

No. 607,543.

Patented July 19, 1898.

R. M. KEATING.
ADJUSTABLE HANDLE BAR.

(Application filed June 1, 1896.)

(No Model.)

Fig. 1.

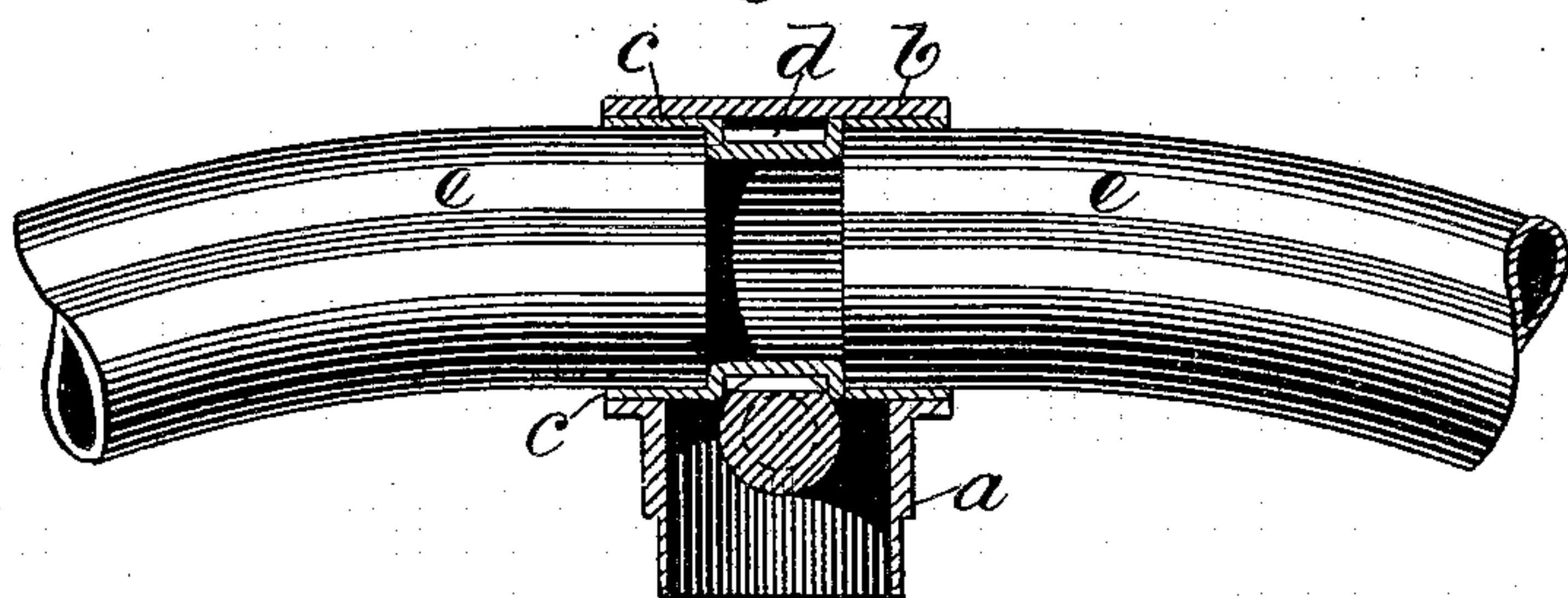


Fig. 2.

