

(No Model.)

M. H. HICKEY & W. R. REMME.

CALF WEANER.

No. 367,629.

Patented Aug. 2, 1887.

Fig. I,

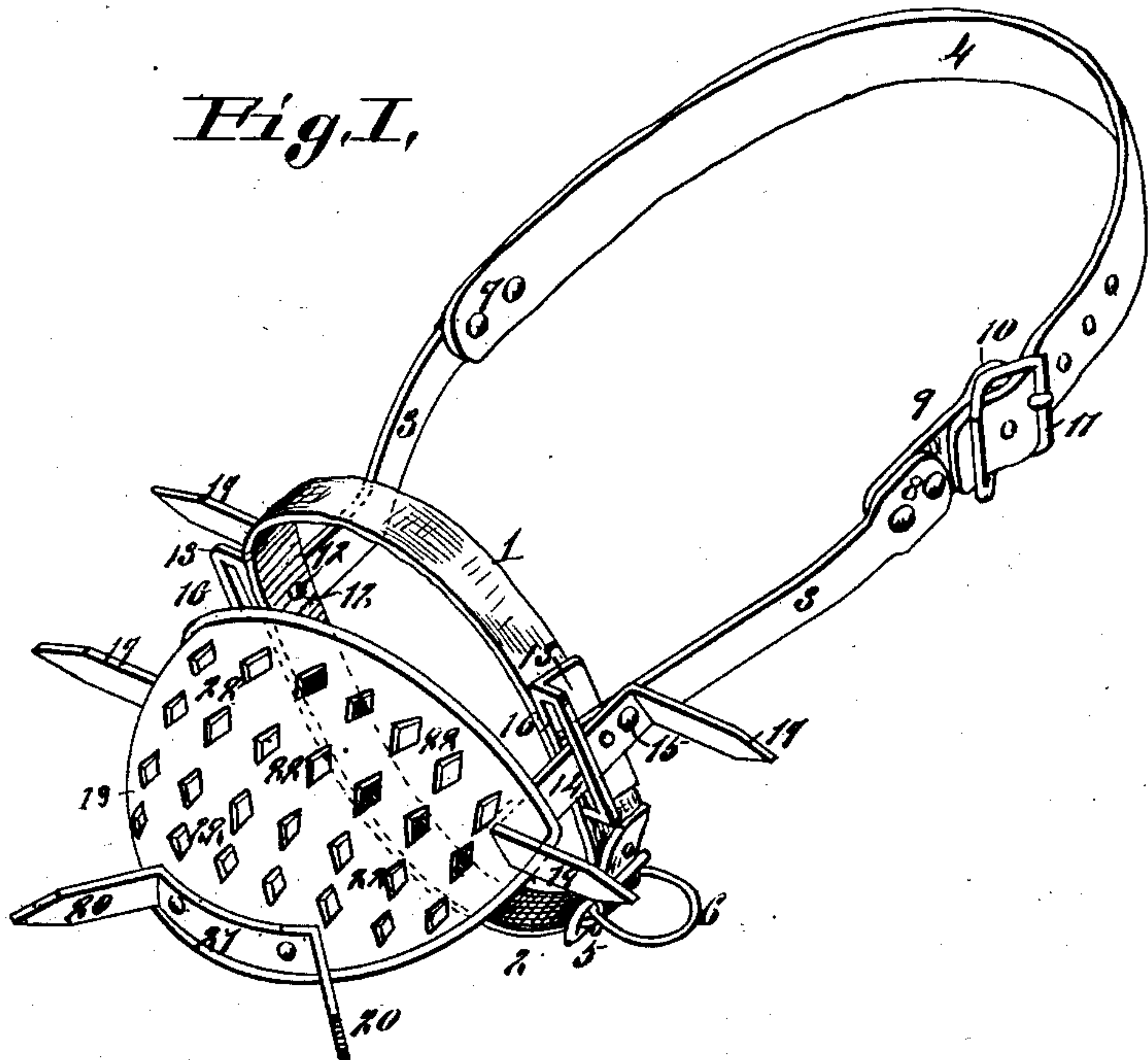
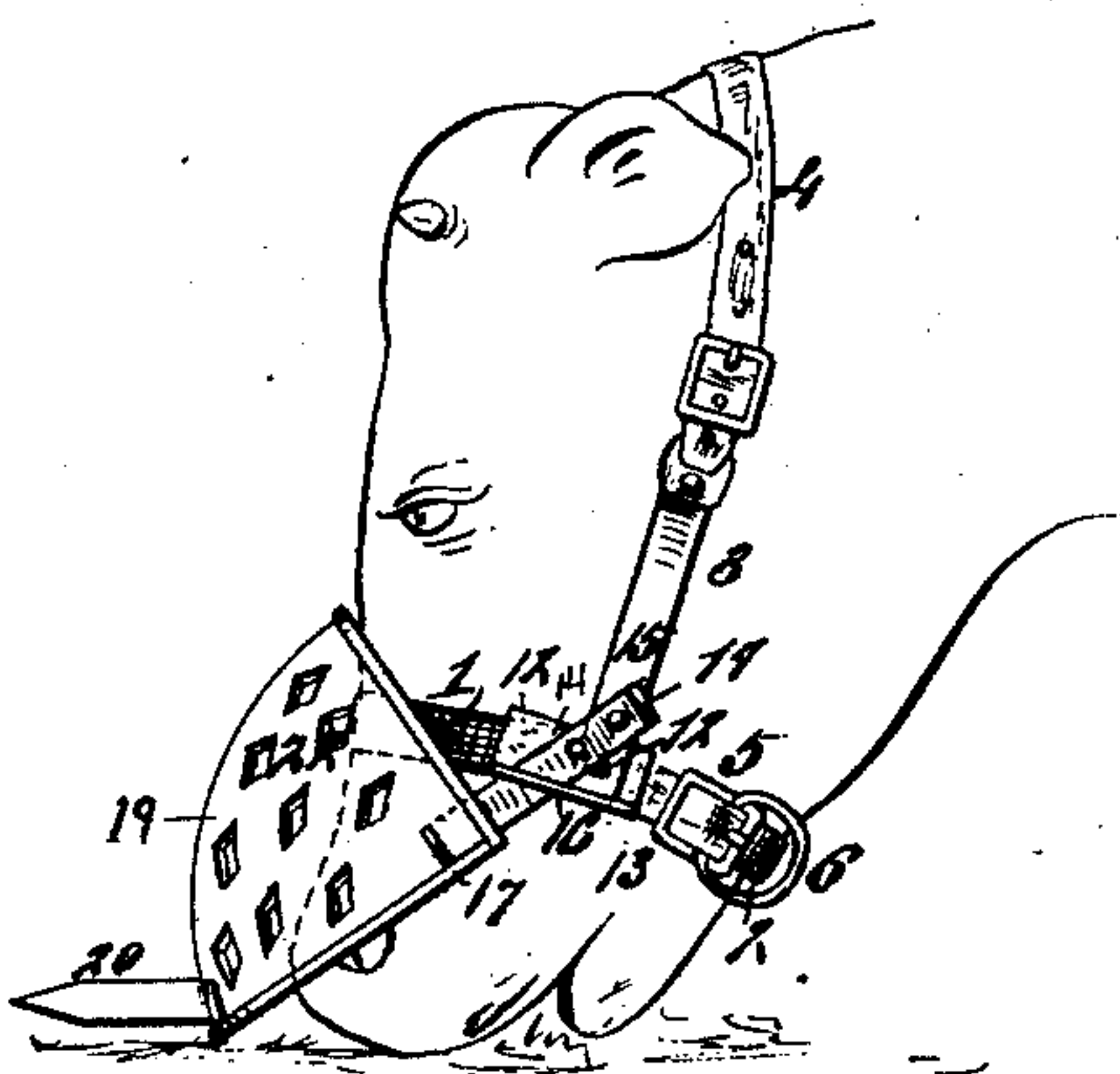


Fig. II,



Attest:

*Charles Pickles,
Emma Arthur.*

Inventors:

Michael H. Hickey

William Remme,

*By Knight Bros.
attys.*

UNITED STATES PATENT OFFICE.

