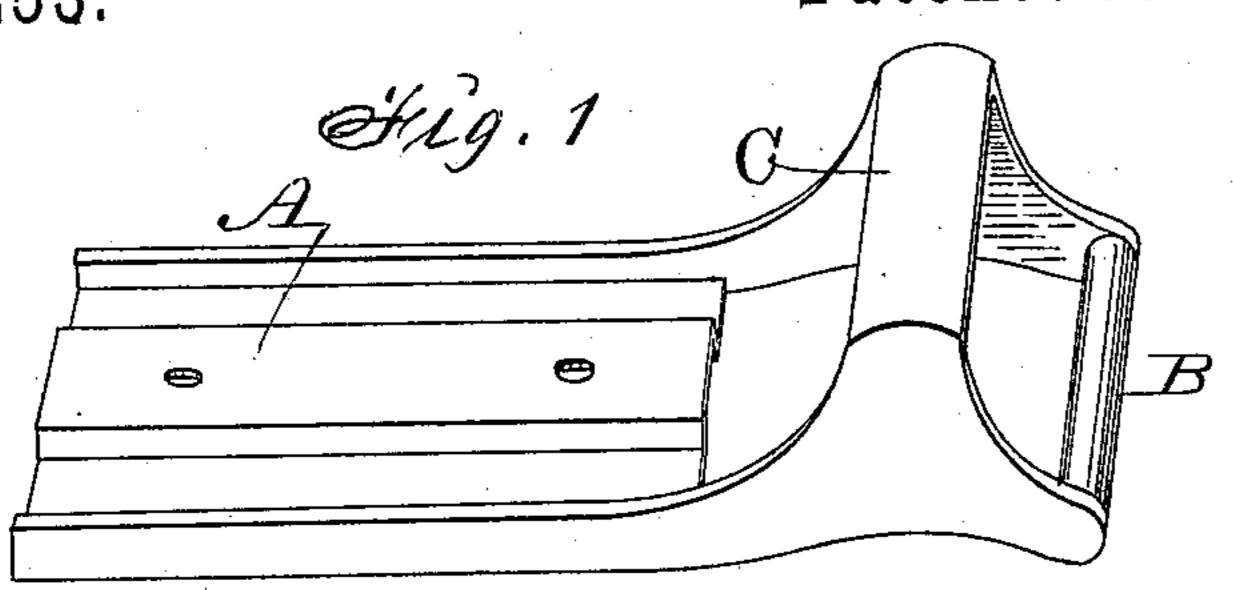
(No Model.)

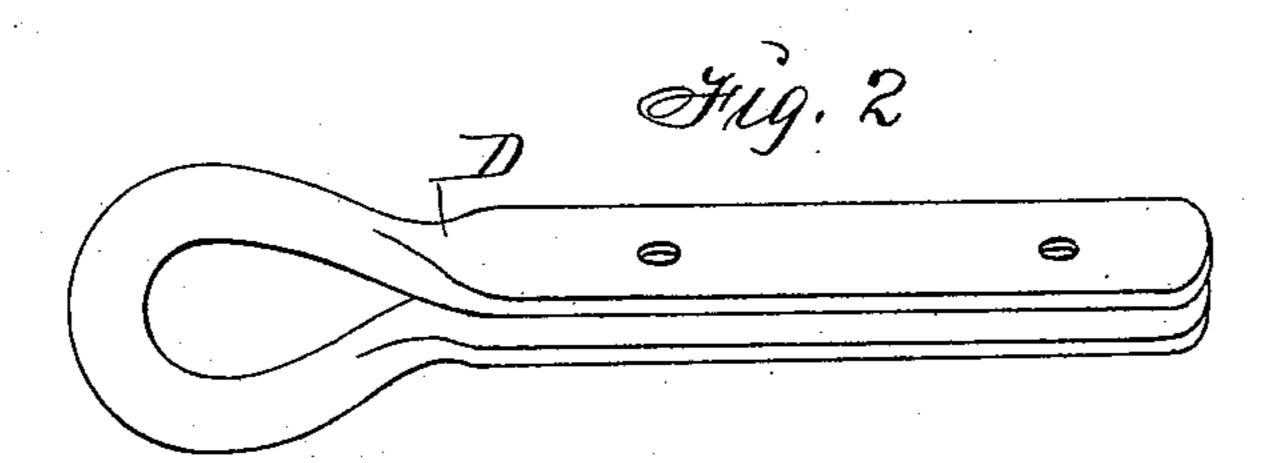
## C. C. SCHWANER.

