

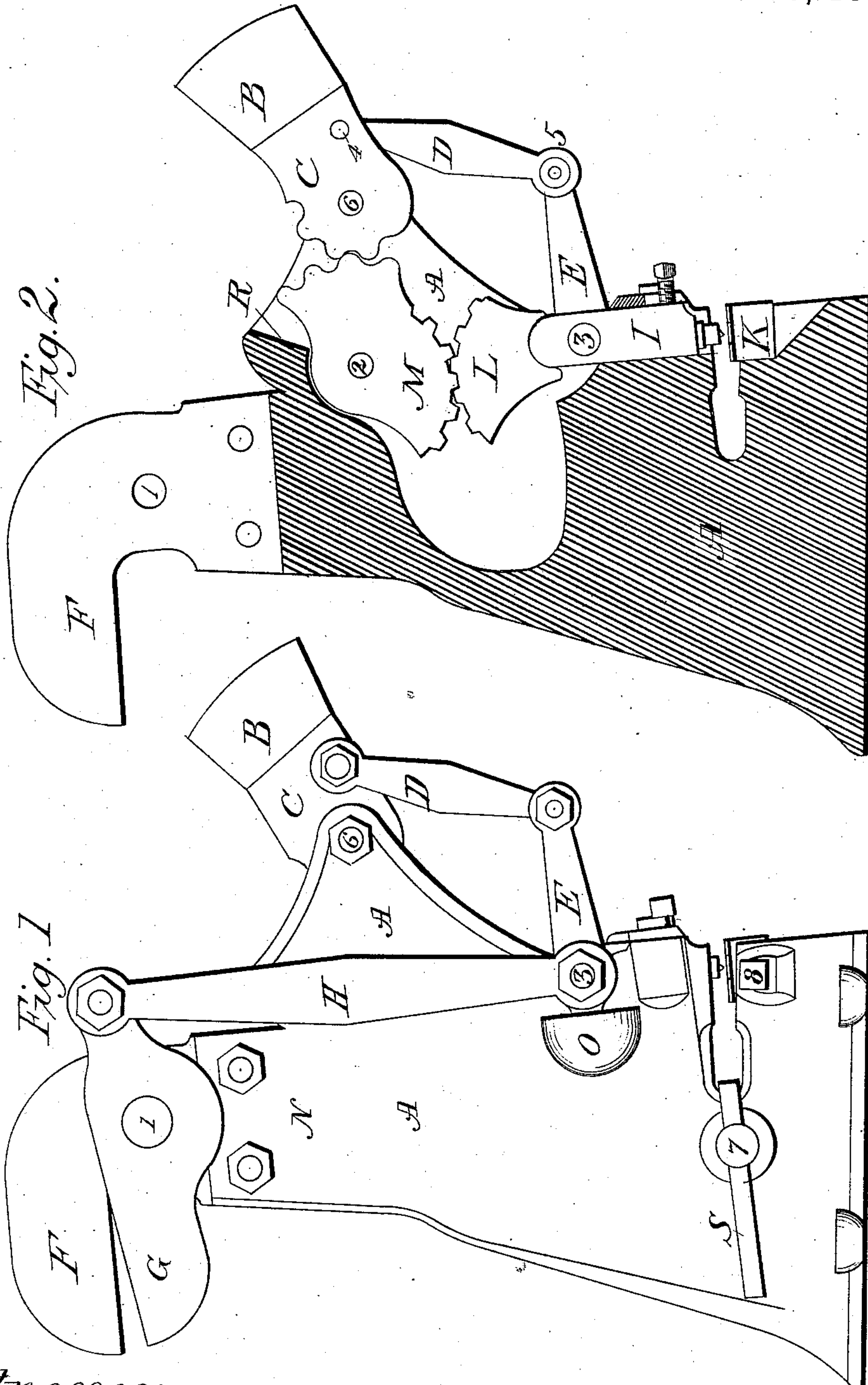
(No Model.)

N. J. RICE.

COMBINED PUNCHING AND SHEARING MACHINE.

No. 365,490.

Patented June 28, 1887.



Witnesses:
A. B. Richmond
Chas. Richmond

Inventor:
Nicholas J. Rice

UNITED STATES PATENT OFFICE.

NICHOLAS J. RICE, OF MEADVILLE, PENNSYLVANIA.

COMBINED PUNCHING AND SHEARING MACHINE.

SPECIFICATION forming part of Letters Patent No. 365,490, dated June 28, 1887.

Application filed November 3, 1886. Serial No. 217,905. (No model.)

To all whom it may concern:

Be it known that I, NICHOLAS J. RICE, of Meadville, Crawford county, Pennsylvania, have invented a Compound Punch and Shears, of which the following is a specification.

The invention will first be described in connection with the drawings, and then pointed out in the claims.

Figure 1 of the drawings is a side elevation, and Fig. 2 a vertical section.

In the drawings, A represents the supporting-frame which carries the fixed shear F and, on a pivot, the movable shear G, pivoted at 1. The rear end of shear G is connected, by a pivoted bar, H, on each side of the frame, with a lever, E, pivoted on the punch I and in the socket O of frame, so as to have two fulcrums. This lever E is connected with the hand-lever C, having socket B, by the pivoted rod D, while the punch I is connected therewith by the sin-

gle-spurred cam L and the double-spurred cam M, which has a bearing, R, in the frame. Hence the punch I is actuated by two separate trains of mechanism, giving great leverage, while the shears are worked simultaneously.

K is the apertured die used with the punch, and S the gage which I preferably employ.

What I claim as new, and desire to protect by Letters Patent, is—

1. The mechanism C D E, combined with the mechanism M L, to operate the punch, as described.

2. The combination, with the lever C and shear G, of the mechanism D E H, of which the lever E is pivoted in the movable punch I, as and for the purpose specified.

NICHOLAS J. RICE.

Witnesses:

A. B. RICHMOND,
JOHN RICE, Jr.