

Title (en)

VARIABLE VALVE DRIVE OF AN INTERNAL COMBUSTION ENGINE

Title (de)

VARIABLER VENTILTRIEB EINER BRENNKRAFTMASCHINE

Title (fr)

MECANISME DE COMMANDE DE SOUPAPE VARIABLE DE MOTEUR A COMBUSTION INTERNE

Publication

EP 1831507 B1 20130102 (DE)

Application

EP 05792392 A 20051012

Priority

- EP 2005010943 W 20051012
- DE 102004053203 A 20041104

Abstract (en)

[origin: WO2006048100A1] The invention relates to a variable valve drive (1) of an internal combustion engine which is used to actuate a gas exchange valve (5). Displacement thereof takes place when a cam (7) is lifted and when a piston (14, 32) of a hydraulic force applying device (4a, 4b) is lifted, which is superimposed on the lifting of the cam (7) and which is independent therefrom. Said hydraulic force applying device is connected to a hydraulic fluid line (S-P) by means of adjustable hydraulic medium pressure and comprises a pressure chamber (24a, 24b) which can be impinged upon by the piston (14, 32), in addition to a hydraulic valve play compensation device (23a, 23b) which comprises a working chamber (22a, 22b) which is radially defined by a housing (13a, 13b). The housing (13a, 13b) is also used to radially define the pressure chamber (24a, 24b).

IPC 8 full level

F01L 1/24 (2006.01); **F01L 13/00** (2006.01)

CPC (source: EP US)

F01L 1/2405 (2013.01 - EP US); **F01L 13/0031** (2013.01 - EP US); **Y10T 74/2107** (2015.01 - EP US)

Cited by

CN104903552A

Designated contracting state (EPC)

DE FR GB IT SE

DOCDB simple family (publication)

WO 2006048100 A1 20060511; DE 102004053203 A1 20060601; EP 1831507 A1 20070912; EP 1831507 B1 20130102; US 2008115749 A1 20080522; US 7568460 B2 20090804

DOCDB simple family (application)

EP 2005010943 W 20051012; DE 102004053203 A 20041104; EP 05792392 A 20051012; US 71867805 A 20051012