

T. J. W. ROBERTSON.
Sewing Machine.

No. 12,923.

Patented May 22, 1855.

Fig. 2.

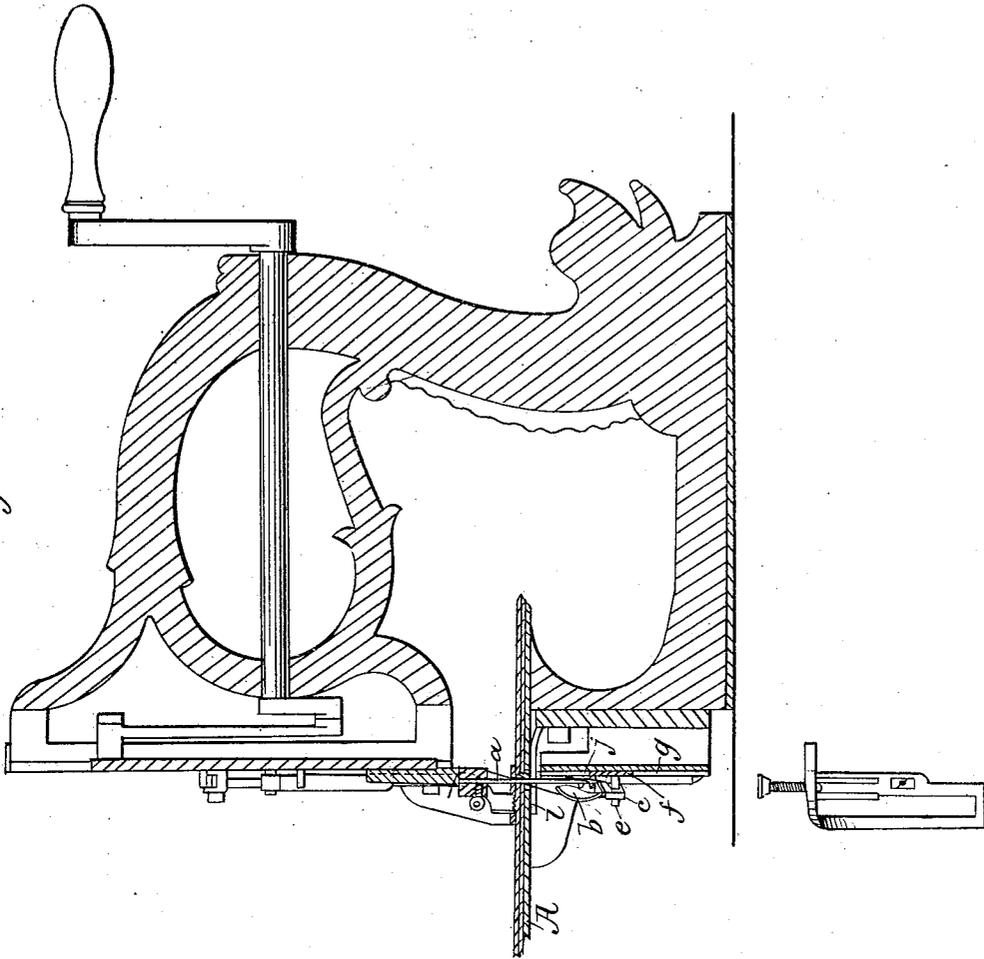


Fig. 1.

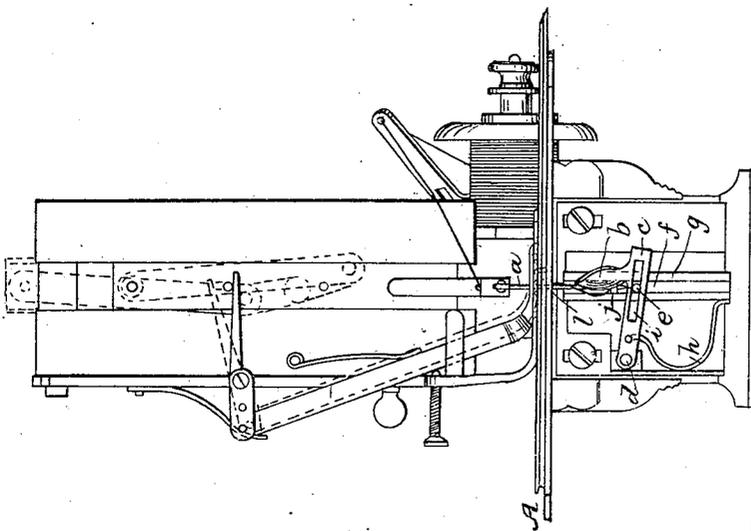
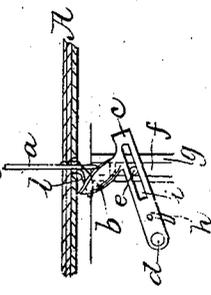


Fig. 3.



