J. R. DAVIS.

Portable Roof for Sheltering Grain.

No. 216,606. Patented June 17, 1879.

Fig. 1.

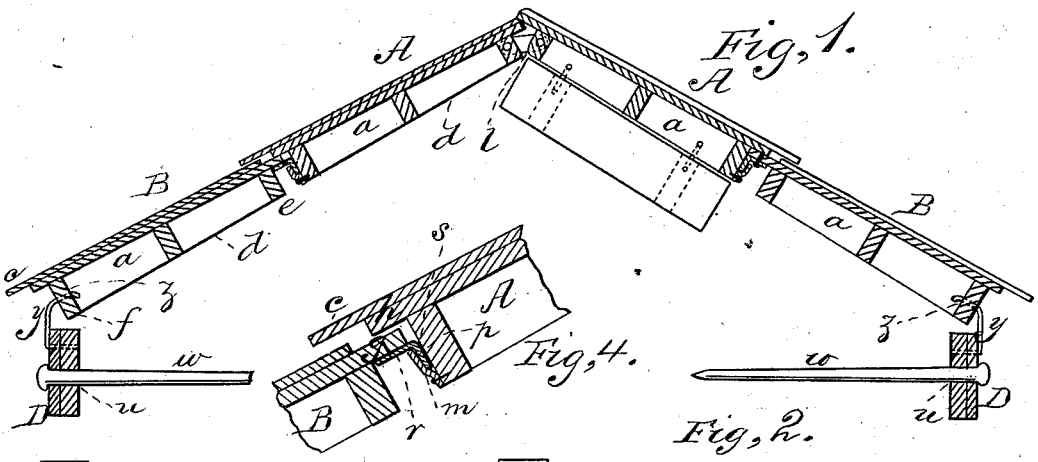
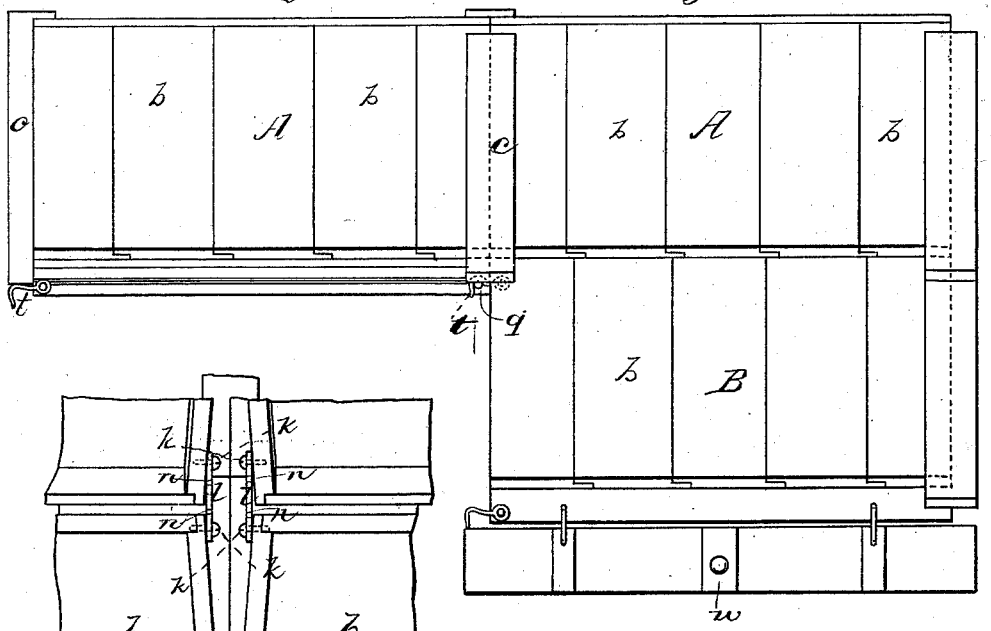


Fig. 4.

Fig. 2.



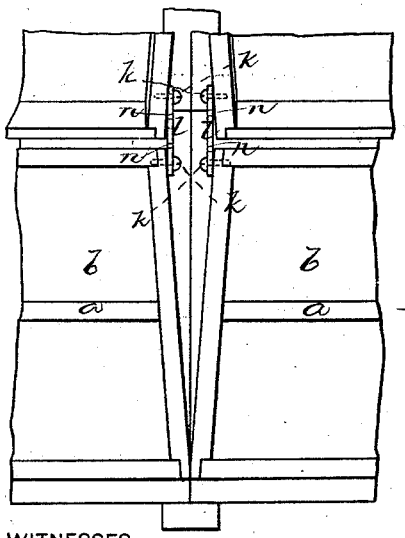


Fig. 3.

