

(No Model.)

M. T. SCARFF.
COPYING PRESS.

No. 367,012.

Patented July 19, 1887.

Fig. 1.

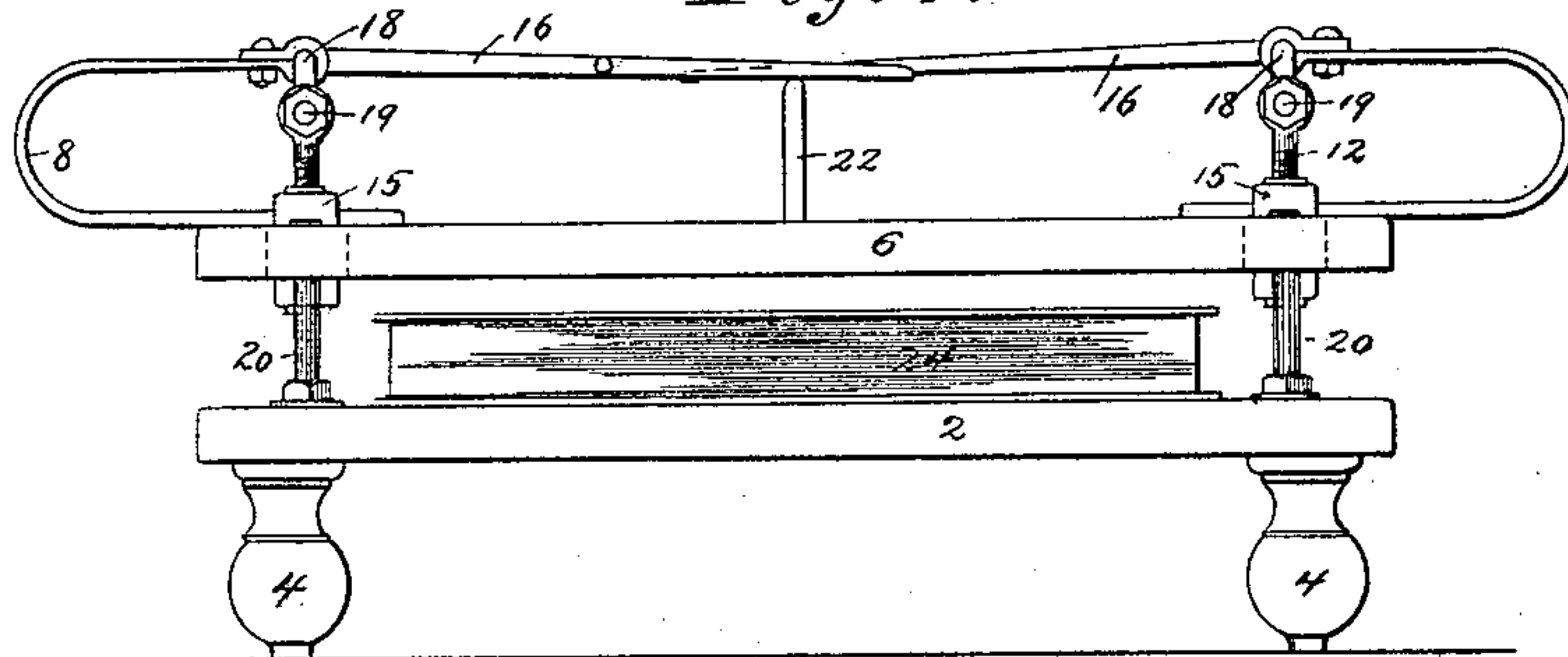


Fig. 2.

