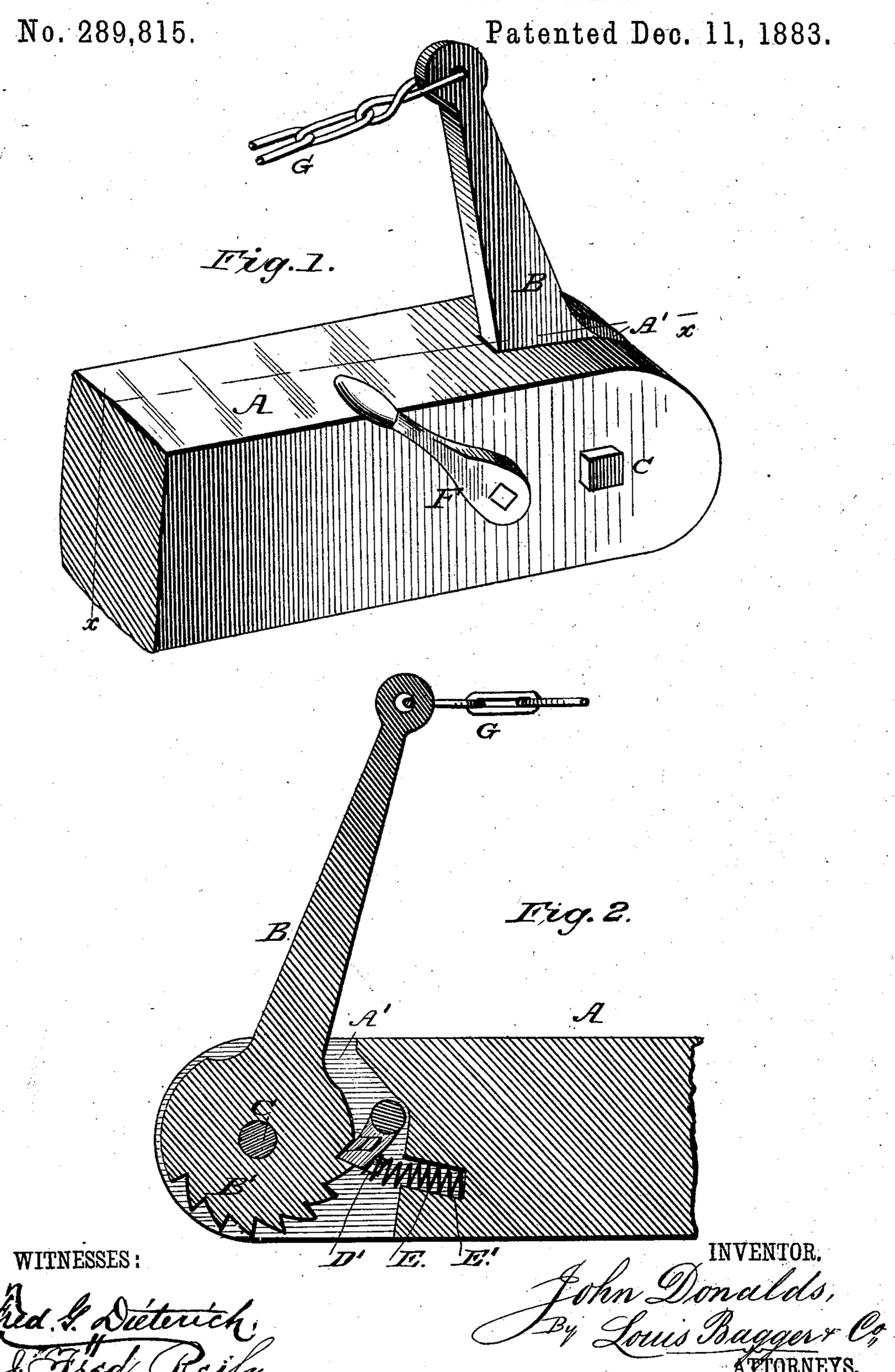
## J. DONALDS.

## ATTACHMENT FOR LOGGING SLEDS.



## United States Patent Office.

JOHN DONALDS, OF STILLWATER, MINNESOTA.

## ATTACHMENT FOR LOGGING-SLEDS.

SPECIFICATION forming part of Letters Patent No. 289,815, dated December 11, 1883.

Application filed September 7, 1883. (No model.)

To all whom it may concern:

Be it known that I, John Donalds, a citizen of the United States, and a resident of Stillwater, in the county of Washington and State of Minnesota, have invented certain new and useful Improvements in Attachments for Logging Sleds; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification, and in which—

Figure 1 is a perspective view of one end of a bolster of a logging-sled, showing my improvement in operative position; and Fig. 2 is a cross-sectional view of the same on line  $x \ x$ , Fig. 1.

Similar letters of reference indicate corre-

20 sponding parts in all the figures.

My invention has relation to attachments for logging-sleds, which may also be used on lumber-wagons, &c.; and it consists in the improved construction and combination of parts of the same, as will be hereinafter more fully described and claimed.

In the accompanying drawings, A represents one end of a bolster of a logging-sled, each end of which is provided with a longitudinal recess, A'.

B represents an arm having on one of its ends a segmental rack, B', the said arm being secured within the recess A' by means of a bolt or pivot, C, passing through the center of that end of the arm upon which is the segmental rack B'.

D indicates a pawl which is adapted to engage with the teeth of the segmental rack B', and has upon its lower side a projection, D', around which one end of the coiled spring E fits. The coiled spring E is contained within an inclined recess, E', which opens into the longitudinal recess A', as clearly shown in Fig. 2 of the drawings, and serves to hold the 45 pawl D firmly in engagement with the teeth of the segmental rack B' upon the pivoted end

of the arm B. The teeth of the segmental rack B' are inclined or beveled upon one side and made perfectly straight upon the other, the inclined sides of the teeth allowing the 50 arm to be readily raised into an upright position, while their straight sides prevent the said arm from being forced backward by the weight of the logs which are loaded upon the sled.

F indicates a crank or handle by which the pawl may be thrown back for the purpose of depressing or lowering the arm when desired.

From the foregoing description, taken in connection with the accompanying drawings, 60 the construction of my improved attachment for logging-sleds will readily be understood without requiring further explanation.

It will be seen that the arms B can be raised or lowered to any desired point, according to 65 the size of the load which is placed upon the wagon, thereby holding the load firmly in position. A chain, G, connects the free ends of the arms B, and may be lengthened or shortened as the arms B are raised or lowered.

Having thus described my invention, I claim and desire to secure by Letters Patent of the United States—

As an improvement in logging-sleds, the combination of a bolster provided at either 75 end with a longitudinal recess, A', and inclined recess E', opening into the recess A', with the pivoted arm B, having segmental rack B', pawl D, having handle F and projection D' on its inner side, and spiral spring E, fitting with-80 in the recess E', and adapted to hold the pawl D in operative position, all constructed and arranged to operate substantially in the manner and for the purpose shown and described.

In testimony that I claim the foregoing as 85 my own I have hereunto affixed my signature in presence of two witnesses.

JOHN DONALDS.

Witnesses:

RASMUS C. JOHNSON, JOHN C. NETHAWAY.