A. P. STORRS.

CANOPY SHADE.

APPLICATION FILED FEB. 20, 1907.

994,211. Patented June 6, 1911.

Fig. 1

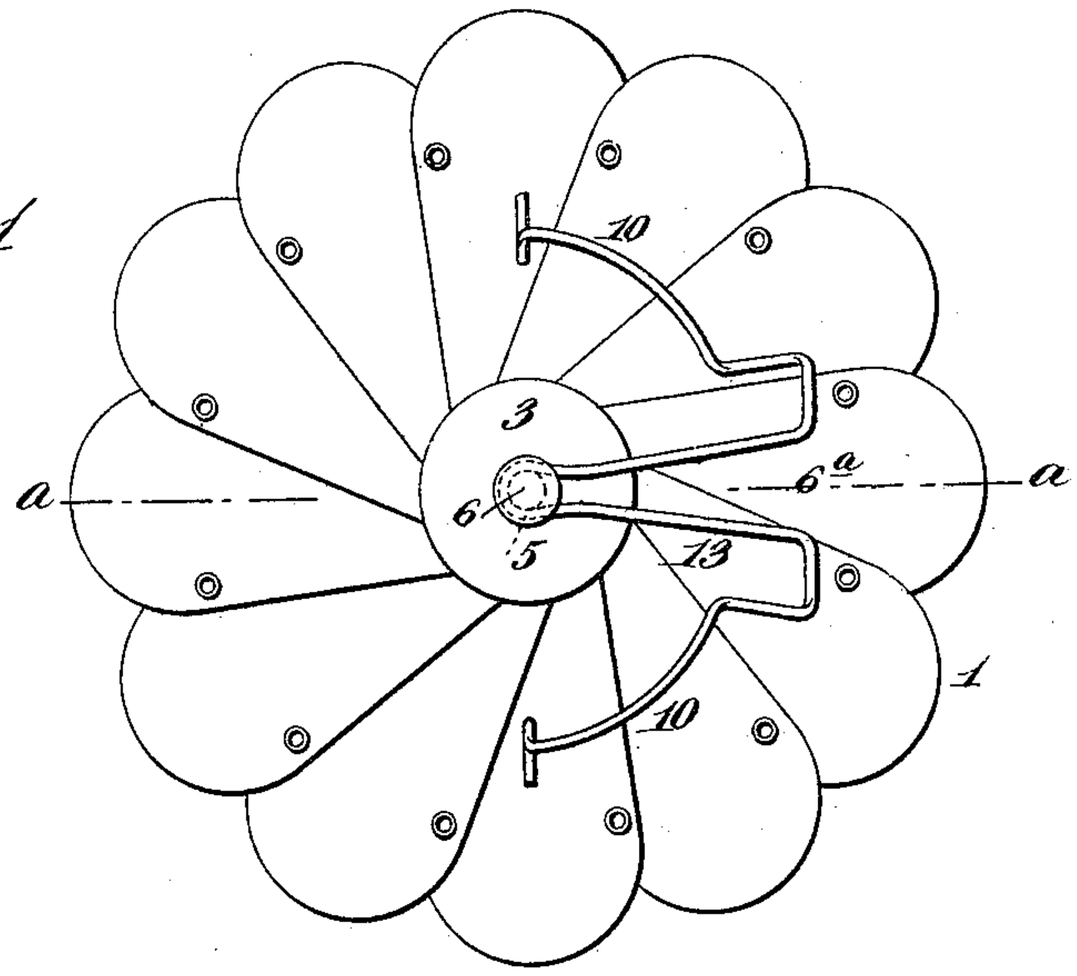


Fig. 2

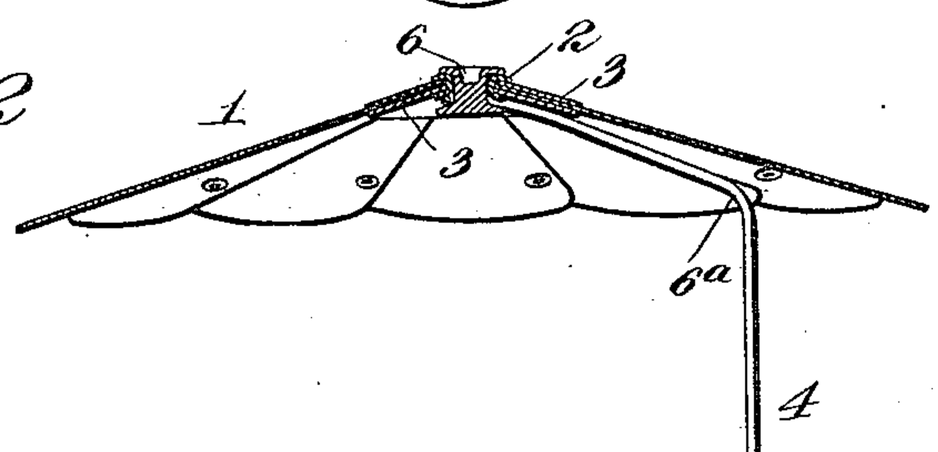
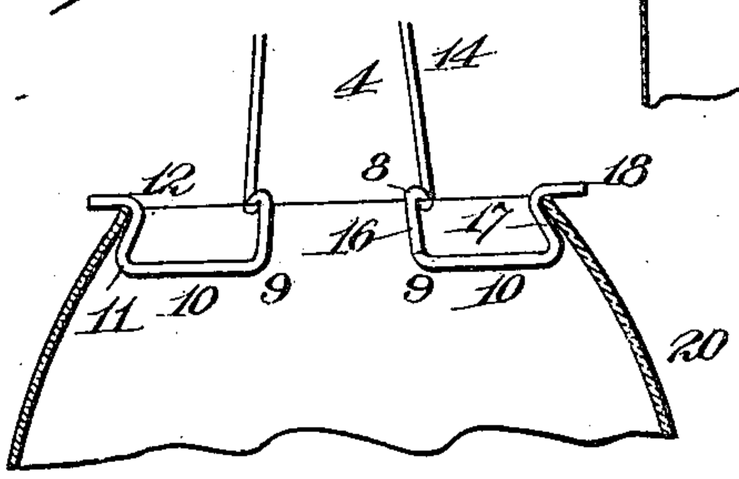


Fig. 3.



