

Title (en)

FUEL INJECTION VALVE

Title (de)

BRENNSTOFFEINSPRITZVENTIL

Title (fr)

SOUPAPE D'INJECTION DE CARBURANT

Publication

EP 1342004 A1 20030910 (DE)

Application

EP 01995554 A 20011130

Priority

- DE 0104508 W 20011130
- DE 10060289 A 20001205

Abstract (en)

[origin: WO0246600A1] The invention relates to a fuel injection valve (1) for fuel injection systems in internal combustion engines, comprising a valve needle (3) and a valve closing body (4) which cooperates therewith and cooperates with a valve seat surface disposed in a valve seat body (5) to form a tight seat, in addition to several injection openings (7) arranged downstream from the tight seat. The injection of fuel from at least one injection opening (7) can be at least temporarily cut off. The injection of the fuel from the at least one injection opening (7) is cut off by local evaporation of fuel by means of a respective local heating element (44) disposed upstream from the respective injection opening (7) on a surface (43) defining the flow path.

IPC 1-7

F02M 53/06; F02M 61/18; F02M 51/06; F02M 69/04

IPC 8 full level

F02M 51/06 (2006.01); **F02M 53/04** (2006.01); **F02M 53/06** (2006.01); **F02M 61/12** (2006.01); **F02M 61/18** (2006.01); **F02M 69/04** (2006.01);
F02B 75/12 (2006.01)

CPC (source: EP KR US)

F02M 51/0671 (2013.01 - EP KR US); **F02M 53/06** (2013.01 - EP KR US); **F02M 61/12** (2013.01 - EP KR US);
F02M 61/1806 (2013.01 - EP KR US); **F02M 61/186** (2013.01 - EP KR US); **F02M 69/048** (2013.01 - EP KR US);
F02B 2075/125 (2013.01 - EP KR US); **Y02T 10/12** (2013.01 - EP US)

Citation (search report)

See references of WO 0246600A1

Designated contracting state (EPC)

DE ES FR GB IT

DOCDB simple family (publication)

WO 0246600 A1 20020613; DE 10060289 A1 20020606; EP 1342004 A1 20030910; JP 2004515688 A 20040527; KR 20020072297 A 20020914;
US 2003121999 A1 20030703

DOCDB simple family (application)

DE 0104508 W 20011130; DE 10060289 A 20001205; EP 01995554 A 20011130; JP 2002548302 A 20011130; KR 20027009791 A 20020730;
US 18258602 A 20021111