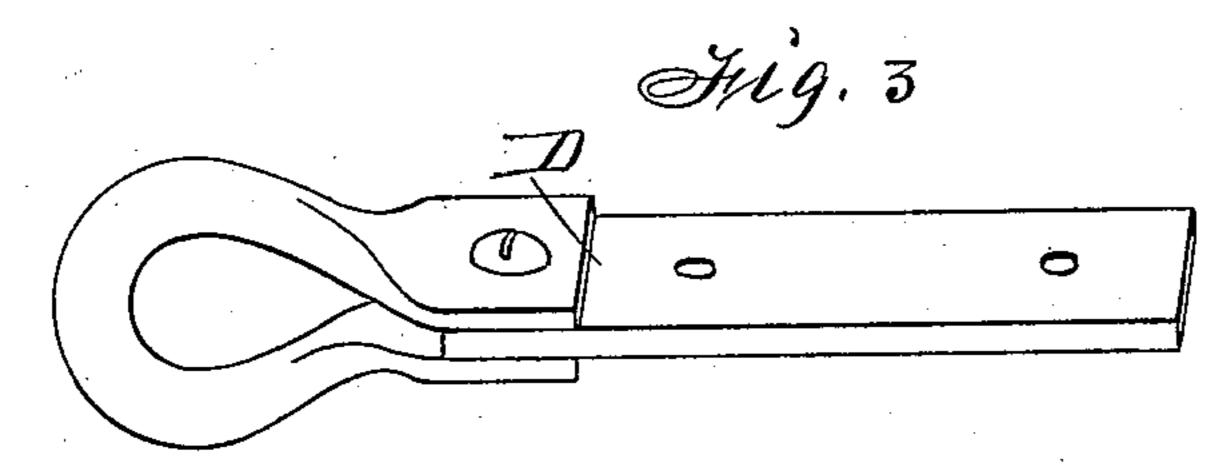
HAME TUG.

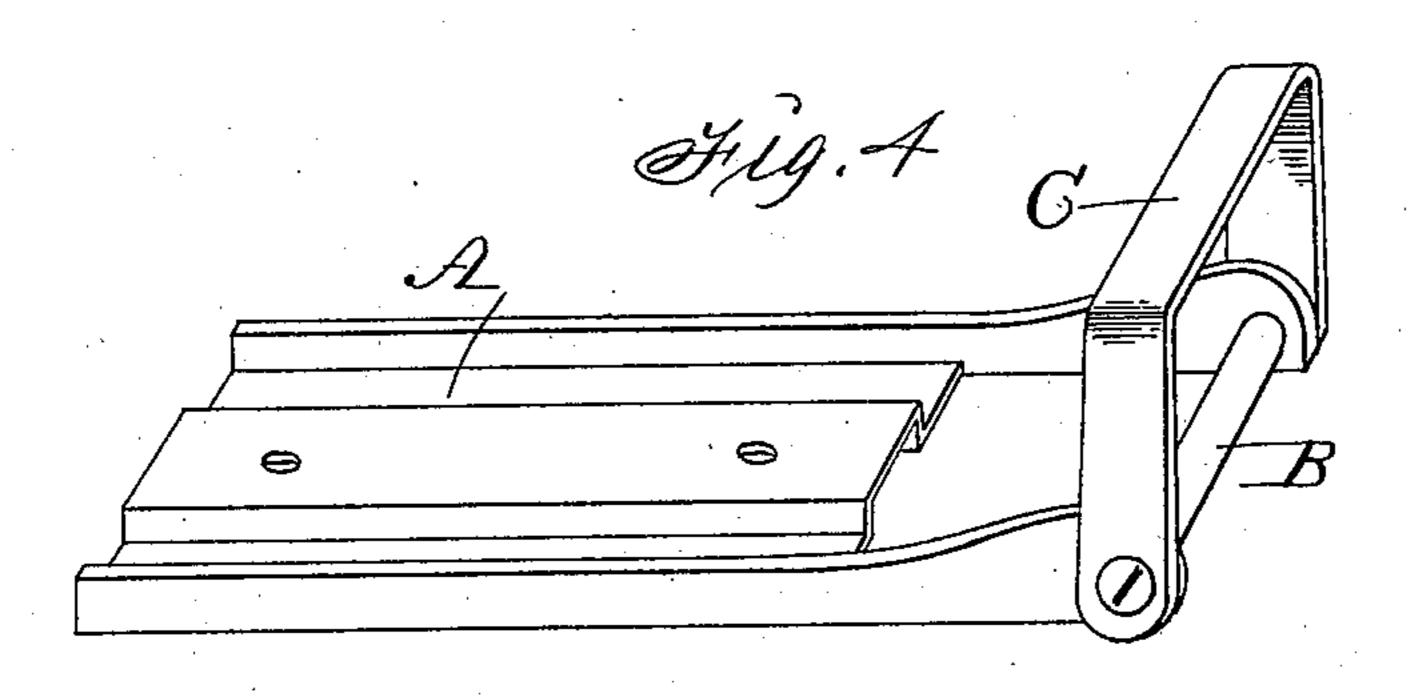
No. 321,253.

Patented June 30, 1885.

