

No 844,824.

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J. B. MARTIN.
ROTARY ENGINE.
APPLICATION FILED NOV. 3, 1906.

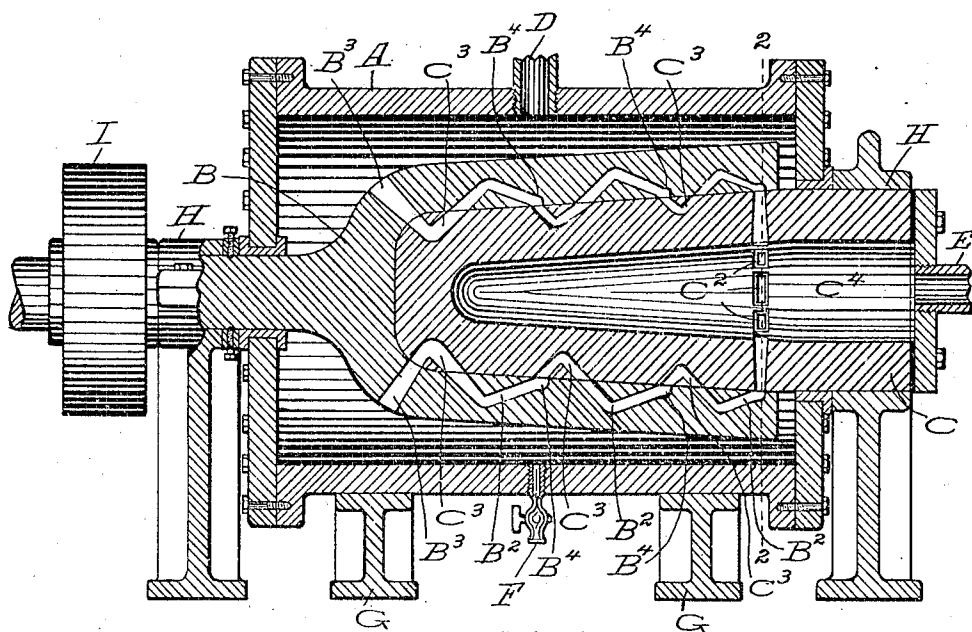


Fig. 1

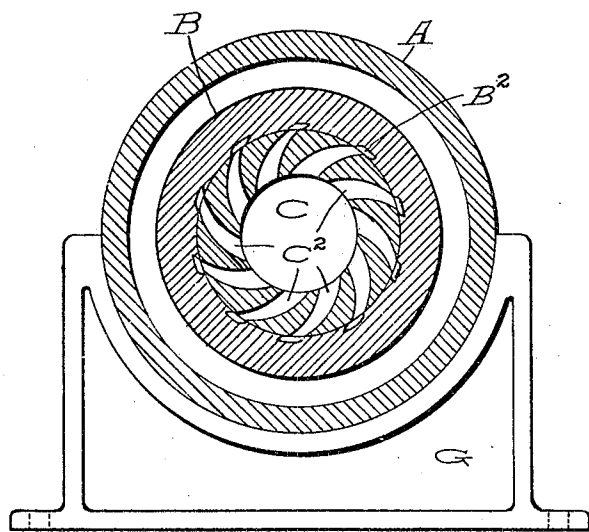


Fig. 2

Witnesses
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JOHN BRAY MARTIN, OF CINCINNATI, OHIO.

ROTARY ENGINE.

No. 844,824.

Specification of Letters Patent.

Patented Feb. 19, 1907.

Application filed November 3, 1906. Serial No. 341,829.

To all whom it may concern:

Be it known that I, JOHN BRAY MARTIN, a citizen of the United States of America, and a resident of 537 Walnut street, Cincinnati, county of Hamilton, and State of Ohio, (post-office address 537 Walnut street, in the city of Cincinnati, county of Hamilton, and State of Ohio,) have invented an Improvement in Rotary Engines; and I do hereby declare the following to be a full and exact description thereof, reference being had to the accompanying drawings, making part of this specification.

My invention relates to rotary engines; and it has for its object the improvement in the construction of such devices whereby they are simplified and rendered more efficient in action.

The novelty of my invention consists in the combination and subcombination of the parts, as will be hereinafter set forth, and specifically pointed out in the claims.

In the drawings, Figure 1 represents a longitudinal vertical section of my improved rotary engine. Fig. 2 is a section on lines 2 2 of Fig. 1.

Similar letters of reference indicate corresponding parts.

Referring to the drawings, A represents the casing.

B is the outer or revolving cylinder.

C is the inner or stationary cylinder.

C³ are ports within the inner stationary cylinder C, through which the steam first leaves the inner cylinder C.

C³ are pockets in the stationary cylinder C, through which the steam is enabled to exert additional force against the moving cylinder B as it expands.

B² are pockets in the moving cylinder B, against which the steam impinges, causing the revolution of B.

B³ is the final exhaust-port through B, where the steam escapes into the casing A. The steam finally escapes through the exhaust-pipe D to the atmosphere.

E is inlet-pipe.

C⁴ is the inner chamber or steam-chest of the inner cylinder C.

F is a drain-cock for drawing water from the casing A.

G A are saddles for supporting the casing A.

H H are stands and bearings for the cylinders B and C.

I is a pulley for transmitting the power through a belt to any suitable machine.

The operation of my rotary engine is as follows: The cylinders B and C are made slightly conical, so that any wear that should occur between the inner cylinder C and the outer cylinder B can readily be taken up. Steam enters the steam-chest C⁴ through the inlet-pipe E. The steam passes out from the chamber C⁴ through the ports C³, impinging against the small pockets B⁴ in the outer cylinder B, causing the cylinder B to revolve. The steam expands through the openings B² C³ until it exhausts through B³ into the casing A and from the casing A to the atmosphere through the outlet-pipe D.

Having described my invention, what I claim is—

1. A rotary engine, an inner stationary cylinder, an outer revolving cylinder, the working surfaces between the inner and outer cylinders being slightly conical, all substantially as described.

2. A rotary engine, an inner stationary cylinder, an outer revolving cylinder, the working surfaces between the inner and outer cylinders being slightly conical, a steam-chest within the inner stationary cylinder, all substantially as described.

3. A rotary engine, an inner stationary cylinder, an outer revolving cylinder, the working surfaces between the inner and outer cylinders being slightly conical, a steam-chest within the inner stationary cylinder, suitable ports leading from the inner cylinder to the outer cylinder, all substantially as described.

4. A rotary engine, an inner stationary cylinder, an outer revolving cylinder, the working surfaces between the inner and outer cylinders being slightly conical, a steam-chest within the inner stationary cylinder, suitable ports leading from the inner cylinder to the outer cylinder, small pockets in the outer cylinder against which the steam impinges, all substantially as described.

JOHN BRAY MARTIN.

Witnesses:

MILLIE ROETTGER,
ULELO MARTIN.