

Title (en)

Fuel injection control apparatus and method for internal combustion engine

Title (de)

Vorrichtung und Verfahren zur Steuerung der Kraftstoffeinspritzung eines Dieselmotors

Title (fr)

Dispositif et méthode de commande de l'injection de carburant dans un moteur à combustion interne

Publication

EP 1669575 A3 20070620 (EN)

Application

EP 05257208 A 20051123

Priority

JP 2004349569 A 20041202

Abstract (en)

[origin: EP1669575A2] A clutch switch (56) and an electronic control unit (61) are provided in a vehicle (11) in which transfer of torque output from an engine (12) to a manual transmission (39) can be interrupted by disengaging a clutch (38), provided between the engine (12) and the manual transmission (39), based on an operation of a clutch pedal (42). When an action to reduce the speed of the engine (12) is made ("YES" in step 110), the electronic control unit (61) determines, in step 120, the state of the clutch (38) based on the result of detection obtained by the clutch switch (56). If it is determined that the clutch (38) is engaged, the electronic control unit (61) gradually reduces the amount of fuel injected, in step 140. If it is determined that the clutch (38) is disengaged, the electronic control unit (61) gradually reduces the amount of fuel injected at a rate higher than that used if it is determined that the clutch (38) is engaged, in step 130.

IPC 8 full level

F02D 41/02 (2006.01); **F02D 41/12** (2006.01)

CPC (source: EP)

F02D 41/022 (2013.01); **F02D 41/12** (2013.01)

Citation (search report)

- [X] JP H05288104 A 19931102 - TOYOTA MOTOR CORP
- [X] JP S6365145 A 19880323 - MAZDA MOTOR
- [A] US 5050563 A 19910924 - KOHLER ROLF [DE]
- [AP] US 2005124460 A1 20050609 - IRIYAMA MASAHIRO [JP]

Cited by

DE102010042474B4; FR2961263A1; WO2011154636A1

Designated contracting state (EPC)

AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)

AL BA HR MK YU

DOCDB simple family (publication)

EP 1669575 A2 20060614; **EP 1669575 A3 20070620**; JP 2006161561 A 20060622

DOCDB simple family (application)

EP 05257208 A 20051123; JP 2004349569 A 20041202