

Title (en)
Membrane pump

Title (de)
Membranpumpe

Title (fr)
Pompe à membrane

Publication
EP 0696480 B1 19991103 (FR)

Application
EP 95401865 A 19950809

Priority
FR 9409949 A 19940811

Abstract (en)
[origin: EP0696480A1] The pump has a body (1) with a inlet (11) discharging into a measuring chamber (12). The measuring chamber has an inlet valve (20) and a piston (3) with a plunger (30) which has an axial jet (31). The jet enlarges in its lower part into a corolla (32) receiving a flexible membrane lining (4). The jet internal channel (31a) leads to an outlet valve (40). The outlet valve is part of a single deformable piece forming the membrane constituted from a lower U collar (42), assembled on the corolla of the plunger. At the top is fastened an external cylindrical sealing skirt (43) and the piston back, in its rest position, extends an annular flange (44) at the membrane junction on the body. At the upper narrow end of the conical outlet valve a cut-out (4) in the membrane is edged by a lip opening onto the outlet orifice.

IPC 1-7
B05B 11/00

IPC 8 full level
F04B 19/22 (2006.01); **B05B 11/00** (2006.01); **F04B 9/14** (2006.01); **F04B 13/00** (2006.01)

CPC (source: EP US)
B05B 11/007 (2013.01 - EP US); **B05B 11/0072** (2013.01 - EP US); **B05B 11/0075** (2013.01 - EP US); **B05B 11/1001** (2023.01 - EP US); **B05B 11/1047** (2023.01 - EP US); **B05B 11/1061** (2023.01 - EP US); **B05B 11/1076** (2023.01 - EP US); **B05B 11/1077** (2023.01 - EP US)

Cited by
FR2984768A1; FR2918421A1; FR3041413A1; EP1987888A3; EP1974830A1; FR2914294A1; EP1716928A3; KR101236315B1; US9539597B2; US8038036B2; US7886941B2; US8070024B2; WO2013170614A1; WO2017051126A1; WO9735777A1; WO2013170615A1

Designated contracting state (EPC)
AT BE CH DE DK ES FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)
EP 0696480 A1 19960214; **EP 0696480 B1 19991103**; AT E186238 T1 19991115; CA 2154732 A1 19960212; CA 2154732 C 20060912; DE 69513102 D1 19991209; DE 69513102 T2 20000413; DK 0696480 T3 20000508; ES 2139858 T3 20000216; FR 2723618 A1 19960216; FR 2723618 B1 19961031; JP 3810832 B2 20060816; JP H0861226 A 19960308; PT 696480 E 20000428; SI 0696480 T1 20000430; US 5518377 A 19960521

DOCDB simple family (application)
EP 95401865 A 19950809; AT 95401865 T 19950809; CA 2154732 A 19950726; DE 69513102 T 19950809; DK 95401865 T 19950809; ES 95401865 T 19950809; FR 9409949 A 19940811; JP 20309695 A 19950809; PT 95401865 T 19950809; SI 9530365 T 19950809; US 51373795 A 19950810