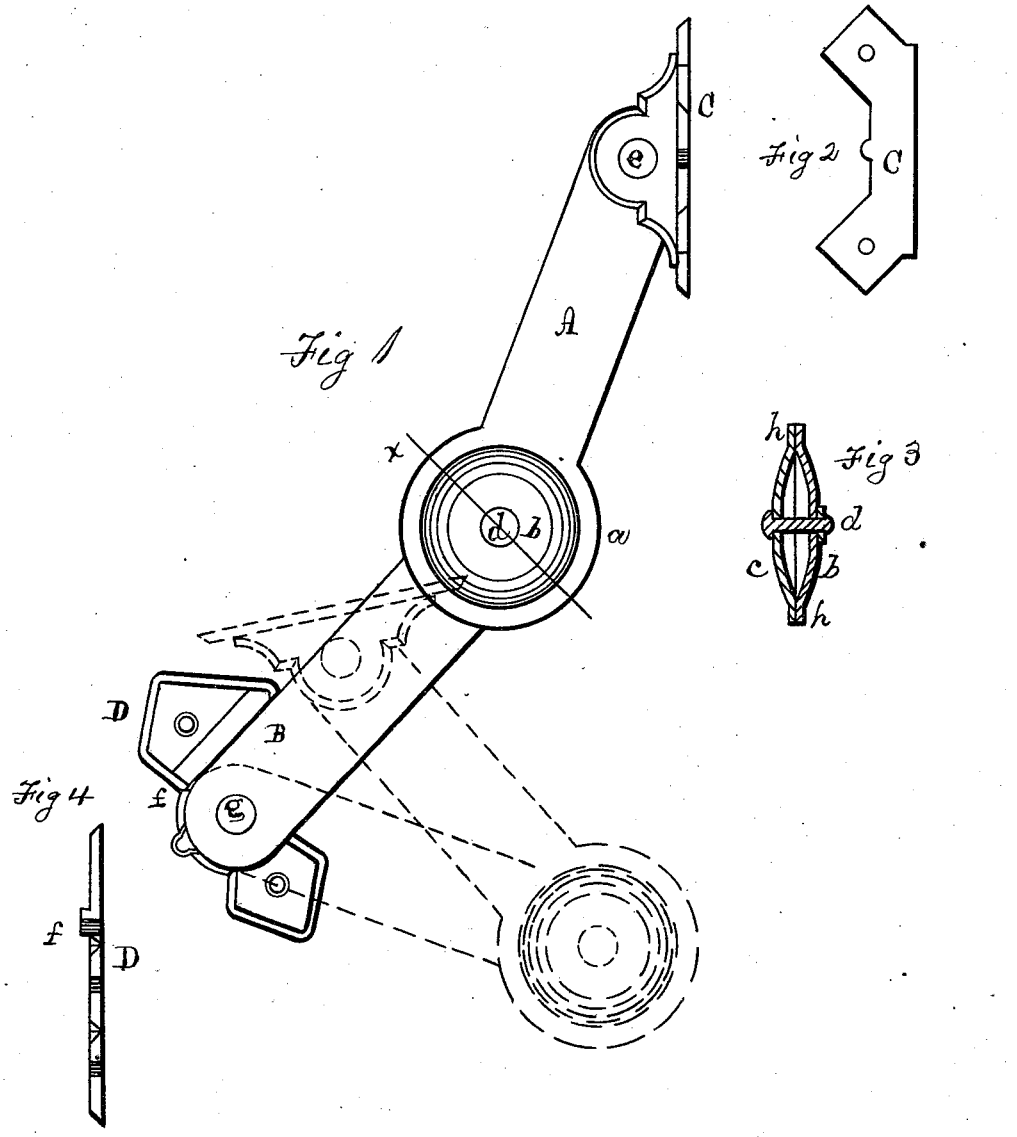
H. L. ANDREWS.

Trunk-Stays.

No. 164,124. Patented June 8, 1875.



