

UNITED STATES PATENT OFFICE.

SILAS EDGAR TROUT, OF PHILADELPHIA, PENNSYLVANIA, ASSIGNOR TO
HORACE S. WENDELL, OF SAME PLACE.

MANUFACTURE OF WALL-PAPER, &c.

SPECIFICATION forming part of Letters Patent No. 322,507, dated July 21, 1885.

Application filed April 2, 1885. (Specimens.)

To all whom it may concern:

Be it known that I, SILAS EDGAR TROUT, a citizen of the United States, residing at Philadelphia, in the county of Philadelphia and State of Pennsylvania, have invented a new and useful Process in the Manufacture of Wall-Paper and of Illuminating the Same; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the manufacture to which it belongs to make and use the same.

In the manufacture of wall-paper the paper is first passed through what is known as a "grounding-machine," by which the ground-color is applied by means of brushes revolving in a trough of color. The paper is then dried, and afterward the figures or patterns are printed upon it, and it is then embossed. Heretofore the methods of illuminating have been either to make and apply a separate compound containing the ingredients designed to produce an illuminating effect—such, for example, as mica—or else at the time of printing the patterns or figures to apply varnishes in figures, and then to sprinkle by hand the substances desired to adhere to the paper thereon.

The object of my invention is to illuminate the paper by applying to its entire surface an adhesive liquid—such, for example, as silicate of soda—and then sprinkling or throwing over such surface small particles of a shining or glistening substance—such as ground glass or diamond dust—and also to do this at the time the ground-color is applied, so as to form an illuminated or glittering ground or surface, on which the pattern or figures may be printed, the result of this process being a wall-paper having an illuminated, glittering, and attractive appearance, produced at small cost and by a simple process.

As a convenient means of carrying my invention into effect, I pour into the trough of the grounding-machine containing the color about an equal quantity with the color of an adhesive liquid. As the paper passes through the grounding-machine this adhesive liquid is applied to its surface with the ground-color by the revolving brushes. By means of a

sieve or box, operated by suitable machinery and moving backward and forward above the paper as it is passing through the grounding-machine, after receiving the color and adhesive liquid, I sprinkle or throw upon the paper small particles of a glittering or shining substance, which, falling upon the surface covered by the adhesive liquid and before the latter is dry, adhere to the paper, and remain fastened to it upon the drying of the liquid. An illuminated ground is thus formed, upon which the figures or patterns may be printed. I prefer to use silicate of soda as the adhesive liquid aforesaid, and diamond-dust or ground glass for the particles of glittering or shining substance.

Having fully described my invention, what I desire to claim, and secure by Letters Patent, is—

1. The process of manufacturing wall-paper, by applying to the surface of the paper, together with the ground-color, silicate of soda, and sifting or throwing diamond-dust or ground glass on the silicate of soda before the same has dried, substantially as hereinbefore described.

2. In the manufacture of wall-paper, the combination of silicate of soda with diamond-dust or ground glass, for the purpose and in the manner hereinbefore set forth.

3. In the manufacture of wall-paper, the process of applying an adhesive liquid to the surface of the paper, together with the ground-color, and sifting or throwing small particles of a shining or glittering substance upon it before the patterns or figures are printed thereon, substantially in the manner and for the purposes hereinbefore described.

4. As an article of manufacture, wall-paper illuminated by having silicate of soda applied to it, together with the ground-color and having thrown or sifted upon such silicate of soda before the same is dry diamond-dust or ground glass, in the manner and for the purposes substantially as set forth.

5. As an article of manufacture, wall-paper, containing an illuminated surface produced by the application of silicate of soda with ground glass or diamond-dust combined with or sprinkled upon it, substantially as set forth.

6. As an article of manufacture, wall-paper,
which, before the figures or patterns are print-
ed and the paper embossed, has been illumi-
nated by having an adhesive liquid applied
5 to its surface with the ground-color, and then
having small particles of a shining or glitter-
ing substance sprinkled or sifted upon it, for

the purpose and in the manner substantially
as set forth.

SILAS EDGAR TROUT.

Witnesses:

GEORGE HOUSE,
E. G. HAMERSLY.