3 Sheets—Sheet 1.

G. SHERWIN & E. HOOPLE.

CENTER LAMP.

No. 189,063. Patented April 3, 1877.

Fig. 1.

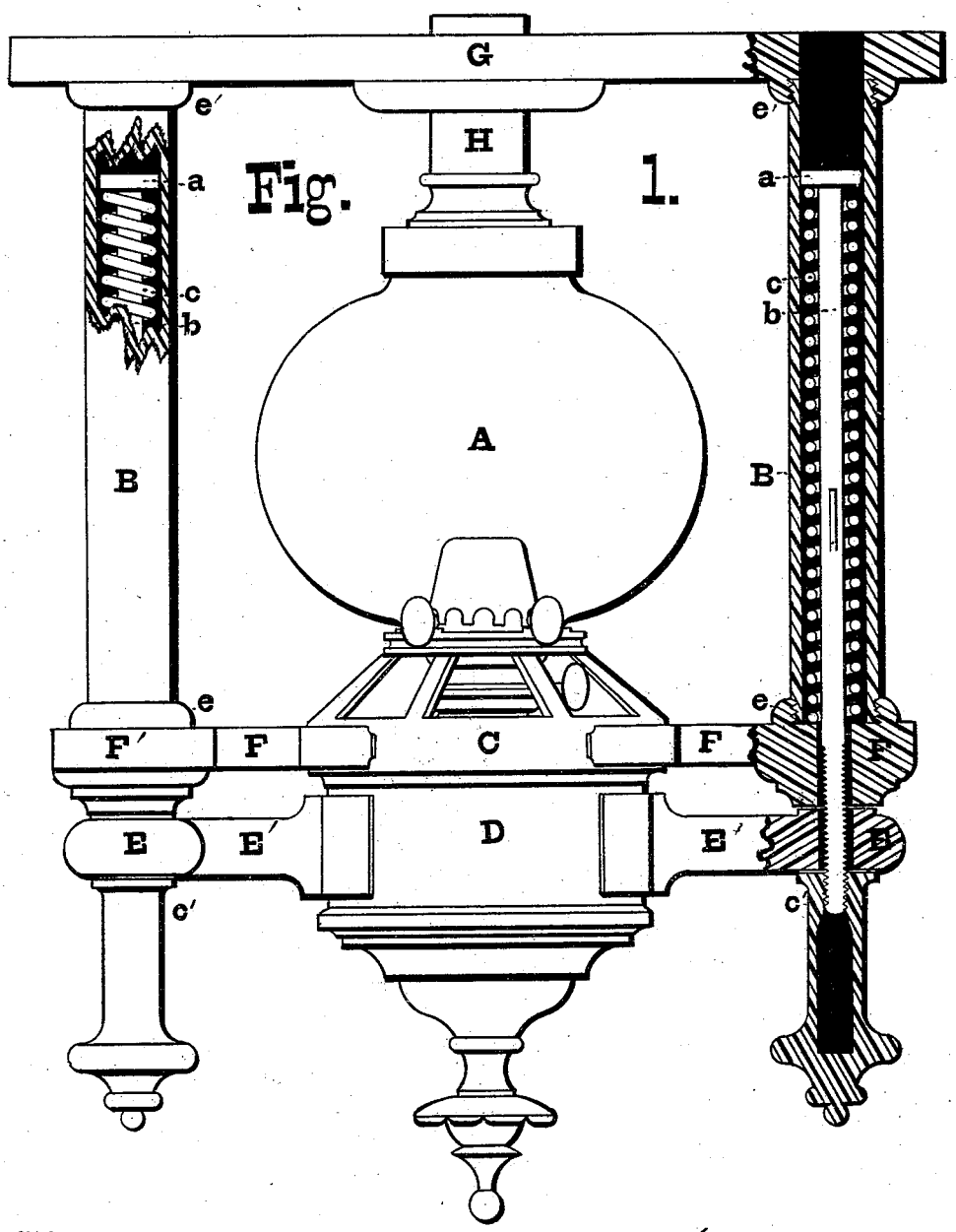

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Fig. 2.

