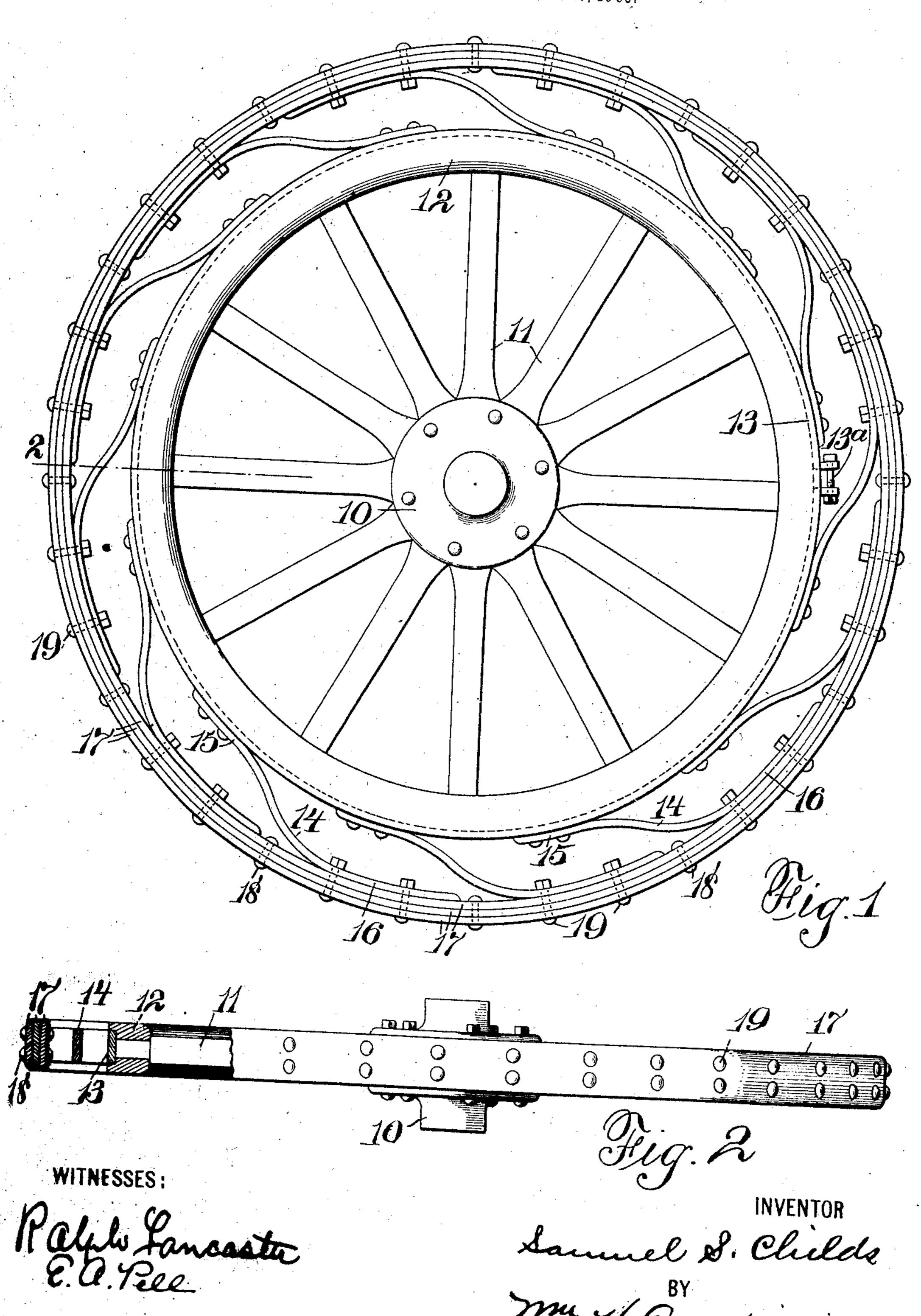
## S. S. CHILDS. VEHICLE WHEEL. APPLICATION FILED JUNE 27, 1906.



