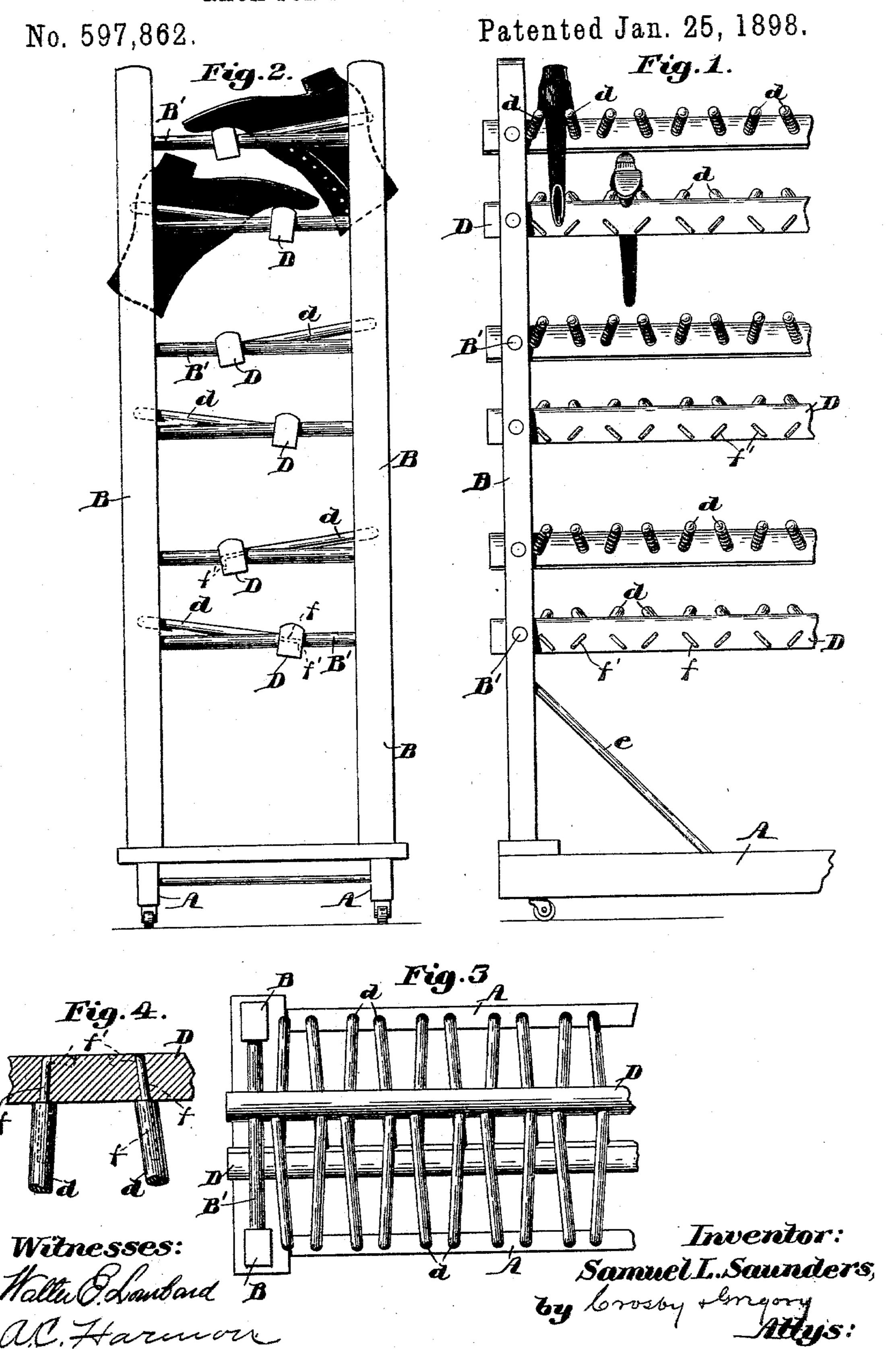
S. L. SAUNDERS. RACK FOR HOLDING BOOTS OR SHOES.



## United States Patent Office.

SAMUEL L. SAUNDERS, OF LYNN, MASSACHUSETTS.

## RACK FOR HOLDING BOOTS OR SHOES.

SPECIFICATION forming part of Letters Patent No. 597,862, dated January 25, 1898.

Application filed July 1, 1897. Serial No. 643,147. (No model.)

To all whom it may concern:

Beit known that I, Samuel L. Saunders, of Lynn, in the county of Essex and State of Massachusetts, have invented an Improvement in Racks for Holding Boots or Shoes, of which the following description, in connection with the accompanying drawings, is a specification, like letters on the drawings representing like parts.

This invention relates to a device for holding boots and shoes while undergoing the various processes of manufacture; and it has for its object the improvement of that class of racks forming the subject-matter of United States Patent No. 440,439, granted to me No-

vember 11, 1890.