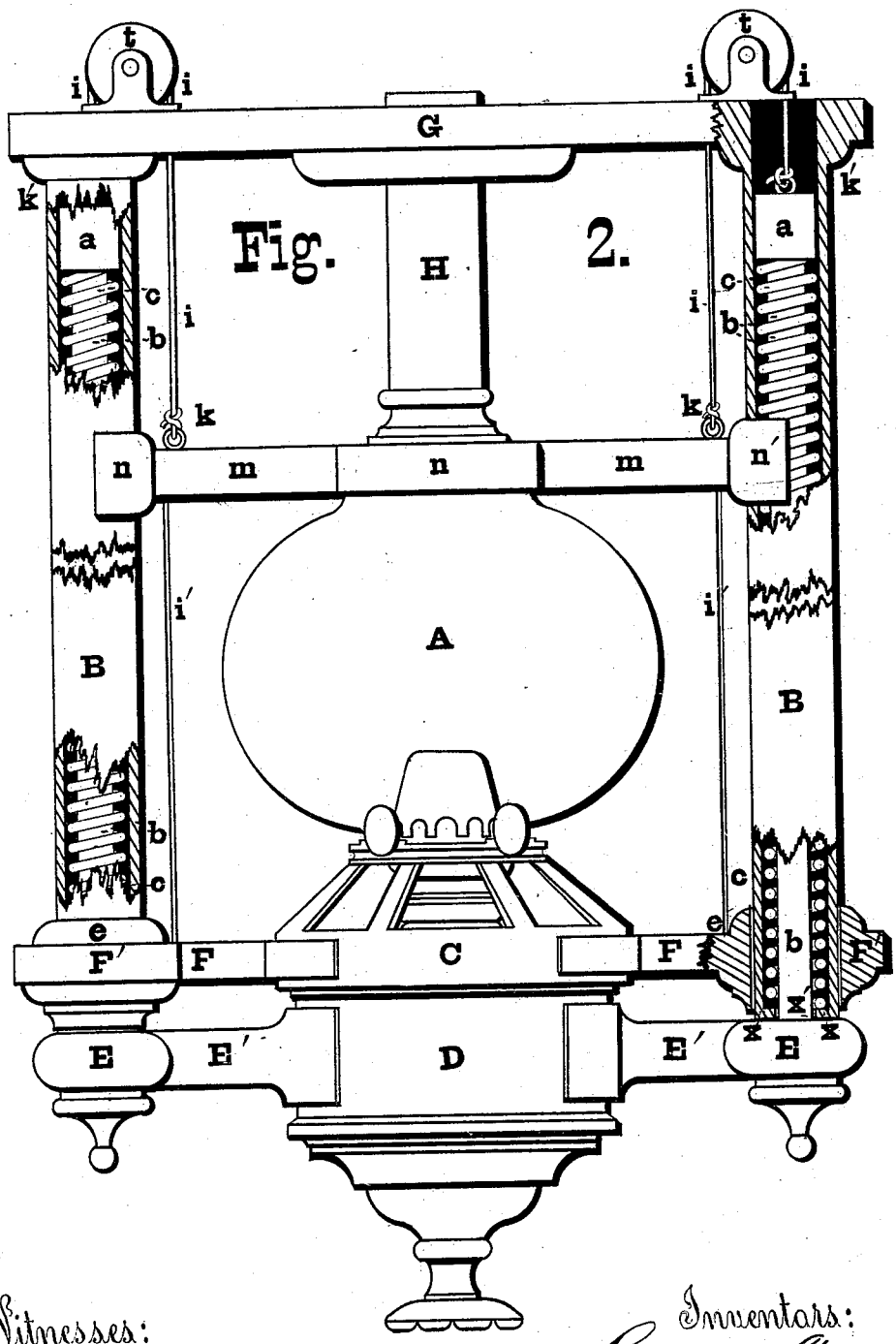

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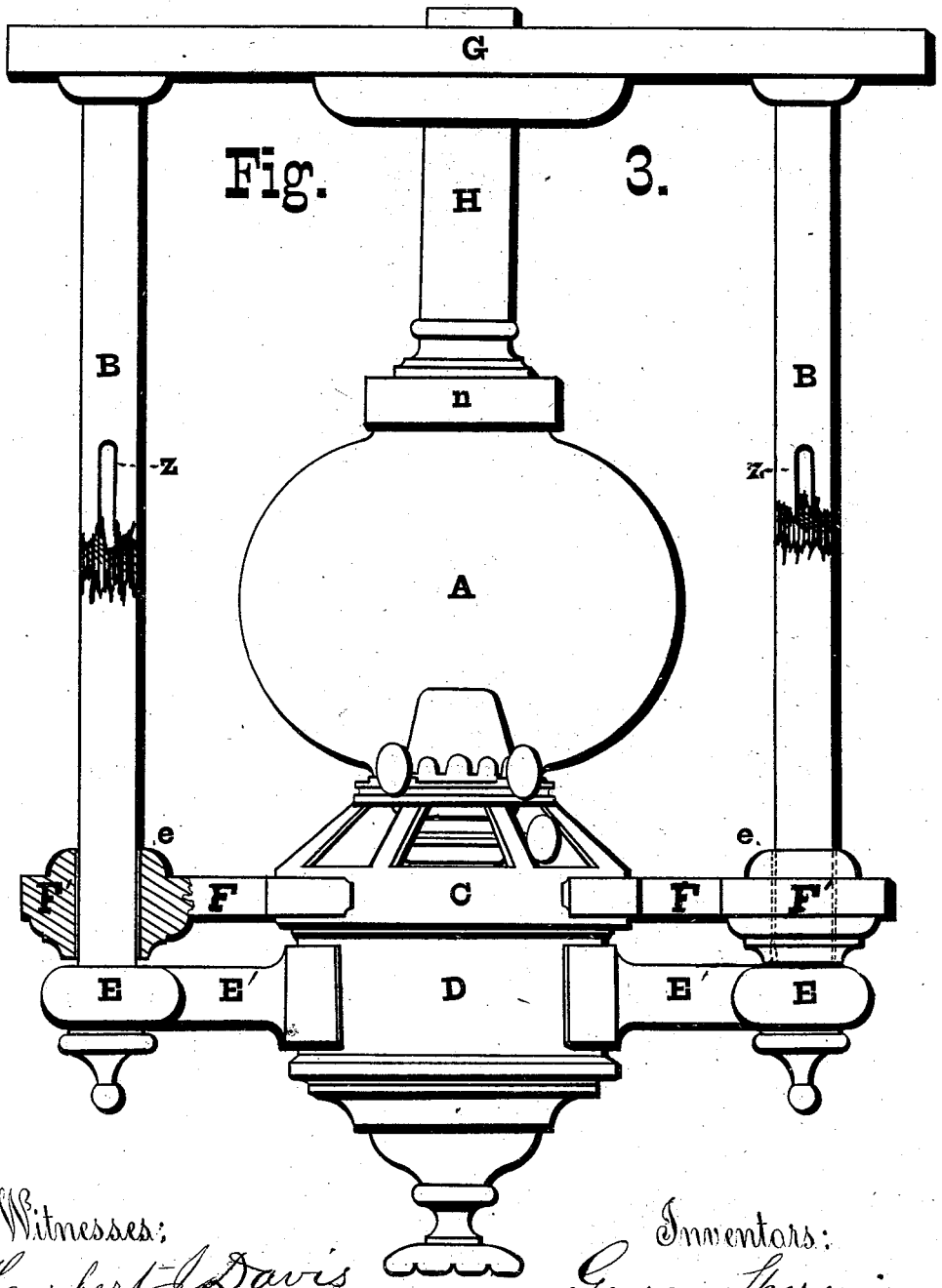
Fig. 3.



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Inventors:
George Sherwin,
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UNITED STATES PATENT OFFICE.

GEORGE SHERWIN AND EDMOND HOOPLE, OF BROOKLYN, NEW YORK.

IMPROVEMENT IN CENTER-LAMPS.

Specification forming part of Letters Patent No. **189,063**, dated April 3, 1877; application filed September 5, 1876.

To all whom it may concern:

Be it known that we, GEORGE SHERWIN and EDMOND HOOPLE, of the city of Brooklyn, Kings county, and State of New York, have invented some new and useful Improvements in Center-Lamps; and we do declare that the following is a full and exact description thereof, reference being had to the accompanying drawing, making a part of this specification.

The object of our invention is to construct a center-lamp which can be easily operated, and not liable to get out of order, it being so constructed that the lamp is drawn down from the globe-holder, while the globe remains stationary; or it may be so constructed that the globe can be drawn up while the lamp is being drawn down, whereby similar purposes are accomplished.

Figure 1 represents a front elevated suspension view of our center-lamp, showing one of the suspension sides in section, it being the view in which the lamp drops.

Fig. 2 is an elevated suspension view of our center-lamp, showing the two suspension sides in section, thus exposing the arrangements of parts by which the lamp and globe are made to move in opposite directions at the same time.

Fig. 3 is a modification, showing how the extremities of the arms *e e* may become sliding bearings and inclose the suspension sides or rods B, thus allowing the globe to be raised its proper distance, where it is caught and held in position by the catch-springs Z Z. With this construction of parts the chimney H may serve as a guide for the globe as it passes upward through the supporting-bar G.

Like letters refer to corresponding parts in all of the figures.

In Fig. 1, A is a globe; C, the globe-holder. D is a drip-holder, containing the oil-fount. E′ E′ are arms, connecting the drip-holder with the hub E E, which rest upon the nuts *c′ c′*. F F are arms connecting to hubs F′ F′, *e* being a boss on the hub F′, into which the suspension-tubes B are screwed or secured. *c c* are coiled springs within the tubes B. *b* is a tension-rod, provided with a sliding bearing, *a*, against which the spring acts. *e′ e′* are bosses, to which the tubes B are attached, as shown, or in some other equivalent manner. A is a support, from which the lamp and its fixtures are suspended.

