

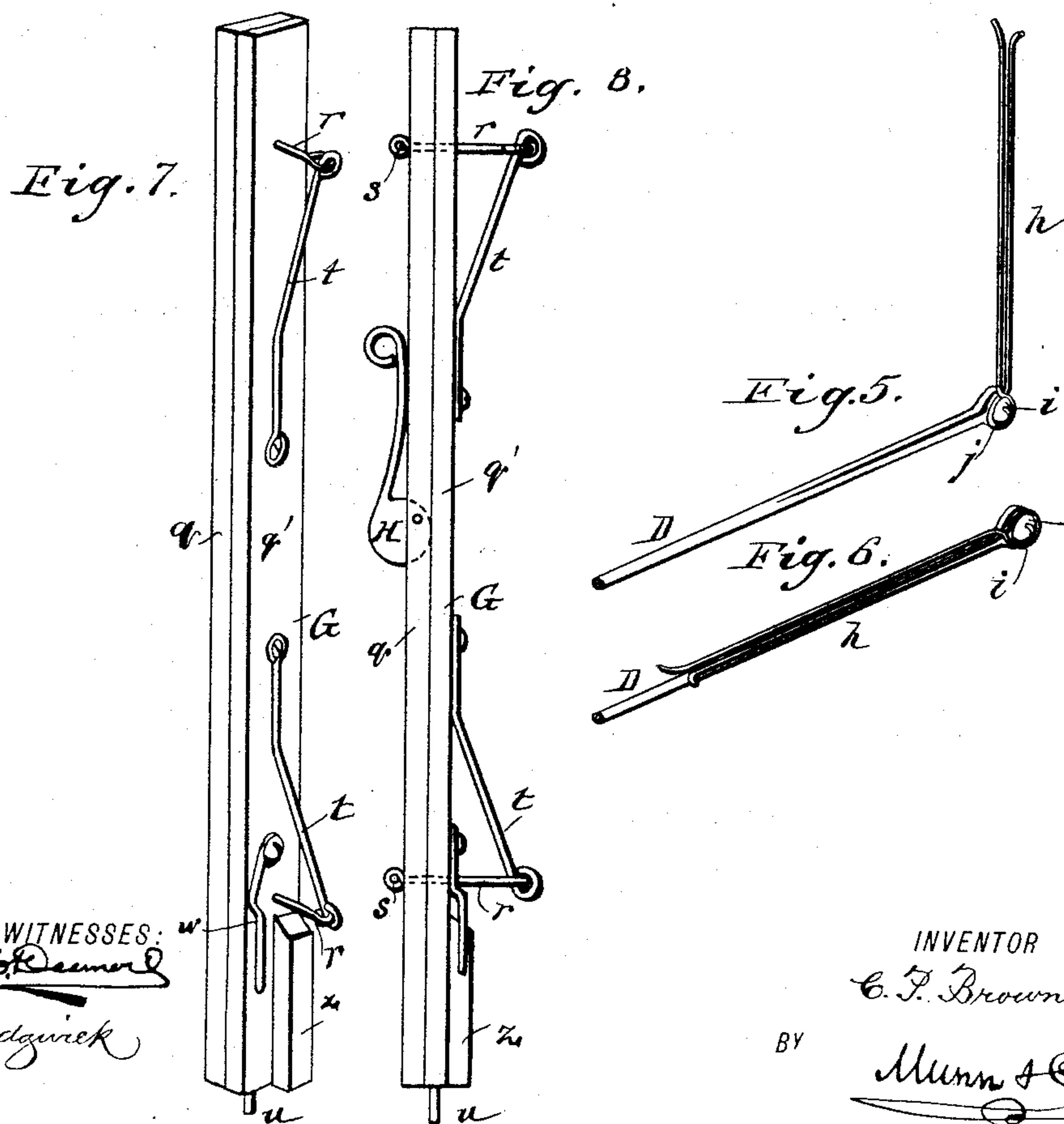
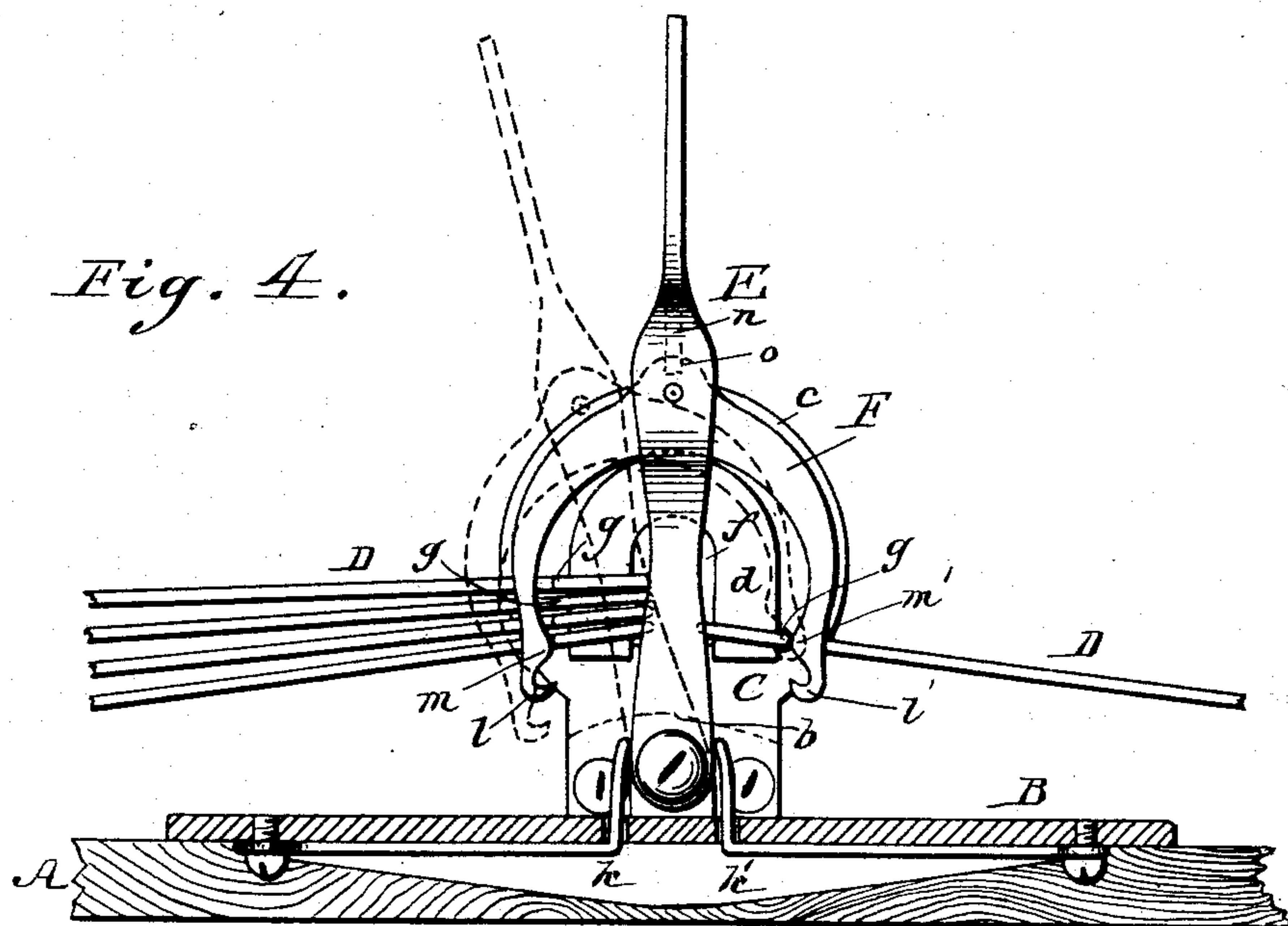
(No Model.)