Witnesses.
C. A. West
Q. W. Bond.

Inventor.
Herbert L. Andrews

UNITED STATES PATENT OFFICE.

HERBERT L. ANDREWS, OF CHICAGO, ILLINOIS.

IMPROVEMENT IN TRUNK-STAYS.

Specification forming part of Letters Patent No. **164,124**, dated June 8, 1875; application filed December 28, 1874.

To all whom it may concern:

Be it known that I, HERBERT L. ANDREWS, of the city of Chicago, in the county of Cook and State of Illinois, have invented a new and useful Improvement in Supports for the Lids of Desks, Trunks, &c., of which the following is a full description, reference being had to the accompanying drawings, in which—

Figure 1 is a side elevation; Fig. 2, a rear view of the part C; Fig. 3, a section on line *x* of Fig. 1; Fig. 4, an edge view of the part D. The object of my invention is to provide a new attachment for trunks, desks, and similar things which have a lid or cover which can be opened, so constructed that it will hold the lid or cover when raised to an upright position, and prevent it from falling either way; and this I accomplish by means of two pieces of sheet metal, stamped or otherwise shaped so as to be cup-like, held together by means of a rivet, and otherwise constructed and secured to the trunk or desk, as hereinafter fully described.

In the drawings, A B represent two pieces of sheet metal. One end, *a*, of each is enlarged and stamped or otherwise formed so as to be cup-shaped, as shown by *c b* in Fig. 3. These two parts are secured together somewhat tightly by means of a rivet, *d*, bringing the flat portions *h* in close contact, but not so tightly as to prevent them from being moved one over the other around the pivot by the use of a moderate force. The part C is pivoted at *e* to the outer end of A, and is so formed that it can be secured to the inside of a trunk-lid or desk-cover by means of screws. D is pivoted to B at *g*. It has a shoulder, *f*, against which B strikes when the lid or cover has been raised, and is to be secured to the inside of one end of the desk or trunk.

In Fig. 1 the parts are in the position they occupy when the cover is open, D being supposed to be permanently secured to the inside of one end of the body of the desk or other article, and C being secured to the inside of the lid or cover. When in this position the cover will stand at or nearly at right angles with the floor, and will be held there by the action of the parts *b c*, which, from their cup-shape, have considerable spring. By the use of a little force the lid can be closed; indeed, after it has been partly closed, its own weight may carry it down. The dotted lines in Fig. 1 represent the position of the several parts when the lid is closed.

The part B might be secured to the desk by means of a screw or other pivot, and an independent stop could be used, dispensing with the part D. And I do not limit myself to the exact device shown for pivoting or connecting A to the cover, the gist of my invention consisting in the use of the said two parts *b c*, provided with arms A B, and adapted to be secured one to the lid and the other to the body of the desk in such a manner as to allow the cover to be opened, the same being held in position not simply by the usual friction between the two flat surfaces, but the friction depending in part upon the spring of the metal consequent upon the form of *b c*. It is not necessary, in manufacturing the articles, to follow the exact form shown. The parts *b c* might be cut away somewhat upon their sides and still be operative. By using a pin or a short projection in place of *f*, or by cutting away the lower end of *f* to give it the proper angle, the device can be used either upon the right or left hand of a desk.

It is important, or at least very desirable, to have a stop, because, if the three points *e d g* should be brought into the same line both hands would have to be used to close the cover, whereas by the use of a stop adjusted so as to properly limit the movement of the parts the cover can be easily closed by the use of one hand applied to the cover without applying the other hand to the holding device. A bolt could be used in place of this rivet; but I prefer the rivet.

What I claim as new, and desire to secure by Letters Patent, is as follows:

The arms A B, having cup-shaped ends *b c*, connected together by means of the rivet *d*, and adapted to be secured to the body and cover of a trunk or desk, substantially as and for the purposes specified.

HERBERT L. ANDREWS.

Witnesses:

E. A. WEST,

O. W. BOND.