UNITED STATES PATENT OFFICE.

RICHARD J. DOOLAN, OF ALBANY, NEW YORK.

IMPROVEMENT IN TRANSFER-SHEETS FOR GRAINING WOOD.

Specification forming part of Letters Patent No. 193,935, dated August 7, 1877; application filed June 6, 1877.

To all whom it may concern:

Be it known that I, RICHARD J. DOOLAN, of the city and county of Albany, and State of New York, have invented a new and Improved Transfer-Sheet for Graining Wood and other Materials, which invention is fully set forth in the following specification.

My transfer-sheet consists of unsized paper, which is coated on one side with a size of starch, glue, and molasses, and after the first coat has dried I apply a second coat of a composition of gum-arabic, glue, and molasses.

The composition which I use for the first coat is mixed in about the following proportion: Starch, scalded in water, eight parts, by measure; glue, dissolved in water, one-half part; molasses, one-half part—the glue and the molasses being mixed first and then added to the scalded starch.

The ingredients for the second composition are mixed in about the following proportion: Gum-arabic, dissolved in water, two parts by measure; glue, dissolved in water, one part;

molasses, one part. After the paper has become dry I cover its coated surface with a layer of any desired color or paint, and on this layer of paint I produce the desired grain-marks by hand, in the usual manner. The grain-marks may, however, be transferred to the paper directly from a block of wood by the following process: After a sheet of paper has been coated with the two compositions above stated, I apply to the surface of the wood the grainmarks of which are to be transferred to the paper a coat of any desired color or paint, and on this coat of color or paint I place my prepared sheet, with its coated face on the color or paint, and then I subject the whole to pressure. When the sheet of paper is taken off it will be found that the color or paint (or

a portion thereof) has adhered to the paper, and the grain-marks of the wood have been reproduced on the surface of the paper.

To transfer the grain-marks from this paper to a plain surface of wood or other material, I apply a light coat of varnish to the surface to be ornamented, and then I place the grained face of the paper on the varnished surface while the varnish is still wet enough to make the paper adhere thereto. After the paper has been firmly pressed down upon said varnished surface, I peel off the paper, which object can be readily accomplished by moistening the unsized back of the paper. After this has been done, it will be found that the grained face of the paper has adhered to the varnished surface of the wood, leaving the sized surface of the paper perfectly plain and ready to receive another grained face.

It will be seen from this description that by means of my transfer-sheets the operation of ornamenting wood or other materials with any desired grain-marks can be effected in a very expeditious manner, and without the necessity of procuring skilled labor.

What I claim as new, and desire to secure by Letters Patent, is—

A transfer - sheet for graining wood and other materials, composed of unsized paper, coated on one of its sides with a composition of starch, glue, and molasses, and over that with a composition of gum-arabic, glue, and molasses, said coated side being further provided with a grained face, substantially as and for the purpose set forth.

In testimony that I claim the foregoing I have hereunto set my hand and seal this 4th day of June, 1877.

RICHARD J. DOOLAN. [L. 8] Witnesses:

DANIEL P. GLADDING, SIMON W. BRIDGEFORD.