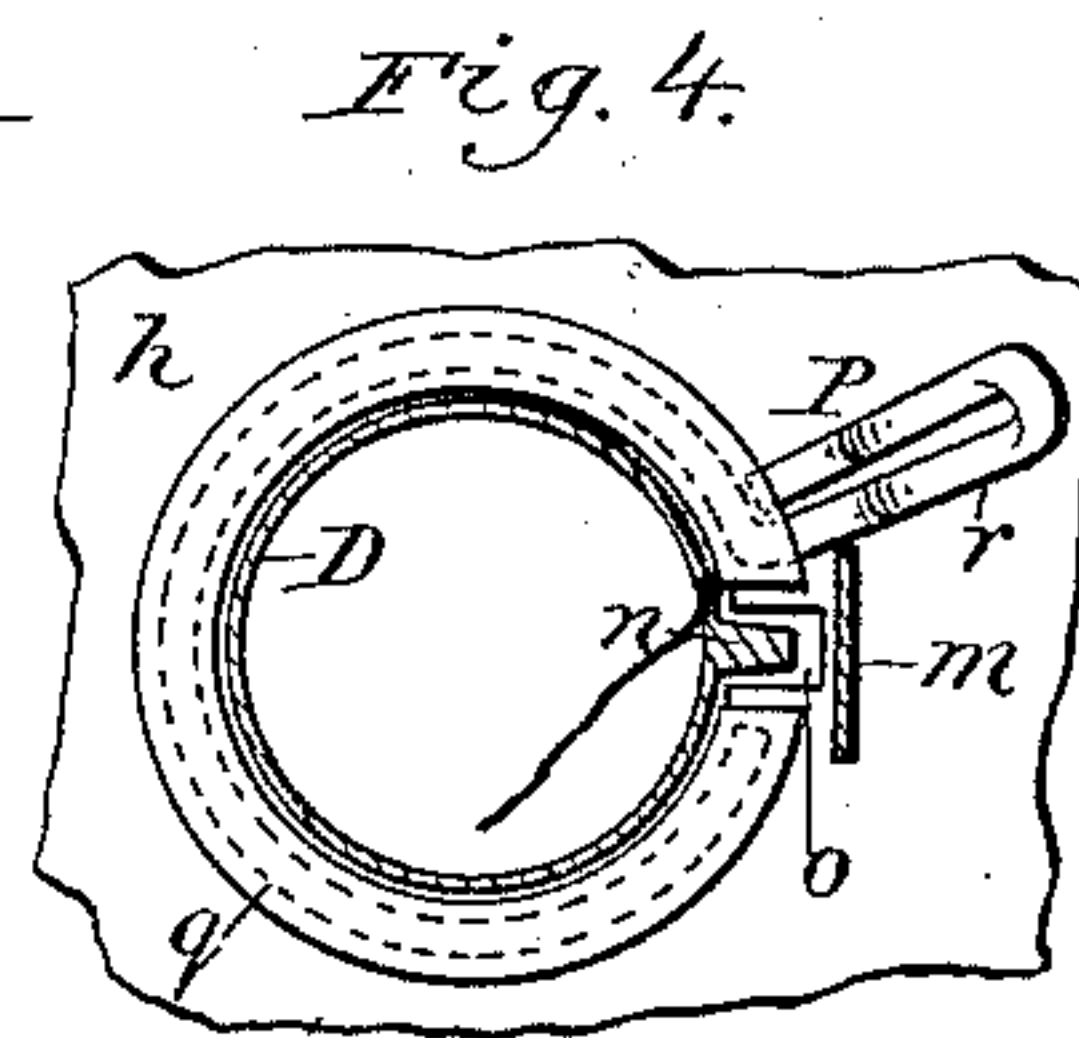
