

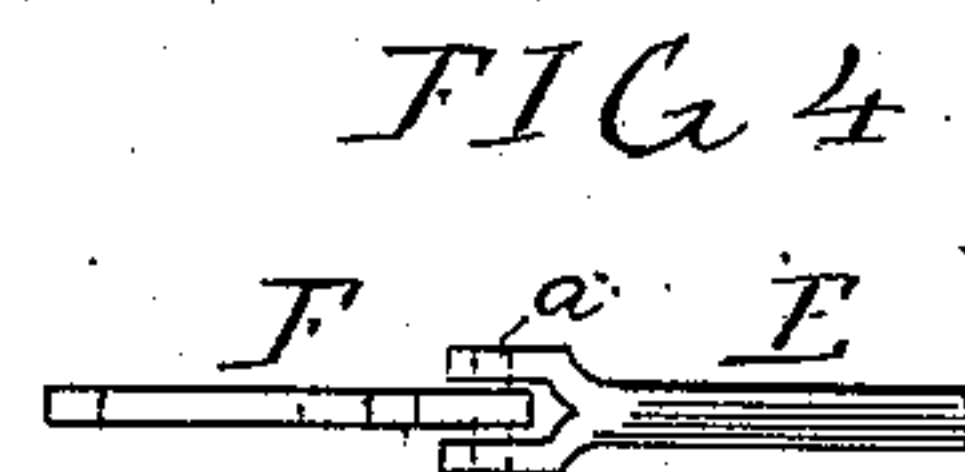
