

# UNITED STATES PATENT OFFICE.

ROBERT O. LOWREY, OF SALEM, NEW YORK.

IMPROVED MODE OF RENDERING FIBROUS FABRICS WATER-REPELLENT.

Specification forming part of Letters Patent No. **89,054**, dated April 20, 1869; antedated March 23, 1869.

*To all whom it may concern:*

Be it known that I, ROBERT O. LOWREY, of Salem, in the county of Washington and State of New York, have invented certain new and useful Improvements in Method of Rendering Fibrous Fabrics and similar articles Water-Repellent; and I do hereby declare that the following is a full, clear, and exact description thereof.

To enable others skilled in the art to construct and use my invention, I will proceed to describe it.

My invention relates to waterproofing; and consists in giving fibrous fabrics a water-repellent character by the incorporation of a lime and grease compound during their manufacture, or by treating them with this compound subsequently.

I first make a lime and grease compound similar to the one for which I now have an application for a patent pending in the Patent Office. This compound is made by taking any quantity of quicklime desired, slaking it with water, and, while the process of slaking is going on and the lime still warm and in a mastic state, by adding from one to three ounces of grease, oil, or fatty substance of any kind containing fatty acids, and thoroughly mixing them. The quantity of grease used may be varied for different purposes, so as to secure a compound of greater or less repellent power, as may be desired; and, when desired, the strength of the lime may be partially de-

stroyed by adding vinegar or acetic acid to it before it is combined with the grease, or by adding the acid to the compound. In either case the effect on the lime will be the same without weakening the repellent qualities of the compound.

In manufacturing fabrics of animal, vegetable, or mineral fiber for cloth, paper, or similar articles, I mix my lime and grease compound with the fiber or pulp, and thoroughly incorporate it by the use of any convenient device or mechanism. The fiber or pulp thus treated will be found, when woven into cloth, converted or made into paper, or formed and pressed into articles of any desired shape, to possess a strong water-repellent quality.

A similar effect may be produced by treating fabrics, such as paper, cloth, and similar articles, by applying my compound to their surfaces with a sponge or brush; and in like manner and with similar effect leather and all articles of a like character may be treated.

Having thus described my invention, what I claim is—

The method of rendering fibrous fabrics and similar articles water-repellent by the addition or use of a lime and grease compound, substantially as herein described.

ROBT. O. LOWREY.

Witnesses:

J. MCKENNEY,  
P. T. DODGE.