2 Sheets—Sheet 2.

C. P. BROWN.
LEAF TURNER.

No. 410,779.

Patented Sept. 10, 1889.



WITNESSES:
John H. Deemer
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CYRIL P. BROWN, OF SPRING LAKE, MICHIGAN.

LEAF-TURNER.

SPECIFICATION forming part of Letters Patent No. 410,779, dated September 10, 1889.

Application filed February 23, 1889. Serial No. 300,818. (No model.)

To all whom it may concern:

Be it known that I, CYRIL P. BROWN, of Spring Lake, in the county of Ottawa and State of Michigan, have invented a new and
5 Improved Leaf-Turner, of which the following is a specification, reference being had to the annexed drawings, forming a part thereof, in which—

Figure 1 is a front elevation of my improved
10 leaf-turner. Fig. 2 is a plan view. Fig. 3 is a detail side view of the key-lever. Fig. 4 is an inverted horizontal sectional plan view taken on line *x x* in Fig. 1. Fig. 5 is a perspective view of the end of one of the leaf-
15 turning arms, showing the leaf-holding spring unfolded. Fig. 6 is a perspective view of one of the arms, showing the leaf-holding spring folded. Fig. 7 is a perspective view of a holder for single sheets of music, and Fig. 8
20 is a front elevation of the same.

Similar letters of reference indicate corresponding parts in all the views.

The object of my invention is to provide an instrument for turning the leaves of music,
25 printed matter, or manuscript quickly and with certainty in either direction.

My invention consists in the combination of a series of arms, each provided with a loop at one end and a folding leaf-holding fork at
30 the opposite end, a support for the loops, and a key pivoted to the center of the instrument and carrying a double-acting catch adapted to engage the arms upon either side of the instrument.

35 The invention also consists in the combination, with the leaf-turning arms and key, of a holder for loose sheets of music, printed matter, or manuscript.

40 It also further consists in the combination, with the support of the leaf-turning mechanism, of folding arms for supporting a book.

