

UNITED STATES PATENT OFFICE.

WILLIAM H. TOWERS, OF NEW YORK, N. Y.

IMPROVED PROCESS OF PREPARING RAWHIDE FOR THE MANUFACTURE OF VARIOUS ARTICLES.

Specification forming part of Letters Patent No. **57,409**, dated August 21, 1866.

To all whom it may concern:

Be it known that I, WILLIAM H. TOWERS, of the city, county, and State of New York, have invented a new and useful process whereby rawhide is made hard, semi-elastic, and transparent, and rendered a fit material from which to manufacture combs, buttons, buckles, eyeglass-frames, splints, knife-handles, articles of jewelry, and other articles now produced from vulcanized rubber. I call the material "coribon."

The nature of my invention consists in so treating the hide with sulphur, or its combinations and equivalents, as to produce the desired effect.

To enable others skilled in the arts to use my invention and manufacture this material, I will proceed to describe the operation.

I take the raw hides of bullocks, buffaloes, horses, or any other animals whose skins are suitable for the purpose, and either cutting them into moderate-sized strips or pieces, or leaving them whole, as may be most convenient, I immerse them in a bath of boiling sulphur. This bath may contain rosin, or it may contain any coloring matter the color of which it is desirable to communicate to the hide. By the action of the sulphur the hide swells, throws off its impurities, and becomes transparent, unless a dark and opaque color has

been communicated to it by the coloring matter used. As soon as this effect is produced the hide is removed from the bath, pressed into any desirable form, in a mold or otherwise, and dried. It is then hard and transparent, but if exposed too long to the action of the sulphur it may become brittle; if so, it may be softened and rendered elastic by boiling in water for a greater or less length of time, according to the degree of elasticity desired.

Coribon may also be prepared from scraps of hides by treating them as before described, and, after drying, pulverizing the scraps and mixing the powder with any adhesive gum, or any coloring matter, and then pressing it into the desired form and drying, as in the previous-mentioned case; and in all cases I may waterproof the materials with any of the well-known waterproofing substances.

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

The treatment of rawhide with sulphur, or any combination of or equivalent to sulphur, for the purpose of producing the material and the effects before described.

WM. H. TOWERS.

Witnesses:

J. L. NEWTON,
J. P. DODGE, Jr.