J. G. WENTSCH.

SLIDING DOOR LATCH.

APPLICATION FILED SEPT. 20, 1918.

1,360,839. Patented Nov. 30, 1920.

Fig. 1.

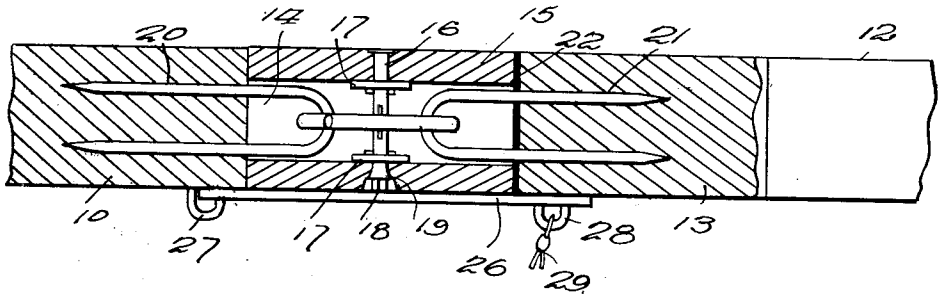
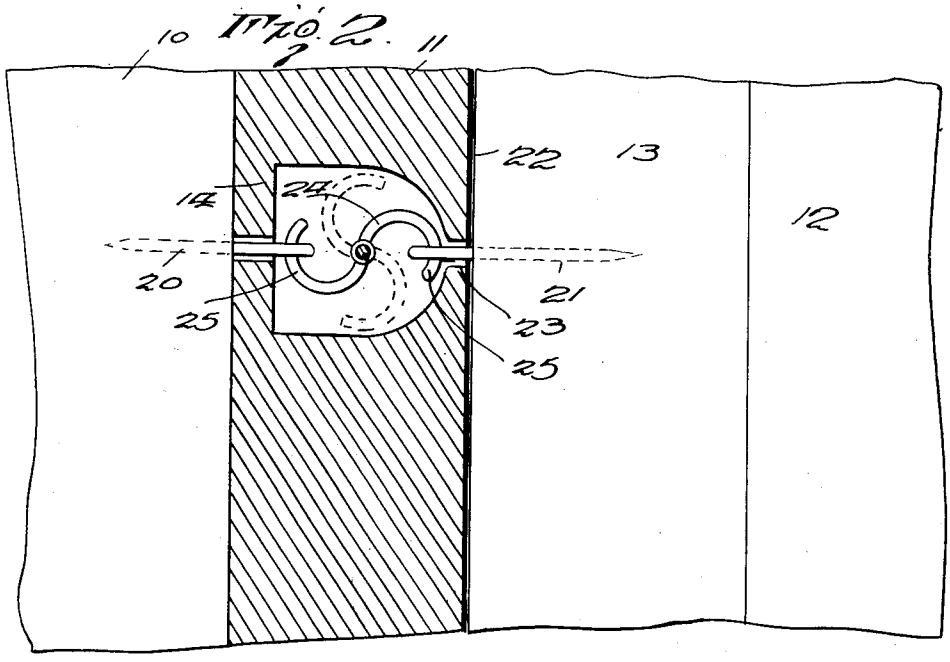


Fig. 2.



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SLIDING-DOOR LATCH.

1,360,839. Specification of Letters Patent. Patented Nov. 30, 1920.

Application filed September 20, 1918. Serial No. 254,944.

To all whom it may concern:

Be it known that I, JOHN G. WENTSCH, a citizen of the United States, residing at Fort Wayne, in the county of Allen and State of Indiana, have invented certain new and useful Improvements in Sliding-Door Latches, of which the following is a specification.

This invention relates to improvements in locks or latches for sliding doors, such as used in connection with box cars, barn doors, sliding barn gates or other rolling or sliding doors.