UNITED STATES PATENT OFFICE.

T. J. W. ROBERTSON, OF NEW YORK, N. Y.

IMPROVEMENT IN SEWING-MACHINES.

Specification forming part of Letters Patent No. 12,923, dated May 22, 1855.

To all whom it may concern:

Be it known that I, T. J. W. ROBERTSON, of the city, county, and State of New York, have invented a new and useful Improvement in Sewing-Machines; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawings, forming part of this specification, in which—

Figure 1 is a front view of a sewing-machine with my improvement. Fig. 2 is a vertical central section of the same. Fig. 3 is a detached view of the looping apparatus, showing it in a position different to that shown in Fig. 1.

Similar letters of reference indicate corresponding parts in the several figures.

This invention consists in so arranging and applying a looping apparatus on the opposite side of the cloth to that on which the needle is operated, for the purpose of completing or assisting to complete the stitch partly formed by the needle, that it may be actuated by the operation of the needle. This invention is applicable either to sewing-machines in which a single thread is used, making what is commonly known as the "chain-stitch," or it may be applied to the machine for which Letters Patent were granted to me dated November 28, 1854.

The drawings show the application of my invention to a single-thread sewing-machine, but will serve also to illustrate its application to a machine of the other kind above mentioned.

A is the cloth-table. *a* is the needle, which carries the thread, and operates in substantially the usual manner. *b* is the looper, which is substantially like those now used in other single-thread sewing-machines, for extending the loops. It is attached to a lever, *c*, which works on a pivot, *d*, which is secured in the frame or stand B of the machine a short distance below the table A. The lever *c* has a spring, *h*, applied to it in such a way as to throw up the looper as high as the under side of the table A, as shown in Fig. 3. It is provided with a slot, *i*, to receive a pin, *e*, which is secured to a slider, *f*, which works in a fixed slide, *g*, parallel with the needle. This slider *f* is provided with a small eye or ring, *j*, which is directly in line with the needle, and is large enough for the point of the

needle to pass through without injury, but not large enough for the needle to pass entirely through. During the greater part of the descent of the needle the looper is held up by the spring *h* to the position shown in Fig. 3; but shortly before the descent terminates the needle enters as far as it can through the eye *j* of the slider *f*, and when it is allowed to go no farther it drives down the slider, whose pin *e* carries down the lever *c* far enough to throw the point of the looper *b* to the opposite side of the needle to that on which it stands when it is raised up to the table. The point of the looper works close to the needle as it passes it, and when the lever is allowed by the ascent of the needle to be raised by the spring the looper passes into and extends the loop and retains it, as shown in Fig. 3, until the needle passes and carries the thread through it to form the next loop. The extension and retention of the loop by this looper does not differ materially from the same operation as performed by loopers in other machines, where they are operated by mechanism deriving motion from the main shaft of the machine.

In order to prevent the closing of the loop under the sharp edge of the hole *k* in the table A, through which the needle works, I provide a fixed rounded piece, *l*, for the loop to rest against. This tends to keep it open, and also to prevent it slipping over the point of the looper.

By means of a looper arranged substantially like that shown and operated in a similar manner by the needle of the improved sewing-machine, for which Letters Patent were granted to me, dated November 28, 1854, the loop of the needle-thread may be thrown over the point of the thread-case without giving any lateral movement to the needle.

What I claim as my invention, and desire to secure by Letters Patent, is—

So arranging and applying the looper *b*, or its equivalent, by which the loop in the needle-thread is extended or directed for the purpose of completing the stitch, that it shall derive its movement from the needle, substantially as herein described.

T. J. W. ROBERTSON.

Witnesses:

WILLIAM TUSCH,
R. BOEKLERR.