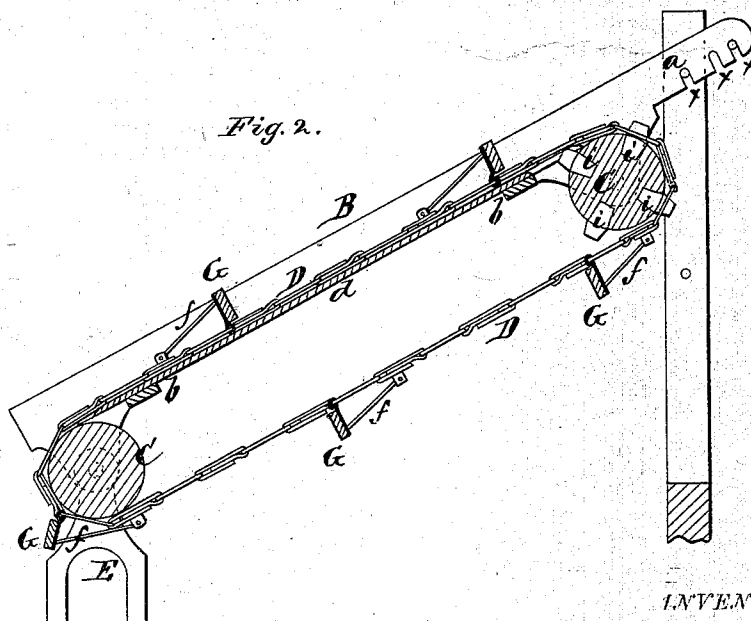
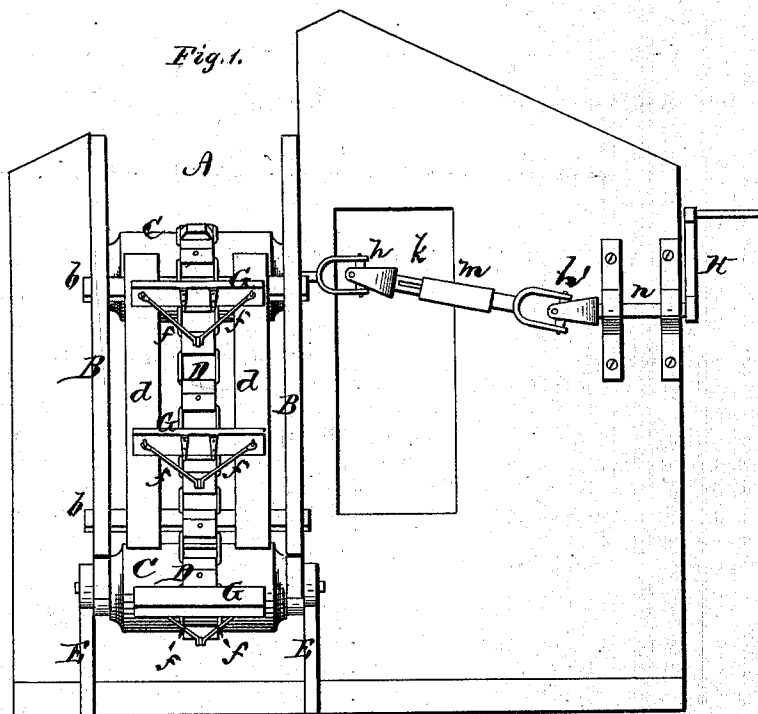


J. S. JOHNSON.
Ice-Elevators.

No. 146,258.

Patented Jan. 6, 1874.



WITNESSES.

Henry N. Miller
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By

INVENTOR

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UNITED STATES PATENT OFFICE.

JOB SMITH JOHNSON, OF CUMBERLAND, MARYLAND.

IMPROVEMENT IN ICE-ELEVATORS.

Specification forming part of Letters Patent No. **146,258**, dated January 6, 1874; application filed November 26, 1873.

To all whom it may concern:

Be it known that I, J. SMITH JOHNSON, of Cumberland, in the county of Alleghany and in the State of Maryland, have invented certain new and useful Improvements in Ice-Conveyers; and do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings and to the letters of reference marked thereon, making a part of this specification.

The nature of my invention consists in the construction and arrangement of a conveyer for carrying ice into an ice-house for storage, as will be hereinafter more fully set forth.

In order to enable others skilled in the art to which my invention appertains to make and use the same, I will now proceed to describe its construction and operation, referring to the annexed drawing, in which—

Figure 1 is a front view, and Fig. 2 a longitudinal section, of my invention.

A represents the doorway of an ice-house, in each side of which are inserted pins *a a* for the attachment of the conveyer-frame. The conveyer-frame is composed of two side pieces, B B, connected by means of cross-bars *b b*, and having near each end downward-projecting ears, in which are journaled rollers *c c*. These rollers are so arranged that slats or boards *d d* laid parallel with the side pieces upon, and secured to, the cross-bars *b b* will be on a line with the upper surfaces of the rollers C C. D represents an endless chain passed around the centres of the rollers C C. The upper roller is provided with lugs or projections *i i*, at suitable distances apart, so as to take into the links of the chain and keep the chain moving when said roller is revolved. On the chain D, at suitable intervals, are secured cross-bars

G G, each of which is braced by means of two rods, *f f*, as shown in Fig. 1. On the under side, at the upper end of each side piece B, are notches *x x*, to catch on the pins *a a* in the doorway A. By this means the conveyer-frame may be adjusted to any height desired, the lower end of said frame being supported upon feet E E pivoted to the sides of the frame.

The conveyer is operated by the following means: Upon one journal of the upper roller C is arranged a universal joint, *h*, connecting the journal with a shaft, *k*. This shaft is inserted in a tube or sleeve, *m*, connected by a universal joint, *h'*, with a shaft, *n*, which is supported in suitable bearings on the outside of the ice-house, and provided at the other end with a crank, H, for operating it. By this device the blocks of ice may be conveyed up into the ice-house to any height desired.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. The notched frame B *b d* and swinging feet E E, forming an adjustable frame, in combination with an ice-conveyer, substantially as and for the purposes set forth.

2. The combination, with an ice-conveyer and an adjustable frame therewith, of the universal joints *h h'*, shafts *k n*, sleeve *m*, and crank H, all substantially as and for the purposes set forth.

In testimony that I claim the foregoing, I have hereunto set my hand this 6th day of November, 1873.

JOB SMITH JOHNSON.

Witnesses:

C. L. EVERT,

HENRY W. HOFFMAN.