(No Model.)

J. M. LUCAS.

EGG SEPARATOR.

No. 492,892. Patented Mar. 7, 1893.

Fig 1

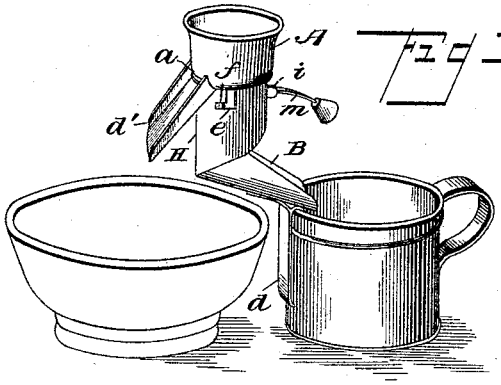


Fig 2

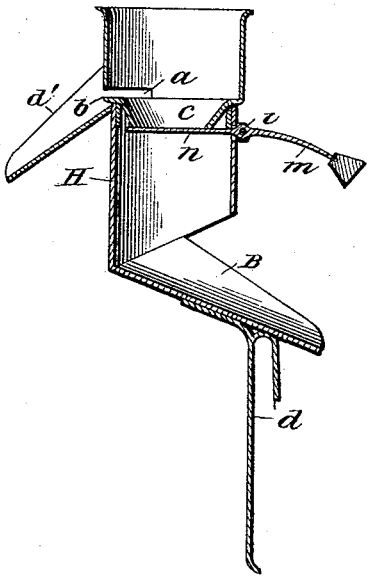


Fig 3

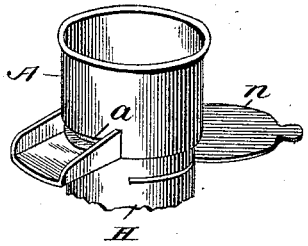
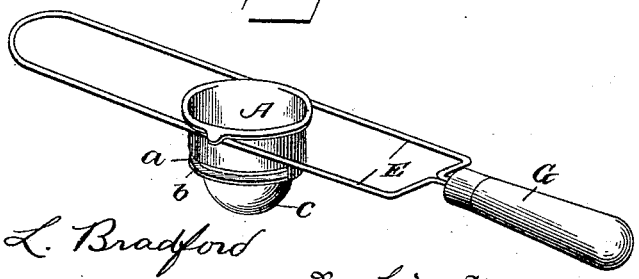


Fig 4



Witnesses

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JOHN M. LUCAS, OF CADIZ, OHIO.

EGG-SEPARATOR.

SPECIFICATION forming part of Letters Patent No. 492,892, dated March 7, 1893.

Application filed May 26, 1892. Serial No. 434,463. (No model.)

To all whom it may concern:

Be it known that I, JOHN M. LUCAS, a citizen of the United States of America, residing at Cadiz, in the county of Harrison and State of Ohio, have invented certain new and useful Improvements in Egg-Separators, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to a device for separating the white of an egg from the yelk.

The improvement consists of a cup or receptacle having a settling-chamber in its bottom to receive the yelk, which being the heavier is precipitated to the bottom, and having a discharge slot in its side.

The improvement further consists in an annular flange at the top of the settling-chamber to direct the white of the egg to said discharge-slot. And it further consists in means for attaching the device to the side of a suitable vessel and providing it with chutes or spouts for conveying the separate parts of the egg into separate vessels.

It further consists in providing the cup with a dumping or tilting bottom, by which the yelk may be dropped into the proper receptacle, without tilting or inverting the cup.

The improvement also consists of the novel features and peculiar constructions and combinations of the parts which will be hereinafter described and claimed, and which are shown in the annexed drawings, in which—

Figure 1 is a side elevation showing my improved separator attached to a vessel. Fig. 2 is a vertical section of my improved separator. Fig. 3 is a modification of the same in perspective elevation, the lower part of the cylinder being removed. Fig. 4 represents the cup with a handle and without the chutes.

The cup is provided on its side at a proper point between its top edge and bottom with a discharge-slot *a*, which is long and narrow. The settling-chamber C in the bottom of the cup is approximately semi-spherical in shape and about equal in capacity to the bulk of the yelk of an ordinary egg. The annular flange or offset *b* at the top of the settling-chamber, receives the white of the egg as it is displaced from the settling-chamber by the yelk, and directs the same to the discharge slot *a*. The upper portion of the separator above the flange or offset *b* prevents the overflow and too rapid discharge of the white of the egg, and retains the same until it is discharged through the slot *a*, and serves simply as a guard or retainer.

