2 Sheets—Sheet 1.

P. H. BURNS & W. G. McELHANY.

Plows.

No. 201,222. Patented March 12, 1878.

Fig. 1

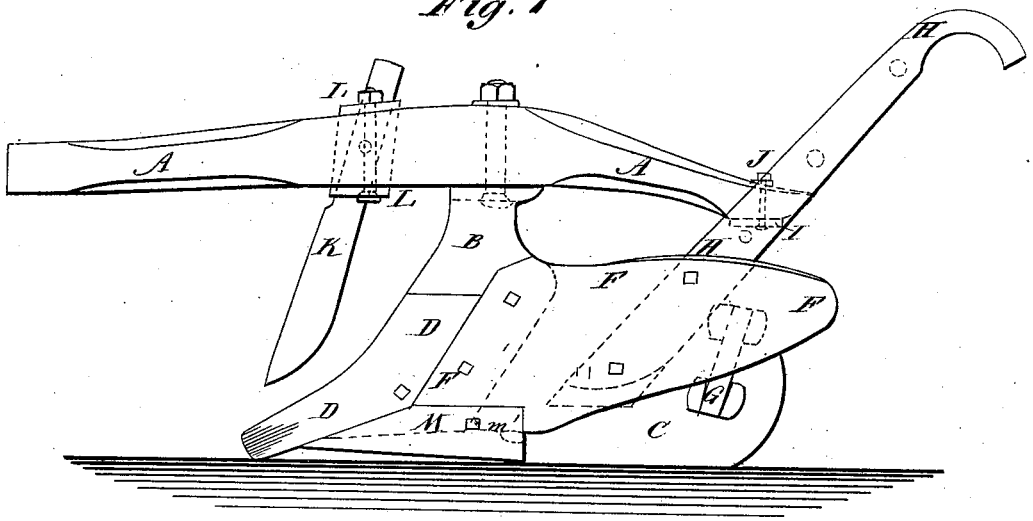


Fig. 2

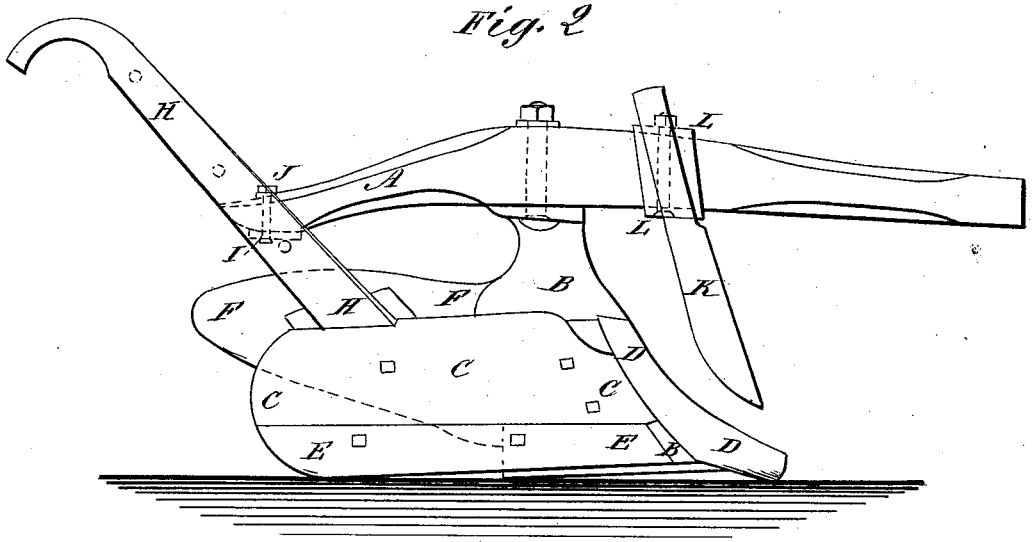
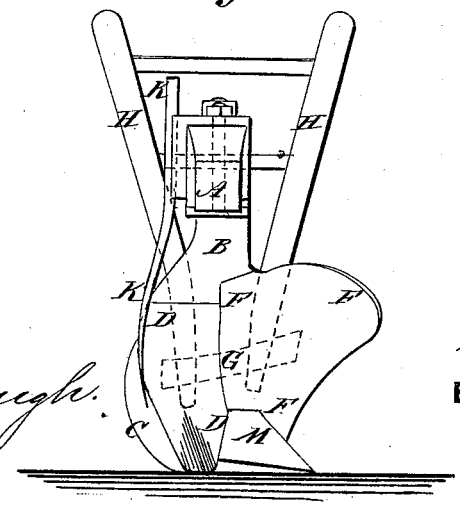


Fig. 3



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2 Sheets—Sheet 2.

