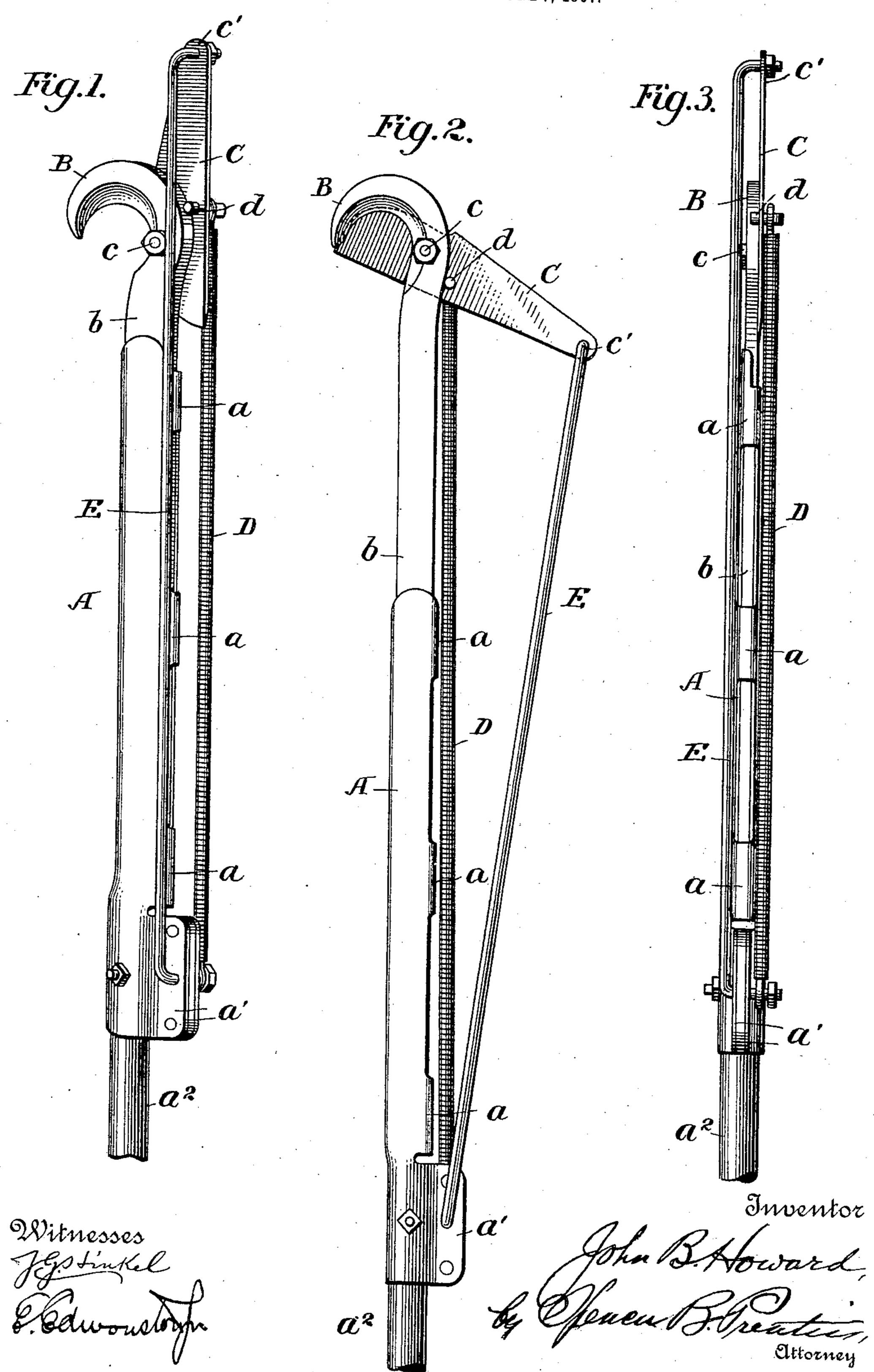
J. B. HOWARD.

PRUNING KNIFE.

APPLICATION FILED JUNE 7, 1907.



UNITED STATES PATENT OFFICE.

JOHN B. HOWARD, OF ST. JOHN, KANSAS.

PRUNING-KNIFE.

No. 870,366.

Specification of Letters Patent.

Patented Nov. 5, 1907.

Application filed June 7, 1907. Serial No. 377,807.

To all whom it may concern:

Be it known that I, John B. Howard, a citizen of the United States, residing at St. John, in the county of Stafford and State of Kansas, have invented certain 5 new and useful Improvements in Pruning-Knives, of which the following is a specification.

