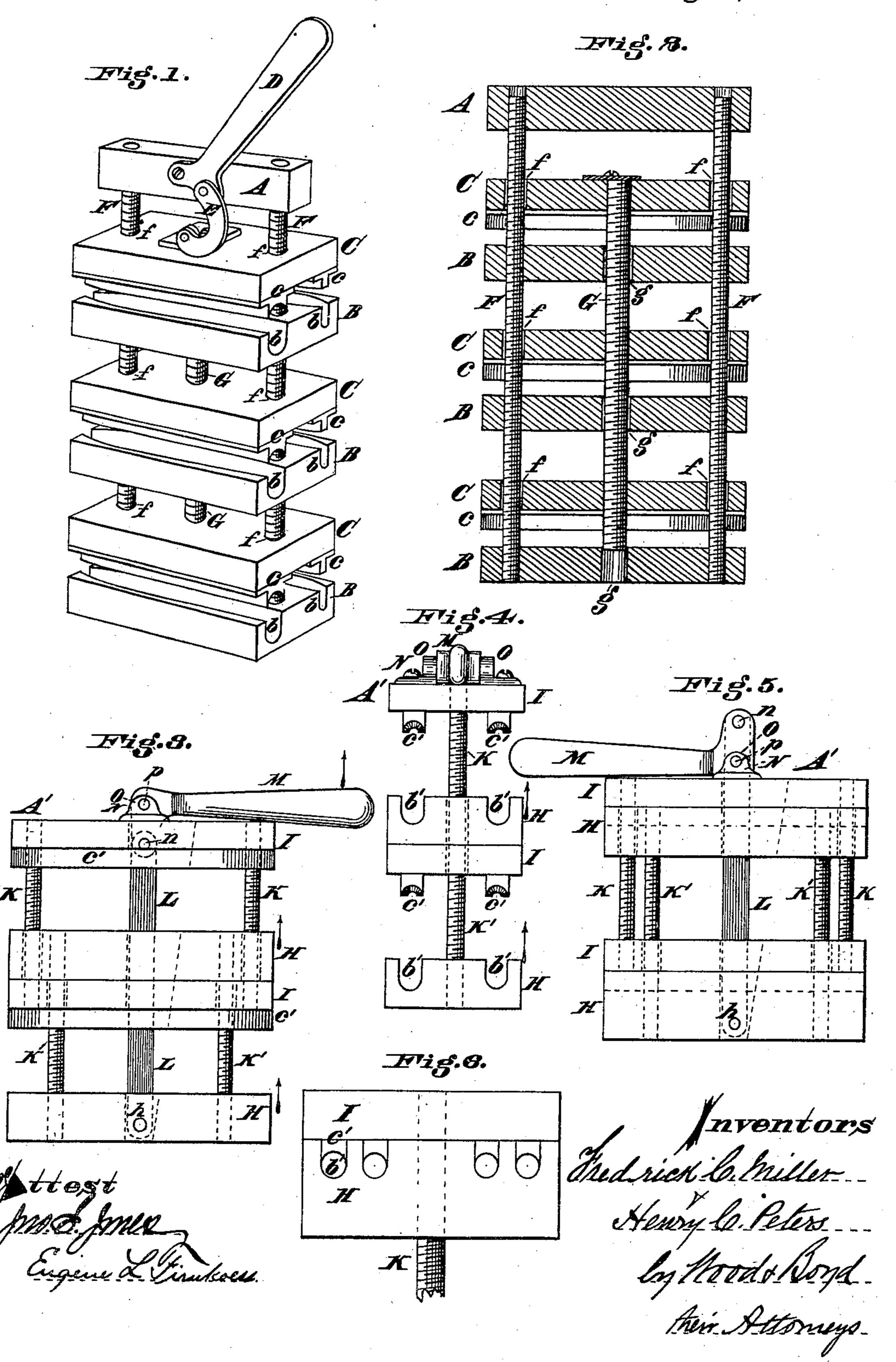
(No Model.)

F. C. MILLER & H. C. PETERS.

CIGAR MOLD.

No. 245,536.

Patented Aug. 9, 1881.



