

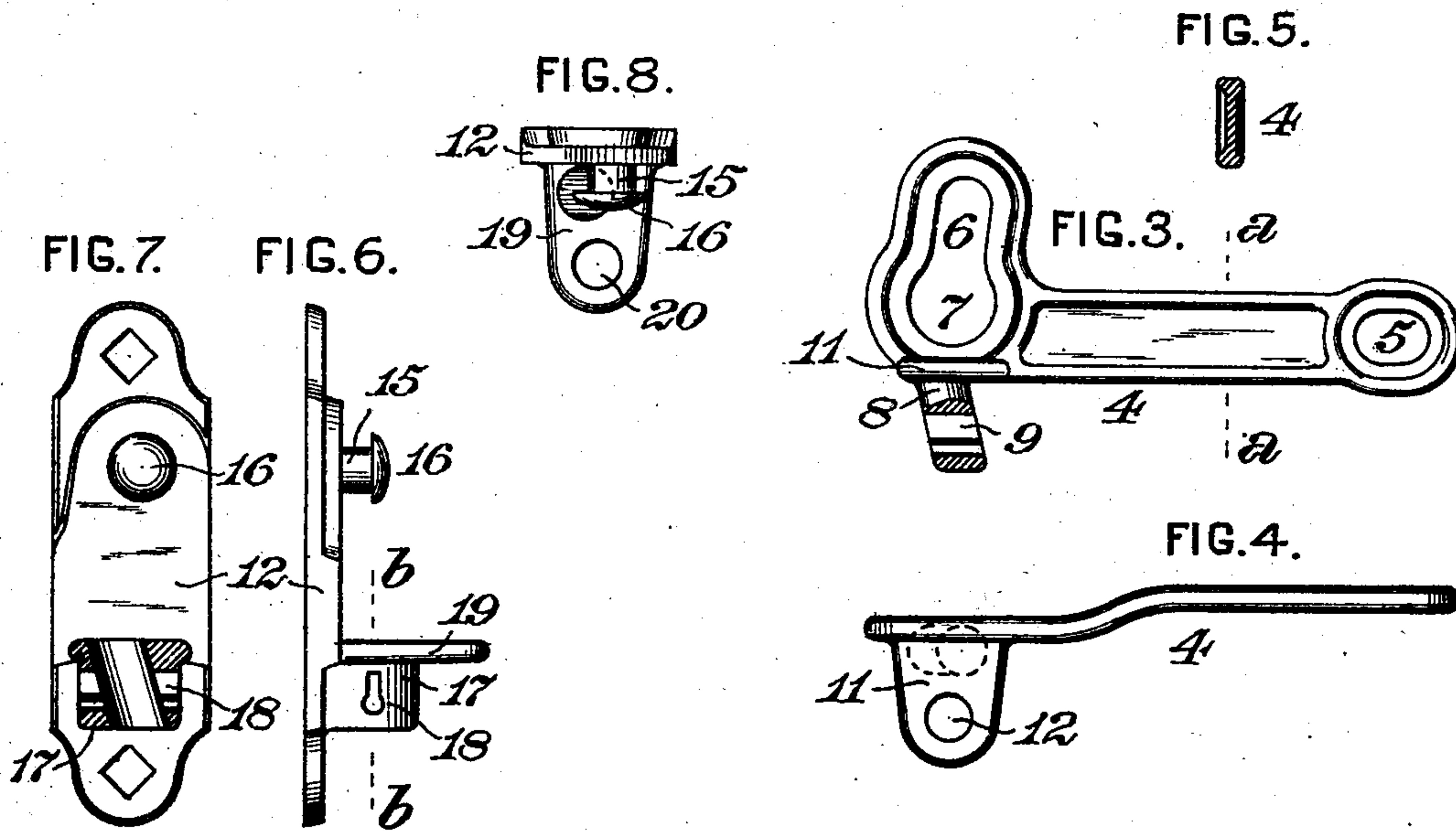
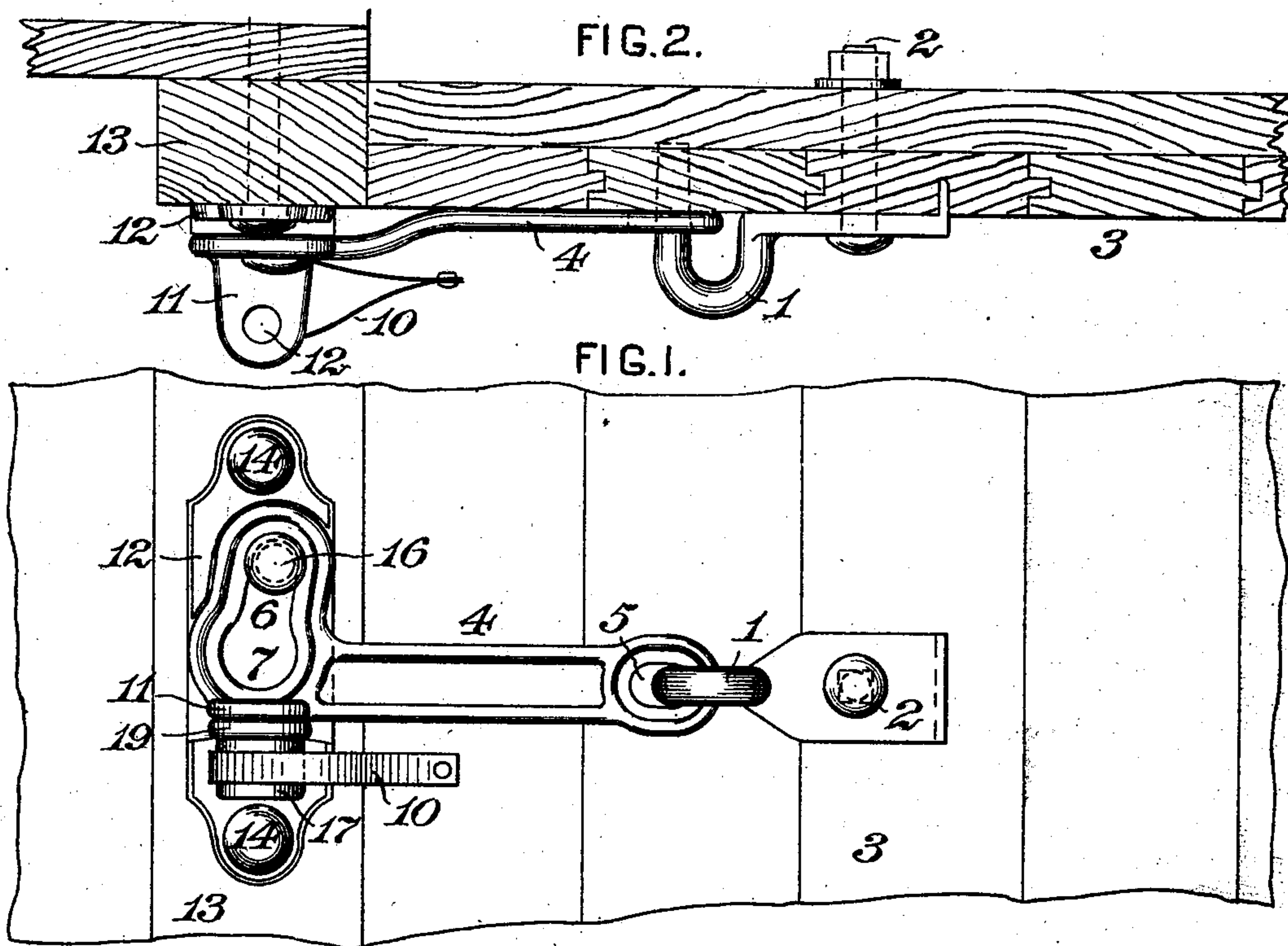
No. 696,089.

