April 8, 1952 H. C. SCOGIN 2,592,346

AUTOMATIC ROLL DISPENSER

Filed Sept. 29, 1947 2 SHEETS--SHEET 1

Fig. 1.

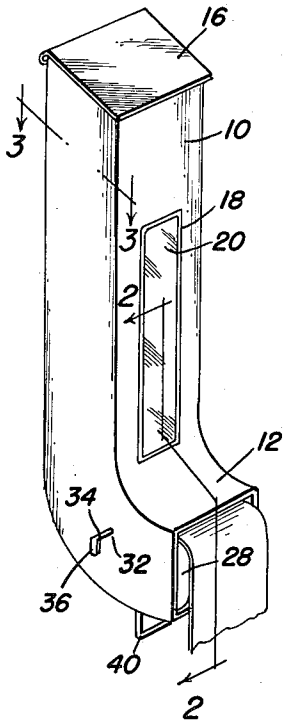


Fig. 2.

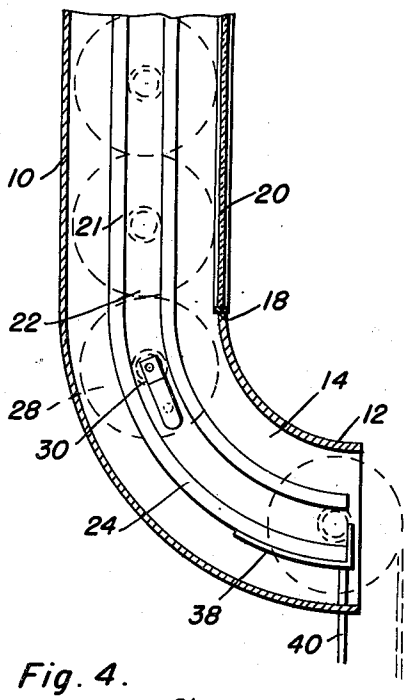


Fig. 3.

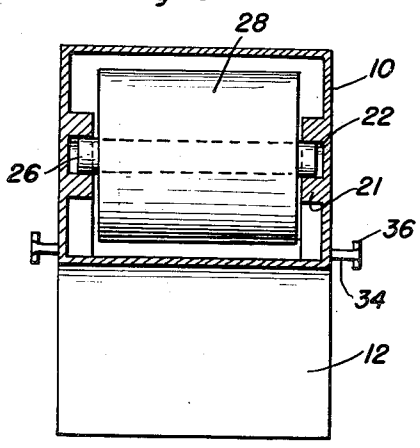
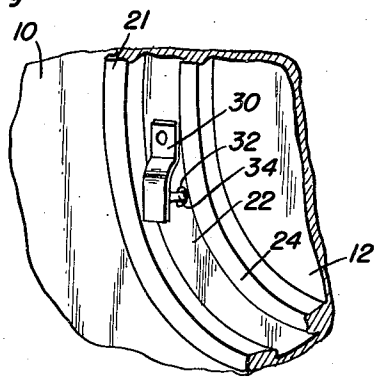


Fig. 4.



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Fig. 5.

