

Title (en)

ELECTRONIC ENGINE CONTROL SYSTEM OF AN INTERNAL COMBUSTION ENGINE

Title (de)

ELEKTRONISCHE MOTORSTEUERUNG EINER BRENNKRAFTMASCHINE

Title (fr)

SYSTEME DE GESTION ELECTRONIQUE DES FONCTIONS D'UN MOTEUR A COMBUSTION INTERNE

Publication

**EP 1147300 B1 20041027 (DE)**

Application

**EP 00988621 A 20001116**

Priority

- DE 0004038 W 20001116
- DE 19955649 A 19991119

Abstract (en)

[origin: WO0138709A1] The invention relates to an electronic engine control system of an internal combustion engine, for controlling a basic mixture quantity of a suitable fuel-air-mixture for the current operating mode according to parameters, between a mixture with a low proportion of fuel, which is lean in relation to the current combustion situation and a rich mixture with a greater proportion of fuel, and for controlling other functions. The engine control system also comprises a fuel quantity adapting device, by which means a predeterminable quantity of fuel can be adapted to the basic mixture quantity prescribed by the engine control system as a fuel increase for acceleration enriching or as a fuel reduction for deceleration leaning and can be suppressed within a certain adapting time (B, V). A Lambda probe is also provided as an O<sub>2</sub>-probe in the exhaust gas stream of the internal combustion engine, and is used to detect a lean mixture, a "lean" Lambda signal being released. According to the invention, if a "lean" Lambda signal is released, the adapted fuel quantity (1, 6) can be additionally adapted by a predeterminable correcting quantity (4, 5) within an adapting period (B, V) by means of a correction unit that is connected to the Lambda probe and to the fuel quantity adapting device, for an acceleration enrichment or a deceleration leaning.

IPC 1-7

**F02D 41/10**; **F02D 41/12**

IPC 8 full level

**F02D 45/00** (2006.01); **F02D 41/10** (2006.01); **F02D 41/12** (2006.01); **F02D 41/14** (2006.01); **F02D 41/20** (2006.01); **F02D 41/32** (2006.01); **F02D 41/34** (2006.01)

CPC (source: EP KR)

**F02D 41/10** (2013.01 - EP KR); **F02D 41/12** (2013.01 - EP); **F02D 41/1486** (2013.01 - EP)

DOCDB simple family (publication)

**WO 0138709 A1 20010531**; DE 19955649 A1 20010613; DE 19955649 C2 20020110; DE 50008415 D1 20041202; EP 1147300 A1 20011024; EP 1147300 B1 20041027; JP 2003515044 A 20030422; KR 20020005575 A 20020117

DOCDB simple family (application)

**DE 0004038 W 20001116**; DE 19955649 A 19991119; DE 50008415 T 20001116; EP 00988621 A 20001116; JP 2001540029 A 20001116; KR 20017009063 A 20010719