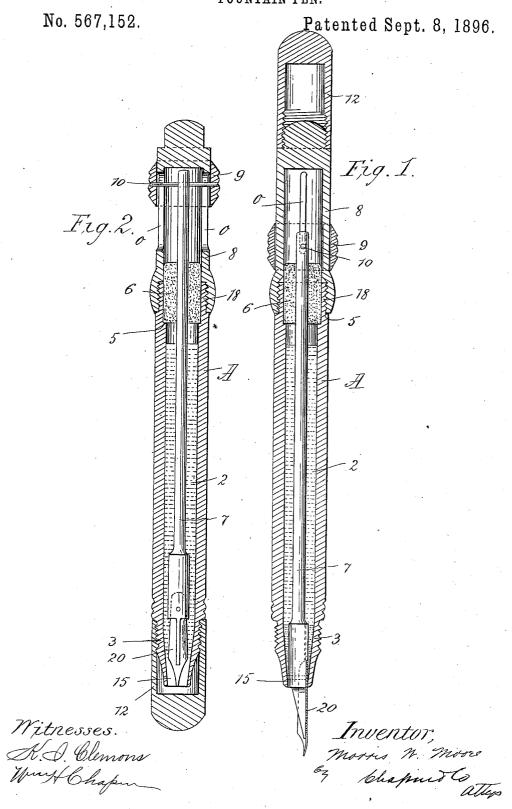
M. W. MOORE. FOUNTAIN PEN.



UNITED STATES PATENT OFFICE.

MORRIS W. MOORE, OF HOLYOKE, MASSACHUSETTS, ASSIGNOR TO HIMSELF, AND GUSTAVUS A. PHELPS AND FRANCIS C. BROWN, OF NEW YORK, N. Y.

FOUNTAIN-PEN.

SPECIFICATION forming part of Letters Patent No. 567,152, dated September 8, 1896.

Application filed November 13, 1894. Serial No. 528,617. (No model.)

To all whom it may concern:

Be it known that I, Morris W. Moore, a citizen of the United States of America, residing at Holyoke, in the county of Hampden 5 and State of Massachusetts, have invented new and useful Improvements in Fountain-

Pens, of which the following is a specification. The object of this invention is to improve the construction of fountain-pens, especially 10 with reference to the formation of the parts at the "tip" end of the pen, whereby the penbar and pen may have reciprocatory movements downwardly or forward to present the pen for writing and also upwardly or inwardly to withdraw the pen within the end of the tip when the pen is not to be used, and the capabilities for the upward inward movement of the pen-bar are to be such, by reason of the construction of the internal portion of 20 the barrel relative to which the pen-bar operates, as to permit the filling of the barrel or reservoir by pouring the ink into the tip end of the barrel; and, furthermore, the object of the invention is to provide improved means for operating the pen-bar; and the invention for improvement in fountain-pens consists in the barrel or fount having the opening therein which leads to the lower forward end of less diameter than at its portion above said for-30 ward end, combined with a substantially cylindrical pen-supporting bar, which practically fits the contracted portion of the forward end opening and which is adapted to be moved to present the pen outwardly beyond 35 said forward end and to be moved upwardly within and beyond the contracted end portion of the barrel, then leaving an unob-

structed space between it and the adjacent surrounding larger internal wall of the bar-40 rel for the entrance therethrough into the barrel of the ink; and subordinate to the foregoing statement of invention the invention consists in a fountain-pen having a barrel or reservoir the chamber or internal bore of 45 which is tapered toward its lower open end, combined with a substantially cylindrical pen-bar adapted to be projected outwardly beyond and to be withdrawn within said open

end of the barrel; and the invention further-50 more consists in constructions and combinations of parts, all substantially as will here-

inafter fully appear, and be set forth in the claims.

Reference is to be had to the accompanying

drawings, in which-

Figure 1 is a longitudinal section of a fountain-pen embodying the present improvements, this view showing the positions of the various parts when the fountain-pen is in position for use. Fig. 2 is a view somewhat 60 similar to Fig. 1, but showing the parts as in such changed positions as to enable one to introduce ink into the barrel at the tip end of the pen.

In the drawings, A represents the barrel 65

which constitutes the reservoir.

3 represents the tip portion of the barrel, which preferably is externally of conical form and is wrought integrally with the bar-

The reservoir portion 2 of the barrel has a greater diameter internally than has the opening 15 through the tip portion. As shown in the drawings, said reservoir portion or bore of the barrel tapers toward its open end.

7 represents the pen-bar, which, especially at its lower end portion, at which the writingpen 20 is carried, is of a substantially cylindrical form, so as to, when the cylindrical portion is at the orifice of the tapered portion 80 of the barrel, substantially fill and close such orifice. This forward portion of the pen-bar is to be so constructed as to constitute a feeder of the ink to the writing-pen, it either having ducts within and along its side or be-85 ing provided with a slabbed or flattened side or formed in any of the multitudinous ways to efficiently carry the ink down to the pen.

The pen-bar is projected centrally through and beyond the upper end of the barrel, so as 90 to be operated at such upper end for the various objects—namely, to forwardly present the pen for writing, to withdraw the pen within the tip when the pen is not to be used, and again to so place the pen-bar inwardly 95 beyond the orifice of the contracted forward end of the barrel as to leave between the penbar and the portion of the barrel which surrounds the forward end of the cylindrical portion of the pen-bar an annular space 100 through which may be injected the ink to supply the reservoir.

The upper extremity of the tubular barrel is counterbored to leave an internal rabbet or seat 5 for the reception of the centrallybored stopper 6, which is preferably of cork, 5 and this fits so closely into the upper end of the barrel and so closely around the upper end portion of the pen-bar which extends through it that no leakage of ink can take place either between the cork and the upper 10 orifice of the barrel or between the central portion of the cork and the portion of the penbar which has the sliding fit through it.

The upper end portion of the barrel is externally screw-threaded, as shown at 18, upon 15 which threaded portion is screwed the cap 8, of extended cylindrical form, the upper end of which, preferably, is closed. Said cap 8 is provided within its opposite sides with the longitudinal slots o o. Fitted to slide upon 20 the outside of the cap is the ring 9. The pen 10 is passed transversely and diametrically through, and is supported by the sliding ring 9, and also has an intersecting engagement with the portion of the pen-bar which is pro-25 jected above the upper stoppered end of the

By sliding the ring 9 upwardly and downwardly and in the required extents the aforementioned several objects which are depend-30 ent on the movement of the pen-bar will be fulfilled.

12 represents the tip-cap, which is to cover the forward end of the fountain-pen when the writing-pen is inwardly withdrawn and the fountain-pen is to be carried in the pocket. 35 This tip-cap may be set upon the upper end of the cap 8, which it fits, when the pen is

Having thus described my invention, what I claim, and desire to secure by Letters Pat- 40

1. A fountain-pen having an ink-fount with its bore tapering toward the outer end combined with a substantially cylindrical pensupport within the bore, and adapted to be 45

drawn into the bore for filling.

2. In a fountain-pen, the barrel having a bore tapering toward its outer end, the substantially cylindrical pen-support within said bore, a bar connected to said support and 50 extending through a suitable packing near the upper part of the barrel, and means for moving said bar so as to project or withdraw the pen-support, all combined substantially as described.

3. In a fountain-pen, the barrel and tip in one piece, said tip conical and tapering toward the point and having a bore tapering in the same direction, a substantially cylindrical pen-support moving within said taper- 60 ing bore, and means for moving said support longitudinally, substantially as described.

MORRIS W. MOORE.

Witnesses:

WM. S. BELLOWS, K. I. CLEMONS.