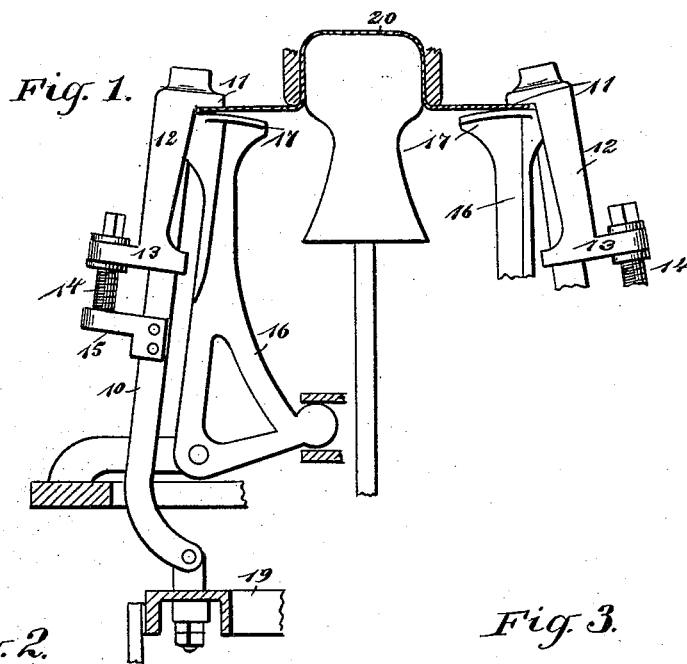


(No Model.)

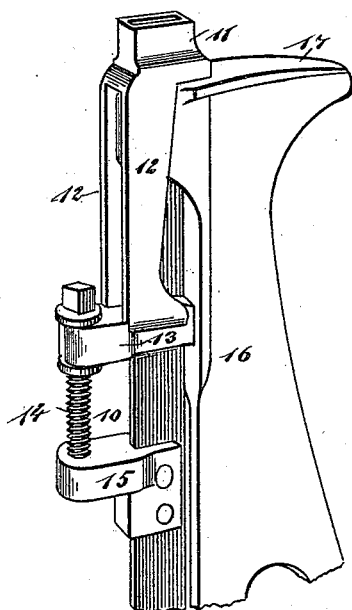
A. W. HILSINGER.  
HAT BLOCKING AND STRETCHING MACHINE.

No. 490,563.

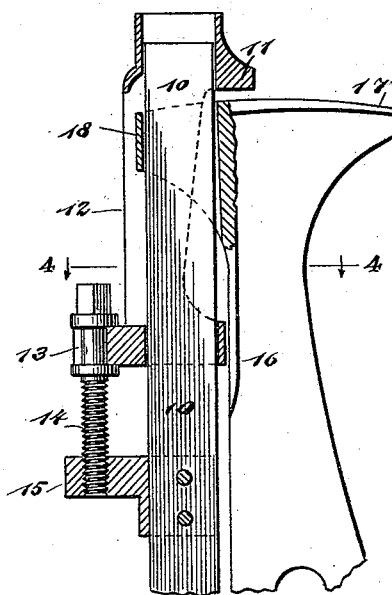
Patented Jan. 24, 1893.



*Fig. 2.*



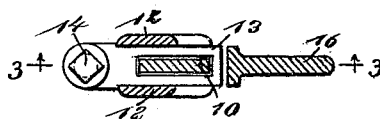
*Fig. 3.*



WITNESSES:

*J. A. Griswold*  
*C. Sedgwick*

*Fig. 4.*



INVENTOR

*A. W. Hilsinger*  
BY *Munn & Co*

ATTORNEYS.

# UNITED STATES PATENT OFFICE.

ADIN W. HILSINGER, OF ORANGE, NEW JERSEY.

## HAT BLOCKING AND STRETCHING MACHINE.

SPECIFICATION forming part of Letters Patent No. 490,563, dated January 24, 1893.

Application filed April 11, 1892. Serial No. 428,653. (No model.)

*To all whom it may concern:*

Be it known that I, ADIN W. HILSINGER, of Orange, in the county of Essex and State of New Jersey, have invented a new and useful Improvement in Grippers for Hat-Blocking Machines, of which the following is a full, clear, and exact description.

