C. E. PRIEST.

CAN STAMPING MACHINE.

APPLICATION FILED SEPT. 17, 1918.

1,304,904.

Patented May 27, 1919.

2 SHEETS—SHEET 1.

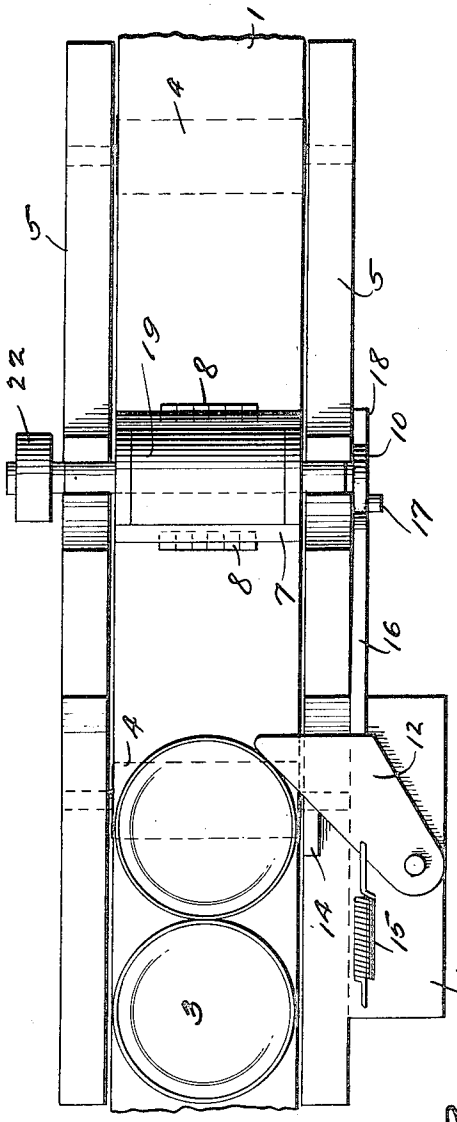


Fig. 1.

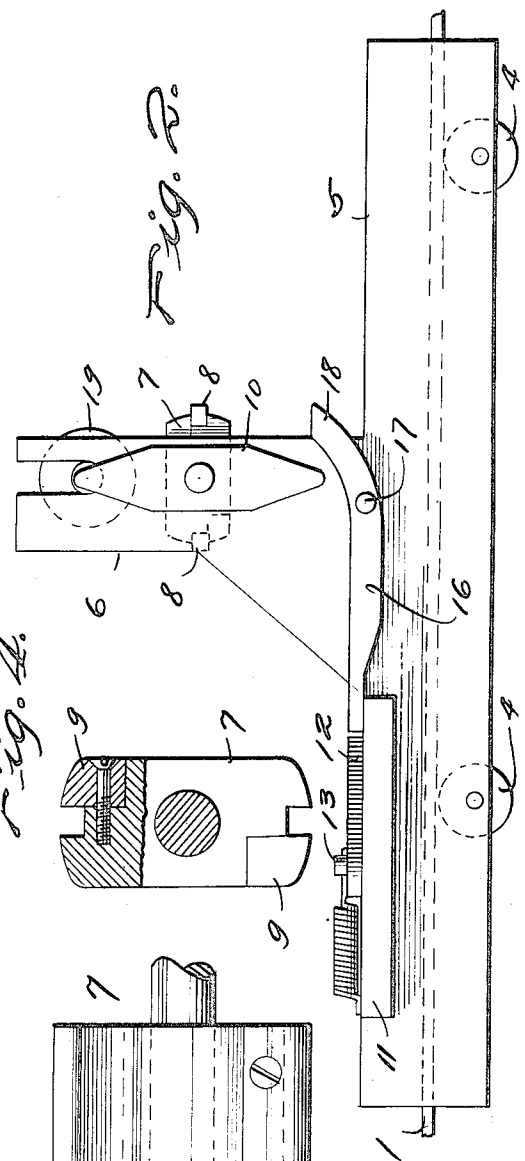


Fig. 2.

Fig. 4.

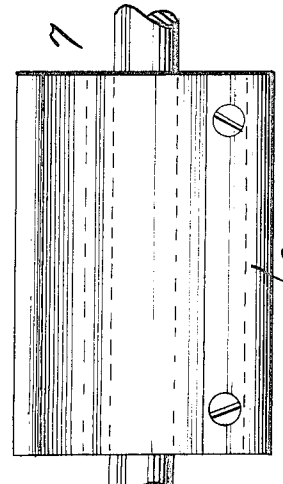


Fig. 3.

