

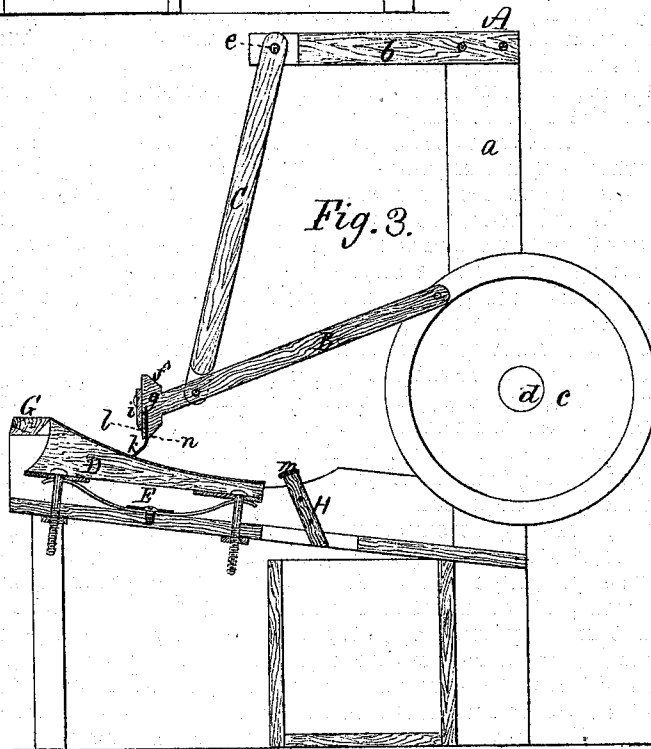
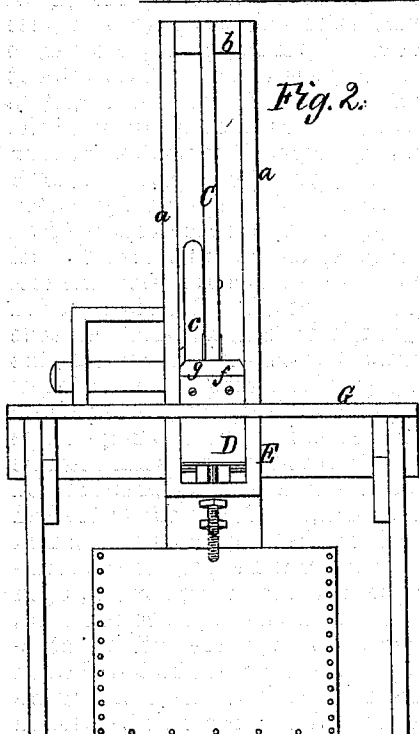
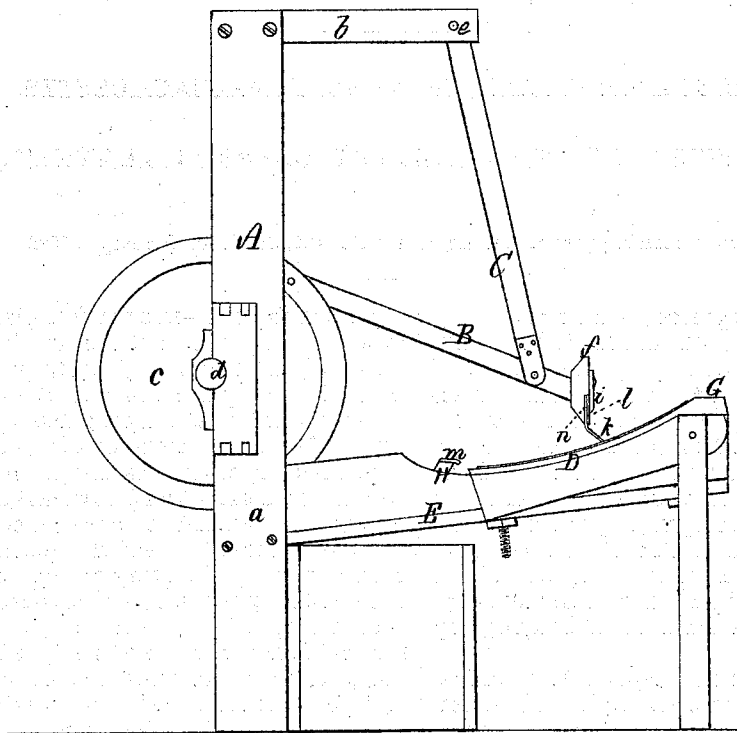
(92.)

C. A. McDONALD.

Improvement in Machines for Dressing Leather.

No. 122,395.

Patented Jan. 2, 1872.



Witnesses

L. A. Knowlton.
M. Bailey

C. A. McDonald.

by his Attorney,
Frederick Curtis.

UNITED STATES PATENT OFFICE.

CHARLES A. McDONALD, OF WOBURN, MASSACHUSETTS.

