

No. 692,186.

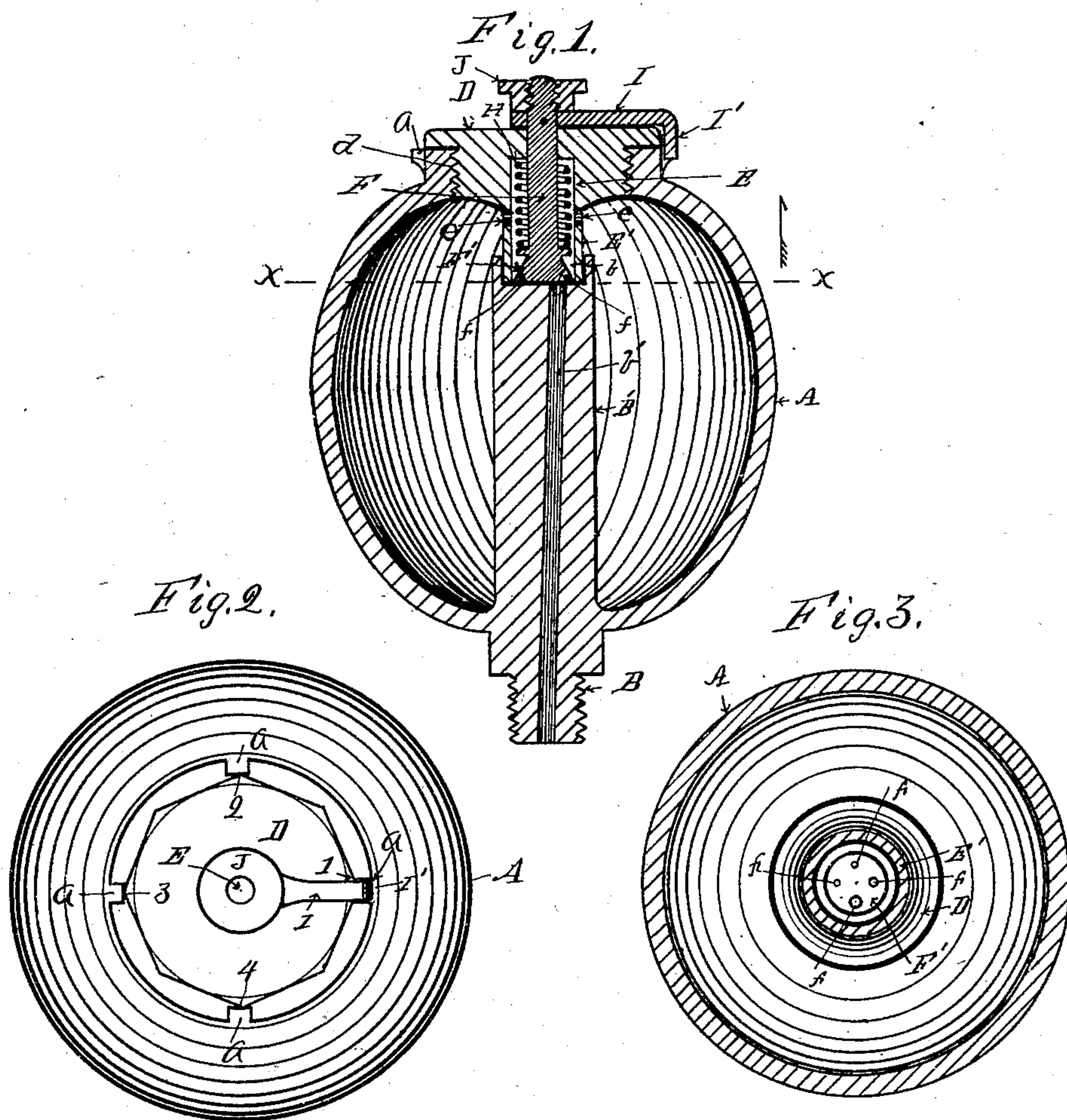
Patented Jan. 28, 1902.

W. G. MONTGOMERY.

CRANK PIN OIL CUP.

(Application filed May 7, 1901.)

(No Model.)



Witnesses.
H. M. Sturgeon.
F. J. Barute

Inventor.
William G. Montgomery
By H. M. Sturgeon
Att'y.

UNITED STATES PATENT OFFICE.

WILLIAM G. MONTGOMERY, OF ERIE, PENNSYLVANIA, ASSIGNOR OF ONE-HALF TO FREDERICK SHIELDS, OF ERIE, PENNSYLVANIA.