## UNITED STATES PATENT OFFICE.

SAMUEL S. CHILDS, OF BERNARDSVILLE, NEW JERSEY.

## VEHICLE-WHEEL.

No. 840,824.

Specification of Letters Patent.

Patented Jan. 8, 1907.

Application filed June 27, 1906. Serial No. 323,578.

To all whom it may concern:

Be it known that I, Samuel S. Childs, a citizen of the United States, residing at Bernardsville, in the county of Somerset and State of New Jersey, have invented certain new and useful Improvements in Vehicle-Wheels; and I do hereby declare the following to be 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, and to figures of reference marked thereon, which form a part of this specification.

This invention relates to a vehicle-wheel that is expected to have resiliency by means of a medium between the rim and the felly.

A novel feature is the engagement of a series of springs between the felly and the rim, these springs having their ends arranged tangentially to the felly and the rim and the rim itself being composed of a series of bands some of which are steel and others may be made of leather or similar material. This rim is made so that it can be removed from the springs, the bands of which it is composed being fastened together.

The invention is illustrated in the accom-

panying drawings, in which—

Figure 1 is a side view of the wheel; and Fig. 2 is a top view, with one edge in section,

on the line 2 in Fig. 1.

The wheel is composed of the hub 10, which can be of any construction, and the ordinary spokes 11 and a felly 12. This part of the structure is old, and these can be made of wood or any material adapted for the purpose.

Seated in a groove on the periphery of the 4c felly 12 is a detachable band 13, that has its ends secured by means of the bolts 13a, or it can be fastened in any other suitable manner. Projecting from this band and securely fastened thereto by means of rivets are the 45 springs 14, one end of these springs, as 15, being secured to the band and the other end 16 being adapted to be engaged by the rim of the wheel. These ends 15 and 16 are concentric to the felly and the rim. The rim is 50 made up of a series of bands concentrically arranged, and the preferred form of structure embodies the center band of steel and the outer bands of leather, although in place of leather I might use fiber or any other ma-5 terial suitable for the purpose. The rim l

might also be varied by making the outer bands of steel and the inner one of resilient material. This makes a rim that has strength on account of the steel bands, and the pliable material gives it the necessary elasticity. 60 These bands are held together to make the rim by the rivets 18, and the band itself is secured to the ends 16 of the springs 14 by means of the bolts 19. The rim is thus detachably arranged and when taken from the 65 springs will still be held together by the rivets 18.

Having thus described my invention, what I claim is—

1. A wheel comprising a body portion hav- 70 ing a felly, a band on the periphery of the felly having means for tightening it to clamp the felly, a rim portion, and sinuous springs having one end of each spring secured to the band, and the other end secured to the in- 75 side of the rim.

2. A wheel comprising a body portion having a felly, the felly having a peripheral groove, a band in the groove and having a tension device between its ends for tighten- 80 ing it on the felly, a rim portion, and a series of springs secured to the band, the rim being

detachably secured to the springs.

3. A wheel comprising a body portion having a felly, a detachable band secured to the 85 felly, means for tightening the band, a rim composed of concentric rings secured together, a series of springs secured to the band, and means for detachably securing the assembled rings forming the rim to the ends of 90 the springs.

4. A wheel comprising a body portion having a felly, a detachable band on the periphery of the felly, a series of springs having their inner ends secured to the band, and 95 their outer ends arranged concentric to the felly, a rim comprising a series of bands, the alternate bands being of metal, means for securing the bands composing the rim together, and means for detachably attaching the rim too to the outer ends of the springs irrespective of the means for securing the bands of the rim together.

In testimony that I claim the foregoing I have hereunto set my hand this 23d day of 105

June, 1906. SAMUEL S. CHILDS.

Witnesses:
Gus A. Meyer,
E. A. Pell.