WITNESSES

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2 SHEETS—SHEET 2.

Fig. 5.

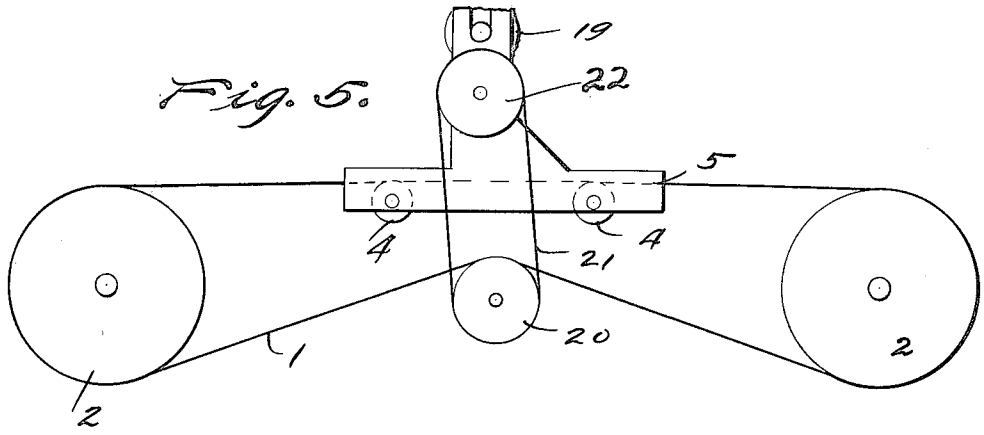


Fig. 6.

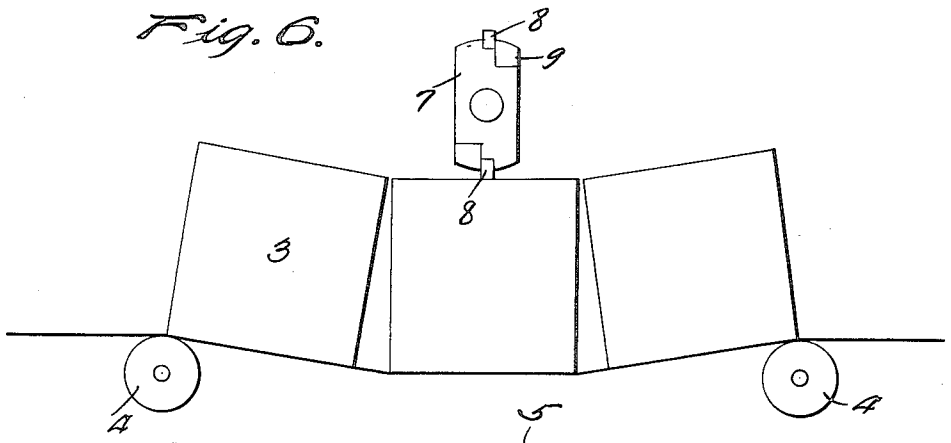
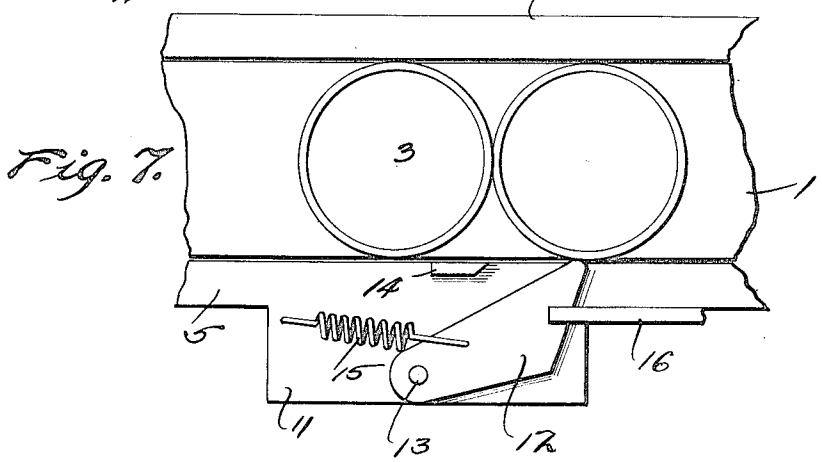


Fig. 7.



