(No Model.)

J. K. CALDWELL.

BRICK DRYING STRUCTURE.

No. 334,107. Patented Jan. 12, 1886.

Fig. 1.

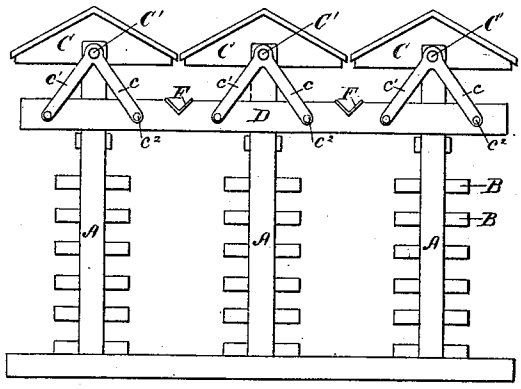


Fig. 2.

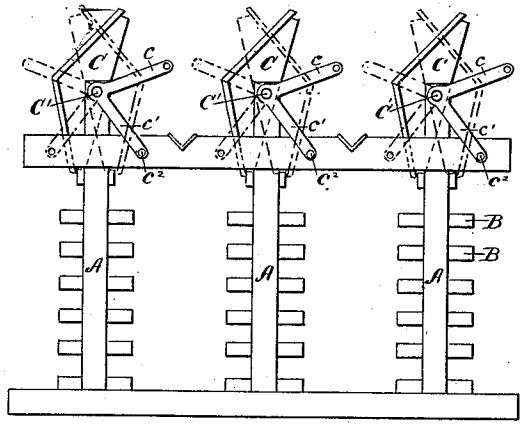


Fig. 3.

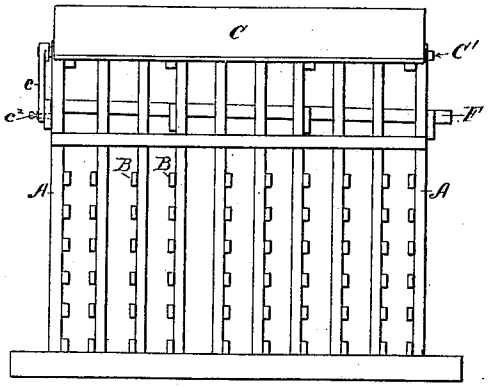
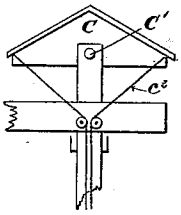


Fig. 4.



Witnesses

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UNITED STATES PATENT OFFICE.

JOHN K. CALDWELL, OF PORTER STATION, INDIANA.

BRICK-DRYING STRUCTURE.

SPECIFICATION forming part of Letters Patent No. 334,107, dated January 12, 1886.

Application filed June 16, 1885. Serial No. 168,840. (No model.)

To all whom it may concern:

Be it known that I, JOHN K. CALDWELL, a citizen of the United States, residing at Porter Station, in the county of Porter and State of Indiana, have invented certain Improvements in Brick-Drying Structures, of which the following is a specification.

My invention relates particularly to the construction of sheds or structures under which common or pressed bricks are dried before burning; and the objects I have in view are to provide a shed with a top or roof that shall exclude water from the bricks, but can be quickly and easily opened to admit sunlight and air, and can be as quickly closed when it is desired to cover the bricks.

It is usual in manufacturing these bricks to pile them for drying on palettes or boards beneath sheds having roofs composed of loose boards. In pleasant weather and during the day these roof-boards are removed, or part of them are removed and piled on the others in the roof, so that sunlight and air may pass to the bricks. These boards must be replaced every night, and whenever there is danger of rain. This is a tedious and slow operation, and often the bricks are wet before all of the boards can be put in place.

I provide a structure having a roof or roofs that can be opened and closed in a few minutes; and my invention consists, generally, in the construction and combination of devices hereinafter described, and particularly pointed out in the claims.

In the accompanying drawings, forming part of this specification, Figure 1 is an end elevation of my improved drying-structure. Fig. 2 is an end elevation with the roofs tilted. Fig. 3 is a side elevation; Fig. 4, a detail.

In the drawings, A A represent the standards supporting the pickets B B, upon which the palettes or boards B′ B′ are placed, having the bricks thereon, and where they remain while the bricks are being dried.

