Component Procedures: Oxygen Sensor

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Parts and Labor (itype_189)

Parts

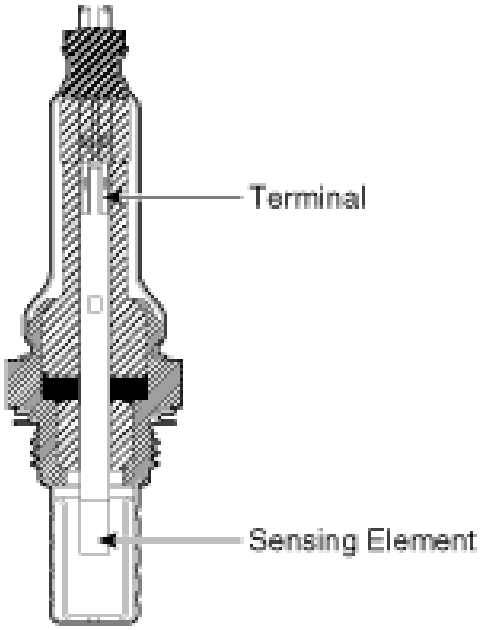
Qualifier	Part #	Name	Price	Note
Powertrain Control > Oxygen ?	392102ECC0	Lower	207.94	
Powertrain Control > Oxygen ?	392102E101	Upper	235.58	

Labor

Operation	Qualifier Path	Skill	Std Hrs	Wty Hrs
Remove & Replace	Powertrain Control > Oxygen Sensor, R&R > Fro?	B	0.5	0.0
Remove & Replace	Powertrain Control > Oxygen Sensor, R&R > Rear	B	0.6	0.0

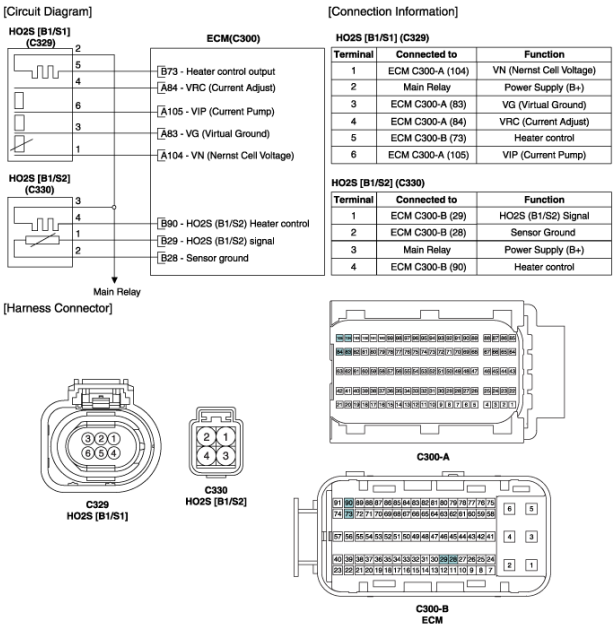
Heated Oxygen Sensor (HO2S) - Description and Operation (Article 44126)

- Description



Heated Oxygen Sensor (HO2S) - Schematic Diagrams (Article 44128)

- Circuit Diagram



[Connection Information]

HO2S [B1/S1] (C329)

Terminal	Connected to	Function
1	ECM C300-A (104)	VN (Nernst Cell Voltage)
2	Main Relay	Power Supply (B+)
3	ECM C300-A (83)	VG (Virtual Ground)
4	ECM C300-A (84)	VRC (Current Adjust)
5	ECM C300-B (73)	Heater control
6	ECM C300-A (105)	VIP (Current Pump)

HO2S [B1/S2] (C330)

Terminal	Connected to	Function
1	ECM C300-B (29)	HO2S (B1/S2) Signal
2	ECM C300-B (28)	Sensor Ground
3	Main Relay	Power Supply (B+)
4	ECM C300-B (90)	Heater control

Heated Oxygen Sensor (HO2S) - Repair Procedures (Article 44130)

- Inspection
- Turn the ignition switch OFF.
- Disconnect the HO2S connector.
- Measure resistance between the HO2S terminals 2 and 5 [B1/S1]. Measure resistance between the HO2S terminals 3 and 4 [B1/S2].
- Check that the resistance is within the specification. Specification : Refer to "Specification"
- Removal
- Turn the ignition sw itch OFF and disconnect the battery negative (-) cable.
- Disconnect the connector (A), and then remove the sensor (B). Note that the SST (Part No.: 09392-2H100) is useful when removing the heated oxygen sensor . [Bank 1 / Sensor 1] [Bank 1 / Sensor 2]

Note that the SST (Part No.: 09392-2H100) is useful when removing the heated oxygen sensor .

