(No Model.) 2 Sheets—Sheet 1.

H. A. PERRY.

SADDLE.

No. 595,111. Patented Dec. 7, 1897.

Fig. 1.

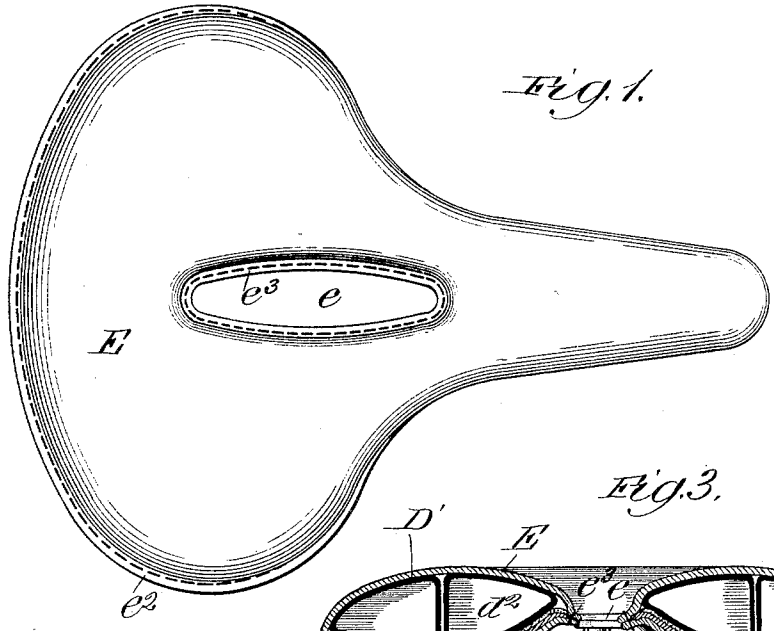


Fig. 3.

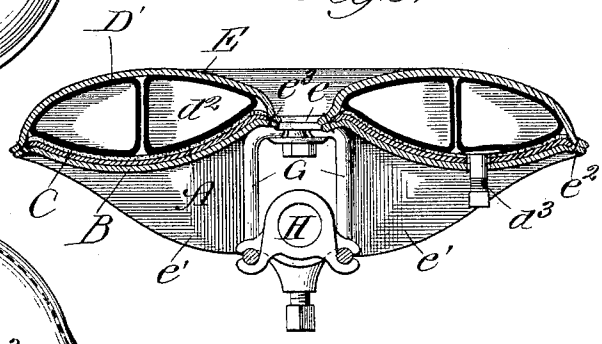
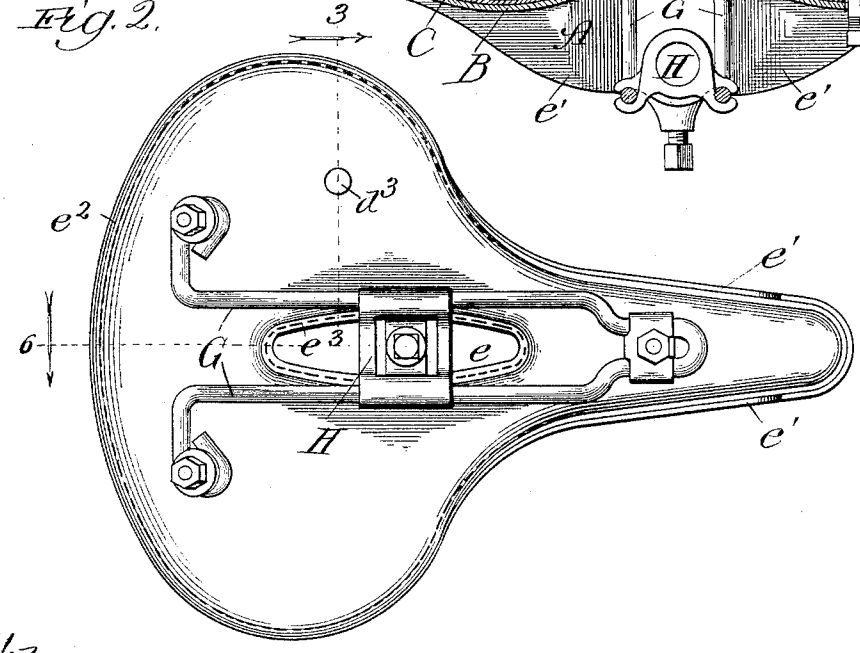


Fig. 2.



Witnesses:
Chas. C. Gaylord,
Little & Walter

Inventor:
Harry A. Perry,
By Banning & Banning & Sheridan,
Attys

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

(No Model.) 2 Sheets—Sheet 2.

H. A. PERRY.

SADDLE.

No. 595,111. Patented Dec. 7, 1897.

Fig. 4.

