(No Model.)

G. W. BAKER.

TAKE-UP FOR SEWING MACHINES.

No. 254,788. Patented Mar. 14, 1882.

Fig. 1.

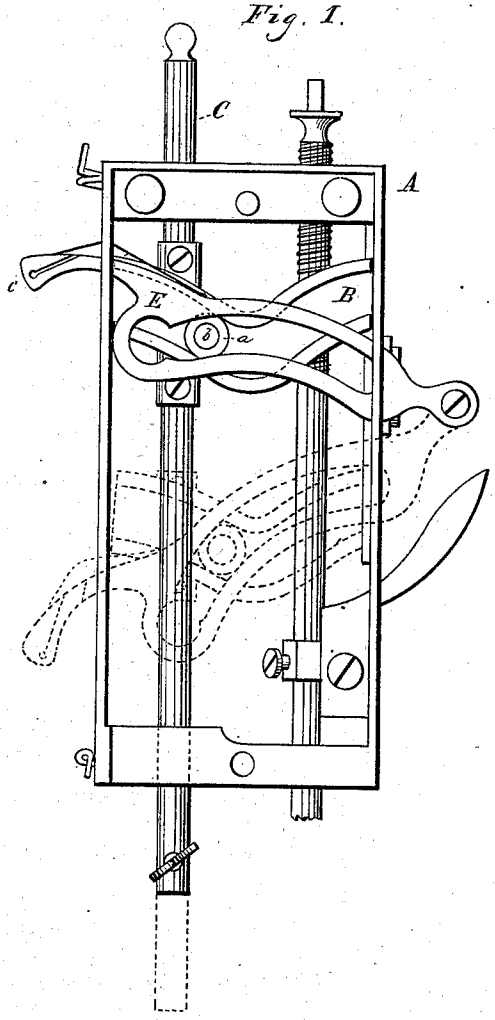


Fig. 2.

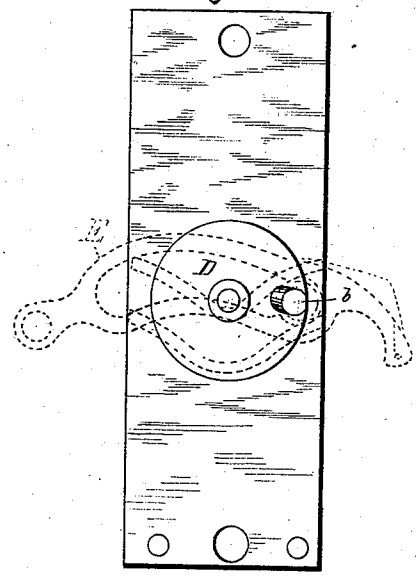
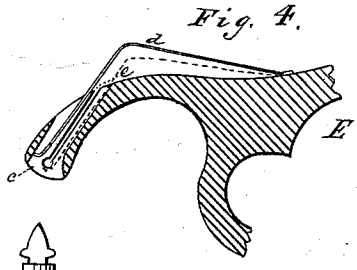


Fig. 4.



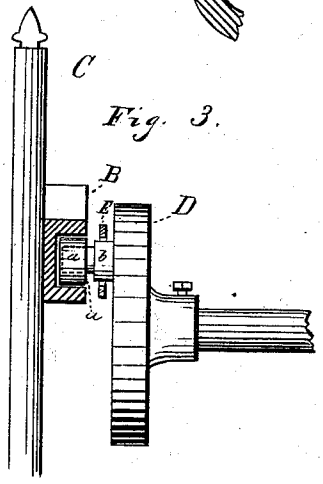


Fig. 3.

WITNESSES

H. Engel

Jno. Crowell Jr

INVENTOR

George W. Baker

By Liggett & Liggett

ATTORNEYS

N. PETERS. Photo-Lithographer, Washington, D. C.

UNITED STATES PATENT OFFICE.

GEORGE W. BAKER, OF CLEVELAND, OHIO, ASSIGNOR TO THE WHITE SEWING MACHINE COMPANY, OF SAME PLACE.

TAKE-UP FOR SEWING-MACHINES.

SPECIFICATION forming part of Letters Patent No. 254,788, dated March 14, 1882.

Application filed June 23, 1881. (No model.)

To all whom it may concern:

Be it known that I, GEORGE W. BAKER, of Cleveland, in the county of Cuyahoga and State of Ohio, have invented certain new and useful Improvements in Take-Ups for Sewing-Machines; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to a take-up device for sewing-machines; and it consists in so constructing a take-up and needle-bar that both are operated by one and the same wrist or pin of a crank or crank-wheel. It also consists in a thread-retaining device, as will be hereinafter set forth and claimed.

In the drawings, Figure 1 is a detached view of a face-plate of a sewing-machine having my improved take-up attached, and looking at the said face-plate from the rear. Fig. 2 is a front view of the crank-wheel which operates the needle-bar and my take-up. Fig. 3 is a side elevation of the crank-wheel, showing the manner of operating the needle-bar and take-up. Fig. 4 is a view in section of a part of my take-up, showing the manner of threading the same.

A is a face-plate of a sewing-machine.

B is a heart-cam, which is attached to the needle-bar C and operated by means of a friction-wheel, *a*, on the wrist or pin *b* of the crank-wheel D. (See Figs. 2 and 3.)

E is a take-up, one end of the same being pivotally attached to the side of the face-plate A, or to an arm extending therefrom, as shown in Fig. 1, and the other end being provided with any suitable thread-retaining device. The thread-retaining device shown, being the one I prefer to use, is formed by slotting one end of the take-up E both longitudinally and transversely, as shown more clearly in Fig. 4 of the drawings, and providing the longitudinal slot *c* with a spring, *d*. The manner of threading this device is also shown in Fig. 4. The spring *d* is depressed, as shown by dotted lines, until it has passed the transverse slot *e*. The thread is then slipped down said slot until it reaches the enlargement at its lower end, when it has also reached the hook or turned end of the spring *d*. The spring *d* is then released, and carries with it the thread, as shown.

The take-up E is operated by the wrist *b* on the crank-wheel D, and is provided with an irregular slot, as shown, in which the said wrist *b* works. The thread, after passing through the loop or eye at the upper side of the face-plate, as shown in Fig. 1, is threaded, as hereinbefore shown and described, through the free end of the take-up, and from thence passes to the needle-bar and needle, and it will be seen that at each upward stroke of the needle-bar the take-up is also raised, and pulls with it the thread, and at each downward stroke of the needle-bar the take-up is lowered, as shown by dotted lines in Fig. 1, and the thread is loosened between it and the needle.

What I claim is—

1. The combination, with a take-up lever the free end of which is provided with intersecting longitudinal and transverse slots, of a spring having its free end located within the longitudinal slot in the arm, the lower end of the spring having a thread-retaining hook formed thereon, substantially as set forth.

2. The combination, with the needle-bar, a cam attached thereto, a rotary shaft, and crank-pin for imparting a reciprocating movement to said needle-bar, of a take-up lever pivoted at one side of the needle-bar, and located between the crank-pin disk and needle-bar cam, and constructed with an arc-shaped slot, within which engages the crank-pin, which latter imparts motion in both directions to the take-up lever, substantially as set forth.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

GEORGE W. BAKER.

Witnesses:

JNO. CROWELL, Jr.,

ALBERT E. LYNCH.