

(No Model.)

J. SCHIRRA.
SEAL LOCK.

No. 581,310.

Patented Apr. 27, 1897.

Fig. 1.

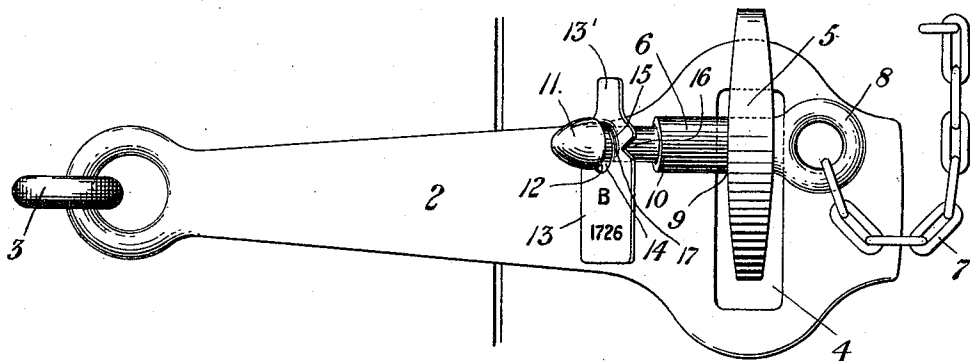


Fig. 2.

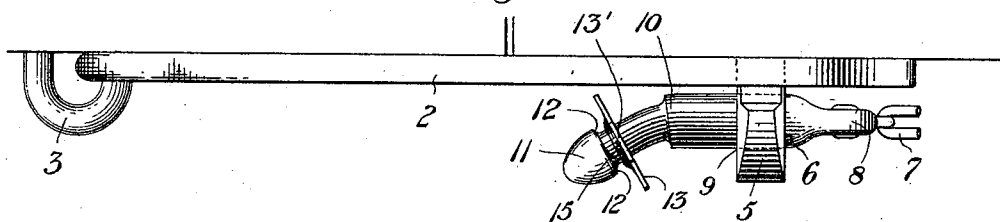


Fig. 3.

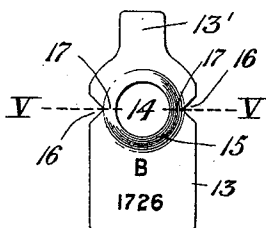


Fig. 4.

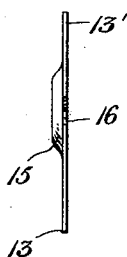


Fig. 6.

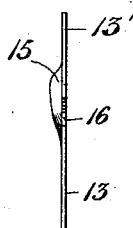


Fig. 7.

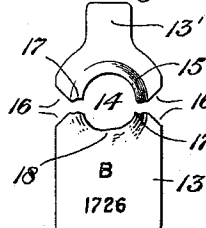
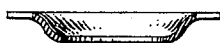


Fig. 5.



WITNESSES:

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UNITED STATES PATENT OFFICE.

JULIUS SCHIRRA, OF PITTSBURG, PENNSYLVANIA.

SEAL-LOCK.

SPECIFICATION forming part of Letters Patent No. 581,310, dated April 27, 1897.

Application filed June 23, 1896. Serial No. 596,600. (No model.)

To all whom it may concern:

Be it known that I, JULIUS SCHIRRA, a citizen of the United States, residing at Pittsburgh, in the county of Allegheny and State of Pennsylvania, have invented or discovered a new and useful Improvement in Car-Door Seals, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings, forming part of this application, in which—

Figure 1 is a face view of a car-door hasp and bolt provided with my improved seal. Fig. 2 is a plan view thereof. Fig. 3 is a detached face view of the seal-plate. Fig. 4 is an edge view thereof. Fig. 5 is a cross-section taken on the line V V of Fig. 3. Fig. 6 is an edge view of the plate after having been partially flattened. Fig. 7 is a face view of a broken seal-plate, showing its condition after removal from the bolt.

Similar numerals refer to like parts wherever used throughout this specification.

My invention consists of an improved locking bolt and seal for use on car-doors and elsewhere and is intended to provide means whereby the bolt cannot be removed from the staple without absolutely destroying the seal-plate, thereby rendering it impossible to open the door without detection.

