

Title (en)
Fuel pump

Title (de)
Kraftstoffpumpe

Title (fr)
Pompe à carburant

Publication
EP 1363016 A2 20031119 (EN)

Application
EP 03252438 A 20030416

Priority
GB 0209146 A 20020422

Abstract (en)

A fuel pump for use in a common rail fuel system for an internal combustion engine comprises a plurality of pump assemblies (12), each of which has a pumping plunger (14) which is reciprocable within a respective plunger bore under the influence of an associated drive arrangement (20, 22, 24) to perform a pumping cycle during which fuel within a respective pumping chamber (18) is pressurised to a relatively high level. The drive arrangement for each pump assembly is arranged to impart reciprocating movement to the associated pumping plunger (14) upon co-operation with a cam surface. At least one of the pumping plunger (14) and the plunger bore is provided with a collection groove (50) which is registerable with a return passage (52) during at least a period of the pumping cycle, the return passage (52) being provided with a venturi device (54) in communication with a low pressure drain (58) such that, in use, leakage fuel within the collection groove (50) is permitted to flow to the low pressure drain through the venturi device (54). <IMAGE>

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IPC 8 full level
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CPC (source: EP)
F02M 59/102 (2013.01); F02M 59/442 (2013.01); F02M 59/462 (2013.01); F02M 55/00 (2013.01)

Cited by
CN115030846A; GB2556078B; GB2540549A; ITUA20162000A1; ITMI20102310A1; JP2014503737A; CN112096551A; US8960159B2;
WO2018091488A1; WO2012080334A1; WO2017012836A1; EP2620633A1; WO2013113693A2

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