Dec. 5, 1939. S. C. OGSBURY ET AL 2,182,406

TOY AIRCRAFT

Original Filed April 27, 1938 2 Sheets-Sheet 1

Fig. 1.

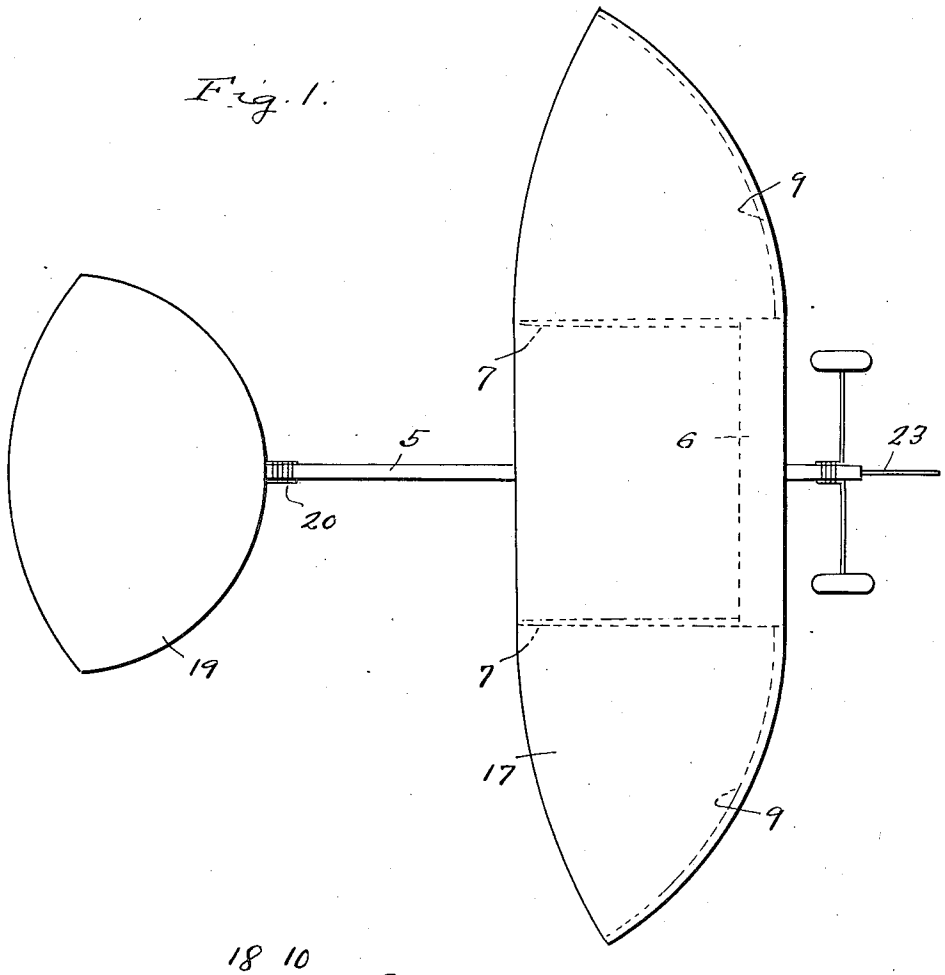
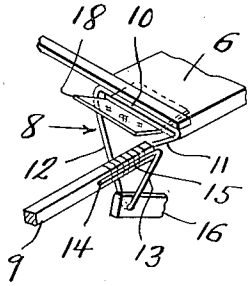


Fig. 5.



