

Title (en)
POSITIVE DISPLACEMENT PUMP

Title (de)
VERDRÄNGERPUMPE

Title (fr)
POMPE VOLUMETRIQUE

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Application
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Abstract (en)
[origin: WO0204812A1] The invention relates to a positive displacement pump, especially a reciprocating positive displacement pump, comprising at least one piston (30) that is displaced relative to a pump housing, thereby changing the volume of a working chamber. A pump body (22) is received in a rotor sleeve (20) that rotates about said pump body. Said pump body is provided with longitudinal grooves extending from its peripheral surface (23) that receive energy accumulators (40) associated with the pistons (30). Every piston (30) is associated with a bolt- or needle-shaped body (36) on its front face facing the rotor sleeve (20). The inner surface (21) of the rotor sleeve (20) rests against and rolls off on the outer surfaces of said bodies (36). The pump body (22) has an eccentric cross-section in the rotor sleeve (20). An annular gap (19) present between those two parts has a gap width (t) that tapers in the peripheral direction. Preferably, the inner bore of the rotor sleeve (20) is eccentrically disposed in said rotor sleeve.

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