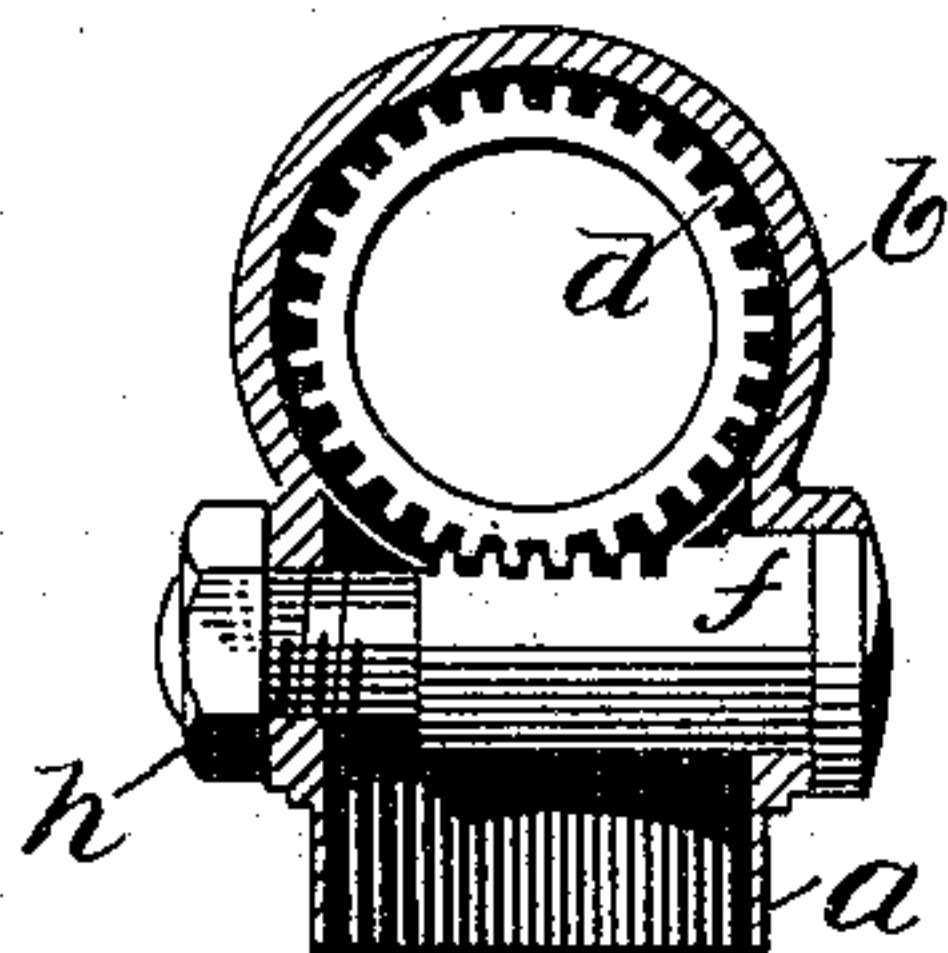


Fig. 3.

Fig. 4.

Fig. 5.