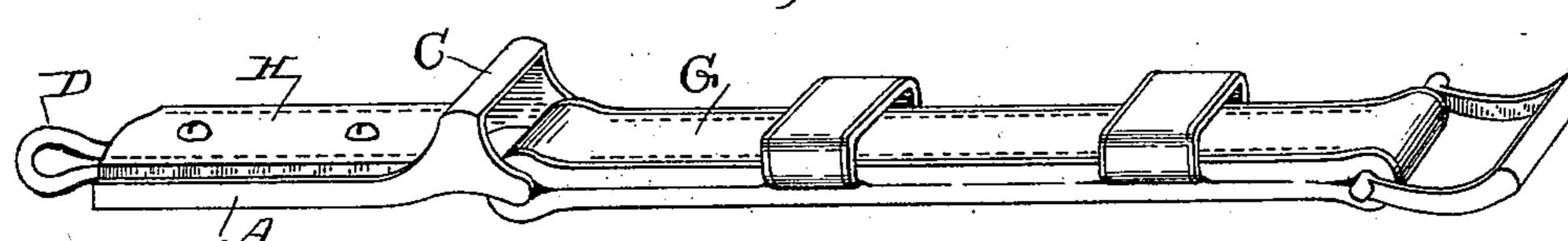








Hig.5



Witnesses:

M. H. Auderson, R. H. Omvig. Inventor:

By Thomas G. Orwig, atty.

## IJNITED STATES PATENT OFFICE.

CHRISTIAN C. SCHWANER, OF WINTERSET, IOWA.

## HAME-TUG.

SPECIFICATION forming part of Letters Patent No. 321,253, dated June 30, 1885.

Application filed December 8, 1884. (No model.)

To all whom it may concern:

Be it known that I, CHRISTIAN C. SCHWANER, a citizen of the United States of America, and residing at Winterset, in the 5 county of Madison and State of Iowa, have invented an Improved Harness Hame-Tug, of which the following is a specification.

My invention relates to the jointed hametug for which United States Letters Patent 10 No. 286,230 were issued to me October 9, 1883; and my improvement consists in the construction and combination of a metal hame-tug section, a loop, and a clip in a complete and jointed hame-tug, as hereinafter 15 fully set forth, and particularly pointed out in

my claims.

Figure 1 of the series of perspective views in the accompanying drawings shows a metal hame-tug section having a loop cast solid 20 therewith; Fig. 2, a hame-tug clip of common form made complete in one piece; Fig. 3, a clip made in two parts; Fig. 4, a metal hametug section having a loop pivoted to its rear end; and Fig. 5, a perspective view of a com-25 plete hame-tug. Jointly considered, these figures clearly illustrate the construction and

operation of my complete invention.

A is the body of the metal hame-tug section. It has flanges extending upward at its sides, 30 against which a leather covering is fitted, and an arch extending longitudinally through its center to adapt it to receive a hame-clip in such a manner that the part of the clip that comes in contact therewith will not project 35 below the level of its under surface, but will be embedded, as required, to produce a flat surface that will not chafe a horse's shoulders when in contact therewith.

B is a cross-bar, at the ends of the sides of 40 the body A, that extend rearward for the reception of the main portion of the tug that is to be hinged to the section A. This crossbar may be cast solid with the section, or fixed thereto in any suitable way.

C is a loop cast solid with the extensions of the section A, pivoted thereto by means of a detachable cross-bar, B, or fixed thereto in any suitable way.

D is a hame-clip detachably connected with 50 the front portion of the section A by means |

of screws. When the clip is formed in two parts, as shown in Fig. 3, the one part may be permanently riveted to a hame-section having a loop at its rear end. By thus providing for the detachment of a clip, or portion 55 thereof, the part in a complete tug that is usually worn out first by its contact with a fastening device on the hame can be readily replaced with a new one, and an old tug thus advantageously repaired.

G represents the body and rear portion of the tug, which may vary in size, material, and structure as desired, and which is hinged to the cross-bar B of the section A in any suitable way so as to produce a joint in the 65 complete tug that is adapted to receive the front end of a trace and to retain the free front end of the trace closed flat over the joint, and prevented from bending outward from under the loop C at the rear portion of the front sec- 70 tion, A.

H represents a leather covering detachably connected with the front end of the section A

and the clip D.

I claim as my invention—

1. The improved hame-tug section composed of a body having perforations to admit the passage of rivets to fasten a clip thereto, and a cross-bar and loop at its rear end, for the purposes stated.

2. The improved hame-tug section composed of a flanged, arched, and perforated body, A, a cross-bar, B, and a loop, C, for the

purposes specified.

3. In a hame-tug, the combination of a metal 85 section having perforations in its front end, a loop and cross-bar at its rear end, with a detachable clip, and a main and rear portion hinged to the cross-bar of the front section, as and for the purposes stated.

4. The combination of a hame-tug section, A B C, a clip, D, and a cover, H, with a body, G, having a series of loops, and a tracefastening device at its rear end, substantially as shown and described, for the purposes 95 specified.

CHRISTIAN C. SCHWANER.

Witnesses:

W. S. WHEDON, M. I. BEAN.