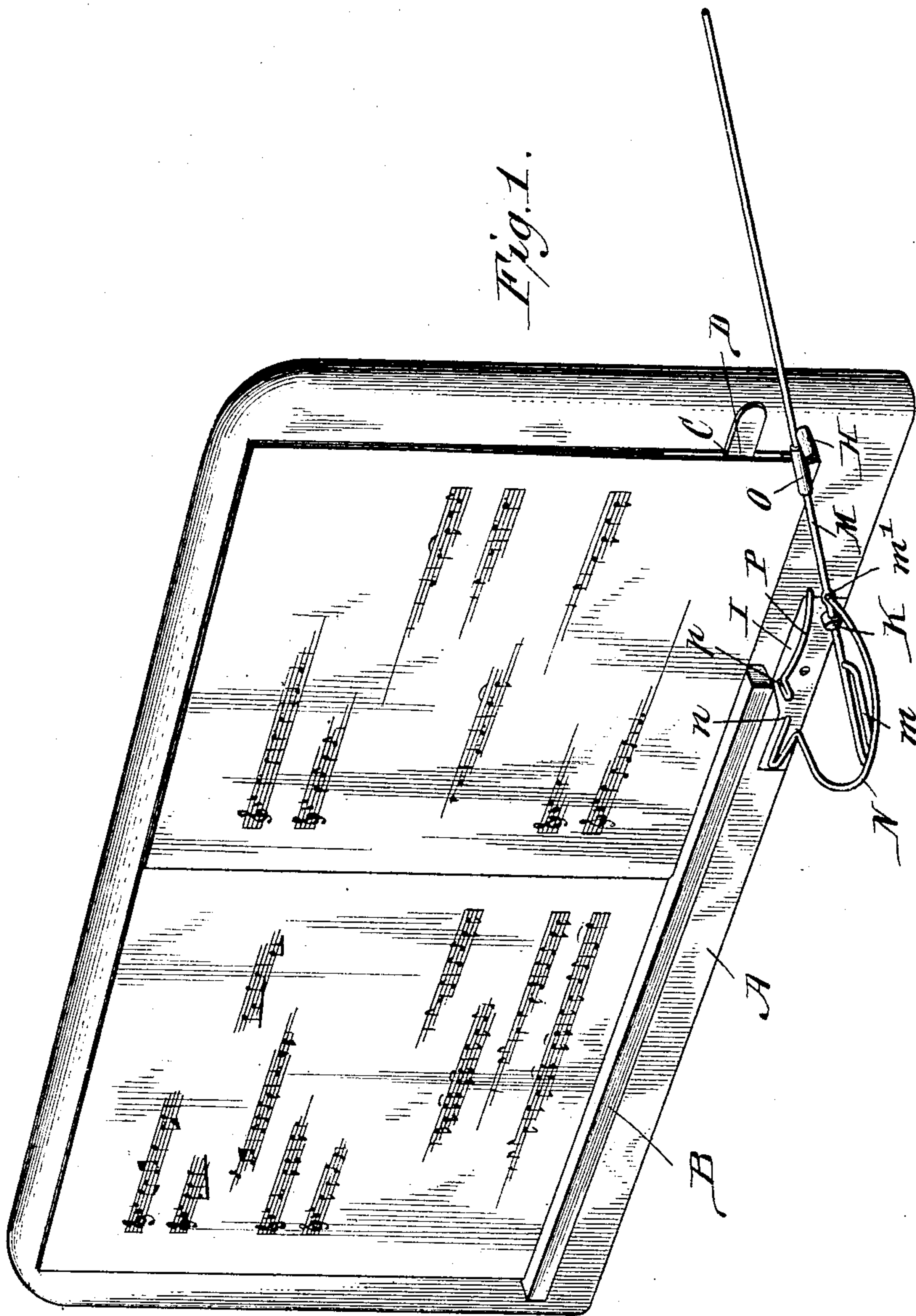


W. J. THILLEN.  
MUSIC LEAF TURNER.  
APPLICATION FILED JAN. 6, 1908.

904,901.

Patented Nov. 24, 1908.

3 SHEETS—SHEET 1.



Witnesses:  
Christ Feinle Jr.  
Harvey D. Rapp.

