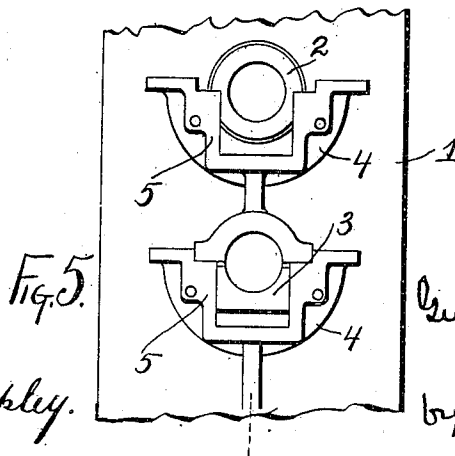
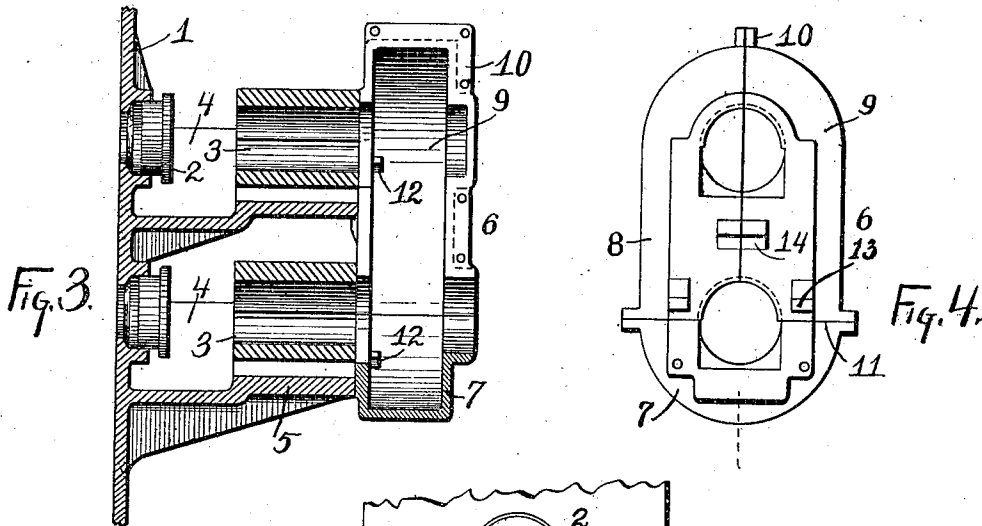
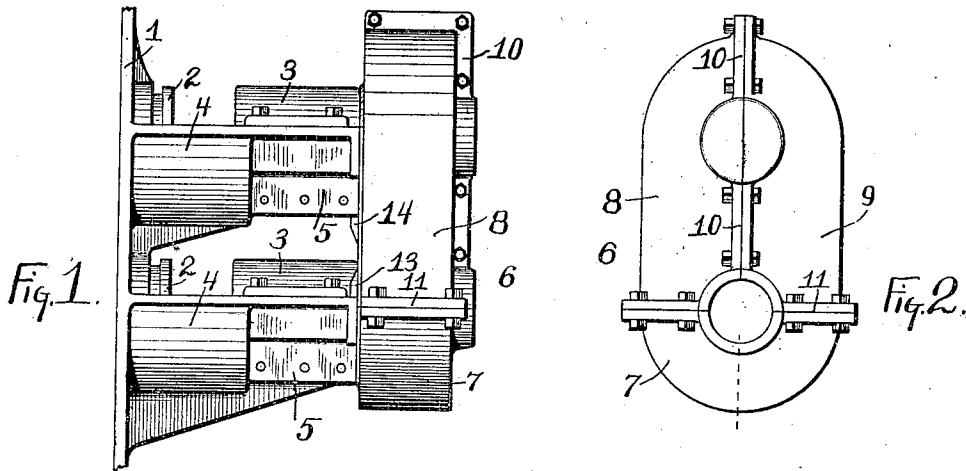


No. 838,541.

PATENTED DEC. 18, 1906.

G. C. HICKS, JR.  
HEAD FOR ROTARY BLOWERS.

APPLICATION FILED MAY 9, 1906.



Witnesses:  
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# UNITED STATES PATENT OFFICE.

GEORGE C. HICKS, JR., OF CONNERSVILLE, INDIANA, ASSIGNOR TO THE  
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## HEAD FOR ROTARY BLOWERS.

