

# UNITED STATES PATENT OFFICE.

EDWARD GEARY, JR., OF PHILADELPHIA, PENNSYLVANIA.

IMPROVEMENT IN COVERING CORSET AND OTHER STEELS TO PREVENT RUSTING.

Specification forming part of Letters Patent No. **153,217**, dated July 21, 1874; application filed May 21, 1874.

*To all whom it may concern:*

Be it known that I, EDWARD GEARY, Jr., of Philadelphia, Pennsylvania, have invented an Improved Method of Protecting Corset-Springs, of which the following is a specification:

My invention relates to an improved method of protecting corset-springs from the injurious action of perspiration or moisture, and prevent the same from corroding or rusting from wear or from washing; and it consists in covering them with an elastic water-proof compound that will bend with the spring without cracking or breaking. The springs are inclosed and hermetically sealed in the compound, which is cemented to them at the same time, so as to be held securely in place, as will be hereinafter set forth.

The compound which I employ consists of raw rubber, sulphur, and oxide of zinc; and it is applied to the springs in the following manner, viz: The ingredients are ground and masticated together in the ordinary manner well known to rubber-manufacturers, until they form a homogeneous mass, which I roll into sheets of a thickness suitable to the thickness of the finished covering. These sheets I cut into strips slightly longer and wider than the springs. Inclose each spring between two of these strips, previously coating the springs with liquid rubber cement, consisting of rubber dissolved in bisulphide of carbon or other suitable solvent. I then press the edges of the rubber together all round the spring, so as to unite and incorporate the strips at said edges, and form a hermetically-closed casing entirely round the spring. I then trim off the

superfluous rubber from the edges, so as to give the article a neat and uniform appearance, taking care not to cut through the covering so as to expose the spring. The springs thus covered and ensealed are to be vulcanized in any convenient manner; but I prefer to vulcanize them in soap-stone in the manner well known to rubber-workers.

The proportions of the sulphur and rubber employed in the formation of my compound and the temperature used in vulcanizing may be varied so as to form a coating or covering of soft or hard rubber upon the springs, as may be desired, to suit the requirements of the trade, as some corset-makers will require a heavier and harder covering than others, as will be readily understood by skilled persons. The proportion of oxide of zinc to be employed may be varied almost indefinitely, as weight and thickness of the coating may require.

I design to form my compound of all colors, which may be done by employing the various metallic oxides in conjunction with or in place of the oxide of zinc, or by the use of other mineral coloring matter.

What I claim as my invention is—

The method of protecting corset-springs herein described, by hermetically sealing the same and attaching to them a covering of rubber, sulphur, and zinc applied in a soft state, as set forth, and vulcanized in the well-known manner.

EDWARD GEARY, JR.

Witnesses:

R. H. WHITTLESEY,  
M. F. HALLECK.