March 20, 1962 O. W. HIRSCHFELD 3,026,023

BANK FOR PAPER MONEY

Filed March 11, 1960

FIG. 2.

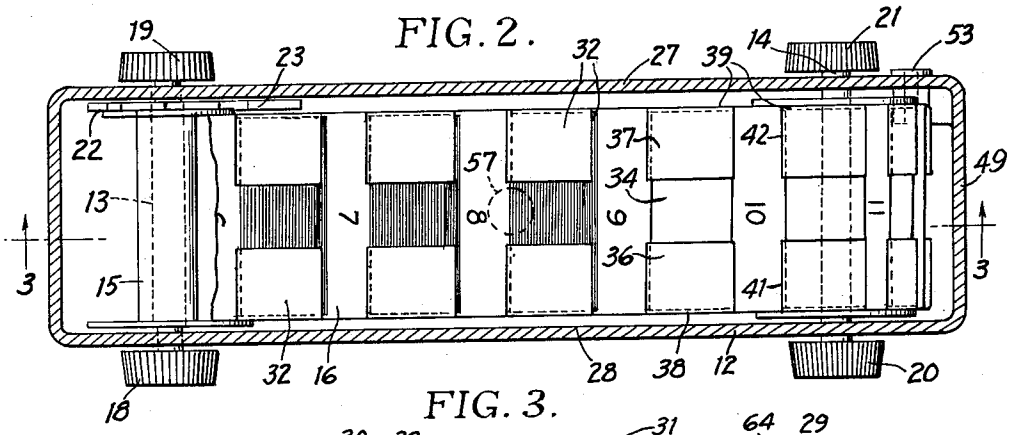


FIG. 3.

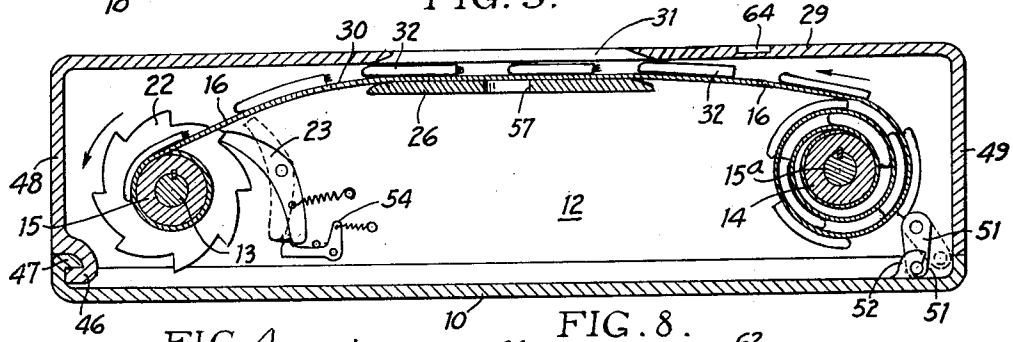


FIG. 4.

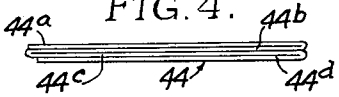


FIG. 8.

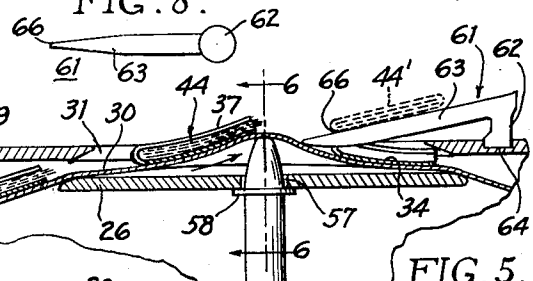
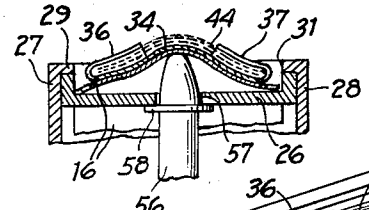


FIG. 5.