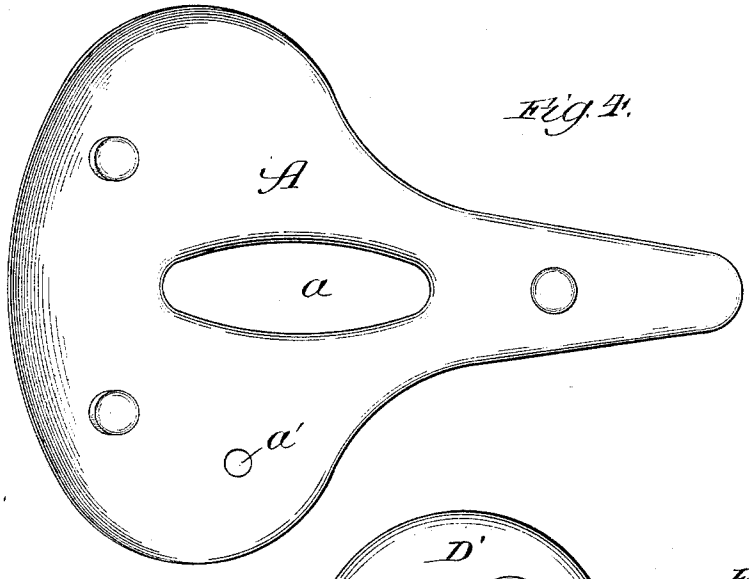


Fig. 5.

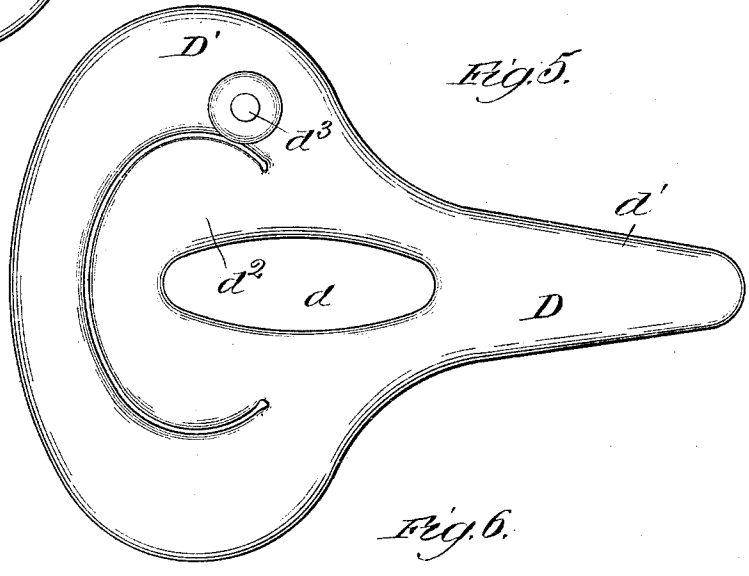
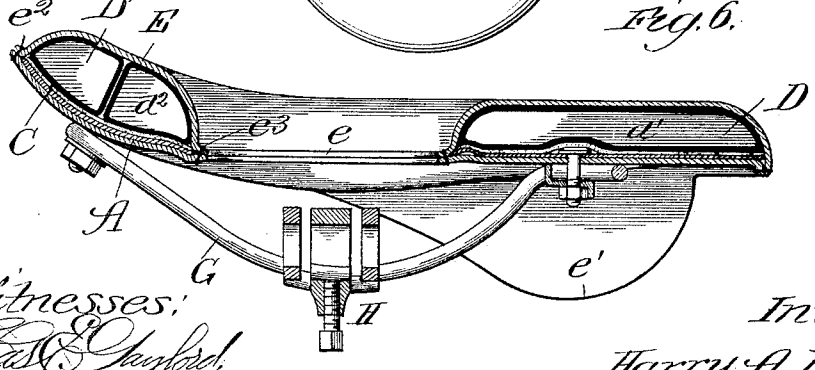


Fig. 6.



Witnesses:
Chas. E. Gaylord.
Lutes J. Potter.

Inventor:
Harry A. Perry.
By Banning & Banning & Sheridan.
Attys.

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

HARRY A. PERRY, OF CHICAGO, ILLINOIS.

SADDLE.

SPECIFICATION forming part of Letters Patent No. 595,111, dated December 7, 1897.

Application filed February 1, 1897. Serial No. 621,487. (No model.)

To all whom it may concern:

Be it known that I, HARRY A. PERRY, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Saddles, of which the following is a specification.

My invention relates particularly to saddles known as "velocipede-saddles" and has especial relation to the specific class known as "pneumatic" saddles.

The object of my invention is to provide a simple, economical, and efficient pneumatic saddle; and the invention consists in the features, combinations, and details of construction hereinafter described and claimed.

In the accompanying drawings, Figure 1 is a plan view of a pneumatic saddle, looking at it from the top, and constructed in accordance with my improvements; Fig. 2, a similar view looking at it from the bottom; Fig. 3, a transverse sectional view taken on line 3 of Fig. 2 and looking in the direction of the arrow; Fig. 4, a plan view of the supporting-plate, looking at it from the top; Fig. 5, a plan view of the inner inflating-bag, and Fig. 6 a longitudinal sectional view taken on line 6 of Fig. 2.

