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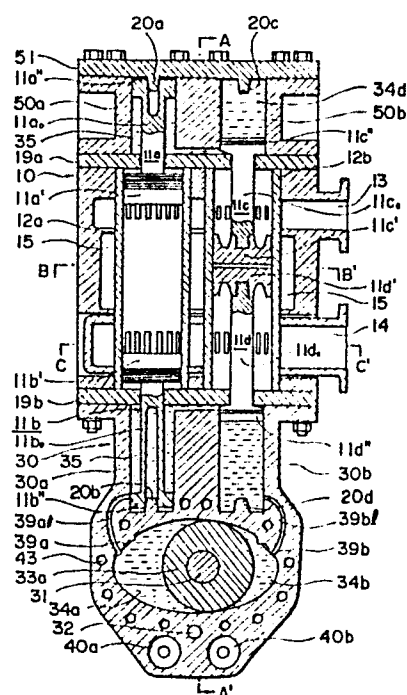
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Free piston engine having a hydraulic power transmission mechanism.

A free piston engine having a hydraulic power transmission mechanism. The engine includes at least one free piston (11a,11b,11c,11d) adapted to reciprocate linearly, a rotary piston (33a) rotatably mounted on the crank pin of the crankshaft (31) to rotate about the crank pin and a hydraulic power transmission system (34a,34b,34c,34d,35). One end face of the or each free piston is exposed to pressure of combustion gas or compressed gas, whereas the other end face of the same is exposed to hydraulic pressure. The rotary piston (33a) has the contour of epitrochoidal curve as seen in the cross-sectional plane. Working hydraulic medium is filled in a space (35) of the hydraulic system as defined between the other end face of the free piston and the rotary piston so as to convert linear reciprocable movement of the free piston (11a,11b,11c,11d) to rotational movement of the crankshaft (31).

FIG. 4





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DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int. Cl.4)
X	FR-A-1 579 136 (KRUPP) * Page 5, line 4 - page 6, line 38 *	1,2	F 01 B 11/08 F 04 C 11/00 F 01 C 11/00
X	--- DE-B-1 252 964 (CONRAD) * Column 3, lines 22-63 *	1,2	
A	--- DE-A-2 137 114 (KRESS) * Page 3, paragraph 3 - page 4, paragraph 3 *	1,2	

The present search report has been drawn up for all claims			TECHNICAL FIELDS SEARCHED (Int. Cl.4)
			F 01 B
Place of search		Date of completion of the search	Examiner
THE HAGUE		29-01-1987	WASSENAAR G.
CATEGORY OF CITED DOCUMENTS			
X : particularly relevant if taken alone		T : theory or principle underlying the invention	
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