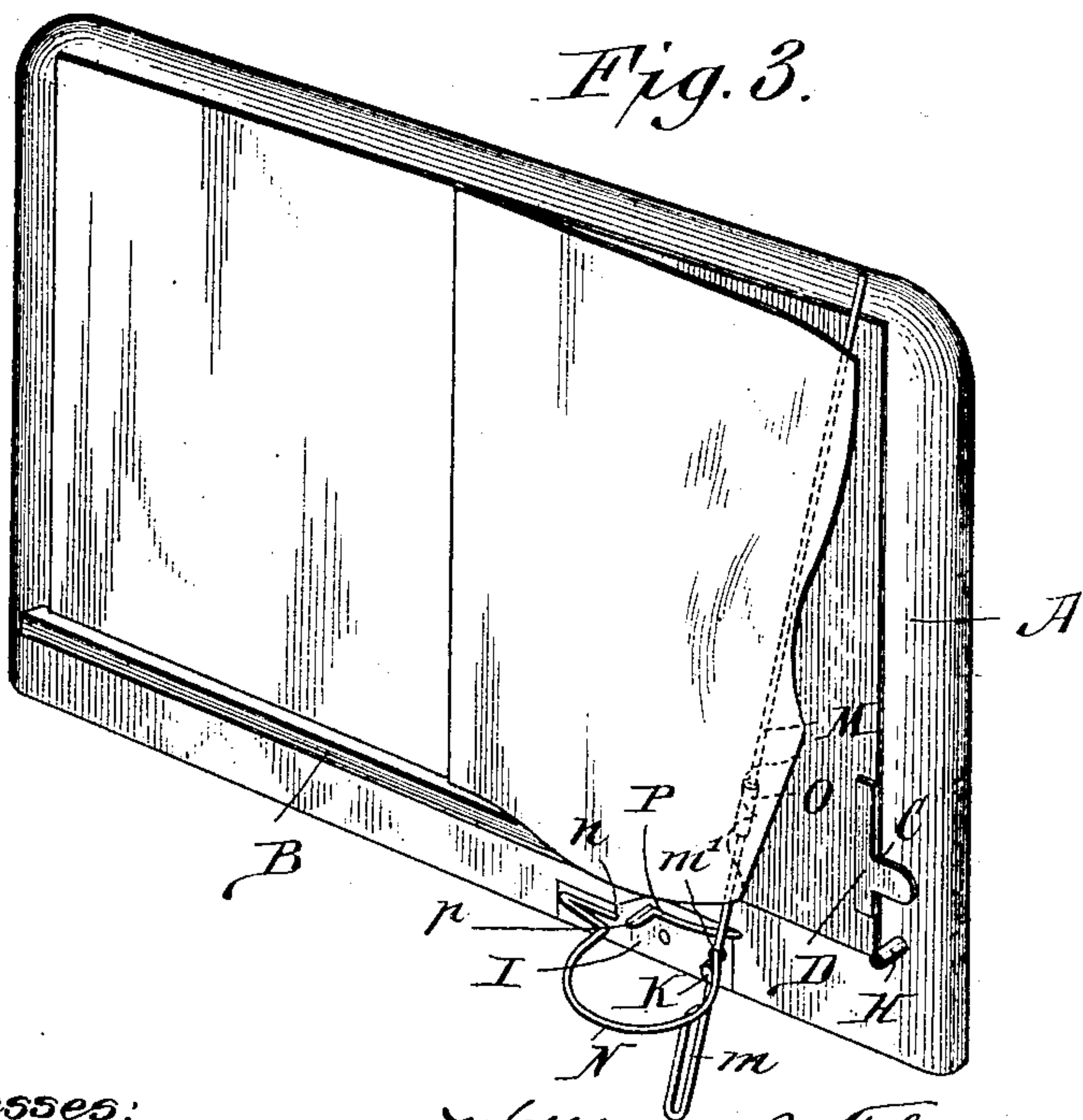
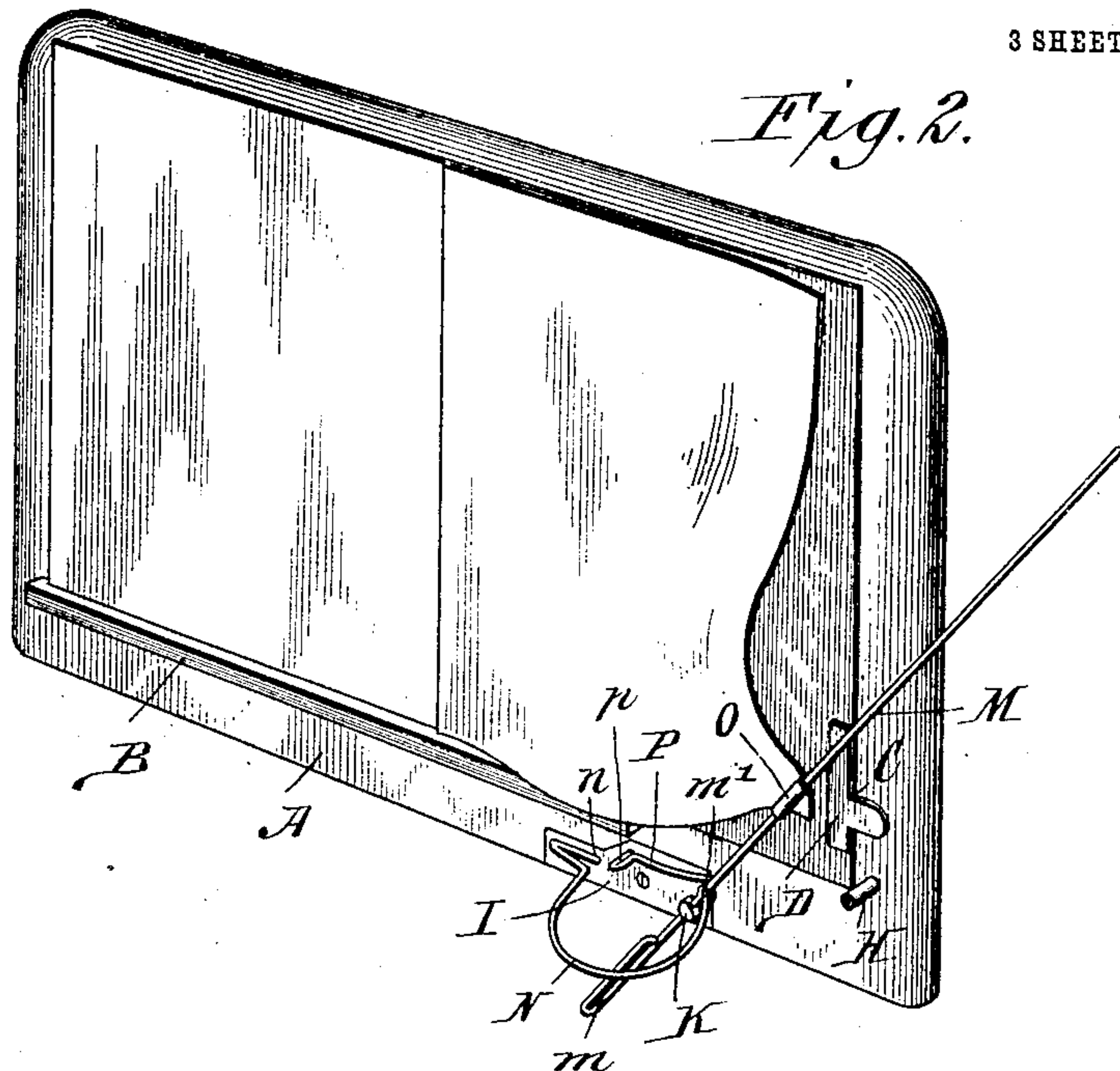
William J. Thillen, Inventor.  
By Emil Neuhauf,  
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3 SHEETS—SHEET 2.



