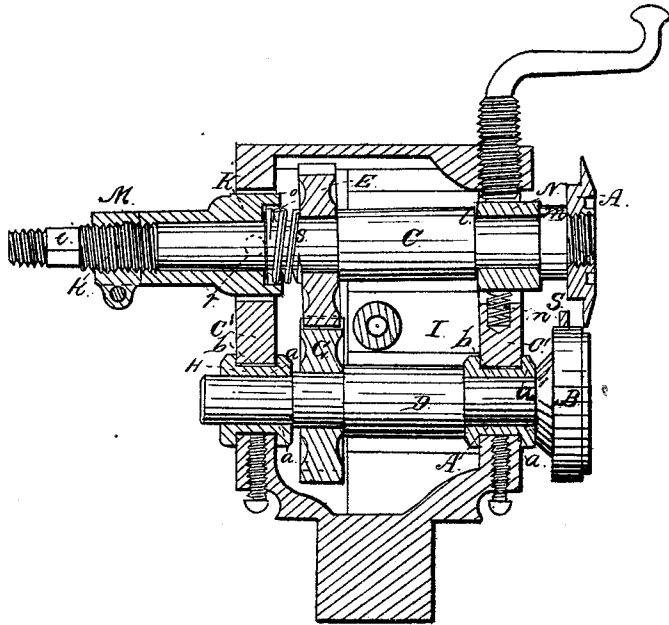


B. Buckland.

Tinsmith's Machine.

N^o 91,209.

Patented Jan. 15, 1869.



Witnesses.

W. R. Nalkey.

Stephen Trakley

Inventor

Bradford Buckland

By James Shepards, Atty.

United States Patent Office.

BRADFORD BUCKLAND, OF PLANTSVILLE, CONNECTICUT, ASSIGNOR TO S. STOW MANUFACTURING COMPANY, OF SAME PLACE.

Letters Patent No. 91,209, dated June 15, 1869.

IMPROVEMENT IN TINSMITHS' MACHINE.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, BRADFORD BUCKLAND, of Plantsville, in the county of Hartford, and State of Connecticut, have invented certain new and useful Improvements in Tinsmiths' Machines; and I do hereby declare that the following is a full, clear, and exact description thereof, which will enable those skilled in the art to make and use the same, reference being had to the accompanying drawing, making a part of this specification, which drawing is a vertical and longitudinal section of my invention.

My invention is designed as an improvement on a tinsmith's machine patented by O. W. Stow, November 12, 1867; and consists in the peculiar arrangement for the endwise adjustment of the upper shaft, as hereinafter fully described.

The machine patented by Stow has been manufactured in duplicate parts, so that when one of the parts shall fail, a duplicate of the same can be readily substituted in its place.

In the said patent of Stow, the endwise adjustment of the upper shaft was effected by a rotary screw-bearing, screwed directly into a rocker-shaft. It has been somewhat difficult to always thread the inside of the rocker-shaft, so as to insure a good fit of the duplicate of the rotary screw-bearing.

To produce the same adjustment of the upper shaft in a much less expensive manner, and by parts that are easily duplicated, is the object and result of my invention.

The machine shown in the drawing is what is termed a tinsmith's flanging-machine. My improvement is equally applicable to any of the machines of like character in which Stow's patent is applicable.

The rocker-bearing or shaft K is fitted to swing or rock in the frame, on pivots or journals, the position of which is indicated by the broken circle, and also shown and described in Stow's patent.

I dispense with the set-nut and rotary screw-bearing employed by Stow, and make the rear bearing for the shaft C directly in the rocker-bearing or shaft K.

On the front or inside of the rocker-shaft K, I form a suitable annular recess, *o*.

Around the shaft C, I place a spiral spring, *s*, one end of which spring bears against the gear-wheel E, and the other end rests in the annular recess *o*, and bears against the washer *r* or directly against the rocker-shaft K, as desired.

With the exception of the rocker-shaft K, recess *o*, spring *s*, and washer *r*, the machine is substantially the same as shown and described in Stow's patent.

When this machine, or any of the same class of tinsmiths' machines, is used, all the endwise pressure or power exerted on the upper shaft C has a tendency to throw the shaft forward. It is therefore only necessary to keep the shaft C forward, so that when the flanging roller A is brought in contact with the lower roller B, the same shall meet each other in their proper positions.

The arrangement of the spring *s*, as shown, is all that is necessary or desirable to hold the shaft C forward, while its backward movement can be adjusted with as great nicety as may be desired, by means of the clamp-nut M.

The shaft C is squared at *i* for receiving a wrench, when desired.

What I claim as new, and desire to secure as my improvements by Letters Patent, is—

The combination of the spring *s*, rocker-bearing or shaft K, and the shaft C, substantially as described, and for the purposes set forth.

BRADFORD BUCKLAND.

Witnesses:

JAMES SHEPARD,
W. R. WALKLEY.