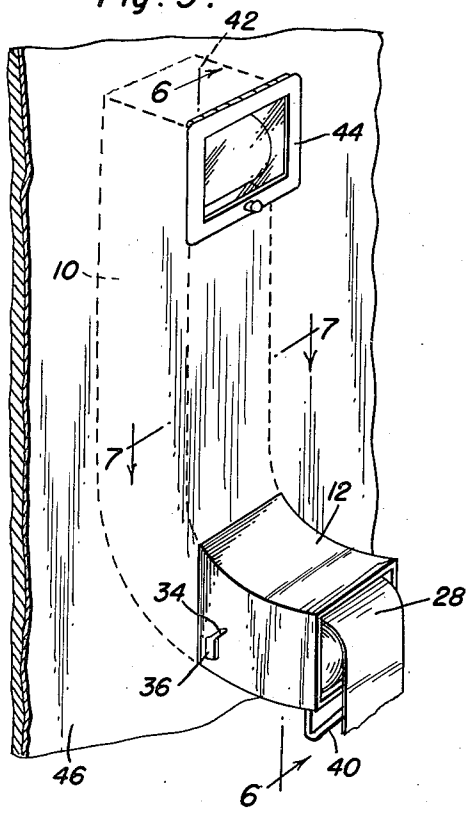
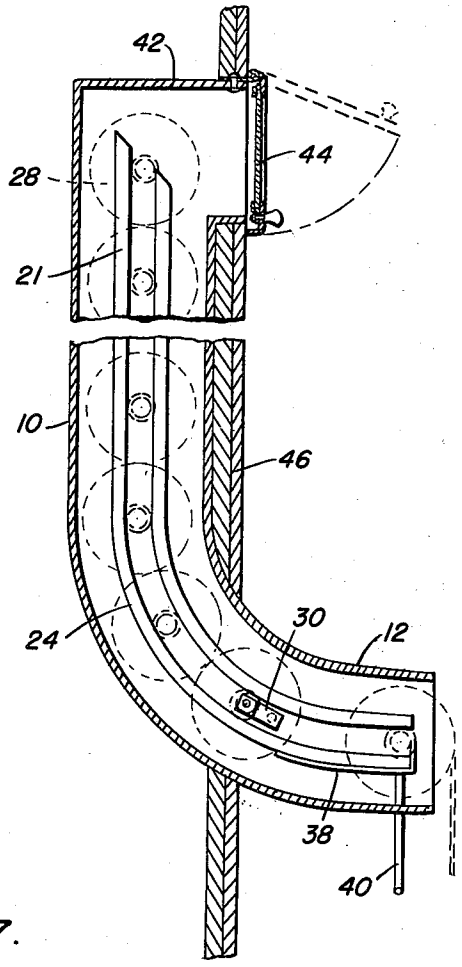


Fig. 6.



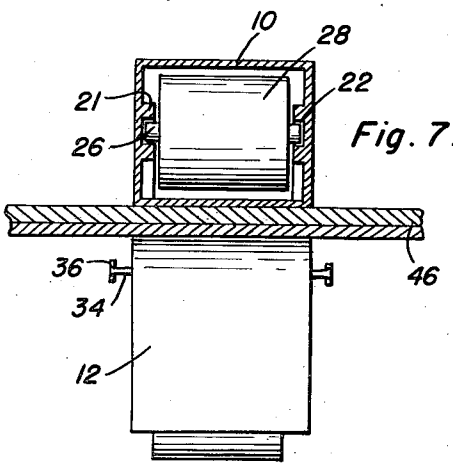


Fig. 7.

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AUTOMATIC ROLL DISPENSER

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Application September 29, 1947, Serial No. 776,831

5 Claims. (Cl. 242—55.3)

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This invention relates to new and useful improvements in automatic roll dispensers and the primary object of the present invention is to provide a housing that will hold a plurality of rolls of paper and including novel and improved means for discharging one roll at a time from the housing.

Another important object of the present invention is to provide a device of the aforementioned character including a window portion whereby the number of rolls within the housing are visable at all times to the user thereof.

A further object of the present invention is to provide a cabinet for rolled paper embodying novel and improved means for guiding the downward sliding movement of the roll placed in the casing to an outlet chamber at one end thereof.

A still further aim of the present invention is to provide an automatic roll dispenser that is simple and practical in construction, strong and reliable in use, neat and attractive in appearance, relatively inexpensive to manufacture, and otherwise well adapted for the purposes for which the same is intended.

Other objects and advantages reside in the details of construction and operation as more fully hereinafter described and claimed, reference being had to the accompanying drawings forming part hereof, wherein like numerals refer to like parts throughout, and in which:

Figure 1 is a perspective view of the present invention in use;

Figure 2 is a longitudinal vertical sectional view taken substantially on the plane of section line 2—2 of Figure 1, and with dotted lines showing the position of a stack of rolls therein;

Figure 3 is a transverse horizontal sectional view taken substantially on the plane of section line 3—3 of Figure 1;

Figure 4 is an enlarged fragmentary perspective view of the inside of the housing showing the manner for supporting the lower roller in the stack;

Figure 5 is a fragmentary perspective view showing the present invention in slightly modified form in a wall, and with parts of the wall broken away and shown in section;

Figure 6 is a longitudinal vertical sectional view taken substantially on the plane 6—6 of Figure 5; and

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Figure 7 is a transverse horizontal sectional view taken substantially on the plane of section line 7—7 of Figure 5.

