(No Model.)

T. WRIGLEY.

MACHINE FOR WINDING SILK, THREAD, &c.

No. 286,363. Patented Oct. 9, 1883.

Fig 1

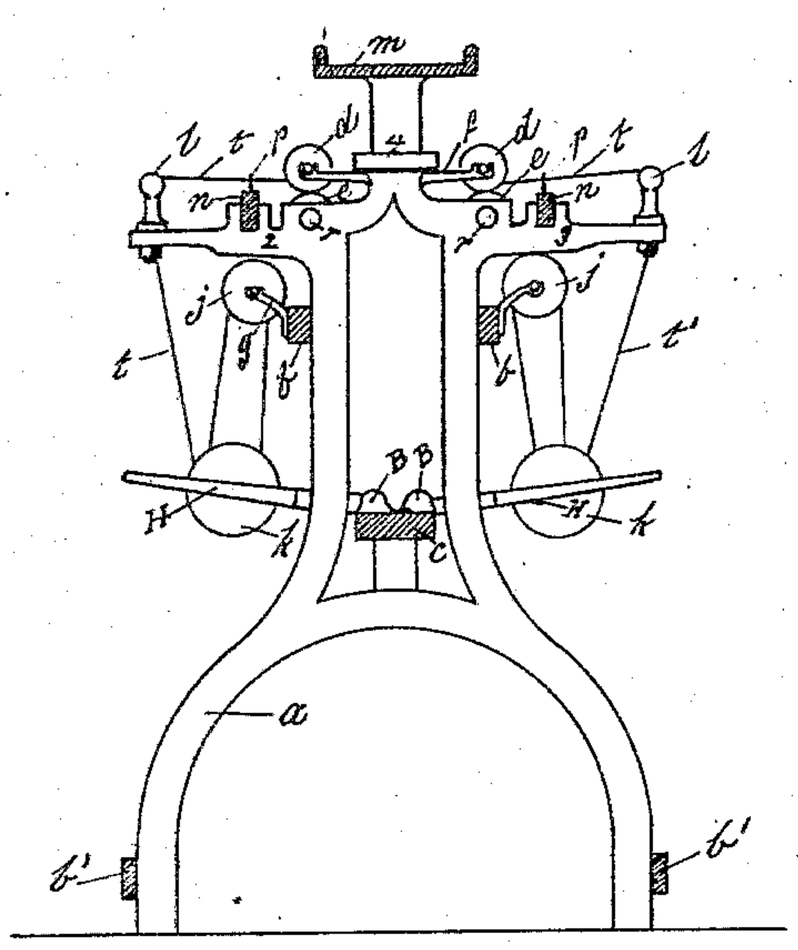


Fig 2

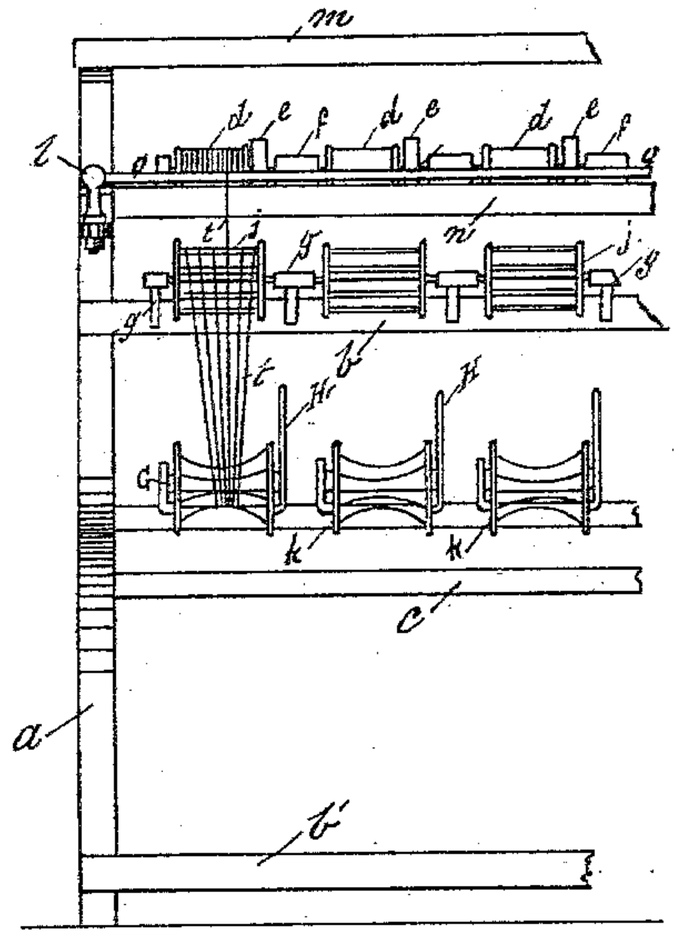


Fig 3