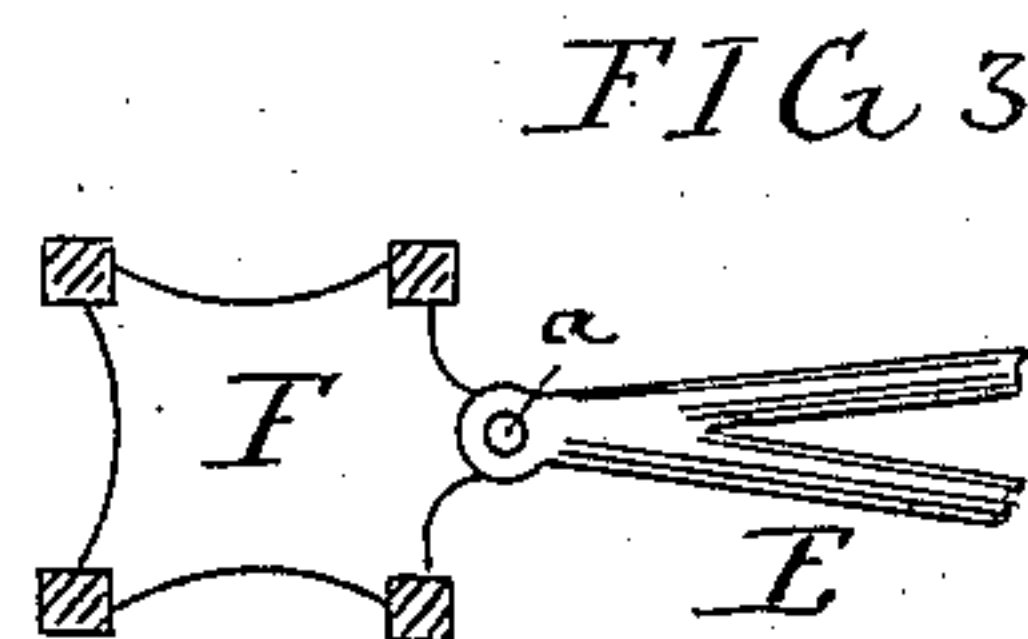
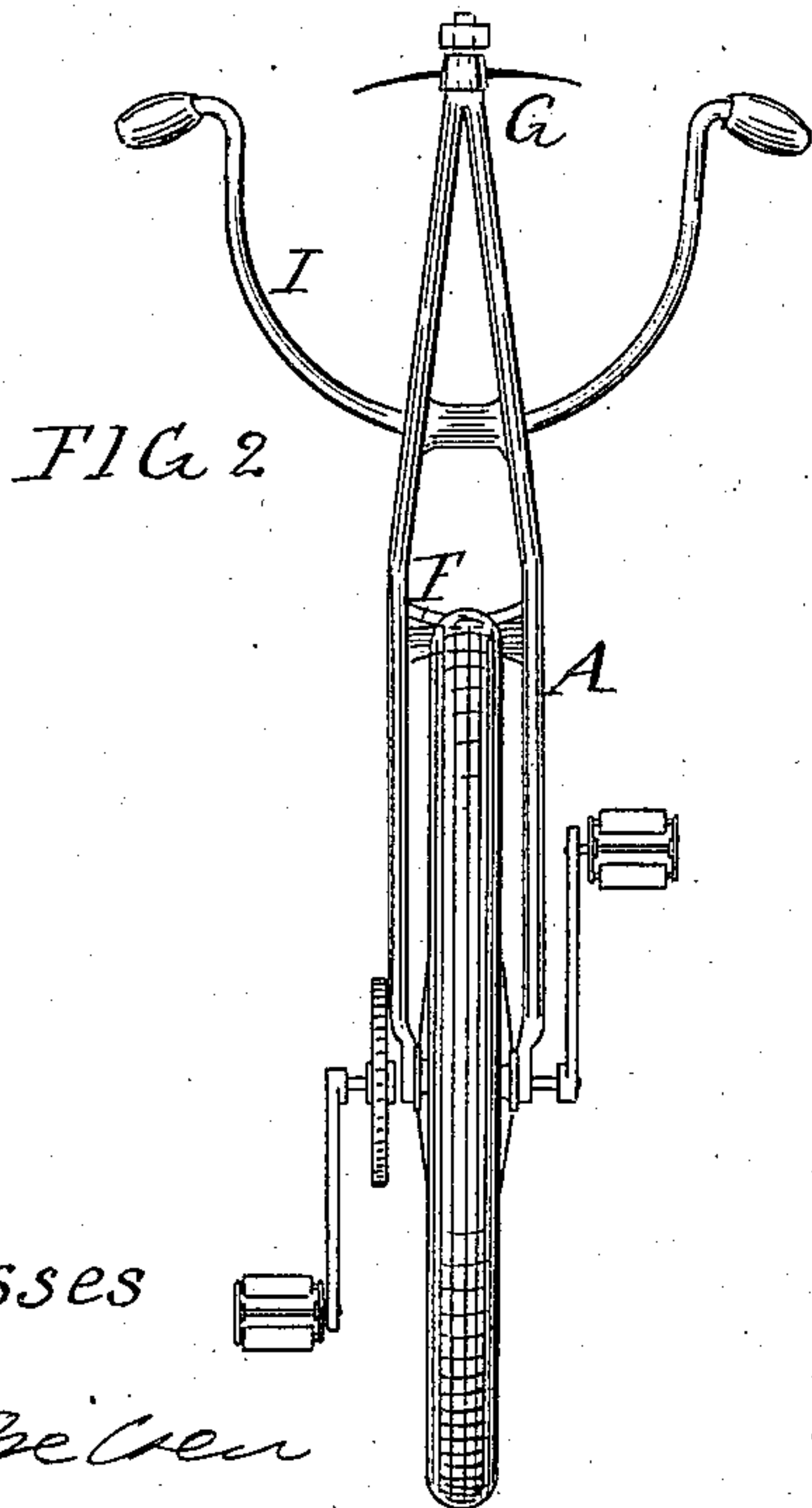
