

J. L. JACKSON.

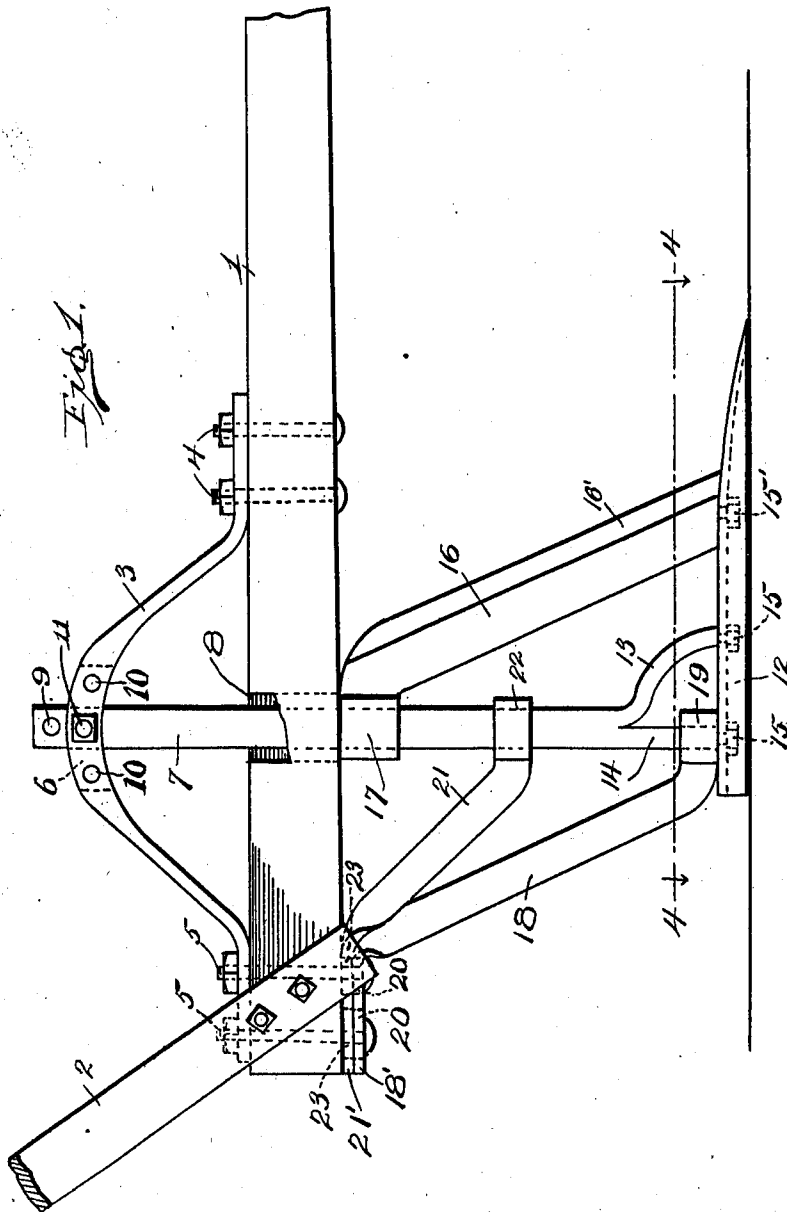
PLOW.

APPLICATION FILED FEB. 17, 1909.

982,681.

Patented Jan. 24, 1911.

2 SHEETS-SHEET 1.



WITNESSES:

C. H. Tesler

W. A. Kitchin.

INVENTOR

BY *John L. Jackson*
Edgar M. Kitchin
His Attorney.

