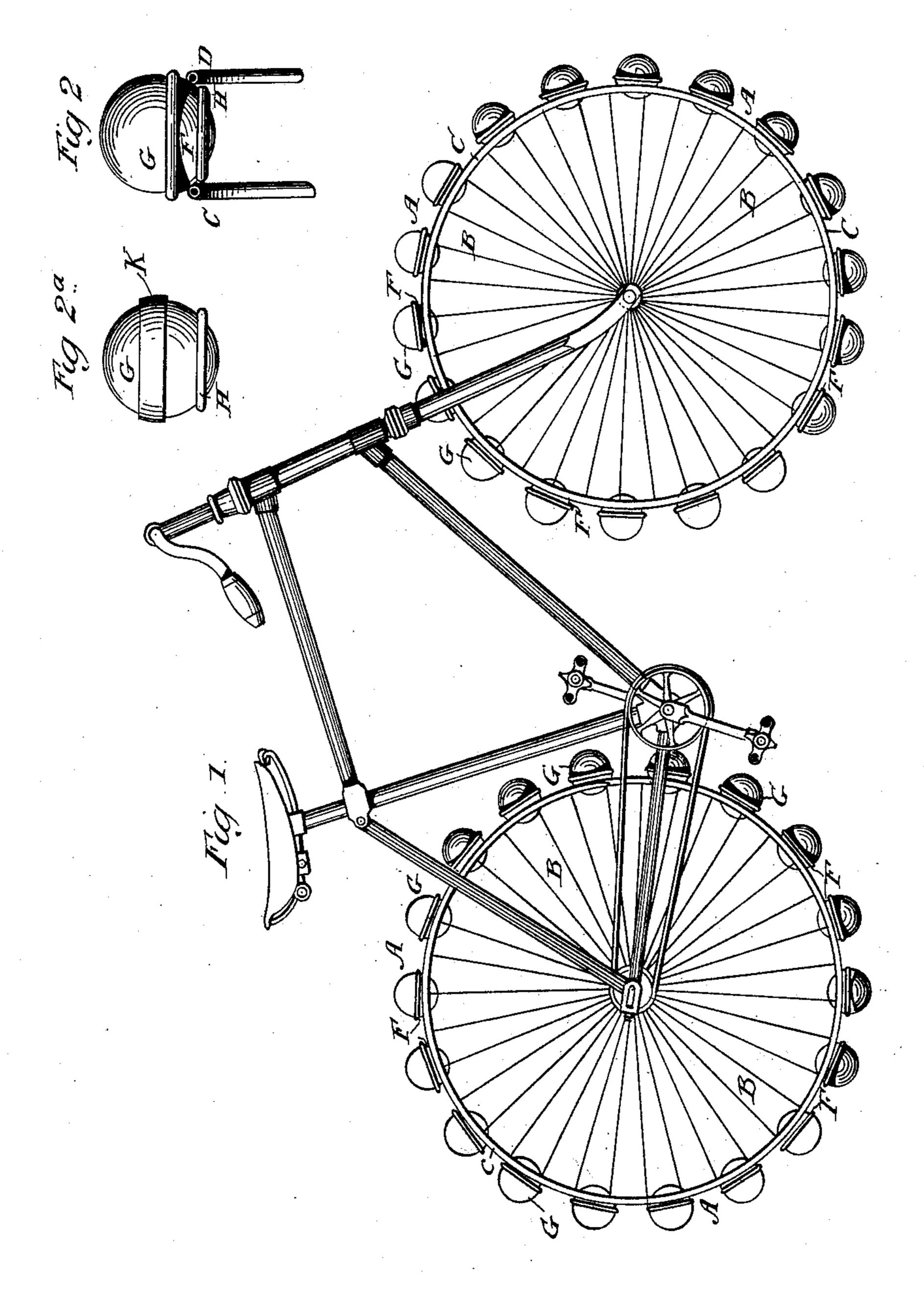
(No Model.)

