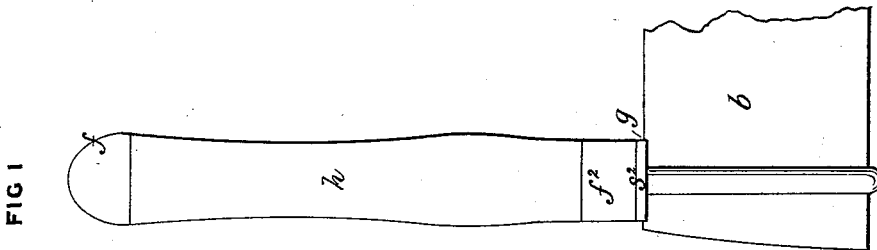
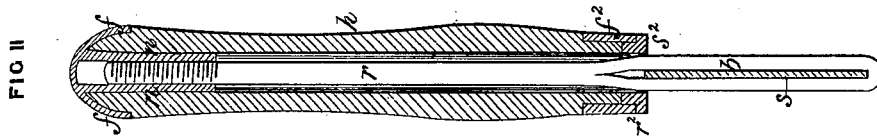
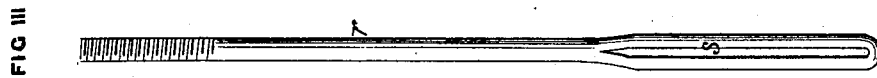
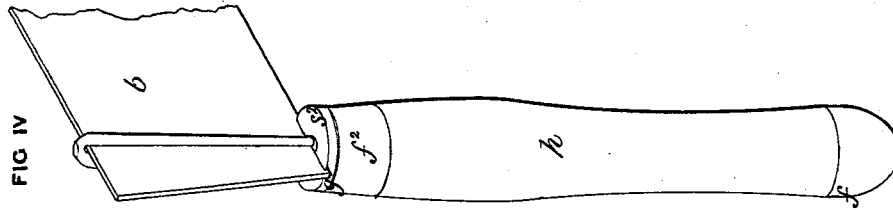


J. L. EDGAR.
 Cross-Cut Saw-Handle.

No. 168,003.

Patented Sept. 21, 1875.



WITNESSES

John C. Laing
J. H. Rutherford

INVENTOR

John L. Edgar
 By *Johnson & Johnson*
his Attys

UNITED STATES PATENT OFFICE.

JOHN L. EDGAR, OF COOPERSVILLE, MICHIGAN, ASSIGNOR OF ONE-HALF HIS RIGHT TO HARVEY W. PEACE, OF WILLIAMSBURG, NEW YORK.

IMPROVEMENT IN CROSSCUT-SAW HANDLES.

Specification forming part of Letters Patent No. 168,003, dated September 21, 1875; application filed April 6, 1875.

To all whom it may concern:

Be it known that I, JOHN L. EDGAR, of Coopersville, in the county of Ottawa and State of Michigan, have invented certain new and useful Improvements in Crosscut - Saw Handle; and I do hereby declare that the following is a full, clear, and exact description thereof, which will enable others skilled in the art to which it pertains to make and use the same, reference being had to the accompanying drawing, and to the letters of reference marked thereon, which form a part of this specification.

The invention herein embraces means for readily attaching and securing crosscut-saws to their handles without regard to the width of the blade, and requiring no piercing of the blade to make a pivot attachment to the handle.

The particular improvement I have made in such saw-handles will be specifically embraced and pointed out in the claim.

A combined cap-ferrule and screw-nut is driven firmly into the upper end of the handle, and a rod, with a slit at one end, is inserted into a longitudinal bore in the handle, and screwed into a long-core nut projecting from the center of the cap-ferrule. The saw-blade is placed in the slit of the rod, and is clamped firmly therein between the end of the rod and a metallic saddle, provided with a diameter groove to receive the upper edge of the blade, and combined with a ferrule on the lower end of the handle, so that the latter, in clamping the blade, turns with its ferrule-nut at one end upon the screw-rod, and at the other end upon the saddle-rim, which gives a metal bearing upon the saddle, and is thereby not affected by the weather. The groove in the saddle locks it with the saw-blade while the handle is being turned, and the long socket-nut, while receiving the screw-rod, prevents, by its cap-ferrule, the splitting of the handle, and is always kept firm by the clamping force of the screw-rod.

In the accompanying drawing, Figure 1 represents an elevation of a handle and portion of a crosscut-saw blade attached thereto; Fig. 2, a vertical section of the same; Fig. 3, the slitted screw-clamping rod; and Fig. 4, an in-

verted perspective, showing the saw-blade clamped in the groove of the saddle.

The saw-handle *h* is bored longitudinally, and a combined cap-ferrule and nut is driven into its upper end. The ferrule forms a guard, *f*, which embraces the end of the handle, and prevents its splitting while driving the long nut *n* into the bore, as well as in using the handle. The nut *n* forms a core from the ferrule-cap, within which a screw-socket is formed sufficiently deep to allow the screw-rod *r* to clamp the narrowest saw-blade *b* which may be used. The screw-rod *r* has a slit or opening, *s*, in the end, which projects beyond the handle, and it is wide enough to receive the saw-blade, and long enough to accommodate the widest blade used. The split is closed at its end, and the saw-blade is clamped between said closed end and a saddle, *s*², upon the rim of which a handle-ferrule, *f*², has a bearing. The saddle is shouldered to form the rim *r*², and the clamping-rod *r* passes through an opening therein a little larger than the diameter of the slitted rod, the object of which is to allow sufficient play at the outer end of the screw-rod to cause it to easily enter the long screw-socket without binding upon the saddle. The saddle *s*² has a diameter groove, *g*, on its under side, into which the edge of the saw fits to lock the saddle from turning, and make the clamping action of the handle more firm.

The slits in the handle may be formed in any suitable way, and in applying each handle to the end of the saw-blade it is only necessary to insert the end of the blade into the slit of the screw-rod, and grasping and turning the handle draws the saw up and clamps it firmly against the saddle. In this action the handle turns upon the screw-rod by the core-nut *n*, and upon the saddle *s*² by the shouldered rim *r*², so that the friction is wholly upon metal, and both ends of the handle prevented from splitting.

The cap-ferrule nut is rounded off, and forms a solid top to the handle, and the clamping-force of the screw-rod always keeps it firmly in place.

I do not claim a sectional saw-handle, nor a slotted clamping-rod for the blade, tightened

by a nut carried by the upper section of the handle, as such construction is not new; but a handle intact, and combined with the core-brace and the notched blade-saddle, is not only a new combination, but has advantages in preventing the splitting of the upper end of the saw-handle, and in allowing the latter to be complete in one piece, which a sectional handle cannot possess. Nor do I claim as new any of the devices of the handle separately considered.

I claim—

The combination, in a crosscut-saw handle,

of the core-brace *n f* with the slotted screw-rod *r*, the notched saddle *s*², and the saw-blade, whereby the saw-blade is firmly clamped to the handle by the same device which prevents the latter from splitting, substantially as herein shown and described.

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

JOHN L. EDGAR.

Witnesses:

CHAS. H. PATTERSON,
C. E. LELAND.