M274 Check engine light, P052E71 Crankcase ventilation valve

Topic number	LI01.20-P-076894
Version	7
Function group	01.20 - Crankcase ventilation, cylinder head cover
Date	1/17/25
Validity	Passenger car with engine M274
Reason for change	Remedy updated
Function group Date Validity	1/17/25 Passenger car with engine M274

Complaint

Check engine light illuminated

Fault code stored in N3/10 control unit- P052E71 – Positive Crankcase Ventilation Regulator Valve Performance: The valve for crankcase ventilation has a malfunction

Cause

The partial-load ventilation valve (a part of the intake line assembly) may not work as intended.

Remedy

Important

Replacement of the <u>engine wiring harness</u> or <u>control unit</u> is not needed if oil is found at the electrical connection of the crankcase ventilation valve or control unit. Replacement is only allowed if other symptoms or faults are present.

ALL model year SLK/SLC300, C350e hybrid, and GLC350e hybrid

Perform guided test for fault code P052E71. Replace intake line assembly if necessary per results of the guided test.

Software is not planned for models SLK/SLC300, C350e, and GLC350e.

All other vehicles

Replacement of intake line assembly is not required.

1- Perform software update for N3/10 Engine control unit.

2- Remove upper engine cover.

3- Unclip ME-SFI control unit (N3/10) with bracket and place to one side with connected lines (see AR07.08-P-7013M-RD).

4- Release and disconnect electrical connector (4) of partial-load operation crankcase ventilation valve (Y58/2).

XENTRY Tips

5- Fit cap A094 545 50 03 on electrical connector (4) of engine wiring harness partial load operation crankcase ventilation valve (Y58/2) and ensure correct seating on plug of electrical connector (4).

6- Strap down electrical line (4) of partial load operation crankcase ventilation system valve (Y58/2) at wiring harness. Ensure that electrical line (4) is routed free of tension.

7- Clip in ME-SFI[ME] control unit (N3/10) with bracket, ensure control unit is correctly seated at attachment points.

New software part numbers:

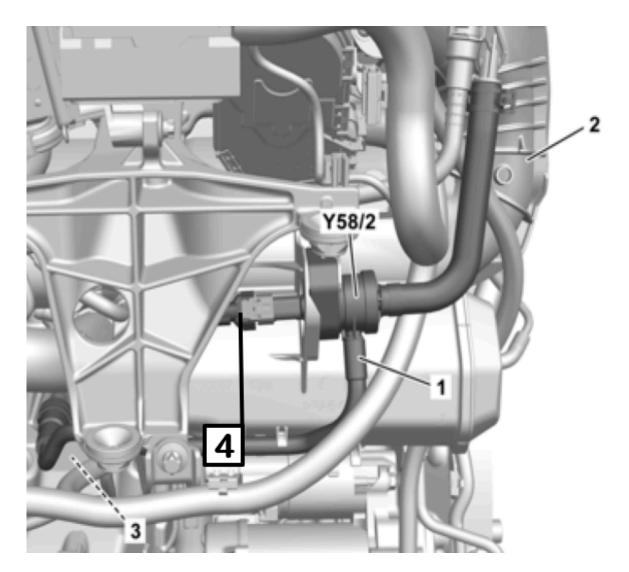
2015-2017 C300 w/722.9 transmission- 2749021202 2749031506

2016-2018 C300 and GLC300 w/725 transmission- 2749021802 2749031806

2019 GLC300- 2749020802 2749031306

2017-2018 E300- 2749021902 2749031906

2019 E300- 2749020702 2749031206



This LI is in relation to NCU dated 8/31/2023 "Emission Extended Warranty - Intake Line Assembly".

Attachments	
File	Description
Y58_2 Connection.png	

WIS-References

Document number	Title	Note
AR01.20-P-9692MRU Remove/install oil separator on crank-		
	case	

Disclaimer

NOTE: The information contained in this document is intended for use by trained, professional technicians with the knowledge to properly and safely perform diagnosis and repairs on Mercedes-Benz vehicles, using Mercedes-Benz approved tools and equipment. It informs service technicians about conditions that could occur in certain vehicles and provides information that could assist in proper vehicle diagnosis, service, or repair. It does not indicate that a defect is present in any vehicle referenced in this document nor does it imply warranty coverage. DO NOT assume that a symptom or condition, or a described cause of a symptom or condition, affects any particular vehicle or groups of vehicles, or that a described repair applies to any particular vehicle or groups of vehicles. There can be multiple causes resulting in the same or similar symptoms or conditions described in this document, and trained professional service technicians must use their diagnostic skills to make evaluations on a case-by-case basis. The information contained in this document does not guarantee warranty coverage nor does it extend the vehicle's warranty in any way.

Symptoms					
Power generation > Engine management > Engine running > Runs rough/shakes					
Power generation	Power generation > Engine management > Indicator lamp > Engine diagnosis > lit				
Power generation > Engine management > Engine performance > No/poor output					
Power generation > Exhaust system > Function > Fumes/blue smoke					
Parts					
Part number	ES1 ES	2 Designation	Quantity	Note	EPC
	ES1 ES	2 Designation	Quantity	Note	EPC

XENTRY Tips

A274090560080	Intake line assembly	1	inclusive of oil separator, partial load ventilation valve and full-load ventila- tion valve	X
A0945455003	Сар	1	Only required when updated software installed.	Х

Control unit/fault code	
Control unit	Fault text
N3/10 - Motor electronics 'MED40' for combustion engine 'M274' (ME) (MED40)	P052E71 - The valve for crankcase ventilation has a mal- function. The actuator is blocked.

Operation numbers/damage codes				
Op. no.	Operation text	Time	Damage code	Note
	Solenoid valve, crankcase ventilation system		0101D	Damage code