UNITED STATES PATENT OFFICE.

ANTHONY E. MENUEZ, OF MINNEAPOLIS, ASSIGNOR OF TWO-FIFTHS TO JAMES H. SOUTHALL AND WALTER RUAN, BOTH OF ST. ANTHONY PARK, MINNESOTA.

INSULATING AND WATERPROOFING COMPOSITION.

SPECIFICATION forming part of Letters Patent No. 418,208, dated December 31, 1889.

Application filed September 18, 1889. Serial No. 324,349. (No specimens.)

To all whom it may concern:

Be it known that I, Anthony E. Menuez, of Minneapolis, in the county of Hennepin and State of Minnesota, have invented certain Improvements in Insulating and Water-proofing Compositions, of which the following is a specification.

My invention relates to improvements in liquid compositions; and its object is to provide improved means for treating cloth, paper, and similar facrics, whereby they are rendered water-proof and electrical non-conductors. I accomplish this improved result by coating said fabrics with the liquid composition hereinafter described, which upon drying becomes firm and yet elastic, so that the fabric may be folded or bent without cracking the coating. The composition may also be used as a paint for coating solid walls or other objects, so as to render them water-proof and to make them electrical insulators.

My invention further consists in the combination of materials, as hereinafter described, and particularly pointed out in the claims.

My improved composition is especially valuable as a coating for paper garments of various kinds, for the lining of overcoats and other outer garments, for tents, awnings, wagon-coverings, and a great variety of similar uses where a water-proof or insulating coating or fabric is required.

fabric is required. My improved composition is made up of the following-named ingredients, prepared and 35 combined in the following-described preferred manner: Two parts of shoe-maker's wax, three parts of gutta-percha, and two parts of india-rubber, separately dissolved by means of chloroform, bisulphuret of carbon, 4c or benzine, and mixed with two parts of japan of any suitable kind. Where more "body" is required for the composition than these ingredients furnish, I prefer to secure it by the admixture with the japan of a dry paint-45 powder of such color as it is desired the composition to be—as, for example, lamp-black or "gas-black," so called.

The proportions of the ingredients above named may be slightly varied without mate5> rially departing from my invention; but I

find in practical use that best results are obtained from the use of the ingredients in the proportions named. For some purposes, also, the india-rubber may be omitted from the composition and substantially equal parts of 55 the other ingredients used.

To more thoroughly harden the composition in drying after being used, I prefer to add substantially an equal part of a suitable hardening-wax, such as beeswax, or paraffine-bax, or half parts of each may be used, if

The several ingredients above named, which it is necessary to dissolve before mixing, may be treated separately by any suitable solvent, 65 such as those above named or any other that may be preferred, and the ingredients so prepared are then mixed together without heating, and form a liquid which can readily be applied by means of a brush to any object requiring the coating.

Fabric, whether cloth or paper, coated with my composition, and the composition itself, when applied as a coating or paint, is of special value for insulating purposes in various varieties of electrical work.

I claim—
1. The combination of shoe-maker's wax, gutta-percha, a suitable solvent, and japan, substantially in the proportions and for the 80 substantially in the proportions.

purposes specified.

2. The combination of shoe-maker's wax, gutta-percha, india-rubber, a solvent, and japan, substantially as and for the purposes set forth.

3. The combination of shoe-maker's wax, gutta-percha, a hardening-wax, a suitable solvent, and japan, substantially as and for the purposes set forth.

4. The combination of shoe-maker's wax, 90 gutta-percha, india-rubber, beeswax, paraffine-wax, a suitable solvent, and japan, substantially as set forth.

In testimony whereof I have hereunto set my hand this 13th day of September, 1889.

ANTHONY E. MENUEZ.

In presence of—
A. M. GASKILL,
T. D. MERWIN.