In Fig. 2, A is a globe upon the holder C. F are arms extending from the globe-holder to the hubs or slide-bearings F′. These bearings inclose the tubular standard B. D is a fount-holder or drip-case surrounding the oil-fount. This holder is provided with arms E, which terminate in hubs E. To these hubs the extension-rods *b* are screwed. These rods terminate in the slide-bearings *a a*. *c c* are spiral springs within the tubes B. *n* is the base of a metallic chimney, provided with arms, which terminate in slide-bearings *n′*. *i i* are cords passing over the pulleys *t t*, with their ends secured to the arms *m m* and slide-bearings *a*. G represents a support, from which the lamp and its fixtures are suspended.

In the modification, Fig. 3, B B represent the suspended guide and supporting rods or bars. The lower ends of the bars terminate in hubs or their equivalent, E E, to which the fount-holder is attached by means of the arm E′ E′.

In Fig. 1 our improvement consists in the movement or method of operating the lamp so as to enable the operator to get at the various parts, for the purpose of cleaning, filling, trimming, and lighting, &c., all of which is accomplished by the means employed, which are as follows: In the construction of our improvements in suspended center-lamps we employ two hollow or tubular suspended supports. To these supports the globe-holder C is firmly attached, and remains in a fixed position beneath the globe and globe-holder. The oil-fount and its case or receiver D is suspended by means of the extension-arms E′ E′, terminating in the hubs E E, which rest upon the nuts *c′ c′*. To these nuts the tension-rods *b b* are secured; or they may be otherwise attached. These rods terminate in sliding guide-bearings *a a*. These bearings should fit closely within the tubes B B. Between these bearings *a a* and the ledge *x x*, at the bottom of the tubes B B, I locate springs *c c*, of sufficient power to hold the lamp-fount and its case or holder up firmly to its seat or against the globe-holder C. If at any time the power of the spring weakens, the nuts *c′ c′* can be

turned in a direction that will collapse or compress them until a sufficient force is obtained to hold the lamp-fount or holder to its seat.

By pulling the oil fount and holder down, the spring is compressed in the lower end of the tube, where it may be held by spring-catches within the tension-rods *b*, which will spring out and catch against the two hubs F′ F′. This or some equivalent device can be employed to effect this purpose. On relieving the catch, the holder and oil-fount are again brought together by the action of the spring. A packing of soft material can be used between all of the bearing-points to deaden the force of the impact when the parts are brought together.

In place of the spring, as shown, a drop-weight can be used by a modification of parts, which will not be so compact as the arrangement herein shown, nor will it be so convenient and useful when applied to railroad-cars, steamboats, &c.

In Fig. 2 we construct a center-lamp where the globe rises, while the oil-fount and its receiver descends. This movement of the parts is accomplished in the following manner: The bracket or arms F of the holder C terminates in the hubs F′, which inclose the hollow or tubular standards B, and fit with a close sliding joint thereto, which allows of an upward movement. The downward movement is obtained the same as in Fig. 1, while the upward movement is obtained by means of the downward movement, which is as follows: The cords *i i* are attached to the slide-bearings *a a*, after which they pass over pulleys *t t*, down to extension-arms *m m*, which are attached to the base of the chimney H and the top of the globe A. This cord may extend down and meet the extension-arms F F and raise the upward-moving parts from that point. Thus it will be seen that by pulling down on the lamp-holder, the spring is compressed, and the cord is drawn over the pulleys, which acts upon the arms and draws them upward at an equal distance with the downward pull of the moving parts beneath.

We are aware that a patent has been granted for a device whereby a railroad candle-holder is supported by two chains or cords passing through two suspended tubes, and connected to a shaft on which there is a coiled spring, which acts against the force which draws the candle-holder down. This device we disclaim.

What we claim, and desire to secure by Letters Patent, is—

1. A drop oil-lamp, with or without a drip-holder, in combination with the rods *b b*, actuating-springs *c c*, and the suspension-tubes B B, substantially as and for the purpose set forth.

2. A stationary globe and suspension-tube or bars B B, in combination with a drop oil-lamp, with or without a drip-holder, tension-rods *b b*, and actuating-springs *c c*, for the purpose specified.

3. The nut *c′*, tension-rod *b*, spring *c*, and support B, in combination with a drop-lamp, for the purpose specified.

4. The tubes B B, springs *c c*, rods *b b*, and cords *i i*, in combination with a lamp-fount, with or without a drip-cup, D, and globe-holder C, as described, and for the purpose specified.

GEORGE SHERWIN.
EDMOND HOOPLE.

Witnesses:
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H. J. DAVIS.