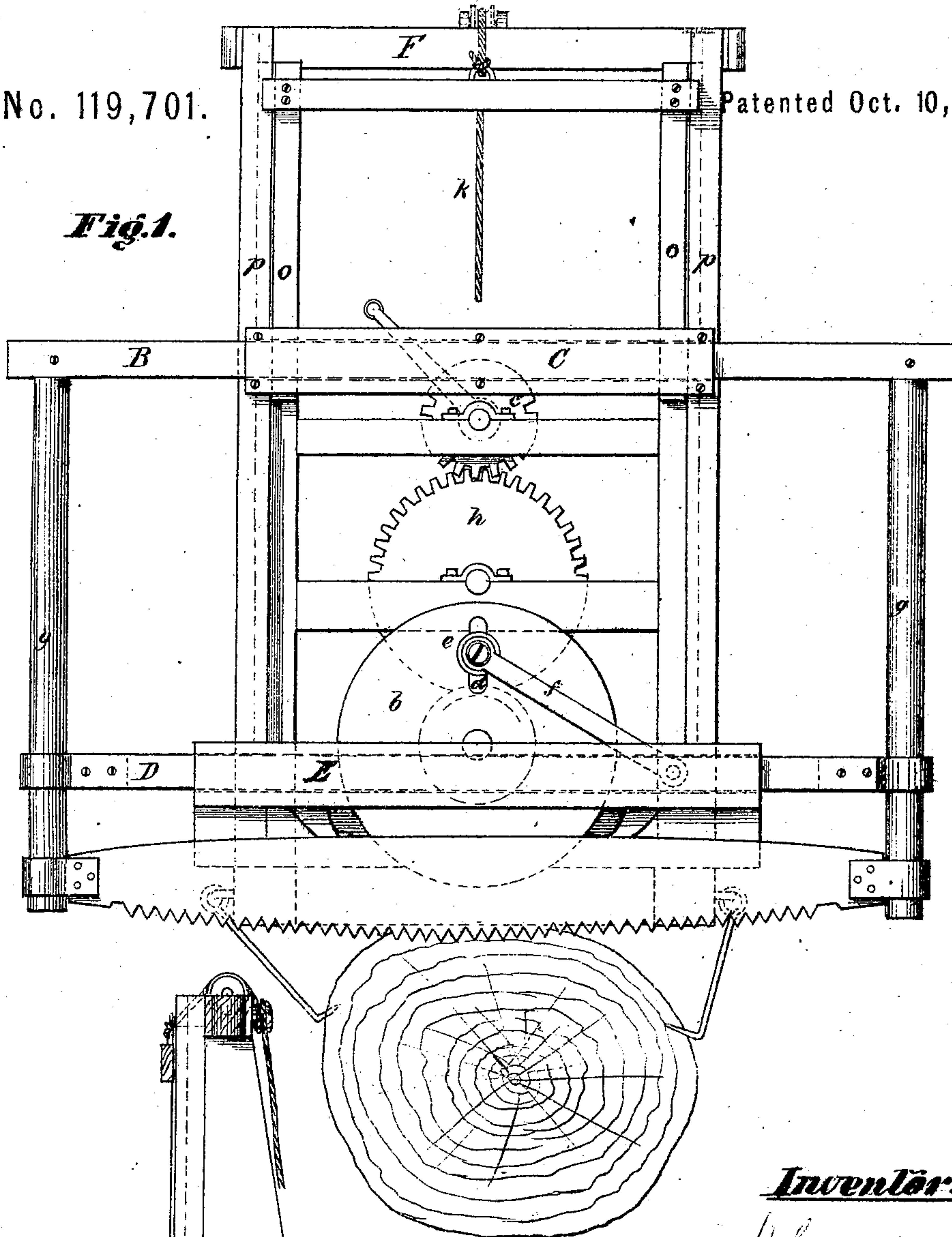


John Groat's Combination Cross-Cut Saw.

No. 119,701.

Patented Oct. 10, 1871.

Fig.1.



Inventör.

John Grant

Fig. 2.

Witnesses.

Joseph, Weaver
Henry Berry

UNITED STATES PATENT OFFICE.

JOHN GROAT, OF PERU, INDIANA.

IMPROVEMENT IN SAWING-MACHINES.

Specification forming part of Letters Patent No. 119,701, dated October 10, 1871.

To all whom it may concern:

Be it known that I, JOHN GROAT, of Peru, in the county of Miami, in the State of Indiana, have invented a new and useful machine—that is to say, a Crosscut-Saw Frame, of which the following is a specification:

My invention is intended to take the place of the ordinary crosscut-saw; and it consists in the combination and arrangement of a crosscut-saw with machinery for operating the same, as hereinafter described.

Figure 1 is a front elevation of the machine embodying my invention. Fig. 2 is a side elevation of said machine.

A is the frame of the machine. *b* is the driving-wheel, which is hung on the main shaft of the machine. *d* is the slot in the driving-wheel, and is used to regulate the stroke of the pitman. "E" is a slot-block, to which the pitman is attached by means of a bolt or screw. *f* is the pitman, fastened to the pitman-slide by means of a bolt, and is used for driving the pitman-slide D. E is a slide-box through which the pitman-slide passes, connecting by means of loops to the saw-handles *g g*, by which motion is given to the saw. Motion is imparted to the crank-wheel *b* through the gear-wheels *c h*, a crank being placed upon the

shaft of the wheel *c* to be turned by the operator of the machine. *p p* are the guides on uprights of main frame. O is the carriage, carrying the guide-way C, through which the slide-bar B passes. E is a slide-box secured to the main frame, through which the slide-bar D passes. The perpendicular motion is given to the saw by means of the rope K attached to the carriage and passing over a pulley on the top of the frame. F is the cross-beam of the machine, to which the pulley is attached for the rope K to pass over.

The machine is placed upon the log to be cut and secured thereto by suitable dogs. The carriage and saw are then lowered until the latter comes in contact with the log, when, by turning the crank, a reciprocating movement is given to the saw, which is carried down through the material by the weight of the carriage.

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

A sawing-machine composed of the parts herein shown and described, all constructed and arranged as and for the purpose set forth.

JOHN GROAT.

Witnesses:

WILLIAM E. MOWBRAY,
HENRY BERRY.