FOLDING TABLE OR THE LIKE
Filed Feb. 25, 1949


FOLDING TABLE OR THE LIKE


# UNITED STATES PATENT OFFICE 

2,609,072
FOLDING TABLE OR THE LIKE
Moses Levinson, Yonkers, N. Y., assignor to Nathan Levinson, New Rochelle, N. Y.
Application February 25, 1949, Serial No. 78,305

## 2 Claims. (Cl. 190-11)

## 1

The present invention relates to devices which fold up into the form of a valise, useful to carry the paraphernalia of bathers, campers, artists, mechanics, artisans, pienic goers, travellers, etc., and which when desired can be set up to form a chair, work bench, desk or table.
One of the objects of the present invention is to provide a combination article of the character mentioned, of novel and improved construction having disappearing legs housed within the valise, and which does not require the valise to be opened in order to set the legs into erected position to form the chair or table and the like.
Another object of this invention is to provide a novel and improved device of the kind described which is simple and convenient to use, and which is efficient in carrying out the purposes for which it is intended and designed.

Other objects and advantages will become apparent as this disclosure proceeds.

In the accompanying drawings forming part of this specification, similar characters of reference indicate corresponding parts in all the views.

In the drawings:
Fig: 1 is a perspective view showing an embodiment of this invention, in erected condition.

Fig. 2 is a similar view showing the article in the form of a valise, to be carried as hand luggage.

Fig. 3 omits the end extension tables and is a sectional view on the line 3-3 of Fig. 4, but the legs are shown after being moved to a position lying between housed and erected positions.

Fig. 4 is a top plan view of Fig. 3, but omits the cover of the valise.

Fig. 5 is a sectional view on the line 5-5 of Fig. 4, but includes the cover of the valise, which is shown in open position, and also shows the legs after they have been moved to erected position.
Fig. 6 is an enlarged fragmentary section taken at line 6-6 in Fig. 1, showing in particular the leg and leg lock structures and associated mechanism which embody teachings of this invention.
In the drawings, the numeral 15 designates a box structure having a swingable hinged top cover 16. It may be made to resemble a valise with a handle 18, and if desired may have the rings 17 for attachment of a shoulder strap. The interior of the valise may be provided with a rectangular fence 19 extending from, and secured to, the bottom 20 to form a storage space 21, and a perimetral housing 22. Within this housing 22, along each side of the valise or box 15, is a journalled shaft. One of these shafts is designated by the numeral 23, and the other by the
numeral 24. These shafts are parallel and are near the bottom 20 of the box structure. Although four separate legs are possible, I have chosen to join them in pairs, so that each pair forms a $U$-shaped component. One such $U$ shaped component is designated generally by the numeral 26, and the other by 27. The arms of each of these $U$-shaped members 26 and 27 are parallel.
The member 26 is carried on shaft 23 , with each of its arms $26^{\prime}$ and $26^{\prime \prime}$ longitudinally slidable thereon along lines perpendicular to the axis of said shaft. In like manner, the member 27 is carried on shaft 24, with each of its arms 27' and 21' longitudinally slidable thereon along lines perpendicular to the axis of said shaft 24. The free ends of all of said arms are inside the box structure 15, and respectively terminate in enlarged heads carried one at each such arm end, indicated as 30, 31, 32 and 33. Each of said heads has an open longitudinal socket as at 34 (see Fig. 6), adapted for engagement with a downwardly extending pin 35 , secured on a fixed bracket. There is one such bracket for each socket, and said brackets are respectively designated as 36, 37, 38 and 39 , welded or otherwise suitably secured to the interior of the box structure, a suitable distance above the respective shafts 23 and 24. If desired, the shafts 23 and 24 may be provided with traverse holes therethrough as at 40, through which a leg component may slide to nested position within the housing 22. The legs 26 and 21 may be made of tubular stock, and the entire article may be made of light weight metal, such as aluminum or other suitable material or combinations of material. The storage space 21 is, of course, for the carrying of any desired articles in accordance with the needs of the user.