C C C represent a series of roofs, preferably of the hipped form, shown mounted on the standards A.

C′ C′ are rods supported in the upper ends of standards A A, the roofs being carried directly upon these rods. The rods may be either journaled in the ends of the standards, with the roofs rigidly secured to them, so that by turning the rods the roofs may be tilted, or the roofs may be free to turn on the rods. In the first instance I prefer to attach to the ends of the rods C two arms, *c c′*, placed at an angle to each other. When the roof is horizontal, these arms occupy the position shown in Fig. 1, being then adapted to be secured to a cross-bar, as D, by pins c^2, or other suitable means. When the roof is turned in either direction to a nearly vertical position, the arm upon that side toward which the roof is tilted moves to the position on the cross-bar before occupied by the other arm, and may be secured by passing its pin through the hole in the cross-bar. When the roof is mounted to turn loosely on the rod C′, suitable cords or chains, as c^3, may be used for operating the roof. The roofs are free to turn in either direction, and may be placed in a nearly vertical position, as shown in the drawings, or may be tilted in the opposite direction to the nearly vertical position, as shown.

Any suitable means may be used for turning or holding the roofs. The pickets B B extend on either side of the standards A only far enough to receive the palettes B′ B′, which are usually about nine inches wide. An alley, E, is thus left between the several sheds and under the roofs. This alley is protected from rain, so that workmen may be employed under the sheds even in wet weather. The bricks, after being re-pressed, are placed upon barrows or trucks and wheeled into the alleyways beneath the sheds. The bricks are placed on palettes, usually before being put on the trucks, and these palettes are removed from the trucks and placed on the pickets beneath the sheds. When the bricks are dry, the palettes are removed from the pickets, again placed on trucks, and wheeled out the opposite ends of the sheds to the kiln.

In order that no water may pass from the roofs into the alley-ways, and thereby splash dirt and water on the bricks, I provide the spouts or troughs F, which are located under the contiguous edges of the roofs C C.

D D are cross-bars secured to the uprights or standards A A at the ends of the roofs, and at such other points as may be necessary, to tie the sheds together and to properly sustain the spouts, which rest thereon at a distance below the rods C′ equal to about one-half the width

of each roof. This arrangement brings the spouts into such position that they do not interfere with the turning of the roofs. All the standards A under each roof may extend to the rod C′, or only a sufficient number to properly sustain the roof need extend to this point. The outer sides of the two outer sheds of the series may be protected by shutters or otherwise.

I have shown a structure consisting of three roofs, but do not limit myself to any particular number. As many as may be desired may be used. The roofs are of any convenient length, as from one hundred to one hundred and fifty feet. Where long sheds are used, the roofs may be made in sections, so as to make it easier to open and close them. I generally locate these structures with the roofs running north and south. In the morning the roofs may all be turned to bring their under sides toward the east, and in the afternoon to bring them toward the west. By this arrangement the sun's rays are permitted to reach all parts of the structure.

I am aware of patent to James Blum, No. 296,814, granted April 15, 1884, and I claim nothing therein shown or described.

I claim as my invention—

1. A brick-drying structure comprising a series of supporting-standards and a series of pivoted roofs constructed to turn in either direction, and arranged with their edges in close proximity to each other, and means for turning the roofs, all substantially as described.

2. The combination, with a series of supporting-standards, of the pivoted roofs C, constructed to turn in either direction, the spouts F, means for supporting the spouts beneath the edges of the roofs, and means for turning the roofs on their pivots, all substantially as described.

3. The combination, in a brick-drying structure, with the supporting-standards, of the centrally-pivoted roof C, adapted to turn in either direction upon its pivots to expose either side of the bricks to the rays of the sun, and means for turning said roof, all substantially as described.

4. The combination, with the standards A, of the rod C′, journaled in said standards, the roof C, secured to said rod, arms *c c′*, and means for fastening said arms, whereby the roof may be held when in a horizontal position, or when tilted in either direction, all substantially as described.

In testimony whereof I have hereunto set my hand this 4th day of May, 1885.

JOHN K CALDWELL.

In presence of—
JAS. E. WOODFORD,
A. C. PAUL.