My invention relates to grippers for hat-blocking machines, and has for its object to so construct the grippers that each will be capable of individual adjustment, and therefore the hat body to be manipulated or to be operated upon may be held firmly by each gripper employed in the construction of the hat-blocking machine.

The invention consists in the novel construction and combination of the several parts, as will be hereinafter fully set forth and pointed out in the claims.

Reference is to be had to the accompanying drawings forming a part of this specification, in which similar figures of reference indicate corresponding parts in all the views.

Figure 1 is a partial vertical section through the cone body of a hat blocking machine, illustrating the application of my invention to the grippers of the machine; Fig. 2 is a perspective view of one of the grippers having the improvement applied thereto; Fig. 3 is a partial vertical section through one of the improved grippers, the section being taken practically on the line 3—3 of Fig. 4; and Fig. 4 is a transverse section which is taken practically on the line 4—4 of Fig. 3.

Heretofore in this class of machinery it has been customary to so construct the grippers that their adjustment to and from the material to be blocked has been collectively accomplished, and as heretofore stated it is the object of this invention to provide a means whereby each gripper may be independently adjusted. Therefore, the adjusting bar 10 of a gripper, which usually carries the upper jaw, is made straight throughout its length, or practically so, and the upper jaw 11, is held to slide upon this adjusting bar, being provided with side ears 12, which ears are attached to or formed integral with a sleeve 13, at their lower ends, the said sleeve being capable of sliding upon the adjusting bar. This sleeve extends outward beyond the rear edge of the adjusting bar, and is fitted with an ap-

erture to receive an adjusting screw 14, which screw is manipulated through the medium of any approved form of key, wrench, or equivalent tool, the lower end of the adjusting screw being adapted to enter a threaded aperture in a lug 15, horizontally projected from the main adjusting bar 10, as is best shown in Figs. 2 and 3. The usual lever arm 16, carrying the lower jaw 17 of the gripper, is provided with a strap 18 at or near its upper end and encircling the adjusting bar 10, and by this means the adjusting bar and the lever are moved simultaneously in the same direction and parallel. The lower end of the adjusting bar 10, is connected with the usual adjusting ring 19, as illustrated in Fig. 1. The grippers having once been set, that is, the upper jaws having been placed in proper relation to the lower jaws and the ring 19 manipulated to admit the brim portion of the hat body 20 to be blocked, after the ring 19, is manipulated to cause the grippers to clamp the brim it may be found that some of the grippers do not obtain proper purchase upon the brim, whereupon, through the medium of the invention above set forth, the adjusting screws 14 may be expeditiously, conveniently and independently manipulated in such a manner as to cause the jaws of each gripper to obtain a firm hold upon the brim of the hat to be blocked.

The advantages of such a construction as that above set forth are obvious, and therefore I will not mention any.

Having thus described my invention, I claim as new and desire to secure by Letters Patent,—

1. In a hat blocking machine, the combination with the adjusting bar and the upper jaw sliding longitudinally thereon and means for adjusting said jaw along the bar, of an arm or bar having a sliding connection with the adjusting bar and provided with the lower jaw, substantially as set forth.

2. In a hat blocking machine, the combination with the two pivoted bars or levers having a loose connection at or near their upper ends, one bar having the lower jaw on its upper end, of the upper jaw overhanging the lower jaw, and sliding longitudinally on the other bar or lever, and a longitudinally extending adjusting screw connecting said upper jaw

with its carrying bar or lever, substantially as set forth.

3. In a hat blocking machine, the combination with the adjusting ring 19, the bar or lever 10 pivoted at its lower end thereto and having a lug 15, the sliding jaw 11 on the said bar or lever, and the set screw 14 extending down through a projection on the lower end of said jaw into said lug 15 to adjust the jaw

up or down, of the bell crank lever 16 having to the lower jaw 17 on its upper end and a strap 18 loosely embracing the bar or lever 10, substantially as set forth.

ADIN W. HILSINGER.

Witnesses:

THOMAS DAVIS,

WINFIELD S. WENDELL.