

No. 647,107.

S. A. McWILLIAMS.
HEN TRAP NEST.
(Application filed Aug. 2, 1899.)

Patented Apr. 10, 1900.

(No Model.)

Fig. 1.

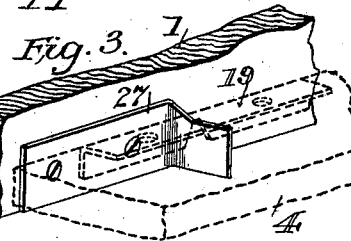
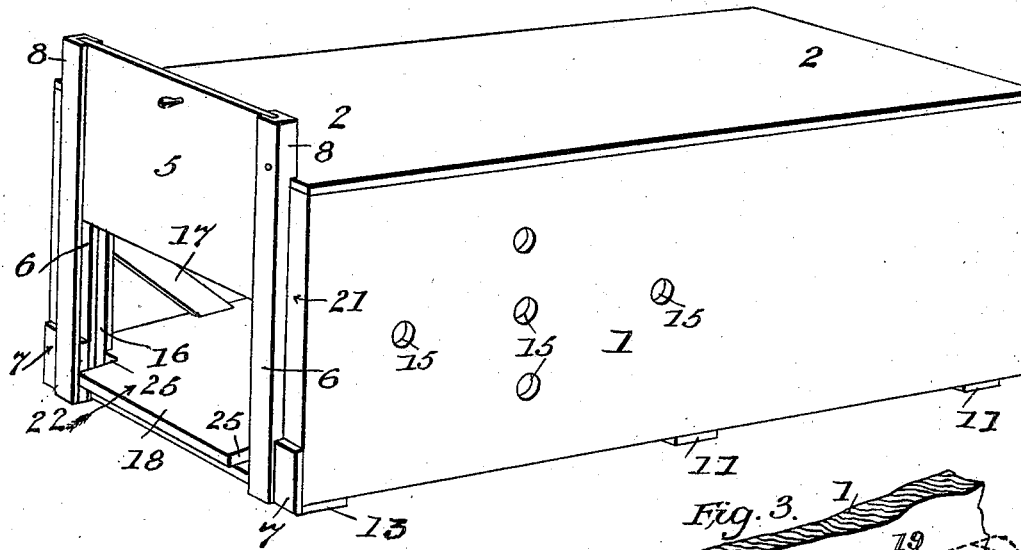
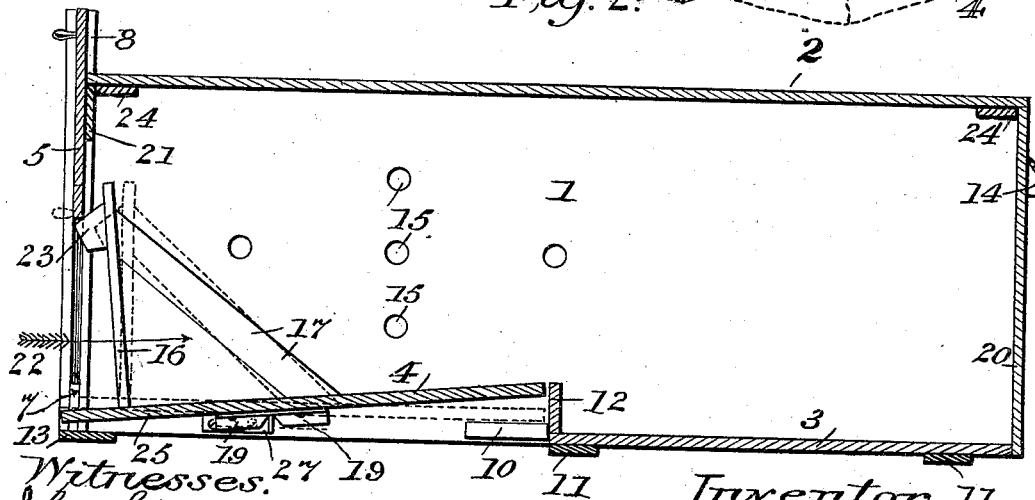


Fig. 2.



Witnesses:
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HEN-TRAP NEST.

SPECIFICATION forming part of Letters Patent No. 647,107, dated April 10, 1900.

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To all whom it may concern:

Be it known that I, SAMUEL A. McWILLIAMS, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, (whose post-office address is 3456 Michigan avenue,) have invented an Improvement in Hen-Trap Nest-Boxes for Laying Hens, of which the following is a specification.

In making a hen-trap nest-box for laying hens I had the following objects in view: first, to construct one that would admit but one hen at a time and hold her securely until released; second, to construct one that would consist of a single box, avoiding the necessity of using one box within another, and yet be long enough to give room for a nest in the rear and an equal space for standing-room in front; third, to construct one that would consist of a single box and have the floor or bottom to consist wholly of a loose nest-board and a loose tilting platform supported upon the same plane; fourth, to construct one that poultrymen could easily make at home wholly from old boxes, nails, and a small piece of tin; fifth, to construct one in which the essential parts—namely, the door, the cover, and the bottom pieces—could be quickly removed for cleaning purposes, without the necessity of loosening a single fastening, by simply turning the box upside down and giving it a shake; sixth, to construct a tipping platform that could be used by itself for a bottom and that would extend from the nest through the front opening and have its upper surface entirely level and smooth, so that a hen's feet could be drawn along its entire surface without any obstruction against which she could brace her feet.