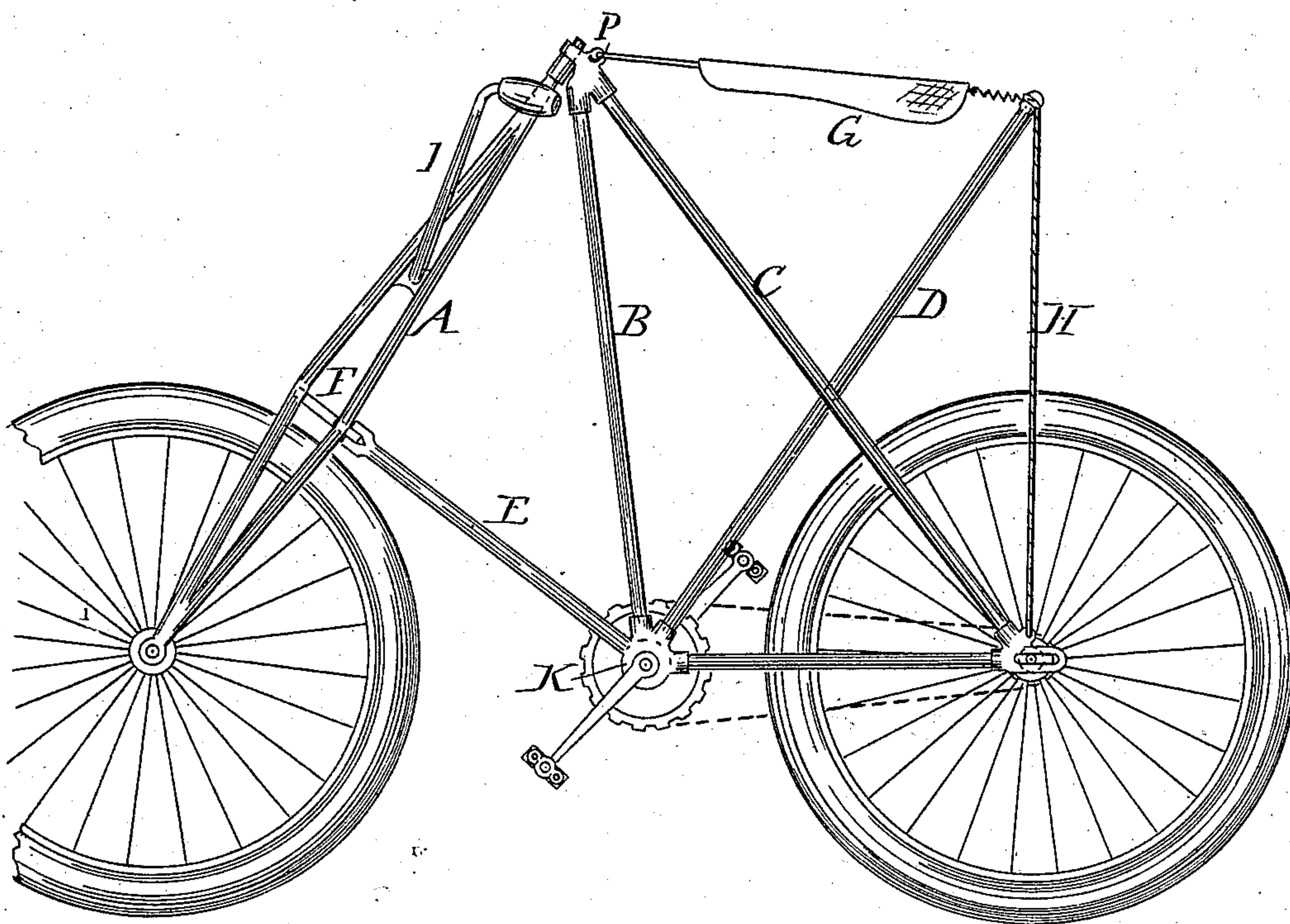
(No Model.)