The primary object of the invention is to provide an improved device of the above character which will securely and tightly fasten a door and prevent improper opening thereof, the lock being of novel and simple construction capable of quick application to the body or frame of the door and particularly adapted for use in connection with box cars as used on railways, so as to cover the lock and permit the use of usual seal connection therewith.

With the above and other objects in view, as will appear as the description proceeds, the invention comprises the various novel features of construction and arrangement of parts which will be more fully described herein and set forth with particularity in the claim appended hereto.

Reference is had to the accompanying drawings forming a part of this application, in which like reference characters indicate the corresponding parts throughout the several views, in which:

Figure 1 is a horizontal sectional view showing my improved lock in engaged position, and

Fig. 2 is a vertical sectional view thereof.

Referring to the drawings in detail, the number 10 designates a closure, such as the side of a box car, barn or the like provided with the usual frame including a vertical jamb 11 which may be directly recessed to accommodate the lock, or provided with a supplementary portion as shall be found desirable. The door is indicated at 12 and is provided with a stile 13 vertically of the free edge thereof designed to be engaged with the frame of the door, it being understood that the door is designed to slide or is otherwise supported as upon rollers or hangers, so as to be moved horizontally to open and closed position.

The jamb 11 is recessed horizontally and transversely, as shown at 14, so as to receive therein a suitable block or casting 15 of metal, wood or other desirable material, in which is rotatably mounted an axis or shaft 16, being suitably held from end thrust therein by engaging means 17 and being supported for free rotation. One end of the shaft 16 is provided with a squared portion or other key engaging head 18, which may be formed in any desirable way, as for instance slotted, to receive a detachable key and to be turned by that particular key only. The shaft is shown squared adjacent to an enlargement 19 to receive a square socketed or other type of key, by way of illustration.

The car side or wall 10 carries a U-bolt or staple 20, which projects horizontally into the recess 14 and the door is provided with a similar U-bolt or staple 21 which projects from the free edge portion 22 thereof, so as to extend through a reduced portion 23 into the recess 14.

Fixed to the shaft or axis 16 is an S-shaped catch bolt 24 which when disposed in a vertical position as indicated by dotted lines in Fig. 2, is designed to be out of engagement with respect to the bent portions of the U-bolts or staples 20 and 21, but which when turned to the full lined position as indicated in Fig. 2, so as to be horizontally disposed, will cause the hook ends 25 to be engaged upwardly and downwardly respectively with said U-bolts or staples, thereby effectively preventing opening of the door with respect to its frame. This object is further carried out by providing over the recess 14 and the engaged ends of the shaft or axis 16 at the outside of the car body or inclosure, a galvanized plate or hasp 26 pivoted as shown at 27 and designed to be locked in closed position over the key head or engaging the end of the shaft or axis 16, as through the medium of slotting the hasp or plate 26 to engage a staple or the like 28 which may also be closed by a padlock in addition to the usual form of seal indicated at 29. The lock or latch is thereby effectively hidden from view and thereby prevented from being tampered with. Obviously the device can be applied to various forms of sliding or rolling gates or doors, within the spirit of the invention.

From the foregoing description taken in connection with the accompanying drawings, it is thought that a clear and comprehensive understanding of the construction,

operation, and advantages of my invention may be had, and while I have shown and described the device as embodying a specific structure, I desire that it be understood that such changes may be made in said structure as do not depart from the spirit and scope of the invention as claimed.

Having thus described my invention what I claim is new, and desire to secure by Letters Patent, is:

The combination with a door and its jamb, the latter having a lock receiving recess; of a rotatable shaft mounted in said recess and having a key receiving actuating head, an S-shaped catch fixed midway its ends to said shaft, a staple carried by said jamb having its head extending into said recess in the path of said catch, the door carrying a similar staple to enter said recess at a point diametrically opposite the jamb carried bolt, whereby the ends of said S-shaped catch will engage said bolts and lock the door, and a hasp arranged over and concealing said shaft head and adapted to be sealed in closed position.

In testimony whereof, I affix my signature hereto.

JOHN G. WENTSCH.