

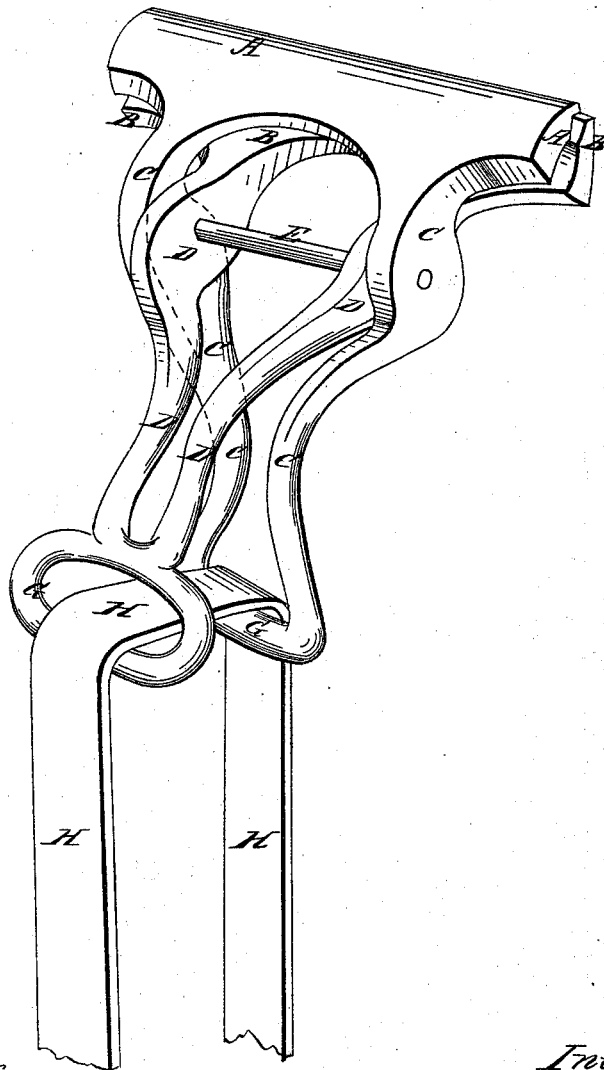
*J. O. Lewis,*

*Cloth Clamp.*

*N<sup>o</sup> 47,210.*

*Patented Apr 11, 1865.*

*Fig 1*



*Witnesses.*

*Henry Hall*  
*H. Fuller*

*Inventor.*

*Joshua O. Lewis*  
*by his Attorney*  
*Thos H. Dodge*

# UNITED STATES PATENT OFFICE.

JOSHUA O. LEWIS, OF WORCESTER, MASSACHUSETTS.

IMPROVEMENT IN CLAMPS FOR STRETCHING CARD-CLOTHING UPON CARDING-CYLINDERS.

Specification forming part of Letters Patent No. **47,210**, dated April 11, 1865.

*To all whom it may concern:*

Be it known that I, JOSHUA O. LEWIS, of Worcester, in the county of Worcester and State of Massachusetts, have invented certain new and useful Improvements in Card-Clothing Clamps; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the accompanying drawing, in which—

The figure represents a perspective view of said card-clothing clamp.

The clamps heretofore used for drawing and stretching card clothing upon the card-cylinder preparatory to securing the cloth to it have been made in the form of pliers with laterally-projecting jaws, so as to seize a sufficient width of the card-clothing in stretching the same. With the pliers constructed in that manner there has always been great liability of springing at the ends of the clamp jaws, thus occasioning slack places in the card-clothing after it had been used a short time and rendering the operation of the card imperfect and irregular.

The object of my invention is to obviate these difficulties, and I effect this by constructing my clamp in such a manner that the ends of its jaws are supported by forked braces, which at the same time serve as the clamp arms or levers through which the rod or pin passes, by which the two parts of the clamp are pivoted together.

In the accompanying drawing, A and B represent the jaws of my clamp. From the clamp A extend the forked braces C, and from the clamp B the forked braces D. In each of the jaws their forked braces extend to near their ends, so as to prevent any springing of the same, and consequently the entire face of the jaw when properly applied will bite the card-clothing, and the latter can thus be stretched uniformly by the application of this clamp. The forked braces D are fitted within the braces C, and the pivot or pin E is passed through them, and thus serves as a pivot on

which the clamp-jaws are turned. The ends of the forked braces C D are formed with loops G, or in such a manner that a strap, H, can be passed through them, and the lower end of the strap is secured to a treadle or foot-lever, by means of which the clamp arms are not only forced together, but are also forced downward for the purpose of stretching the card-clothing preparatory to nailing it down upon the cylinder.

In applying the card-clothing to the carding-cylinder, it is nailed down in strips longitudinally upon said cylinder, or parallel with the axis of the same, and one edge of the clothing having been fastened, the clamp is applied, in the manner above described, to the loose edge thereof for the purpose of stretching the clothing preparatory to nailing it down upon the cylinder, and it is evident that it is of great importance that the tension of the clothing should be uniform throughout.

In heavy clothing great force is applied in stretching it, and as no part of my clamp can spring or yield it is evident that a uniform tension is obtained when the work is performed with ordinary care.

The looped ends G are well adapted to receive an operating-strap, whereby the use of bolts, screws, or other means of attachment of the strap to the clamp are obviated, making the article simple and effective, with no parts liable to be lost or mislaid.

Having thus fully described the nature of my invention, what I claim herein as new, and desire to secure by Letters Patent, is—

As a new article of manufacture, a card-clothing clamp constructed with forked braces to sustain and strengthen the ends of the clamp-jaws so that they cannot spring or yield, and with looped ends for the operating-strap, all substantially as and for the purposes described.

JOSHUA O. LEWIS.

Witnesses:

H. L. FULLER,  
J. HENRY HILL.