

Title (en)

Hydraulic diaphragm pump with prestressed diaphragm

Title (de)

Hydraulisch angetriebene Membranpumpe mit vorgespannter Membran

Title (fr)

Pompe à membrane hydraulique avec membrane précontrainte

Publication

**EP 1291524 A3 20040728 (DE)**

Application

**EP 02018670 A 20020820**

Priority

DE 10143978 A 20010907

Abstract (en)

[origin: EP1291524A2] The hydraulic membrane pump has a membrane (1) clamped at the edges between a pump body (2) and a pump cover (3), which separates the discharge zone (4) from the hydraulic zone (5). The membrane is tensed by a spring in the suction stroke direction. The hydraulic membrane drive has an oscillating displacement piston (6), which slides in the pump body between a supply zone (8) for the hydraulic fluid and the hydraulic zone. The spring tension on the membrane is sufficiently strong to apply pressure to the hydraulic fluid in the hydraulic zone, to build up an overpressure against the discharge zone.

IPC 1-7

**F04B 45/06**; **F04B 43/067**

IPC 8 full level

**F04B 43/067** (2006.01); **F04B 45/06** (2006.01)

CPC (source: EP US)

**F04B 43/067** (2013.01 - EP US)

Citation (search report)

- [X] US 6086340 A 20000711 - EDWARDS PHILLIP M [US], et al
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