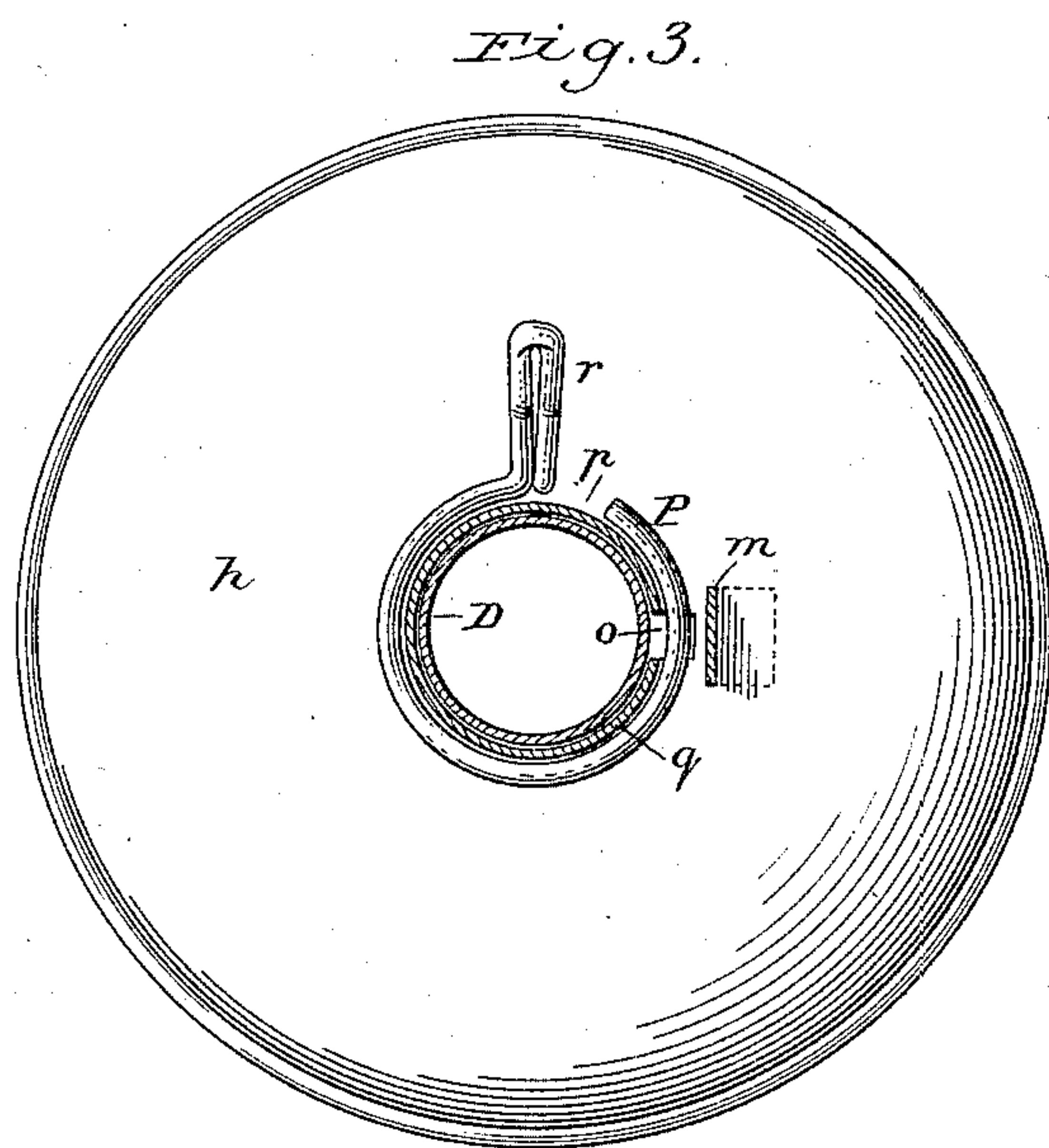
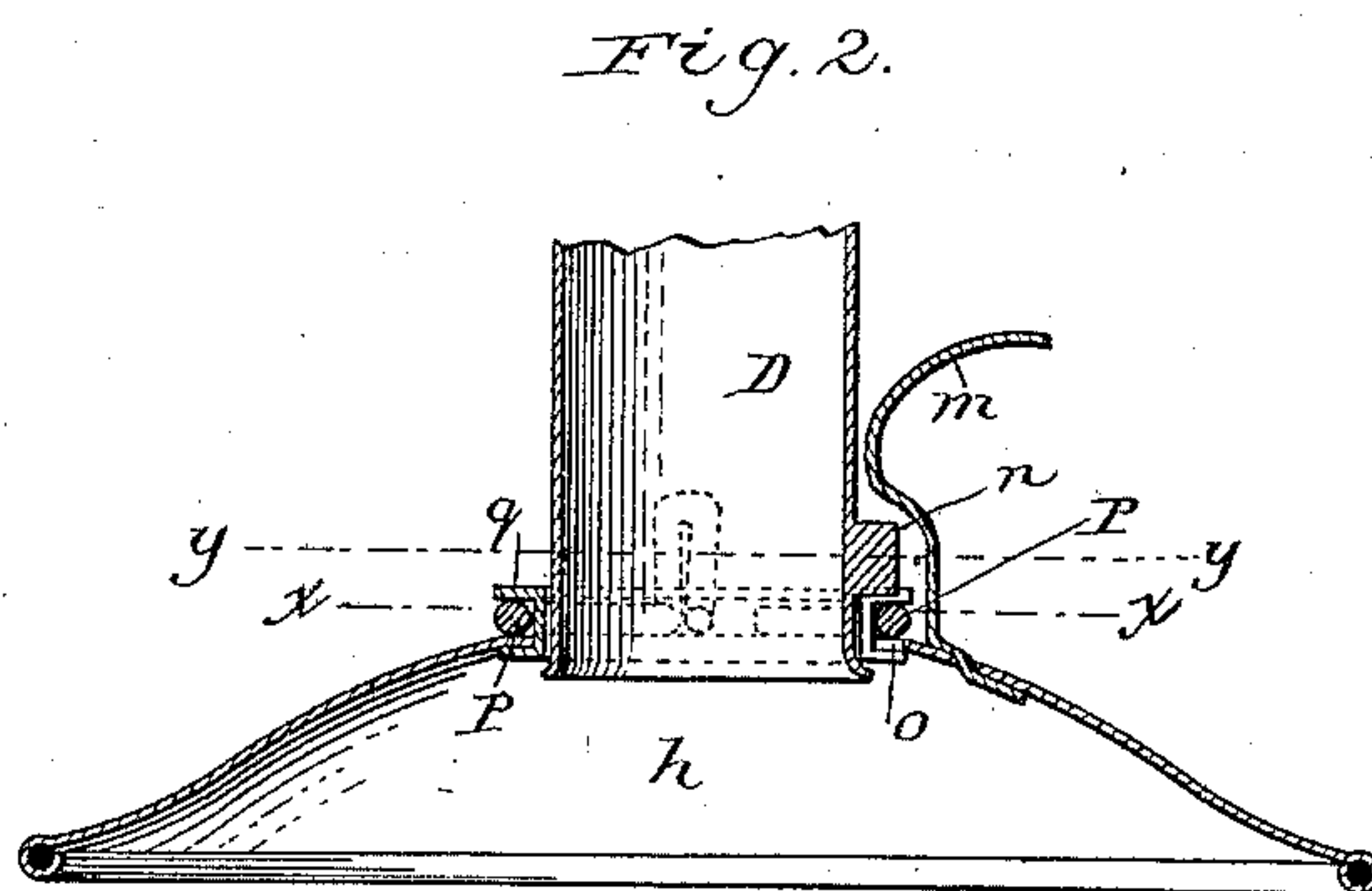
