

No. 640,304.

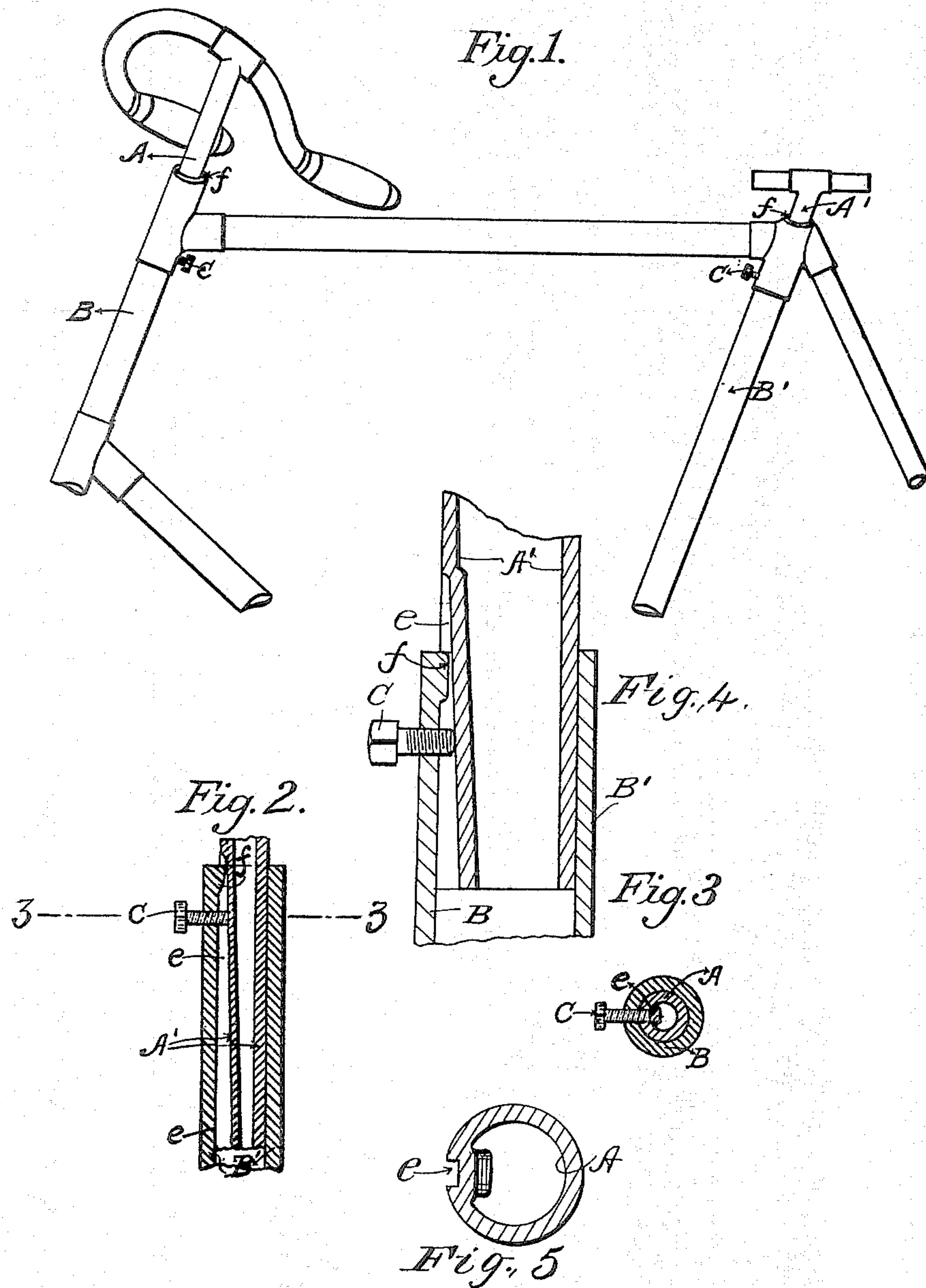
Patented Jan. 2, 1900.