FIG. 6.



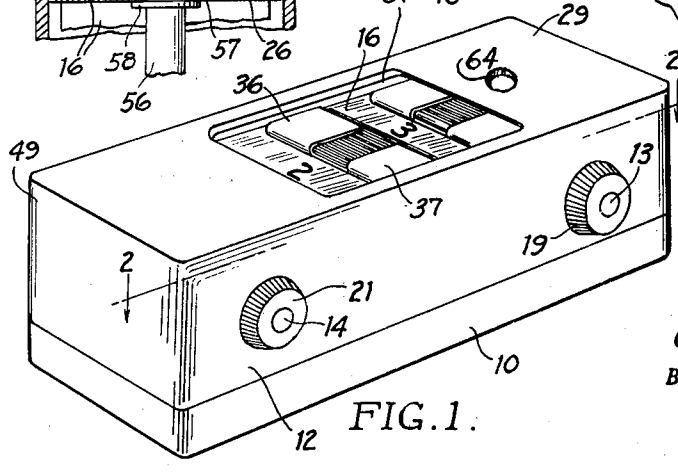


FIG. 1.

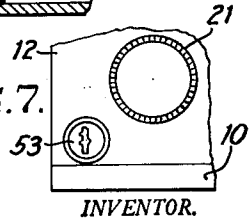


FIG. 7.

INVENTOR.
OSCAR W. HIRSCHFELD
BY Pearce & Schaeperklaus

ATTORNEYS

United States Patent Office 3,026,023 Patented Mar. 20, 1962

3,026,023

BANK FOR PAPER MONEY

Oscar W. Hirschfeld, 9045 Indian Ridge Lane, Cincinnati 43, Ohio

Filed Mar. 11, 1960, Ser. No. 14,423
4 Claims. (Cl. 232—4)

This invention relates to a receptacle or bank for receiving paper money.

An object of this invention is to provide a bank for paper money in which pieces of paper money or bills may be deposited therein and retained therein until the bank is opened.

A further object of this invention is to provide a bank of this type in which a count of bills may be made as the bills are deposited therein.

A further object of this invention is to provide a bank of this type in which a movable flexible tape or belt is provided which passes a window in a wall of the bank and in which the movable belt carries pockets into which bills may be placed as the belt passes the window.

A further object of this invention is to provide a bank of this type in which the pockets engage opposite edges of each bill with the center of the bill being released, so that, when the underside of the belt is pushed outwardly at the center part thereof to bend and flex the center part of the belt as the belt moves past the window, the bills in the pockets are sprung away from the belt to be readily removable.

The above and other objects and features of this invention will be apparent to those skilled in the art to which this invention pertains from the following detailed description and the drawing, in which:

FIG. 1 is a perspective view showing a bank for paper money constructed in accordance with an embodiment of this invention, a plurality of bills being shown therein;

FIG. 2 is a view in section taken on the line 2—2 in FIG. 1, a section of a belt which forms a part of the bank being broken away to reveal internal construction;

FIG. 3 is a view in section taken on the line 3—3 in FIG. 2;

FIG. 4 is a view in end elevation of a folded bill ready for insertion into pockets of the belt of the bank;

FIG. 5 is a fragmentary view in lengthwise section of the bank with a bill removing horn and rod assembly in position therein;

FIG. 6 is a view in section taken on the line 6—6 of FIG. 5;

FIG. 7 is a fragmentary view in side elevation of a portion of the bank; and

FIG. 8 is a bottom plan view of the bill removing horn.

In FIGS. 1, 2, and 3, a bank constructed in accordance with an embodiment of this invention is shown which includes a lower base section 10 and a hollow upper section 12. Rotatably mounted in the upper section 12 are shafts 13 and 14 which carry rolls 15 and 15*a*, respectively, on which ends of a flexible tape or belt 16 are mounted. Knobs 18, 19, 20, and 21 are mounted on ends of the shafts 13 and 14, respectively, so that the shafts can be turned from the exterior of the bank. A ratchet 22 is mounted on the shaft 13 and is engageable by a pawl 23 to prevent inadvertent reverse turning of the shaft 13.

