T. M. BRINTNALL.

CLOTH-MEASURING MACHINE.

No. 193,219. Patented July 17, 1877.

Fig: 1.

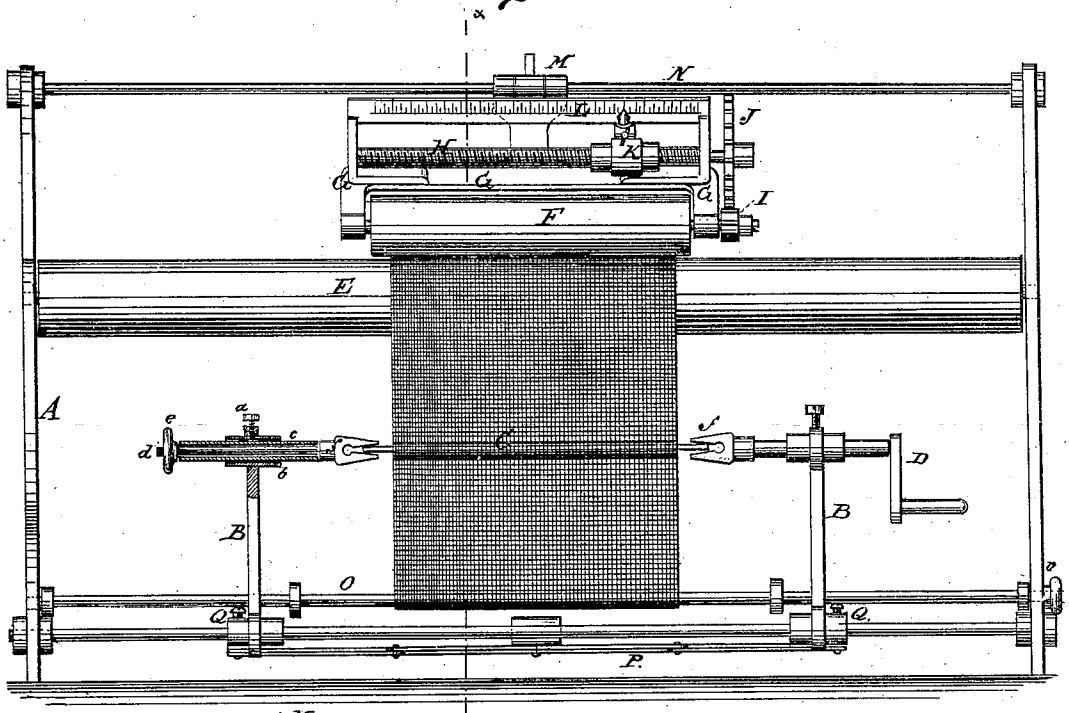


Fig: 3.

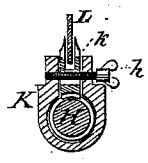
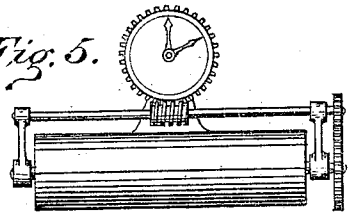


Fig: 2.

Fig: 4.

Fig: 5.



Witnesses:

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UNITED STATES PATENT OFFICE.

THOMAS M. BRINTNALL, OF NEW YORK, N. Y.

IMPROVEMENT IN CLOTH-MEASURING MACHINES.

Specification forming part of Letters Patent No. **193,219**, dated July 17, 1877; application filed March 10, 1877.

To all whom it may concern:

Be it known that I, THOMAS M. BRINTNALL, of New York, in the county of New York and State of New York, have invented certain new and useful Improvements in Cloth-Measuring Machines; and I do hereby declare that the following is a full, clear, and exact description thereof, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification.

The nature of my invention consists in the construction and arrangement of a cloth-measuring machine, as will be hereinafter more fully set forth.

In the annexed drawing, which fully illustrates my invention, Figure 1 is a front elevation of my machine. Fig. 2 is a transverse vertical section of the same through the line *x x*, Fig. 1. Fig. 3 is a section showing the pointer *k*, with sleeve K and screw H. Fig. 4 is a section longitudinally through the sleeve K. Fig. 5 shows a modification of the registering device, which can be advantageously used in measuring fabrics in large quantities.

A represents the frame of the cloth-measuring machine.

B B are sliding standards, two on each side, provided at their lower ends with tubular or sleeve bearings Q placed on rods in the frame A. The upper end of each standard B forms a tubular bearing, *b*, in which, by a set-screw, *a*, is held a sleeve or tube, *c*. Through this sleeve or tube *c* is passed a shaft, *d*, having a clamp or jaw, *f*, on its inner end, and a nut, *e*, is screwed on the outer end, as shown. This construction admits of the clamp *f* revolving freely.

C is the board, upon which the cloth is wound, and it is rotated by means of a crank, D, on the outer end of one of the shafts *d*.

The standards B B are adjustable to suit the width of the cloth to be measured, and they are held at any point desired by set-screws through the sleeve-bearings Q.

I also connect the said standards by lazy-tongs P, which are held centrally to the frame, and by which the two sets of standards are moved simultaneously and equally either toward or away from each other.

In my machine I use a board, C, on each side of the machine, the cloth passing from one over a roller, E, to the other, and also through the tension device O, as shown in Fig. 2; or the cloth may be wound on the roller E, and from there be rolled up on either one of the boards C, in both cases being correctly measured as it is wound up.

G represents a frame, which is by a hinge, M, connected with a rod, N, at the top of the main frame A. This frame carries the traction-roll F, which rests upon the cloth on the roll E, and is rotated by the friction thereof.

On the end of one of the journals of the roll E is a pinion, I, which meshes with a gear-wheel, J, on the journal of a screw-shaft, H, also placed in the hinged frame G.

On the screw H is placed a smooth-bored sleeve, K, which slides freely back and forth thereon. This sleeve is on its upper side provided with a hub, as shown in Figs. 3 and 4, bored out to receive the pointer *k*, which is provided with a screw-thread on its lower end, and when pressed down and held by a pin, *h*, serves to form a connection with the screw H, and cause the sleeve and pointer to travel longitudinally over the screw when said screw is revolved. When the outer end of the screw is reached the pointer is to be raised, and the sleeve can then be easily pushed pack to the starting or zero on the scale-bar L.

The operation of the machine is readily understood, and needs no further description.

I am fully aware that cloth-measuring machines having sliding standards with clutches, a receiving-roll, and a measuring device are not new, and I do not claim such, broadly, as my invention.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. In a cloth-measuring device, the smooth-bored sleeve K, with bored hub and movable toothed pointer *k*, in combination with the

screw H, gears J I, and traction-roll F, all arranged in a hinged frame, G, substantially as and for the purposes herein set forth.

2. In a cloth-measuring device, the combination of the sliding standards B, having bottom sleeve-bearings Q and top bearings *b*, the adjustable sleeves or tubes *c*, and the shafts *d*, with clutches *f*, substantially as and for the purposes herein set forth.

In testimony that I claim the foregoing as my own I affix my signature in presence of two witnesses.

THOMAS M. BRINTNALL.

Witnesses:
PETER MCBRIDE,
E. T. TAGGARD.