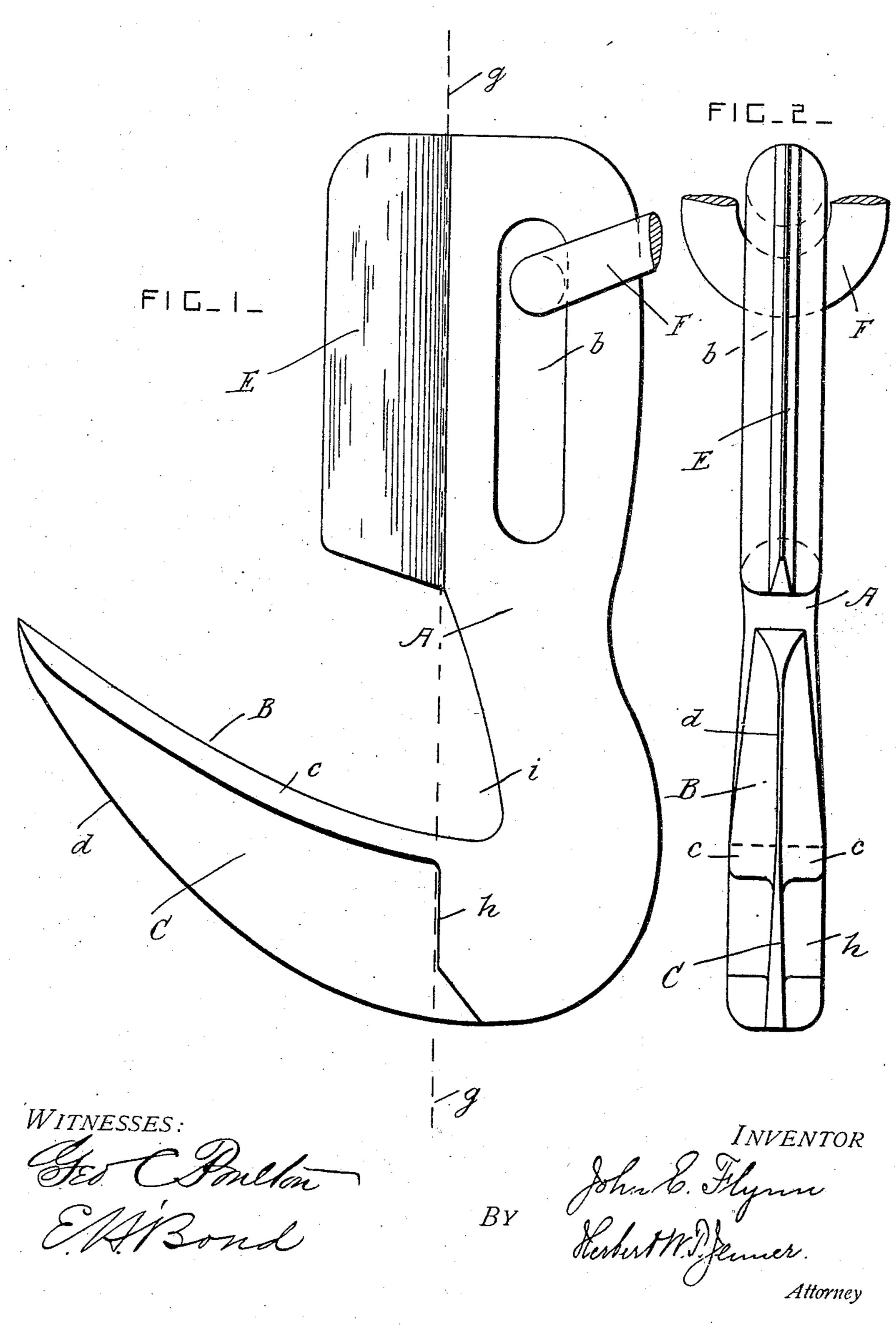
J. E. FLYNN.

GRAB HOOK.

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UNITED STATES PATENT OFFICE.

JOHN E. FLYNN, OF AUSTIN, PENNSYLVANIA.

GRAB-HOOK.

No. 883,945.

Specification of Letters Patent.

Patented April 7, 1908.

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To all whom it may concern:

Be it known that I, John E. Flynn, a citizen of the United States, residing at Austin, in the county of Potter and State of 5 Pennsylvania, have invented certain new and useful Improvements in Grab-Hooks; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in 10 the art to which it appertains to make and use the same.

This invention relates to grapples; and it consists of a grab-hook or logging-dog constructed as hereinafter fully described and

5 claimed.

In the drawings, Figure 1 is a side view of the grab-hook. Fig. 2 is a front edge view

of the grab-hook.

A is the shank of the grab-hook which is 20 provided with a longitudinal slot b which extends for about one half of the length of the shank and in its upper end portion. B is a curved hook at the lower end of the said shank. This hook is provided with a narrow 25 web C under its pointed end and middle portion, so that flanges c are formed along its upper edge for the purpose of strengthening it. The narrow web C has a sharp edge d at its outer end portion under the point of the 30 hook, and this construction enables the hook to be driven into the log with facility and without splitting the log. The upper part of the shank is provided with a sharp blade E which projects partway over the hook, and 35 which is a little longer than the slot b. The blade E is longer than the distance between the lower end of said blade and the part of the hook underneath it.

F is a portion of a chain or other suitable 40 draft attachment which is slidable longitudinally in the slot b. The dotted line gindicates the surface of the log, and the hook and the blade are driven into the log as indicated in the drawing, so that the surface 45 of the log bears against the upper part of the shank at the base of the blade and against a shoulder h at the end of the web C. A space i is left at the lower part of the shank between the said shank and the surface of the 50 log, and a bar or any convenient tool is inserted in this space for the purpose of extracting the grab-hook from the log when desired. The grab-hooks are preferably used in pairs, another similar grab-hook be-

ing attached to the other end portion of the 55 chain or draft attachment. A number of pairs of logs are coupled together, with two dogs and a chain between each log, and these logs are arranged side by side as they float on water, and each log is free to move to a 60 limited extent endwise. When any log is moved so that its chain is pulled against the outer or upper end of the slot b at the end of the shank, there is no tendency to pull out or disconnect the hook. When the log 65 is pulled in the reverse direction the chain F slides in the slot b so that it engages with the bottom end of the slot b at the middle part of the shank. There is then a slight tendency to disengage the hook, but as the chain 70 has only one half the leverage it would have if it were connected to a hole at the outer end of the shank, the hook B is not torn from the log.

What I claim is:

1. A grab-hook provided with a shank having a hook at one end and a longitudinal slot in its other end portion, and having also a blade projecting from the said shank on one side of the said slot, in combination with 80 a draft attachment which is slidable longi-

tudinally in the said slot.

2. A grab-hook provided with a shank having a hook at one end and a longitudinal slot in its other end portion, said hook being 85 provided with a sharp web at its lower part and flanges extending along its upper edge, and the said shank being also provided with a blade which projects from one side of it adjacent to its said slot, in combination with 90 a draft attachment which is slidable longitudinally in the said slot.

3. A grab-hook provided with a shank having a hook at one end and a longitudinal slot which extends from its middle portion to 95 its outer end portion, and having also a blade which projects from the middle and end portions of the said shank, in combination with a draft attachment which is slidable longitudinally in the said slot to vary 100 the leverage on the hook according to the

direction of draft. In testimony whereof I have affixed my signature in the presence of two witnesses.

JOHN E. FLYNN.

Witnesses:

E. H. Prouty, WM. NELSON.