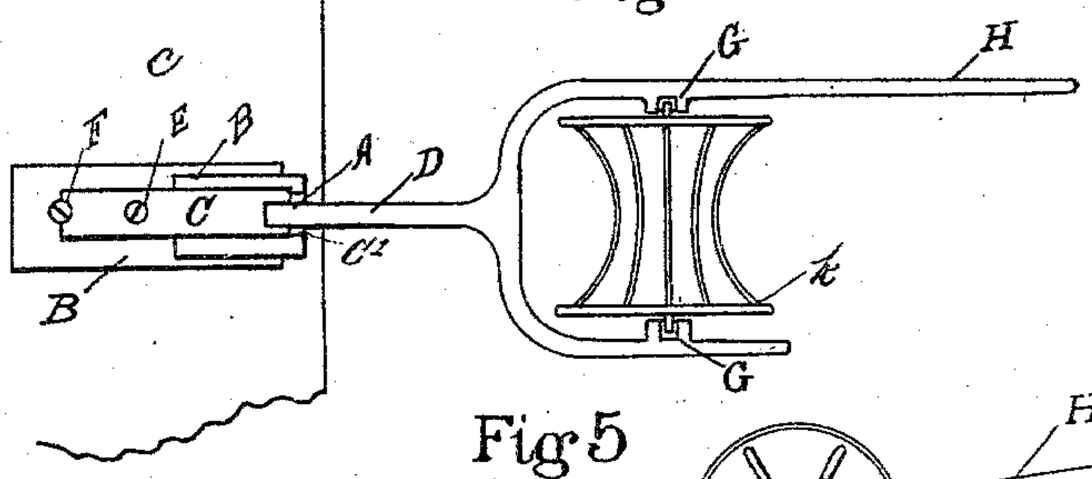


Fig 4

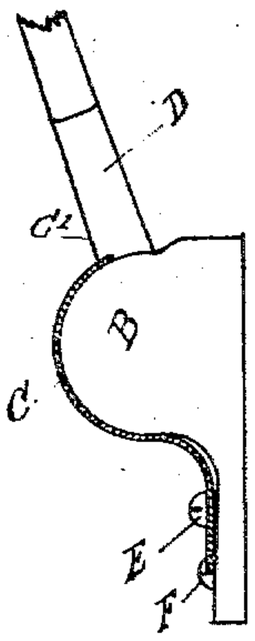
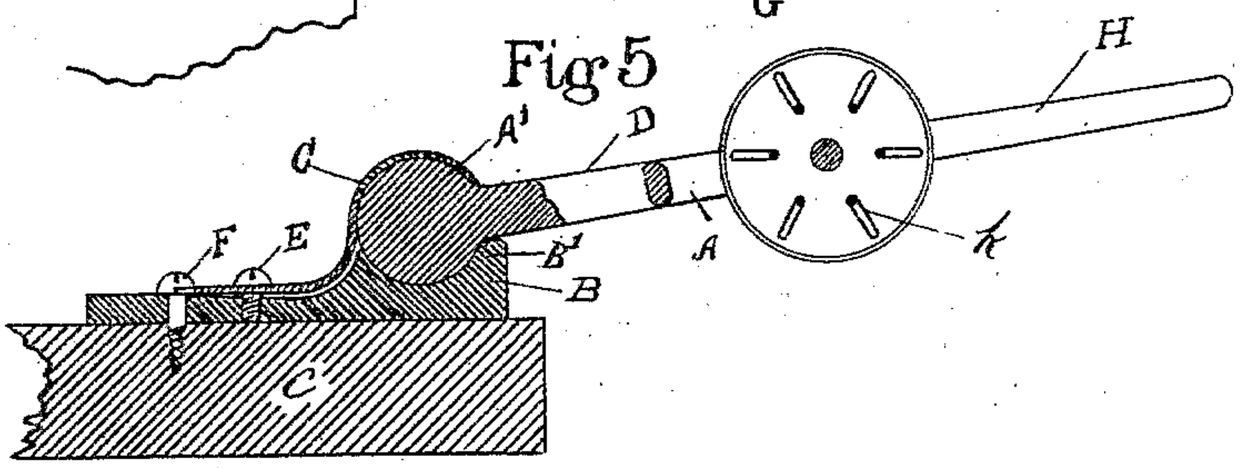


Fig 5



Witnesses

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UNITED STATES PATENT OFFICE.