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Plows.

No. 201,222. **Patented March 12, 1878.**

Fig. 8

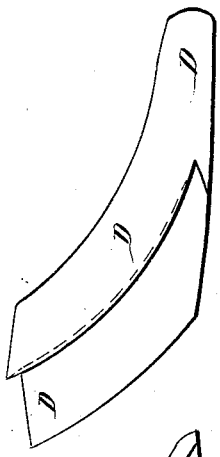


Fig. 4

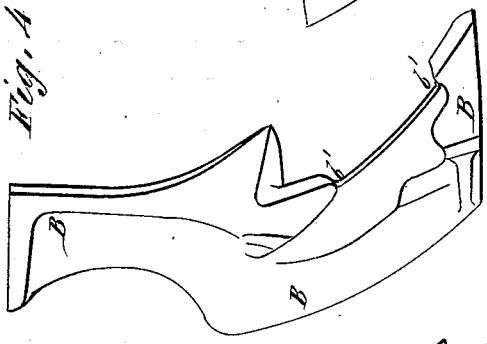


Fig. 7

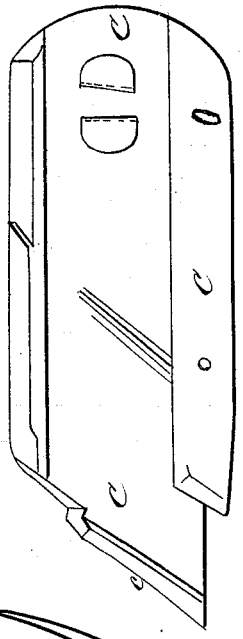


Fig. 5

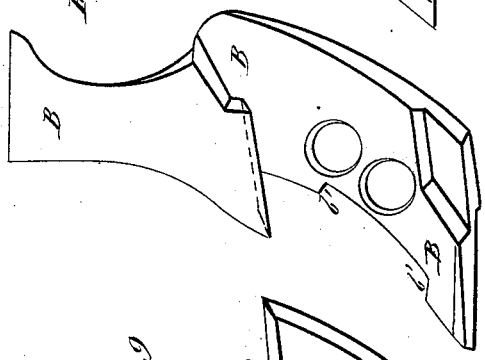


Fig. 6

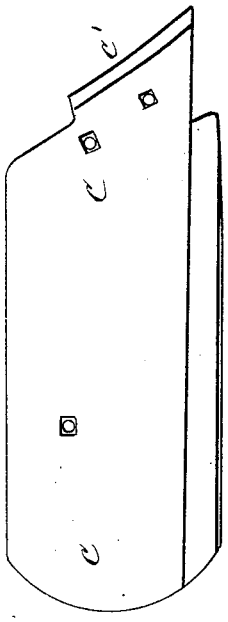
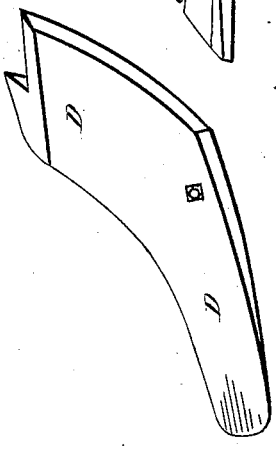


Fig. 9



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UNITED STATES PATENT OFFICE.

PATRICK H. BURNS AND WILLIAM G. McELHANY, OF INDIANA, PENNSYLVANIA, ASSIGNORS TO SAID BURNS.

IMPROVEMENT IN PLOWS.

Specification forming part of Letters Patent No. **201,222**, dated March 12, 1878; application filed June 11, 1877.

