(No Model.)

G. W. McKIM.

WOOD SPLINT FOR MANUFACTURING BROOMS.

No. 425,044. Patented Apr. 8, 1890.

Fig. 1.



Fig. 2.

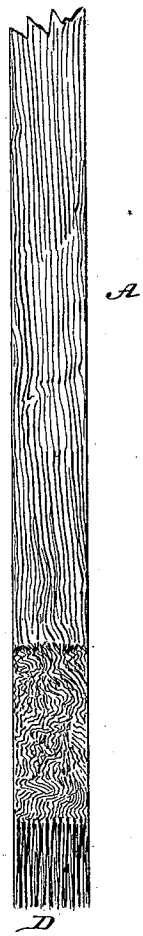
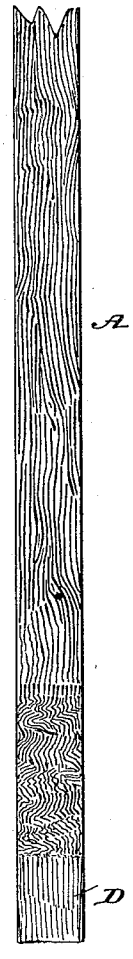


Fig. 3



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UNITED STATES PATENT OFFICE.

GEORGE W. McKIM, OF MARTIN'S FERRY, OHIO, ASSIGNOR TO CHARLES E. McKIM, OF SAME PLACE.

WOOD SPLINT FOR MANUFACTURING BROOMS.

SPECIFICATION forming part of Letters Patent No. 425,044, dated April 8, 1890.

Application filed April 17, 1889. Serial No. 311,187. (No model.)

To all whom it may concern:

Be it known that I, GEORGE W. McKIM, residing at Martin's Ferry, in the county of Belmont and State of Ohio, have invented a certain new and useful Improved Wood Splint for the Manufacture of Brooms, of which the following is a specification.

My invention has for its object to produce splints, which may be made from any suitable wood—such as hickory, hoop or berry, ash or elm—which will form a complete substitute for broom-corn, which may be readily handled and operated in the same manner as broom-corn, and which may be manipulated and formed in such a manner by the ordinary broom-making process that it can produce a broom which will be a substitute for the finest corn-broom, and which will have all the elasticity of said broom, and in which the end or sweeping edge will have an additional or frayed portion, by means of which the same may be used on the finest carpets and the like without injury thereto; and to this end my invention consists in an article formed as described in the annexed specification, and particularly pointed out in the claims, reference being had to the accompanying drawings, in which—

Figure 1 is a face view of one of the splints. Fig. 2 is a similar view of the lower edge thereof on an enlarged scale, and Fig. 3 is an edge view of the same.

To more clearly describe and illustrate my invention, I will refer to my application, Serial No. 311,186, filed of even date herewith, which clearly describes the process by which I form these splints, and to my application, Serial No. 311,185, filed of even date herewith, which describes the machinery I use in the process of making the said splints. I will therefore refer to said applications in a general way in the present description of my invention.

It is a well-known fact, so far as known, that up to the present time no broom which has been made from wood splints could be used as a substitute for the ordinary house-broom, and that the construction of such has been chiefly confined to the street-sweeping, stable-broom, or brushes, because in the production of the wood splint great difficulty has been found to make said splints so that they would combine the several elements of elasticity, pliability, and soft and yielding ends, so that they could be easily made and sold at a price equal or below the market price of ordinary brooms. It is also well known that no wooden splints have ever been manufactured to be sold to the broom trade in such a condition that the same could be worked into the ordinary house-broom. I have therefore, after considerable experiment, found that by a certain peculiar treatment set forth in the applications referred to of the said splint I could render it in condition whereby it could be manipulated in the same manner as broom-corn and at a cost of about one-fifth of the said broom-corn.

In the accompanying drawings, A denotes the splint, which is formed of wood, preferably by the machinery set forth in my other application, Serial No. 311,185. These splints are made in various sizes, usually of the various sizes generally found in broom-corn. The splints, after having been cut from the billet or block into the proper sizes, have one of their ends treated in such a manner, preferably by the process set forth in my application, Serial No. 311,186, that said end receives an increased elasticity and yet becomes waterproof—that is to say, that the action of water or dampness will not soften said ends. This renders the lower or body portion of the splints in condition to be easily bent when in use in the broom, thereby avoiding any extra exertion on the part of sweeper when using the same. The outer end of the elastic portion has its grain crushed transversely, preferably by the machine before referred to, which renders the lower end additionally flexible, so as to pass easily over the carpet without tearing out the fiber of the material. The said crushed end is frayed longitudinally, as shown at D, by any suitable means, whereby the splints when formed in a broom shape will enter between the finest fibers of the upper face of the carpets being swept and collect therefrom the most minute particles of dirt.

From the foregoing description, taken in connection with the drawings, it will be seen that by producing splints such as described a broom can be manufactured therefrom

which will answer the requirements of the ordinary house-broom, and which may be used to sweep the dirt from the finest carpets without injury thereto. They can be produced at a cost much less than ordinary broom-corn can be raised, can be more easily handled, and be formed into a broom in a much cheaper and compact manner than from broom-corn.

I am aware that it is broadly not new to make wood splints for broom-making or to make wood splints having one end more elastic than the other, and I therefore do not claim such constructed wood splints; but

What I do claim, and desire to secure by Letters Patent in the United States, is—

1. A wood splint for broom-making, formed of uniform breadth and thickness, one part of which is of greater elasticity than the other, the lower end of said elastic portion having its grain crushed transversely, substantially as shown and described.

2. A wood splint for broom-making, formed of uniform breadth and thickness, one part of which is of greater elasticity than the other, the lower end of said elastic portion having its grain crushed transversely, said crushed end being frayed longitudinally, substantially as and for the purpose specified.

3. A wood splint for broom-making, formed of uniform breadth and thickness, one part of which is of greater elasticity than the other, said elastic portion being water-proof, the lower end thereof having its grain crushed transversely, substantially as and for the purpose described.

4. As a new article of manufacture, the herein-described improved wood splint for broom-making, consisting of the body portion A, made of uniform breadth and thickness, one portion being more elastic than the other, said elastic end being water-proof, the lower end of said elastic end having its grain crushed transversely, said crushed end being frayed longitudinally, substantially as and for the purpose specified.

In testimony whereof I affix my signature in presence of two witnesses.

GEORGE W. McKIM.

Witnesses:
THEO. SNODGRASS,
W. M. TUPTON.