No. 838,541.

Specification of Letters Patent.

Patented Dec. 18, 1906.

Application filed May 9, 1906. Serial No. 315,890.

*To all whom it may concern:*

Be it known that I, GEORGE C. HICKS, Jr., a citizen of the United States, residing at Connorsville, Fayette county, Indiana, have  
5 invented certain new and useful Improvements in Heads for Rotary Blowers, of which the following is a specification.

This invention will be readily understood from the following description, taken in connection with the accompanying drawings, in which—

Figure 1 is a side elevation of a blower-head embodying my invention; Fig. 2, an outer face elevation of the gear-case; Fig. 3, a vertical central section of the general structure; Fig. 4, an inner face elevation of the gear-case, and Fig. 5 an outer face elevation of the head with the gear-case removed.

In the drawings, 1 indicates the head-plate of a rotary blower of the ordinary type in which the axes of the two impeller-shafts are arranged in a common vertical plane; 2, the stuffing-box glands for the shafts; 3, bearings for the shafts, the bearings being in  
15 alinement with their appropriate glands and being supported by independent but integrally-formed brackets projecting outwardly from the head-plate; 4, semicircular pans constituting parts of the bearing-brackets, these pans lying below the spaces between  
20 the glands and the inner ends of the bearings; 5, the pedestal portions of the bearings in rectangular trough form to receive the bed member of the bearings; 6, the gear-case secured against the outer ends of the bearings  
25 and serving as a vertical tie and strut between them; 7, the base of the gear-case, the same being in the form of an integrally-formed pan; 8, one of the upper quarters of the gear-case resting upon the base portion; 9, the other upper quarter of the gear-case; 10, the flanged vertical joint connecting the two upper quarters of the gear-case, this joint coinciding with the common vertical  
30 axis of the two bearings; 11, the flanged horizontal joint connecting the bases of the two upper quarters of the gear-case with the base 7; 12, bolts passing through the rear wall of the gear-case into the outer ends of the bearing-brackets and serving to secure the gear-case in position; 13, a pair of lugs projecting outwardly from the rear face of the gear-case and engaging downwardly over the outer end

of the lower bearing-bracket, one at each side of the lower bearing, and 14 a similar  
55 lug engaging upwardly under the upper bearing-bracket.

The bearing-brackets give support to the gear-case, and the gear-case acts as a stay and strut for the bearing-brackets. Either  
60 of the upper quarters of the gear-case may be removed for inspection of the gearing without disturbing the other upper quarter or the base of the gear-case and without the necessity for removing any oil that may be in the  
65 base of the gear-case. In the construction of rotary blowers, as is well known, the impeller-shafts projecting from one end of the blower-casing terminate when they have received the gears at that end of the machine,  
70 while at the other end of the machine one of the impeller-shafts terminates when it has received its gear at that end, while the other impeller-shaft proceeds onward past the gear to receive connection with the driving  
75 power. The outer flat face of one of the gear-cases would accordingly be perforated to permit the onward passage of the power-receiving impeller-shaft. This construction is illustrated in the drawings.

I claim—

1. A rotary blower-head comprising a head-plate provided with a pair of outwardly-projecting separated bearing-brackets, a shaft-bearing in the outer end of each of said brackets, an integrally-formed pan-shaped gear-case base secured against the outer face of one of the bearing-brackets and having a flat joint surface substantially in the plane of the axis of the bearing pertaining to the bracket  
85 to which it is attached, and a pair of quarter-cases secured against the outer face of the other bearing-bracket and secured to the flat joint face of the base, and secured to each other by a joint substantially in the common  
90 plane of the axis of the two bearings, combined substantially as set forth.

2. A rotary blower-head comprising a head-plate provided with a pair of outwardly-projecting separated bearing-brackets, a shaft-bearing in the outer end of each of said brackets, an integrally-formed pan-shaped gear-case base secured against the outer face of one of the bearing-brackets and having a flat joint surface substantially in the plane of the  
100 axis of the bearing pertaining to the bracket

to which it is attached, a pair of quarter-cases secured against the outer face of the other bearing-bracket and secured to the flat joint face of the base, and secured to each  
5 other by a joint substantially in the common plane of the axis of the two bearings, and lugs projecting from the inner wall of the quarter-cases toward the head-plate and en-

gaging between the outer ends of the bearing-brackets, combined substantially as set forth.

GEORGE C. HICKS, JR.

Witnesses:

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