As the tape passes from the roll 15 to the roll 15*a*, it extends over a bridge plate 26 which extends between and bridges side walls 27 and 28 (FIG. 6) of the upper section 12 of the bank just below an upper wall 29 thereof. Immediately above the plate 26 is a window 31 in the upper wall 29 of the upper section 12 through which a portion of an upper face 30 of the flexible tape 16 is exposed.

The tape 16 carries a plurality of pocket members 32 (see FIG. 2). Each pocket member includes a back portion 34 attached in face-to-face relation to the tape 16 and a pair of side flaps 36 and 37. As shown in the drawing, edges 38 and 39 of the flaps 36 and 37, respectively, are integral with the back portion 34, and edges 41 and 42 of the flaps 36 and 37, respectively, are also integral with or attached to the back portion. Each pocket member is adapted to receive a folded piece of paper money or a bill 44. Each bill 44 can be folded into four folds 44*a*, 44*b*, 44*c* and 44*d*, as shown in FIG. 4, before inserting into a pocket member. As shown in FIG. 2, each pocket member is numbered so that a count is made of the bills as the bills are inserted into the pocket members. As bills are inserted, the knobs 18 and 19 are turned to advance the belt and wind the belt onto the roll 15 with the bills 44 contained inside the pockets thereof. The ratchet 22 and pawl 23 prevent backturning of the belt so long as the pawl is engaged to prevent removal of the bills so long as the sections of the bank are closed.

The sections of the bank are held together in closed position by interconnecting hook-shaped flanges 46 and 47 (FIG. 3) on end walls of the sections 12 and 10, respectively, and by a latch 51 which engages a hook-shaped latch keeper 52. The latch can be opened by means of a key (not shown) inserted in a lock 53 which actuates the latch.

When the latch has been opened, the upper section 12 can be removed from the base section 10, and the pawl 23 can be swung from the full line position of FIG. 3 to the position shown in dot-dash lines at which the ratchet is released. A detent 54 can hold the pawl 23 in released position. When the pawl 23 is released from the ratchet 22 the bills can be removed from the bank. To facilitate removal of the bills, a rod 56 (FIGS. 5 and 6) is inserted through an opening 57 in the center of the bridge plate 26 to engage the underside of the belt at the center thereof to bow or flex the center portion of the belt upwardly and raise the bills from the belt. A collar 58 on the rod 56 limits the distance of insertion thereof through the opening 57. The sections of the bank can be closed so that the lower end of the rod 56 is supported by the lower base section 10 of the bank. A hook or horn member 61 is then mounted on the upper wall 29 of the upper section 12. The hook 61 includes an upright column 62 and an arm 63. The lower end of the column 62 can be received in a socket 64 in the upper wall 29. An end 66 of the arm 63 of the horn engages the upper face of the belt adjacent the rod 56 at the center line of the belt so that, as the belt is rewound, the horn engages each bill to cause each bill to be ejected to the position indicated in dot-dash lines at 44′ in FIG. 5.

The bank illustrated in the drawing and described above is subject to structural modification without departing from the spirit and scope of the appended claims.

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

1. A bank for paper money comprising a hollow case, a pair of spaced rolls rotatably mounted in said case, an elongated flexible belt mounted on said rolls, said case having a wall adjacent the rolls, there being a window in said wall, a belt-supporting bridge plate mounted in the case parallel to and adjacent said wall and opposite the window, the belt traveling over the bridge plate, whereby a part of one face of the belt is exposed through said window, a plurality of pocket members mounted on said face of the belt, each of said pocket members being formed of flexible material and including a pair of spaced flaps adapted to engage and hold opposed edges of a bill will a center portion of the bill free, the belt being ad-

vanceable from one of said rolls to the other of said rolls to wind the bills onto said other of said rolls.

