

 Connection offline

Technical product information

Transaction No.: **2024764/10**

Glow warning light flashes when driving, entry P0403 EGR malfunction - 2.0l CR

Release date: 28-Feb-2014

Customer statement / workshop findings

Engine warning light on - poor performance after engine start or when driving. The following entries are logged in the engine control unit:

- P0403 exhaust gas recirculation - valve malfunction

or

- P0401 exhaust recirculation system - through-flow too small

Technical background

Because of a highly effective exhaust gas cooler paint-related deposits can be created at outside temperatures below 10°C. These deposits absorb almost all the soot, which leads to a smooth and dirt free surface. The deposits are assisted by a low coolant temperature when driving with a lot of overrun to save fuel.

Production change

Measure

Try to reproduce the customer complaint so that it can be clearly assigned to this TPI. The following repair must only be carried out, if all the criteria (model/type, chassis number, engine/gearbox code, PR number(s), software version, code etc.) match exactly, ...). Otherwise this solution won't work and repeat repairs may be necessary. In this case the warranty claim may be rejected and the removed parts redebited.

If entry P0401 or P0403 is logged in the engine control unit, check the exhaust gas recirculation valve (N18) or the EGR system starting at the EGR cooler for paint-related deposits. The deposits are strongest in the area of EGR pipe from cooler to EGR valve – see illustrations. Sporadically the deposits wander to the throttle valve, which jams the flap.



The deposits cannot be removed at room temperature. From ca. 80°C the deposits become runny and dissolve themselves.





Note that there are always system-related deposits in the EGR system – see illustration below. These deposits are porous, come off and can be removed. In these cases a parts replacement is not permitted



Update the engine control unit and if necessary replace the following components:

- Cooler for exhaust gas recirculation
- Pipe from radiator to exhaust gas recirculation valve

It is only necessary to replace the exhaust gas recirculation valve, if significant deposits affect the function. If the valve works correctly, it cleans itself during increased part load operation.

Update the engine control unit.



Tell the customer that an update of the engine control unit is to be carried out. Ask him whether the engine control unit has been altered by chip-tuning. Check also in the system "Vehicle-specific Information" whether the warranty code T23 or TD1 (chip-tuning) is included in the vehicle data.

Explain to the customer that an update of the engine control unit makes the tuning ineffective or that the engine control unit could even get damaged. Ask the customer to clarify with the tuning company whether a software update is possible.

Explain to the customer that neither Audi nor your company can be held responsible for damage caused by an update or by not performing an update. Write this on the order before the customer signs it and put the information in the customer file.



Please do not send any technical enquiries about the availability. The missing data versions will be published as soon as they are available.

Audi A3 and TT

Engine control unit software number	Old data version	New engine control unit software number	New data version	SVM Code	Update DVD
03L 906 022 FF 03L 906 022 RA	3069 3069, 6545	03L 997 021 E	0506	01A026	4H0 906 961 AA
03L 906 022 BR 03L 906 022 MA	3067 3611, 6547	03L 997 021 D	0505	01A026	4H0 906 961 AA
03L 906 022 BS 03L 906 022 RB	3134 3615, 6552	03L 997 021 G	0508	01A026	4H0 906 961 AA
03L 906 022 DK 03L 906 022 QT	3068 3608, 6544	03L 997 016 S	0280	01A026	4H0 906 961 AA
03L 906 022 BQ 03L 906 022 LS	3066 3610, 6546	03L 997 016 R	0279	01A026	4H0 906 961 AA
03L 906 022 HQ	2360, 3366	03L 997 021 K	0512	01A026	4H0 906 961 AA
03L 906 022 DH 03L 906 022 RC	3133, 3607, 6543	03L 997 021 C	0504	01A026	4H0 906 961 AA
03L 906 022 DT	3614, 6551	03L 997 021 L	0513	01A026	4H0 906 961 AA
03L 906 022 EA	3612, 6548	03L 997 016 T	0281	01A026	4H0 906 961 AA
03L 906 022 FD	3613, 6550	03L 997 021 H	0509	01A026	4H0 906 961 AA

Audi A4, A5 with Cabriolet

Engine control unit software number	Old data version	New engine control unit software number	New data version	SVM Code	Update DVD

