N. LITCHFIELD.

CAR SIGN.

APPLICATION FILED JULY 3, 1911.

1,067,043. Patented July 8, 1913.

Fig. 2.

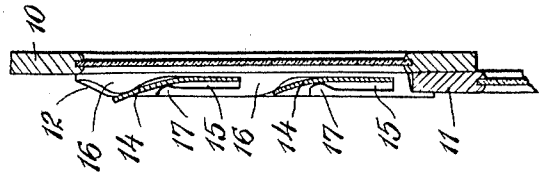


Fig. 1.

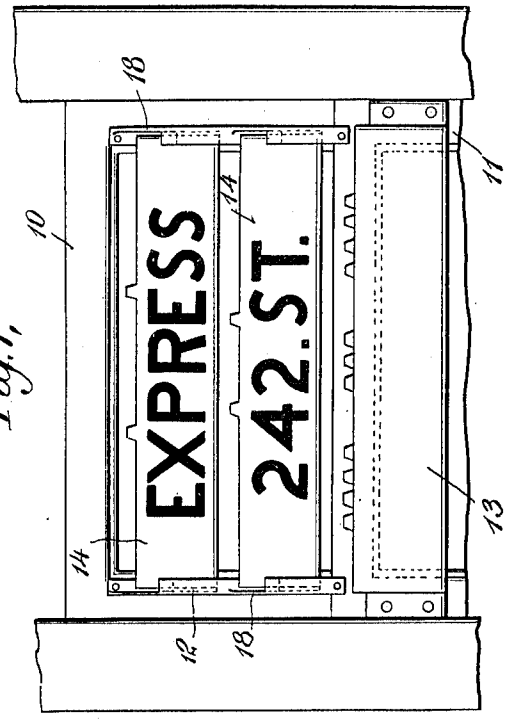
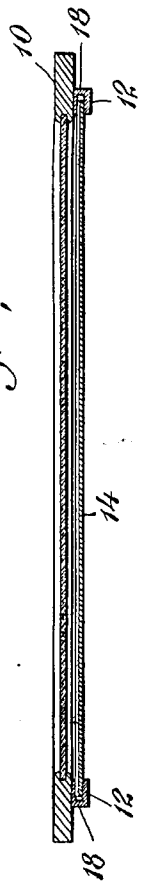


Fig. 3.



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CAR-SIGN.

1,067,043. Specification of Letters Patent. Patented July 8, 1913.

Application filed July 3, 1911. Serial No. 636,771.

To all whom it may concern:

Be it known that I, NORMAN LITCHFIELD, a citizen of the United States, and a resident of Glen Ridge, in the county of Essex and State of New Jersey, United States of America, have invented certain new and useful Improvements in Car-Signs, of which the following is a specification.

My invention relates to changeable signs, especially for use in railroad or trolley cars, and its object is to provide a simple and inexpensive structure which has advantages over those which have heretofore been in use.

I will describe my invention in the following specification and point out the novel features thereof in the appended claims.

Referring to the drawings, Figure 1 is an elevation of a portion of a car window,—in this case a side window,—with one of my improved signs shown in conjunction therewith. Fig. 2 is a sectional end elevation of the device which is shown in Fig. 1. Fig. 3 is a sectional plan view of a portion of this same device.

Like characters of reference designate corresponding parts in all of the figures.

10 designates the upper sash of a car window. 11 is its lower sash. A pair of brackets 12, 12 are affixed to the sides of the window sash in vertical position.

13 is a boxlike receptacle open at the top, which is fastened to the lower sash in horizontal position, and is provided for the reception of such of the signs as are not in use.

The signs proper are designated by 14. These are made of spring sheet metal such as steel with the desired letters, numbers or other symbols on both sides thereof. These symbols may be painted or otherwise made. I prefer to form them by lithographing upon the surfaces of the metal.

The side brackets 12 are constructed as shown in Fig. 2 with grooves of peculiar shape cut in their inner sides. Referring to this latter figure it may be seen that there are two of these side grooves, designated by 15, in each bracket. The parts of the brackets which form the upper rear surfaces of the grooves are curved forward to form protuberances 16. Other parts of the brackets which form the lower front portions of the slots are curved inward to form lugs 17. These lugs project through planes drawn from the face of the protuberances 16, to the lower rear corners of the slots. Between the parts 16 and 17 the brackets are open, except at the outer edges thereof, along which are webs 18 which close the outside of the slots.

The signs are forced downward into the slots. In thus forcing them into the brackets their ends are bent transversely by the lugs 17 which engage the ends of the signs near the central front surfaces thereof, while their lower rear surfaces rest against the lower rear surface of the slot 15, and their upper rear surfaces are against the protuberances 16. These engagements are only near the ends of the signs so that only end portions thereof are thus bent. The elasticity of the metal of which the signs are made then holds them firmly in place and thus effectively prevents vibration and rattling. The webs 18 are a distance apart somewhat greater than the length of the signs and are provided to assist in placing the signs in proper positions relative to the brackets and obviously prevent the signs from sliding longitudinally.

If desired, the parts of the brackets may be proportioned as shown to cause the signs to be tilted forward with the upper sign tilted at a greater angle than the lower one.

The symbols are placed on both sides of the signs so that they may be read from the outside or the inside of the car.

To remove the signs they are grasped near their centers and pulled forward. This bends them longitudinally until their ends slip out of the brackets.

What I claim is:—

1. In a sign, the combination with a support, comprising a pair of similar parallel notched side brackets separated by an unobstructed space, of flexible sign plates, the ends of which are adapted to be inserted in said notches, each of said notches having substantially parallel sides at the bottom and upward therefrom, and offset inwardly extending projections from the respective sides near the mouth of the notch, said plates being materially wider than the notches are deep, whereby the ends of the sign plates are held against the inner sides of the notches except at the corners where they are bent outwardly to permit the ready removal of the plates and to hold them in position.

2. In a sign the combination with a support comprising notched side brackets, a fixed distance apart and separated by an unobstructed space, of a flexible sign plate

the ends of which are adapted to be inserted in said notches, each of said notches having offset projections extending inwardly from opposite sides whereby the ends of the plate are bent transversely as it is inserted in the notches, to hold the plate in position.

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

NORMAN LITCHFIELD.

Witnesses:
WILLIAM P. DALTON,
DICKINSON E. GRIFFITH.

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."