## UNITED STATES PATENT OFFICE.

FREDRICK C. MILLER AND HENRY C. PETERS, OF NEW YORK, N. Y.

## CIGAR-MOLD.

SPECIFICATION forming part of Letters Patent No. 245,536, dated August 9, 1881.

Application filed May 12, 1881. (No model.)

To all whom it may concern:

Be it known that we, FREDRICK C. MILLER and HENRY C. PETERS, both citizens of the United States, and residents of New York, in 5 the county of New York and State of New York, have invented certain new and useful Improvements in Cigar - Molds, of which the

following is a specification.

Our invention relates to an improvement in 10 cigar - molds; and it consists in combining a series of cigar-molds to a press-beam so that one portion of the series of molds are attached to each other, so as to form the beam of the press, held in a fixed position, while the other 15 portion is connected to the stationary parts by pressure mechanism, the movement of which pressure mechanism opens and closes the molds and presses the bunch into shape for cigars.

Another feature of our invention consists in 20 so combining a series of cigar-molds with each other that one portion of each mold forms the beam of a press, and the other half of each mold is moved up and down by pressure mechanism, so as to form the movable platens of a com-

25 pound press.

Another feature of our invention relates to means used for uniting the series of movable and fixed portions of the cigar-mold to the pressbeam, so that one portion of the mold is held 30 in a fixed position and the other portion is adapted to be moved by lever mechanism; and it consists of two sets of iron screws, one set passing loosely through the movable portion of the mold, acting as guide - rods, and the other 35 set of screws firmly uniting the stationary part of the mold to the press-beam, so as to hold these parts in a relatively fixed position.

The object of our invention is to provide a series of cigar-molds which, united, form a com-

40 pound eigar-mold press.

Another object is to connect a series of cigarmolds to each other and to the press-beam, so | plungers c and matrices b, made in the usual that the molds can be operated without the use of a secondary press, one portion of the molds 45 being stationary to form the bottom of the press and the other portion being movable and themselves form press-platens.

Other material advantages in cheapness, simplicity, and durability are obviously obtained

50 by the use of our invention.

Various other features of our invention will be more fully set forth in the description of the accompanying drawings, making part of this specification.

In the accompanying drawings, Figure 1 is 55 a perspective view of a cigar - mold press embodying one of the forms of constructing our invention. Fig. 2 is a central longitudinal section of the same. Fig. 3 is a longitudinal elevation of another mode of constructing and op- 60 erating our press, showing the molds open. Fig. 4 is an end view of the same. Fig. 5 is a longitudinal elevation of the same, showing the molds closed. Fig. 6 is an end view of a modified form of our press, showing the molds closed. 65

A represents the press-beam. A' represents a second form of press-beam, which is provided with a mortise in a center, through which passes the pitman or connecting rod. This is the preferred form of making the press-beam, as it per- 70 mits the press mechanism to be centrally attached to the movable portion of a cigar-mold which acts as the movable platen of the mova-

ble press.

Figs. 1 and 2 show a series of molds united 75 to form a compound press, the parts of which are so attached that the matrix-blocks B are rapidly attached to the press-beam A, so as to form the stationary portion of the presses, and the lid C, carrying plungers c, is connected to 80 the press-beam A by means of crank-lever D and link E, so that the movement of the lever D raises or lowers the platen C and opens or closes the molds.

Instead of employing the crank-lever D and 85 link E, a screw might pass through the pressbeam A and be attached by a swivel to the upper platen, C, to operate the compound press, or other modes of applying lever and screw power might be employed.

The blocks Band Care made of wood, and have manner. These blocks B and C are shown to have but two plungers and matrices; but it is obvious that the blocks may be made larger 95 and provided with additional plungers and matrices.

F F represent screws, which are preferably made with a wooden screw-thread, so that as they are driven in position they will cut the fe- 100

male screw-threads in the wooden blocks B and into the press-beam A, thereby holding the parts A and B in a fixed relative position. The holes f, pierced through the platen-lid C, are 5 sufficiently large to allow them to move freely over the rods F as they are operated by the pressure mechanism.

