

Title (en)

ROTARY PISTON ENGINE WITH AN EXTERNAL ROTOR ELECTRICAL MOTOR.

Title (de)

DREHKOLBENMASCHINE MIT EINEN AUSSENLÄUFER ELEKTROMOTOR.

Title (fr)

MOTEUR À PISTON ROTATIF AVEC UN MOTEUR ÉLECTRIQUE DE ROTOR EXTERNE.

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Application

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Priority

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Abstract (en)

[origin: WO2010086267A2] The invention relates to a rotary piston engine comprising at least two rotors, a power component and a blocking component, which interact and which have spur gearings the number of teeth of which differs by one tooth, the rotors and an engine housing accommodating the rotors delimiting working compartments. The rotors are twisted at a defined angle to each other to produce the lifting effect. The power component is driven by an electric motor arranged on the same axis, the electric motor and the power component being rotationally connected. The gearing is of the cycloid type, i.e. a trochoidal gearing. The electric motor is an external rotor motor having an internal stator and an external rotor, the engine housing being directly connected to the electric motor. The engine housing has a supporting tube section projecting into the internal stator and supporting the same. The external rotor has a rotor bell which encloses the internal stator and which has a center drive shaft extending through the supporting tube section and being rotationally connected to the power component, the drive shaft being mounted towards the inner wall of the supporting tube section.

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