CRANK-PIN OIL-CUP.

SPECIFICATION forming part of Letters Patent No. 692,186, dated January 28, 1902.

Application filed May 7, 1901. Serial No. 59,123. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM G. MONTGOMERY, a citizen of the United States, residing at Erie, in the county of Erie and State of Pennsylvania, have invented certain new and useful Improvements in Crank-Pin Oil-Cups; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon, forming part of this specification.

My invention relates to improvements in crank-pin oil-cups, and has for its object the construction of an oil-cup for lubricating crank-pins adapted to be quickly adjusted to feed more or less oil to the crank-pin without taking the cup apart, as must be done as such lubricators are usually constructed. The mechanism by means of which I accomplish this result is hereinafter set forth and explained, and illustrated in the accompanying drawings, in which—

Figure 1 is a vertical central section of an oil-cup embodying my invention. Fig. 2 is a top or plan view of the same. Fig. 3 is a transverse section of the same on the line *xx* in Fig. 1 looking in the direction of the arrow.

In the drawings, A is an oil-cup having a screw-threaded stem B, a continuation B' of the stem extending up into the center of the cup nearly to the top thereof. The upper end of the part B' is turned out, so as to form a recess *b* therein, and from the bottom of the recess *b*, at one side of the center thereof, a passage *b'* extends down through the stem B' and B, so as to convey oil therethrough to the crank-pin to be lubricated. The cap D for closing the top of the oil-cup A is provided with a screw-thread *d*, which engages a like screw-thread in the opening in the top of the cup. The periphery of the upper part of the cap D is also preferably made octagon in shape, so that a wrench may be used thereon.

Projecting downward from the periphery of a recess E in the under surface of the cap D there is a tube E', which extends down into the recess *b* in the stem B', and in this recess E and tube E', I place a stem F, preferably

provided with a conical head F' on the lower end thereof, the lower end of which head F' fits down upon the bottom of the recess *b*, so as to make a tight joint therewith. Through this head F', I make small holes *f*, as illustrated in Figs. 1 and 3, which holes *f* can be brought successively into line with the opening *b'* in the stem B B'. In the sides of the upper part of the tube E' there are openings *e*, through which oil is thrown into the tube E' by the oscillations of the cup when in use, which oil passes down through one of the small holes *f* into the passage *b'*.

The stem F is provided with a spiral spring H, which operates to keep the head F' firmly seated on the bottom of the recess *b*, and the stem F also extends up through the top of the cap D and has an arm I secured thereto, which arm has a downturned end I', adapted to enter notches *a* in the periphery of the top of the cup A, and it is provided with a thumb-nut J, by means whereof the stem F can be raised up and rotated as desired and the arm I moved from one notch *a* to another, so as to bring a different-sized hole *f* in the head F' into line with the passage *b'*, so that the feed of oil can be varied as desired. The notches *a* are preferably provided with figures "1," "2," "3," and "4," so that the operator may know how to move the arm I to feed more or less oil. The operation of this oil-cup is so obvious that further description thereof is deemed unnecessary.

Therefore, having described its construction, so as to enable others to construct and use the same, what I claim as new, and desire to secure by Letters Patent of the United States, is—

1. The combination in a crank-pin oil-cup, of a cup, a stem projecting upward in the central part thereof, having a passage therein opening out of the top of said stem at one side of the center thereof, a cap closing the opening in the top of said oil-cup, a tube on said cap extending down upon the top of said stem and having lateral openings therein below the cap, a spring-actuated stem passing down through the cap of said oil-cup, a head thereon fitting down upon the upper end of the oil-cup stem, and having small holes therethrough, and an arm on the spring-actuated stem above

the cap, substantially as and for the purpose set forth.

2. The combination in a crank-pin oil-cup, of a cup, a stem projecting upward in the central part thereof having a recess in the top thereof, and a passage extending downward from one side of the center of said recess, through said stem, a screw-cap closing the top of said cup, notches in the periphery of the upper part of the cup, a tube extending downward therefrom into the recess in the top of the oil-cup stem and having lateral openings in the upper part thereof, a spring-actuated stem in said tube extending out

through the top of the cap, a conical head on the lower end of said spring-actuated stem, fitting down upon the bottom of the recess in the oil-cup stem, and having small openings therein, and an arm on said stem above the cap adapted to engage the notches in the periphery of the upper part of the cup, substantially as and for the purpose set forth.

In testimony whereof I affix my signature in presence of two witnesses.

WILLIAM G. MONTGOMERY.

Witnesses:

H. M. STURGEON,

H. J. CURTZE.