THOMAS WRIGLEY, OF PATERSON, NEW JERSEY.

MACHINE FOR WINDING SILK, THREAD, &c.

SPECIFICATION forming part of Letters Patent No. 286,363, dated October 9, 1883.

Application filed February 16, 1883. (No model.)

To all whom it may concern:

Be it known that I, THOMAS WRIGLEY, a citizen of the United States, residing at Paterson, Passaic county, State of New Jersey, have invented a new and useful Improvement in Machines for Winding Silk, Thread, &c., of which the following is a specification, reference being had to the accompanying drawings, forming a part thereof.

The object of my invention is to produce a device which will hold securely to their several adjusted positions the frames in which are journaled the lower reels on winding-machines, which will be hereinafter more fully explained.

Figure 1 of the drawings is an elevation, partly sectional, of one end of the machine with my invention thereon. Fig. 2 is a front sectional elevation of the same. Fig. 3 is a plan of the adjustable reel-frames. Fig. 4 is a side detailed view of the bracket and frame; and Fig. 5 is a longitudinal view, part sectional, of the reel-frame, bracket, and rail.

A represents a reel-frame. The arm D of said frame is bifurcated or forked at its outer end, the bearings G being arranged in the tines of the fork, the long tine forming the handle H. The inner end of the arm D is provided with a cylindrical head, A′, said head being arranged in a cylindrical bed, B′, formed in the bracket B. The bracket B is provided with suitable holes to accommodate screws E and F, which pass through the bracket.

To the bracket B there is suitably secured, by screws E and F, the spring C, which conforms to the shape of the bracket B and cylindrical head A′, over which it passes, the bracket being secured to the rail *c* by screws E and F, as shown in Fig. 5. The spring which encircles the upper part of the head A′ is provided with a slot, C′, to accommodate the arm D in its upward motion.

The machine is provided with rails *b*, which are suitably secured to the ends of the same. To the rails *b* there are suitably secured brackets *g*, the tops of which are provided with suitable bearings for the reels *j*. On the outer ends of the projecting arms 3 there are secured standards *l*, in which standards there are suitably arranged and secured rods *o*. The arms 3 are provided with openings 2, to accommodate traverse-bars *n*, which bars are provided with the ordinary guide-wires, *p*, which are suitably arranged and secured in the bars *n*.

In the arms of the frame there are journaled the driving-shafts *r r*, on which shafts there are suitably arranged and secured friction-rollers *e*, above which rollers there are arranged, in the ordinary way, receiving-bobbins *d*. The machine is provided with the ordinary bobbin-board, 4, and creel *m*. The lower part of the frame *a* is provided with rails *b′*.

Operation: The driving-shafts *r r* are put in motion by the ordinary means employed therefor, which, by means of the friction-rollers *e*, rotates the receiving-bobbin *d*, the receiving-bobbin being in frictional contact therewith. The skeins of thread to be unwound are placed on the reels *j* and *k* in the ordinary way, and the reels put in their positions shown in Fig. 1. The reel *k*, being journaled in the bearings formed in the reel-frame A, is adjusted to the lengths of the skeins by raising or lowering the frame A by means of the handle H, and the frame A, so adjusted to the length of the skein to be unwound from the reels *j* and *k*, is held to its adjustment by the spring C, which is in tension, and which impinges or bears on and over the upper surface of the cylindrical head A′, causing the under portion of the head to bind in its bed B′. The tension of the spring C can be regulated by the screw E. The skeins of thread are unwound from the reels *j* and *k* by taking the strands *t* from the skeins up and over the rod *o* to the receiving-bobbin *d*, which is in motion, and which has sufficient draft imparted to it by the friction-roller *e* to rotate the reels *j k* and unwind the skein of thread therefrom and wind the same on the receiving-bobbin *d*, and which is evenly laid on the length of said bobbin by the traverse mechanism.

Having described my invention and its operation, I claim as new and desire to secure by Letters Patent—

The combination of the reel-frame A, provided with bearings G, arm D, handle H, and cylindrical head A′, bracket B, provided with cylindrical bed B′, and holes to accommodate screws E F, spring C, provided with slot C′, to accommodate arm D of the frame *a*, and with holes to accommodate screws E F, rail *c*, adapted to hold the bracket B, and screws E F, substantially as set forth.

THOMAS WRIGLEY.

Witnesses:
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