(No Model.)

Z. J. DILLEY & H. J. HAYES.

WALL ATTACHMENT FOR SUPPORTING BICYCLES.

No. 570,465. Patented Nov. 3, 1896.

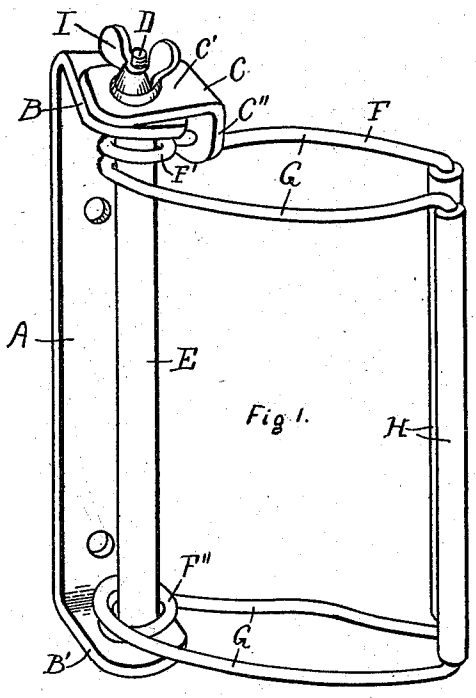

Fig 1.

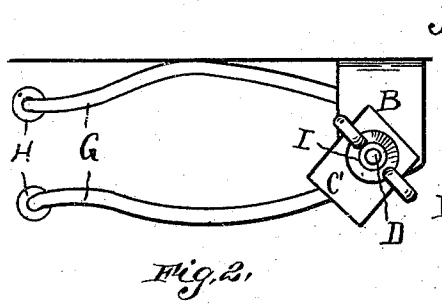

Fig. 2.

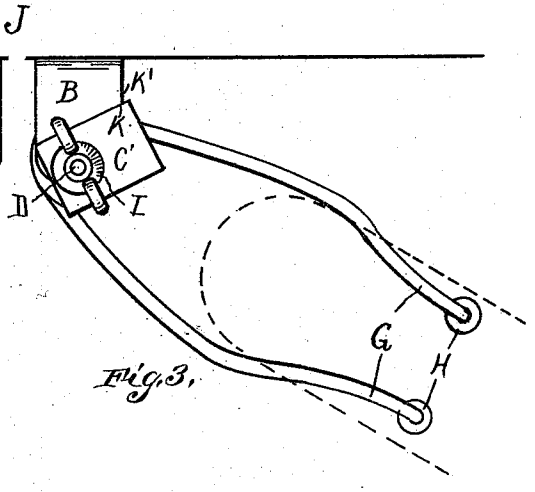

Fig. 3.

WITNESSES

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ZENA J. DILLEY AND HECTOR J. HAYES, OF MUIR, MICHIGAN.

WALL ATTACHMENT FOR SUPPORTING BICYCLES.

SPECIFICATION forming part of Letters Patent No. 570,465, dated November 3, 1896.

Application filed March 23, 1896. Serial No. 584,425. (No model.)

To all whom it may concern:

Be it known that we, ZENA J. DILLEY and HECTOR J. HAYES, citizens of the United States, and residents of Muir, in the county of Ionia and State of Michigan, have invented certain new and useful Improvements in Wall Attachments for Supporting Bicycles; and we do hereby declare that the following is a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, forming a part of this specification.

This invention relates to new and useful improvements in supports for bicycles; and it consists in the construction and association of parts, as hereinafter fully set forth, and pointed out particularly in the claims.

The object of the invention is to provide a device of the character described that shall be cheap and simple of construction and one that may be fastened onto a building, wall, or other convenient place, the supporting-arms of which are adapted to firmly grasp and support a bicycle by engagement with either the front or rear wheel, so that said bicycle may stand at any desired angle from the wall to which the support is fastened, which object is attained by the construction illustrated in the accompanying drawings, in which—

Figure 1 is a perspective view of our bicycle-support. Fig. 2 is a plan view of the support with the arms swung around close to the object to which said support is fastened; and Fig. 3 is a like view with the arms standing at an angle to the wall to which said support is fastened, said view showing, by dotted lines, a portion of a bicycle-wheel engaged by the arms of the support.

Referring to the letters of reference, A designates a base-plate the ends of which are turned at an angle to the body portion thereof and forming right-angle portions B B'. The body portion A is provided with apertures through which suitable screws, nails, bolts, or other devices may be passed for the purpose of securing said plate in place.

C designates an angle-plate, said plate having an aperture through each of its portions C' and C''.