It is necessary to provide means for supporting the boots and shoes separately, so as to avoid crushing or marring them and to 20 preserve their shape, and in the patent referred to two oppositely-extended series of pins are rigidly secured to inclined supporting-bars arranged side by side, the pins being arranged in pairs and outwardly converging. 25 The inclination of the pins is regulated by the size of the boots or shoes to be held thereby, so that each rack is adapted to a certain size. In order to accommodate the two opposite series of pins on the bars, the width of the rack 30 is considerable, and as large numbers of racks are required in a factory much valuable floorspace is thus occupied which could be utilized otherwise to better advantage.

In my present invention I have materially decreased the width of the rack without impairing its holding capacity, and I have also mounted the holding-pins in a yielding manner, so that they can be readily adjusted to accommodate boots and shoes of various sizes.

The novel features of my invention will be hereinafter fully described, and particularly

pointed out in the claims.

Figure 1 is a front elevation of a sufficient portion of a rack to be understood, with my present invention embodied therein. Fig. 2 is an end elevation of the rack shown in Fig. 1. Fig. 3 is a partial top or plan view of the rack; and Fig. 4 is an enlarged detail, partially in section, to show more clearly the manner in which I prefer to secure the pins to their support.

The skeleton frame may be composed of a

base A, vertical end standards B, and stayrods e, substantially as in the patent referred to, the standards being connected by crossrods B', which, as herein shown, are extended through inclined holes in the ends of superposed longitudinal supporting-bars D.

As clearly shown, the supporting-bars D are staggered and preferably slightly inclined 60 to give the desirable slight upward inclina-

tion to the shoe-holding members.

The shoe-holding members are shown as pins d, preferably of wood or other suitable material, yieldingly mounted on the support- 65 ing-bars and arranged in outwardly-converging pairs, the shoes being supported bottom upward on the pins, with their tops extended down between and below the pins, as shown, one shoe to each pair of pins. As in the pat- 70 ent referred to, the outer ends of the pins bear against the heel portion of the shoe, conforming to and supporting the natural form of the shoe and preventing the shoe from being dislodged by movement of the rack. The inner 75 ends of the shoe-holding members are located below the top of their supporting-bar, so that the shoes rest on the top of the bar back of their tips, thereby preventing any chafing or scratching of the tips.

The holding members extend only from one side of the supporting-bar, and the members on one bar extend oppositely from those on the next adjacent bar, so that by the staggered arrangement of the supporting-bars I 85 am enabled to greatly reduce the width of the rack, and thus economize floor-space without decreasing the capacity of a given rack.

The supporting-bars are placed as close together vertically as may be convenient or desirable.

It is highly desirable to vary the angle between each pair of pins to adapt the rack readily to different forms and sizes of shoes to be held, and this I accomplish by yield- 95 ingly mounting the pins on the supporting-

I have shown in detail in Fig. 4 one convenient and effective mode of mounting the pins. Holes are made in the supporting-bar 100 in converging pairs, and into the holes are forced study f, of stout wire, projecting from the side of the bar from which the pins are to extend, the other ends of the study being

bent over at f' and driven into the material of the bar. The pins d are longitudinally drilled to receive the studs, the pins being pushed thereonto and being held frictionally, the pins partaking of the initial inclination of the studs. By bending the pins to right or left the inclination is changed to adjust them to the size and form of shoe to be held thereby, and when a pin becomes splintered or broken it can be drawn off its stud and a new one substituted. The yielding connection of the holding-pins with the supporting-bar also enables the elevation of the pins to be regulated as desired.

My invention is not restricted to the precise construction and relative arrangement herein shown, nor to the yielding connection shown between the supporting-bar and shoe-

holding members.

Having described my invention, what I claim as new, and desire to secure by Letters

Patent, is—

1. A rack for holding boots and shoes, comprising a frame, a plurality of longitudinally25 extended supporting-bars, and a series of pins mounted on each bar and independently adjustable and arranged in outwardly-converging pairs, the pins on one bar extending oppositely to the pins on the next adjacent bar, substantially as described.

2. A rack for holding boots and shoes, comprising a frame, a plurality of longitudinally-extended superposed and staggered supporting-bars, and a series of yieldingly-mounted pins on opposite sides of adjacent bars and

arranged in outwardly-converging pairs, substantially as described.

3. A rack for holding boots and shoes, comprising a frame, a plurality of longitudinally-extended superposed supporting - bars arranged in staggered order, and a series of independently-adjustable pins extended laterally from said bars in outwardly-converging pairs, to receive between them the upper of the shoe, the pins on one bar extending in 45 the opposite direction to those on the next bar, substantially as described.

4. A rack for holding boots and shoes, comprising an open frame, a plurality of longitudinally extended supporting-bars, yielding so study rigidly secured to said bars and projecting outwardly therefrom, and removable shoe-holding members mounted on said study,

substantially as described.

5. A rack for holding boots and shoes, comprising a frame, a plurality of superposed and staggered supporting - bars, and a series of yieldingly-mounted shoe-holding members extended from opposite sides of adjacent supporting-bars, the inner ends of the holding 60 members being located below the top of the bar upon which they are mounted, substantially as described.

In testimony whereof I have signed my name to this specification in the presence of 65

two subscribing witnesses.

SAMUEL L. SAUNDERS.

Witnesses:

JOHN C. EDWARDS, AUGUSTA E. DEAN.