In a previous application, filed March 24, 1896, Serial No. 584,598, I have shown and described a seal-plate and bolt of the same general design as that embodied in the present invention, in which the plate is adapted to be screwed upon a threaded bolt having a reduced neck back of the threaded portion.

The present invention dispenses with the threads in both plate and bolt, thereby greatly simplifying the construction and operation.

Referring to the drawings, 2 is the usual hasp commonly employed, secured by an eye or staple 3 to the door of the car, furnished with an opening 4, fitting over the staple 5, secured to the car-body. My improved bolt 6 is attached to the car by a chain 7, engaging the eye 8, for security against loss, and is of a length sufficient to pass through the eye 9 in the staple 5 and to exert a bearing on the hasp-plate 2 sufficient to retain it in position against removal.

At 10 the bolt 6 is bent outwardly at an angle sufficient to give clearance for the plate,

and the end is formed into a tapered, rounded, or acorn shape, diminishing toward the point, as at 11. Between such end portion and the bend 10 the bolt is reduced in diameter, so as to leave a shoulder 12 at the back of the end 11, the purpose of which will be hereinafter set forth.

13 is the seal-plate, made of thin metal, having at the top a projecting tang 13', and through its upper portion a circular hole 14 is formed of just sufficient diameter to pass over the end 11. This opening may, if desired, be other than circular in form, but any such deviation from the circular form I consider as clearly within the spirit of my invention. The portion of metal surrounding the hole 14 is preferably forced out, as at 15, making the plate cup-shaped at that portion, as shown, and on each side of the hole 14 V-shaped cuts 16 are made in the edge projecting inwardly toward the opening, leaving thin easily-broken intervening necks 17. In the operation of making the plate the circular hole 14 is punched of a diameter slightly smaller than the finished diameter, so that in the operation of pressing or bulging out the cup-shaped portion 15 the diameter of the opening will be proportionately enlarged to the desired diameter. After the bolt 6 is in position, as shown, the seal-plate is placed over the end 11 and onto the reduced neck 12.

By means of a pair of "sealers" or other suitable tools part of the cup-shaped portion 15 is flattened, thus effectually distorting and reducing in diameter the hole 14, as indicated at 18, Fig. 7, and rendering it impossible to remove it over the head 11, as the hole cannot again be restored to its original diameter while the plate remains on the bolt. The plate must therefore be broken at the reduced neck 17, as shown in same figure, before such removal can be accomplished. When the plate is thus destroyed, it becomes unfit for future use and has served all the purposes for which such devices are intended.

The plate may be stamped in any desired manner, as shown, and its shape may be varied from that shown in the drawings, or other changes or modifications may be made in its design without departing from my invention.

Having described my invention and in what manner it is constructed and operates, what

I claim, and desire to secure by Letters Patent, is—

- 5 1. A car-door seal comprising a securing-bolt having a rounded forward end and a reduced neck back of such rounded end, and a thin metallic seal-plate having a cup-shaped middle portion and an opening in such cup-shaped middle portion for the end of the bolt, substantially as set forth.
- 10 2. A car-door seal comprising a securing-bolt having a rounded forward end and a reduced neck back of such rounded end, and a thin metallic seal-plate having a cup-shaped middle portion, an opening in such cup-shaped middle portion, and recesses in the edges of the plate, substantially as set forth.
- 15 3. As a new article of manufacture a seal-plate comprising a thin flat body portion, a

cup-shaped middle portion, an opening in such cup-shaped middle portion, and recesses 20 in the edges of the plate abreast of the opening, substantially as set forth.

4. As a new article of manufacture a seal-plate comprising a thin flat body portion, a cup-shaped middle portion, a circular opening 25 in such cup-shaped middle portion, recesses in the edges of the plate abreast of the circular opening, and a projecting tang integral with the plate, substantially as set forth.

In testimony whereof I have hereunto set 30 my hand this 5th day of June, 1896.

JULIUS SCHIRRA.

Witnesses:

PETER J. EDWARDS,
C. M. CLARKE.