D designates a bolt or rod, the upper end only of which is shown in the several views.

E designates a metal tube, said tube being just long enough to snugly fit between the angled portions B and B', as shown in Fig. 1.

F designates an endless bail, said bail being provided with central coils F' F'' and the upper and lower arms G G', the tendency of said coils being to hold said arms in juxtaposition to each other. The vertical portions of said bail are provided with tubes H, formed of rubber, wood, or other suitable material, said tubes being adapted to be revolved around said vertical portions of the bail and to overcome any rubbing or undue friction between said vertical portions and the rim and tire of the bicycle-wheel when said wheel is being inserted between the arms of the support or withdrawn therefrom, as will be well understood, said tubes also being employed to prevent any marring of the portion of the wheel engaged by the arms and vertical portions of the support.

The assembling of the parts of this device is as follows: The tube E is passed between the coils of the bail F. Then said tube is placed between the portions B B', so that the opening through its longitudinal center will stand in line with the apertures through said portions. When the tube has been so placed, the rod D is passed upward through the aperture in the angle portion B' of the plate A, the tube E, and the angle portion B of said plate until the head thereon (not shown) comes in contact with the under side of the portion B', so that the threaded end of the rod will project some distance above the portion B, when the plate C is set down over the upper end of the rod D, so that said rod will project upward through the aperture in the portion C' thereof, when said parts are secured together by means of a suitable thumb-nut I. This form of nut is selected, as it more conveniently enables one to remove the bail, tube E, and rod D, so that screws or the like may be passed through the apertures in the plate, when said parts may be replaced, as in the manner set forth. It will be seen that when the parts have been united by means of said nut and rod the arms G G' are free to swing in a portion of a horizontal circle, the plate C moving

as it is carried around by one of the arms G, projecting through an aperture in the portion C″ thereof.

When the device is not in use, the arms of the bail may be swung around close to the object J, to which it is attached, as clearly shown in Fig. 2. It will be seen that the tube E prevents the angle portions B B′ from being bent toward each other when tension is applied to said rod D in binding said parts together by means of the nut. It will also be seen that the arms are bowed outward in the center of their lengths to receive the round of the tire and rim and allowing the vertical portions to close in as said wheel is entered therebetween, as will be understood, and firmly hold said wheel. It is intended that this device shall be placed against an object about on a level with the axle of the bicycle-wheel, so that when said wheel is run in between the arms said wheel will be engaged at about the center of its periphery.

If there is a wide passage-way in the rear of a wheel while said wheel is being supported by the above-described device, the arms of the bail, if desired, may stand at right angles to the supposed wall J; but if said device is to be used in a narrow passage-way said arms may be swung around until the edge K of the plate C comes in contact with the edge K′ of the plate portion B, when said arms will be securely held at the angle shown in Fig. 3.

It will be seen that by the employment of this improved device, fastened in a place where it is customary to leave a bicycle, said bicycle may be supported free from any object, as the use of this device will keep the nickel on the handle-bars from becoming scratched, also the leather of the saddle from being marred, which is the usual result from the practice of laying a bicycle up against a support, and it will be readily seen that either the front or rear wheel of the bicycle may be entered between the arms of the bail, and the wheel held with equal security.

Having thus fully set forth our invention, what we claim as new, and desire to secure by Letters Patent, is—

1. In a device for the purpose set forth, the combination of the plate, the angled portions extending therefrom, the tube extending between said angled portions, the bail having coils that surround said tube, the rod passing through said tube, the arms of the bail standing adjacent to each other, and the nut for removably holding said rod in place, as set forth.

2. In a device for the purpose set forth, the combination of the plate, the angled portions extending therefrom, the tube extending between said angled portions, the bail, said bail having coils surrounding said tube, the rod passing through said tube, the thumb-nut on the end of said rod, the arms on said bail, said arms extending at an angle to said rod and extending parallel with each other, and the angled plate C attached to said bail.

3. In a device for the purpose set forth, the combination of the plate A, the angled portions B, B′ extending therefrom, the tube extending between said angled portions, the bail, the coils in said bail surrounding said tube, the rod passed through said tube the thumb-nut on the threaded end of said rod, the arms on the bail, said arms extending approximately parallel with each other, said arms having vertical portions, said portions being surrounded by tubes of suitable material, for the purpose set forth, and the angled plate C for limiting the swing of the arms in one direction, substantially as and for the purpose set forth.

In testimony whereof we hereunto set our hands this 19th day of March, 1896.

ZENA J. DILLEY.
HECTOR J. HAYES.

In presence of—
JOHN DILLEY,
FRANK H. DAVIS.