



DTB

Date: October 4, 2005
Order No.: P-B-14.30/15a
Supersedes: P-B-14.30/15 dated July 2, 2003
Group: 14

Revision: *Technical Content / Applicable Models Updated*

SUBJECT: **Model 170.465/466**

Model 171.454/456/473

Model 203.040/054/056/061/064/065/076/081/084/087/092/261/264/281/284/740/764

Model 209.356/365/375/376/456/465/475/476

Model 211.056/065/070/076/082/083/087/256/265/282/283/276/287

Model 215.374/375/376

Model 219.375/376

Model 220.067/170/173/174/175/176/183/184

Model 230.474/475/476

All Model Years

Check Engine Light with DTC P2003, P2047, P0810 and P0814 Stored in Engine ECU

If you receive customer reports in the above model vehicles of the check engine light coming on and codes P2003 (M112, M113, M275, M285), P2047 (M271), P0810 and P0814 (M272) are stored in the engine control unit memory, please perform the below procedure.

1. Air Pump Relay

Valid for Models:

170.465/466

203.061/064/065/081/084/261/264/281/284/764

209.365/375/376/465/475/476

211.056/065/070/076/082/083/087/256/265/276/282/283/287

215.374/375/376

220.067/170/173/174/175/176/183/184

230.474/475/476

This bulletin has been created and maintained in accordance with MBUSA-SLP S423QH001, Document and Data Control, and MBUSA-SLP S424HH001, Control of Quality Records.

This condition may be caused by a malfunctioning air pump relay. When the secondary air pump relay malfunctions, the air pump may be actuated beyond the maximum permissible operating time. This overload may lead to failure of the secondary air injection pump and results in a malfunction in the secondary air injection system. Proceed as follows:

i Note: If diagnosis reveals a malfunctioning air injection pump, refer to step 1.2.

- 1.1 Test the secondary air injection function chain with SDS.
- 1.2 Remove/replace secondary air pump and air pump relay (link to WIS) (Damage Code 14344 52).

2. Check Valve for Vacuum Actuation of Air Pump

Valid for Models:

- 171.454/456/473
- 203.040/054/056/061/064/065/076/081/084/087/092/261/264/281/284/740/764
- 209.356/365/375/376/456/465/475/476
- 211.056/065/070/076/082/083/087/256/265/276/282/283/287
- 215.374/375
- 219.375/376
- 220.067/170/173/174/175/183/184
- 230.474/475

This condition may be caused by a malfunctioning check valve in the vacuum line to the air pump switch over valve. When the check valve malfunctions, vacuum flow to the diverter valve is restricted preventing it from opening. Proceed as follows.

- 2.1 Test the secondary air injection function chain with SDS.
- 2.2 If the air pump can be activated with SDS but the function chain test fails, the vacuum flow between the air pump switch over valve and the diverter valve may be restricted preventing the diverter valve from opening.
- 2.3 Check vacuum supply at the diverter valve. If vacuum is < 500mbar, change check valve (Damage Code 07437 F7).

Parts Information

Qty.	Part Name	Part Number
1	Secondary Air Injection Pump	Refer to EPC
1	Relay	A002 542 13 19 26
1	Relay	A002 542 65 19
1	Relay	A170 545 03 05
1	Relay	A002 542 66 19
1	Check valve	A001 140 66 60 28 **

****Parts are in a critical supply situation and will be limited, please see the PAC weekly status report on parts availability status and delivery expectations. This report is located on the PAC website.**



Note: The following allowable labor operations should be used when submitting a warranty claim for this repair.

In Case of Warranty

- Operation:** Short test, perform (54-1011)
 Electric air pump (emission), replace (14-7251)
 Relay module(s) – secondary air injection system, replace (14-7253)
 Check valve – secondary air injection system, replace (14-7308)

Damage Code	Operation Number	Time (hrs.)	Model Indicator (s)	
Condition 1: 14344 52	54 1011	0.3 hrs.	00	
		14 7251	G3, U1, U3, U4, U5	
			0.4 hrs.	J2, M1, M2, M5, M6, M7, N1, R1, T1, T2, T3, T4, T5, U6, U7
			0.5 hrs.	G4, P1, P2, P3, P4, P6, P7, P8, P9, Q2, Q4, S1, S2, S3, S4, S5, S6
			0.6 hrs.	P3
			0.8 hrs.	M9, N5, T7, T8
			0.9 hrs.	R2
			1.0 hrs.	M8, N4
			1.4 hrs.	R3
		14 7253	0.1 hrs.	S1, S2, S3, S4, S5, S6, T7, T8, U1, U3, U4
0.2 hrs.			G3, G4, J2, M1, M2, M5, M6, M7, M8, M9, N1, N4, N5, P1, P2, P4, P6, P7, P8, P9, Q2, Q4, R1, R2, R3, T1, T2, T3, T4, T5, U5, U6, U7	
Condition 2: 07437 F7	54 1011	0.3 hrs.	00	
	14 7308	0.2 hrs.	J2, M1, M2, M5, M6, M7, M9, N1, N5, P1, P2, P3, P4, P6, P7, P8, P9, Q1, Q2, Q3, Q4, Q5, Q7, Q8, Q9, QA, R1, R2, S1, S2, S3, S4, S5, S6, S7, S8, T1, T2, T3, T4, T5, T7, T8, U1, U3, U4, U5, U6, U7, X1, X2, X3, Y1, Y2	