May 15, 1945. G. A. KAROW 2,376,153

SAWHORSE

Filed Dec. 16, 1943 2 Sheets-Sheet 1

Fig. 1.

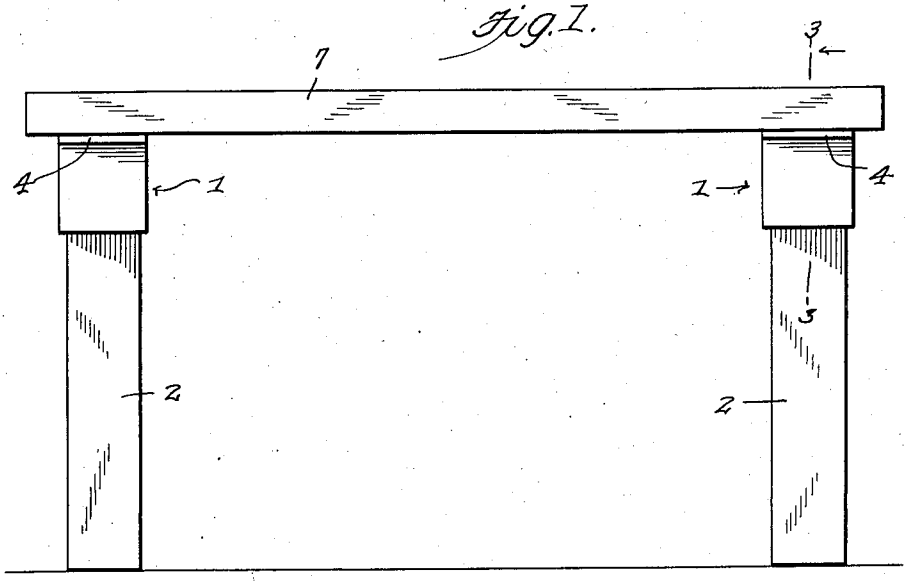
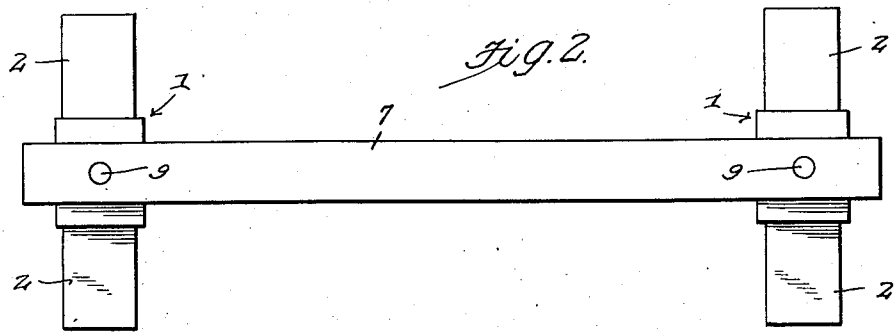


Fig. 2.



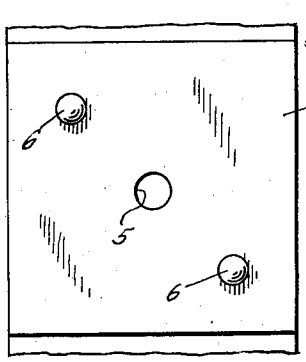


Fig. 5.

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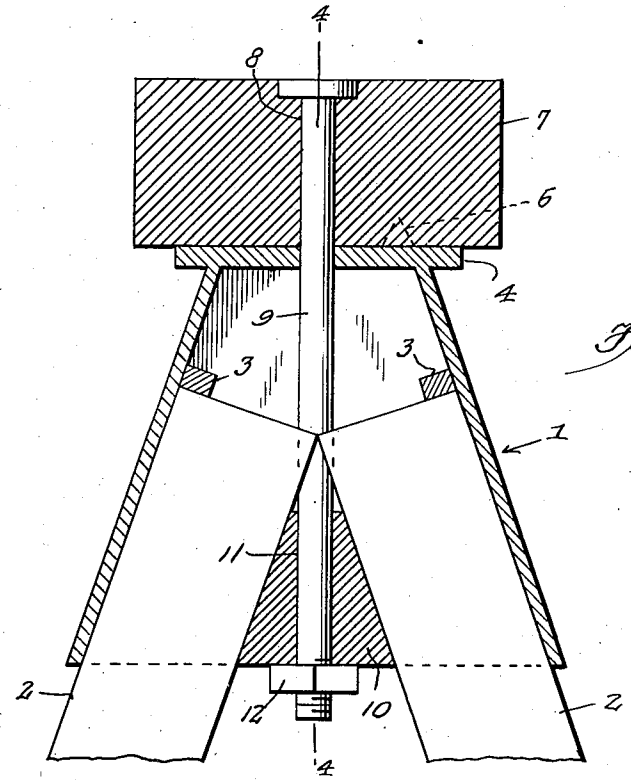


Fig. 3.