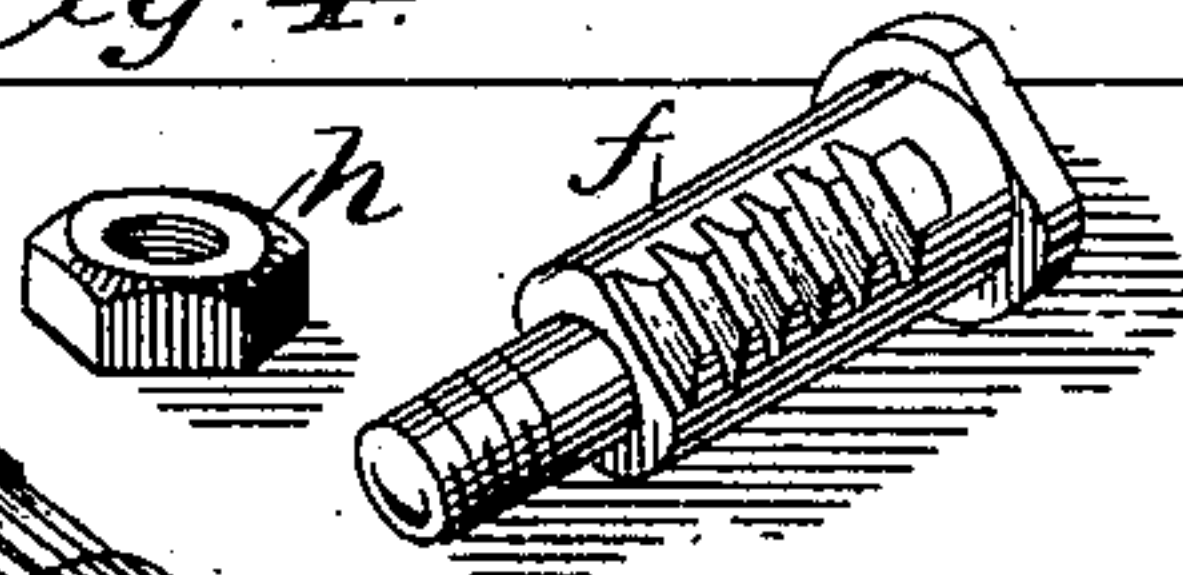
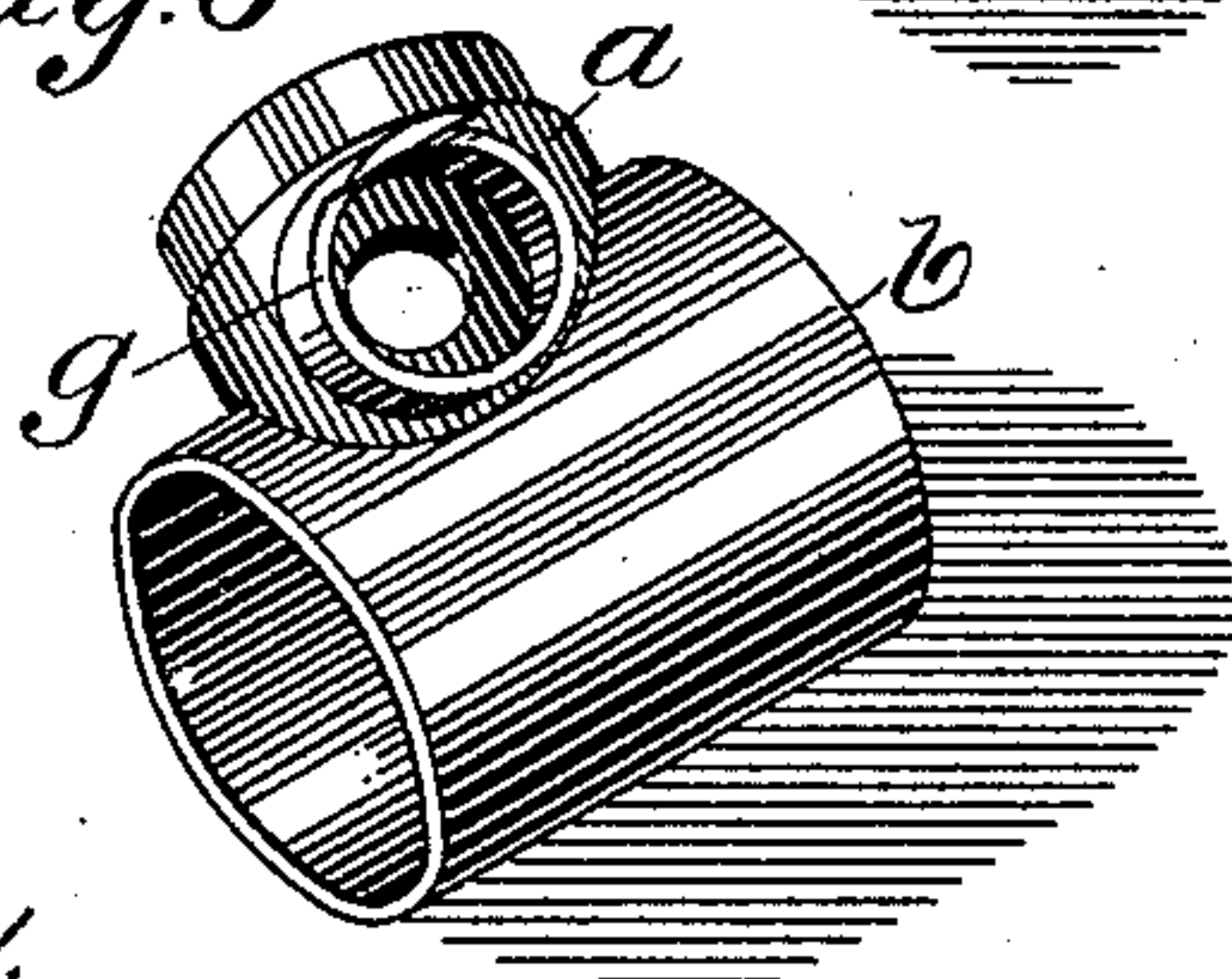


Fig. 6.