WITNESSES

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CAN-STAMPING MACHINE.

1,304,904. Specification of Letters Patent. Patented May 27, 1919.

Application filed September 17, 1918. Serial No. 254,452.

To all whom it may concern:

Be it known that I, CHARLES E. PRIEST, a citizen of the United States, residing at Malvern, in the county of Chester and State of Pennsylvania, have invented certain new and useful Improvements in Can-Stamping Machines, of which the following is a specification.

This invention relates to a novel machine for marking packages intended to bear the date of packing and other data required to be applied after the containers have been filled and sealed and otherwise prepared for market.

The invention aims to provide a machine embodying a feeder and a stamp, the latter consisting of a marker of suitable formation, the feed being controlled to insure proper positioning of the packages to receive the imprint or mark.

The invention also aims to provide a yieldable traveling bed for the packages to prevent injury to the stamp and insure a sharp outline to the mark, since the moving parts travel at a uniform speed and obviate any relative drag which would tend to blur the mark.

The invention also aims to provide a feed control which is simple, positive in action and efficient in operation and which is governed in part by the packages and partly by the stamp or marker, the conveyer moving at all times when the machine is in operation whether the packages are advancing or are arrested, in the latter case the conveyer slipping beneath the packages.

The drawings illustrate a preferred embodiment of the invention, however, it is to be understood that in adapting the same to meet different conditions, various changes in the form, proportion and minor details of construction may be resorted to without departing from the nature of the invention as claimed hereinafter.

Referring to the accompanying drawings:—

Figure 1 is a top plan view of parts of a can stamping machine embodying the invention,

Fig. 2 is an elevation of the parts illustrated in Fig. 1,

Fig. 3 is a detail view in elevation of the rotary stamp or marker, the type being omitted,

Fig. 4 is an end view of the stamp, parts being broken away,

Fig. 5 is a diagrammatic view,

Fig. 6 is a detail view showing more clearly the yieldable bed, and the operative position of the stamp or marker, and

Fig. 7 is a detail view showing the positions of the elements comprising the feed control when the packages are advancing.

Corresponding and like parts are referred to in the following description and indicated in the several views of the drawings by like reference characters.

The machine embodies an endless conveyer 1 which is supported at its ends on rollers or drums 2. The conveyer 1 may consist of a belt of any construction so as to receive and support the packages 3 to be stamped or marked. Motion may be imparted to the conveyer in any manner so as to cause its upper portion to travel toward the right. Rollers 4 support a portion of the upper run or member of the conveyer. That portion of the endless conveyer comprised between the sustaining rollers 4 constitutes the bed upon which the packages are supported when receiving the imprint of the stamp or marker. This is indicated most clearly in Fig. 6 which shows that part of the conveyer between the sustaining rollers 4 deflected downwardly.

The frame-work comprises side pieces 5 which are disposed at the edges of the upper run or member of the conveyer and project above the conveyer a distance to hold the packages against lateral displacement. Uprights 6 project vertically from the side pieces 5 and are slotted in their upper ends and receive the journals of a roller 7 which performs the function of a stamp or marker. The roller 7 has opposite sides flattened and the intermediate side grooved or otherwise formed to receive type 8 by means of which the packages are marked. The type 8 are made removable, thereby admitting of the nature of the stamp or mark being changed as required to meet existing conditions. The roller 7 is provided with removable portions 9 whereby provision is had for changing the type 8 as required. The roller may be of any construction and provided with any number of marking surfaces 8. In assembling the parts, provision is had for driving the roller 7 so as to cause

the marking surface 8 to travel at a speed equal to that of the conveyer 1 so that the type will remain in contact with the package without any relative drag which would result in blurring the imprint.

A tappet 10 is secured to one of the journals of the rotary stamp or marker 7 and its opposite ends are made tapering. The purpose of this tappet is to operate the locking device, so as to effect disengagement thereof from the feed control at the proper time, thereby insuring proper presentation of the packages to the stamp or marker for receiving the imprint thereof.

