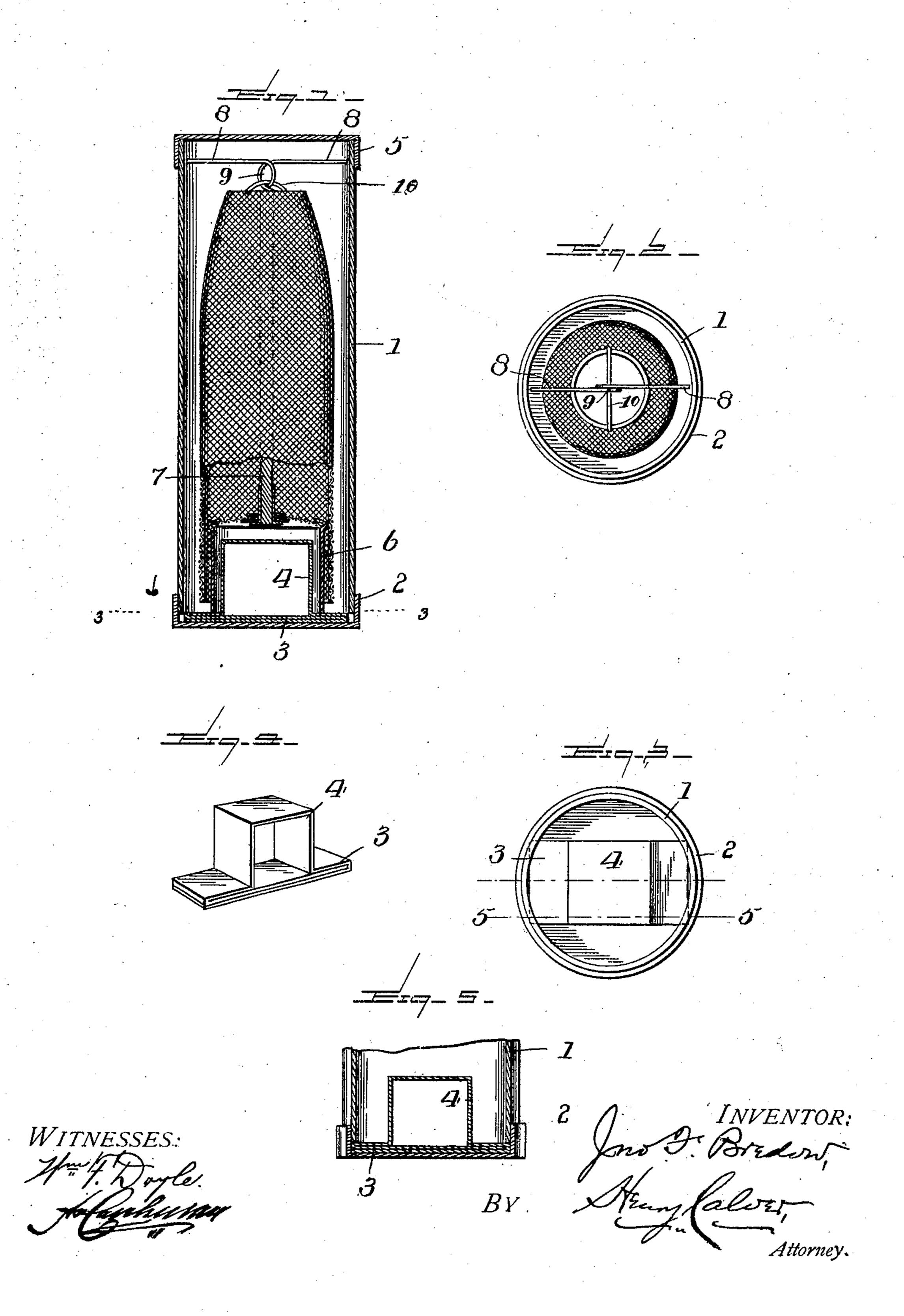
J. F. BREDOW.

MEANS FOR TRANSPORTING INCANDESCENT MANTLES.

(Application filed June 4, 1901.)

(No Model.)



United States Patent Office.

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MEANS FOR TRANSPORTING INCANDESCENT MANTLES.

SPECIFICATION forming part of Letters Patent No. 691,839, dated January 28, 1902.

Application filed June 4, 1901. Serial No. 63,061. (No modei.)

To all whom it may concern:

Be it known that I, John F. Bredow, a citizen of the United States, residing at Davenport, in the county of Scott and State of Iowa, have invented certain new and useful Improvements in Means for Transporting Incandescent Mantles, of which the following is a specification, reference being had therein to the accompanying drawings.

boxes for use in transporting hollow tubular articles of a fragile nature—as, for example, the filamentary mantles used in incandescent lights—the present invention having been designed particularly for use in transporting such mantles, which because of their fragile character are apt to be broken in transportation. Numerous attempts to produce a satisfactory shipping-case for these articles have

20 been made, and some of them, while resulting in the production of a case well calculated to protect the mantles, have been too expensive for general use.

In working out my invention I have not only borne in mind the necessity of providing a shipping-case which will carry the mantle safely and prevent breakage thereof, but have also considered the matter of cheapness and simplicity of construction, so that the cases may be made at a low cost compared to some of those now in use.