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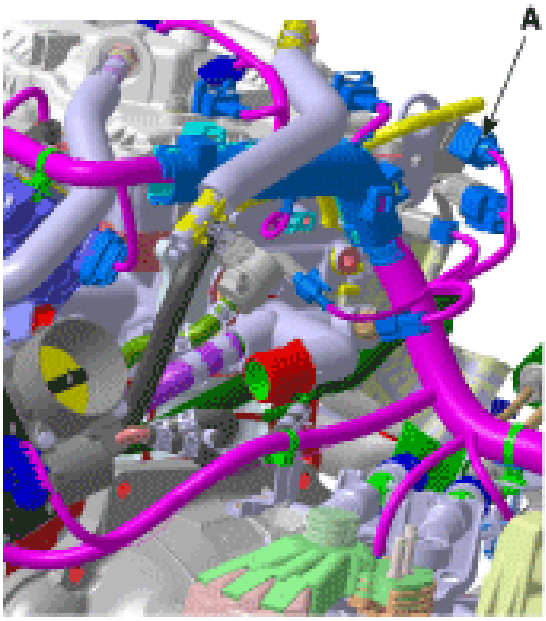
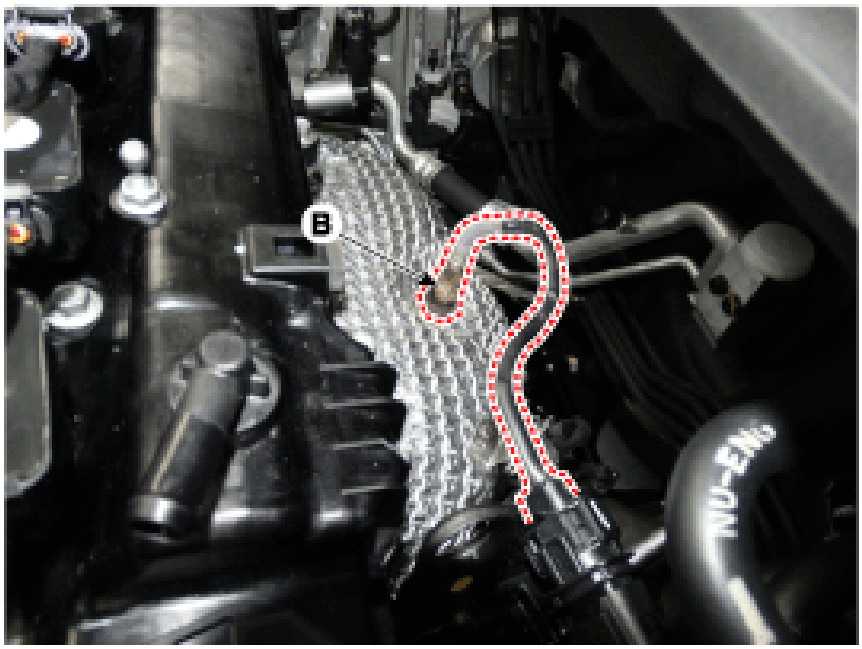
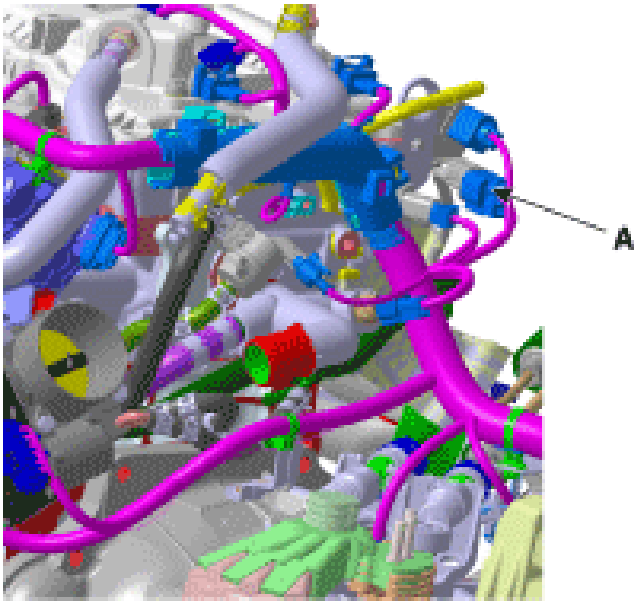
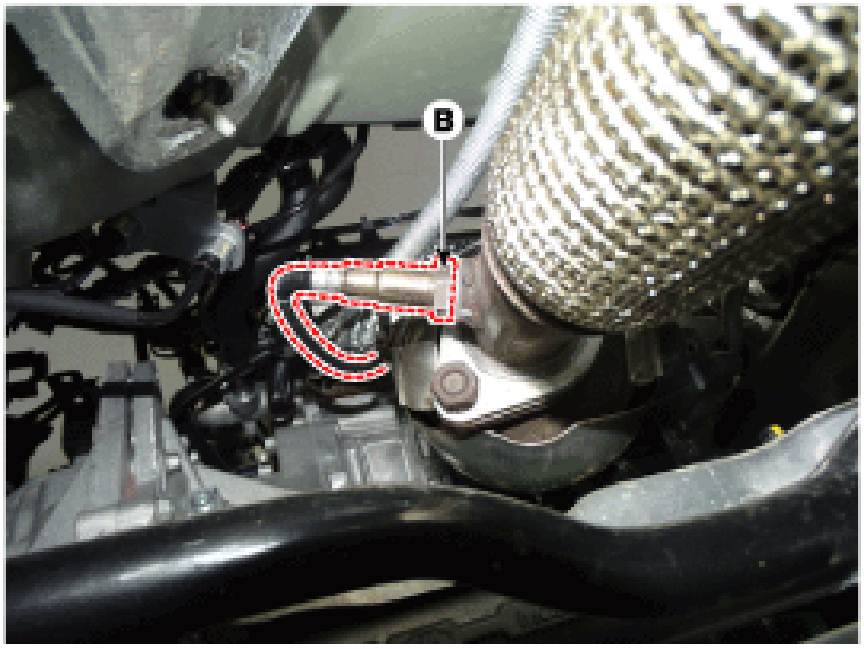




