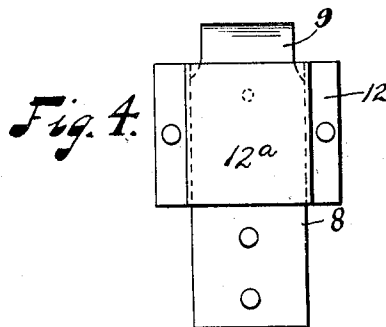
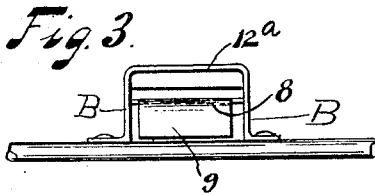
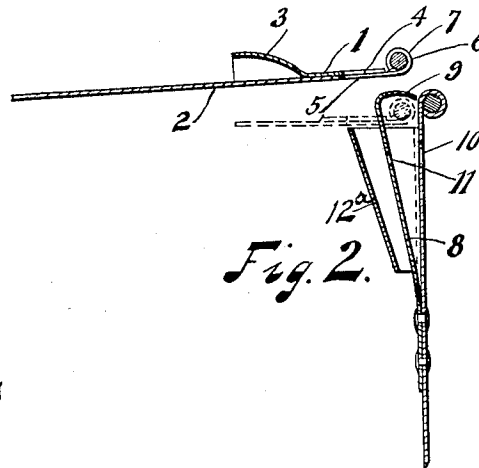
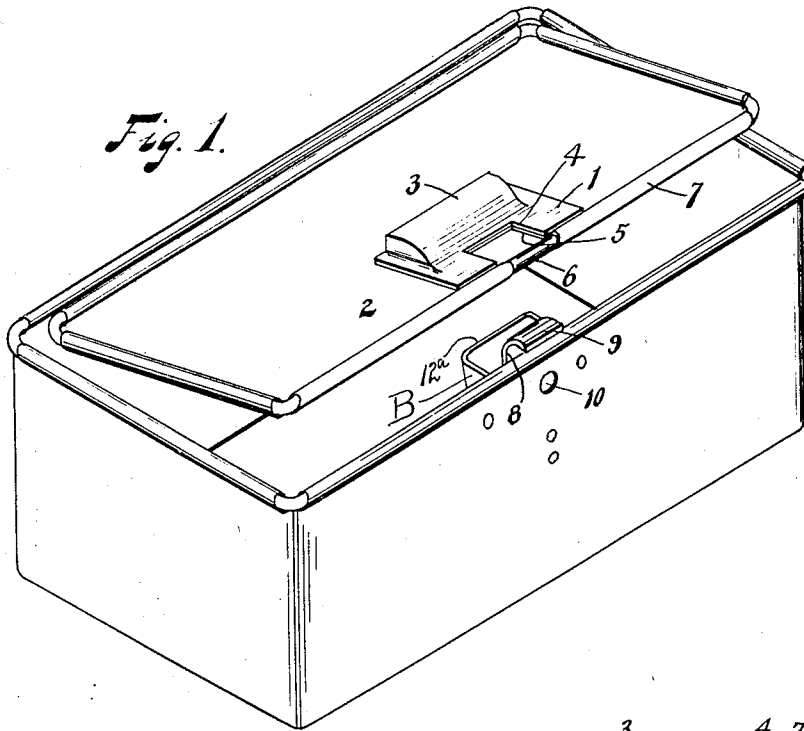


No. 892,061.

PATENTED JUNE 30, 1908.

A. T. KRUSE.
BOX FASTENER.

APPLICATION FILED AUG. 8, 1906.



Witnesses:
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UNITED STATES PATENT OFFICE.

ALFRED T. KRUSE, OF DEFIANCE, OHIO, ASSIGNOR TO THE AMERICAN STEEL PACKAGE COMPANY, OF DEFIANCE, OHIO, A CORPORATION OF OHIO.

BOX-FASTENER.

No. 892,061.

Specification of Letters Patent.

Patented June 30, 1908.

Application filed August 8, 1906. Serial No. 329,700.

To all whom it may concern:

Be it known that I, ALFRED T. KRUSE, a citizen of the United States, residing at Defiance, in the county of Defiance and State of Ohio, have invented certain new and useful Improvements in Box-Fasteners, of which the following is a specification.

My invention relates to improvements in box-fasteners, and is especially designed for use in connection with sheet-metal packing-cases used in the transportation and storage of bottled liquids etc.

The invention relates particularly to an improvement in box-fasteners disclosed in Patent No. 786,299, issued to me April 4, 1905.

The primary object of this invention is to produce a generally improved device of this class which will be exceedingly simple in construction, cheap of manufacture, and efficient in use, and better suited to its intended purposes than any other device of the same class with which I am acquainted.

With these ends in view, the invention consists in the novel construction, arrangement, and combination of parts hereinafter described, illustrated in the accompanying drawings, and particularly pointed out in the appended claims.

Referring to the drawings, forming a part of this specification, Figure 1, is a perspective view of a packing-case or box equipped with a box-fastener embodying my invention. Fig. 2, a sectional view taken through line "2-2" of Fig. 1. Fig. 3, a top plan view of the improved spring-latch and guard or shield attached to the inner side of one of the walls of the box. Fig. 4, a rear side view of the same.

Similar numerals of reference designate like parts throughout all the figures of the drawings.