03L 997 016 03L 906 022 B	2885, 3210, 6270, 8463	03L 997 012 N	0406	01A057	4H0 906 961 AA
03L 906 022 C	2886, 3216, 5502, 8447	03L 997 017 T	0391	01A057	4H0 906 961 AA
03L 906 022 DL	2928, 3215, 5527, 8469	03L 997 012 T	0446	01A057	4H0 906 961 AA
03L 906 022 DM	2929, 3217, 5528, 8449	03L 997 012 A	0393	01A057	4H0 906 961 AA
03L 906 022 BD	3218, 3291, 5518, 8453	03L 997 012 E	0397	01A057	4H0 906 961 AA
03L 906 022 BE	3219, 3292, 5532, 8443	03L 997 017 Q	0386	01A057	4H0 906 961 AA
03L 906 022	3177, 5501, 8464	03L 997 012 P	0407	01A057	4H0 906 961 AA
03L 906 022 L	3209, 5490, 8466	03L 997 012 Q	0419	01A057	4H0 906 961 AA
03L 997 016 A 03L 906 022 JM	3173, 5505, 8465	03L 997 013 T	0467	01A057	4H0 906 961 AA
03L 906 022 JN	3174, 5503, 8446	03L 997 017 S	0388	01A057	4H0 906 961 AA
03L 906 022 JQ	3176, 5524, 8448	03L 997 012	0392	01A057	4H0 906 961 AA
03L 906 022 JT	3247, 6325, 8467	03L 997 012 R	0444	01A057	4H0 906 961 AA
03L 906 022 KC	3208, 5525, 8468	03L 997 012 S	0445	01A057	4H0 906 961 AA
03L 906 022 JP	3175, 5523, 8473	03L 997 013 T	0467	01A057	4H0 906 961 AA
03L 906 022 JR	3010, 5519, 8461	03L 997 012 L	0403	01A057	4H0 906 961 AA
03L 906 022 JS	3011, 5526, 8444	03L 997 017 R	0387	01A057	4H0 906 961 AA
03L 906 022 BF	3019, 5529, 8462	03L 997 012 M	0404	01A057	4H0 906 961 AA
03L 906 022 MG	3585, 4224, 4375, 5514, 8470	03L 997 013 S	0469	01A057	4H0 906 961 AA
03L 906 022 ML	2908, 4225, 4376, 5515, 8471	03L 997 013	0447	01A057	4H0 906 961 AA
03L 906 022 MM	2909, 4226,	03L 997 017 M	0364	01A057	4H0 906 961 AA

	4377, 5506, 8440				
03L 997 016 B 03L 906 022 MJ	3729, 4227, 4378, 5500, 8472	03L 997 021	0468	01A057	4H0 906 961 AA
03L 906 022 MK	2907, 4228, 4379, 5504, 8441	03L 997 017 N	0384	01A057	4H0 906 961 AA
03L 906 022 MQ	2912, 4294, 4380, 5516, 8450	03L 997 012 B	0394	01A057	4H0 906 961 AA
03L 906 022 MR	3760, 4230, 4381, 5485, 8451	03L 997 012 C	0395	01A057	4H0 906 961 AA
03L 906 022 MH	3761, 4231, 4382, 5520, 8452	03L 997 012 D	0396	01A057	4H0 906 961 AA
03L 906 022 MN	2910, 4232, 4574, 5517, 8457	03L 997 012 J	0401	01A057	4H0 906 961 AA
03L 906 022 MP	2911, 4233, 4385, 5504, 8442	03L 997 017 P	0385	01A057	4H0 906 961 AA
03L 906 022 NG	3560, 4295, 4386, 5521, 8460	03L 997 012 K	0402	01A057	4H0 906 961 AA
03L 906 022 KA	3586, 4235, 4387, 5522, 8454	03L 997 012 F	0398	01A057	4H0 906 961 AA
03L 906 022 TL	4240, 4403, 5508, 8456	03L 997 012 H	2129	01A057	4H0 906 961 AA
03L 906 022 RK	4239, 4402, 5496, 8455	03L 997 012 G	0399	01A057	4H0 906 961 AA
03L 906 019 C	5068, 5487, 6031, 8428	03L 997 017 C	0332	01A057	4H0 906 961 AA
03L 906 019 AL	5067, 5488, 6032, 8429, 9097	03L 997 017 D	0333	01A057	4H0 906 961 AA
03L 906 019 AT	5069, 5486, 6030, 8434	03L 997 017 F	0358	01A057	4H0 906 961 AA
03L 906 022 NN	5070, 5483, 6028, 8430, 9096	03L 997 017 E	0334	01A057	4H0 906 961 AA
03L 906 022 NP	5073, 5484, 6029, 8420, 9098	03L 997 017	0328	01A057	4H0 906 961 AA

03L 906 022 NR	5071, 5491, 6034, 8421	03L 997 017 A	0329	01A057	4H0 906 961 AA
03L 906 022 RL	5072, 5493, 6035, 8435	03L 997 017 G	0359	01A057	4H0 906 961 AA
03L 906 022 RM	5074, 5489, 6033, 8422	03L 997 017 B	0330	01A057	4H0 906 961 AA
03L 906 022 TM	5075, 5494, 6036, 8436	03L 997 017 H	0360	01A057	4H0 906 961 AA
03L 906 022 TN	5076, 5809, 6038, 8437	03L 997 017 J	0361	01A057	4H0 906 961 AA
03L 906 022 RJ	3411, 5498, 6037, 8439	03L 997 017 L	0363	01A057	4H0 906 961 AA
03L 906 022 TK	4966, 5497, 6039, 8438	03L 997 017 K	0362	01A057	4H0 906 961 AA
03L 906 019 CR	6059, 7083, 9191	03L 997 019 T	2464	01A057	Geplant KW50/11

