

No. 640,459.

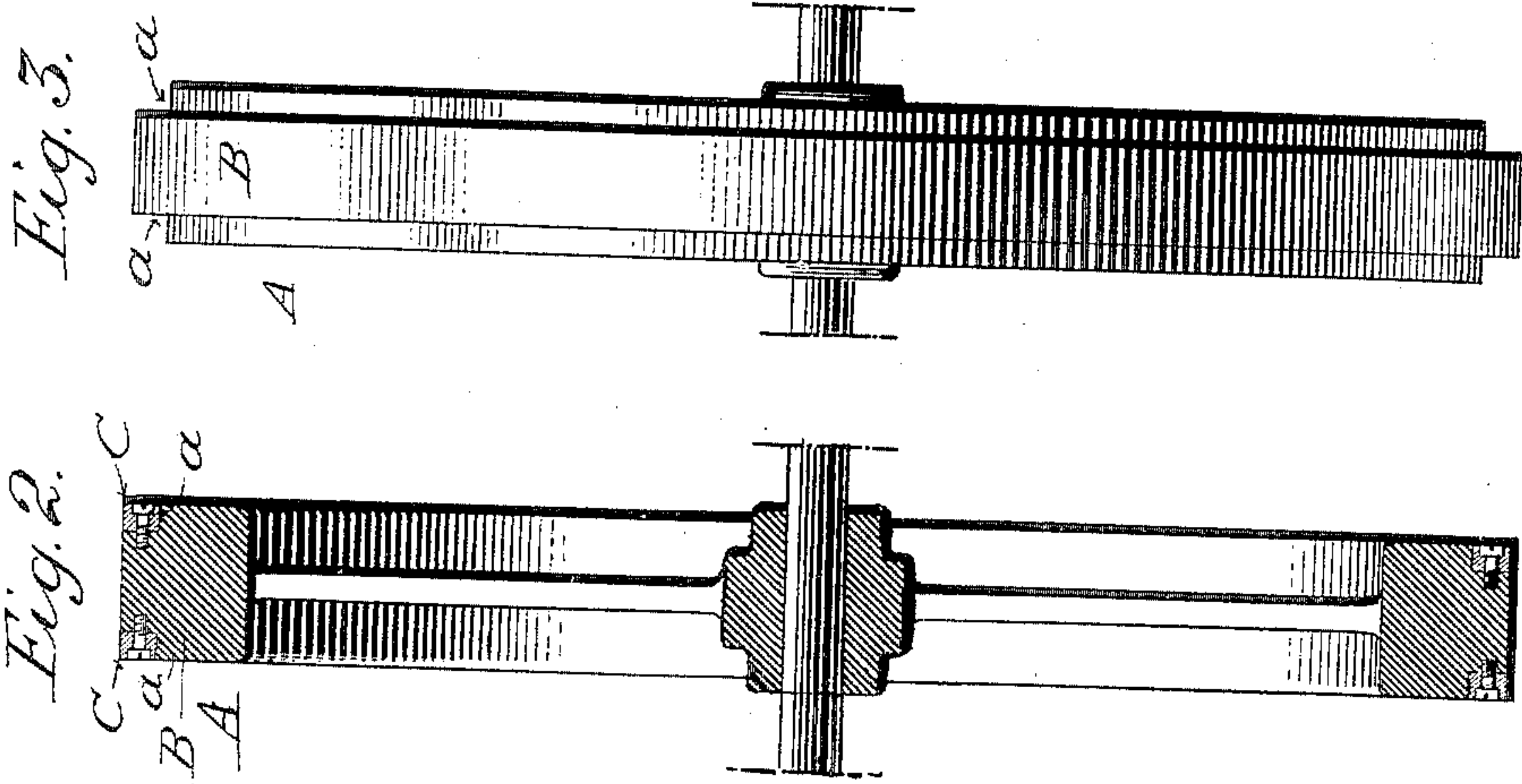
Patented Jan. 2, 1900.

F. S. FARR.

SAW CARRYING WHEEL FOR BAND SAW MILLS.

(Application filed Apr. 27, 1899.)

(No Model.)



UNITED STATES PATENT OFFICE.

FREEMAN S. FARR, OF MINNEAPOLIS, MINNESOTA.

SAW-CARRYING WHEEL FOR BAND-SAW MILLS.

SPECIFICATION forming part of Letters Patent No. 640,459, dated January 2, 1900.

