

UNITED STATES PATENT OFFICE.

WILLIAM R. FOWLER, OF ANNE ARUNDEL COUNTY, MARYLAND.

IMPROVED FLY-EXPELLING FAN.

Specification forming part of Letters Patent No. 40,746, dated December 1, 1863.

To all whom it may concern:

Be it known that I, WM. R. FOWLER, of Anne Arundel county, in the State of Maryland, have invented certain new and useful improvements in machines for expelling flies from tables; and I hereby declare that the following is a true and exact description of the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon.

The nature of my invention consists in the use of certain devices put in motion by clock-work for expelling flies from a common-size family dining table, in the manner hereinafter described.

Figure I is a plan view of my machine. Fig. II in the annexed drawings represents a vertical section of the same with the fans in position. Fig. III represents a plan view of the fans.

A in Fig. II represents a vertical section of the case which contains the clock-work, and can be made either square or cylindrical, plain or ornate, to suit the taste.

B represents the arbor of the clock-movement, to the upper end of which the forked rod E is fastened by means of a pin.

The stem F, which is firmly attached to the top of case A, has a hole passing vertically through its center. Into this hole the rod E is inserted and extends about an inch above the top of stem F. The upper end of the rod E is kept in place by passing through a hole in a metal plate at the top of stem F. The upper end of rod E is made square and is inserted in a socket in the shaft G, being held firmly in its position by the thumb screw d.

M represents an adjustable sleeve fitted on shaft G, and made fast at any desired point by the thumb-screw e.

h h are two pins of wood passing through sleeve M at right angles with its sides, having heads large enough to admit of mortises to contain the handles I. The heads of pins h, when in position, are on opposite sides of sleeve M, with their small ends extending sufficiently far through sleeve M to afford a rest

for the handles of the fans K when occupying their respective positions in the heads of said pins. By this arrangement the fans are made to incline slightly upward from the sleeve M.

g in Fig. III represents a knob, to which the wire rim of the fans K is fastened by a wrapping of fine wire. g has a hole lengthwise through it, into which the upper end of handle I enters. The screw n is inserted in the end of I when it is embraced by knob g, which, by being screwed down, enlarges the end of I, and keeps the knob g firmly in position.

N represents a sliding stop, which, by being forced in, arrests the motion of the rod E and the parts attached to it.

It will be observed that the fans K are so placed that in revolving around the axes of motion their edges, and not their broad sides, are presented to the air, and thus meet with the least possible resistance. Owing to this movement, the fans can be constructed of the lightest material, thin dark paper being preferable for this purpose.

The advantage which I claim for my machine consists not singly in expelling flies from the table during meals, but also (from the length of time which it runs after being wound up) in its utility in protecting children when asleep and the sick when confined to their beds from the annoyance of flies and mosquitoes—an office that otherwise would have to be performed by the constant assiduity of a nurse.

The machine runs about an hour and a half.

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

The sleeve M, rods I I, thumb-screws n n, and revolving shaft G, when the whole shall be constructed, arranged, and operated as and for the purpose herein described.

WM. R. FOWLER.

Witnesses:

CHARLES ALEXANDER,
EDM. F. BROWN.