

EC05-017a

NTB06-004a

April 3, 2007

Date:

MIL 'ON' WITH DTC P0420: CATALYTIC CONVERTER IS UNDAMAGED

This bulletin has been amended to expand the Applied Vehicle and VIN / DATE range. A diagnostic flowchart has also been added. The ACTION statement has been changed. Chart A has been amended. No other content has been changed.

APPLIED VEHICLES:	2004-2006 Altima (L31)
APPLIED ENGINE:	SULEV QR25* Engine Only *California emission specification—Super Ultra Low Emission
APPLIED VIN / DATE:	Vehicles built before: 1N4AL11D(*)6 C 207000
(Smyrna production)	Vehicles built before: March 17, 2006
APPLIED VIN / DATE:	Vehicles built before: 1N4AL11D(*)6 N 392000
(Canton production)	Vehicles built before: March 20, 2006

IF YOU CONFIRM

- The check engine light is "ON"
- DTC P0420 is stored in the ECM

ACTION

Refer to the flowchart on page 3 to see if this bulletin applies.

Nissan Bulletins are intended for use by qualified technicians, not 'do-it-yourselfers'. Qualified technicians are properly trained individuals who have the equipment, tools, safety instruction, and know-how to do a job properly and safely. NOTE: If you believe that a described condition may apply to a particular vehicle, DO NOT assume that it does. See your Nissan dealer to determine if this applies to your vehicle.

CLAIMS INFORMATION

Submit a Primary Part (PP) type line claim using the following claims coding:

DESCRIPTION	PFP	OP CODE	SYM	DIA	FRT
DTC P0420 Diagnosis	(1)	EJ41AA	HD	32	(2)

(1) Reference the CONSULT-II printout and use the indicated ECM P/N as the PFP.

(2) Reference the current Nissan Warranty Flat Rate Manual and use the indicated FRT.

And, **only** if diagnosis is **OK**:

DESCRIPTION	OP CODE	FRT
R&R Front Exhaust Tube	FD10AA	(2)

(2) Reference the current Nissan Warranty Flat Rate Manual and use the indicated FRT.

And, only if Catalytic Converter is NOT damaged:

DESCRIPTION	OP CODE	FRT
Reprogram ECM per TSB	DE98AA	0.5 hrs

And, IF necessary:

DESCRIPTION	OP CODE	FRT
Perform IAVL Procedure	DE96AA	(2)

(2) Reference the current Nissan Warranty Flat Rate Manual and use the indicated FRT.

PARTS INFORMATION

DESCRIPTION	PART #	QUANTITY
Bearing, Seal exhaust joint	20695-8J010	1
Gasket, exhaust	20692-65J00	1

DIAGNOSTIC FLOWCHART



NOTE: This bulletin and the associated reprogramming only apply to vehicles with undamaged three way catalysts.

SERVICE PROCEDURE

Step A: Confirm This Bulletin Applies

Check the Current ECM Part Number (P/N)

1. With CONSULT-II "ON", print the ECM Part Number as follows:

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START(Nissan) >> ENGINE >> ECM PART NUMBER >> COPY
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- 2. Attach this printout to the Repair Order.
 - Figure 1 is an example of the ECM Part Number printout.
 - You will use the ECM Part Number (P/N) to see if this bulletin applies.

ECM PART NUMBER	
23710-XXXXX	
CALIBID ECM XXXXX	
MODE BACK LIGHT COPY	
	TP0500

Figure 2

Compare Your Current ECM P/N To Chart A

Using the ECM P/N printout from Step 2 (Figure 2):

• Compare your vehicle's ECM P/N to those shown under **Current ECM P/N** in Chart A, below:

Chart A

CAUTION: Some States that have required California emissions may have both CAL SULEV* and 50-State **Emissions Level** vehicles.

M/Y	Configuration	Current ECM P/Ns
2004	A/T	23710-9J34B, -9J34A, -9J321, -9J320
2004	A/T ASCD	23710-9J35B, -9J35A, -9J361, -9J360
2004	M/T	23710-9J36B, -9J36A, -9J366, -9J365
2004	M/T ASCD	23710-9J37B, -9J37A, -9J371, -9J370
2005	A/T	23710-9J54C, -9J54B, -9J54A, -9J522, -9J521, -9J520
2005	A/T ASCD	23710-9J55C, -9J55B, -9J55A, -9J562, -9J561, 9J560
2005	M/T	23710-9J56B, -9J56A, -9J567, -9J566, -9J565
2005	M/T ASCD	23710-9J57B, -9J57A, -9J572, -9J571, -9J570
2006	A/T	23710-ZD84D, -ZD84C, -ZD84B, -ZD84A
2006*	A/T ASCD	23710-ZD85D, -ZD85C, -ZD85B, -ZD85A
2006*	M/T	23710-ZD86D, -ZD86C, -ZD86B, -ZD86A
2006*	M/T ASCD	23710-ZD87D, -ZD87C, -ZD87B, -ZD87A

• It is best to refer to the Current ECM P/N to determine the vehicle configuration

*Up to Applied Date / VIN shown on page 1 of this bulletin.

- If your vehicle's ECM P/N <u>matches</u> one of the Current ECM P/Ns in the chart above, this bulletin applies. Go to Step B.
- If your vehicle's ECM P/N does not match one of the Current ECM P/Ns in the chart above, this bulletin does not apply. Go back to ASIST for further diagnostic and repair information.