Original application filed May 31, 1898, Serial No. 682,136. Divided and this application filed April 27, 1899. Serial No. 714,741. (No model.)

To all whom it may concern:

Be it known that I, FREEMAN S. FARR, a citizen of the United States, residing at Minneapolis, in the county of Hennepin and State of Minnesota, have invented certain new and useful Improvements in Saw-Carrying Wheels for Band-Saw Mills, of which the following is a specification.

My invention pertains to saw-carrying wheels for band-saw mills, and is designed to permit compensation to be made, when necessary, for the gradual narrowing of saw-blades through repeated filing and gumming or dressing. It is further intended to permit the ready adaptation of the wheel to the proper carrying of blades of different widths and to saws having teeth upon both edges.

The invention consists in so constructing the rim or felly of the wheel that its peripheral face may be widened or narrowed at will. This is preferably accomplished by forming the rim or felly with a circumferential rabbet or with rabbets next to one or to both its radial faces and in providing filling hoops, rings, or segments to occupy these rabbets when the peripheral face requires a greater width than is left after forming such rabbet or rabbets.

The invention may be better explained with the aid of the accompanying drawings, in which—

Figure 1 is a face or side elevation of a wheel embodying my invention; Fig. 2, a sectional view of the same on a line passing through the hub and rim or felly; Fig. 3, an edge view of the wheel without the filling hoops or segments.

The drawings represent the wheel with two rabbets, one adjacent to each face or side thereof, which is the preferred construction, since it gives wider range of variation and is equally well adapted to single and double edged saws.

The wheels, of which two are used in the usual manner of constructing band-saw mills, are designed to carry an endless steel blade in essentially the same manner that a belt is carried by two belt wheels or pulleys, the mounting and adjustment of the wheels being immaterial to the present invention and variable at will.

A indicates the wheel as a whole; B, its rim

or felly, formed with rabbets *a* where the circumferential and radial faces would otherwise meet, and C the filling pieces, hoops, or segments applied to said rabbets to fill out the rim to its natural form and dimensions. These hoops or filling-pieces are shown as continuous circular bands and are represented as secured in place by machine-screws passing through them and entering holes tapped into the side or radial faces of the rabbets. While this is a very satisfactory construction, it is obvious that the filling-pieces may be in lengths or sections and that any convenient fastening devices may be used instead of the screws.

The wheels may of course be of wood or metal or partly of each, any common construction being permissible, provided only that the rabbet and filling member be present.

By this improvement I am enabled to give adequate support to the widest blades, to narrow the peripheral supporting-face to permit the toothed edge or edges of a narrow blade to project properly beyond the edge or edges of such face, or to adapt the width of said face to saws of intermediate width, as occasion may require.

In the case of double-edged saw-blades which require the projection of both toothed edges past or beyond the edges of the supporting-face the practical or available life of the blade is about doubled by this invention, because as the saw-blade decreases in width the carrying-surface may be correspondingly narrowed until it is but about half its original or full width, and thus the blade may be carried in its proper position upon the wheels, yet project a suitable distance at both edges. It is of course practicable to employ two or more hoops to make up the width of one rabbet and thus to provide for a more gradual variation of width.

This application is a division of one filed in my name on the 31st day of May, A. D. 1898, and designated by Serial No. 682,136.

Having thus described my invention, what I claim is—

1. A band-saw wheel having its peripheral face provided with a removable portion, where- by the width of such face may be reduced.

2. A wheel for band-saws having its rim or

felly provided with a circumferential rabbet adjacent to one side or face; and a filling hoop or member detachably secured in said rabbet, substantially as and for the purpose explained.

3. A wheel for band-saw mills having its rim or felly provided with a circumferential rabbet adjacent to each side face, and filling hoops or members detachably secured in said rabbets, whereby the peripheral face of the rim or felly may be reduced in width, while maintaining a fixed relation to the medial plane of the wheel.

4. In combination with wheel A having its rim B provided with a circumferential rabbet

a; a filling member C seated in said rabbet, and fastenings for securing said filling member in place, substantially as described.

5. A wheel for supporting and operating a band-saw, which wheel is provided with removable marginal sections for adapting the wheel to the saw when the latter becomes worn away, substantially as described.

In witness whereof I hereunto set my hand in the presence of two witnesses.

FREEMAN S. FARR.

Witnesses:

JAS. F. WILLIAMSON,
MABEL M. MCGRORY.