

Title (en)

FRICTIONAL VACUUM PUMP WITH CHASSIS, ROTOR, HOUSING AND DEVICE FITTED WITH SUCH A FRICTIONAL VACUUM PUMP

Title (de)

REIBUNGSVAKUUMPUMPE MIT CHASSIS, ROTOR UND GEHÄUSE SOWIE EINRICHTUNG, AUSGERÜSTET MIT EINER REIBUNGSVAKUUMPUMPE DIESER ART

Title (fr)

POMPE A VIDE ROTATIVE MUNIE D'UN CHASSIS, D'UN ROTOR ET D'UN CARTER, ET DISPOSITIF POURVU D'UNE POMPE A VIDE ROTATIVE DE CE TYPE

Publication

**EP 1090231 A1 20010411 (DE)**

Application

**EP 99917896 A 19990327**

Priority

- DE 19823270 A 19980526
- DE 19901340 A 19990115
- EP 9902122 W 19990327

Abstract (en)

[origin: US6457954B1] A friction vacuum pump (1) with a frame (5), stator (3), rotor (4) and housing; all functional elements of the pump are combined into one unit (22), which, in turn, can be inserted into a housing (19, 55) that has been adapted to a specific application; using this procedure, all separate connection housing can be eliminated and optimal conductance can be achieved (FIG. 1).

IPC 1-7

**F04D 19/04**; **F04D 17/16**; **F04D 29/60**

IPC 8 full level

**F04D 17/16** (2006.01); **F04D 19/04** (2006.01); **F04D 29/60** (2006.01)

CPC (source: EP US)

**F04D 17/168** (2013.01 - EP US); **F04D 19/04** (2013.01 - EP US); **F04D 29/602** (2013.01 - EP US)

Citation (search report)

See references of WO 9961799A1

Cited by

DE202013003855U1; EP2228540A3; EP2228540A2; DE102009013244A1; DE202008011489U1; WO2010023200A1; US8790070B2; DE202008017530U1; DE102007010068A1; US8529218B2; US8858188B2

Designated contracting state (EPC)

DE FR GB IT

DOCDB simple family (publication)

**US 6457954 B1 20021001**; DE 59912626 D1 20060216; DE 59912629 D1 20060216; EP 1090231 A1 20010411; EP 1090231 B1 20051005; EP 1090231 B2 20150708; JP 2002516959 A 20020611; JP 4520636 B2 20100811; WO 9961799 A1 19991202

DOCDB simple family (application)

**US 70048300 A 20001115**; DE 59912626 T 19990327; DE 59912629 T 19990327; EP 9902122 W 19990327; EP 99917896 A 19990327; JP 2000551160 A 19990327