

Title (en)

Fuel supply system for a vehicle with Otto engine

Title (de)

Kraftstoff-Versorgungssystem für ein Kraftfahrzeug mit Ottomotor

Title (fr)

Système d'alimentation de carburant pour une véhicule avec moteur Otto

Publication

EP 0661437 B1 19980121 (DE)

Application

EP 94118841 A 19941130

Priority

DE 4344777 A 19931228

Abstract (en)

[origin: EP0661437A1] Fuel supply system for a motor vehicle with an Otto engine which has a fuel injection system with a fuel rail (4). The basic construction includes a fuel tank (1), a pump (2), a feed line system (3) and a return line system (5). The fuel tank (1), the pump (2), the feed line system (3) and the fuel rail (4) form a fuel feed arrangement, the pump (2) of which delivers at a rate appropriate to the varying conditions under which the Otto engine is operated. The return line system (5) is connected to the fuel rail (4) by way of a controllable overflow valve (7) which can be driven into the open position for only a brief period when the Otto engine is started. The fuel tank (1), the feed line system (3), the fuel rail (4) and, if required, the return line system (5) are provided with thermal insulation (8). The overflow valve (7) can be driven into the open position by means of a start control device (9) for the Otto engine and/or by the pressure of the pump (2) when the Otto engine is started. A description is also given of an embodiment in which a return line system is no longer necessary. <IMAGE>

IPC 1-7

F02M 37/00; **F02M 37/20**; **F02M 53/00**

IPC 8 full level

F02D 33/00 (2006.01); **F02M 37/00** (2006.01); **F02M 37/08** (2006.01); **F02M 37/20** (2006.01); **F02M 53/00** (2006.01); **F02M 53/04** (2006.01); **F02M 55/02** (2006.01); **F02M 69/00** (2006.01); **F02M 69/46** (2006.01)

CPC (source: EP US)

F02D 33/003 (2013.01 - EP US); **F02M 37/0047** (2013.01 - EP US); **F02M 37/0052** (2013.01 - EP US); **F02M 37/08** (2013.01 - EP US); **F02M 53/00** (2013.01 - EP US); **F02M 69/462** (2013.01 - EP US); **F02D 33/006** (2013.01 - EP US); **F02M 37/0017** (2013.01 - EP US); **F02M 37/0058** (2013.01 - EP US); **F02M 37/0076** (2013.01 - EP US)

Designated contracting state (EPC)

DE ES FR GB IT

DOCDB simple family (publication)

DE 4344777 A1 19950629; **DE 4344777 C2 19980604**; BR 9405275 A 19950919; DE 59405099 D1 19980226; EP 0661437 A1 19950705; EP 0661437 B1 19980121; ES 2114120 T3 19980516; JP 2651125 B2 19970910; JP H084616 A 19960109; US 5584279 A 19961217

DOCDB simple family (application)

DE 4344777 A 19931228; BR 9405275 A 19941227; DE 59405099 T 19941130; EP 94118841 A 19941130; ES 94118841 T 19941130; JP 32480294 A 19941227; US 35749994 A 19941216