A plate 1, is secured to the lid 2, near the front portion or free end thereof in any suitable and convenient manner and is provided at its rear with an upwardly and rearwardly-extending flange or handle 3, and at its front with an opening or recess 4, registering with an opening or recess 5, formed in the front portion of the lid or cover 2. A cross-bar 6, is mounted in or adjacent to said openings or recesses 4, and 5, and, in the present instance, is a part of the wire formed within the beading 7, formed about the edges of the lid or cover 2. It will be observed that the cross-

bar 6, of the wire inclosed by the beading 7, is formed by the cut away metal of the beading in alinement with the recess 5, of the lid or cover. A spring-latch or bar 8, is secured at its lower or base end to the inner side of the front wall of the case by means of rivets, as shown, and bent at its upper or free end to form a hook 9, conforming substantially to the contour of the cross-bar 6, and adapted to be engaged by the same when the lid or cover is closed.

An opening 10, is formed in the front wall of the case opposite the spring-latch 8, and a second opening 11, (see Fig. 2) is formed in the spring-latch 8, slightly out of alinement with the opening 10, so that if a bar fitting said opening 10, is inserted therein it will engage the spring-latch 8, springing the same rearwardly and disengaging the hook 9, from the cross-bar 6, and the lid or cover 2, may be lifted by means of the handle 3.

When the lid or cover 2, is dropped or closed, the cross-bar 6, will come into engagement with the hook 9, of the spring-latch or bar 8, and spring the same rearwardly until said cross-bar 6, has passed or cleared the hook 9, when the latter will snap into engagement therewith, thus automatically locking the lid or cover in its closed position. Should it be desired to seal the case, the wire of the seal is inserted through the openings 10, and 11, formed in the case and spring-latch 8, respectively, and up through the openings or recesses 4, and 5, and brought around and sealed, thus securely sealing the case and preventing the contents thereof from being tampered with in transportation or storage.

A guard or shield 12 provided with side wings B, takes over the spring-latch or bar 8, and is secured to the inner side of the front wall of the case in any suitable and convenient manner, and the upper or top edge of said guard or shield is adapted to form a supporting-stop to take under the front or free end of the lid or cover 2, and about the margin of the opening of the recess 5, when the lid is closed, as shown by dotted lines in Fig. 2, of the drawings. It will thus be observed that the guard or shield 12, performs the double function of acting as a guard or shield for the spring-latch or bar 8, and a supporting-stop for the middle portion of the free end of the lid or cover when the same is in its closed position thus forming a combined

“guard and supporting-stop”. The guard or shield 12, forms a housing for the spring-latch or bar 8, thus leaving the spring-latch or bar 8, free at all times to perform its function and preventing any liability of injury thereto.

It will be seen that I provide a simple and efficient locking device in which there are no projecting parts protruding beyond the case proper, interfering with the proper and economical stacking of the cases, or to be caught, broken, or disarranged, and one which may be quickly sealed when desired. It will also be observed that the guard or shield and supporting-stop is adapted to properly support and hold the adjacent portions of the free end of the lid or cover in proper position when the same is engaged by the spring-latch or bar and that the upwardly and rearwardly-inclined wall 12^a, is adapted to act as a guide to direct the wire of the seal upwardly through the recesses 4, and 5, after being passed through the openings 10, and 11, of the case and spring-latch, respectively.

Having thus described my invention, without having attempted to set forth all the forms in which it may be made, or all the modes of its use, I declare that what I claim and desire to secure by Letters Patent is,—

1. In a box-fastener, the combination with the front wall of the case or box provided with an opening and an upwardly-extending spring-latch-bar on its inner side opposite said opening and provided with a second opening, and a lid provided at its front or free end with a latch-opening and cross-bar; of a guard and supporting-stop taking over said spring-latch-bar and secured to the inner side of said front wall of the case and provided with an upwardly and rearwardly-extending chute or wall at the rear of said opening in said spring-latch-bar and having side wings forming conjointly with said chute or wall an enlarged flaring lid-supporting-stop normally surrounding said latch-opening.

2. In a box-fastener, the combination with a wall of the box provided with an opening and an inner spring-latch provided with a second opening out of alinement with said first mentioned opening, and a lid provided

at its free end with a latch-receiving-opening; of an inner guard and supporting-stop provided with an upwardly and rearwardly-extending wall at the rear of said openings and spring-latch and an enlarged flaring upper end, said wall being adapted to direct a seal-wire upwardly through said latch-receiving-opening, and said enlarged flaring upper end forming a lid-supporting-stop having its edges abutting against said lid about said latch-receiving-opening.

3. In a box-fastener for sheet-metal packing-cases, the combination with a lid having its marginal edges bent over and about a wire forming a beading and provided with a recess in its free end terminating in a cross-bar formed by said wire; of a spring-latch secured to the front wall of the case and provided with a hook adapted to take into said recess and normally engaging said cross-bar, said spring-latch and said front wall of the case being provided with openings out of alinement with each other, and an open-ended upwardly and rearwardly-inclined guide-guard and supporting-stop taking over said spring-latch and secured to the inner side of said front wall, said guard and supporting-stop being provided with an enlarged flaring upper end normally supporting said lid by impinging against the edges thereof about said recess.

4. A box fastener, comprising a lid or cover having its free end provided with a latch-opening and a cross-bar, a box body having its front wall provided with an inner spring-latch normally engaging said cross-bar, and a guard and supporting-stop secured to said front wall of the case at the rear of said spring-latch and provided with an upwardly and rearwardly-inclined rear wall and side wings forming with said rear wall an enlarged upper end taking under the free end of said lid or cover about the margin of said latch-opening.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

ALFRED T. KRUSE.

Witnesses:

CLIFFORD D. SCHMALTZ,
A. M. KRUSE.