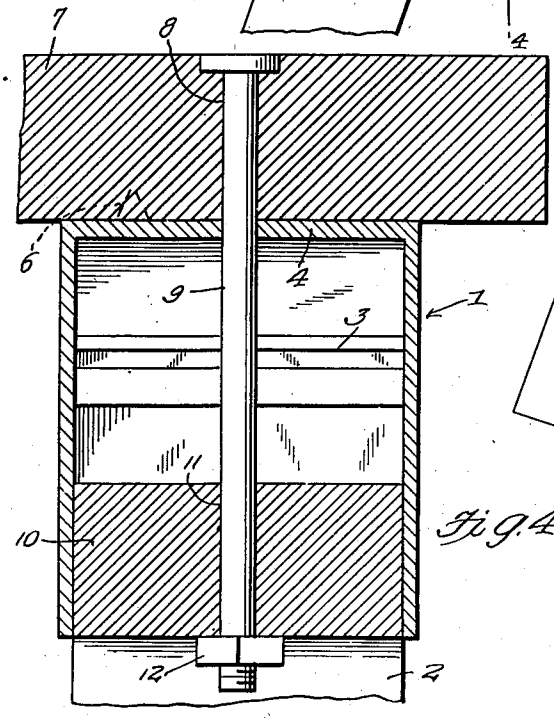


Fig. 4.

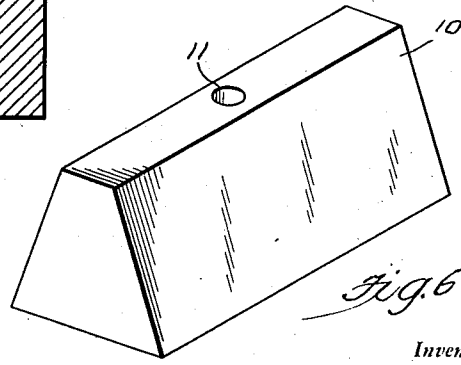


Fig. 6.

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UNITED STATES PATENT OFFICE

2,376,153

SAWHORSE

George A. Karow, Torrance, Calif., assignor of one-tenth to Mildred S. Fry and one-tenth to Joseph S. Doyon, both of Torrance, Calif.

Application December 16, 1943, Serial No. 514,559

2 Claims. (Cl. 304—5)

The present invention relates to new and useful improvements in sawhorses, and has for its primary object to provide, in a manner as hereinafter set forth, a device of this character comprising a bracket of novel construction, whereby ordinary two-by-four lumber may be readily used for the beam and legs of the device.

Another very important object of the invention is to provide unique means for firmly securing the legs and the beam to the bracket.

Still another object of the invention is to provide a sawhorse of the character described which, when desired, may be expeditiously knocked down or disassembled.

Other objects of the invention are to provide a sawhorse which will be comparatively simple in construction, strong, durable, highly efficient and reliable in use, compact, light in weight and which may be manufactured at low cost.

All of the foregoing and still further objects and advantages of the invention will become apparent from a study of the following specification, taken in connection with the accompanying drawings wherein like characters of reference designate corresponding parts throughout the several views, and wherein:

Figure 1 is a view in side elevation of a sawhorse embodying the present invention.

Figure 2 is a top plan view thereof.

Figure 3 is a cross sectional view, taken substantially on the line 3—3 of Figure 1.

Figure 4 is a view in vertical section through one end portion of the sawhorse, taken substantially on the line 4—4 of Figure 3.

Figure 5 is a top plan view of one of the brackets with portions broken away.

Figure 6 is a detail view in perspective of the leg-securing wedge.

Referring now to the drawings in detail, it will be seen that the assembly comprises a pair of duplicate brackets 1 of suitable metal. As illustrated to advantage in Figure 3 of the drawings, the brackets 1 are substantially tapered for the reception of the upper end portions of pairs of upwardly converging legs 2. Stops 3 are provided on the oppositely inclined side walls of the brackets 1 for engagement with the upper ends of the legs 2.