Figure 1 illustrates a perspective view of my trap-nest; Fig. 2, a vertical central longitudinal section thereof; and Fig. 3 a detail in perspective of one wall of the box-frame and of the platform, also the means by which the latter is fulcrumed on the former.

The following numerals refer to the numerals on drawings:

1 is a box-frame of four boards of equal depth, which when nailed together is of rectangular form; 2, a cover loosely but securely mounted on top of the frame 1; 3, a nest-board loosely supported on stops 11, fastened to the bottom edge of the frame 1 and occu-

pies nearly the rear half of the frame 1; 4, the platform supported loosely and entirely by the upper edges of the tin plates 27, which project inward from the sides of the frame 1. It sits loosely but securely within the front half of the frame 1 and has a vacant space of a quarter-inch or more all around between it and the surrounding structures. This vacant space is left purposely to permit loose material to drop through and from the frame 1. This platform 4 has no obstruction on its surface which would prevent the hen's feet from sliding over it. It projects through the front hole 22 as a tongue-like projection.

5 is the drop-door, which moves vertically in grooves 6 on the outside of the front 21. It is loosely held in the grooves 6 and has no obstruction in its upward course.

6 are vertical grooves for the drop-door 5 to slide in. They are placed on the outside of the front 21.

7 are the striking-plates placed across the bottom of the grooves 6 for the drop-door 5 to fall on, and thus prevent its falling on the tongue-like projection of the platform 4; 8, stops fastened to the back of the grooves 6 above the cover 2, which prevent the cover 2 from being pushed up by a hen while standing in front; 27, rectangular plates of tin, which project horizontally and vertically inward from their attachment to the sides of the frame 1 and at such a point as will balance the platform 4; 10, stops which are so placed on the inside of the frame 1 as to prevent the nest-board 3 from moving forward and the platform 4 from tipping backward; 11, stops attached to the under edges of the frame 1 for the support of the nest-board 3; 12, a strip nailed across the front end of the upper surface of the nest-board 3 to hold in the nesting material; 13, a strip fastened along the under edge of the front 21 of the frame 1 to strengthen it and to arrest the platform from tipping down too far; 14, a suitable device fastened to the back of the frame 1 to serve the purpose of a handle; 15, holes through the sides of the frame 1 for ventilation; 16, uprights nailed to the shoulders or front edges of the platform 4 close to its lateral edges; 17, braces attached to the outer edge of the uprights 16 and platform 4; 18, the tongue-like extension of the platform 4,

which projects through the hen-hole 22 in the front 21 in order to present an unobstructed smooth surface for the hen's feet to slide out on; 19, rectangular plates of tin which have
 5 a V-shaped notch nearly a quarter-inch deep cut out from the center of one long edge of each. A full quarter-inch of this same edge is then bent downward. The V-shaped notch is to keep the platform 4 in place and prevent it from sliding forward or backward.
 10 These tin plates are attached to the under surface of the platform 4 close to its lateral edges and so placed as to balance it on the upper edge of the tin plates 27, which project
 15 from the sides of the box-frame 1.

20 20 is the rear end of the box-frame 1, which is vertical; 21, front end of the box-frame 1, which is also vertical and which has a hole 22, large enough to admit a hen easily. It also has vertical grooves 6 attached to it externally close to the lateral edges of the hen-hole 22 just mentioned.

22 is a hole in the front for the hen to pass in and out; 23, two projections which protrude through the upper part of the hen-hole
 25 22 just far enough to support the drop-door 5. They are attached to the inner edge of the uprights 16. As the hen passes over the platform 4 to reach her nest 3 these projections are pulled from under the door 5 by tipping
 30 of the platform 4 backward, when the door 5 drops by gravity.

24 are narrow thin strips or stops so placed under the cover 2 as to prevent it from moving forward, backward, or to either side; 25,
 35 shoulders of the platform 4, which are near its front, close to its outer edge, and which are slightly beveled upward and backward to receive the uprights 16 after cutting out a rectangular piece from the front corners of the
 40 platform 4.

27 shows where a horizontal and a beveled piece has been cut off from the upper edge of the thin rectangular tin plates 27, which project inward from the sides of the frame 1.
 45 The bevel keeps the platform 4 from rubbing on the sides of the frame 1.

I claim—

The combination, in a hen-trap nest-box for laying hens, with a rectangular frame having a hen-hole in front, of a drop-door sliding
 50 loosely in vertical grooves on the outside of the front of the frame; and of an unconnected loose cover held in position by stops under the cover, and by stops in front above the
 55 cover; of a floor-bottom sitting loosely within the frame which is composed of nearly-equal parts placed on the same plane, viz: an unconnected nest-board in the back half securely supported by stops attached to the
 60 lower edges of the frame, and an unconnected tilting platform in the front half occupying the entire floor from the nest-board in the rear, to and extending beyond the hen-hole
 65 in front, and having uprights attached to it near its front, to which are attached projections extending through the upper part of the hen-hole; of two thin rectangular tin plates
 70 projecting from the frame vertically and horizontally inward having their thin upper edges cut so as to present an inner horizontal portion and an outer portion beveled outward and upward; and also of two thin rectangular tin plates fastened under the lateral surfaces
 75 of the platform, each of which plates has a portion of its vertical edge provided with a V-shaped opening.

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Witnesses:

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