Referring now to the drawings in detail, wherein for the purpose of illustration there is disclosed a preferred embodiment of the present invention, the numeral 10 represents a substantially rectangular housing which is preferably vertically disposed and suitably secured to a supporting surface. The lower end portion of this housing is provided with a forwardly and outwardly curved extension 12 providing a chamber 14 which is open at both ends, and the upper open end of the housing is provided with a hinged closure 16.

Rigidly secured in a rectangular opening provided in the forward wall of housing 10, is a window frame 18 supporting a window pane 20 for visibility into the housing.

Preferably integrally formed with the inner faces of each of the side walls of the housing 10, is a pair of spaced parallel ribs or projections 21 forming channel shaped guides 22. These ribs are arcuately disposed at their lower ends 24 to enter the chamber 14. Slidably mounted in these guides 22 are the terminal ends of rollers 26 projecting outwardly from each end of a roll of paper 28 carried thereon.

One end of a pair of angle springs 30 are fixedly secured between each of these ribs, in the channel 22, adjacent the entrance into chamber 14. The free ends of the springs project outwardly from the outer face of ribs 21 and are rigidly secured to rods 34 slidably mounted in apertures 32 provided in the side walls of extension 12. The outer ends of these rods are turned downwardly and are flattened to provide angular extensions or finger gripping portions 36 which are conveniently gripped for actuating the free ends of springs 30.

It should be noted, that the end portions of ribs 24 terminate adjacent the outer edge of extension 12, as shown in Figure 2, so that angular springs 38 may be fixedly secured to the lower faces of the lower ribs with the free portions of these springs extending into the channels 22 for a purpose which will be more fully described in the use of the device.

The numeral 40 represents a U-shaped hand grip having its legs slidably mounted in the lower

wall of extension 12 and the terminal portions of this member are fixedly secured to springs 38 for actuating the free end of the springs.

In practical use of the device, the closure is raised and the terminal ends of a plurality of rollers 26 supporting rolls of paper 28, are placed in guides 22 so that the first roller, which is also the lower roller, engages the free ends of springs 30 and the last roller is positioned below the upper end of the housing so that the closure 16 may be lowered. By pulling rod 34 outwardly, the free end of springs 30 will disengage the lower roller and the same will enter chamber 14 to be engaged by the free ends of springs 38. Should it be desirable to remove this lower roller from chamber 14, it is merely necessary to pull downwardly with hand grip 40 whereby the free ends of the springs 38 will disengage the lower roller and the same will pass outwardly from the chamber and to the hand of the user positioned thereunder.

Reference is now directed to Figures 5, 6 and 7, wherein there is disclosed the present invention in slightly modified form. In this embodiment, the housing 10 is provided with a forwardly projecting chamber 42, the axis of which is disposed at right angles to the axis of the housing. Also, in this embodiment, the window frame 18 and pane 20 are not provided in the forward wall of the housing but a hinged transparent door 44 is mounted on the open forward end of chamber 42, facilitating the placement of rolls into the housing. All other elements of the device in modified form, are similar to that as previously described in Figures 1–4 inclusively.

It should be noted, that the dispenser in the modified embodiment, is adapted to be recessed in a wall structure 46 so that the door 44 and the chamber 12 projects outwardly from the wall surface, so that rolls may be inserted into the housing, and so that the hand grip 40 may be actuated to effectively discharge rolls from the housing.

In view of the foregoing description taken in conjunction with the accompanying drawings it is believed that a clear understanding of the construction, operation and advantages of the device will be quite apparent to those skilled in this art. A more detailed description is accordingly deemed unnecessary.

It is to be understood, however, that even though there is herein shown and described a preferred embodiment of the invention the same is susceptible to certain changes fully comprehended by the spirit of the invention as herein described and the scope of the appended claims.