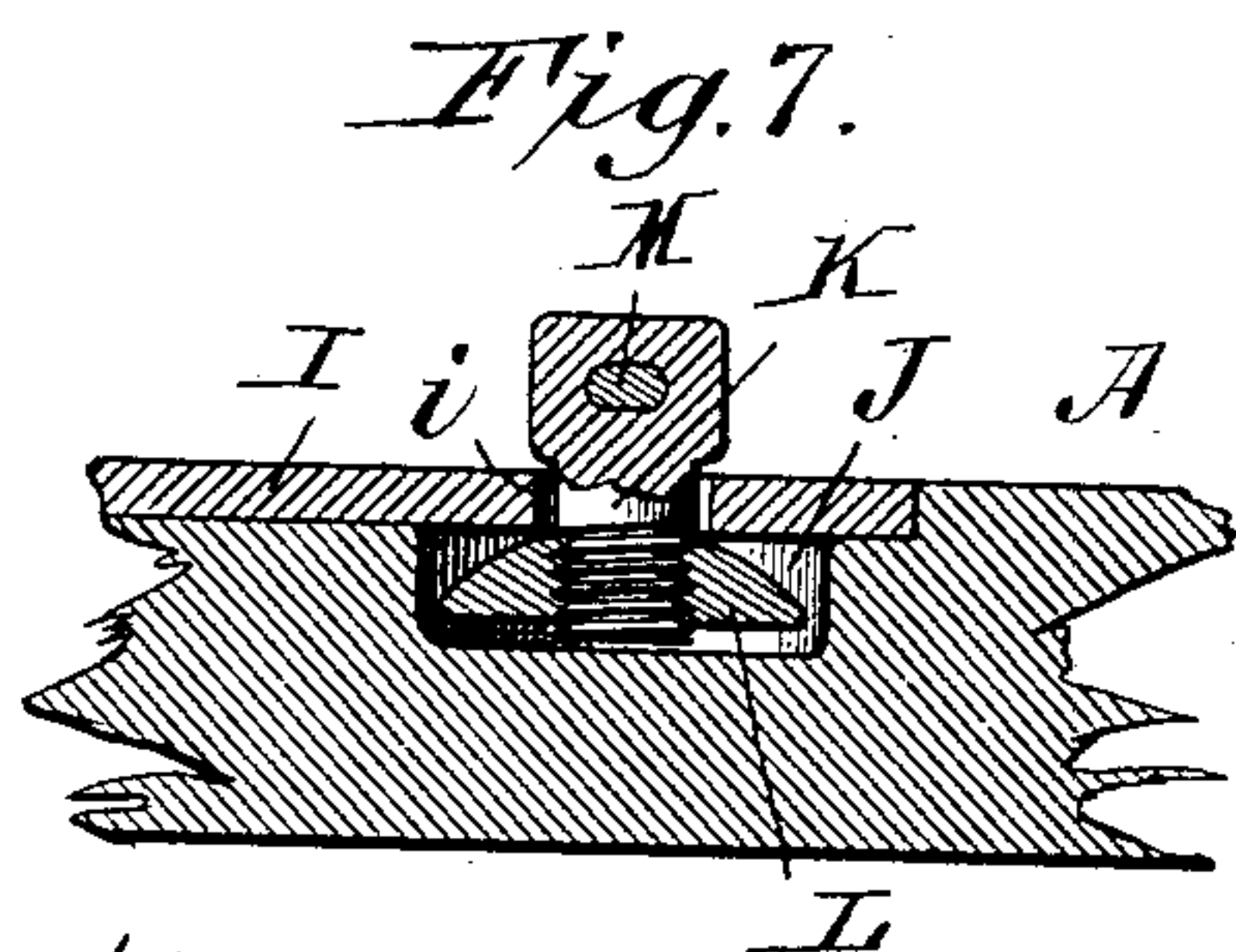
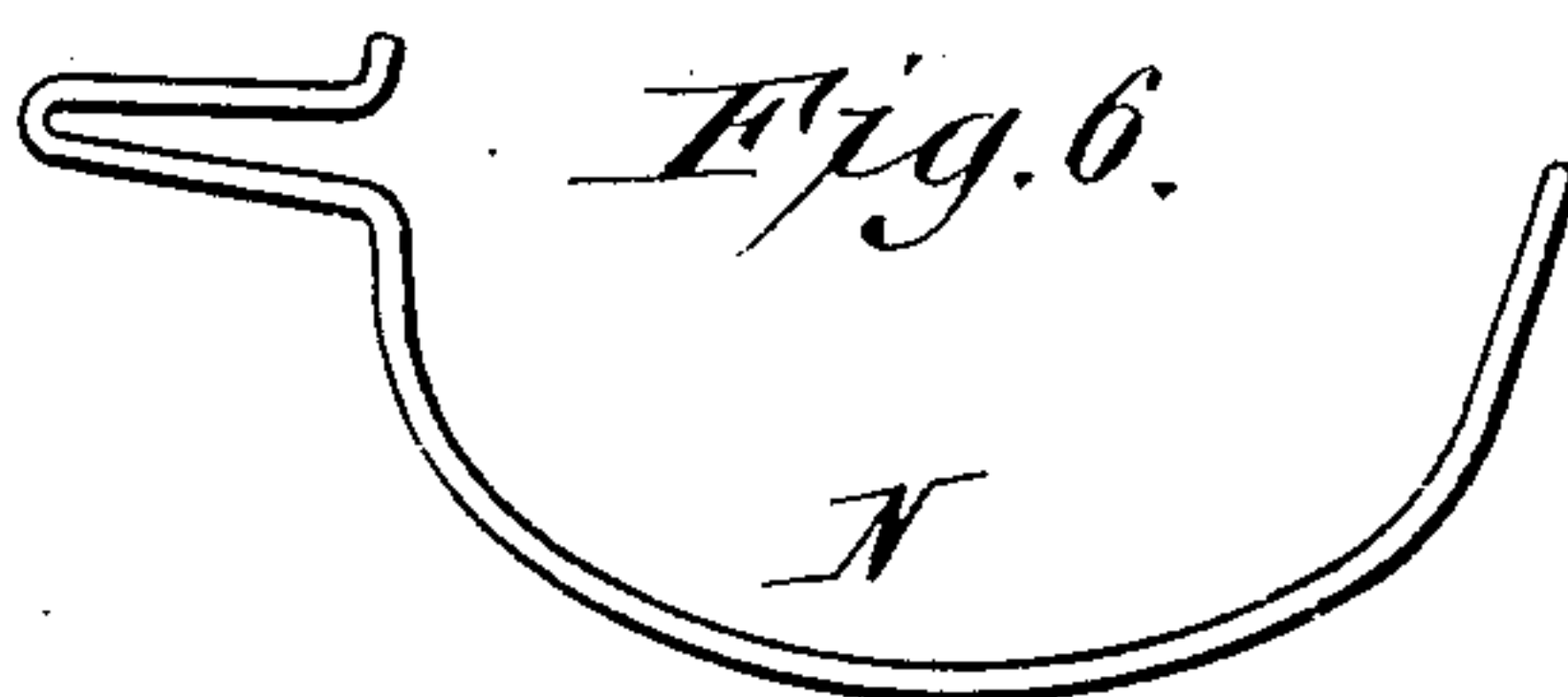