S. C. Ogsbury Inventors
Charles Barron
Ira R. Park

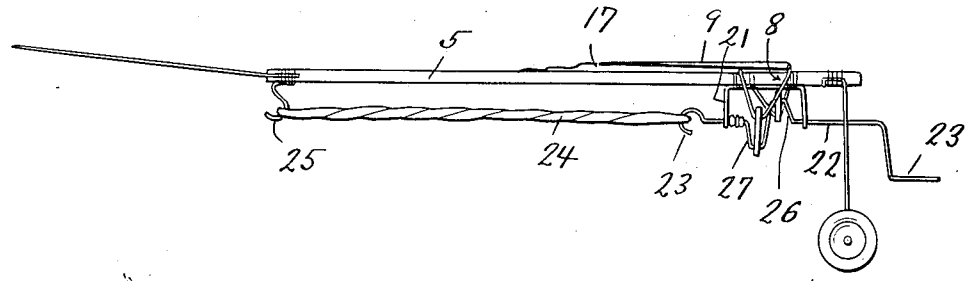
By Clarence O'Brien
and Hyman Berman
Attorneys

Dec. 5, 1939. S. C. OGSBURY ET AL 2,182,406

TOY AIRCRAFT

Original Filed April 27, 1938 2 Sheets-Sheet 2

Fig. 2.



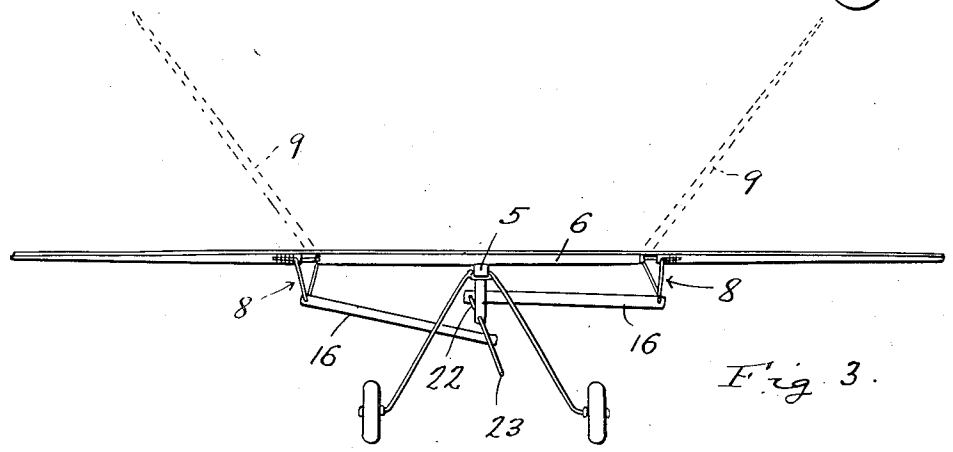


Fig. 3.

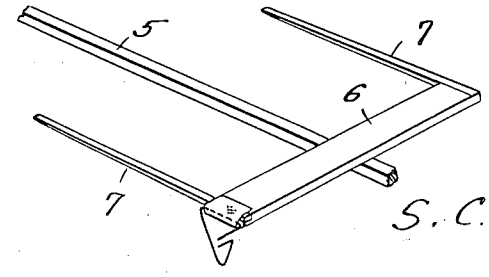


Fig. 4.

Inventors
S. C. Ogsbury
Charles Barron
Irl R. Park

By Clarence A. O'Brien
and Hyman Berman
Attorneys

Patented Dec. 5, 1939 2,182,406

UNITED STATES PATENT OFFICE

2,182,406

TOY AIRCRAFT

Stanton C. Ogsbury, Boise, and Charles Barron, Fairfield, Idaho, and Irl R. Park, Seattle, Wash.

Application April 27, 1938, Serial No. 204,688
Renewed October 6, 1939

2 Claims. (Cl. 46—74)

This invention appertains to new and useful improvements in toy aeroplanes and more particularly to a toy aeroplane which can be conveniently wound up and which in operation will simulate the flight of a bird through the medium of flapping wings.

Another important object of the invention is to provide a toy aircraft of the character stated which will be of such construction that it can be repaired easily in the event damage is done to the same in landing, or in other ways.

These and other objects of the invention will become apparent to the reader of the following specification.

In the drawings:

Figure 1 represents a top plan view.

Figure 2 is a side elevational view.

Figure 3 is a front view.

Figure 4 is a fragmentary perspective view of the frame.

Figure 5 is a fragmentary perspective view of the manner in which one of the wing ribs is connected to the main frame.