Having described the invention, what is claimed as new is:

1. An automatic roll dispenser comprising an upright housing having a curved extension at one end to provide a chamber open at both ends, a pair of opposing guides fixedly secured to the inner walls of said housing, a plurality of rollers slidably mounted in said guides, spring means carried by said guides, means slidably carried by said housing and connected to the spring means for releasing said spring means to permit the lower roller to enter said chamber, resilient stops mounted within the chamber to block the passage of rollers from the chamber, and a hand grip slidably carried by the extension and attached to the resilient stops to permit movement of the stops from the guides.

2. An automatic roll dispenser comprising a substantially rectangular housing vertically supported on a supporting structure, a hinged closure at the upper end of said housing, an arcuate extension at the lower end of said housing providing a chamber open at both ends communicating with said housing, a pair of guides carried by opposite inner side walls of said housing, said guides having arcuate extensions entering said chamber, a plurality of rollers slidably mounted in said guides, said rollers supporting rolls of paper, means carried by said housing adjacent said chamber for supporting the lower roller of the plurality of rollers, means for releasing said supporting means to permit the lower roller to enter said chamber, resilient stops carried within said chamber for engaging a roller entering therein to block the passage of rollers from the chamber, and means slidably carried by the extension and attached to said resilient stops for releasing said stops to permit a roller to pass outwardly from said chamber.

3. An automatic roll dispenser comprising a substantially rectangular housing vertically supported on a supporting structure, a hinged closure at the upper end of said housing, an arcuate extension at the lower end of said housing providing a chamber open at both ends communicating with said housing, a pair of guides carried by opposite inner side walls of said housing, said guides having arcuate extensions entering said chamber, a plurality of rollers slidably mounted in said guides, said rollers supporting rolls of paper, means carried by said housing adjacent said chamber for supporting the lower roller of the plurality of rollers, means for releasing said supporting means to permit the lower roller to enter said chamber, means carried within said chamber for engaging a roller entering therein, and means for releasing said engaging means to permit a roller to pass outwardly from said chamber, said supporting means including spring arms caried by said guides, and said releasing means includes finger engaging rods slidably mounted in said housing and fixedly secured to said spring arms.

4. An automatic roll dispenser comprising a substantially rectangular housing vertically supported on a supporting structure, a hinged closure at the upper end of said housing, an arcuate extension at the lower end of said housing providing a chamber open at both ends communicating with said housing, a pair of guides carried by opposite inner side walls of said housing, said guides having arcuate extensions entering said chamber, a plurality of rollers slidably mounted in said guides, said rollers supporting rolls of paper, said arcuate extensions having lower end portions, a pair of spring members secured to the lower end portions of said extensions and having ends for engaging a roller entering the arcuate extensions, and a substantially U-shaped hand grip slidably carried by a wall of said chamber and secured to said pair of spring members whereby said ends of said spring member may be manually moved out of engagement with a roller.

5. An automatic roll dispenser comprising a substantially rectangular housing vertically supported on a supporting structure, a hinged closure at the upper end of said housing, an arcuate extension at the lower end of said housing providing a chamber open at both ends communicating with said housing, a pair of guides carried by opposite inner side walls of said housing, said guides having arcuate extensions entering said chamber, a plurality of rollers slidably mounted

in said guides, said rollers supporting rolls of paper, a spring arm mounted in said housing adjacent said chamber and relatively close to said guides for yieldingly retaining the lower roller of the plurality of rollers, a sliding member carried by the housing and engaging the spring arm and providing a means for releasing the spring arm from the lower roller whereby the lower roller will enter the chamber, means mounted in the chamber for engaging the lower roller after the same has been released from the spring arm, and a manually operated member connected to said last named means to release said last mentioned means from the lower roller.

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REFERENCES CITED

The following references are of record in the file of this patent:

UNITED STATES PATENTS

Number	Name	Date
1,057,973	Merritt	Apr. 1, 1913
2,299,301	Britt et al.	Oct. 20, 1942
2,312,825	Leveque	Mar. 2, 1943
2,407,971	Black	Sept. 24, 1946