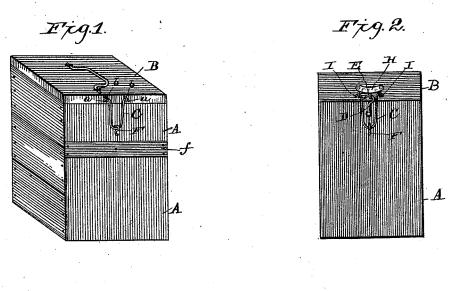
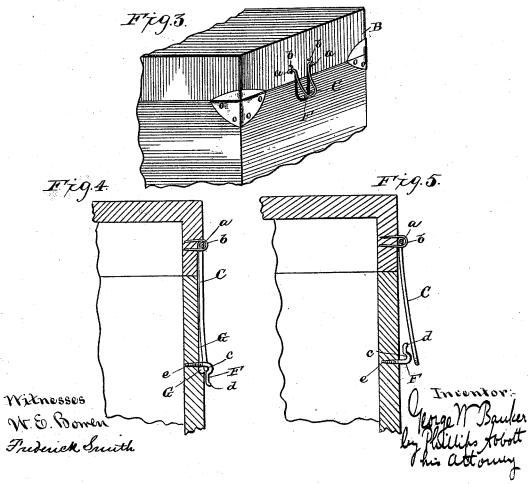
G. W. BANKER. BOX FASTENER.

No. 418,672.

Patented Jan. 7, 1890.





United States Patent Office.

GEORGE W. BANKER, OF BROOKLYN, NEW YORK.

BOX-FASTENER.

SPECIFICATION forming part of Letters Patent No. 418,672, dated January 7, 1890.

Application filed October 1, 1889. Serial No. 325,692. (No model.)

To all whom it may concern:

Be it known that I, George W. Banker, a citizen of the United States, and a resident of Brooklyn, in the county of Kings and State of New York, have invented certain new and useful Improvements in Packing-Cases, of which the following is a specification.

My invention relates to improved means for holding and locking the covers or lids of 10 packing cases or boxes when closed; and it is an improvement upon the fastening devices described in my Letters Patent dated June 17, 1879, No. 216,497, and also in my Letters Patent dated May 21, 1889, and numbered 15 403,503.

The present invention consists in the construction and arrangement of the parts, as shown in the drawings hereof and hereinafter described.

In the drawings the same reference-letters indicate the same parts in all the figures.

Figure 1 illustrates a front view of the invention. Fig. 2 illustrates a front view of the invention in conjunction with a hook for 25 additionally securing the cover. Fig. 3 illustrates a perspective view, part of the case and of the cover being broken away. Fig. 4 illustrates a vertical section. Fig. 5 illustrates a vertical section showing a modified construc-30 tion.

A is the box or case.

B is the cover.

C is the hasp which secures the cover either alone or in conjunction with the hook, as 35 hereinafter explained.

D (see Fig. $\bar{2}$) is the hook.

E is the staple or eye, as the case may be, in which the hook engages to lock the cover in position.

F is the hasp-locking device.

The hasp C consists, preferably, of a piece of metal, which may be wire, bent in the general form of a long letter U, as shown, and its ends a a (see Fig. 3) are confined by sta-45 ples b b, or their equivalents, in the cover or in the box, as the case may be. (See Figs. 4 and 5.) The hasp is bent slightly, so that it will have a spring-action at its free curved end away from the side of the box or case, as 50 shown in Figs. 3, 4, and 5. The hasp-locking device F is also preferably made of metal and

5—that is to say, it has a recess c on its under side and an outwardly-projecting extremity d. The outer arc of the bend c preferably 55 projects so far as to be farther removed from the side of the box than the end of the extremity d, so that other boxes or objects which may be placed in juxtaposition to the case or box will come in contact with the pro- 60 jecting arc c and not touch the extremity d, and thus any rubbing action consequent on movement of the boxes will not tend to turn or unfasten the hasp-locker. It (the hasp-locker) is fastened to the side of the box in 65 any desired manner. That which I prefer is shown in the drawings, to wit: I thread the end e of the wire or other metallic part which forms the hasp-locker and screw it into the side of the box or cover, as the case may be. 70 The friction of the screw-threads serves beneficially in maintaining the locker in position.

In Fig. 4 I show the hasp as fitting into a recess G cut in the side of the box or case and also of the cover, if desired, directly be- 75 neath the hasp, whereby it may be wholly or partially protected from blows tending to injure or displace it, depending on the depth of the recess.

In Fig. 5 I show the hasp attached to the 80 face of the box or case without such recess.

In Fig. 1 I show a cleat f nailed to the outside of the case adjacent to the hasp and hasp-locker, the thickness of which is sufficient to protect the said devices from blows 85 or accidental displacement.

In Fig. 2 I show the hasp as attached to the cover by means of a plate H, to which the hasp is attached by means of eyes I I, the plate H being fastened to the cover by screws, 90 as shown, or in any other preferred manner. The eye for the hook may also be attached to this plate, if desired, as shown.

It is obvious that the hasp may be hinged to the cover and the hasp-locker to the box, 95 or vice versa.

The operation is as follows: The contents of the case or box being in position, the cover is closed, and if a hook D be used it is engaged with the staple or eye E, as set forth in 100 my said former patents. The hasp C is then turned down and being pushed in toward the box, overcoming its resiliency, the hasp-locker is bent in the form shown best in Figs. 4 and I is swung around over it from the position

best shown in Figs. 3 and 5 to that shown in springs outwardly into the recess c in the Hereigh the haspin place, 5 and I make the hasp of such spring-tension that it requires very considerable force to wist the locker back again to unlock the

I have found in practice that the hasp and recent to locker alone are very reliable; and efficient confining devices for the cover; but if desired, in as already stated, the hook may be used in conjunction therewith, in which event the relative size relation of the hasp and the patents, so that when the hasp is down the hook cannot be unhooked. This construction and arrangement is shown in Fig. 2 hereof.

I use my improved cover-fastening devices | 1 | 1 | 1 | 1 | 1 | 20 in conjunction with my improved packing-Hillian in the 21st day of May, 1889, numbered 403,503, covering the cornerminimum braces for the box and cover, as shown in Fig. 25 ful structure for the purpose intended, and,

unioni as I believe, the best known.

 $_{ ext{claim}}$

Harmon Harman Land fastening devices for packing scases, illy, an open haspattached in its under side, into which the free end of Free ERICK SMITH.

the hasp passes when locked, and a hook inclosed within the hasp when locked, substan+1351111111 tially as and for the purposes set forth.

2. A packing-case having a hasp fastened at one end, the other end whereof springs away from the case, a locking device for the hasp, adapted to be turned over the hasp and hav- 40 ing a recess in its under side, into which the hasp springs when closed, and an outwardly projecting extremity whereby the locker may be turned to release the hasp, and a hook in the second closed within the hasp when locked, substant 45

tially as set forth.

3. A packing-case having a hasp fastened at one end, the other end whereof springs away from the case, a locking device for the hasp, adapted to be turned over the hasp and 150 1111111 having an outwardly-extending part adjacent to the point of contact between the hasp and the locker, and an outwardly extending extremity whereby the locker may be turned for unlocking, said extremity being 55 nearer the side of the case than the projecting part near the hasp, and a hook inclosed within the hasp when locked, substantially as set forth.

Signed at New York, in the county of New 60 York and State of New York, this 30th day

of September, A. D. 1889.

HILLIAN GEO. W. BANKER.

Witnesses:

PHILLIPS ABBOTT,