In the art to which this invention relates it is well known that in the use of saddles it is desirable, as far as possible, to have a saddle that can be used under any and all conditions and which may have mechanism or means by which different degrees of cushioning action may be obtained to suit different circumstances and riders and at the same time which may be ridden when inflated or deflated. It is further desirable to have a saddle that will possess undoubted hygienic qualities. In the ordinary pneumatic saddles now in use all of these advantages cannot be obtained in that when the saddle is deflated it cannot be ridden, and if deflation takes place suddenly during the use of the saddle it is liable to seriously injure the rider.

The principal object of my invention, therefore, is to provide a saddle which obviates the above objection and embodies the advantages above outlined.

In constructing a saddle in accordance with my improvements I make a base-plate or tree A of the desired form, preferably of that form shown in Fig. 4 of the drawings, bent upwardly at the rear end and having a central elongated opening a. The under side of this tree is preferably provided with a casing B, formed of leather or other similar material, and the upper side with a fibrous or felt strip or web C, either or both of which may or may not be secured to the metal plate, as desired. Upon the felt strip rests an inflatable bag D, having a substantially central elongated aperture d and portion d' for inflating the pommel and a substantially oval rear portion D', which is preferably transversely divided into two substantially oval portions D' and d^2 for the purposes hereinafter described.

Covering and inclosing the cushion portion is a cover E, of leather or similar material, having an elongated opening e and which is preferably provided with skirt portions e', arranged at the pommel portion of the saddle. This upper cover portion, which forms a portion of the inclosing leather case, is secured to the under portion of the cover by sewing or otherwise at the edges, as shown by e^2, and also at the central portion, as shown by the stitches e^3, so that the upper cover when sewed to the lower cover or casing acts to hold all the portions in position. The base-plate, felt web, and lower casing are all perforated, as shown at a' in Fig. 4, to allow a valve d^3 on the inflatable bag to be passed through for the purpose of inflating the saddle.

The providing of the central elongated aperture enables ventilation to take place, and the providing of an inflating-bag having a central aperture with an inflatable pommel portion and divided rear portion, all formed in one piece secured and held by means of the leather cover, prevents undue inflation at any one particular portion in that the cushion or bag acts to prevent the abnormal raising of any one portion of the bag during riding or otherwise. The peculiar formation of the bag is such that the fabric, preferably rubber or similar material, of which the inflatable bag is formed prevents undue distention, the objection found in most of the pneumatic saddles.

The saddle is provided with the usual springs G and clips H shown in the drawings, and which need no further description.

I desire to call special attention to the fact that the bag is divided by a slit extending transversely partially across it for dividing the rear portion into two parts. This slit thus dividing the bag enables it when inflated to conform to the curved shape of the base-plate or saddletree, so that the rear portion of the seat as finished will be turned up at the rear, following the line of curvature of the base-plate. This prevents the inflatable bag when full of air from swelling or bellying upward without reference to the lines of contour of the saddletree, but by providing the bag with a transverse slit excessive distention in an upward direction is prevented and the curved contour of the saddletree secured in the finished seat.

The principal advantages due to the use of a saddle constructed in accordance with my improvements are, first, the saddle has great hygienic properties; second, the arrangement of cover and peculiar construction of the inflatable bag is such that no undue expansion takes place from riding the saddle and due to the weight of the rider on particular parts; third, the arrangement of the incasing cover and the form of the base-plate in combination with the inflatable bag are such that the saddle may be ridden when deflated equally as well as when inflated, and, finally, any degree of cushioning may be obtained to suit different riders and different circumstances and conditions.

While I have described my invention with more or less minuteness as regards details and as being embodied in certain precise forms, I do not desire to be limited thereto unduly or any more than is pointed out in the claims. On the contrary, I contemplate all proper changes in form, construction, and arrangement, the omission of immaterial elements, and the substitution of equivalents as circumstances may suggest or render expedient.

I claim—

1. In a pneumatic saddle, the combination of a base-plate or tree substantially underlying the entire cushion intended to be arranged thereon, and bent upwardly at its rear portion under a substantial part of the cushion, an inflatable bag substantially of a size and shape to entirely overlie the base-plate or tree and provided in its rear portion with a transverse slit extending partially across the saddle for dividing the rear portion into two parts each opening into the interior of the inflatable bag, and an inclosing case or cover for the whole, substantially as described.

2. In a pneumatic saddle, the combination of a base-plate or tree substantially underlying the entire cushion intended to be arranged thereon, and bent upwardly at its rear portion under a substantial part of the cushion, an inflatable bag substantially of a size and shape to entirely overlie the base-plate or tree and provided in its rear portion with a transverse crescent-shaped dividing-slit extending partially across the saddle for dividing the rear portion into two substantially oval parts each opening into the interior of the inflatable bag, an inclosing case or cover for the whole, and a single valve for filling all portions of the inflatable bag, substantially as described.

HARRY A. PERRY.

Witnesses:
THOMAS F. SHERIDAN,
THOMAS B. MCGREGOR.