Witnesses
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ROBERT M. KEATING, OF SPRINGFIELD, MASSACHUSETTS.

ADJUSTABLE HANDLE-BAR.

SPECIFICATION forming part of Letters Patent No. 607,543, dated July 19, 1898.

Application filed June 1, 1896. Serial No. 593,732. (No model.)

To all whom it may concern:

Be it known that I, ROBERT M. KEATING, a citizen of the United States of America, residing in Springfield, in the county of Hampden and State of Massachusetts, have invented new and useful Improvements in Adjustable Handle-Bars for Bicycles and other Like Vehicles, of which the following is a specification, reference being had to the accompanying drawings and letters of reference marked thereon.

The object of my invention is to provide an improved construction of handle-bar connection by which the handle-bar may be rotated in the head to the desired extent and fixed in position.

My object is further to provide a simple and improved construction for that purpose.

I accomplish the objects of my invention by the construction herein shown.

In the accompanying drawings, in which like letters of reference indicate like parts, Figure 1 is an elevation showing a part of the handle-bar in full lines and the remaining parts in section. Fig. 2 is a transverse sectional view of the same. Fig. 3 is a perspective view of the locking-piece detached. Fig. 4 is a like view of the nut. Fig. 5 is a like view of the central portion of the handle-bar, and Fig. 6 is a like view of the head.

In detail, *a* indicates the stem; *b*, the head; *c*, the central part of the handle-bar; *d*, teeth; *e*, handle-bars proper; *f*, locking-piece; *g*, an annular projection, and *h* a nut.

The construction and operation of my device are as follows:

The steering-bar of the machine is provided at its upper end with a head *b*, it being secured to the steering-bar by the stem *e*, which stem is provided with a transverse bolt-receiving opening and with an annular projection *g* to form a bearing for the head of the bolt.

A shell or part *c* is provided the diameter of which is the same as the interior diameter of the head *b*. The handle-bars proper, *e*, have their ends secured to the central part *c*, and the central part *c* is provided with teeth *d*. A locking-piece *f* is provided with teeth

adapted to engage the teeth *d*, and the opening for the locking-piece is so located that when the locking-piece is in position its teeth will engage the teeth *d*. A nut *h* secures the locking-piece in position and at the same time firmly clamps the shell *b* against the part *c*, thus permanently holding the handle-bar in fixed position.

For the purpose of changing the position of the handle-bar the locking-piece is removed, and the handle-bar of course will be rotated during such removal, and then the handle-bar is turned in the direction in which it is desirable to adjust the same and the locking-piece reinserted, the handle-bar being rotated during such insertion to the same extent it was rotated while being removed, but in the opposite direction. The nut being then placed in position, the whole is locked and firmly held.

I make no claim herein to a construction of worm and worm-gear.

Having therefore described my invention, what I claim, and desire to secure by Letters Patent, is—

1. The combination of a steering-head, having an opening through it, a handle-bar arranged in said opening and provided with teeth, a transverse opening through said head adjacent to the teeth upon the handle-bar, and a locking-piece having teeth upon its side arranged in said opening, its teeth engaging the teeth on the handle-bar by a longitudinal movement of the locking-piece past the handle-bar and means to secure the locking-piece in position, substantially as and for the purposes stated.

2. The combination of a steering-head having an opening through it to receive a handle-bar, a handle-bar mounted therein and provided with teeth parallel with the axial line of the bar; a locking-piece *f*, having teeth upon its side adapted to engage the teeth in the bar and mounted in the head with the teeth of the locking-piece arranged to engage the teeth on the handle-bar by a longitudinal movement of the locking-piece and means to secure the locking-piece in position, substantially as and for the purposes stated.

3. The combination of a head *b* having a stem *a* and a transverse opening through it for a locking-piece, with a handle-bar having a central portion *c* provided with teeth as *d*,
5 a locking-piece *f* arranged in said opening and having teeth to engage the teeth on the handle-bar by a longitudinal movement and a nut on the end of the locking-piece, substantially as and for the purposes stated.

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