

J. B. Sweetland;
Horse Power.

N^o 48,600.

Patented July 4, 1865.

Fig. 1

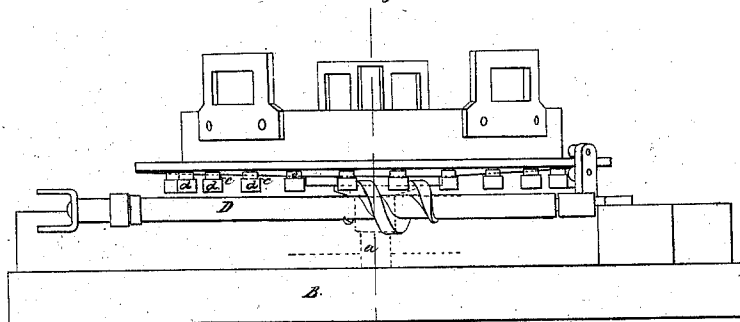
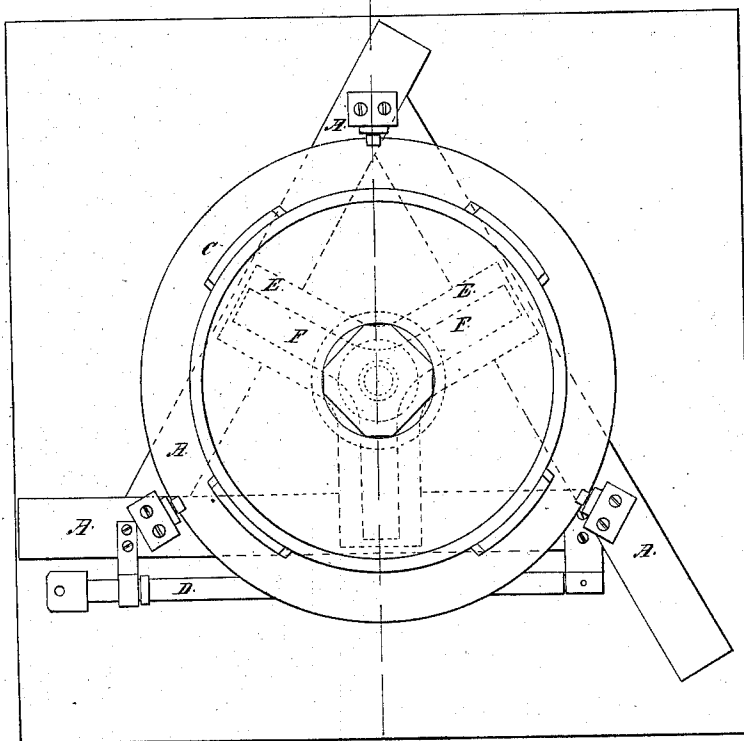


Fig. 2



Witnesses:
Chas. Alexander
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Inventor:
J. B. Sweetland
per Chas. Alexander

UNITED STATES PATENT OFFICE.

J. B. SWEETLAND, OF PONTIAC, MICHIGAN.

IMPROVEMENT IN HORSE-POWERS.

Specification forming part of Letters Patent No. 48,600, dated July 4, 1865.

To all whom it may concern:

Be it known that I, J. B. SWEETLAND, of Pontiac, in the State of Michigan, have invented certain new and useful Improvements in Horse-Powers; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon.

In the annexed drawings, making part of this specification, A represents the frame upon which the power is built. This frame consists of three pieces of timber, which are firmly secured together in a triangular form, as shown in Figure 2.

E and F represent two triangular metallic bed-plates, which are secured to the frame A, one on the upper side of said frame and the other on the lower side. The bed-plates are seen in dotted line, Fig. 2.

C represents the master-wheel of the machine, which is cast with an arm projecting from the center of its under side, which acts as an axis for the wheel to revolve around.

a, Fig. 1, represents this arm, which extends down through proper openings to receive it in the bed-plates E and F, and is secured in this position by means of a pin, which passes through it beneath the plate E. Upon the under side of the wheel C, near its periphery, are inserted a series of pins provided with small friction-rollers. These pins are placed equidistant on the wheel, and with the rollers work in between spiral threads upon a shaft, D, and give said shaft rotary motion.

c c represent the pins, and d d the friction-rollers on said pins.

The shaft D is secured to one of the pieces of the frame A, lying parallel with and close to it. Said shaft is provided with suitable bearings, which are secured fast to the frame-piece. This shaft D conveys power from the master-wheel C to whatever machine the power is designed to run.

Although only one shaft for driving machinery is here shown, it is evident that three may be used, one on each side, and secured to each of the pieces of the triangular frame. The object of making this frame in a triangular form is more particularly for the purpose of running three machines from one power when it is desired. The triangular frame gives more strength at less cost, and more capacity with the same strength and cost, than can be obtained otherwise.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is (not the wheel C or shaft D, but)—

The arrangement of the triangular frame A, the metallic bed-plates E and F, the master-wheel C, and the shaft D, the several parts being constructed and used together as and for the purpose herein specified.

J. B. SWEETLAND.

Witnesses:

JAMES S. DEWEY,
JAMES HARRIS.