## J. J. COBB.

## SLEIGH KNEE AND BEAM-SOCKET.

No. 181,248.

Patented Aug. 22, 1876.

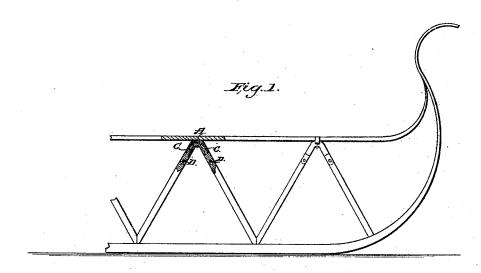
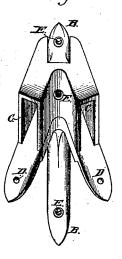


Fig. 2.



Attest:

Edwin A. Burlingame Charles W. Wooll

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## NITED STATES PATENT OFFICE.

JOHN J. COBB, OF GRAND RAPIDS, MICHIGAN.

## IMPROVEMENT IN SLEIGH KNEE AND BEAM SOCKETS.

Specification forming part of Letters Patent No. 181,248, dated August 22, 1876; application filed February 10, 1876.

To all whom it may concern:

Be it known that I, JOHN J. COBB, of Grand Rapids, Michigan, have invented Combined Knee-Socket and Beam-Holder for Sleighs and Cutters, of which the following is a specification:

Figure 1 is a side elevation, partly in section, of a sleigh or cutter, showing my invention applied thereto; Fig. 2, a perspective view of my invention.

My improved knee-socket and beam-holder can be made of malleable iron, cast in a single piece, and having, as represented, the groove A for holding the cutter-beam, with bottom B of groove A projecting outward, for the better securing of beam to the holder by means of screws or bolts passing through it and through holes E. C C represent sockets for the reception of the upper ends of cutter-knees, one side of each of which projects beyond the socket proper sufficiently to accommodate screw or bolt holes D, through which screws or bolts may pass into or through the knees to hold them firmly to place. A few of the advan-

tages of this invention in the manufacture of sleighs and cutters is, while holding beams and knees to their proper position with equal strength, it saves the expense of all wroughtiron braces, and the expense of skilled labor in adjusting the same. It saves the expense of all mortising at these points, and increases the facility and rapidity of putting knees and beams in their proper position in the cutter. These sockets and holders may be cast to accommodate knees standing at any angle.

What I claim as new, and desire patented,

The combined knee-socket and beam-holder for sleighs and cutters, having groove A for holding the cutter beam, projecting bottom B, and sockets C C, arranged between the cutterbeam and runner, substantially as herein shown and described.

JOHN J. COBB.

Witnesses:

EDWIN A. BURLINGAME, CHARLES W. WOOD.