2. The combination of a bank for paper money comprising a hollow case, a pair of spaced rolls rotatably mounted in said case, a flexible belt mounted on said rolls, said case having a wall adjacent the rolls, there being a window in said wall, a belt-supporting bridge plate mounted in the case parallel to and adjacent the window containing wall and opposite the window, the belt traveling over the bridge plate, whereby a part of one face of the belt is exposed through said window, and a plurality of pocket members mounted on said face of the belt, each of said pocket members being formed of flexible material and including a pair of spaced flaps adapted to engage and hold opposed edges of a bill with a center portion of the bill free, the belt being advanceable from one of said rolls onto the other of said rolls to wind the bills onto said other of said rolls, with means for engaging the underside of the belt to bow the central portion of the belt away from the plate, whereby the bills are raised from the belt when the belt is returned from said other of said rolls to said one of said rolls, and a hook engageable with the bills when in raised position to remove the bills from the flaps of the pocket members when the belt is moved across the plate.

3. The combination of a bank for paper money comprising a hollow case, a pair of spaced rolls rotatably mounted in said case, a flexible belt mounted on said rolls, said case having a wall adjacent the rolls, there being a window in said wall, a belt-supporting bridge plate mounted in the case parallel to and adjacent said wall and opposite the window, the belt traveling over the bridge plate, whereby a part of one face of the belt is exposed through said window, and a plurality of pocket members mounted on said face of the belt, each of said pocket members being formed of flexible material and including a pair of spaced flaps adapted to engage and hold opposed edges of a bill with a center portion of the bill free, the belt being advanceable from one of said rolls onto the other of said rolls to wind the bills onto

said other of said rolls, there being an opening in the center portion of the bridge plate, with a rod removably inserted in said opening to engage the underside of the belt and bow the central portion of the belt away from from the plate, whereby the bills are raised from the belt when the belt is returned from said other of said rolls to said one of said rolls, and a hook engageable with the bills when in raised position to remove the bills from the flaps of the pocket members when the belt is moved across the plate.

4. A bank for paper money comprising a hollow case, a pair of spaced rolls rotatably mounted in said case, a flexible belt mounted on said rolls, said case having a wall adjacent the rolls, there being a window in said wall, a belt-supporting bridge plate mounted in the case parallel to and adjacent said wall and opposite the window, the belt traveling over the bridge plate, whereby a part of one face of the belt is exposed through said window, a plurality of pocket members mounted on said face of the belt, each of said pocket members being formed of flexible material including a pair of spaced flaps adapted to engage and hold opposed edges of a bill with a center portion of the bill free, the belt being advanceable from one of said rolls onto the other of said rolls to wind the bills onto said other of said rolls, and means for engaging the underside of the belt to bow the central portion of the belt away from the plate, whereby the bills are raised from the belt when the belt is returned from said other of said rolls to said one of said rolls.

References Cited in the file of this patent

UNITED STATES PATENTS

150,500	White	May 5, 1874
453,824	With	June 9, 1891
2,687,135	Heim	Aug. 24, 1954
2,754,994	Cole	July 17, 1956

FOREIGN PATENTS

208,960	Great Britain	Jan. 3, 1924

UNITED STATES PATENT OFFICE

CERTIFICATE OF CORRECTION

Patent No. 3,026,023 March 20, 1962

Oscar W. Hirschfeld

It is hereby certified that error appears in the above numbered patent requiring correction and that the said Letters Patent should read as corrected below.

Column 2, line 72, for "will" read -- with --.

Signed and sealed this 3rd day of July 1962.

(SEAL)
Attest:

ERNEST W. SWIDER
Attesting Officer

DAVID L. LADD
Commissioner of Patents