W. H. SEWELL.
PNEUMATIC TIRE.

No. 603,710.

Patented May 10, 1898.



Stest. Or. Ellwood Allen. Das W. White Inventor. William Heibert Sewell. By Knight Bry attys.

United States Patent Office.

WILLIAM HERBERT SEWELL, OF COLERAINE, IRELAND, ASSIGNOR OF ONE-HALF TO JAMES AIKEN, OF COWDENBEATH, SCOTLAND.

PNEUMATIC TIRE.

SPECIFICATION forming part of Letters Patent No. 603,710, dated May 10, 1898.

Application filed July 13,1896. Serial No. 599,001. (No model.) Patented in England June 23,1894, No. 12,257; in Belgium May 1, 1895, No. 115,381; in France May 1, 1895, No. 247,053; in Austria May 30, 1895, No. 45/1,915, and in Canada May 7, 1897, No. 55,849.

To all whom it may concern:

Be it known that I, WILLIAM HERBERT SEWELL, general produce merchant, a subject of the Queen of Great Britain and Ireland, 5 and a resident of Diamond, Coleraine, Ireland, have invented certain new and useful Improvements in Wheel-Tires, (for which I have obtained patents in Great Britain, No. 12,257, dated June 23, 1894; in Belgium, No. 10 115,381, dated May 1, 1895; in France, No. 247,053, dated May 1, 1895; in Austria, No. 45/1,915, dated May 30, 1895, and in Canada, No. 55,849, dated May 7, 1897,) of which the following is a specification.

My invention has for its object the provision of an improved construction of sec-

tional tire for wheels of vehicles.

My improvement consists in features of novel construction hereinafter described and claimed.

In order that my invention may be fully understood, I will proceed to describe it, with reference to the accompanying drawings, in which—

Figure 1 is a side view of a bicycle having wheels provided with my improved sectional tire. Fig. 2 is a detail view showing a radial section of the tire and an elevation of one of the balls or spheres. Fig. 2^a shows a modi-

30 fied form of ball or sphere.

In applying my improved tire to the wheel of a bicycle the wheels A are constructed of a series of spokes B, connected at their outer ends to the two rings C D, having a space E between them and providing a rim. In this space E and riveted or otherwise fixed to the rings there are a series of bottomless cups or pockets F, placed at a suitable distance apart from each other. Into each of these cups or pockets F there is placed a ball or sphere G, which is provided with an encircling lower flange H, engaging the lower edge of the cup

or pocket F. This flange H when the ball or sphere G is pressed home into the cup or pocket F retains it in proper position. These 45 balls or spheres may be provided with an encircling upper flange K, as shown in Fig. 2^a, which in the case of the balls or spheres being deflated would prevent them from being forced through the openings in the bottom of the cups or pockets.

Having thus described my invention, the following is what I claim as new therein and

desire to secure by Letters Patent:

1. A wheel-tire comprising two rings hav-55 ing a space between them and providing a rim, the series of bottomless cups or pockets located in the said space between the said rings at a suitable distance apart; and the balls or spheres having encircling retaining 60 lower flanges, and seated in the cups or pockets and projecting therethrough with their flanges engaging the lower edges of the cups or pockets; substantially as described.

2. A wheel-tire comprising two rings having a space between them and providing a rim, the series of bottomless cups or pockets located in the said space between the said rings at a suitable distance apart; the balls or spheres having encircling retaining lower 70 flanges, and seated in the cups or pockets and projecting therethrough with their flanges engaging the lower edges of the cups or pockets, and the encircling retaining upper flanges seated on the upper edges of the cups or pockets; substantially as described.

In testimony whereof I have signed my name to this specification in the presence of

two witnesses.

WILLIAM HERBERT SEWELL.

Witnesses:

JOHN LIDDLE,
JOSEPH HENRY PEARSON.