

Title (en)  
DEVICE FOR COOLING AN EXHAUST GAS RECIRCULATION LOOP OF A MOTOR VEHICLE ENGINE

Title (de)  
VORRICHTUNG ZUR KÜHLUNG EINER ABGASRÜCKFÜHRUNGSSCHLEIFE EINES KRAFTFAHRZEUGMOTORS

Title (fr)  
DISPOSITIF DE REFROIDISSEMENT D'UNE BOUCLE DE RECIRCULATION DES GAZ D'ÉCHAPPEMENT D'UN MOTEUR DE VÉHICULE AUTOMOBILE

Publication  
**EP 3353405 B1 20210505 (FR)**

Application  
**EP 16750932 A 20160707**

Priority  
• FR 1556693 A 20150716  
• FR 2016051728 W 20160707

Abstract (en)  
[origin: WO2017009549A1] The invention relates to a device for cooling an exhaust gas recirculation loop of a motor vehicle engine. Said device for cooling a high-pressure exhaust gas recirculation loop (28) of a motor vehicle engine (2) comprises a first heat exchanger (32) in a heat-exchange relationship with the cooling circuit (48) of the engine (2), a by-pass (34) of the first heat exchanger (32) and a control module (86) capable of actuating the by-pass (34) of the first heat exchanger (32). The device comprises a second heat exchanger (40) in a heat-exchange relationship with a cooling circuit (50) that is separate from the cooling circuit (48) of the engine (2), the second heat exchanger (40) being installed in series in the recirculated gas stream relative to the first heat exchanger (32). The control module (86) comprises a temperature sensor (60) and a comparator (92) and is configured to actuate the by-pass (34) of the first heat exchanger (32).

IPC 8 full level  
**F02M 26/05** (2016.01); **F02M 26/24** (2016.01); **F02M 26/25** (2016.01); **F02M 26/28** (2016.01); **F02M 26/33** (2016.01)

CPC (source: EP)  
**F02M 26/05** (2016.02); **F02M 26/24** (2016.02); **F02M 26/25** (2016.02); **F02M 26/28** (2016.02); **F02M 26/33** (2016.02)

Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

DOCDB simple family (publication)  
**WO 2017009549 A1 20170119**; EP 3353405 A1 20180801; EP 3353405 B1 20210505; FR 3038937 A1 20170120; FR 3038937 B1 20181012

DOCDB simple family (application)  
**FR 2016051728 W 20160707**; EP 16750932 A 20160707; FR 1556693 A 20150716