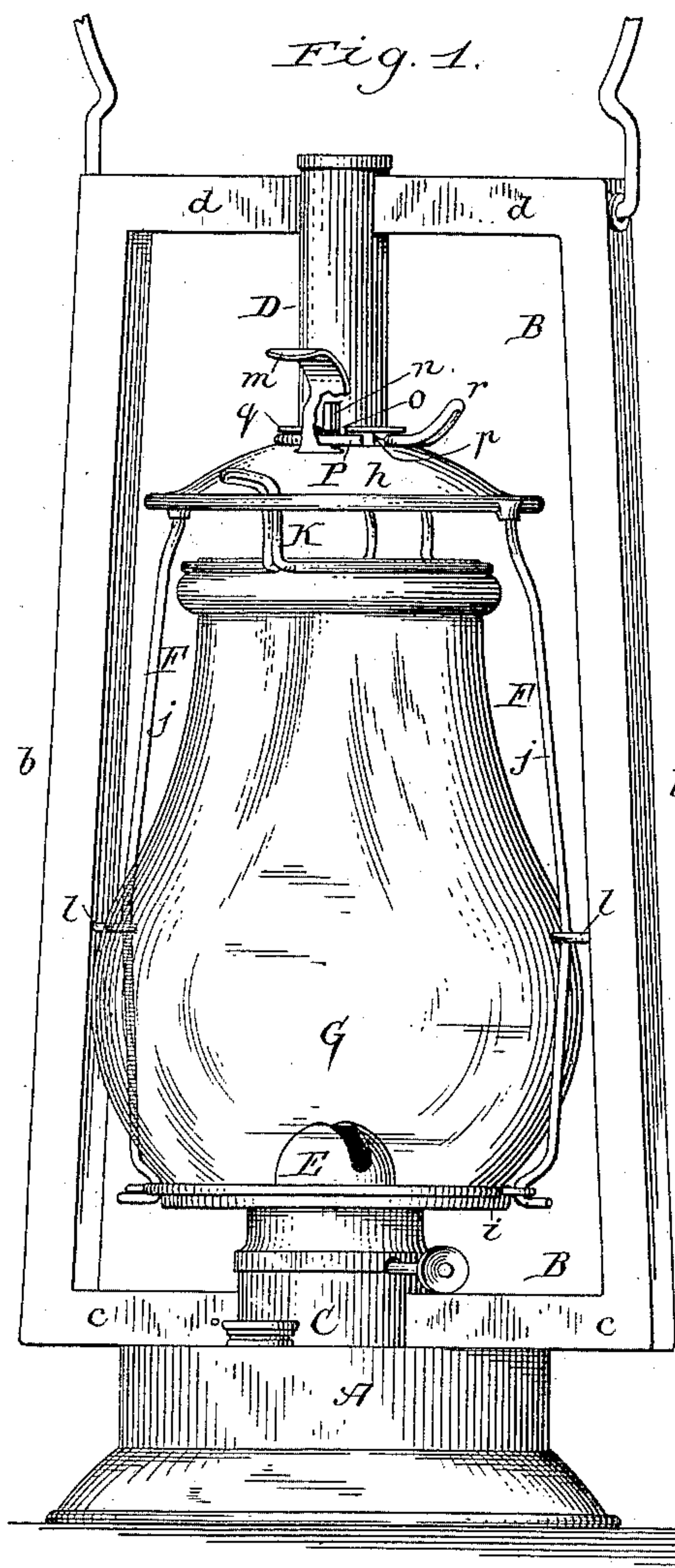


