No. 768,055. PATENTED AUG. 23, 1904.

A. LEISEL.

EMBOSSED WALL PAPER AND PROCESS OF MAKING SAME.

APPLICATION FILED JUNE 20, 1903.

NO MODEL.

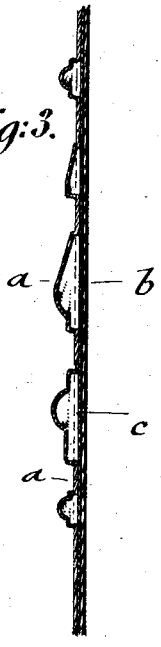
Fig. 1.



Fig. 2.



Fig. 3.



Witnesses
Henry J. Suhrbier
Fred Stolman

Inventor
Albert Leisel
By his Attorneys
Goepel & Niles

No. 768,055. Patented August 23, 1904.

UNITED STATES PATENT OFFICE.

ALBERT LEISEL, OF PEEKSKILL, NEW YORK.

EMBOSSED WALL-PAPER AND PROCESS OF MAKING SAME.

SPECIFICATION forming part of Letters Patent No. 768,055, dated August 23, 1904.

Application filed June 20, 1903. Serial No. 162,346. (No specimens.)

To all whom it may concern:

Be it known that I, ALBERT LEISEL, a citizen of the United States, residing in Peekskill, in the county of Westchester and State of New York, have invented certain new and useful Improvements in Embossed Wall-Coverings and Processes of Making the Same, of which the following is a specification.

The embossed paper and other wall-coverings heretofore in use have the disadvantage that they shrink unevenly when the paste is applied to the back of the same when hanging them to the wall and present thereby difficulty in matching the patterns, so that sometimes an unsightly appearance is produced. Another disadvantage is that the raised designs are impaired by the influence of the moisture of the paste and do not present their original appearance after being hung to the wall.

The object of this invention is to furnish an improved embossed wall-covering in which the objections stated are entirely obviated. An accurate matching of the pattern and a fine ornamental appearance is obtained after being hung to the wall; and for this purpose the invention consists of an embossed wall-covering which is united by heat and pressure with a backing of paper or other fabric coated with a waterproof adhesive substance.

The invention consists, further, of the process of making embossed wall-coverings by embossing the front layer in the usual manner and then backing the same with a layer coated with an adhesive substance while subjected to heat and pressure.

In the accompanying drawings, Figure 1 represents a front elevation of a portion of my improved embossed wall-covering. Fig. 2 is a rear elevation of the same with a portion of the backing lifted up; and Fig. 3 is a vertical transverse section on line 3 3, Fig. 1, drawn on a larger scale.

Similar letters of reference indicate corresponding parts.

Referring to the drawings, *a* represents the front layer of my improved embossed wall-covering. This layer is either of ordinary wall-paper, flock-covered paper, silk, velvet, oil-cloth, or any other wall-covering and is pressed in embossed relief in the usual manner between two heated plates, the lower one or counter-die of which has a pattern in relief, while the upper one has the same pattern in intaglio. The front layer *a* is then united with a backing *b*, of paper or other suitable material, which is covered with a coating *c* of shellac or other waterproof adhesive substance. The face layer and backing are then subjected again to the heat and pressure of a second pair of plates, the lower one or counter-die having the higher reliefs ground off, so that only the lower portions in relief remain thereon, while the design of the upper plate or die remains in intaglio. By the pressure and heat of the plates the coating between the face layer and backing is melted, so that the front layer and backing are firmly united and a wall-covering with an approximately smooth rear surface is obtained, while at the same time the embossed design is preserved in its original beauty and appearance in the front layer. By the second pressure to which the front layer and backing are subjected the upper or intaglio plate serves to retain the embossed design in the front layer intact, while the counter-die, whose high reliefs have been removed, imparts to the second layer or backing by its low reliefs only a slight embossing action, so that the hanging of the wall-covering by applying paste to the rear surface is greatly facilitated without change or injury to the front layer. Wall-coverings provided with such a backing and an intermediate layer of waterproof adhesive can be readily coated with the paste and hung to the wall without impairing the shape and appearance of the embossed design, for the reason that the intermediate layer of adhesive substance acts as a protection for the face layer, so that the same will preserve its original condition without shrinking or warping. It will also facilitate the matching of the design on the wall, so that a more attractive and artistic wall-covering is obtained.

My improved process of making wall-coverings may also be applied to embossed signs and other devices of various kinds in which

the waterproof backing produces the same advantages—namely, the preservation of the embossed design of the front layer.

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

1. As a new article of manufacture, an embossed wall-covering, consisting of an embossed front layer, and a slightly-embossed backing-sheet intimately united by the portions not in relief with the portions of the front layer not in relief by an interposed adhesive substance, substantially as set forth.

2. The herein-described process of making embossed wall-coverings, which consists in applying to an embossed front layer a slightly-embossed backing by an interposed adhesive substance, then subjecting said layers to pressure between a die-plate having the embossed portions of the front layer in intaglio and a second die-plate having slightly-raised portions corresponding to the intaglio portions so as to firmly unite the portions not in relief of front layer and backing, substantially as set forth.

3. The process herein described of making embossed wall-coverings, which consists in first embossing the front layer between heated plates, then subjecting the front layer and a backing coated on its side adjacent to the front layer with a waterproof adhesive substance to the pressure of an embossed plate and a counter-die embossed slightly in conformity with the design of the embossing-plate, substantially as set forth.

In testimony that I claim the foregoing as my invention I have signed my name in presence of two subscribing witnesses.

ALBERT LEISEL.

Witnesses:
PAUL GOEPEL,
HENRY J. SUHRBIER.