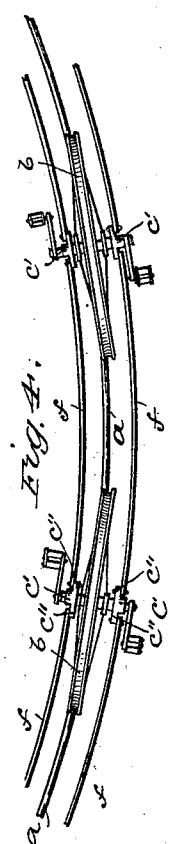
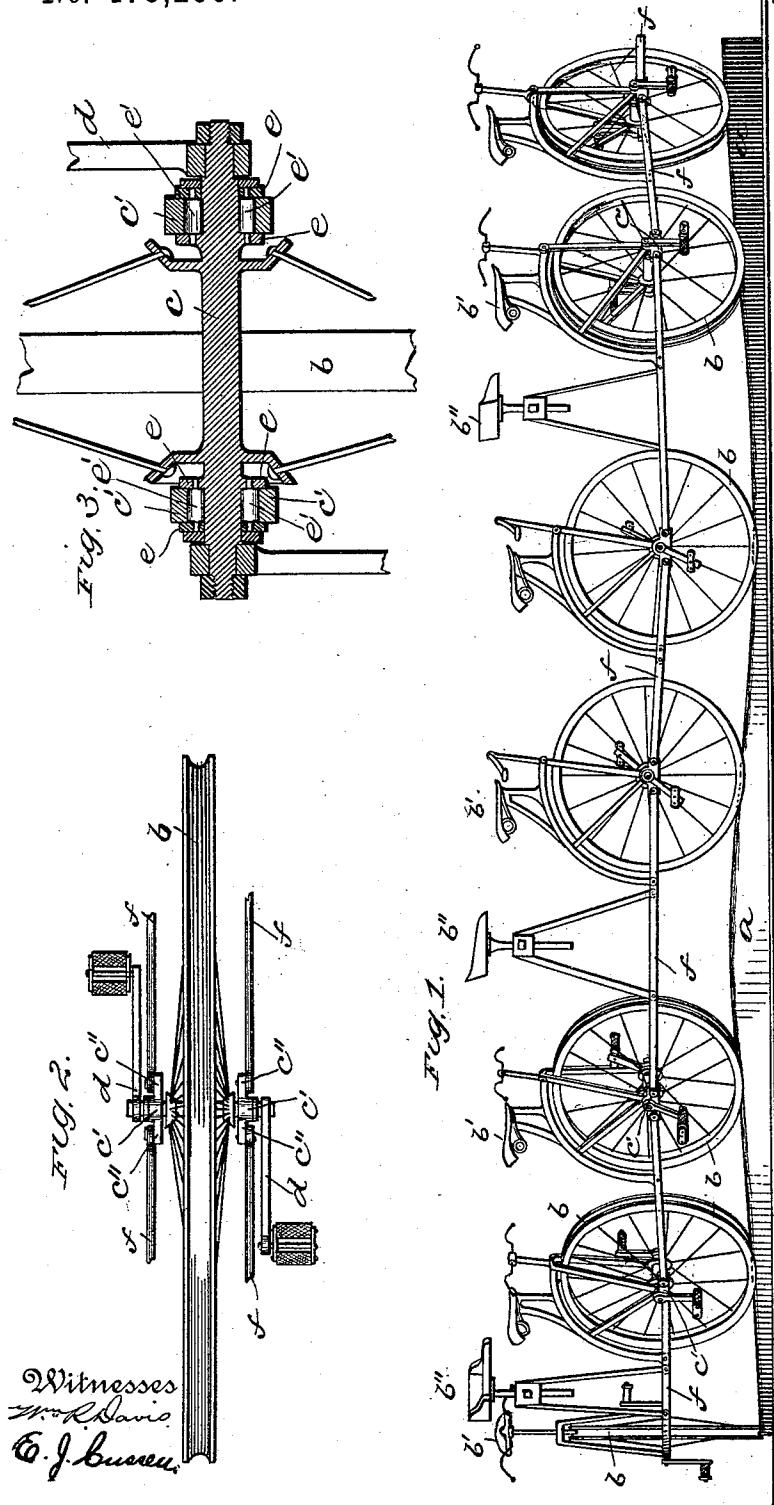


(No Model.)

F. STUTZMAN.
ROUNDABOUT.

No. 475,256.

Patented May 17, 1892.