My invention relates to pruning knives of that particular type which is provided with a hook to engage the branch to be pruned, and which is operated by a 10 pull upon the handle to bring the knife blade into cutting action. In knives of this type heretofore devised the construction and arrangement of parts has been such that the knife member when in its initial position is either open on a slant with relation to the hook, or the 15 knife blade has been so constructed with a rearward projection that interferes with the introduction of the implement between the branches where it is to be used.

In my knife I arrange the cutting blade in a practically vertical position, the back of the blade being a 20 straight edge and in substantial alinement with the shank of the hook and the handle of the knife, so that the instrument can be readily introduced between the branches into a position of use. Further, I provide the blade with a stop pin adapted to engage the hook mem-25 ber in both extreme positions of the parts and to limit their motion. These and other objects and advantages will more fully appear as I proceed with the description of my invention, which is illustrated in the accompanying drawings.

In these drawings: Figure 1 is a three-quarter view 30 in perspective of my improved pruning knife, the parts being in their initial position; Fig. 2 is a side elevation of the same with the parts in their extreme position after cutting; and Fig. 3 is an edge view showing the parts

35 in the same position as shown in Fig. 1.

Referring to the drawings it will be seen that the device consists of a handle member A made of sheet steel and formed up so as to provide a body portion partly closed at the back by the bent-over lugs a. The lower 40 end of the handle portion is slightly enlarged and provided with lugs a^1 riveted together to complete the ferrule designed to receive the operating handle a^2 .

A hook member coöperates with the handle member, and is formed with a hook B, and a shank b extending 45 into and making a sliding connection with the handle member A.

A knife C is pivoted to the hook member adjacent the hook upon pivot c and normally is held in a vertical position by a tension spring D connected to stop pin d

upon the knife and also to the handle member A, pref- 50 erably upon the end of the operating rod E which has a pivotal connection with the handle member at the lug a^1 and also with the outer end c^1 of blade C. Stop pin dengages the hook member when the parts are in their initial or normal position, as shown in Fig. 1, and also 55 engages said hook member when the parts are in their extreme extended position shown in Fig. 2, thereby forming a stop for the knife in its two extreme operative positions.

The operation of the device will be understood from 60 the foregoing description. When the parts are in the position shown in Fig. 1 the knife occupies practically no lateral space and constitutes merely a forward extension of the hook member, so that it does not interfere with the introduction of the device between the 65 branches of the trees. The hook B having been hooked over the branch to be cut, a pull upon the handle draws down the operating rod E and brings the knife C into the position shown in Fig. 2, when the stop pin d prevents further movement. When the handle is released 70 the parts are returned to their normal position by the tension of spring D.

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

1. In a pruning knife operable by a pull upon the handle, 75 the combination with a handle member, of a hook member formed with a hook and having a shank in sliding connection with said handle member, a blade pivoted to said hook member adjacent said hook and having a back edge extending in line with said shank and handle member, an 80 operating rod connected to the outer end of said blade and to said handle member, and a tension spring connected adjacent said hook and to said handle member and adapted to maintain said blade normally in line with said shank and handle member, substantially as described.

2. In a pruning knife operable by a pull upon the handle, the combination with a handle member, of a hook member formed with a hook and having a shank in sliding connection with said handle member, a blade pivoted to said hook member adjacent said hook, an operating rod con- 90 nected to the outer end of said blade and to said handle member, a stop pin upon said blade arranged to engage and stop said hook member at both ends of its travel, and a spring for maintaining the parts normally in one position, substantially as described.

3. In a pruning knife operable by a pull upon the handle, the combination with a handle member, of a hook member formed with a hook and having a shank in sliding connection with said handle member, a blade pivoted to said hook member adjacent said hook, an operating rod con- 100 nected to the outer end of said blade and to said handle member, a stop pin upon said blade arranged to engage and stop said hook member at an end of its travel, and a

tension spring connected at one end to said stop pin and at the other end to said operating rod upon said handle member, substantially as described.

4. In a pruning knife operable by a pull upon the handle, the combination with a handle member provided with a perforation near the lower end thereof, of a hook member formed with a hook and having a shank in sliding connection with said handle member, a blade pivoted to said hook member adjacent said hook, an operating rod connected at one end to the outer end of said blade and hav-

ing its other end bent over and making a pivotal connection with the handle member in said perforation, and a spring connecting said blade and the bent over end of said operating rod, substantially as described.

In testimony whereof I affix my signature in presence 15 of two witnesses.

JOHN B. HOWARD.

Witnesses:

ERNEST HANTLA, O. L. RING.