(No Model.)

J. O. RATHBUN.

VELOCIPEDE.

No. 449,383. Patented Mar. 31, 1891.

Fig. 1.

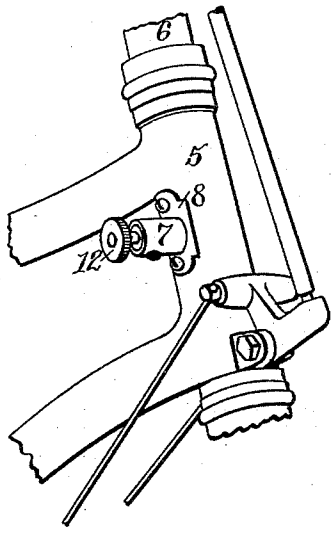


Fig. 2.

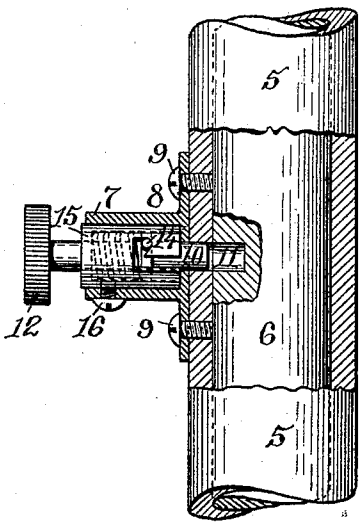
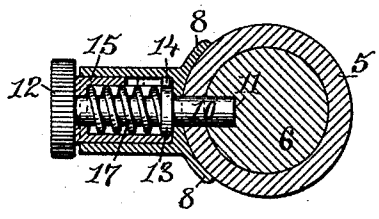


Fig. 3.



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JOHN O. RATHBUN, OF PROVIDENCE, RHODE ISLAND.

VELOCIPEDE.

SPECIFICATION forming part of Letters Patent No. 449,383, dated March 31, 1891.

Application filed July 1, 1890. Serial No. 357,348. (No model.)

To all whom it may concern:

Be it known that I, JOHN O. RATHBUN, of Providence, in the county of Providence and State of Rhode Island, have invented a new and useful Improvement in Velocipedes; and I hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawings, forming part of this specification.

This invention has reference to an improvement in the class of velocipedes in which one of the wheels is used for steering; and it consists in the peculiar and novel construction of a locking device by which the spindle of the steering-wheel can be quickly locked or unlocked, as will be more fully set forth hereinafter.

The object of this invention is to provide convenient means by which the spindle of the steering-wheel of a bicycle or other form of velocipede can be locked against rotation when required. When a bicycle or other velocipede is set up against any object, the steering-wheel is liable to slightly turn and allow the cycle to run away. In coasting it is also at times desirable to lock the steering-wheel.

Figure 1 is a perspective view of the wrist in which the spindle of a bicycle turns, provided with my improved locking device. Fig. 2 is a side view, partly in section, of the wrist-tube, the spindle, and the locking device. Fig. 3 is a cross-section of the same.

In the drawings, the number 5 indicates the wrist-tube of a bicycle; 6, the spindle of the steering-wheel, usually provided with the fork in which the wheel-axle is journaled at the lower end and with the steering-handles at the upper end.

7 indicates a short tube extending from the plate or flange 8, concaved to fit the surface of the wrist-tube 5 and secured thereto by the screw 9. The plate or flange 8 is perforated to allow the locking-pin 10 to pass through the wall of the wrist-tube 5, which is also perforated for the same purpose, and a hole 11 is formed in the spindle 6, into which the end of the locking-pin enters when the spindle is required to be locked to the tube. The outer end of the locking-pin 10 is provided with the thumb-piece 12, the edge of which is milled, so as to secure a firm hold on the same. The locking-pin is provided with the ring 13, having the projecting pin 14. Two pins 14 on opposite sides of the ring may be used. The cylindrical cup 15 is secured in the tube 7 by the screw 16, with the open end toward the wrist-tube 5. The lower or open end of the cup 15 is slotted, and a lateral recess is formed to receive the pin 14, as is shown in Fig. 2. The spiral spring 17 surrounds the locking-pin 10, the ends bearing, respectively, on the inner closed end of the cup 15 and the ring 13.

The device as shown in Fig 2 is in the unlocked position, and the spindle is free to turn in the wrist-tube 5. By slightly turning the locking-pin 10 by the thumb-piece 12 the pin 14 enters the slot in the cup 15. The spiral spring now holds the end of the locking-pin against the spindle 6, and as soon as the hole 11, by the turning of the spindle, comes opposite the locking-pin 10 the same will enter the spindle and lock the same to the wrist-tube 5, holding the steering-spindle and wheel in the fixed position, as is shown in Fig. 3. By withdrawing the locking-pin and partly turning the same the locking-pin resumes the position shown in Fig. 2.

Having thus described my invention, I claim as new and desire to secure by Letters Patent—

The combination, with the tube 5 and the spindle 6, provided with the hole 11, of the flange 8, the tube 7, open at its outer end, the cup 15, the locking-pin 10, provided with the thumb-piece 12, and the ring 13, provided with the pin 14, the cup 15 being provided with a slot and recess for the pin 14 and secured in the tube 7 by the screw 16, as described.

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Witnesses:

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