MICHAEL H. HICKEY AND WILLIAM R. REMME, OF CHICAGO, ILLINOIS.

CALF-WEANER.

SPECIFICATION forming part of Letters Patent No. 367,629, dated August 2, 1887.

Application filed March 12, 1887. Serial No. 230,667. (No model.)

To all whom it may concern:

Be it known that we, MICHAEL H. HICKEY and WILLIAM R. REMME, both of Chicago, in the county of Cook and State of Illinois, have
5 invented certain new and useful Improvements in Calf-Weaners, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings forming part of this specification, and in which—

10 Figure I is a perspective view of our calf-weaning device shown in the position it maintains while the calf is endeavoring to suck; and Fig. II is a side elevation, showing the device secured to a calf's head, and the pivoted
15 barbed shield elevated by its contact with the ground to enable the calf to graze.

Our invention relates to a device to prevent calves from sucking cows when running with them during the time of weaning; and the in-
20 vention consists in features of novelty, hereinafter fully described, and pointed out in the claims, reference being had to the accompanying drawings, forming part of this specification, in which similar figures of reference indicate
25 like parts in both the views.

1 represents the nose-strap, 2 the throat-strap, 3 the metallic cheek-straps, and 4 the neck-strap, of the halter that carries our weaning half-muzzle. These straps, with the ex-
30 ception of the cheek-straps, are preferably of leather, and the cheek-straps are preferably of brass, but may be of any other suitable metal. The nose and throat strap may be made integral and adjusted to the size of the calf's head
35 and fastened by the buckle 5. A loop, 6, of brass or other metal, is provided for the attachment of a halter or tie-strap when needed, and is secured within the loop made by the return-bend of one end of the throat-strap, the
40 said loop also holding the buckle that secures the combined nose and throat strap. One metallic cheek-strap is secured to the fast end of the neck-strap by rivets 7 and the other one by similar rivets, 8, to a short loop-strap, 9,
45 whose riveted loop 10 carries the main buckle 11, in which the loose end of the neck-strap engages when the halter is fastened on the head of the calf. The front ends of the metallic cheek-straps are riveted at 12 to slotted an-
50 gle-plates 13 13, the rivets also passing through and being secured to the combined nose and throat strap.

Metallic barbed bars 14 are secured by pivot-pins 15 to the cheek-straps and work pivotally on said pin. These straps or flat
55 bars pass through and work in elongated slots 16 in the angle-plates. The said bars are bent out rectangularly at each end and pointed, making barbs 17 17, the rear ones of which point out from near the pivot-pins that attach
60 said bars to the cheek-straps, and the forward ones pass through slots 18 in a half-hemisphere or concave perforated plate 19. This concave plate covers the nose of the calf when it at-
65 tempts to suck, and besides the bars already described it is provided with twin barbs 20 20, bent forward from a strap, 21, that is riveted to the front of the concave plate. Perforations 22 in the concave plate allow free pas-
70 sage for the air through the plate to enable the calf to breathe without difficulty. These perforations are shown of a diamond shape; but we do not confine ourselves to that shape, as they may be made star shape, or in any other
75 suitable form that will not allow the entrance and consequent entanglement of brush or limbs to endanger the breakage and detachment of the muzzle.

One great difficulty that has been experienced in open-weaning muzzles made with wire
80 or other open metallic frames is that brush or limbs of trees or other objects in the pasture or woods where the calf and its mother are running, frequently catch and become entan-
85 gled in the open frame.

