(No Model.)

F. F. COOPER.

GAME COUNTER.

No. 434,425. Patented Aug. 19, 1890.

Fig. 1.

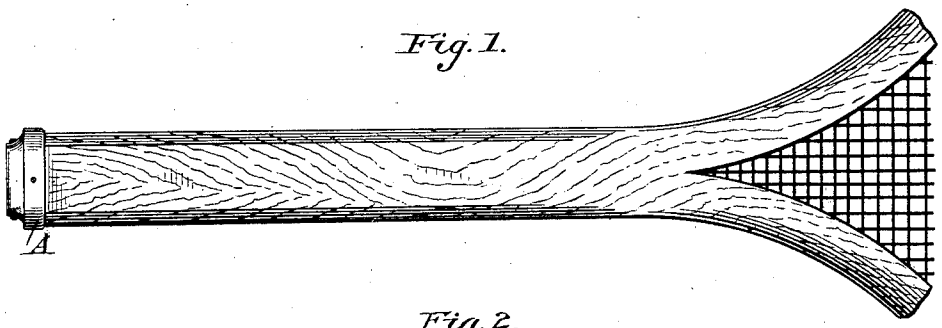


Fig. 2.

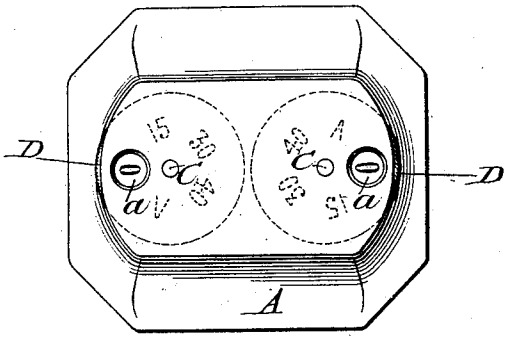


Fig. 3.

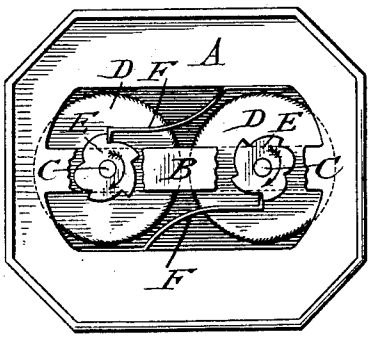


Fig. 5.

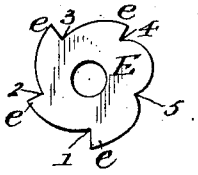
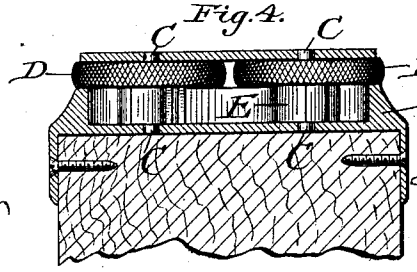


Fig. 4.



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FLAVEL F. COOPER, OF NASHVILLE, TENNESSEE.

GAME-COUNTER.

SPECIFICATION forming part of Letters Patent No. 434,425, dated August 19, 1890.

Application filed March 18, 1890. Serial No. 344,401. (No model.)

To all whom it may concern:

Be it known that I, FLAVEL F. COOPER, a citizen of the United States, and a resident of Nashville, in the county of Davidson, State of Tennessee, have invented a new and useful Improvement in Game-Counters, of which the following is a specification.

My invention has reference more particularly to that class of counters used in the game of "tennis."

I will first proceed to describe my invention in connection with the accompanying drawings, and then more particularly define the same in the claims hereunto appended.

In the accompanying drawings, Figure 1 represents a plan view of the handle of a tennis-racket with a counter embodying my invention attached to the end thereof. Fig. 2 represents a top plan view of my counter. Fig. 3 is an under plan view of the same with a part broken out to more clearly disclose the construction of the counter. Fig. 4 is a longitudinal section of the counter, certain parts being shown in elevation, a portion of the racket-handle being also shown in section in this view; and Fig. 5 is a detail view, to be hereinafter referred to.

