |
|--------|-------------------------------|---------------|---|
| 3RZ-FE | Range check (Low resistance)  |               |   |
|        | Solenoid                      | ON (2 times)  |   |
|        | Range check (High resistance) |               |   |
|        | Solenoid                      | OFF (2 times) |   |
|        | Range check                   |               |   |
|        | CPU commanded duty            | 100 % or more | — |

## TYPICAL MALFUNCTION THRESHOLDS

| Engine family                                                                     | Detection criteria                   | Threshold              |
|-----------------------------------------------------------------------------------|--------------------------------------|------------------------|
| 1MZ-FE (CAMRY, CAMRY SOLARA),<br>5VZ-FE, 3UZ-FE, 2JZ-GE, 1ZZ-FE,<br>1NZ-FE, 5S-FE | <b>Range check (Low resistance)</b>  |                        |
|                                                                                   | Solenoid resistance                  | 8 $\Omega$ or less     |
|                                                                                   | <b>Range check (High resistance)</b> |                        |
|                                                                                   | Solenoid resistance                  | 100 k $\Omega$ or more |
| 1MZ-FE (RX300, SIENNA, AVALON,<br>ES300)                                          | <b>Range check (Low resistance)</b>  |                        |
|                                                                                   | Solenoid resistance                  | 8 $\Omega$ or less     |
|                                                                                   | <b>Range check (High resistance)</b> |                        |
|                                                                                   | Solenoid resistance                  | 100 k $\Omega$ or more |
|                                                                                   | <b>Range check (A)</b>               |                        |
|                                                                                   | Output signal duty                   | 100 % or more          |
|                                                                                   | <b>Range check (B)</b>               |                        |
|                                                                                   | Output signal duty                   | 100 % or more          |
|                                                                                   | <b>Range check (C)</b>               |                        |
|                                                                                   | Output signal duty                   | 3 % or less            |
|                                                                                   | <b>Range check (D)</b>               |                        |
|                                                                                   | Solenoid current                     | 330 mA or less         |
|                                                                                   | <b>Range check (E)</b>               |                        |
|                                                                                   | Solenoid current                     | 330 mA or less         |
| 2ZZ-GE, 1AZ-FE                                                                    | Solenoid current                     | 330 mA or less         |
| 1MZ-FE (HIGH LANDER)                                                              | <b>Condition (A)</b>                 |                        |
|                                                                                   | Output signal duty                   | 100 % or more          |
|                                                                                   | <b>Condition (B)</b>                 |                        |
|                                                                                   | Output signal duty                   | 100 % or more          |
|                                                                                   | <b>Condition (C)</b>                 |                        |
|                                                                                   | Output signal duty                   | 3 % or less            |
| 2AZ-FE, 3RZ-FE                                                                    | <b>Range check (Low resistance)</b>  |                        |
|                                                                                   | Solenoid resistance                  | 8 $\Omega$ or less     |
|                                                                                   | <b>Range check (High resistance)</b> |                        |
|                                                                                   | Solenoid resistance                  | 100 k $\Omega$ or more |
|                                                                                   | <b>Range check</b>                   |                        |
|                                                                                   | Solenoid current                     | More than 330 mA       |

|        |                                      |                        |
|--------|--------------------------------------|------------------------|
| 2UZ-FE | <b>Range check (Low resistance)</b>  |                        |
|        | Solenoid resistance                  | 8 $\Omega$ or less     |
|        | <b>Range check (High resistance)</b> |                        |
|        | Solenoid resistance                  | 100 k $\Omega$ or more |
|        | <b>Range check</b>                   |                        |
|        | Solenoid current                     | 330 mA or less         |
|        | Output signal duty                   | 100 % or 0 %           |