

1,76,604.

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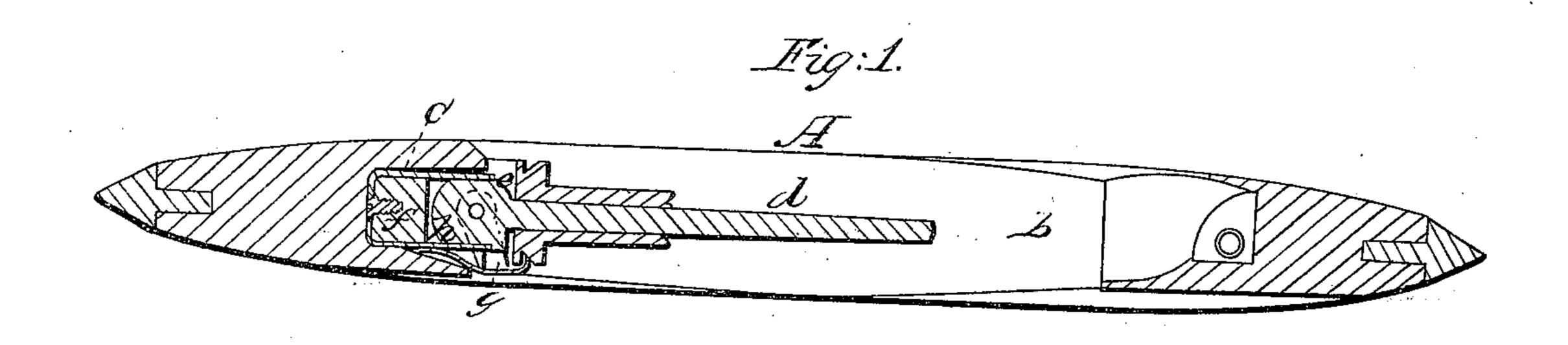


Fig:2.

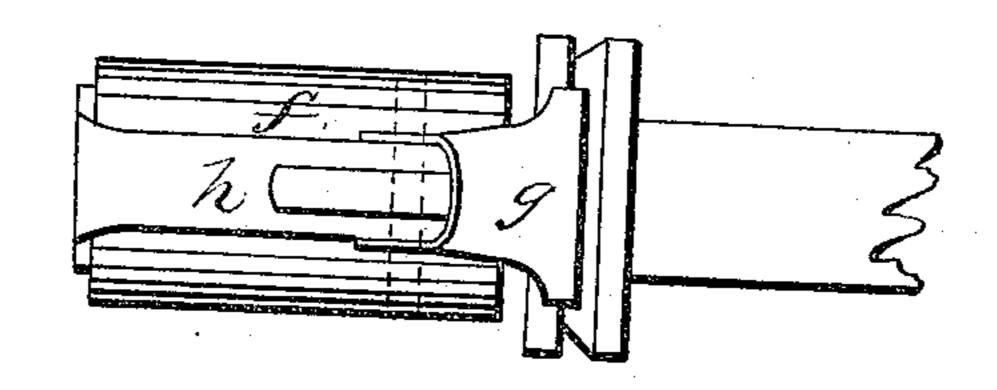
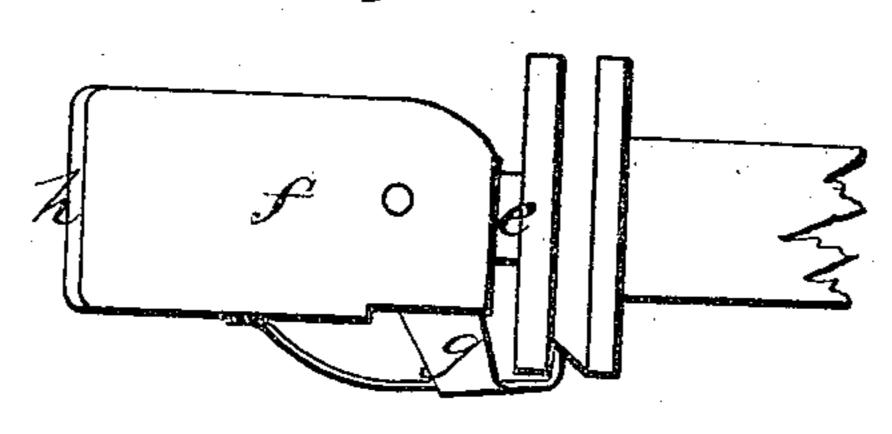