To all whom it may concern:

Be it known that we, PATRICK H. BURNS and WILLIAM G. MCELHANY, of the city and county of Indiana, and State of Pennsylvania, have invented a new and useful Improvement in Plows, of which the following is a specification:

Figure 1, Sheet 1, is a view of the mold-board side of our improved plow. Fig. 2, Sheet 1, is a view of the land-side side of our improved plow. Fig. 3, Sheet 1, is a front view of our improved plow. Fig. 4, Sheet 2, is a detail view of the land-side side of the standard. Fig. 5, Sheet 2, is a detail view of the mold-board side of the standard. Fig. 6, Sheet 2, is a detail view of the outer side of the land-side. Fig. 7, Sheet 2, is a detail view of the inner side of the land-side. Fig. 8, Sheet 2, is a detail view of the land-side side of the point. Fig. 9, Sheet 2, is a detail view of the mold-board side of the point.

Similar letters of reference indicate corresponding parts.

The invention will first be described in connection with the drawing, and then pointed out in the claim.

In the drawing, A represents the plow-beam, which rests upon and is secured to the head formed upon the upper end of the standard B by a bolt and nut. The standard B is bent or curved, making its land-side side convex, and its mold-board side concave. Upon the convex side of the standard B is formed a seat for the inner side of the forward part of the land-side C, and its forward edge has a notch, *b'*, formed in it to receive a flange, *c'*, formed upon the inner side of the forward end of the land-side C. The land-side C is secured to the standard B by bolts, the nuts of which rest in recesses or countersinks formed in the mold-board side of the said standard B, and which are covered by the point D. The land-side C is curved longitudinally, so as to be rounded or convexed upon the outer side. The lower part of the outer side of the land-side C is rabbeted, or has an offset formed in it, to receive the detachable land-side E, which is curved or convexed to correspond with the curve or convexity of the main land-side C, and its lower edge is turned in beneath the lower edge of said land-side C, to bear upon the bottom of the furrow and take the wear. The point D is made concave upon the mold-board side and convex upon the land-side side, and has its upper end beveled off to abut against and fit upon a shoulder formed upon the upper part of the standard B. The point D rests upon and covers the forward end of the land-side C, is bolted to the standard B, and its forward edge and the forward edge of the upper part of the standard B form the colter. The forward end of the point D is made gouge-shaped, or concave upon the upper side and convex upon the lower side.

F is the mold-board, the forward end of which, abuts against the point D, and against a shoulder formed upon the standard B, and is bolted to said standard. The mold-board F is concaved longitudinally to correspond with the curvature of the standard B, the whole plow being thus gouge-shaped. M is the share, which is made separate, is bolted to the standard B, and abuts against the edges of the point D and the mold-board F. Upon the inner side of the lower part of the share M is formed a lug, *m'*, which rests against the lower edge of the mold-board F, to relieve the bolt from the strain. The rear ends of the mold-board F and the land-side C are braced against inward pressure by a bar, G, the ends of which are dovetailed, and are inserted in dovetailed lugs formed upon the inner sides of said mold-board and land-side. H are the handles, which are connected by rounds, and the lower ends of which are bolted to the land-side C and the mold-board F. The rear end of the plow-beam A is secured to the plate or casting I by a bolt, J, which passes through a hole in the beam A and a slot in the plate I, so that by loosening the nut of the bolt J the beam A may be adjusted to cause the plow to take or leave land, as may be required. The ends of the plate I are flanged, and are bolted to the handles H.

K is the cutter, the blade of which is curved to correspond with the curvature of the land-side C. The shank of the cutter K is straight, is inserted in a groove in the side of the clamp L, and is secured to said clamp by a bolt. The clamp L is made U-shaped, and its arms over-

lap the upper and lower sides of the plow-beam A, and are slotted longitudinally, to receive the bolt by which they are secured to the said plow-beam A, so that by loosening the nut of the said bolt the cutter K may be adjusted to correspond with the adjustment of the plow to take or leave land. The cutter K has no vertical adjustment, as such an adjustment would prevent the curvature of the cutter from corresponding with the curvature of the land-side C.

Having thus fully described our invention, we claim as new and desire to secure by Letters Patent—

The standard B, made convex on one and concave on the other side, notched and shouldered to receive the land-side, mold-board point, and share, and in combination therewith, as shown and described.

PATRICK H. BURNS.
WILLIAM G. McELHANY.

Witnesses:
ROBERT WILLIARD,
W. C. WINE.