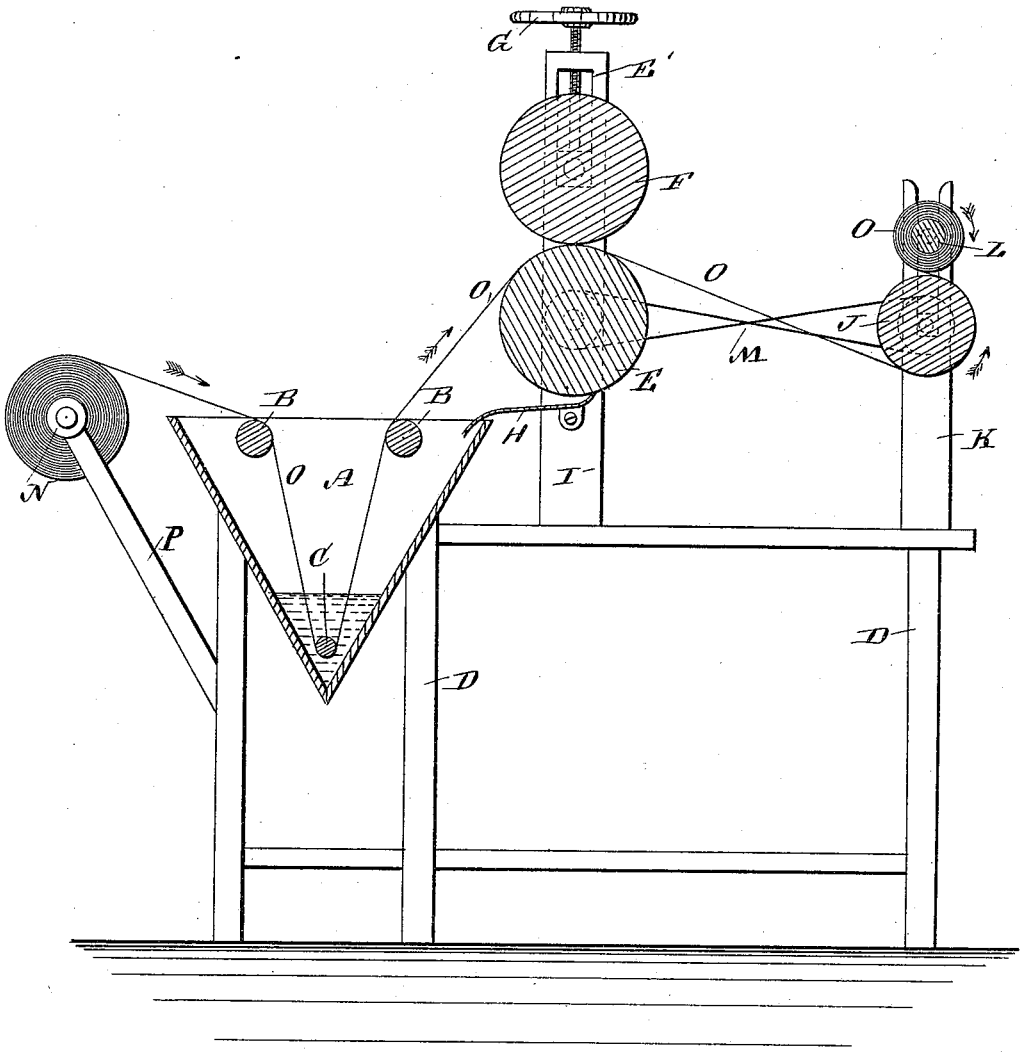
(No Model.)

E. RAU.

APPARATUS FOR DYEING.

No. 347,959. Patented Aug. 24, 1886.



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APPARATUS FOR DYEING.

SPECIFICATION forming part of Letters Patent No. 347,959, dated August 24, 1886.

Application filed December 28, 1885. Serial No. 186,883. (No model.)

To all whom it may concern:

Be it known that I, EUGENE RAU, of Philadelphia, Philadelphia county, State of Pennsylvania, have invented a new and Improved Apparatus for Dyeing with Colors Dissolved in Hydrocarbons, of which the following is a full, clear, and exact description.

The object of my invention is to provide a new and improved apparatus for dyeing fabrics with aniline color dissolved in hydrocarbons.

The invention consists in the combination, with a vat, of rollers at the top and bottom, pressing-rollers, an apron below them, a roller around which the dyed fabric is passed, and a roller on which the fabric is wound.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which a longitudinal sectional elevation of my improved apparatus is shown.

The color, dissolved in hydrocarbons, is poured into a vat, A, having a V-shaped or other cross-section. At the top of the vat two rollers, B, are journaled parallel with the longitudinal plane, and at the bottom a third roller, C, is journaled. The vat is supported by a frame, D, and on the same two standards, I, are erected, in which the lower presser roller, E, is journaled a short distance above the top of the tank. The upper presser-roller, F, is journaled in boxes arranged to slide vertically in vertical slots E′ in the standards I. Screws G are provided in the standards I for adjusting the boxes of the upper presser-roller, F.

An apron, H, conducts the color pressed by the rollers E and F out of the fabric back into the vat.

A roller, J, is journaled in standards K on the frame D, and on the said roller J a roller, L, rests, which slides in the forked upper ends of the standards K. The roller J is driven by a crossed belt, M, from the lower presser-roller, E.

The fabric roll N is journaled in arms P of the frame D, in front of the vat. The fabric O is passed from the roll N over one roller B, under the roller C, over the other roller B, between the rollers E and F, around the roller J, and on the roller L. The fabric is pulled through the vat by rollers E and F, and absorbs the dissolved color, the surplus of which is pressed out by the rollers E F and flows down the apron H into the vat. The roller J revolves the fabric on the roller L, and the fabric is wound upon the said roller. The fabric is then steamed and finished.

I am aware that it is not new to press the fabric over a conducting-roller, thence under a second conducting-roller in the vat, and between feeding and squeezing rollers, nor to pass it through a slit in the top of the vat, and thence under a roller in the bottom of the vat and between drawing and pressing rollers near the top and opposite side of the vat.

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

1. In an apparatus for dyeing fabrics with colors dissolved in hydrocarbons, the combination, with the vat A, of the rollers B and C at the top and bottom, respectively, the rollers E and F, and the apron H below the roller E, substantially as herein shown and described.

2. In an apparatus for dyeing fabrics, the combination, with the vat A, of the rollers B and C, the rollers E and F, the apron H, the rollers J and L on the standards K, and the crossed belt M, substantially as herein shown and described.

EUGENE RAU.

Witnesses:
ANDW. T. KAY,
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