WITNESSES

Villette Anderson.

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UNITED STATES PATENT OFFICE.

JOHN R. DAVIS, OF SUN PRAIRIE, WISCONSIN.

IMPROVEMENT IN PORTABLE ROOFS FOR SHELTERING GRAIN.

Specification forming part of Letters Patent No. **216,606**, dated June 17, 1879; application filed April 21, 1879.

To all whom it may concern:

Be it known that I, J. R. DAVIS, of Sun Prairie, in the county of Dane and State of Wisconsin, have invented a new and valuable Improvement in Portable Roofs for Sheltering Grain; 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 annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a vertical section of this invention. Fig. 2 is a top view. Fig. 3 is a bottom view, and Fig. 4 is a sectional detail of the construction.

This invention has relation to means for sheltering hay, grain, and other articles; and it consists in the construction and novel arrangement of lapping sections having sliding connections, and otherwise attached together and arranged, as hereinafter shown and described.

In the accompanying drawings, the letter A designates the ridge-sections, and B the eave-sections, or extensions connected to the ridge-sections. Each of these sections is made of boards matched together and nailed to a frame, *a*, which is rectangular, or nearly rectangular, in form. The boards *b*, forming the covering of each section, are matched together and set in tar or paint to make their joints water-proof.

Each section is provided on one side with a narrow batten, *c*, laid on its upper surface, and projecting over the edge one-half its width to lap over the joints between the sections when placed side by side.

The frame *a* is made of end and side strips strongly joined together at the corners. The side strips, *d*, are somewhat tapering, being a little deeper at their lower than at their upper ends, and the upper end strip, *e*, is consequently narrower than the lower end strip, *f*. This construction is designed to allow the sections to be fastened from below, the upper lap or cover projection, *g*, of the lower section being placed under the lower lap, *h*, of the higher section, in which position the framing will be even on its under side at the joined parts, and will lie properly on the stack or pile.

The covering-boards of each section, as stated above, lap over the framing a little at the ends, but are flush therewith at the sides, except in the ridge-sections, where the frame-sides slant toward each other slightly from bottom to top, so as to give room for the screws *k* and hinge-straps *l*, which connect the ridge-sections, while allowing the coverings to come close together at the side edges.

The ridge-sections are connected by the hinge-straps *l*, which are usually provided with several adjusting-holes, *n*, so as to vary the angle or slant of the ridge, according to requirement. These sections, when connected in this manner, may be folded over on each other for convenience of transportation and storage.

The extension-sections B are connected to the preceding upper sections in the following manner: Each ridge-section or upper section is provided with a longitudinal strip, *m*, extending along the outside of its lower frame-strip, from the bottom thereof, partly toward the upper edge, and longitudinally bent or otherwise formed to provide a slideway, *p*, between the upper portion of said strip and the frame.

Each lower section is provided with a longitudinal strip, *r*, which is secured to the lapping portion of the cover-boards underneath, and is bent downward or otherwise formed to provide a downward marginal slide-flange, *s*, which is designed to engage with the way-strip *m* of the upper section when the cover-lap of the lower section is slid under the cover-lap of the upper section, these laps serving as stops to prevent upward disengagement of the slide-joint.

It is apparent that these extensions may be added indefinitely by using similar sliding joints at their ends. Laterally the sections are connected by means of hooks *t* and studs *q*, the side battens, *c*, covering the joints and bracing them in a firm manner.

In order to keep the roof on the stack or rick, the eave-sections and gable-sections are anchored by means of frieze-boards D, which are fastened to said sections by means of hooks *y*, which are inserted into holes *z* in the frame-pieces of the sections. Through suitable apertures *u* in these frieze-boards are inserted

long anchoring-pins *w*, which extend into the hay or grain several feet, thereby securing a firm hold to bind the roof to the stack or rick.

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

A portable roof for hay or grain, consisting of hinged gable-sections A and extension-sections B, having end laps, *g h*, and side battens, *c*, sliding connections *m s*, hook-fastenings *t*, frieze-boards D, and anchoring-pins *w*, substantially as specified.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

JOHN R. DAVIS.

Witnesses:

CHARLES G. CROSSE,

GEORGE B. LEONARD.