

Title (en)

Fuel injection valve

Title (de)

Brennstoffeinspritzventil

Title (fr)

Soupape d'injection de carburant

Publication

**EP 1308618 B1 20041229 (DE)**

Application

**EP 02022008 A 20021001**

Priority

DE 10153627 A 20011031

Abstract (en)

[origin: EP1308618A1] The fuel injection valve has a solenoid-operated valve needle (3) with a shut-off component (4) formed at the injection end. A swirl element (34) reaches through the valve shut-off component and is installed on the inlet side face (39) of the valve seat (5). The valve needle and/or shut-off component has a taper (37) in the region of the swirl element and reduces the radial extent of the valve needle. The taper extends in the axial direction at least between the sealing seat and inlet side end face (38) of the swirl element.

IPC 1-7

**F02M 61/16**

IPC 8 full level

**F02M 51/06** (2006.01); **F02M 51/08** (2006.01); **F02M 61/10** (2006.01); **F02M 61/16** (2006.01); **F02M 61/18** (2006.01); **F02M 61/12** (2006.01); **F02M 63/00** (2006.01)

CPC (source: EP)

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Designated contracting state (EPC)

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**EP 02022008 A 20021001**; DE 10153627 A 20011031; DE 50201879 T 20021001; JP 2002314493 A 20021029