Patented Mar. 25, 1902.

C. W. BOOTH.
CAR DOOR LOCK.

(Application filed Oct. 31, 1901.)

(No Model.)



WITNESSES:

James C. Herron.
S. R. Bell.

INVENTOR,

Chas. W. Booth,
by Howard Bell, Att'y.

UNITED STATES PATENT OFFICE.

CHARLES W. BOOTH, OF MILWAUKEE, WISCONSIN.

CAR-DOOR LOCK.

SPECIFICATION forming part of Letters Patent No. 696,089, dated March 25, 1902

Application filed October 31, 1901. Serial No. 80,649. (No model.)

To all whom it may concern:

Be it known that I, CHARLES W. BOOTH, of Milwaukee, in the county of Milwaukee and State of Wisconsin, have invented a certain new and useful Improvement in Freight-Car Door Locks, of which improvement the following is a specification.

The object of my invention is to provide a fastening appliance for the doors of freight-cars or other analogous applications which shall be of simple and inexpensive construction and shall afford a positive lock maintained by a seal or a padlock, or both, which will render it impossible to open the door or tamper with the lock without severing the seal.

The improvement claimed is hereinafter fully set forth.

In the accompanying drawings, Figure 1 is a view in elevation of a lock, illustrating an embodiment of my invention applied to a freight-car door; Fig. 2, a plan or top view of the same with the door and stile in horizontal section; Fig. 3, a side view, partly in section, of the hasp detached; Fig. 4, a plan or top view of the same; Fig. 5, a transverse section at the line *a a* of Fig. 3; Fig. 6, a side view of the door-stile plate; Fig. 7, a front view of the same, partly in section, on the line *b b* of Fig. 6; and Fig. 8, a plan or top view of the same.

My improved freight-car-door lock comprises three parts—a staple, a combined hasp and seal-pin, and a door-stile plate—all of which are preferably made of malleable iron. The staple 1, which is of the ordinary form and is secured by a bolt 2 to the car-door 3, provides a pivotal socket for the connection of the swinging hasp 4, which is an arm of plate form having strengthening-ribs on its edges and provided at one end with an elongated eye 5, through which the leg of the staple 1 passes and through which the hasp is connected to the car-door. A radial slot 6, having an enlarged eye 7 at its lower end, is formed in the outer or free end of the hasp 4, and a seal-pin 8 projects downwardly from the hasp below the eye 7. The upper end of the slot 6 constitutes an upper bearing, which engages an upper bearing on the door-stile plate, and the seal-pin 8 forms a lower bearing, which engages a lower bearing on said

plate, as presently to be described. A transverse seal way or channel 9 for the reception of a strap or wire seal 10 passes through the seal-pin, and an outwardly-projecting padlock-lug 11, in which is formed an opening 12 for the reception of the bow of a padlock, is, if it is desired to use a padlock, formed upon the hasp between the eye 7 and the seal-pin.