J. L. JACKSON.

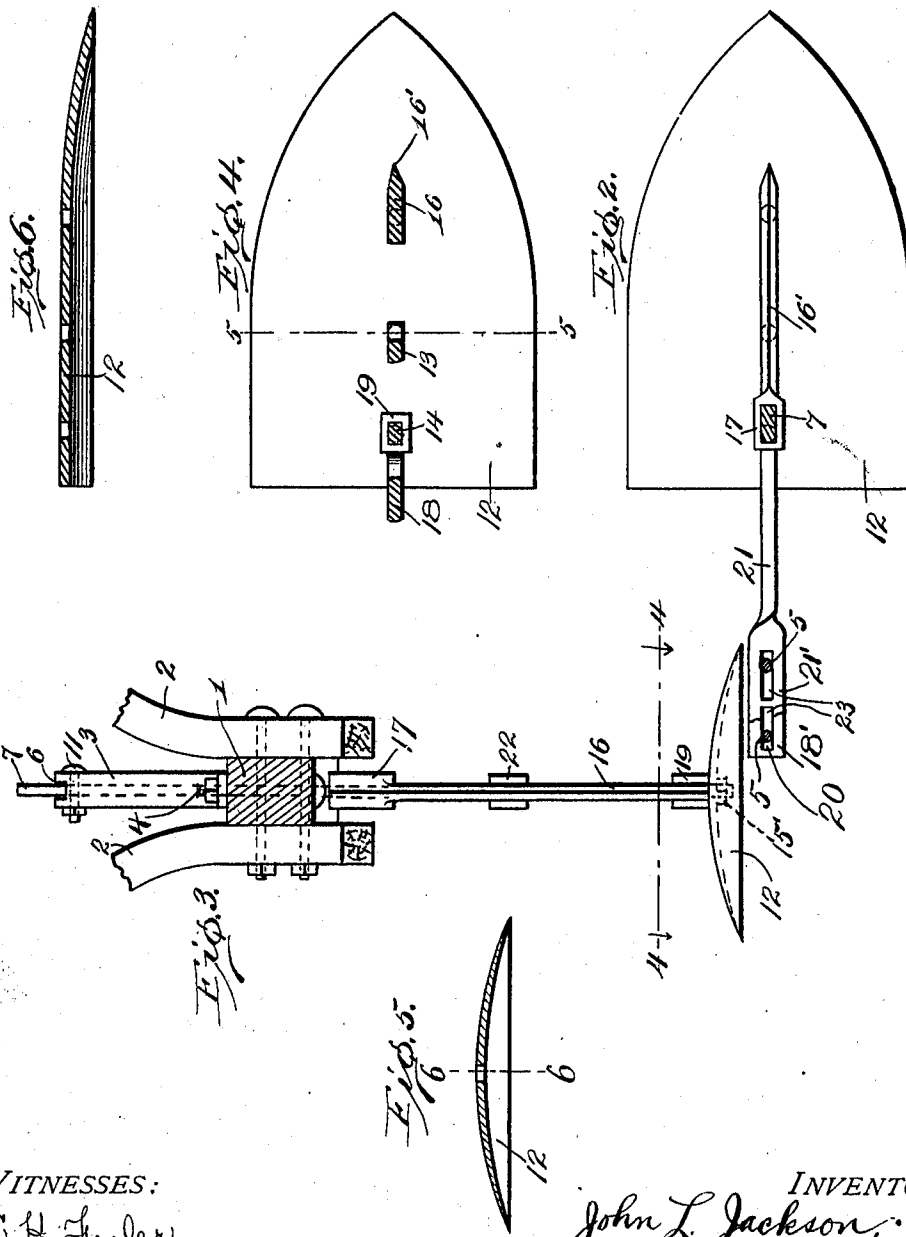
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INVENTOR
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his Attorney.

UNITED STATES PATENT OFFICE.

JOHN L. JACKSON, OF COLUMBUS, GEORGIA, ASSIGNOR OF FIFTY-ONE ONE-HUNDREDTHS
TO F. H. SPRINGER AND F. H. BURRUS, DOING BUSINESS AS SPRINGER & BURRUS,
OF MUSCOGEE COUNTY, GEORGIA.

FLOW.

982,681.

Specification of Letters Patent.

Patented Jan. 24, 1911.

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To all whom it may concern:

Be it known that I, JOHN L. JACKSON, a citizen of the United States, residing at Columbus, in the county of Muscogee and State of Georgia, have invented certain new and useful Improvements in Plows; 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 the art to which it appertains to make and use the same.

This invention relates to improvements in plows, and particularly to the mole or sub-soil type, and the object in view is the ready control of the depth beneath the surface maintained by the cutting blade or shoe, while at the same time embodying a structure capable of ready adjustment for various depths and presenting when set at any adjustment a firm, rigid structure well adapted to withstand the strain of sub-soil work.

With various objects in view, as will in part become apparent and in part be stated hereinafter, the invention comprises certain novel constructions, combinations and arrangements of parts, as will be hereinafter set forth and claimed.

In the accompanying drawing:—Figure 1 is a view in elevation of a plow embodying the features of the present invention, parts of the handles and beam being broken away for the saving of space. Fig. 2 is a horizontal section therethrough, taken on the plane immediately beneath the draft beam and looking downwardly, the handles being omitted. Fig. 3 is a view in front elevation of the parts seen in Fig. 1, the draft beam being seen in vertical section. Fig. 4 is a horizontal section taken on the plane indicated by line 4—4 of Figs. 1 and 3, looking downwardly. Fig. 5 is a transverse, vertical section taken on the plane indicated by line 5—5 of Fig. 4, the standard and braces being omitted. Fig. 6 is a section therethrough taken on the plane indicated by line 6—6 of Fig. 5.