M. PEDERSEN.
CYCLE FRAME.

No. 577,170.

Patented Feb. 16, 1897.

FIG 1



Witnesses
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Kristian Nielsen

Inventor
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UNITED STATES PATENT OFFICE.

MIKAEL PEDERSEN, OF DURSLEY, ENGLAND.

CYCLE-FRAME.

SPECIFICATION forming part of Letters Patent No. 577,170, dated February 16, 1897.

Application filed June 1, 1894. Serial No. 513,219. (No model.) Patented in England September 30, 1893, No. 18,371; in Belgium February 28, 1894, No. 108,542; in France May 4, 1894, No. 236,267; in Sweden December 20, 1894, No. 5,708, and in Germany January 21, 1895, No. 79,288.

To all whom it may concern:

Be it known that I, MIKAEL PEDERSEN, a subject of the King of Denmark, residing at Dursley, in the county of Gloucester, in the Kingdom of England, have invented certain new and useful Improvements in Cycle-Frames; 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.

The invention has been patented in Sweden, No. 5,708, dated December 20, 1894; in Germany, No. 79,288, dated January 21, 1895; in France, No. 236,267, dated May 4, 1894; in Belgium, No. 108,542, dated February 28, 1894, and in Great Britain, No. 18,371, dated September 30, 1893.

My invention refers to an improved construction of a cycle-frame, whereby these become considerably lighter and at the same time stronger than has hitherto been the case.

The improvement is obtained in bringing the weight of the rider to act as an even pull or push in longitudinal direction on the different parts of the frame.

Figure 1 on the accompanying drawings is a side view of a cycle fitted with a frame as above. Fig. 2 is a front view of the same, while Figs. 3 and 4 show details.

The front fork A is formed of two parts, which are joined at the top, and between which the front wheel runs. Each one of these parts can be constructed in rhomb fashion, as shown on the drawings, so that the front fork really is made of four rods joined together. These rods are close above the wheel connected with a plate F, or in any other suitable manner pivoted to the fork-shaped stay E, which proceeds from the crank-bracket K. At the top the front fork A turns in a bearing in the top connection P, which connects the forks or stays B, which proceed from the crank-bracket K, and with the hind-wheel fork C, which proceeds from the ends of the hind-wheel fork. From the crank-bearing proceeds further a saddle-pillar D. This, like the stay B, is fork-shaped or triangular, that is, constructed of two rods jointed at the top. The saddle G is sus-

pended between the top connection P and the stay D, and the suspension is made elastic by means of springs or in any other suitable way. In order to support the saddle suspension, two cords or light stays H proceed from the stay D to the hind-wheel fork.

The handle-bar I is fixed beneath the top-most revolving point of the front fork, as will appear from the drawings. The front fork A must not necessarily be made of four rods, but each branch of the fork can consist of a single rod. In this case the plate F becomes a cross-piece, with a support for the pivot-bolt *a*. Instead of the forks E B D single rods can also be used, but this will hardly be advisable.

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

1. In cycle-frames the combination of a fork C whose lower ends are fixed to the rear ends of the rear-wheel fork and a fork or stay D, whose lower end is fixed to the crank-bracket K, crossing each other, the saddle G, being suspended from the top end of the fork C to the top end of the fork or stay D, and the fork or stay B, connecting the top end of the fork C to the lower end of the fork or stay D, the front steering-post with the frame-bar extending therefrom to the crank-bracket, the said rear-wheel fork extending from the crank-bracket to the rear wheel and the fork or cords H, connecting the top end of the fork or stay D to the lower ends of the fork C; all as shown and described.

2. The combination of the front fork, the rod E extending therefrom to the crank-axle bracket, the rear fork extending from the crank-bracket to the rear wheel, the upwardly-extending divergent forks or stays B and D from the crank-axle bracket, the fork C extending between the rear wheel and the top of the front post and the seat suspended between the tops of the forks C and D.

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

MIKAEL PEDERSEN.

Witnesses:

LAURITZ NIELSEN,
KRISTIAN NIELSEN.