Step B: P0420 DTC Confirmation Procedure

In the respective ESM perform P0420 DTC Confirmation Procedure, Overall Function Check, and Diagnostic Procedure. However, <u>stop</u> at the point of replacing the catalytic converter. Do <u>not</u> replace the catalytic converter.

- If the Diagnostic Procedure checks are not OK, this bulletin does not apply.
- If all Diagnostic Procedure checks <u>are</u> OK, <u>do not replace the catalytic converter</u>, go to Step C.

Step C: Remove the front exhaust pipe and inspect the catalyst lower surface

 Remove the two nuts that hold the front exhaust pipe to the exhaust manifold /catalyst (see Figure 1). Discard the old gasket. Replace with a new gasket during reassembly.

NOTE: The stud(s) may come out of the Catalyst when removing the nut – this is okay. Just re-install them later.



 Remove the two nuts that hold the front exhaust pipe to the muffler (see Figure 2). Then, separate the front exhaust pipe from the muffler. Discard the old gasket. Replace with a new gasket during reassembly.



- 3. Slide the front exhaust pipe hanger pin out of the front exhaust pipe hanger (see Figure 3).
- 4. Remove the exhaust pipe from the vehicle.



7. Inspect the entire catalyst lower surface condition as shown in Figure 4.

IMPORTANT: Make sure you inspect the <u>entire</u> lower surface. You are looking for cracks or holes in the lower surface.



- If the catalyst is NG with cracks or holes. Replace the catalyst using standard Warranty procedures. <u>This bulletin does not apply</u>.
- If the catalyst is OK with only powder, scratch or discoloration <u>do not replace the</u> <u>catalytic converter</u>, reassemble the vehicle in the reverse order of disassembly and go to step D.

Step D: Reprogram the ECM

Vehicle ECU Reprogramming Overview

- There are <u>four</u> basic steps.
- Step 1: Download reprogramming data (transfer it) from ASIST into CONSULT-II.

Step 2: "Preparation" steps before reprogramming.

Step 3: Reprogram the ECM.

Step 4: ECM reprogramming "Wrap-up".

- If you are familiar with ECM reprogramming:
 - Review Step One though Step Four starting on page 8.
 - Use them as a "Quick Reference" for ECM reprogramming.
- If you are not familiar with ECM Reprogramming, click here:
 - This will link you to the "ECM Reprogramming for Nissan Vehicles" General Procedure.

Step One: Download Reprogramming Data (Transfer) Data From ASIST Into CONSULT-II



- 1. Select vehicle model and model year (Example: Altima 2005).
- 2. Select the correct Reprogramming Data:
 - a. Locate the specific "Vehicle Configuration" (Example: A/T, ASCD).

NOTE: Vehicle Configuration may include items such as engine type, transmission type, and vehicle options such as ASCD, TCS, ABS, etc.

b. Select (click on) the "To" number for your Vehicle Configuration for the Reprogramming Data. (Write the "To" number on the repair order.)

NOTE: The "To" number will read: 23710-XXXXX.

- 3. Click on the "Add" button.
 - This will add the selected data to the "File(s) Selected" list.
- 4. Click on "Continue" and follow the on-screen directions to perform "data transfer" (download) from ASIST into CONSULT-II.

Step Two: Preparation Steps Before Reprogramming

- 1. Connect a battery charger to the vehicle's battery.
 - Set the charger to a low charge rate (trickle charge).

CAUTION: For number 2 below, and number 3 on the next page, DO NOT connect the CONSULT-II AC power supply.



- 2. Press **SUB MODE** (see Figure 5) then:
 - a. From the listed items, find and select **BATTERY CHARGE**



3. Check the CONSULT-II "Charger Input" reading (see Figure 6).

NOTE:

- "Battery Voltage" is the voltage level of the CONSULT-II battery.
- "Charger Input" is the voltage level of the vehicle's battery. (It must be above 12 volts.)



Figure 6

CAUTION: If the "Charger Input" is below 12 volts:

 A list of items to check is contained in the "ECM Reprogramming for Nissan Vehicles" General Procedure. Click <u>here</u> to link to it.

Step Three: Reprogram The ECM

- If you are <u>not</u> familiar with **ECM** Reprogramming, click <u>here:</u>
- This will link you back to the "ECM Reprogramming for Nissan Vehicles" General Procedure.

Step Four: ECM Reprogramming "Wrap-up"

- 1. Turn the ignition switch "OFF" and CONSULT-II "OFF".
- 2. Wait more than 10 seconds, then:
 - a. Turn the ignition switch "ON" for 2 seconds, then
 - b. Turn the ignition switch "OFF" again for 10 seconds (see Figure 7).
 - This will reset ECM "self learned" Data.



- 3. Start the engine and check the idle speed.
 - If idle speed is too low, perform "Idle Air Volume Learning" (IAVL). See the appropriate Service Manual (ESM) for this procedure.

NOTE: If the engine will not idle, hold the engine RPM at about 2000, then slowly bring it down to an idle. IAVL can now be performed.

- 4. Confirm the engine is operating normally.
- 5. Make sure the MIL is OFF.
 - If it's still ON, use CONSULT-II with the Diagnostic (red/white) Card to erase any DTCs that may have stored during the reprogramming procedure.