W. G. HULL.

Tug for Harness.

No. 206,331. Patented July 23, 1878.

Fig. 1.

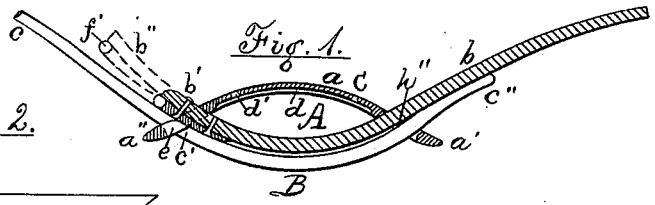


Fig. 2.

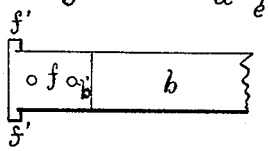


Fig. 3.

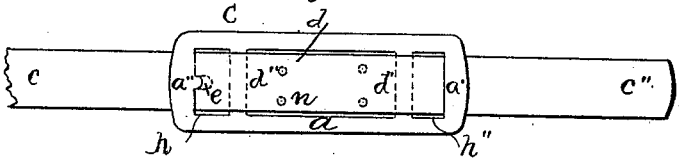


Fig. 4.

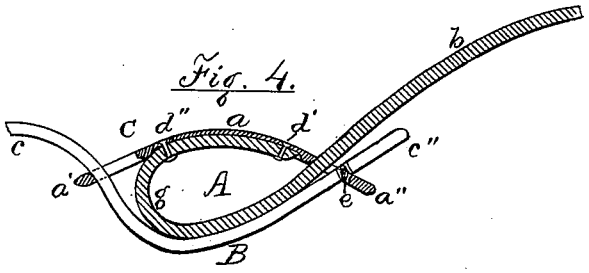
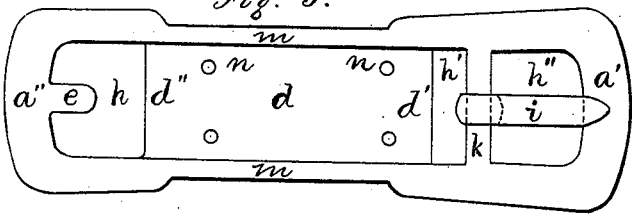


Fig. 5.



Attest:

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UNITED STATES PATENT OFFICE.

WILLIAM G. HULL, OF SING SING, NEW YORK.

IMPROVEMENT IN TUGS FOR HARNESS.

Specification forming part of Letters Patent No. **206,331**, dated July 23, 1878; application filed January 25, 1878.

To all whom it may concern:

Be it known that I, WILLIAM G. HULL, of the city of Sing Sing, in the county of Westchester and State of New York, have invented certain new and useful Improvements in Harness; 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 appertains to make and use the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification.

My invention is an improvement in harness whereby a durable, secure, and self-adjusting attachment to the thills is secured.

In the drawing, forming part of this specification, Figure 1 is a longitudinal section, showing the straps and connecting-plate; Fig. 2, a detached view; Fig. 3, a face view of Fig. 1; Fig. 4, a longitudinal section of a modification; and Fig. 5, a face view of a modified form of plate, drawn to an enlarged scale.

C, Figs. 1, 3, and 4, is a metallic plate, curved so as to partly embrace the thill against which the hollow side rests, and provided with openings or attachments for the back-strap *c* and the belly-strap *b*.

In Figs. 1, 3, and 4 there is a stationary tongue, *e*, near the end opening or slot *h* in the plate, which tongue enters the holes of the back-strap *c*, the end *c''* of the strap passing through the opening *h''* at the opposite end of the plate, and the belly-strap *b* passes through the openings *h''* and *h*, and may be provided at the end with a metallic wedge, *f*, which, as the band *b* is drawn, forces the band *c* more closely in its place, and prevents it from escaping from the tongue *e*. The wedge has ears *f'*, which prevent it from drawing through the opening *h*.

Instead of using the wedge the band *b* may be looped and the end riveted to the body of the plate C, which is provided with suitable openings *n* for the rivets, as shown in Fig. 4.

The thill passes between the curved side of the plate and the straps through the intermediate space A, Fig. 1, and any draft tending to tighten the straps will cause the thill to be more closely hugged between the strap and the plate.

The strap *c* may be secured by a stationary tongue in the opening *h''*, as shown in Fig. 4, or the tongue may be movable, as shown in Fig. 5.

I claim—

1. The combination, with the curved slotted plate C, of the strap *b*, passing through one of the slots and secured at the opposite end, and the strap *c*, passing over both slots outheid the strap *b*, the straps forming with the plate a recess, A, to receive the thill passing between the two, as set forth.

2. The combination of the curved plate C, its openings *h h''* and tongue *e*, the strap *c*, and strap *b*, having at the end a wedge, *f*, as and for the purpose set forth.

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

WILLIAM G. HULL.

Witnesses:

OLIVER DRAKE,

J. F. INSLEE.