Audi Q5

Engine control unit software number	Old data version	New engine control unit software number	New data version	SVM Code	Update DVD
03L 906 022 P	2480, 5533, 8479	03L 997 013 E	0454	01A057	4H0 906 961 AA
03L 906 022 HN	2481, 5534, 8482	03L 997 013 F	2299	01A057	4H0 906 961 AA
03L 906 022 ER	3802, 4238, 4390, 5512, 8474	03L 997 013 B	0449	01A057	4H0 906 961 AA
03L 906 022 NH	3997, 4236, 4388, 5509, 8477	03L 997 013 C	0452	01A057	4H0 906 961 AA
03L 906 022 NJ	3544, 4237, 4389, 5510, 8478	03L 997 013 D	0453	01A057	4H0 906 961 AA
03L 906 019 BD	5220, 5259, 8480	03L 997 019 F	0455	01A057	4H0 906 961 AA
03L 906 019 BC	5426, 6573, 8481	03L 997 019 G	0456	01A057	4H0 906 961 AA
03L 906 022 HP 03L 906 019 AR	4392 5530, 6574, 8475	03L 997 019 D	0450	01A057	4H0 906 961 AA
03L 906 022 Q 03L 906 019 AS	4391 5531, 6575,	03L 997 019 E	0451	01A057	4H0 906 961 AA

7673, 8476

Audi A6

Engine control unit software number	Old data version	New engine control unit software number	New data version	SVM Code	Update DVD
03L 906 022 SB	3787, 4395, 6412	03L 997 013 G	0341	01A026	4H0 906 961 AA
03L 906 022 FG	3811, 4397, 6420	03L 997 013 H	0342	01A026	4H0 906 961 AA
03L 906 019 L	4326, 6416	03L 997 019 P	0343	01A026	4H0 906 961 AA
03L 906 019 AE	5421, 6410	03L 997 019 J	0336	01A026	4H0 906 961 AA
03L 906 019 AG	5423, 6412	03L 997 019 K	0337	01A026	4H0 906 961 AA
03L 906 019 AJ	5424, 6414	03L 997 019 H	0335	01A026	4H0 906 961 AA
03L 906 022 FH	3812, 4398, 5577, 6418	03L 997 013 K	0345	01A026	4H0 906 961 AA
03L 906 022 FL	3810, 4394, 5576, 6419	03L 997 013 J	0344	01A026	4H0 906 961 AA
03L 906 019 M	4327, 5575, 6417	03L 997 019 Q	0346	01A026	4H0 906 961 AA
03L 906 019 AH	4979, 5573, 6413	03L 997 019 L	0338	01A026	4H0 906 961 AA
03L 906 019 AK	4981, 5574, 6415	03L 997 019 M	0339	01A026	4H0 906 961 AA
03L 906 019 AF	5422, 5572, 5877, 6411	03L 997 019 N	0340	01A026	4H0 906 961 AA

Warranty accounting instructions

Engine control unit update - Service number/damage code/manufacturer: 2360 / 0039 / ...

Accounting with APOS:

Repair operation:	Designation:	Time units:
26 74 19 10	Remove and install diesel particulate filter - A3 Cabriolet	330 TU
26 74 19 10	Remove and install diesel particulate filter - A3	290 TU
26 74 19 11	Remove and install diesel particulate filter - A3 Quattro, TT	520 TU
26 43 19 60	Remove and install EGR cooler - A3	160 TU
26 43 19 60	Remove and install EGR cooler - TT	130 TU
26 43 19 10	Remove and install EGR cooler - A4, A5, A6, Q5	110 TU

23 79 19 10	Remove and install throttle valve neck - A3 Cabriolet	110 TU
23 79 19 10	Remove and install throttle valve neck - A3, TT	90 TU
26 39 19 60	Remove and install EGR valve - A3, A3 Cabriolet, TT	10 TU
26 39 55 60	Remove and install EGR valve - A4, A5, A6, Q5	50 TU
26 39 19 10	Remove and install exhaust gas recirculation valve - A4, A5, A6, Q5	50 TU
26 47 19 10	Remove and install connection pipe - generation 1 - A4, A5, TT	160 TU
26 47 19 10	Remove and install connection pipe - generation 1 - A3, A6, Q5,	190 TU
01500000	GFF/guided functions	TU according to diagnosis protocol
The labour times are correct at the time of publication. The information in the repair operations catalogue applies.		

Accounting with APOS/2:

Illustration:	Position:	Number:	Designation:	Activity:	Time units:
131-xx	18	131512	Replace EGR cooler	55	According to instructions
131-xx	2	131501	Replace EGR valve	55	According to instructions
131-xx	10	131521	Replace EGR pipe	55	According to instructions
STA-02	2	S00032	Guided fault finding	02	TU according to diagnosis protocol
The labour times are correct at the time of publication. The information in the repair operations catalogue applies.					

Parts information

Customer information
