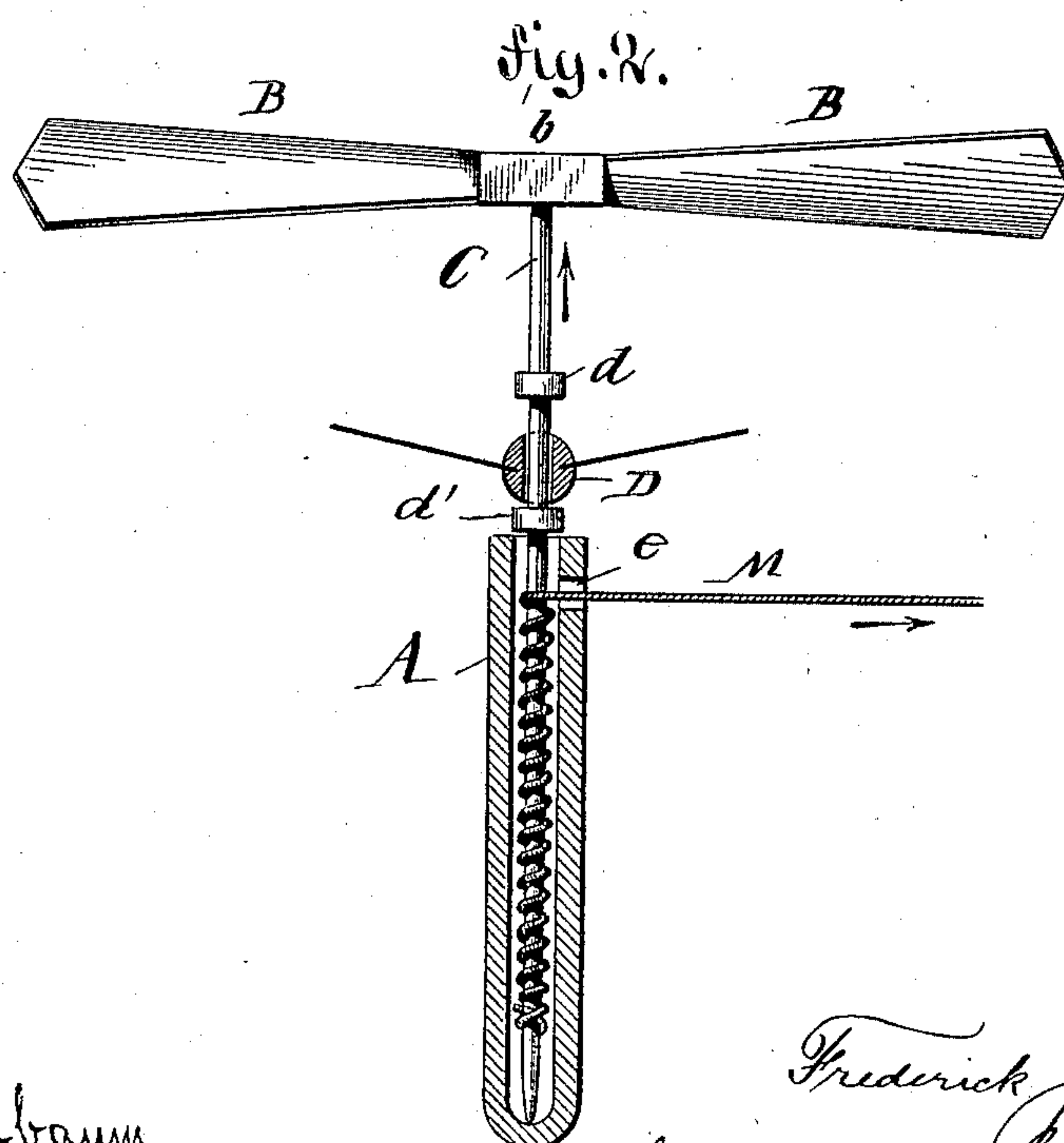