The door-stile plate 12 is secured at its top and bottom to the door-stile 13 of the car by bolts 14 and is provided near its upper end with an outwardly-projecting pin or catch 15, having an enlarged head 16. The pin 15, which serves as an upper abutment for the hasp, is of such diameter as to fit freely in the radial slot 6 of the hasp, and the head 16 is of slightly-less diameter than the enlarged eye 7, in which the radial slot terminates. A housing or socket 17, the bore of which is adapted to receive the seal-pin 8 and which serves as a lower abutment for the hasp, projects outwardly from the door-stile plate near its lower end, and a sealway 18, adapted to register with the sealway 9 of the hasp when the latter is engaged with the door-stile plate, passes through the housing 17. An outwardly-projecting padlock-lug 19, having an opening 20, adapted to register with the opening of the padlock-lug of the hasp, is formed upon the door-stile plate above the housing 17 in cases where the hasp is provided with a padlock-lug.

In the operation of the appliance the hasp is hooked on the staple and the staple bolted to the car-door, and the door-stile plate is secured to the door-stile. The hasp is then swung into position to permit its eye 7 to be passed over the head 16 of the door-stile pin 15 and is then dropped down until the top of the radial slot 6 abuts on the pin 15 and the seal-pin 8 engages the socket 17 of the door-stile plate. It will be seen that when in this position the hasp has an upper engagement on the door-stile pin and a lower one with the socket of the door-stile plate, thus giving double strength to the connection of the door and door-stile. A sealing plate or wire 10 of any suitable and preferred description being passed through the registering sealways of the hasp and door-stile plate and its ends sealed together in the ordinary manner, the door cannot be opened

except by breaking the seal. In cases where the hasp and door-stile plate are provided with registering padlock-lugs either a padlock or a seal, or both, may be employed.

5 While the socket of the door-stile plate is herein shown as completely encircling the seal-pin of the hasp, it will be obvious that, if preferred, its function may be performed by a projection located on the side of the door-stile plate adjoining the door and having a sealway corresponding with that of the socket shown, said projection serving, in the specific form of socket shown, as a lower bearing or abutment for the seal-pin and recep-
10 tacle for the seal and being practically one-half of the socket shown.

I claim as my invention and desire to secure by Letters Patent—

1. In a car-door-fastening appliance, the
20 combination of a staple, a hasp swinging thereon and having upper and lower bearings at its end farther therefrom, and a door-stile plate having upper and lower bearings or abutments adapted, respectively, to be engaged, with a positive locking connection, by
25 the upper and the lower bearing of the hasp.

2. In a car-door-fastening appliance, the combination of a staple, a hasp swinging thereon and having upper and lower bearings
30 at its end farther therefrom; a door-stile plate having upper and lower bearings or abutments adapted, respectively, to be engaged, with a positive locking connection, by the upper and the lower bearing of the hasp, and
35 means for securing together the lower bearings of the hasp and door-stile plate.

3. In a car-door-fastening appliance, the combination of a staple, a hasp swinging thereon and having, at its end further from
40 the staple, an upper radial slot and a lower seal-pin, a door-stile plate having an upper pin and a lower socket, adapted, respectively,

to be engaged by the radial slot and the seal-pin of the hasp, and means for connecting the seal-pin and the socket. 45

4. In a car-door-fastening appliance, the combination of a staple, a hasp swinging thereon and having, at its end farther from the staple, an upper radial slot and a lower seal-pin provided with a transverse sealway, 50 and a door-stile plate having an upper pin adapted to be engaged by the radial slot, and a lower socket adapted to be engaged by the seal-pin and provided with a transverse sealway registering with the sealway of the
55 said pin.

5. In a car-door-fastening appliance, the combination of a staple, a hasp swinging thereon and having, at its end farther from the staple, an upper radial slot terminating
60 at bottom in an enlarged eye, and a lower seal-pin provided with a transverse sealway, and a door-stile plate having an upper pin, adapted to fit in the radial slot and provided with a head adapted to enter the enlarged
65 eye of said slot, and a lower socket adapted to be engaged by the seal-pin and provided with a transverse sealway registering with the sealway of said pin.

6. In a car-door-fastening appliance, the
70 combination of a staple, a hasp swinging thereon and having, at its end farther from the staple, an upper radial slot and a lower seal-pin and padlock-lug, and a door-stile plate having an upper pin and a lower socket, 75 adapted, respectively, to be engaged by the radial slot and the seal-pin of the hasp, and a padlock-lug adapted to register with the padlock-lug of the hasp.

CHARLES W. BOOTH.

Witnesses:

H. A. BOWDISH,
F. W. THOMAS.