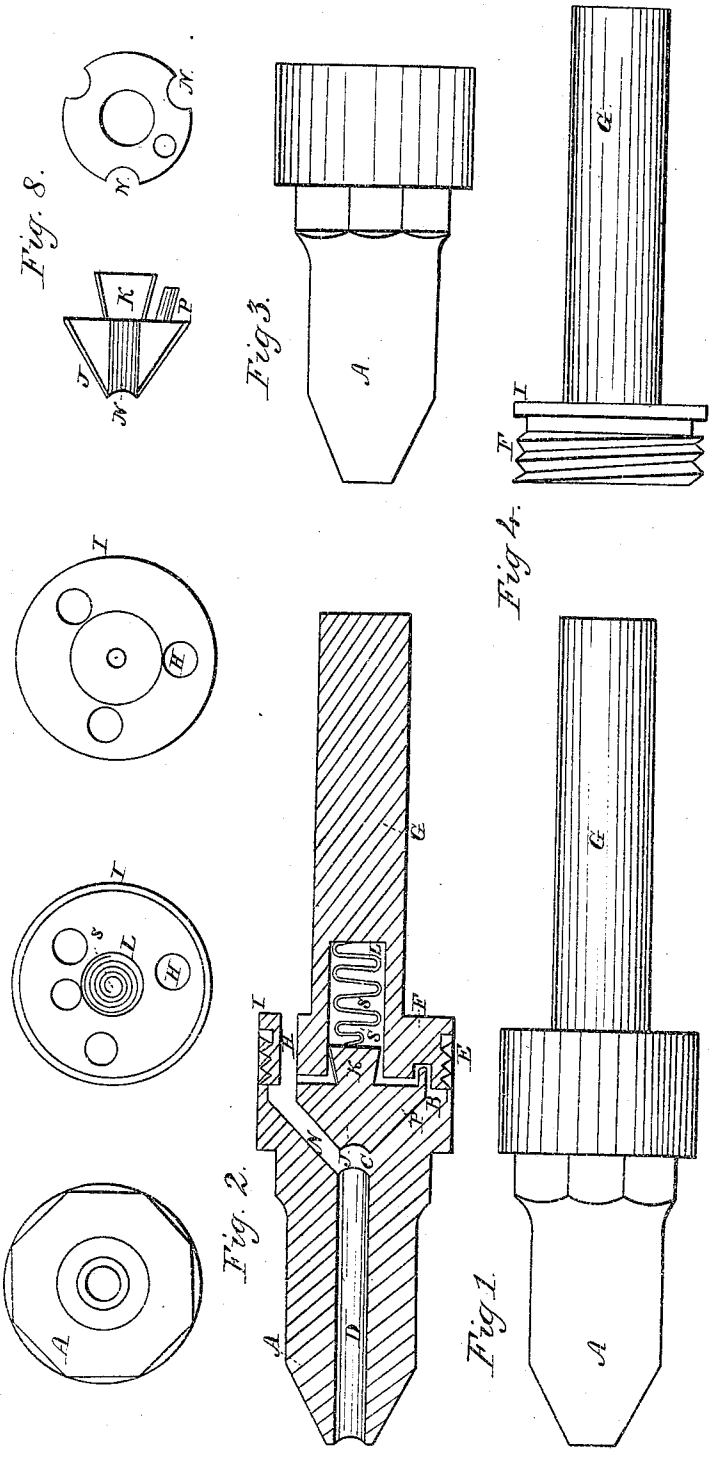
W. Robinson.

Cordage Mach.

No. 16,452. Patented Jan. 20, 1857.



N. PETERS, PHOTO-LITHOGRAPHER, WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

WILLIAM ROBINSON, OF WARSAW, NEW YORK, ASSIGNOR TO HIMSELF AND AMENZO W. BEARDSLEY.

IMPROVEMENT IN LAYING-TOPS FOR CORDAGE-MACHINES.

Specification forming part of Letters Patent No. **16,452**, dated January 20, 1857.

To all whom it may concern:

Be it known that I, WILLIAM ROBINSON, of Warsaw, in the county of Wyoming and State of New York, have invented certain new and useful Improvements in the Laying-Tops for Laying Small Cords, Ropes, Cordage, &c.; and I do hereby declare that the same are described and represented in the following specification and drawings.

To enable others skilled in the art to make and use my improvements, I will proceed to describe their construction and use, referring to the drawings, in which the same letters indicate like parts in each of the figures.

Figure 1 is an elevation of the invention. Fig. 2 is a sectional elevation of Fig. 1 cut through the center perpendicularly. Figs. 3 and 4 are elevations of the upper and lower parts drawn separately. Fig. 5 is a plan of the top part. Fig. 6 is a plan of the end of the lower part. Fig. 7 is a plan of the lower part with the cone. Fig. 8 is a plan and elevation of the cone.

The nature of my invention and improvements in laying-tops for laying cord, ropes, and cordage consists in a movable adjustable cone arranged in connection with a female cone, and so constructed as to yield to the larger strands and be pressed against the smaller strands and prevent them from winding around the larger and making uneven and imperfect work in laying rope or cord.

In the accompanying drawings, A is the cap, made in the form represented, with a cavity B in the large end terminating in a female cone C, and hole D, extending entirely through it for the passage of the cord laid by it. The lower part of the cavity B is provided with a female screw E, to which the male screw F on the shaft G is fitted. This shaft G is made in the form shown, and has as many holes H in the collar I as there are strands in the cordage laid. The cone J is arranged to vibrate freely in the cavity B, and is provided with a shank K, which is made to work loosely in the hole L in the end of the shaft G. This cone has semicircular grooves N in it, which correspond with the holes H for the straps of the rope being laid to lie in as they pass through the top. The cone J has a pin P projecting from it into a hole in the collar I to hold the grooves N opposite the holes H. The shaft G is perforated below the shank K for the spring S, as shown in the drawings, which spring presses the cone against the strands of the rope being laid as they pass through the top.

The laying-top having been constructed and completed as above described, the ends of the strands to be laid are put through the holes H and laid into the grooves N in the cone and twisted together at its apex and put through the hole D in the cap A, which is now screwed onto the collar I, so as to produce the required pressure on the strands of the rope as they pass between the male and female cones, and should the strands differ in size the largest presses the cone over against the smaller, so as to equalize the pressure and prevent the small or smaller strands from winding around the larger and making uneven and imperfect work in laying a rope or cord.

I contemplate that skillful artists will be able without further instruction to make such modifications in my improved top as will adapt it to the circumstances in which they may wish to use it, and that the female cone may have semicircular grooves in it to correspond with those in the male cone, and when so made the collar I should be made to slip into the cap and fastened with a pin or set-screw, and the shaft G perforated through its whole length with a screw in it to act against the spring or the bottom of the cone, so as to adjust it and give the strands being laid into a rope the required pressure.

I believe I have described and represented my improvements in laying-tops so as to enable any person skilled in the art to make and use the same.

I will now state what I desire to secure by Letters Patent:

In laying-tops, the use of a movable cone or its equivalent so constructed and arranged as to yield to the larger strand or stands and be pressed by them against the smaller strand or strands, substantially as described, for the purposes set forth, whether said movable cone is pressed against the strands by a spring-screw or otherwise.

WILLIAM ROBINSON.

Witnesses:

J. W. KNAPP,

A. W. BEARDSLEY.