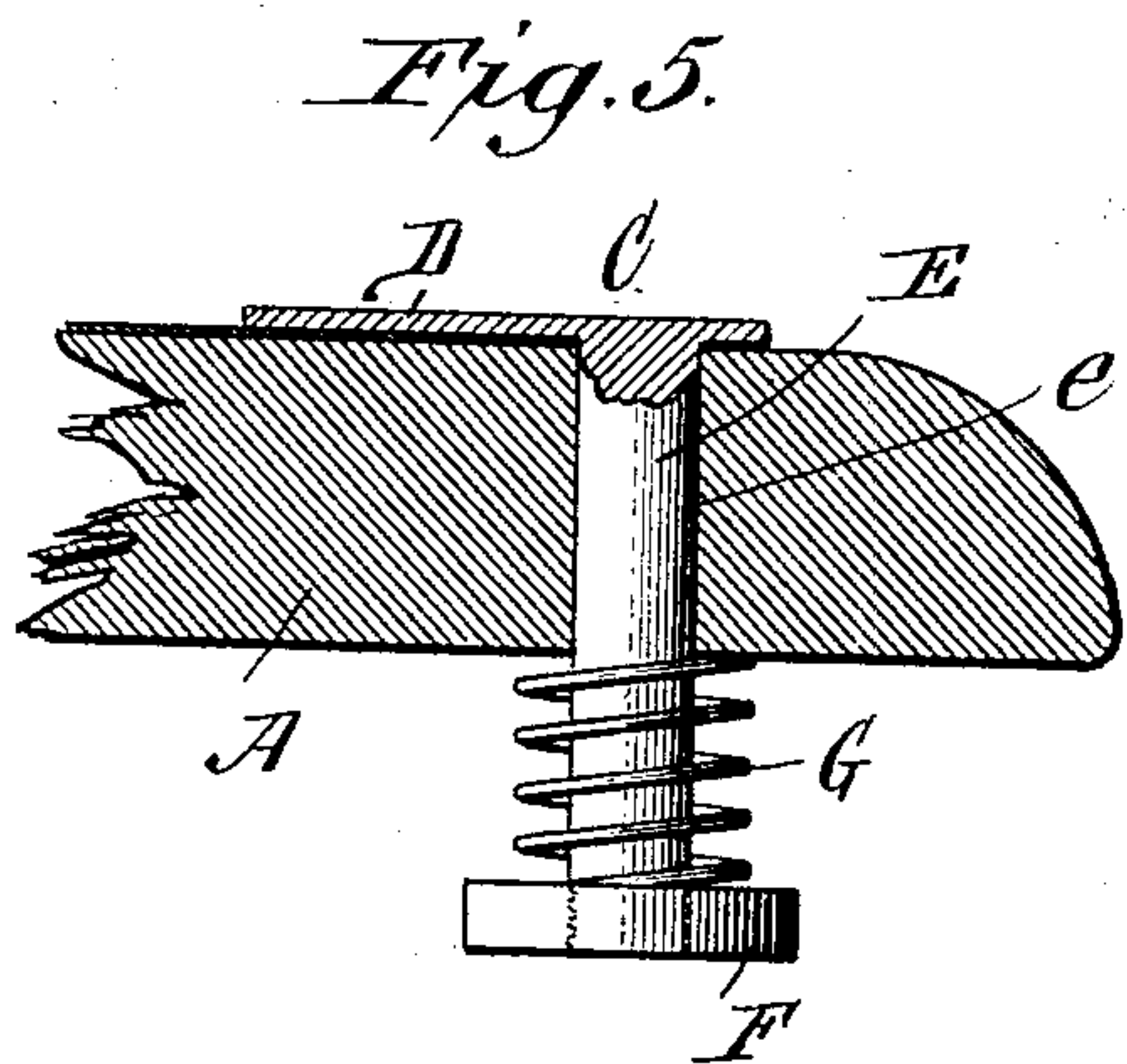
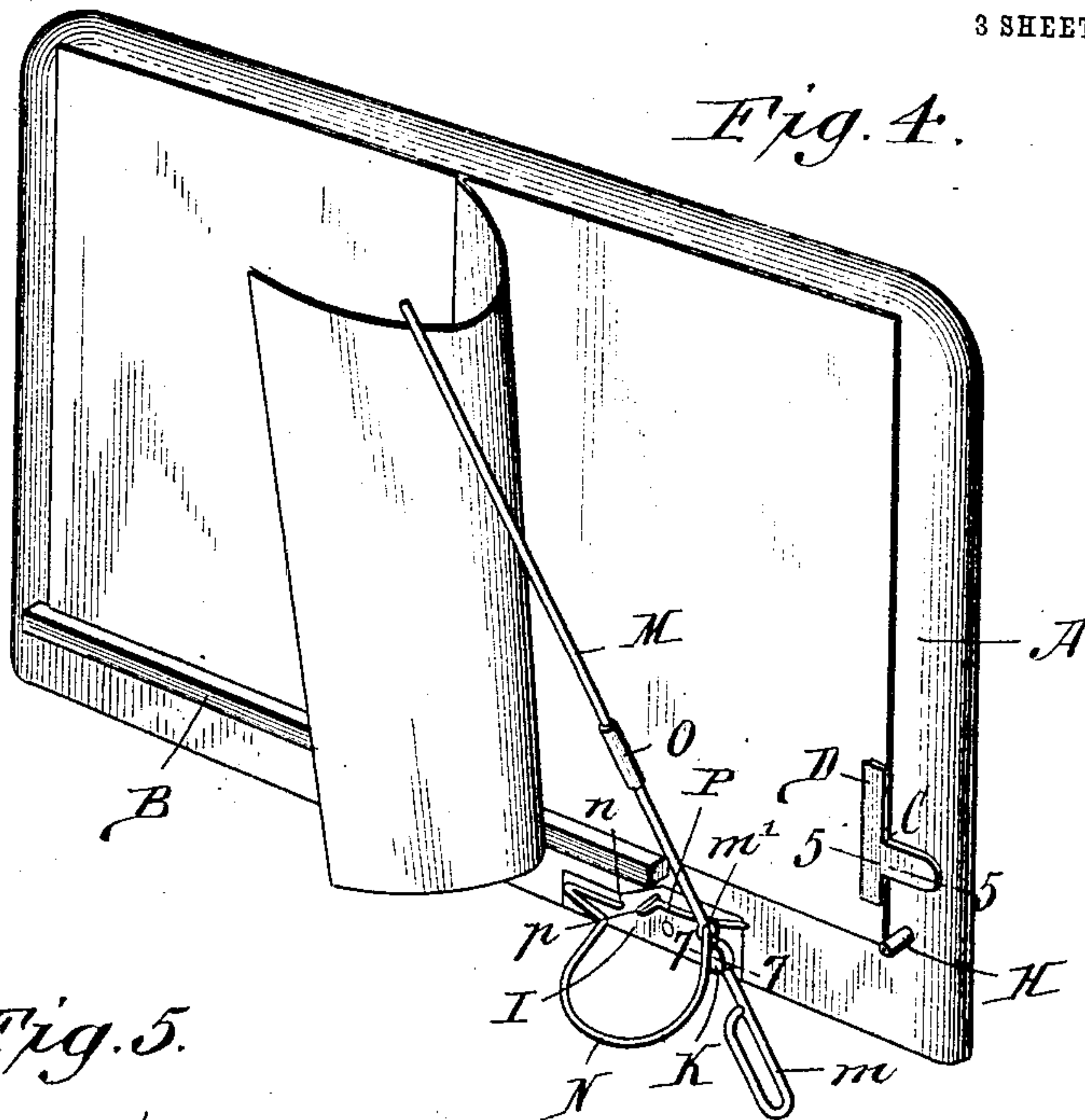
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Attorney.