Referring to the drawing by numerals, 1 indicates the draft beam, engaged at its rear end by suitable operating handles 2, 2. An upstanding bracket or brace bar 3 rises from the beam 1 and is fixed thereto at its front end by bolts 4, 4, and at its rear end by similar bolts 5, 5, all passed through the beam.

Bracket 3 is slotted, as at 6, and a standard 7 extends upwardly through a slot 8 in beam 1 and through slot 6 of bracket 3. The upper end of standard 7 is formed with a plurality of apertures 9 for affording connection with and vertical adjustment with respect to the bracket 3, said bracket being formed with similar, longitudinally spaced apertures 10, 10, adapted to be brought into register with any given aperture 9, and the standard and bracket secured together by a bolt 11. Thus the upper end of the standard is adapted to be swung for the length of the slot 6 for varying the angular relation of the standard and draft beam, the slot 8 allowing of such adjustment, the beam 1 being thus designed to assume any desired pitch or inclination for controlling the depth of the blade or shoe 12 fixed to the lower end of the standard 7. Standard 7 extends any desired distance below beam 1, and is bifurcated near its lower end forming a forwardly extending brace 13 and a vertical continuation 14, the lower end of each of which is shouldered and formed with a bolt portion extending through the blade 12, along the longitudinal axis thereof, each bolt portion being engaged by a suitable nut 15, beneath the blade.

The blade or shoe 12 may assume various forms, but by preference it is formed with a hollow, or upwardly concavo-convex body tapering to a point at the front, and terminating abruptly at the rear, the hollow portion accommodating the nuts 15, the edges of the blade lying beneath the lowest horizontal plane of the nuts or other connections with the blade.

Engaging the blade 12 at its front portion and in the median line thereon is a forward brace 16 which terminates at its lower end in a shouldered portion resting upon the upper surface of the blade and formed with a bolt portion extending downwardly through the blade and engaged by a retaining nut 15', similarly arranged to nuts 15. Brace 16 extends upwardly preferably to a point just beneath beam 1 and is there abruptly bent or turned rearwardly and formed with a collar 17 surrounding standard 7, and preferably snugly fitting the same. The front edge of brace 16 is drawn out to a cutting edge 16', so as to offer a

minimum resistance in its passage through the soil, and the body of the brace is of substantially the thickness of the standard 7, so as to leave an open way in the soil for the passage of the standard.

5 A main rear brace 18 is formed with a collar 19 at its lower end surrounding, and preferably snugly fitting, the extension 14, the brace extending on an incline upwardly and rearwardly to the draft beam 1, and at its upper end being turned to form a rearwardly extending, horizontal portion 18', the portion 18' being slotted longitudinally, as at 20, 20, for the passage of the retaining bolts 5, and allowing adjustment with respect to the bolts for compensating for the adjustment of standard 7 laterally. An auxiliary brace, 21, similar to brace 18 and in tandem therewith, is formed with a collar 22 at its lower end surrounding standard 7 midway between blade 12 and beam 1, and extends upwardly and rearwardly, and, at its upper end, is formed into a horizontal, rearwardly extending portion 21', similar in construction and arrangement to portion 18', and lying between said portion 18' and the beam 1, and slotted similarly to portion 18', as at 23, 23, for the same purpose.

Thus it is to be observed that while providing a cheap and simple arrangement of parts, the invention provides for two adjustments, one vertical and the other lateral or tilting, of the plow blade or shoe, for controlling the depth of cut, and at the same time ample strength and rigidity of the parts is assured, without involving ponderous or unduly weighted or illy proportioned parts.

What I claim is:—

1. In a device of the class described, the combination with draft means, of a standard adjustably connected therewith, a blade carried by the standard, the standard being formed with a bifurcated lower end and the arms of the bifurcation engaging said blade, a brace shiftably engaging the main portion of the standard, a brace shiftably engaging one of the arms of the bifurcation, and means for adjustably connecting the braces to the draft means.

2. In a device of the class described, the combination with draft means, of a standard adjustably connected therewith, said standard being bifurcated at its lower end, a blade carried by the arms of such bifurcation, a brace engaging one of the arms of the bifurcation, a brace engaging the standard above the bifurcation, and means for adjustably connecting said braces to the draft means.

3. In a device of the class described, the combination with draft means, of a standard adjustably connected therewith, a blade carried by the standard, and a pair of braces shiftably engaging said standard, and means adjustably connecting both of said braces to the draft means and adapted for adjustment of said braces longitudinally of the draft means.

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

JOHN L. JACKSON.

Witnesses:

CHARLES J. SMITH,
J. M. CRAWFORD.