Each of the leg components carry about them a compression coil spring, as indicated by the numeral 41, between the shaft they slide through and their end head. The length of each of such coil springs is such that they will be stressed when the assembly is effected as shown in Fig. 6, showing the legs in erected use position, rigid and sturdy with respect to the box structure. Said box is of sufficient width to receive all of the leg members 28 and 21 therewithin, when the article is in "folded" condition, and of course, the length of the legs provides a table or seat as in Fig. 1, of desired and convenient height. The box cover, which serves as the seat or table top, may also be set to "open" position, by a friction folding brace 42. This provides the desk or dressing table form, as matter of example. The undersurface of the cover member 16 may have suitable
fittings or a mirror, as the user may desire. Channels 43 for slidable extension panels 44 and 45 may be provided, with suitable slot openings 48 in the box side walls through which such panels may pass. Holes 47 through a panel may be used to hold tapered tumblers. Each of the extension panels may have a lip 48 as a handle means therefor.
To be noted, are the dihedral cut-outs or openings shown at 50, 51, 52 and 53. Each such cutout is part in the bottom of the box and part in an end wall thereof, in the embodiment illustrated. Such cut-outs permit movement of the leg members 27 and 27, laterally out of the box structure, and then to be swung to their upright position for erection of the device, or else reverse movement to collapse the article to condition shown in Fig. 2, from the erected position shown in Fig. 1. If desired, the respective pairs of such openings may be connected by an opening 54, which serves to receive the leg components connecting the arms of the $U$-shaped member; the shafts 23 and 24 being near enough to the side walls of the box structure so that the leg members may be reached through the enlarged opening portion $54^{\prime}$, and then pulled out by hand.

It is evident that manipulation of the legs 26 and 27 does not require that the box be open at any time, because they are readily accessible and free for any of their movements with the box in closed condition. The legs being joined in pairs, require only the two parts 27 and 26 to be manipulated. Though not so convenient, it is of course possible to omit the connection pieces joining the four arms in pairs, in which instance there would be four separate members, namely $26^{\prime}, 26^{\prime \prime}, 27^{\prime}$ and $27^{\prime \prime}$, to manipulate.

The manner of setting up this article into condition for use as shown in Fig. 1 and Fig. 5, and then into folded condition for carrying, as illustrated in Fig. 2, has been sufficiently set forth in the above description, making further explanation unnecessary.
This invention is capable of numerous forms and various applications without departing from the essential features herein disclosed. It is therefore intended and desired that the embodiment shown herein be deemed illustrative and not restrictive and that the patent shall cover all patentable novelty herein set forth; reference being had to the following claims rather than to the specific description herein to indicate the scope of this invention.
I claim:

1. In an article of the character described, a box structure having top, bottom and side walls,
a member journalled for rotary movement within the box about a substantially horizontal axis near a side wall and below the top wall, an elongated leg member normally lying substantially within the box; said leg member being slidably mounted on the journalled member for axial movement transversely of said horizontal axis; a leg-engaging member mounted within the box above the journalled member and spaced therefrom to engagingly receive an end of the leg member when the leg member is moved to operative position; the side and bottom walls being provided with an opening through which the leg may be manually slid outwardly of the box in a substantially horizontal direction and for the greater part of its length, then swung downwardly about the horizontal axis of said member to substantially upright position, and then pushed upwardly into engagement with the leg-engaging member.
2. In an article as described in claim 1, there being a pair of said leg members connected in spaced parallel relation by a transverse rod so as to form a $U$-shaped support, there being a spaced pair of said leg-engaging members mounted within the box to receive the free ends of the legs of said $U$-shaped support, and there being a spaced pair of said openings through which the respective legs of the U-shaped support may be manually pulled outwardly of the box in said substantially horizontal direction to said extent, then simultaneously swung downwardly to said substantially upright position, and then simultaneously pushed upwardly in engagement with the respective leg-engaging members.

MOSES LEVINSON.
REFERENCES CITED
The following references are of record in the file of this patent:

UNITED STATES PATENTS
Number
875,195
1,063,642
1,747,691
1,905,219
2,277,341
2,473,022

Number
481,828

| Name | Date |
| :---: | :---: |
| Loftin |  |
| Birdsall | - June 3, 1913 |
| Bellows ------------ Feb. 18, 1930 |  |
| Crichton -------- Apr. 25, 1933 |  |
| Mancusi ---------- Mar. 24, 1942 |  |
|  |  |

## FOREIGN PATENTS

Country
Germany
Date Aug. 30, 1929

