

Title (en)

PUMPING DEVICE, IN PARTICULAR HIGH PRESSURE FUEL PUMPING DEVICE FOR A FUEL INJECTION DEVICE

Title (de)

PUMPVORRICHTUNG, INSBESONDERE KRAFTSTOFFHOCHDRUCKPUMPVORRICHTUNG FÜR EINE KRAFTSTOFFEINSPRITZEINRICHTUNG

Title (fr)

DISPOSITIF DE POMPAGE, NOTAMMENT DISPOSITIF DE POMPAGE DE CARBURANT SOUS HAUTE PRESSION POUR UN SYSTÈME D'INJECTION DE CARBURANT

Publication

EP 3014107 A1 20160504 (DE)

Application

EP 14720621 A 20140430

Priority

- DE 102013212047 A 20130625
- EP 2014058926 W 20140430

Abstract (en)

[origin: WO2014206609A1] The pumping device, in particular high pressure fuel pumping device, has at least one pump element (10) which has a pump piston (12) which is driven in a reciprocating movement by a drive shaft (14) via a tappet (18), wherein the drive shaft (14) has at least one cam (16) or eccentric, on which the tappet (18) is supported at least indirectly. The drive shaft (14) is mounted rotatably via at least one bearing point (60), wherein the at least one bearing point (60) is fed lubricating medium which exits from the at least one bearing point (60) towards the at least one cam (16) or eccentric. Between the at least one bearing point (60) and the at least one cam (16) or eccentric, the drive shaft (14) has an outer contour (66) which increases in diameter from the at least one bearing point (60) towards the at least one cam (16) or eccentric and ends in the region of the tappet (18) as viewed in the direction of the rotational axis (15) of the drive shaft (14). Lubricating medium is guided in a targeted manner to the tappet (18) by way of the outer contour (66).

IPC 8 full level

F02M 59/06 (2006.01); **F02M 59/10** (2006.01); **F02M 63/00** (2006.01); **F02M 63/02** (2006.01); **F04B 1/04** (2006.01); **F04B 53/18** (2006.01)

CPC (source: EP)

F02M 59/06 (2013.01); **F02M 59/102** (2013.01); **F02M 63/0001** (2013.01); **F04B 1/0404** (2013.01); **F04B 1/053** (2013.01); **F04B 53/18** (2013.01); **F02M 63/0265** (2013.01); **F02M 2200/02** (2013.01)

Citation (search report)

See references of WO 2014206609A1

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

DE 102013212047 A1 20150108; CN 105358819 A 20160224; CN 105358819 B 20190101; EP 3014107 A1 20160504; EP 3014107 B1 20170412; WO 2014206609 A1 20141231

DOCDB simple family (application)

DE 102013212047 A 20130625; CN 201480036607 A 20140430; EP 14720621 A 20140430; EP 2014058926 W 20140430