In the drawings accompanying and forming a part of this specification I have shown one embodiment of my invention.

Figure 1 is a central vertical section of the shipping-case, showing the mantle in position within it. Fig. 2 is a top view of the case with the cover removed. Fig. 3 is a view of the bottom of the case on line 3 3, 40 Fig. 1, looking in the direction of the arrow, the mantle being removed. Fig. 4 is a detail perspective view of the post or mantle-support which is placed at the bottom of the case.

Referring to the drawings by numerals, like numbers indicating like parts in the several views, 1 indicates the body of the case, which is preferably in the form of a cylinder, although it may, if desired, be of other shape in cross-section, said cylinder being preferably made of pasteboard and having open

ends. Fitted to the bottom of said case 1 is a cap 2 of ordinary construction, and resting upon said cap is the lower support or post for the mantle. Said support consists, as shown, 55 of a strip of material, preferably cardboard, bent upon itself, so as to form a base 3, and having a bent-up portion 4, which rises from. said base 3 to a proper height centrally of the cylindrical case 1 and forms a post or support 60 to center the lower end of the mantle within the case, as clearly shown in Fig. 1. Said base 3 is preferably made a little longer than the diameter of the case 1, being of a length equal to the full inner diameter of the cap 2, 65 so that the ends of the base 3 will be pinched between the end of the cylinder 1 and the cap 2 when the parts are assembled, and the support will thus be held firmly in central position.

The top of the case 1 is closed by means of a cap 5, of ordinary construction, as shown in Fig. 1.

The mantles are usually shipped with the burner-cap or mantle-carrier and mantle-sup- 75 port attached, so as to be in condition to be slipped over the burner, and the mantle-carrier or burner-cap 6 fits readily over the portion 4 of the lower support, as shown, thus positioning the mantle out of contact with 80 the sides of the case at its lower end. The mantle-support 7, which rises centrally of the mantle from the mantle-carrier 6, maintains the upper end of the mantle from contact with the sides of the case by means of the lat- 85 erally-extending arms 8, which project beyond the circumference of the mantle and thus hold it centered and in longitudinal alinement within the case. The said laterally-extending arms 8 are given a half-turn, 90 so as to form a closed loop 9 at the top of the mantle-support 7, and this closed loop prevents displacement of the transverse supporting-cord 10 of the mantle from being accidentally displaced, so that all danger of the 95 mantle rubbing against the side of the case. is avoided.

It will be understood that I do not limit my invention to the details of construction shown and described, as I have merely shown 100 one convenient embodiment of my invention, which may of course be varied within the range of mechanical skill without departing from the spirit of my invention.

Having described my invention, what I claim, and desire to secure by Letters Patent, is—

1. Means for transporting incandescent mantles comprising a casing having a centrally-placed post at its bottom, a mantle-support engaging said post and centering the mantle at its lower end, and centering means carried by the upper end of said mantle-support, said centering means bearing against the inner wall of the casing and serving to center the mantle at the upper end of said rasing.

2. Means for transporting incandescent mantles comprising a casing having a centrally-placed post at its bottom, a mantle-carrier engaging said post and centering said mantle at its lower end, and a central mantle-support rising from said mantle-carrier and provided with integral arms extending at right angles thereto, to center the mantle

at the upper end of the casing.

25 3. Means for transporting incandescent mantles comprising a casing having a centrally-placed post at its bottom, a mantle-carrier engaging said post and centering said mantle at its lower end and a central support rising from said mantle-carrier and provided with integral arms extending at right angles thereto to center the mantle at the upper end of the casing, said arms being crossed upon each other to form a closed loop within which the transverse mantle-supporting cord is held.

4. A shipping-case for incandescent mantles comprising a body portion, end caps therefor, and a mantle-post at one end of the case 40 made of a strip of material bent upon itself

so as to form a supporting-base and a central bent-up mantle-receiving portion to receive and center the lower end of the mantle.

5. A shipping-case for incandescent mantles formed of a cylindrical tube, removable 45 end caps therefor, and a mantle-supporting post at one end of said tube, having a base and an upright portion, said post being held between the end of the tube and the end cap.

6. A shipping-case for incandescent man-50 tles formed of a cylindrical tube, removable end caps therefor, and a mantle-supporting post formed of a strip of material bent upon itself so as to provide a base and a bent-up central portion, the ends of said base being 55 pinched and held between the end of the tube and the removable cap.

7. A centering-post for shipping-cases for tubular articles formed of a strip of cardboard bent up into a \subseteq shaped projection 60 and having its ends extending laterally from said projection, said ends being doubled under to form a supporting-base for the post.

8. A shipping-case for incandescent mantles formed of a cylindrical tube, removable 65 end caps therefor, and a mantle-supporting post formed of a strip of cardboard bent into a central \$\subset\$-shaped projection, and having its ends extending laterally from said projection and doubled under to form a supporting- 70 base for the post, said laterally-projecting ends being pinched and held between the end of the cylindrical tube and the removable end cap.

In testimony whereof I affix my signature 75

in presence of two witnesses.

JOHN F. BREDOW.

Witnesses:

O. H. LEHMAN, MARY A. PERRY.