

Title (en)
Hydraulic valve

Title (de)
Hydraulikventil

Title (fr)
Soupape hydraulique

Publication
EP 2386731 B1 20160720 (DE)

Application
EP 11159294 A 20110322

Priority
DE 102010019005 A 20100503

Abstract (en)
[origin: EP2386731A1] The valve has a hollow piston with a piston bottom on which an actuator is applied. The piston is axially moved in the bush by the actuator against force of a screw-type pressure spring. A sleeve is provided in the piston and secured in the bush for movement relative to the piston. A wall of the sleeve includes a through-opening that leads to an opening of the piston. The opening leads a supply pressure that is applied inside the sleeve to two sets of pressure chambers (9, 10) of an oscillating-motor camshaft adjuster (14). A sleeve bottom of the sleeve closes an inner space of the piston.

IPC 8 full level
F01L 1/344 (2006.01); **F16K 27/02** (2006.01)

CPC (source: EP US)
F01L 1/3442 (2013.01 - EP US); **F01L 2001/34426** (2013.01 - EP US); **F01L 2001/34433** (2013.01 - EP US); **Y10T 137/86702** (2015.04 - EP US)

Cited by
CN106968743A; EP3321479A3; EP3073095A3; US10378395B2; US9964031B2; WO2015198085A1; WO2013079693A1; WO2013174533A1

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DE 102010019005 A9 20130529; DE 102010019005 B4 20170323; JP 2011241823 A 20111201; JP 5759654 B2 20150805;
US 2011266479 A1 20111103; US 8505582 B2 20130813

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