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3 SHEETS—SHEET 3.



Witnesses:  
Christ Feinle Jr.  
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# UNITED STATES PATENT OFFICE.

WILLIAM J. THILLEN, OF BUFFALO, NEW YORK.

## MUSIC-LEAF TURNER.

No. 904,901.

Specification of Letters Patent.

Patented Nov. 24, 1908.

Application filed January 6, 1908. Serial No. 409,498.

*To all whom it may concern:*

Be it known that I, WILLIAM J. THILLEN, a citizen of the United States, residing at Buffalo, in the county of Erie and State of New York, have invented certain new and useful Improvements in Music-Leaf Turners, of which the following is a specification.

This invention relates to improvements in music-leaf-turners; its primary object being the production of a simple and inexpensive device of this character, which can be operated by foot or by hand, as may be desired.

My invention consists in the construction, arrangement and combination of parts to be hereinafter described and particularly pointed out in the subjoined claims.

In the drawings,—Figure 1 is a perspective view of a complete music-leaf turner embodying my invention; the leaf turning-arm being in its normal position. Figs. 2, 3, and 4 are similar views on a reduced scale showing the leaf turning-arm in different positions and the manner in which it acts upon a leaf when turning the same. Fig. 5 is an enlarged section taken on line 5—5, Fig. 4 looking up. Fig. 6 is a detached view of the governing-spring. Fig. 7 is an enlarged section taken on line 7—7, Fig. 4. Fig. 8 is a detached view of the rider over which the leaf turning-arm rides.

Referring now to the drawings in detail, like letters of reference refer to like parts in the several figures.

The reference letter A designates a supporting-plate which is preferably made of wood and of a size to accommodate standard sheet-music. The music placed thereupon rests upon a horizontal ledge B somewhat shorter than the width of the supporting-plate. After the sheet-music or book is placed upon the supporting-plate, it is clamped against movement thereon by a clamp-device C comprising a clamping-finger D, and a shank E which is movable lengthwise in an aperture *e* in the supporting-plate and on which said clamping-plate D is formed. Said shank has a head F removably secured thereto, between which and the rear face of the plate, a spring G is interposed. Said spring surrounds the shank of the clamp-device and serves to draw the clamping-finger against the sheet-music or book; the leaves to be turned being, of course loose. Positioned adjacent the right-hand edge of the sheet music or book, at a point near the lower right-hand corner, is

a stop H which projects from the face of the supporting-plate.

Countersunk into the supporting-plate so that its outer face is flush with that of said plate, is a metallic-retaining-plate I, behind which is a cavity or pocket J which is formed in the supporting-plate, as best shown in Fig. 7. A swivel-bolt K is passed through an opening *i* in said retaining-plate, which opening is somewhat larger in diameter than said bolt so that the latter is free to rock laterally. The inner threaded end of said bolt enters the cavity J in the supporting-plate and a nut L is threaded onto said end to prevent dislodgment of said bolt; that face of said nut opposed to the inner face of the retaining-plate being curved to permit the swivel-bolt to rock laterally, as clearly shown in Fig. 7. Passing through the head of said swivel-bolt is a leaf turning-arm M bent upon itself beneath said swivel-head, as at *m*, to form a handle for conveniently manipulating it. Directly above the swivel-head said leaf turning arm is provided with an opening *m*<sup>1</sup> to receive one end of a bow-spring N, whose other end enters the retaining-plate, as at *n*.