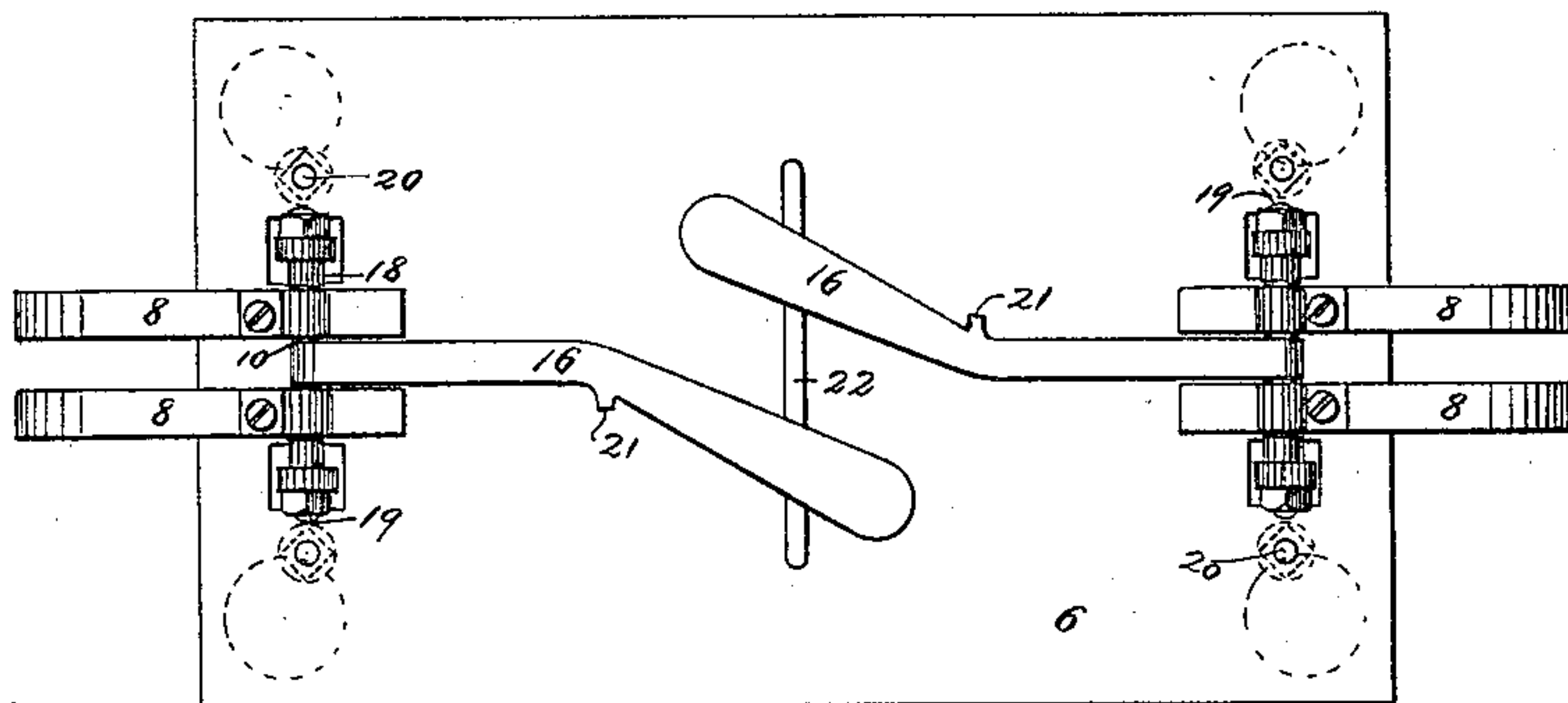
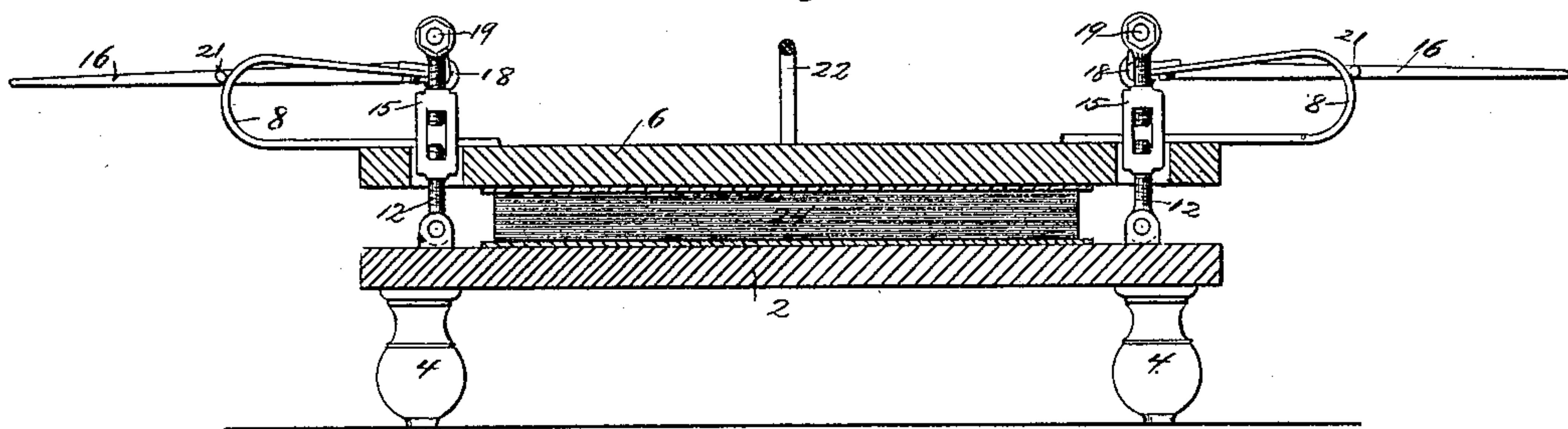


Fig. 3.



