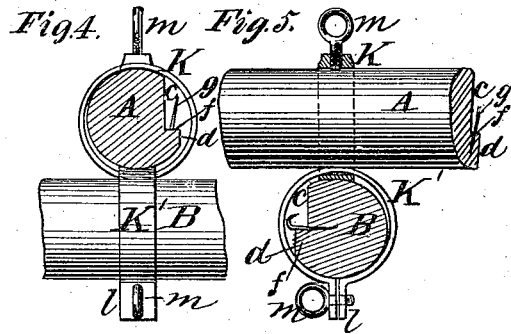
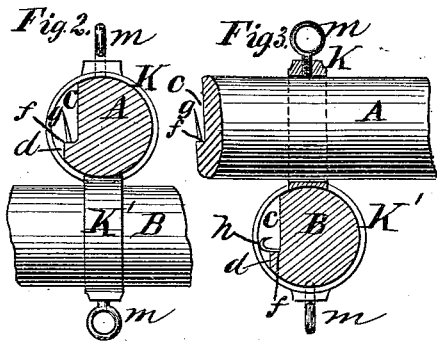
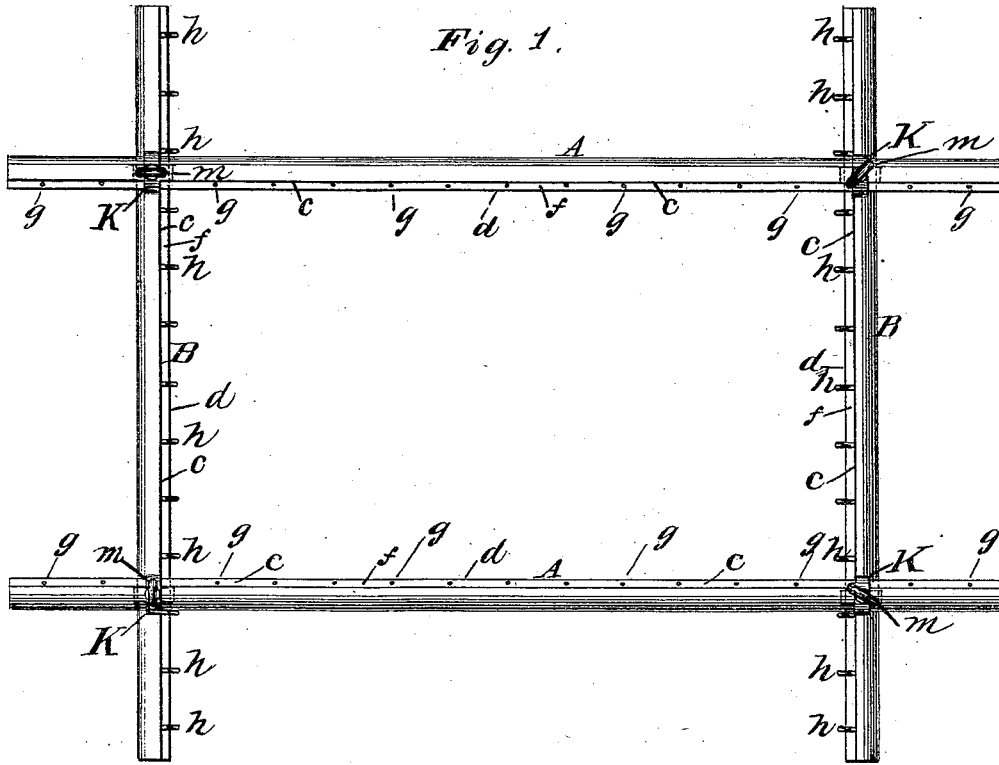


A. WARREN.
 QUILTING-FRAMES.

No. 187,205.

Patented Feb. 6, 1877.



Witnesses
 John Becker
 W. H. Hayes

Albert Warren
 by his Attorneys
 Rowntree Allen.

UNITED STATES PATENT OFFICE.

ALBERT WARREN, OF JEFFERSON, OHIO.

IMPROVEMENT IN QUILTING-FRAMES.

Specification forming part of Letters Patent No. 187,205, dated February 6, 1877; application filed December 27, 1876.

To all whom it may concern :

Be it known that I, ALBERT WARREN, of Jefferson, in the county of Ashtabula and State of Ohio, have invented an Improvement in Quilting-Frames and Curtain-Stretchers; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawing, which forms part of this specification.

My invention consists in the combination of the bars of a quilting-frame or curtain-stretcher of double clamping-rings and clamping-screws, for adjusting and holding the bars of the frame, as hereinafter described.

Figure 1 in the accompanying drawing represents a top view of my improved quilting-frame or curtain-stretcher. Figs. 2 and 3 are detailed views representing double clamping-rings used to clamp the separate bars of the frame together, as hereinafter set forth. Figs. 4 and 5 represent modified forms of the clamping-rings, and insertion of the clamping screws.

A represents the front or upper bars of the frame, and B the back or lower bars of the same. Both the front or upper, and the back or lower, bars of the frame are of cylindrical or approximately cylindrical form, with a groove, *c*, in one side thereof. The bars are, moreover, cut away to leave a flat or nearly flat surface, *d*, nearly at right angles with the bottom *f* of the grooves *c*.

In the bottoms of the grooves *c* are inserted sharp-pointed pins *g*, or sharp-pointed hooks *h*, for attaching the margins of the material to be extended or stretched to the bars. Either the hooks or pins may be used in both the front or upper and the back or lower bars; but it may be preferable to use pins in the upper bars and hooks in the lower, or contrariwise.

The bars A and B are clamped and held in position, as shown in Fig. 1, by means of double clamping-rings, K K', and clamping-screws, *m*, as shown in Figs. 1, 2, and 3. Said double clamping-rings are preferably joined together, as shown in Figs. 1, 2, and 3. They are formed of a single cruciform plate of metal, opposite arms of which are bent in opposite directions into rings, and the ex-

terminities of the bent arms are then overlapped and rigidly joined by soldering or otherwise, and in such a manner that, when in the position shown, they have their horizontal diameters at right angles with each other. The clamping-screws *m* are inserted through the rings, as shown, and serve to clamp the bars A and B to the rings in such a manner as not only to prevent said bars from slipping longitudinally in said rings, but also to prevent the said bars from turning on their longitudinal axes when clamped.

But I do not limit myself to the precise construction of the double clamping-rings, as above described, nor to the precise manner of inserting the clamping-screws shown in Figs. 1, 2, and 3. Instead of having the said double rings rigidly joined together they may pass through each other like the links of a chain, as shown in Figs. 4 and 5, and the ends of the plates forming said rings may be provided with lugs *l*, Figs. 4 and 5, through which the clamping-screw may pass, or the ends of the rings may overlap each other without being rigidly joined, and held by the clamping-screws passing through said overlapped ends, these modifications in no wise affecting the general action of the double clamping-rings.

The insertion of the pins *g* or hooks *h* in the bottoms *f* of the grooves *c* in the bars A and B, and the flattened portions *d* of the said bars below the said bottoms of said grooves, enables the attachment of the margin of the material to be readily and firmly effected, and, on account of the position of the said pins or hooks relatively to the outer surfaces of the bars, the attached material to be quilted or stretched may be rolled around the bars without danger of tearing said material in rolling or unrolling the same.

I claim—

The combination of the bars A and B of a quilting-frame or curtain-stretcher, the double clamping-rings K K', and clamping-screws, *m*, substantially as and for the purpose described.

ALBERT WARREN.

Witnesses :

E. J. BETTS,
C. H. SIMONDS.