The separator may be made of glass, pottery ware, rubber, metal, or any suitable material.

For convenience in using the separator, I provide it with an attaching clamp *d*, which is made of spring metal adapting it to fit the edge of vessels differing in thickness; or I may provide it with a handle G as shown in Fig. 4, which is attached to the cup A by means of a wire frame E, that engages with a flange at the mouth of the cup which may be provided with lips to be turned down upon the wire frame on opposite sides. I prefer, however, to use the form of this device as illustrated in Figs. 1 and 2, in which the cup A is secured to a short cylinder terminating in a sloping chute B, to which the clasp is attached for securing the separator to the side of a vessel. The chute *d'* is attached to the cup and is intended to convey the white of the egg to a separate vessel; it is obvious, however, that this chute may also be attached to the cylinder H if found more convenient. The cup A is secured to the cylinder by means of slots *e* which are formed like bayonet joints, by being cut longitudinally and transversely of the cylinder. Into these slots pins or projections *f* on the sides of the cup enter. The cup as shown in Figs. 1, 2 and 3, is without integral bottom, and the opening is normally closed by a falling, tilting, or sliding bottom, attached to the cylinder H.

Figs. 1 and 2 show the form of my separator that I prefer, in which the bottom *n* is pivoted at *i* to the cylinder H, and connects with a lever *m*, the end of which is weighted to keep the bottom closed against the settling-chamber C.

To use the separator the eggs are broken, one at a time, and dumped from the shell into the cup. The yelk settles into the chamber C and the white is discharged through the slot *a*. After the white of the egg has been discharged, the yelk is dumped from settling-chamber C into the chute B, by raising the lever *m* which drops the bottom *n* and allows the yelk to pass down the inclined chute B into the vessel to which the separa-

tor is attached; or if the form shown in Fig. 4 is used, the white is discharged through the slot *a* and the yelk is placed in a suitable receptacle by tilting the separator with the hand. In either case the operation is repeated, until each egg is treated in the same manner.

Having thus described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. An egg-separator comprising a settling-chamber and a guard open at its top and projected from and surrounding the said settling-chamber and having a discharge-slot in its side between the settling-chamber and guard, substantially as shown and described.

2. An egg-separator having a settling-chamber in its bottom, a slot in its side, and having an annular offset or flange at the top of the said chamber, substantially as and for the purpose specified.

3. An egg-separator having a semi-spherical settling-chamber in its bottom and having a discharge-slot in its side, and having an annular flange between the said chamber and slot, substantially as described, for the purpose set forth.

4. In an egg-separator, a settling-chamber, means for attaching the separator to a receptacle, means for separating the white from the yelk of the egg and means for depositing the separated parts into suitable receptacles without detaching the separator from the vessel, substantially as described.

5. In an egg-separator the cup A having the side slot *a* and an aperture in its lower part, said cup being adapted to fit within the cylinder H, in combination with said cylinder, the tilting-bottom *n*, and lever *m* adapted to open and close the aperture in the lower part of the settling-chamber, the chute B for conveying the yelk to a suitable receptacle and the attaching clamp *d*, substantially as described and for the purpose specified.

6. In an egg-separator the cup A having a settling-chamber C adapted to hold the yelk of an egg and having a downward opening and means for normally closing the same, and a slot *a* in its side to separate the white from the yelk, a chute *d'* leading from the separating slot and adapted to convey the white of the egg to a suitable receptacle, in combination with the cylinder H having the longitudinal and transverse groove *e* in its upper edge, the pin *f* engaging said groove, the cylinder H being provided with a chute B and the attaching clamp *d*, substantially as described.

7. In an egg-separator, the combination of the cup A having a settling-chamber C, said chamber opening downwardly, a side slot *a* and a chute *d'* leading from said slot, in combination with the tilting bottom *n* and lever *m*, substantially as described.

8. In an egg-separator, a cup provided with an open bottom and means for closing the same and a slotted side with a co-operating chute, in combination with a suitable support and attaching device, substantially as and for the purpose set forth.

9. In an egg-separator, an open bottomed cup provided with a slot in its side and a pin or projection and means for closing the open bottom, in combination with a cylinder having a longitudinal slot terminating with a transverse extension, substantially as and for the purpose specified.

10. In an egg-separator the combination of a cup with an open bottom and slotted side, and means for closing the opening in the bottom, with a cylinder and chute, substantially as and for the purpose set forth.

In testimony whereof I affix my signature in presence of two witnesses.

JOHN M. LUCAS.

Witnesses:
I. P. LUCAS,
CHAS. OSBORN.