One intention of our invention is to overcome this difficulty by providing, instead of the open frame, a perforated concave plate in the form of a half-hemisphere. The perfora-
90 tions through this plate provide abundant entrance for the air that the calf breathes, but will not allow the entrance of any object that could entangle with the muzzle and damage it or its wearer or tear it from the calf's head.

It will also be seen that we provide barbs
95 back of the pivotal connection of the muzzle, as well as those in front on the concave plate, and thus make it far more difficult for the calf and its mother to evade the restriction that the weaning-muzzle is intended to force. Also, the
100 barbs and concave plate are so formed (see Fig. II) that they do not interfere with obstructions on the ground as the calf grazes; and in that connection also the smooth con-

cave plate will readily lift with the bars, to which it is attached on the pivot-pins, by which they are secured to the cheek-straps, instead of, as is frequently experienced, with open-frame muzzles catching in the obstructions, thus preventing the grazing of the calf and sometimes injuring or destroying the muzzle. The said pivoted bars, also working in the elongated slots of the angle-plates on the front ends of the cheek-straps, have free movement therein, while at the same time they are strongly braced from any adverse lateral movement. Not only is this concave metallic plate muzzle much easier on the calf that wears it than any wire or bar frame muzzle could be, and, for reasons given, less liable to injury, but also it is not as injurious to the cow as the open frame with its cross-bars, that frequently injure the cow's udder and teats. Also, the flat barbs, while their points are sufficiently suggestive to the cow to induce her to discard the calf's endeavors to suck, and, being stiffer, are in some ways more effectual, yet they do not puncture, tear, and injure the animal as severely as the wire barb.

Another valuable feature in the invention is its metallic cheek-strap with its slotted metallic angle or guide plate, in which the pivoted attachment-bars of the muzzle work. These metallic cheek-straps are curved to the shape of the calf's cheeks, and the elongated slots in their guide-plates insure steady vertical action to the pivoted bars that carry the muzzle and engage in said slots. While their pivotal action in the right direction is more free than it could otherwise be without the influence of the slotted angle-plate that guides them, they are at the same time steadied thereby and guarded from all lateral movement to which they might have a tendency given them from any obstructions against which the muzzle may come in contact.

The muzzle 19 has been described as a per-

forated plate. It may, if preferred, be made of wire work.

We claim as our invention—

1. The combination of a barbed muzzle, stiff bars by which it is pivoted to the cheek-pieces of a halter, and angle-plates 13, having slots 16, through which said bars pass and limit the oscillation of the muzzle, as set forth.
2. The combination, in a calf-weaner, of the concave sheet-metal muzzle, metallic bars extending therefrom and pivoted to the cheek-straps of the headstall or halter, and angle-plates 13, having slots 16, in which said bars play and which limit the movements of the bars on their pivots with the sheet-metal muzzle that they carry, as set forth.
3. The combination of the metal cheek-straps 3, the guide-plates 13, attached thereto, having elongated slots, the bars 14, pivoted to the cheek-straps and having movement within the elongated slots in the guide-plates, and the muzzle carried thereby, said bars 14 having flat pointed barbs that are rectangularly bent from their ends, the front ones of which pass through slots in the muzzle-plates that the bars carry, and flat twin barbs that with their connecting-strap are riveted to the front of the muzzle-plate, substantially as set forth.
4. The combination, in a calf-weaner, of the perforated sheet-metal muzzle provided with barbs, metal cheek-straps, pivoted bars connecting said muzzle with the cheek-straps, and slotted plates attached to said cheek-straps, through the slots of which the pivoted bars work, the whole being secured to the halter-straps that fasten it to the head of the animal, substantially as set forth.

MICHAEL H. HICKEY.

WILLIAM R. REMME.

In presence of—

JNO. BARNET,

FRED. W. BROWN.