Witnesses
W. R. Davis
E. J. Bunn.

Inventor:
F. Stutzman,
By
Alexander Davis
his Attorneys

UNITED STATES PATENT OFFICE.

FRANK STUTZMAN, OF WILLIAMSPORT, PENNSYLVANIA, ASSIGNOR OF ONE-HALF TO BINGHAM H. CORYELL AND JOHN G. CORYELL, OF SAME PLACE.

ROUNABOUT.

SPECIFICATION forming part of Letters Patent No. 475,256, dated May 17, 1892.

Application filed November 24, 1891. Serial No. 412,919. (No model.)

To all whom it may concern:

Be it known that I, FRANK STUTZMAN, a citizen of the United States, residing at Williamsport, in the county of Lycoming and State of Pennsylvania, have invented certain new and useful Improvements in Roundabouts, of which the following is a specification, reference being had therein to the accompanying drawings, in which—

10 Figure 1 represents a side elevation of one side of my improved machine; Fig. 2, a plan view of one of the wheels and portions of the circular flexible frame; Fig. 3, a transverse sectional view of the hub of one of the wheels, 15 and Fig. 4 a detail plan view of a portion of the machine.

This invention has special relation to that class of roundabouts in which are mounted on a circular track a series of wheels provided with saddles, operating-cranks, and 20 pedals, the axles of the wheels being journaled in a revolving circular frame, whereby the circular frame and wheels may be revolved by persons sitting in the saddles and operating 25 the pedals; and it consists of certain novel features of construction, which will be fully hereinafter described, and particularly pointed out in the claim appended.

Referring to the drawings, *a* designates a 30 substantially circular track or rail securely anchored to the ground and having its upper edge or bearing-surface formed into a series of gradual undulations or waves. The upper edge of the track is preferably rounded to fit 35 the grooved rims of the wheels *b* which travel upon it. The ends of the axles *c* of these wheels are journaled in boxes *c' c'*, provided with oppositely-projecting ears *c''*, and between the boxes and the respective ends of the 40 axles the driving cranks-arms *d* are clamped, these arms being provided with pedals of the usual construction. The boxes *c'* are each 45 embraced by disks *e e* on the axles, the inner one being formed integral with the axle and the outer one being removable, as shown. Anti-friction rollers *e'* have their reduced ends journaled in these disks and their intermediate portions bearing upon the axle and the interior of the boxes, whereby the fric-

tion of the wheels will be materially reduced 50 and the operation of the machine rendered smoother. The oppositely-projecting ears of both the inner and outer boxes are connected by curved bars *f*, the rearwardly-projecting ears of the front wheels being connected to 55 the forwardly-projecting ears of the wheels next in the rear, and so on entirely around the machine, thereby forming a substantial circular frame constructed of sections whose adjacent ends are connected by the journal-boxes of the wheels. The rear ends of the bars composing the sections are pivotally connected to the respective ears of the adjacent boxes, so that the circular frame will be rendered flexible and be permitted to conform to 60 the contour of the track as it revolves. The rider's saddles *b'* are suitably supported over each wheel, and handle-bars are arranged within convenient reach of the riders. At 65 suitable intervals (preferably between every other wheel) extra seats *b''* are mounted upon the frame for the use of persons not desiring to participate in the work of revolving the frame. The object in forming the track or 70 rail gradually undulating is to impart to the riders a gradual rising and falling motion during the revolution of the frame, which will 75 be highly amusing and pleasing to the riders, as it quite closely simulates the motion of bicycle riding on natural road-beds. The circular flexible frame permits the wheels to rise and fall independently of each other to conform to the curves of the track. 8c

Instead of being circular in shape, as described, it is evident that the track may be 85 elliptical or oval shaped, if desired.

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

In a roundabout, the combination of a continuous track having its bearing-surface formed into a series of gradual elevations and depressions, a series of grooved wheels running on this track and each having a projecting axle, operating-cranks secured on the extreme ends of the axle and provided with 90 pedals, journal-boxes *c'*, embracing the axles between the cranks and the wheels and each 95

being provided with a forwardly and a rearwardly projecting ear c'' , pairs of disks e on the axle and embracing the boxes c' and holding them in place, anti-friction rollers inclosed in the boxes and journaled between each pair of disks, a flexible frame composed of curved bars f , arranged on each side of the wheels and connecting the ears c'' of the boxes, and

riding-seats supported over the wheels, substantially as described.

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

FRANK STUTZMAN.

Witnesses:

JAMES MAUSE,
JOHN M. OTTO.