

| | | |
|--|---------------------------|--------------------------------------|
| Last Modified: 12-04-2024 | 6.11:8.1.0 | Doc ID: RM100000028VR6 |
| Model Year Start: 2023 | Model: Prius Prime | Prod Date Range: [12/2022 -] |
| Title: PARK ASSIST / MONITORING: INTUITIVE PARKING ASSIST SYSTEM: C1AE596; Ultrasonic Sensor (Front Right Side) Component Internal Failure; 2023 - 2024 MY Prius Prius Prime [12/2022 -] | | |

| | | |
|------------|----------------|--|
| DTC | C1AE596 | Ultrasonic Sensor (Front Right Side) Component Internal Failure |
|------------|----------------|--|

DESCRIPTION

The front side ultrasonic sensor (FRS sensor) is installed on the front bumper. The clearance warning ECU assembly detects obstacles based on signals it receives from the front side ultrasonic sensor (FRS sensor). If an open circuit or other malfunction occurs in the front side ultrasonic sensor (FRS sensor), the front side ultrasonic sensor (FRS sensor) does not operate correctly.

| DTC NO. | DETECTION ITEM | DTC DETECTION CONDITION | TROUBLE AREA | DTC OUTPUT FROM | PRIORITY |
|---------|---|---|---|-------------------|----------|
| C1AE596 | Ultrasonic Sensor (Front Right Side) Component Internal Failure | Front side ultrasonic sensor (FRS sensor) failure | <ul style="list-style-type: none"> Front side ultrasonic sensor (FRS sensor) Clearance warning ECU assembly | Clearance Warning | B |

CAUTION / NOTICE / HINT

NOTICE:

- Perform registration after replacing and installing the ultrasonic sensor or clearance warning ECU assembly.

[Click here](#) INFO

- If a DTC is detected again after the repair, turn the ignition switch to ON and turn the intuitive parking assist system on, and then clear the DTC.

PROCEDURE

| | |
|-----------|----------------------|
| 1. | CHECK FOR DTC |
|-----------|----------------------|

(a) Check for DTCs.

Body Electrical > Clearance Warning > Trouble Codes

| RESULT | PROCEED TO |
|--------------------------------|------------|
| DTCs are not output | A |
| C1AE587 and C1AE596 are output | B |

| RESULT | PROCEED TO |
|--------------------------------------|------------|
| C1AE596 is output | C |
| None of the above conditions are met | D |

A ► [USE SIMULATION METHOD TO CHECK](#)

B ► [GO TO DTC \(C1AE587\)](#)

D ► [GO TO DTC CHART](#) [INFO](#)

C



2. REPLACE FRONT SIDE ULTRASONIC SENSOR (FRS SENSOR)

(a) Replace the front side ultrasonic sensor (FRS sensor) with a known good one.

HINT:

- [Click here](#) [INFO](#)
- All of the sensors are interchangeable. To confirm whether a sensor is functioning normally, switch it with a known good sensor from the other end of the vehicle.

NEXT



3. CLEAR DTC

(a) Clear the DTCs.

Body Electrical > Clearance Warning > Clear DTCs

NEXT



4. CHECK FOR DTC

(a) Check for DTCs.

Body Electrical > Clearance Warning > Trouble Codes

| RESULT | PROCEED TO |
|--------------------------------------|------------|
| DTCs are not output | A |
| C1AE596 is output | B |
| None of the above conditions are met | C |

A ► **END (FRONT SIDE ULTRASONIC SENSOR [FRS SENSOR] WAS DEFECTIVE)**

B ► **REPLACE CLEARANCE WARNING ECU ASSEMBLY**

C ► **GO TO DTC CHART** [INFO](#)