Referring to the drawings wherein like numerals designate like parts, it can be seen that the main frame consists of an elongated member 5 having the elongated cross plate 6 at its forward end. This cross plate 6 may be of some very light wood as is the elongated member 5 and extending from the ends of the plate 6 and rearwardly are the rearwardly tapered ribs 7—7 which can be of bamboo or some other highly flexible but light material.

At each end of the cross plate 6 is a pivotal connection such as is generally referred to by numeral 8 between the corresponding arcuate wing member 9 and the plate 6. Each of these pivotal members 8 consists of a wire member which has one portion 10 disposed parallel to the corresponding end of the plate 6. One end portion of the wire member 10 is bent downwardly as at 11 and then outwardly to pass along the side of the corresponding end portion of the rib 9, while the other end portion is bent downwardly and inclined forwardly as at 12 and then upwardly to form the V-formation 13. The upper end of this V-formation is bent outwardly as at 14 and this end and the first-mentioned end of the wire member are secured by suitable wrappings 15 to the adjacent end of the rib 9.

The apex portion of the V-shaped formation 13 extends through the adjacent end of the pitman 16.

It can now be seen, that a single sheet 17 of silk or some other suitable material is spread over the top of the plane encompassing the plate 6, wing ribs 9 and central ribs 7 and suitably secured to these members and to properly secure the portion 10 of the pivoting member in place a strip of adhesive plate or the like 18 can be employed in the manner suggested in Figures 4 and 5.

Numeral 19 represents the tail member which is suitably secured as at 20 to the rear end of the elongated member 5.

The propelling means, supplementing what is shown in Figure 5, consists of the inverted U-shaped bracket 21 through which the crankshaft 22 extends, the crankshaft 22 extending forwardly of the elongated member 5 and having the hand crank 23 formed at its forward end.

The rear end of the crankshaft 22 has the hook formation 23 which is hooked over one end of the elongated elastic band 24. The other end of the elongated elastic band is disposed over the hook 25 which is located at the rear end of the elongated member 5.

The crankshaft 22 is provided with the cranks 26 and 27 with which the inner ends of the pitmans 16 are connected.

It can now be seen, that by rotating the hand crank 23, the elastic band 24 can be wound and thus tensioned so that when the hand crank 23 is released, the crankshaft 22 is caused to rotate rapidly with the result that the pitmans 16 are actuated resulting in a vertical flapping of the wing portions.

While the foregoing specification sets forth the invention in specific terms, it is to be understood that numerous changes in the shape, size and materials may be resorted to without departing from the spirit and scope of the invention as claimed hereinafter.

Having described the invention, what is claimed as new is:

1. A toy aeroplane comprising a fuselage member, a wing structure, said wing structure including a central section and flappable end sections, said central section including a reinforcing member, a drive shaft including cranks therein, pitmans extending from the cranks and connectors between the pitmans and the flappable sections, said connectors consisting of a substantially triangular shaped wire member having one portion rotatably mounted on the corresponding end of the reinforcing member, said triangular shaped member being divided at the intermediate portion of one side portion and having its end portions disposed laterally in substantially parallel relation to span a portion of the corre-

sponding flappable section, the corresponding pitman being connected to the outstanding apex portion of the triangular shaped wire member.

2. A toy aeroplane comprising a fuselage member, a wing structure, said wing structure including a central section and flappable end sections, said central section including a reinforcing member, a drive shaft including cranks therein, pitmans extending from the cranks and connectors between the pitmans and the flappable sections, said connectors consisting of a substantially triangular shaped wire member having one portion rotatably mounted on the corresponding end of the reinforcing member, said triangular shaped member being divided at the intermediate portion of one side portion and having its end portions disposed laterally in substantially parallel relation to span a portion of the corresponding flappable section, the corresponding pitman being connected to the outstanding apex portion of the triangular shaped wire member, each of the said flappable end sections including a reinforcing structure, said parallel end portions of the connectors being adapted to overlap the corresponding reinforcing structures, and tie means wrapped around the end portions of the connectors and the reinforcing structure for securing the connectors to the reinforcing structures of the flappable sections.

STANTON C. OGSBURY.
CHARLES BARRON.
IRL R. PARK.