G represents a similar screw to the screws F. This screw G securely attaches the series of 10 blocks C in a fixed relative position to each other. Holes g are pierced through the center of blocks B, and are made much larger than the screw G, so as to allow it to pass freely through the blocks B as the molds are opened 15 and closed. The employment of these screws for attaching one portion of the mold fixedly to the press-beam A, and provided with a second screw to attach the series of platens in a fixed relative position with each other, and so 20 that they can slide freely upon the other screws as guide-rods, is one of the important features of our invention, as it provides a cheap and secure means of connecting and holding the parts reliably in position for operation.

Figs. 3, 4, and 5 show a modification of our invention, in which the bottom or matrix portion of the molds is attached to the press mechanism, so as to rise and fall while the lid or plunger part of the molds is in a fixed rela-30 tive position with reference to the pressure mechanism. The top lid of the series of cigar-

molds forms the press-beam.

K K' represent wood-screws, which firmly unite and hold in a fixed position the plunger-35 blocks I, which are provided with plungers or cups c', made in the usual manner.

H H represent the matrix-blocks, which are

provided with the usual matrices b'.

L represents a pitman, which is pivoted to 40 the bottom block H, which is preferably provided with a mortise, into which the pitman L

projects.

h represents the pivot connecting the pitman L with the block H. The remaining se-45 ries of blocks, HI, are provided with mortises, as shown by dotted lines, Figs. 3 and 5, which are of sufficient width to allow free movement of the pitman L.

M represents a bell-crank lever, which is 50 pivoted between ears O of the cap N by pivot p. n represents a pivot connecting the end of

bell-crank lever M with the pitman L. Fig. 3 shows the press-molds open. the lever M is reversed, as in the position

55 shown in Fig. 5, the presses are closed.

It is obvious that the levers M and D may be made to have their pivot-points pass the center and lock or hold the presses in position for retaining the bunches in the presses until 60 they become set.

It is obvious that various detail changes may be made in the principle of construction and operation of our eigar-mold, as the presserbeam A in Fig. 1 may be dispensed with and 65 the pressure mechanism be attached to the un-

der block B, in the manner similar to the attachment of the opposite part in Figs. 3, 4, and 5, in which event the block B would become the pressure-beam, and would be an equivalent for the beam A. (Shown in Figs. 1 and 2.)

Instead of employing screws to act as attaching and guide rods, plain rods, pins, or bolts or screws may be employed, and still the device would be substantially embodied in the first and second clause of claim herein.

It is also obvious that when a greater number of blocks, H I, are used to form the press shown in Figs. 3 and 5 the pitman L need not be pivoted to the lower series of blocks, but may be pivoted to any block above it, as the 80 raising of one of the series of blocks H raises all the series.

We claim—

1. A compound eigar-mold press composed of a series of cigar-molds, each of said molds 85 composed of two members, one member of each mold being held in a fixed relative position with respect to each other, while the other members are loosely connected with the said fixed members, and are constructed and are 90 ranged to receive the bunches for pressing, act as press-platens, and be automatically brought into and out of contact with said fixed portions, substantially as described.

2. A compound eigar-mold press composed 95 of two or more series of cigar-molds, one portion of each being rigidly held in a relative fixed position with respect to each other, while the other portions are connected by pressure mechanism with the fixed portions, so that the 100 operation of the pressure device opens or closes the molds, substantially as herein set forth.

3. A compound eigar-mold press composed of two or more cigar-molds organized to be automatically opened and closed, one portion 105 of each mold being connected together and held in a fixed position by means of screws which also act as guide-rods for the movable portion of the mold, said movable portions acting as press-platens, substantially as herein 110 set forth.

4. A compound eigar-mold press composed substantially of two or more cigar-molds, one portion of each mold being connected together and held in a fixed position by means of screws 115 which act as guide-rods to the movable portion of the mold, which act as press-platens and are operated by suitable pressing mechanism for automatically opening and closing the parts and shaping the cigar-bunches, substantially 120 as herein set forth.

In testimony whereof we have hereunto set our hands in the presence of two subscribing witnesses.

> FREDRICK C. MILLER. HENRY C. PETERS.

Witnesses: HERMANN ALBERT, CHR. DIPPEL.