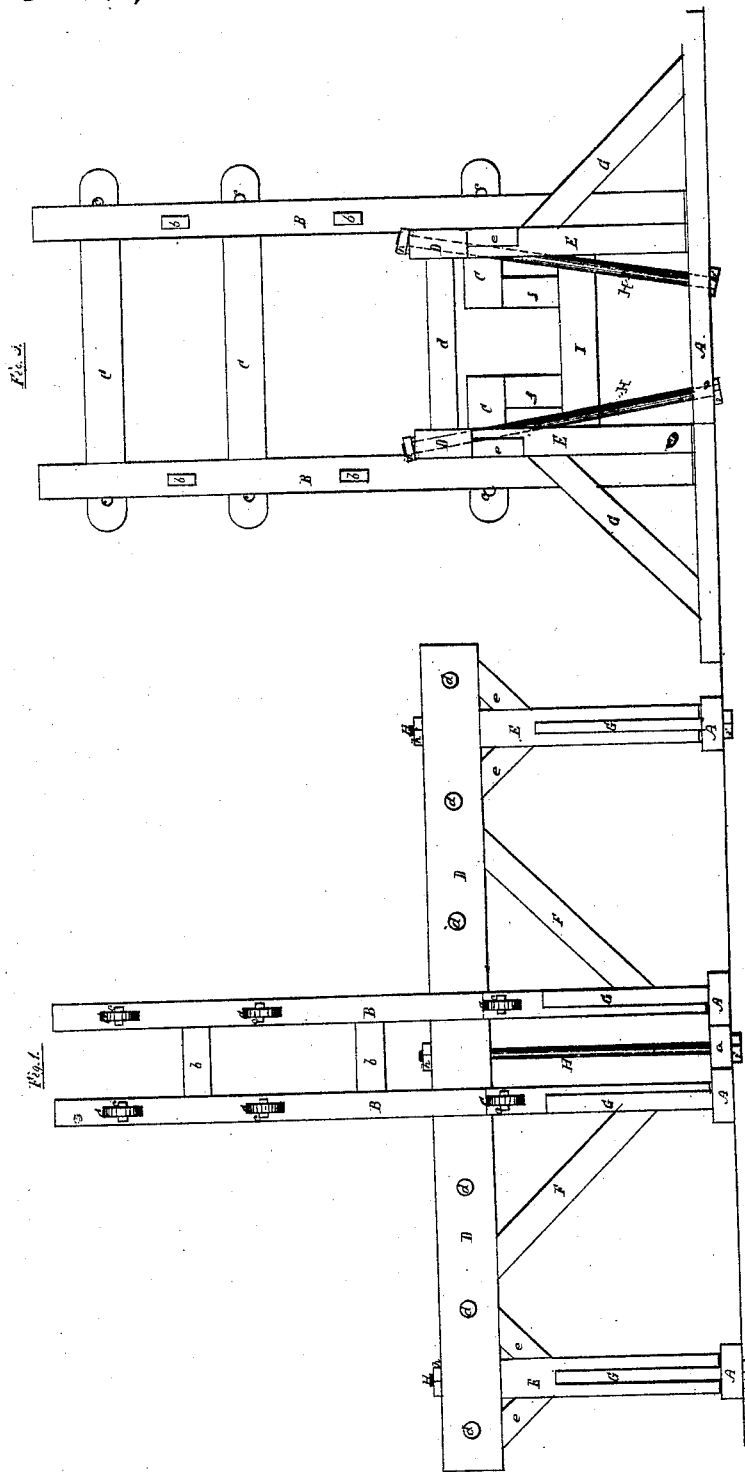


J. Morgan,
Portable House.
No. 1,5734. Patented Jan. 3. 1865.



Witnesses:
J. B. Woodruff
H. J. Harwood

Jacob Morgan,
By his atty.,
J. L. Brown

UNITED STATES PATENT OFFICE.

JACOB MORGAN, OF DUNDEE, OHIO.

IMPROVED MODE OF CONSTRUCTING FRAMES FOR PORTABLE HOUSES.

Specification forming part of Letters Patent No. 45,734, dated January 3, 1865.

To all whom it may concern:

Be it known that I, JACOB MORGAN, of Dundee, in the county of Tuscarawas and State of Ohio, have invented a new and Improved Portable Saw-Mill Frame; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, making part of this specification—

Figure 1 being a side elevation of the frame; Fig. 2, an end elevation thereof.

Like letters designate corresponding parts in both figures.

To construct my improved frame, I employ cross-sills A A A A at the base—one at each end, and either one broad one in the middle, or better, two, of ordinary width—framed together by ties *a a*, as shown in the drawings.

The end sills, E E, support each two posts, G G, of the height required, and upon these four posts two long sleepers, D D, rest near their ends. These sleepers are framed together by ties *d d*, and serve as a foundation for the mill-carriage to run on. From the middle sills two long posts, B B, on each side, framed together by ties *b b*, ascend outside of the sleepers D D, and high enough above them to mount the saw or gang of saws between them. Cross-beams C C C connect the two pairs of these posts, being secured in the posts by long tenons and keys *c c c*, as shown, so that they may be removable at pleasure. The lower beams are interrupted by a space in the middle, as shown in Fig. 2, the cross-connection being completed by auxiliary beams I I, lower down, and united to the beams C C by vertical timbers *f f*. This arrangement allows free room for the working gear of the saw or saws beneath. These lower beams

help support the sleepers D D in the middle.

The frame is strengthened, first, by a system of braces, G G G G, between the cross-sills A A A A and the posts B B E E, on each outside; and, second, by another system of braces, *c c c c*, between the posts E E and sleepers D D, and of F F, between the posts B B and said sleepers, all in planes at right angles to the planes of the first system of braces. All these braces are simply inserted, without fastenings, in their respective mortises at both ends, and they are all made a little too long to allow the sills, posts, and sleepers to come close together in framing. Then a set of about three iron rods, H H H, on each side, extends up through the sills, or their connecting-ties, and through the sleepers, substantially as shown in the drawings. On the lower ends of these rods are heads *i i i*, and on their upper ends screw-threads to receive nuts *h h h*. Thus, by screwing on the nuts, the sills, posts and sleepers are drawn firmly together, till their braces bring the whole frame most rigidly into one hole. In this manner a very strong as well as light frame is made, and one which can be taken apart and put together again in a very few minutes.

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

A portable saw-mill frame constructed and arranged with braces and tightening-rods, substantially as herein specified.

The above specification of my improved portable saw-mill frame signed by me this 23d day of June, 1864.

JACOB MORGAN.

Witnesses:

DAVID SEESE,
SOLOMON MYERS.