E. L. LOWE.

CLAMPING DEVICE FOR SEAT POSTS AND HANDLE BAR POSTS FOR BICYCLES.

(Application filed Sept. 19, 1898.)

(No Model.)



Witnesses,
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UNITED STATES PATENT OFFICE.

ENOCH LOUIS LOWE, OF SAN FRANCISCO, CALIFORNIA.

CLAMPING DEVICE FOR SEAT-POSTS AND HANDLE-BAR POSTS FOR BICYCLES.

SPECIFICATION forming part of Letters Patent No. 640,304, dated January 2, 1900.

Application filed September 19, 1898. Serial No. 691,374. (No model.)

To all whom it may concern:

Be it known that I, ENOCH LOUIS LOWE, a citizen of the United States, residing at San Francisco, in the county of San Francisco and State of California, have invented a new and useful Improvement in Clamping Devices for Seat-Posts and Handle-Bar Posts for Bicycles, of which the following is a specification.

My invention has reference to improvements in bicycles, but more particularly handle-bars and seat-posts; and it consists of certain novel features of construction, which will be hereinafter described in the specification, elucidated in the drawings, and fully set forth in the claim.

The object of the present invention is to so construct a bicycle-post either for handle-bars or seat-posts that can be quickly adjusted as regards its vertical requirements and at the same time be firmly and positively located and locked.

To meet the object aforesaid, I provide a vertical or longitudinal groove in said handle-bar and seat-post and construct a groove that will incline or form a flat angle of about two degrees with its vertical post or longitudinal side thereof. To keep said groove in alinement with its outer tube, I provide a spline or lug which may be integral with said tube. This lug also prevents any lateral movement of the posts aforesaid.

To hold or support the posts in any desired position, I employ set-screws, which pass through the outer tubes and enter the inclined grooves aforesaid. Said set-screws impinge against the inclined portion or back of said grooves, which not only retains said posts, but prevents said set-screws from turning, owing to the friction between the inclined back of said grooves against the ends of said set-screws.

Referring to the drawings, which form part of this specification, Figure 1 is a detail in perspective of a portion of a bicycle-frame. Fig. 2 is a detail of the saddle-post in vertical longitudinal section, indicating the various parts embodying my invention. Fig. 3 is a transverse view of the device, taken on line 33 of Fig. 2. Fig. 4 is a full-sized view of a portion of a bicycle-frame, which more fully elucidates my improved device. Fig. 5 repre-

sents the post in cross-section and removed from the tube or socket, full size.

The numeral 7 indicates the bicycle-frame, which is provided with handle-bar tube B and saddle-post tube B'. Located at the upper ends of said tubes B and B' are splines or lugs *f*, which are adapted to enter longitudinal grooves *e*, formed in the handle-bar post A and saddle-post A', respectively, for retaining said posts in alinement with the body of a bicycle-frame.

The letter C indicates set-screws, or they may be thumb-screws, for retaining said posts A and A' in an adjustable position.

The longitudinal groove *e*, previously referred to, is of peculiar construction. It inclines from the body of the post and increases gradually until it terminates at its free end. The object of such inclination is to firmly secure said posts in their adjustable position. It is obvious to those conversant with the art that this incline or wedge-shaped groove *e* will fit tightly against its confining set-screws C and not only retain said posts in a rigid position as regards any downward movement, but will also act through friction to retain and also prevent the set-screws aforesaid from turning.

By employing my improved device for securing bicycle-posts great saving of time and expense in building the machines is overcome. It entirely obviates the necessity of having split tubes and also split collars for securing handle-bar and saddle posts in bicycles.

Having described my invention, that which I desire to secure by Letters Patent is—

In combination with a handle-bar post, or seat-post for bicycles, a longitudinal tapering groove in said post, beginning at the bottom thereof and tapering upward, a set-screw in the frame-bar and entering said groove for holding the same in an adjustable position for the purpose as shown and described.

In testimony whereof I have fixed my signature in presence of two witnesses.

E. LOUIS LOWE.

Witnesses:

J. F. MAYER,
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