(No Model.)

J. B. STETSON.
TUBULAR LANTERN.

No. 409,712.

Patented Aug. 27, 1889.



Chas. Buchheit.
Theo. L. Poppis } witnesses.

J. B. Stetson

Inventor.

By Wilhelm H. Brown

Attorneys.

UNITED STATES PATENT OFFICE.

JOSEPH B. STETSON, OF LINCOLN, MAINE.

TUBULAR LANTERN.

SPECIFICATION forming part of Letters Patent No. 409,712, dated August 27, 1889.

Application filed April 3, 1889. Serial No. 305,865. (No model.)

To all whom it may concern:

Be it known that I, JOSEPH B. STETSON, a citizen of the United States, residing at Lincoln, in the county of Penobscot and State of Maine, have invented new and useful Improvements in Tubular Lanterns, of which the following is a specification.

This invention relates to that class of tubular lanterns which are provided with a movable cage or frame in which the globe is mounted, and which can be raised in the tubular lantern-frame to expose the burner for trimming, lighting, and extinguishing and lowered for returning the globe-frame and globe to their normal position upon the burner.

The object of my invention is to provide simple means for securing the globe-frame in its normal position upon the burner; and my invention consists of the improvements, which will be hereinafter fully set forth, and pointed out in the claims.

In the accompanying drawings, Figure 1 is an elevation of a tubular lantern provided with my improvements. Fig. 2 is a vertical sectional view of the fastening on an enlarged scale. Fig. 3 is a horizontal section in line *x x*, Fig. 2, showing the parts of the fastening in the position in which the globe-frame is locked down. Fig. 4 is a horizontal section in line *y y*, Fig. 2, showing the parts of the fastening in the position in which the globe-frame is unlocked.

Like letters of reference refer to like parts in the several figures.

A represents the oil-pot of a tubular lantern, and B the tubular frame thereof, consisting of the side tubes *b*, their lower branches *c*, connected with the air-chamber *c*, their upper branches *d*, and the central depending tube D.

