DIAR2-01

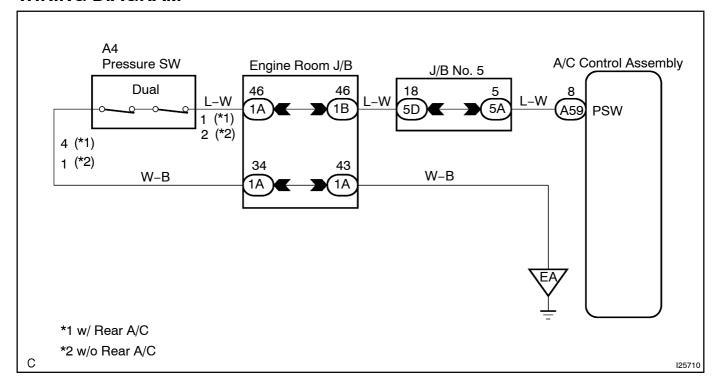
DTC	23	Pressure Switch Circuit
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## **CIRCUIT DESCRIPTION**

The pressure switch sends the appropriate signals to the A/C amprifier when the A/C refrigerant pressure drops too low or rises too high. When the A/C amplifier receives these signals, it output signals via the A/C amplifier to switch OFF the compressor relay and turns the magnetic clutch OFF.

DTC No.	Detection Item	Trouble Area
23	Open in pressure sensor circuit  Abnormal refrigerant pressure below 196 kPa (2.0 kg/cm², 28 psi) over 3,140 kPa (32.0 kgf/cm², 455 psi)	Pressure switch Harness or connector between pressure switch and A/C amplifier Refrigerant pipe line A/C amplifier

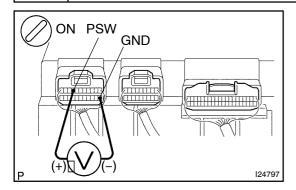
# **WIRING DIAGRAM**



# **INSPECTION** PROCEDURE

1[

Check[voltage[between[terminal[PSW[and[GND[of[A/C[amplifier.



## **PREPARATION:**

Install the manifold gauge set.

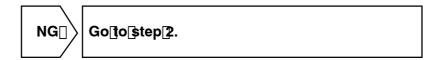
#### **CHECK:**

- (a) Turn ignition switch to ON.
- (b) Check voltage between erminals PSW and GND of A/C amplifier onnector when A/C as pressure hanges.

## <u>OK:</u>

The voltage changes with gas pressure, as shown in the diagram below.

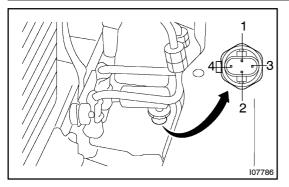
LowPressureCutSide	Reference:::High::Pressure::Cut: Side
ON[[0V] 196[kPa♥ OFF[[12V]	ON <u>((0V)</u> 2,550[kPa





Proceed to the cuit inspection shown on problem symptoms table (See page DI-1238). However, if DTC 23 is displayed, check and replace A/C amplifier.

2 | Check pressure switch.



## PREPARATION:

Disconnect pressure witch connector.

## **CHECK:**

- (a) Turn ignition switch ON.
- (b) Check continuity between erminals and 2 of pressure switch when A/C gas pressure changes.

## OK:

The continuity changes with gas pressure as shown below.

Low[Pressure[Cut[\$ide]]	Reference: High Pressure Cut \$ide
ON[[continuity] 225[kPa OFF[[continuity]	ON((continuity) 2,550 Pa  3,140 Pa  OFF((continuity))

NG□

Replace pressure switch.

OK

3□

Check[harness[and]connector[between[pressure]switch[and]A/C[amplifier (See[page]N-38).

NG

Repair or replace harness or connector.

OK

Check and replace A/C amplifier.