To the back piece A is secured the plate B, which supports the mechanism of the leaf-
45 turner. The plate B is provided with ears *a*, projecting from its upper edge at right angles with the face of the plate, forming a support for the lower edge of the book, and upon the center of the plate B is formed a bracket *b*, to the upper part of which is attached an arm
50 C, terminating in a disk *c*, the said disk having upon the under surface thereof the U-

shaped projection *d*, provided with a groove *e* in its outer edge. In the disk *c* there is a slot *f*, extending from the center thereof through the arm C to the plate B.

55 The arms D, which turn the leaves of music, are provided at their inner ends with L-shaped loops *g*, which embrace the disk *c* and the U-shaped projection *d*. To the outer end of each arm D is pivotally attached a spring-wire
60 fork *h*, the fork being provided with an eye *i*, which is held in place by the screw or pivot *j* entering the end of the said arm D. The spring-wire forks *h* are adapted to receive between them the leaves to be turned.

65 To the under surface of the arm C is pivoted a key-lever E, which is held in a central position perpendicular to the plate B by angled springs *k k'*, the said springs being secured to the back of the plate B, with their
70 angled ends extending through apertures in the plate and bearing against opposite sides of the key-lever. This construction permits of moving the key-lever in either direction, as may be required.

75 To the upper surface of the key-lever E is pivoted a curved arm F, provided at opposite ends with hooks *l l'* and with shoulders *m m'*, which project inwardly a distance a little greater than the length of the hooks, the said
80 hooks and shoulders being oppositely arranged with respect to each other and located opposite the groove *e* in the projection *d*. A straight spring *n*, secured to the top of the key-lever E, projects into a notch *o* and tends
85 to hold the curved arm F normally in a central position.

The leaves to be turned are inserted in the spring-wire forks *h*. By turning the key-lever E in one direction—say toward the left, as indicated in dotted lines in Fig. 4—the shoulder
90 *m'* is made to ride over the L-shaped loops *g* until it escapes the last loop, when it permits the hook *l'* to engage that loop, and a further movement of the key-lever E carries the arm
95 D over toward the other side of the leaf-turner. When the key-lever E is released, it is returned to its central position by the spring *k*, and when again pressed toward the left it takes the next arm D in order by engagement
100 with its loop *g* in the manner already described. This operation may be continued

until all of the arms D are transferred to the left side. By reversing the motion of the key-lever E the hook *l* will be brought into engagement with the loops *g* of the arm D and
 5 the arms will be transferred from the left to the right side.

The back piece A is provided with folding arms *p p'*, which serve as supports for the book placed on the leaf-turner, and also as
 10 supports for the leaf-turner.

When it is desired to hold a series of sheets of music or other papers, a leaf-holder G is provided, which is capable of holding one or more pieces of music. The bars *q q'*, forming
 15 the body of the holder, are perforated to receive the wires *r*, which are furnished with loops *s* for engaging the bar *q*, and are pivotally connected with springs *t*, secured to the bar *q'*. In a slot in the center of the bar *q* is
 20 pivoted an eccentric H, which, when turned, bears upon the bar *q'* and separates the two bars, so that sheets of music can be introduced between them. When the eccentric H is released, the springs *t* draw the bars to-
 25 gether and clamp the music. In the lower end of the bar *q'* is inserted a dowel *u*, which fits into a hole *v* in the top of the plate B, and to the side of the bar *q'* is attached an offset wire arm *w*, which is adapted to enter a hole
 30 *y* in the upper edge of the back piece A, and to the side of the bar *q'* is secured a cleat *z*, which bears against the face of the back piece A and serves to steady the leaf-holder G.

Although I have described my improvement
 35 as applicable to holding and turning sheets

of music, I do not confine it to that use, as it may be used for holding and turning papers of any description.

Having thus described my invention, I claim as new and desire to secure by Letters Patent— 40

1. In a leaf-turner, the combination of a support and guide, a series of arms placed on the support and guide, a spring-pressed key-lever, and a double hook carried by the key-lever and adapted to engage the arms in suc- 45
 cession, substantially as specified.

2. In a leaf-turner, the combination of the supporting-plate B, disk *c*, the grooved U-shaped guide attached to the said disk, the arms D, provided with L-shaped loops *g*, the 50
 key-lever E, the springs *k k'*, the curved arm F, pivoted to the key-lever E and provided with hooks *l l'* and projections *m m'*, and the double-acting spring *n*, substantially as specified. 55

3. In a leaf-turner, the combination of the clamping-bars *q q'*, the springs *t*, wires *r*, and eccentric H, substantially as specified.

4. In a leaf-turner, the combination of the clamp G, provided with the dowel *u* and wire 60
w, and the back piece A, substantially as specified.

5. In a leaf-turner, the combination, with the back piece A, of the folding arms *p p'*, substantially as specified.

CYRIL P. BROWN.

Witnesses:

H. F. HARBECK,
 S. S. RIDEOUT.