IMPROVEMENT IN MACHINES FOR DRESSING LEATHER.

Specification forming part of Letters Patent No. 122,395, dated January 2, 1872.

To all to whom these presents shall come:

Be it known that I, CHARLES A. McDONALD, of Woburn, in the county of Middlesex and State of Massachusetts, have made an invention of certain Improvements in Machinery for Sleeking Hides or Dressing Leather; and do hereby declare the following to be a full, clear, and exact description thereof, due reference being had to the accompanying drawing making part of this specification, and in which—

Figure 1 is a side elevation. Fig. 2 is a front end elevation, and Fig. 3 is a vertical and longitudinal section of a machine embodying my improvements.

My present invention relates to improvements in machinery for sleeking hides or dressing leather; and consists, first, in a peculiar construction of the head or carrier which supports the sleeking-tool whereby the degree of stiffness or power of the latter and its pressure upon the hide is varied according to circumstances, this effect being produced by the employment of a stiff metallic plate placed face to face to the tool and within the clamping-jaws of the head, the lowering of this plate toward the lower and working edge of the tool or its elevation above such edge having the effect of increasing or diminishing the rigidity, and consequently the power of the tool; and secondly, these improvements consist in sloping the sleeking or dressing-tool at angle of about twenty degrees to a plumb line, in order that it may pass more smoothly over the hide and any torn or weak places in it, and follow its irregularities, than if it were placed perpendicularly, as at present.

The drawing accompanying this specification represents at A a gallows-frame composed of two upright posts, *a a*, and a horizontal arm or crane, *b*, while between such posts, and about midway their height, I propose a fly-wheel, *c*, which is mounted upon a shaft or stud, *d*. B in the drawing represents a horizontal lever or bearer, one end of which is pivoted to the fly-wheel as a crank, while its other end is pivoted to the lower end of an upright vibratory or pendulous rod, C, such rod being suspended from the arm or crane *b* by means of a pivot, *e*, the motion imparted to the beam B by means of the fly-wheel *c* and rod C being a compound one—that is, an oscillating and

reciprocating one—in a vertical plane. To the extreme outer end of the beam B I affix an upright head or clamp, *f*, composed of a base-plate, *g*, having a shallow depression, *h*, in its outer forward face, and provided with a clamp-bar, *i*, affixed to it by screws or bolts in a suitable manner, thus creating a channel, into which the sleeking-tool (shown at *k* in the drawing) is inserted and clamped; a steel plate, *l*, being interposed between the sleeking-tool and clamp-bar *i*, by elevating or depressing which the flexibility of the tool, and consequently its pressure upon the hide is varied. The sleeking-tool is a thin blade of steel, bent longitudinally at about its middle at an obtuse angle in order that its lower and sleeking portion, which protrudes from the clamping-head, shall slope rearward at an angle of twenty degrees or thereabouts to a vertical plane, in order, as before stated, to pass over the hide without entangling in a hole in the same or tearing its weak places, as well as to adapt itself to the irregularities of the hide. The combined action of the oscillating and reciprocating beam B and the pendulous rod or suspensory C compels the sleeking-tool to describe a curved path in a vertical plane, and in order that the tool shall act upon a hide I dispose below the tool a concave bed or block, D, which is placed in a suitable trough or box, E, which extends outwardly from the posts of the frame A, the bed D being provided with screws or their equivalent in a suitable manner, whereby its position with respect to the sleeking-tool is adjusted in order that the latter shall describe a sweep over it with a uniform pressure. A suitable bench or table, G, surrounds the bed D, upon which the hide is deposited, and in rear of, or both in front and rear of, the sleeking-tool I dispose a bar or support, H, upon the upper part of which a soft pad, *m*, is placed, this pad being situated in the path of movement of the tool and near to the termination of its traverse in order that such tool may impinge against it, and by this means be cleaned from any dust or injurious substances which adhere to it.

The hide to be sleeked or dressed is placed upon the bed D and the wheel *c* put in rotation. The tool *k* describes reciprocating sweeps over the hide, which is to be moved about be-

low it until all its parts have been subjected to its action. In place of the bed D I have contemplated the employment of a stout strap of leather confined securely at each end in a suitable manner, as this strap would adapt itself automatically without adjustment to the sweep of the sleeking-tool.

I am aware that the wiping-tool in itself or in combination with the sleeking-tool is not new, and has before been patented to other parties; and I lay no claim to this feature.

What I do claim as my invention is as follows:

Claims.

1. I claim the herein-described construction

of the tool-carrier, the same consisting of the base-plate *g*, clamp-bar *i*, and intermediate plate *l*, substantially as and for purposes stated.

2. I also claim the sleeking-tool when constructed substantially as described, and so as to stand at an angle with the bed, in combination with the swinging frame for carrying said tool, substantially as shown and described.

C. A. McDONALD.

Witnesses:

FRED. CURTIS,
W. E. BOARDMAN.

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