

Design of Rotary Vane Engine

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Abstract

Mostly in all automobiles reciprocating I.C. engines are used in spite of having some lacunas i.e. incomplete combustion of fuel, due to which lower thermal efficiency obtained. It having more nos. of moving parts due to which balancing of engine becomes a tedious task. Also weight to power ratio of engine becomes excessively high. This paper describes a new concept of Rotary I.C .spark ignited Engine and its Design for optimum compression ratio 8 , Cubic capacity 259 cc, Inlet exhaust and expansion angles also design dimensions of stator, rotor & vanes respectively .

Key words: Rotary vane engine, Stator, Rotor, Balancing, Shaft output, Vane angle, Compression ratio