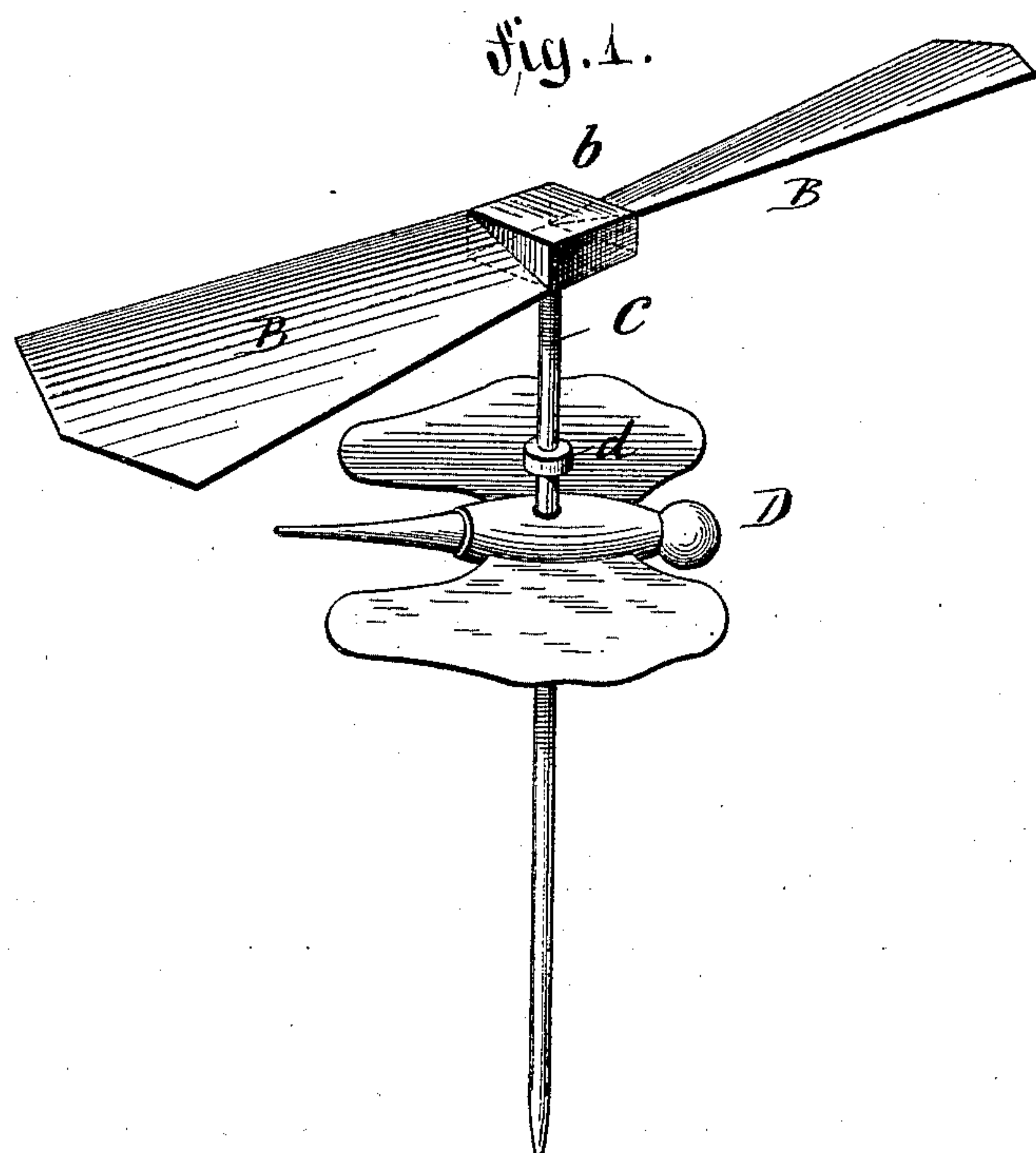