One of the side pieces 5 has a lateral extension 11. A member 12 is supported upon the lateral extension 11 and is pivoted thereto at one end, as indicated at 13. The member 12 constitutes the feed control and its free end extends across the path of the packages as indicated most clearly in Fig. 1. A stop 14 projecting upwardly from the lateral extension 11 limits the movement of the feed controlling member 12 in one direction. A contractile helical spring 15 normally exerts a pulling force on the member 12 to yieldably hold it in contact with the stop 14 and with its free end projected across the path of the packages 3. A locking member 16 is pivoted between its ends at 17, to the frame-work and the end adjacent the member 12 is adapted to engage the same and hold the feed controlling member in normal position, as indicated most clearly in Fig. 1. The rear end of the locking member 16 is curved upwardly as indicated at 18, so as to be engaged by the tapering ends of the tappet 10, whereby the locking device is operated at stated intervals to move its forward end out of the path of the feed controlling member 12, so that the latter may be pushed aside by the advancing packages 3. The parts are so proportioned and arranged to insure proper timing and the presentation of the packages to the stamp or marker to receive the imprint thereof.

In the operation of the invention the packages to be stamped or marked are placed upon the upper run of the conveyer 1. In this connection it is observed that the conveyer may be of any length and arranged to receive packages from different sources and to deliver the same at a common point of discharge or in any other determinate way. The stamp or rotary marker 7 is positioned opposite a point midway between the rollers 4 and is positively driven at a speed so that the printing surface travels at a speed equal to that of the conveyer to insure a sharp outline being given to the mark impressed upon the package. The printing surface is supplied with ink by means of a roller 19 which is mounted in slots formed in the upper end of the upright 6. The endless conveyer may be driven in any manner and as shown a roller 20 engages the lower run and a drive belt 21 connects said roller with a pulley 22 at one end of the stamp or rotary marker. The packages may be cans such as commonly provided for holding goods in marketable form. The packages or cans when placed upon the conveyer 1 are advanced thereby to the stamp or marker and successively engage the projecting end of the feed controlling member 12. If the member 12 is prevented from outward movement by the locking device 16, the forward movement of the packages is arrested. During this time, the conveyer continues its forward movement and slips beneath the packages. When the locking device 16 is tripped by means of the tappet 10, the end of the feed controlling member 12 projecting into the path of the packages is moved outwardly against the tension of the spring 15 and the instant the foremost package clears the member 12, the latter moves inward so as to engage the next package. The package released advances to the stamp and receives the imprint of the type or printing surface, both the package and printing surface moving uniformly and the package yielding so as to avoid injury to the stamp while insuring application of sufficient pressure to secure a clear imprint. The locking device 16 is operated momentarily and returns to position to engage the feed controlling member 12 and lock the same until the member 16 is again actuated by the tappet 10. The locking device is made heavy at its forward end but it is to be understood that the action of gravity may be supplemented by a spring should it be found necessary to employ the spring. After the packages have been stamped or marked, they are delivered by means of the conveyer 1 to any required point of discharge.

The foregoing description and the drawings have reference to what may be considered the preferred or approved form of my invention. It is to be understood that I may make such changes in construction and arrangement and combination of parts, materials, dimensions, etc., as may prove expedient and fall within the scope of the appended claims.

Provision is contemplated for adjustment to adopt the machine for cans of different heights and widths.

Having thus fully described my invention, what I claim as new and desire to secure by Letters Patent is:—

1. A package stamping machine, comprising a rotary stamp, a tappet rotatable with the stamp, a conveyer beneath the stamp for advancing and delivering the packages, a pivoted feed controlling member disposed at one side of the conveyer and having a limited movement, means for yieldably hold-

ing an end of the pivoted member in the path of the packages, and a lock member pivoted between its ends and having one end lockingly engaging the said pivoted member and having its opposite end extending in the path of the tappet to be engaged thereby to release the pivoted feed controlling member.

2. A package stamping machine, comprising a rotary stamp, a tappet rotatable with the stamp, an endless conveyer for advancing and delivering the packages, means yieldably supporting a portion of the conveyer beneath the stamp, a support at one side of the conveyer, a feed controlling member pivoted on the support and having an end portion extending into the path of the packages, a stop for limiting the movement of said member in one direction, means for yieldably holding the member against the stop and in the path of the packages and a lock member pivoted between its ends and having one end engaging the said support and held thereby in the path of the feed controlling member and having its opposite end projecting into the path of the said tappet to be actuated thereby.

3. In a machine of the character specified, an endless conveyer, spaced sustaining rollers disposed beneath the upper run of the endless conveyer, and a stamp arranged above that portion of the endless conveyer comprised between the said sustaining rollers.

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

CHARLES E. PRIEST.

Witnesses:
J. DARLINGTON PRIEST,
J. T. ENTRIKEN.