

UNITED STATES PATENT OFFICE.

RICKASON STILWELL, OF NEW YORK, N. Y., ASSIGNOR, BY MESNE ASSIGNMENTS, TO EMELINE C. STILWELL, OF SAME PLACE.

MATERIAL FOR FILLING PILLOWS, MATTRESSES, &c.

SPECIFICATION forming part of Letters Patent No. 262,994, dated August 22, 1882.

Application filed January 28, 1882. (No specimens.)

To all whom it may concern:

Be it known that I, RICKASON STILWELL, of the city, county, and State of New York, have invented an Improvement in Materials for Filling Pillows, Mattresses, &c., of which the following is a specification.

The object of this invention is to provide a cheap and at the same time a light and useful filling or stuffing for pillows, beds, mattresses, and the like.

In the practice of my invention I take the downy material which forms the ripened product of what is commonly known as the "cat-tail flag," the same being a plant found in very large quantities in marshes and wet grounds in many portions of the United States and in other countries, the parts utilized in my said invention being the spike, which ordinarily is from two to four or five inches in length, and perhaps three-quarters of an inch in diameter, and composed of short fibers radiating from the central stem. These fibers in bulk are found in the market under the name of "cat-tail." This downy or fibrous material I mix with cotton in such manner that the fibers of the downy material and those of the cotton will be interposed, as it were, one between another, so that the nature of both for the purposes of my invention is modified, and a product much more light and elastic and every way fitted for the filling of pillows, beds, mattresses, &c., is afforded, and which is not provided by either of the materials separately. I take, say, equal quantities of the cat-tail aforesaid and of ordinary commercial cotton and cause them to pass simultaneously through an apparatus which consists essentially of a rotating drum provided with radial teeth which play between corresponding teeth provided upon a fixed concave. This apparatus being well known to upholsterers and others, and often used for the purpose of "picking hair," as it is termed; but any other apparatus may be used which will intermingle the fibers of the two materials to make them coact, as aforesaid. As the two materials are passed together through the apparatus the fibers of each are separated

and intermingled with those of the other, the short and comparatively stiff and elastic fibers of the cat-tail being interposed between the long and flexible fibers of the cotton, so as to support the said fibers of the cotton at an appreciable distance apart, thereby preventing the same from compacting and compressing into a dense, hard, and inelastic mass.

It is to be observed that while both the cotton by itself and the cat-tail by itself have the same property of compacting into a mass comparatively worthless as a filling for pillows and the like, yet this results from different causes in the two materials—the cotton from the flexible and comparative softness of its fibers, and the cat-tail from the shortness and relative straightness, so to speak, of its fibers; but when these two materials are mingled what has previously been a defect in one is neutralized by what has previously been the defect of the other, and together they produce the entirely unlooked-for and unexpected result of forming an elastic mass admirably fitted as a substitute for feathers for the purposes hereinbefore indicated. Cotton alone may be said to be absolutely worthless for such purposes, and the cat-tail is of very inferior value, whereas the combination of the two, as hereinbefore explained, produces an article for the purpose substantially equal to feathers in point of lightness, softness, and elasticity, and incomparably superior thereto in cost of manufacture. The increased elasticity secured in my improved article as compared with that of the cat-tail alone is shown by the fact that a pillow which requires five pounds of the cat-tail to fill it will be filled by two and one-half pounds of the combined cat-tail and cotton, and the filling, and consequently the pillow itself, is far superior in point of softness and elasticity, properties both of which are essential to a marketable pillow.

I do not claim the use of cotton alone or the use of cat-tail alone as a filling for pillows, mattresses, beds, &c., as both of these in their separate condition are well known for such purposes, and neither of them possess the char-

acteristics, properties, or practical utility existent in combination of the two, as hereinbefore described; but

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

As a new article of manufacture, the material for filling pillows, mattresses, beds, and the like, composed of cotton and cat-tail mingled

together in such manner that the properties of the one for the purposes required are modified by the properties of the other, substantially as herein set forth. 10

RICKASON STILWELL.

Witnesses:

- THOMAS E. CROSSMAN,
THOMAS A. HOPKINS.