E is the burner seated upon the air-chamber C.

F represents the movable frame or cage in which the globe G is mounted, and which consists of the bell *h*, the globe-supporting plate *i*, connecting-wires *j*, and the spring-catch K. The bell *h* is capable of vertical movement on the central tube D, and the side wires are guided in loops *l*, secured to the inner sides of the tubes.

m is a thumb-piece secured to the upper side of the bell in front of the central tube D.

All of these parts of the lantern may be of any well-known or suitable construction.

n represents a fixed stop secured to the front side of the central tube D at a short distance above its lower end; and *o* is a notch formed in the bell *h* below the stop *n*, so as to permit the bell to move by the stop in raising and lowering the globe-frame.

P represents a movable stop attached to the bell and arranged so that it can be placed to extend across the fixed stop *n* or clear the same. As shown in the drawings, the movable stop P consists of a wire ring, which is provided with a space *p* large enough to clear the fixed stop when placed in line with the same. The ring P is arranged in a thimble or eyelet *q*, which is secured in the central opening of the bell and is notched like the bell. The upper flange of the eyelet *q* extends outwardly over the ring P and holds the latter in place upon the bell, the lower flange of the eyelet projecting outwardly on the under side of the bell. The ring P is provided with a thumb-piece *r* for turning it in the eyelet. The thumb-piece *m*, which is secured to the bell, is shown broken away in Fig. 1 to expose the fixed stop *n*, which is arranged on the central tube D behind this thumb-piece. When the globe-frame rests on the burner and the movable ring or stop P is turned so that its notch of space *p* is out of register with the fixed stop *n* as represented in Fig. 1, the globe-frame is locked down, as the ring P, extending across the under side of the fixed stop, prevents the globe-frame from being raised. Upon turning the ring P so as to cause its space *p* to register with the stop *n* the globe-frame can be raised. The stop *n* is made so high that if the ring P should be accidentally turned into its locking position when the globe-frame is elevated, the ring, striking on the top of the stop when the globe-frame is lowered, will hold the globe-supporting plate *i* at a considerable height above the burner, in which position of the plate *i* the combustion will be so imperfect that the appearance of the frame will indicate at once that the globe-frame is not in its normal position. The space *p* is preferably so arranged in the ring P that it will register with the stop *n* when the thumb-piece *r* of the ring rests against the side of the thumb-piece *m* of the

bell, as represented in Fig. 4, so that it can be easily determined when the ring P is in its locking position and when not. Upon placing the fingers of one hand upon the top of the tubular frame the thumb-piece *r* of the ring P and the thumb-piece *m* of the bell can be alternately manipulated by the thumb of the same hand in unlocking the globe-frame, raising it, lowering it, and again locking it.

My improved fastening is very simple and inexpensive in construction and secure and reliable in its operation, doing away with the danger of the globe-frame becoming accidentally raised and the slip-burner unseated.

I claim as my invention—

1. The combination, with the tubular lantern-frame provided with a depending tube, and a movable globe-frame which can be raised and lowered on said tube, of a fixed stop formed on said tube, and a laterally-movable stop attached to the globe-frame, substantially as set forth.

2. The combination, with the tubular lantern-frame provided with a depending tube, and a movable globe-frame which can be raised and lowered on said tube, of a fixed stop formed on said tube, and a movable annular stop attached to the globe-frame and provided with a space which enables the movable stop

to clear the fixed stop, substantially as set forth.

3. The combination, with the tubular lantern-frame provided with a depending tube, and a movable globe-frame provided with a bell which can be raised and lowered on said tube, of a fixed stop formed on said tube, a movable annular stop provided with a space to clear the fixed stop, and an eyelet secured in the opening of the bell and holding the annular stop, substantially as set forth.

4. The combination, with the tubular lantern-frame provided with a depending tube, and the movable globe-frame provided with a bell which can be raised and lowered on said tube, of a fixed stop formed on said tube, a movable annular stop provided with a space to clear the fixed stop, and with a projecting thumb-piece and a thumb-piece which is secured to the bell and limits the turning movement of the annular stop, substantially as set forth.

Witness my hand this 28th day of March, 1889.

JOSEPH B. STETSON.

Witnesses:

ELI H. PINKHAM,
GEO. W. BABCOCK.