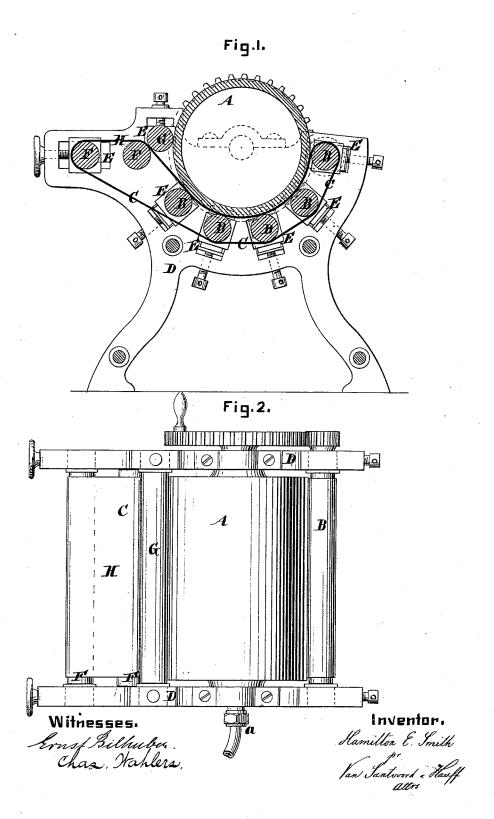
H. E. SMITH. Ironing Apparatus.

No. 166,647.

Patented Aug. 10, 1875.



UNITED STATES PATENT OFFICE.

HAMILTON E. SMITH, OF NEW YORK, N. Y.

IMPROVEMENT IN IRONING APPARATUS.

Specification forming part of Letters Patent No. 166,647, dated August 10, 1875; application filed January 29, 1875.

CASE B.

To all whom it may concern:

Be it known that I, Hamilton E. Smith, of the city, county, and State of New York, have invented a certain new and useful Improvement in Ironing-Machines, of which the following is a specification:

This invention is illustrated in the accom-

panying drawing, in which-

Figure 1 represents a vertical cross-section,

and Fig. 2 is a plan or top view.

Similar letters indicate corresponding parts. My invention relates to certain improvements in machines for ironing clothes and other articles; and consists in the combination of a heated polishing-roller with two or more supporting-rollers, having a different surface-speed than the polishing-roller, for a clothes-supporting apron, whereby I obtain a machine capable of imparting a gloss to the clothes in the apparation of invariants.

the operation of ironing.

In the drawing, the letter A designates a hollow roller, constituting what I denominate the "polishing-roller," and B designates the "supporting-rollers," of my machine. These several rollers are mounted in a frame, D, and are geared together in such a way that the rollers B revolve with either a greater or less superficial speed than the polishing-roller A. By this means a frictional or rubbing action is created between the said polishing-roller and the supporting-rollers when the rollers are revolved; and this action being imparted to the clothes carried between the rollers by a supporting-apron, C, hereinafter described, the clothes acquire a gloss or polish on one or both surfaces, while they become smoothed or ironed. The polishing-roller A is heated by means of steam, hot air, or other suitable means, which is introduced to the roller through a pipe, a, affixed to one of its gudgeons.

If desired, the rollers B also may be heated. The rollers B, respectively, revolve in journal-boxes E, which are adjustable, so that the rollers can be set toward or from the polishing-roller A, in order to accommodate different thicknesses of cloth, and the said rollers B, together with auxiliary rollers F, carry the

clothes-supporting apron C.

The auxiliary or apron rollers F are disposed in such a manner that a level portion, H, is imparted to the apron, upon which level portion the clothes to be ironed are spread, and from which the same are carried to the polishing-roller.

The inner one of the rollers F revolves in contact with a guide-roller, G, and between these two rollers F and G the clothes are taken up from the receiving portion H of the apron, and conducted to the polishing-roller.

The box E of the outer apron-roller F is adjustable, so that by it the apron can be tightened or loosened at will. The last-named feature is possessed also by the box E of the guide-roller G, whereby the roller can be set to accommodate different thicknesses of cloth in the same manner as the supporting-rollers B, as hereinbefore stated.

What I claim as new, and desire to secure

by Letters Patent, is-

1. The combination, in an ironing-machine, of a polishing-roller, A, constructed with an opening for receiving heat-generating agents, two or more supporting-rollers, B, geared with the polishing-roller, to revolve at a different speed, and a clothes-supporting apron, C, arranged around the supporting-rollers, substantially as and for the purpose described.

2. The combination, with a polishing-roller, A, constructed to be heated, and the rollers B, provided with the apron C, for supporting the clothes, of the rollers F F, arranged in the same horizontal plane, and over which the clothes-supporting apron passes, for producing a level portion, H, and the guide-roller G, arranged above the apron for conducting the clothes to the polishing-roller, all substantially as described.

In testimony that I claim the foregoing I have hereunto set my hand this 25th day of

January, 1875.

HAMILTON E. SMITH.

Witnesses:

FRANCIS FORBES, E. BILHUBER.