Fig:3.

Witnesses: Edmind 76.76 evins. Edward Triffeth.



Inventor: Situs E.Chase.

By his attorney.

Bedwick Ensti

Anited States Patent Pffice.

SILAS E. CHASE, OF BOSTON, MASSACHUSETTS.

Letters Patent No. 76,604, dated April 14, 1868.

IMPROVEMENT IN SHUTTLE FOR LOOMS.

The Schedule referred to in these Xetters Patent and making part of the same.

TO ALL TO WHOM THESE PRESENTS SHALL COME:

Be it known that I, Silas E. Chase, of Boston, in the county of Suffolk, and State of Massachusetts, have invented a new and useful Improvement in Weavers' Shuttles; and do hereby declare the following to be a full, clear, and exact description thereof, due reference being had to the accompanying drawings, making part of this specification, and in which—

Figure 1 is a longitudinal section of a shuttle provided with my invention.

Figure 2 is an under side view, and

Figure 3 a side elevation of the bobbin-holder as separated from the shuttle.

The principal object sought in making this invention has been to simplify the construction, and, as a consequence, reduce the cost of manufacture of a shuttle, at the same time producing one capable of performing its required work as effectively as if not better than others in use, besides being more durable or lasting.

The invention consists in pivoting or applying the bobbin-carrier or spindle to a movable base or plug inserted within a hole bored longitudinally within the body of the shuttle, and leading out of its bobbin-chamber, substantially as hereinafter explained.

In the drawings accompanying this specification, A denotes the body of the shuttle, made in the ordinary form of weavers' shuttles, its bobbin-receiving chamber being shown at b.

In carrying out my present invention, I bore a cylindrical hole, c, within one end of the shuttle, and longitudinally and centrally of its axis, this hole c communicating with the bobbin-chamber b.

The bobbin-carrier or spindle is shown at d as having its head e pivoted to the inner end of a plug, f, and turning within a recess formed therein, the diameter of the plug f being such as to tightly fill the hole c.

A plate-spring, h, bent into the form of a yoke, is extended about the plug f, and upon opposite sides of and so as to bear upon the spindle-head e, and serves to retain such spindle and the bobbin in alignment with the axis of the shuttle, as well as to permit of the necessary elevation of the point of the spindle, for the purpose of either removing from or supplying thereto a bobbin.

The catch for holding the bobbin in its proper relation to the spindle is shown at g.

From the above description, it will be seen that the only labor required to apply the bobbin-spindle and its appurtenances to the shuttle is to bore the hole c within the body of the shuttle, and insert the plug f therein to the proper distance, the plug being securely fixed in position within the hole by a pin passing through it and the shuttle.

In addition to the advantages resulting from the case and expedition with which the bobbin-carrier may be applied to the shuttle is the further advantage of saving the bulk of the ends of the shuttle nearly entire, as it does not become necessary to cut into it, as in the ordinary mode of applying the spindle, thus making the shuttle much more durable, and being productive of other advantages which will manifest themselves to practical shuttle-makers.

I claim the combination, with the body of the shuttle, of the plug or base f, and the bobbin-spindle, with its appurtenances, hinged to said base, substantially in the manner and for the purposes herein shown and set forth.

SILAS E. CHASE.

Witnesses:

EDWARD GRIFFITH, C. W. BALDWIN,