Witnesses
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UNITED STATES PATENT OFFICE.

MARK T. SCARFF, OF MICHIGAN CITY, DAKOTA TERRITORY, ASSIGNOR OF
ONE HALF TO THERON W. BEAN, OF SAME PLACE.

COPYING-PRESS.

SPECIFICATION forming part of Letters Patent No. 367,012, dated July 19, 1887.

Application filed August 30, 1886. Serial No. 212,171. (No model.)

To all whom it may concern:

Be it known that I, MARK T. SCARFF, of Michigan City, in the county of Nelson and Territory of Dakota, have invented certain
5 new and useful Improvements in Copying-Presses, of which the following is a specification.

My invention relates to certain improvements in that class of presses that are designed
10 particularly for copying letters; and it consists generally in constructing a press for this purpose in which the power or pressure is exerted by means of crank-actuated springs, the cranks
15 being operated by levers that are partially revolved and allowed to pass the dead-center at both ends of the stroke, thus locking the platen both in its elevated and depressed positions.

My invention further consists in the construction and combination hereinafter described, and particularly pointed out in the
20 claims.

In the drawings, which form a part of this specification, Figure 1 is a side elevation of my improved press, showing the levers in their
25 position when the press is not in use. Fig. 2 is a plan view of the same, and Fig. 3 is a longitudinal section showing the press in action.

2 represents the bed-plate of the press, preferably of rectangular form. It may be supported upon suitable legs, 4.

6 is a platen, preferably of a form to correspond to that of the bed-plate.

8 8 are U-shaped springs, which are attached at one end to the platen 6 and at the other to a
35 crank-shaft, 10.

12 12 are adjustable standards, which are attached to the bed-plate and form bearings for the crank-shaft upon which the platen is supported. These are preferably made in two
40 sections. The lower section is attached to the bed-plate and its end is provided with a left-hand screw-thread. The upper section has a bearing for the crank-shafts and its end is provided with a right-hand screw-thread.

15 is a double nut or turn-buckle screw-threaded to receive the right and left hand threaded ends of the standard 12.

The crank-axes 10 are preferably provided with the handles or levers 16 (which levers are
50 preferably secured to the said axes between

the springs 8) and the cranks 18 outside of the bearings of said springs and terminating with the journals 19, which are mounted in bearings in the standards 12.

20 are guide pins or bolts attached to the bed-plate and extending through the platen for the purpose of keeping it in its proper position. Any suitable means may be used for guiding the platen.

22 is a support secured to the platen 6, upon which the ends of the levers 10 rest when out of action. The levers 10 are provided with projections 21, adapted to engage the springs and limit the outward movement of the said
65 levers.

24 represents a letter-book in position in the press.

The operation is as follows: The book or other article or material is placed in position on the bed-plate, as shown in Fig. 1. The
70 levers 16 are grasped in the hand, raised, and thrown outward. This motion partially revolves the crank-shaft 10 and causes the cranks 18 to be thrown downward and assume the position shown in Fig. 3, when the projections 21
75 strike the springs and prevent a further revolution. When the levers are in this position, the said cranks have passed the dead-center and are locked by the upward tension of the springs. The springs 8 yield to the downward
80 movement of the crank, and not only allow for a varying thickness of the books, but give a more even and uniform pressure. When the process of copying has been completed, the levers may be raised and thrown inward to
85 their original position, the crank-shafts revolved, and the cranks thrown upward, thereby raising the springs 8 and the platen 6, attached thereto. The levers may be revolved until they come in contact with the support 22, which
90 limits their motion. The cranks have by this time passed the dead-center, and the tendency of the weight of the springs and platen is to hold the levers in this position upon the support.

By operating the levers from the center outward to give the pressure I avoid the necessity of fastening down the press, as the pressure is equally distributed upon both ends of the press, and the tendency is to hold it in place.

I do not confine myself to any particular 100

form of springs or levers. In some instances suitable eccentrics might be used as the equivalent of the crank-shafts.

While the press is particularly designed for a copying-press, it may be used for any other purpose for which it is adapted.

I claim as my invention—

1. The combination, in a press of the class described, with a suitable bed-plate, of standards fixed to said bed-plate, a crank-shaft mounted on said standards, an operating-lever, a platen, and springs secured to said platen and to said crank-shaft, substantially as described.

2. The combination, in a press of the class described, with the bed-plate 2, of the standards 12 at the opposite ends of the bed-plate, the crank-shafts 10, having levers 16, journaled in said standards, the platen 6, and the springs 8, secured to said platen and to said crank-shafts, substantially as described.

In testimony whereof I have hereunto set my hand this 24th day of August, 1886.

MARK T. SCARFF.

In presence of—

E. A. LAMB,
T. W. BEAN.