(No Model.)

F. J. LUTZ.
FLYING TOY.

No. 397,435.

Patented Feb. 5, 1889.



Witnesses.
J. H. Rosenbaum.
Sidney Mann

Inventor,
Frederick J. Lutz
By his Attorneys
H. H. Haeger

UNITED STATES PATENT OFFICE.

FREDERICK J. LUTZ, OF BROOKLYN, NEW YORK.

FLYING TOY.

SPECIFICATION forming part of Letters Patent No. 397,435, dated February 5, 1889.

Application filed May 15, 1888. Serial No. 273,940. (No model.)

To all whom it may concern:

Be it known that I, FREDERICK J. LUTZ, of Brooklyn, in the county of Kings and State of New York, have invented certain new and
5 useful Improvements in Flying Toys, of which the following is a specification.

This invention relates to an improved flying toy of that class in which the toy is propelled by means of propeller-blades, to which motion
10 is imparted by a string wound around the spindle of the propeller.

In the accompanying drawings, Figure 1 is a perspective view of my improved flying toy, shown as flying in the air; and Fig. 2 is a side
15 elevation, partly in vertical central section.

Similar letters of reference indicate corresponding parts.

My flying toy consists of two detachable parts—a tubular handle, A, that is closed at
20 the lower end, and the toy proper, which consists of propeller-blades B B, that are secured by a hub, b, to the upper end of a spindle, C. On the spindle C are arranged two fixed collars, d d, below the fan-blades, between which
25 collars is arranged a loosely-turning figure, D, representing a butterfly, bird, or other suitable figure, the wings of which are made of tin, pasteboard, or other rigid material with a slight upward inclination, as shown in Fig. 2.
30 The figure D serves for steadying the motion of the toy, which would otherwise gyrate irregularly through the air, but by the action of the steadying or steering figure D rises in a straight vertical or inclined line into the
35 air, according to the position of inclination of the handle when the same is sent off from the same into the air.

Motion is imparted to the flying toy by means of a string, M, that is wound around the spindle and passed through an aperture or guide-
40 eye, e, near the upper end of the handle, the lower end of the spindle being preferably rounded off, so as to decrease the friction with the lower end of the socket of the handle as
45 much as possible.

For using my toy, the string M is passed

through the guide-eye e and wound around the lower end of the spindle below the steadying-figure D, and the spindle is then inserted with the wound-up string into the socket of
50 the handle. In this condition the handle is held with one hand and the string is pulled with the other hand, whereby the toy is propelled into the air by means of the propeller-blades, but steadied by the steadying-figure
55 below the blades.

I am aware that flying toys have been used heretofore in which propeller-blades at the end of the spindle are used, said blades being sent in the air by a suitable rotating device,
60 and I do not claim this feature, broadly, as my invention depends on the arrangement of the steadying device below the blades, as thereby the straight regular motion of the toy is secured.
65

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

1. In a flying toy, the combination of a socket-shaped handle having a guide-eye at its upper end, a spindle loosely inserted in said
70 handle, propeller-blades fixed to the upper end of said spindle, two collars on the spindle, and a steadying-body on the spindle between the collars and adapted to turn loosely in a plane at right angles to the spindle.
75

2. In a flying toy, the combination of a socket-shaped handle having a guide-eye at its upper end, a spindle loosely inserted in said handle, propeller-blades fixed to the upper end of said spindle, two collars on the spindle,
80 and a steadying-body on the spindle between the collars and adapted to turn loosely in a plane at right angles to the spindle, said steadying-body having upwardly-inclined wings.
85

In testimony that I claim the foregoing as my invention I have signed my name in presence of two subscribing witnesses.

FREDERICK J. LUTZ.

Witnesses:

SIDNEY MANN,
JOHN A. STRALEY.