When in normal position, the leaf turning-arm is held to the extreme right and bears against the stop H; it having a rubber facing or other friction-device O applied to it at the point where it bears against the lower right-hand corner of the leaf to be turned; the bow-spring N acting to retain said arm in said position. When operating the leaf turning-arm, the handle *m* is taken hold of, and by drawing the same toward the right, that portion of the arm extending above the swivel head K is swung to the left against the action of the bow-spring N, which also acts to hold the leaf turning-arm against the leaf so that the arm exerts the necessary pressure against the latter, and in swinging from right to left compels the loose leaf to buckle upon itself during its initial movement, in the manner shown in Fig. 2. The lower right-hand corner of the leaf is gradually forced underneath the main-portion of the leaf and the leaf turning-arm moved behind the latter, as clearly shown in Fig. 3. After the leaf turning-arm is moved behind the leaf to be turned, it comes in contact with a rider P projecting outward from the face of the supporting-plate; said rider being inclined to compel the leaf turning-arm in its movement to



swing outward away from the supporting-plate, and therefore, as said arm approaches the end of its movement, it acts upon the leaf being turned at a point nearer its inner edge than at any other time during its movement, and at the same time it moves outward toward the outer edge of the leaf and assures a proper turning of the latter. Upon releasing the bar, the bow-spring N acts to return it to its normal position in contact with the lower right-hand corner of the next leaf to be turned. By reason of the diameter of the opening *i* in the retaining-plate being larger than the shank of the swivel-bolt, the latter is allowed to rock laterally while turning in the opening, thus permitting the leaf turning-arm in riding over the rider P, to swing away from the supporting-plate while moving from right to left and by reason of the supporting-ledge B being shorter than the width of the supporting-plate, said leaf turning-arm is free to swing. The adjacent extremity of the supporting-ledge may serve as a stop for said arm, or the rider P may be provided with a stop, as shown at *p*.

Having thus described my invention, what I claim is,—

1. In a music leaf-turner, the combination with a supporting-plate having a supporting-ledge somewhat shorter than the width of said plate and a swivel-bolt mounted in said plate for combined rotary and rocking movement, of a leaf turning-arm secured to said swivel-bolt and bearing normally against the lower right-hand corner of the leaf to be turned, an inclined rider-bar on said plate onto which the leaf-turning arm rides when turning the leaf, and a bow-spring having one end affixed to said supporting-plate and its other end secured to said leaf turning-arm.

2. In a music leaf-turner, the combination of a supporting-plate, a metallic-plate countersunk into the outer face thereof and having a bolt-hole, said supporting-plate having a pocket in rear of said bolt-hole, a swivel-bolt passing through said bolt-hole,

a nut within said pocket applied to the threaded end of said swivel-bolt, a leaf turning-arm secured in the head of said swivel-bolt and normally lying in contact with the lower right-hand corner of the leaf to be turned, an inclined rider over which said leaf turning-arm rides when actuated, and a bow-spring having one end secured to a fixed point and its other end secured to said leaf turning-arm.

3. In a music leaf-turner, the combination of a supporting-plate, a metallic-plate countersunk into the outer face thereof and having a bolt-hole, said supporting-plate having a pocket in rear of said bolt-hole, a swivel-bolt passing through said bolt-hole and of smaller diameter than the latter, a nut within said pocket applied to the threaded end of said swivel-bolt and having that face thereof in opposition to the inner face of said retaining-plate made convex, a leaf turning-arm secured to the head of said swivel-bolt and having an actuating handle below said swivel-bolt, an inclined rider over which the leaf turning-arm rides when actuated, and a bow-spring having one end secured to a fixed point and its other end to said leaf-turning arm near said swivel-bolt.

4. In a music-leaf turner, the combination with a supporting-plate having a stop projecting from the face thereof, of a swinging leaf turning-arm normally in contact with the lower right-hand corner of the leaf to be turned and having at such point a friction device, and means for holding said leaf turning-arm in such position and for returning the same to such position after being actuated, said means serving also to hold said leaf turning-arm in frictional contact with the leaf to be turned.

In testimony whereof, I have affixed my signature in the presence of two subscribing witnesses.

WILLIAM J. THILLEN.

Witnesses:

ELLA C. PLUECKHAHN,  
CHRIST FEINLE, Jr.