S. Bartlett,

Cheese Press.

No. 2,469. Patented Feb. 28, 1842.

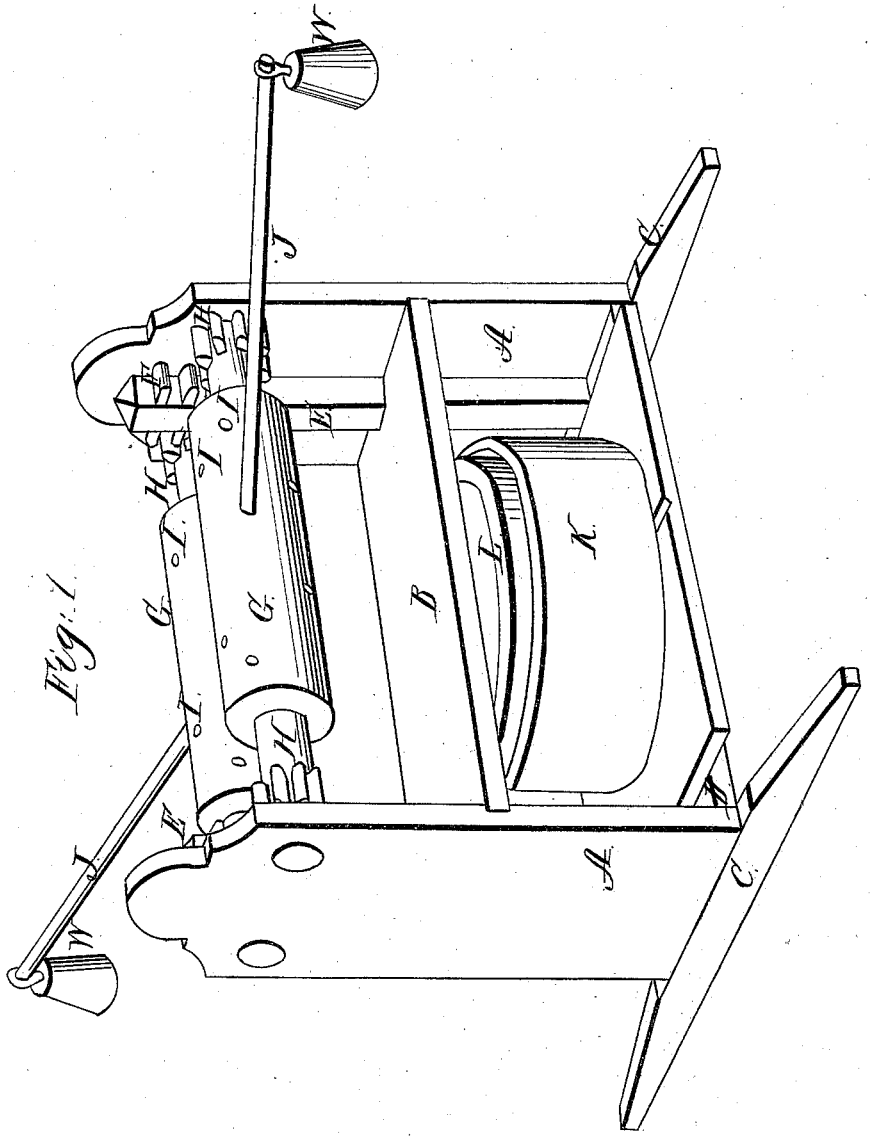

Fig. 1.

THE HELIOTYPE PRINTING CO. 220 DEVONSHIRE ST. BOSTON.

UNITED STATES PATENT OFFICE.

SYLVANUS BARTLETT, OF HOCKING COUNTY, OHIO.

CHEESE-PRESS.

Specification of Letters Patent No. 2,469, dated February 28, 1842.

To all whom it may concern:

Be it known that I, SYLVANUS BARTLETT, of Hocking county, State of Ohio, have invented a new and useful Improvement in machines for pressing cheese, cider, hay, &c., and for all other purposes where a regular, constant, and progressive pressure is required, of which the following is a specification.

The frame of the press will consist of two upright posts (A, A,) a cross piece (B,) and two pieces for the sills or feet (C, C,) of the following dimensions: the side pieces or posts (A,) to be 10 inches wide, 1½ inches thick and 2 feet and 2 inches long and framed by double tenons into the sills or feet (C,) the feet will be of the same thickness with the posts, 4 or 5 inches wide and 2 feet and 4 inches long.

In order to render the press as light as possible, consistent with a due regard to strength, the feet (from where the posts are inserted) may be tapered down to about one fourth their width in the middle. The cross beam or bed (B) will be 2 inches thick, 10 inches wide and 2 feet and 3 inches long, and framed into the posts horizontally by double tenons, 12 or 14 inches above the lower edge of the feet. The space between the posts, when the frame is completed, should be 2 feet in the clear. This is all that is necessary to construct the frame of the press.

The follower (D,) (below the cross beam or bed (B)) consists of a flat piece of timber, 10 inches wide 2 inches thick and 2 feet long, so as to play up and down closely but freely between the upright posts. The cheese or substance to be pressed, inclosed in a hoop (R,) with follower (L,) is intended to be placed upon this platform or follower and to be lifted up so as to be compressed between said follower and the cross beam or bed (B,) above. The two upright bars (E, E) are to be 2 inches square, inserted at the lower ends into the follower (D,) and passing up through mortises in the cross beam or bed (B) so as to fit closely, yet slide easily up and down, by means of cast iron racks (F, F) about 6 or 8 inches long with 8 or 10 cogs or teeth, similar to the teeth or cogs of a common jack, and two axles (G, G) two feet long with a journal at each end about 2 inches diameter turning in corresponding holes in the posts of the frame, near the top, and with cast iron cog wheels (H, H,), 4 inches diameter to match the teeth of the racks (E, E,) the eyes of the cog wheels to be 2 inches square, the diameter of the axles or rollers (G, G,) between the cog wheels to be 4 to 6 or 8 inches diameter with holes (I, I, I, &c.) properly arranged for the insertion of one or more levers (J, J,) 2 or 3 feet in length, with weights (W, W,) suspended from their outer ends. In small presses one of the axles or rollers, &c., may be dispensed with and the upright bars kept steady in their places by blocks or strips nailed to the inner side of the posts of the frame, opposite the remaining rack and roller (these are not attached to the model, but may be readily supplied) 5 to 8 pound weights (W, W,) suspended to the levers (J, J,) are sufficient to press a cheese, placed as before specified, perfectly, evenly and expeditiously, and with the greatest possible ease and convenience. To apply this principle to hay and cider presses and for other purposes when continued and progressive power is required, it will only be necessary to increase the dimensions in the foregoing proportions, so as to secure the proper strength, and employing always two axles or rollers with their appurtenances.

The advantages of this press are manifest, especially in the manufacture of cheese; to wit: perfect exactness and evenness in the pressure upon the cheese, or other substance, secured by the greater steadiness with which the movable follower or platform (D) passes up and down, the greatest power secured and applied in the smallest space and greatest possible convenience and the cheapness and simplicity of the whole.

What I claim is—

The method of constructing and arranging the follower or movable platform and upright bars in combination with the toothed rollers (G G) and weighted levers (J J), that is to say arranging the follower or movable platform (D) below the bed of the press (by which greater steadiness of motion is secured) the upright bars sliding through openings in said bed (B) and having teeth on both sides of them into which the toothed rollers (G G) are geared, the whole being constructed and operating as set forth, the other parts of the press embracing no new principle as I am informed.

S. BARTLETT.

Witnesses:

W. D. BARTLETT,

A. G. BROWN.