[Bank 1 / Sensor 2]





- Installation

Install the component with the specified torques. Note that internal damage may occur when the component is dropped. In this case, use it after inspecting.

CAUTION

- Install the component with the specified torques.
- Note that internal damage may occur when the component is dropped. In this case, use it after inspecting.

DON'T use a cleaner, spray, or grease to sensing element and connector of the sensor because oil component in them may malfunction the sensor performance. Sensor and its wiring may be damaged in case of contacting with the exhaust system (Exhaust Manifold, Catalytic Converter , and so on).

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- Sensor and its wiring may be damaged in case of contacting with the exhaust system (Exhaust Manifold, Catalytic Converter , and so on).
- Installation is reverse of removal. Heated oxygen sensor installation : 39.2 - 49.1 N.m (4.0 - 5.0 kgf.m, 28.9 - 36.2 lb-ft)

Heated Oxygen Sensor (HO2S) - Specifications (Article 44127)

- Specification
HO2S [Bank 1/Sensor 1] (Linear type)
Item Specification
Heater Resistance (Ω) 2.4 - 4.0 [20°C (68°F)]
HO2S [Bank 1/Sensor 2] (Binary type)
A/F Ratio (λ) Output Voltage (V)
RICH 0.6 - 1.0
LEAN 0 - 0.4
Heater Resistance (Ω) Approx. 9.0 [20°C (68°F)]