A designates a casing in which the mechanism, hereinafter described, is mounted, and this casing is shown as provided with a flange, through which screws may be passed to secure the casing to the racket-handle, though any other suitable fastening device might be substituted for the flange and screws. The casing is provided with openings *a* on its upper side, the purpose of which will be apparent, and within it are mounted certain parts to be hereinafter described. Across the bottom of the chamber is extended a bar B, and in this bar is journaled one end of each of the short shafts C. The other ends of these shafts are journaled in the upper face or wall of the casing. Upon these shafts and just beneath the casing are rigidly mounted two revoluble indicating-disks D, bearing upon their upper faces characters representing the different stages of the score in the game of tennis, these characters being so located that they will be brought in succession in their proper order beneath the apertures *a* in the casing or plate, through which apertures the score may be read. The casing is cut away on two of its sides, and through the opening thus formed the edges of the disks D project, these edges being milled or roughened to afford a gripping-surface for the fingers. On the shafts C beneath these disks D are rigidly mounted certain wheels E, which I term "governing-wheels." The purpose of these wheels is to hold the disks D in the successive positions to which they are brought as the score changes, and they are provided with a series of holding-points 1, 2, 3, 4, and 5, one point for each point of the score. In the rear of the holding-points 1, 2, 3, and 4, I provide certain shoulders or back-stop teeth *e*, and suitably secured to the casing are the spring-pawls F, which pawls co-operate with the holding-points E and back-stop teeth on each wheel E to prevent the backward rotation of the indicating-disk. When therefore the score of either side is advanced from the zero-point to 15, for instance, the milled indicating-disk wheel, which is to count the score of that side, is turned, the wheel E of course turning therewith, since both are mounted on the same shaft C, and the spring-pawl F rides over the surface of the wheel E until it passes the back-stop tooth *e* and drops into the holding-point 1, in which position the parts are shown in Fig. 3. It is evident that while the indicating-disk can now be turned forward as the score advances it cannot be turned backward, because the head of the pawl is engaged by the face of the back-stop tooth *e*. As is well known to those acquainted with the game of tennis, however, when the score is at "advantage" it frequently returns to "40," often varying from one of these points to the other many times. It is therefore necessary to so construct the governing-wheels E that the indicating-disks may be turned backward at this point. I therefore omit the back-stop tooth or shoulder between the holding-points 4 and 5 and round off the periphery of the wheels between these two points so that the pawls will readily slide thereon. It is apparent, therefore, that when the score of either side is at "advantage" and the pawl has engaged the holding-point 5 the indicating-disk can be turned either forward or backward, so that the proper character to indicate the score may appear through the opening *a*. It will be evident, furthermore, that

the gist of my invention lies in so constructing the governing-wheel that it will permit the indicating-disk to be turned in a reverse direction at the point in the score at which such reverse movement is necessary, but will not permit such backward movement at any other time.

I have shown and described herein the preferred construction of my counter; but it is evident that this construction might be changed in some particulars without departing from the spirit and scope of my invention. Thus, for instance, while the form of back-stop tooth which I have shown is the best one known to me, it is apparent that its configuration and construction might be greatly varied, since it is only essential that it act in conjunction with the pawl to prevent the reverse movement of the indicating-disk except at a predetermined point.

While, also, I prefer to construct my counter with a pair of score-disks, so that each player may keep his opponent's score, as well as his own, it is obvious that my counter might be constructed with a single indicating-disk, if desired. It is also apparent that while I have shown my casing so constructed that it is adapted to be secured to a racket, I may omit the securing means and construct the casing so that it may be carried in the pocket or affixed to one of the net-posts.

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

1. A game-counter consisting of a casing, a governing-wheel provided with a series of holding-points and a series of back-stop teeth, all the holding-points except one being provided with a back-stop tooth, a suitable pawl co-operating with the governing-wheel, and a revoluble score-indicating device controlled by said wheel whereby said indicating device may be rotated in a reverse direction only at a predetermined point, all substantially as and for the purpose set forth.

2. A game-counter consisting of a casing, a pair of revoluble indicating-disks mounted therein, governing-wheels for controlling the movement of the disks, each of such governing-wheels being provided with a series of holding-points and having thereon a back-stop tooth for each of the holding-points except one, and suitable pawls co-operating with the governing-wheels whereby the wheels may be turned in a reverse direction only at a predetermined point, all substantially as and for the purpose set forth.

3. A game-counter consisting of a casing having cut-away sides, a pair of revoluble roughened indicating-disks mounted on the casing and having their edges projecting through the cut-away sides, a pair of governing-wheels for controlling the movement of the disks, said wheels being provided with holding-points and back-stop teeth, all the holding-points except one being provided with a back-stop tooth, as described, and suitable pawls for co-operating with said disks, all substantially as and for the purpose set forth.

4. A game-counter consisting of a casing having cut-away sides, a bar in the casing, a pair of short shafts journaled between the bar and the casing, a pair of roughened indicating-disks mounted on said shafts having their edges projecting through the cut-away sides of the casing, a pair of governing-wheels also mounted on the shafts, said wheels being provided with a series of holding-points and back-stop teeth, each of the holding-points except the final one having a back-stop tooth, and suitable pawls for co-operating with said governing-wheels, all substantially as and for the purpose set forth.

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