The brackets 1 further include substantially flat, integral top plates 4. The plates 4 are provided with openings 5. Conical prongs 6 rise from the plates 4.

The end portions of a beam 7 rest on the plates 4 of the brackets 1, the prongs 6 being embedded in said beam. The beam 7 has formed in its end portions vertical openings 8 which are aligned with the openings 5 and which accommodate countersunk bolts 9. The bolts 9 pass downwardly in the brackets 1 between the contacting upper portions of the pairs of legs 2 which are recessed to accommodate said bolts.

Wedges 10 are mounted on the lower end portions of the bolts 9 and engaged between the pairs of legs 2. Vertical openings 11 in the wedges 10 receive the bolts 9. Nuts 12 are threaded on the lower end portions of the bolts 9 beneath the wedges 10 for tightening said wedges between the pairs of legs 2 and for firmly securing the beam 7 on the plates 4.

It is thought that the method of assembling the sawhorse will be readily apparent from a consideration of the foregoing. Briefly, the brackets 1 may be mounted on the pairs of legs 2; the beam 7 mounted on the plates 4 with the openings 8 aligned with the openings 5 and the bolts 9 inserted in said openings. The wedges 10 may then be slipped on the bolts 9 between the pairs of legs 2, after which the nuts 12 are threaded on said bolts. When the nuts 12 are tightened, the wedges 10 are forced upwardly between the pairs of legs 2 for firmly clamping said legs in the sockets 1 and the bolts 9 are drawn downwardly for securing the beam on the plates 4. It will thus be seen that the bolts 9 constitute common means for securing the beam 7 and the legs 2 to the brackets 1. The members 2 and 7 are conventional pieces of two-by-four lumber cut to the desired lengths. The construction and arrangement is such that by simply removing the nuts 12 and withdrawing the bolts 9, the sawhorse may be readily disassembled for transporting or storage.

It is believed that the many advantages of a sawhorse constructed in accordance with the present invention will be readily understood, and although a preferred embodiment of the device is as illustrated and described, it is to be understood that changes in the details of construction and in the combination and arrangement of parts may be resorted to which will fall within the scope of the invention as claimed.

What is claimed is:

1. A sawhorse comprising a horizontal beam, a pair of downwardly diverging supporting legs at each end of the beam, a hollow bracket open at the bottom and receiving the adjacent upper ends of each pair of legs, each bracket having rectangular downwardly diverging side walls, parallel walls in the form of isosceles trapezoids connecting said side walls, and a flat horizontal top

wall, said walls being integral, inclined stop ribs on the inner surfaces of said side walls flatly engaging the upper ends of the adjacent legs, the outer faces of the upper ends of each pair of legs flatly contacting the inner surfaces of the side walls of the associated bracket, a wedge disposed between the upper ends of each pair of legs and within the lower portion of the associated bracket, said wedge having downwardly diverging opposite sides flatly contacting the inner faces of the upper ends of the adjacent legs, and a nutted bolt passing downwardly through each end of the beam, the center of the top wall of the adjacent bracket and the intermediate portion of the associated wedge for removably rigidly securing the beam on the bracket and the legs in the bracket.

2. A sawhorse comprising a horizontal beam, a pair of downwardly diverging supporting legs at each end of the beam, a hollow bracket open at the bottom and receiving the adjacent upper ends of each pair of legs, each bracket having rectangular downwardly diverging side walls, parallel walls in the form of isosceles trapezoids connecting said side walls, and a flat horizontal top wall, said walls being integral, inclined stop ribs on the inner surfaces of said side walls flatly engaging the upper ends of the adjacent legs, the outer faces of the upper ends of each pair of legs flatly contacting the inner surfaces of the side walls of the associated bracket, a wedge disposed between the upper ends of each pair of legs and within the lower portion of the associated bracket, said wedge having downwardly diverging opposite sides flatly contacting the inner faces of the upper ends of the adjacent legs, and a nutted bolt passing downwardly through each end of the beam, the center of the top wall of the adjacent bracket and the intermediate portion of the associated wedge for removably rigidly securing the beam on the bracket and the legs in the bracket, each pair of legs having notches in the adjacent sides of their upper ends receiving the adjacent bolt, and prongs projecting upwardly from the top wall of each bracket and embedded in the beam.

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