

UNITED STATES PATENT OFFICE.

ISAAC BANISTER, OF NEWARK, NEW JERSEY.

IMPROVED SEMI-LIQUID WAX FOR SEWING-THREAD.

Specification forming part of Letters Patent No. **40,318**, dated October 20, 1863.

To all whom it may concern:

Be it known that I, ISAAC BANISTER, of the city of Newark, in the county of Essex and State of New Jersey, have discovered a compound which constitutes a Semi-Liquid Wax for Sewing-Machine Thread; and I do hereby declare the following to be a full description of the same.

The nature of my discovery is such that it entirely obviates the present necessity of using heat to the wax-holder, while the wax at the same time has all the requisite qualifications required of wax upon the thread, as to making the thread work easily and be of the required hardness and durability on the thread when the wax becomes dry.

Almost every kind of pitch will form a wax. I prefer the resinous pitch from pine. The wax in common use by cordwainers is made by boiling that kind of pitch to a proper consistency and pouring it into water, then pulling and rolling it until in the desired state. I melt the same kind of pitch the same, and when it is at above 150° Fahrenheit slowly add naphtha in the proportion of six of pitch, by weight, to one of naphtha, when it is warm weather, and five to one in cold, manipulating the mass until it is in an even semi-liquid state, putting it into air-tight cans, to prevent

evaporation of the solvent. Softer substances, such as tar, if used, never dries, so as to give the thread the hardness required. The new semi-liquid wax dries in a few hours, and is in the work superior to wax that is heated and is cool before it gets to the work from the waxer that heats it, which is inevitable, in a more or less degree, because of the large surface of a small quantity being exposed to the air in passing from the waxer to the work.

The semi-liquid wax has the advantage in that it is used cold and is always uniformly spread upon the thread, the surplus being more easy to be removed from the thread than when heated wax is applied. It is asserted that the heated wax injures the thread and decreases its strength. The objection does not attach to the semi-liquid wax.

I do not claim dissolving resins in spirits; but

What I claim, and desire to secure, is—

The compound semi-liquid wax, when made substantially in the manner and for the purpose herein above specified.

ISAAC BANISTER.

Witnesses:

W. M. GOODING,
DANIEL CRONIN.