

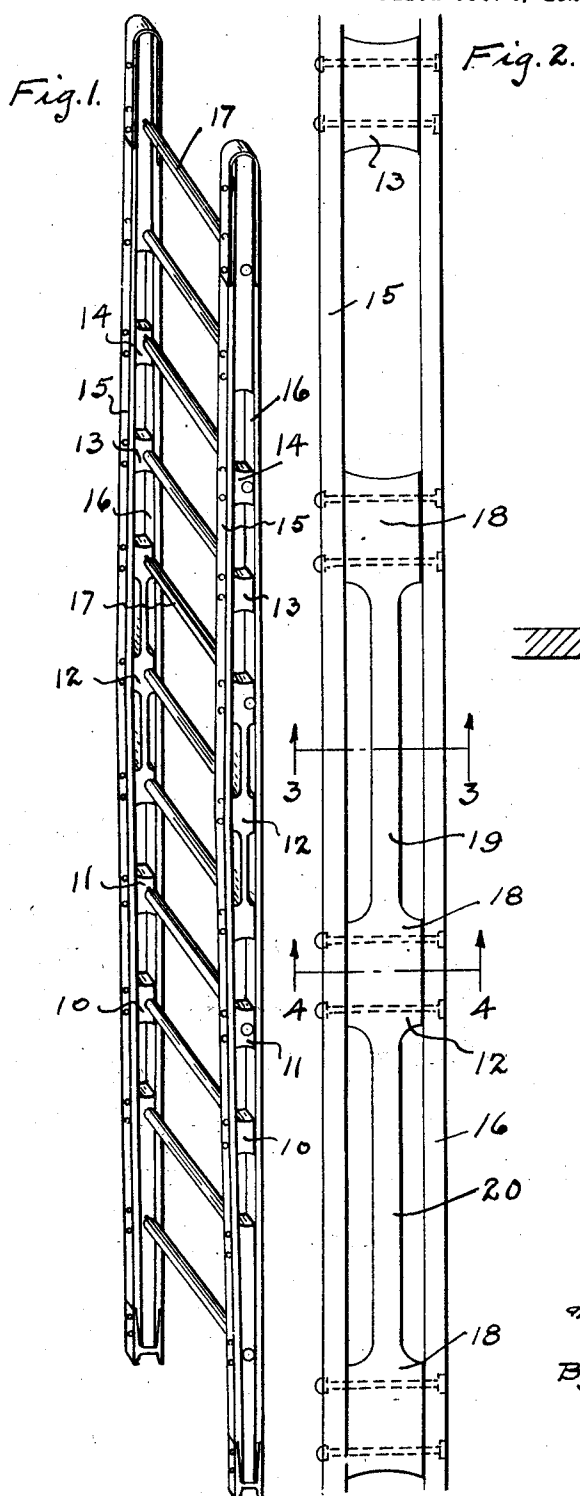
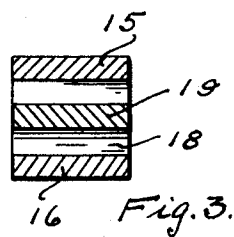
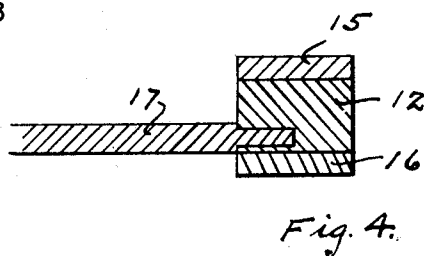
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TRUSSED LADDER RAIL

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UNITED STATES PATENT OFFICE.

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TRUSSED LADDER RAIL.

Application filed October 8, 1926. Serial No. 140,235.

This invention relates to ladders and particularly to a trussed ladder rail.

In describing the invention reference is made to the accompanying drawing, in which—

Fig. 1, is a perspective view of a ladder embodying the invention;

Fig. 2, an enlarged side elevation of the central portion of a rail of the ladder;

Fig. 3, a transverse section through the rail on the line 3—3 in Fig. 2; and

Fig. 4, a transverse section through the rail on the line 4—4 in Fig. 2.

Like characters of reference indicate like parts throughout the several views in the drawing.

Referring to Fig. 1, the ladder is composed of the two similar side rails, each of which rails is built up in the nature of a truss by interposing the blocks 10, 11, 12, 13 and 14 between the top plate 15 and the lower plate 16, the two plates 15 and 16 being spaced further apart in the central portions than at the ends.

The rounds 17 are secured by their ends in the respective blocks in the usual and well known manner. Particular attention is directed to the central blocks 12. Each block 12, here shown, is in effect comprised of three separate spacing blocks 18, similar to the blocks 10, 11, 13 and 14, and stays 19 and 20 unite the three blocks 18 to form the integral block 12. In larger ladders, the length of the block 12 is increased by adding

more blocks 18 with the corresponding intervening stays. The block 12 is positioned centrally in the length of each side rail where normally the greatest deflection occurs under load.

By employing the block 12 in place of separate, individual blocks at the central position, the ladder rail is greatly stiffened and it is found that under a given load there is less deflection of the rail and that upon removal of the load, the rail will return closer to its initial position of no load.

While the type of ladder here shown and described is adapted to universal usage, it is especially adapted to usage by fire departments where a light weight ladder having great rigidity under loads larger than usually put upon a ladder is demanded.

We claim:

In a trussed ladder rail, a pair of plates joined at their ends, a group of blocks spaced apart at intervals from each other secured to and spacing apart the said two plates, ties interconnecting said blocks in said group, and individual blocks secured to and between the said two plates, said individual blocks being separate one from the other and spaced at intervals between each end of the pair of plates and said group.

In testimony whereof we affix our signatures.

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