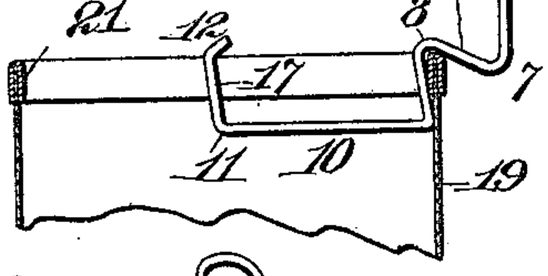
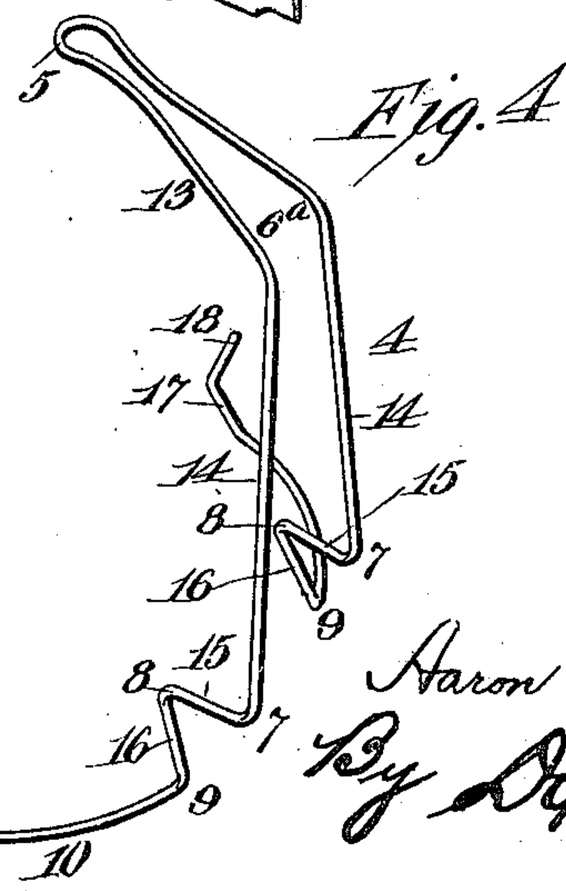


Fig. 4



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UNITED STATES PATENT OFFICE.

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CANOPY-SHADE.

994,211. Specification of Letters Patent. Patented June 6, 1911.

Application filed February 20, 1907. Serial No. 358,395.

To all whom it may concern:

Be it known that I, AARON P. STORRS, a citizen of the United States, residing in Owego, Tioga county, State of New York, have invented a certain new and useful Improvement in Canopy-Shades, of which the following is a specification.

The object I have in view is the production of a canopy shade to be applied to chimneys and globes of lamps and gas fittings generally. The device is particularly applicable, however, for attachment to the mica chimneys of incandescent gas and lamp burners.

I seek by my invention to reduce the cost of manufacture of the canopy, to improve its appearance, to make its attachment to its support more secure, and to make it automatically adjust itself when attached to supports of different sizes.

Another and important object of my invention is to produce a canopy which may be attached to its support when the lamp or gas fitting is in use without danger or inconvenience to the person making the attachment.

These objects and others, which will more fully appear from the following specification and accompanying drawings, are carried out by the device illustrated in the drawings.

Figure 1 is a bottom plan view of a canopy embodying my invention; Fig. 2 is a side sectional view of the same taken on the line *a*—*a*, of Fig. 1, and showing the canopy attached to a mica chimney, Fig. 3 is a front view of the supporting legs showing the canopy attached to a globe, Fig. 4 is a perspective view of the supporting legs as they appear when removed from the shade.

In all of the several views, like parts are designated by the same reference characters.

In carrying out my invention, I provide a shade 1 which is shown as formed of leaves or strips of mica. Each pair of the leaves or strips of mica is shown as secured together by means of eyelets near to their peripheries. They are also secured together at the center by an eyelet 2 which is riveted on both sides of the mica. The eyelet also holds in position a circular plate or washer 3 of thin metal on each side of the mica. The several eyelets hold the different sheets of mica firmly and definitely in position. The eyelets near the extremity of the leaves may be omitted, as may also the washers 3, 3. The shape and number of leaves may be varied as desired.

The shade is supported in position upon the chimney or globe by means of the legs generally indicated by the character 4. The legs are on one side of the shade as will be seen, and do not extend outward on three or more sides as has been the prior practice. The legs extending on one side furnish a convenient handle which may be adjusted by the fingers of one hand, and which will not be in the path of the heated gases and air. The details of the legs are as follows: Two legs are provided, both preferably being made of the same piece of wire. This wire is preferably spring wire which is bent at 5 to leave a loop. This loop is attached to the center of the shade by means of a rivet 6. The form of attachment is immaterial, the rivet being shown for the purpose of illustration. The loop 5 serves the twofold purpose of an attachment for the rivet and a means for imparting elasticity to the two legs. From the point of attachment to the shade, the two wires, or the two parts of the same wire, run back nearly parallel to each other and to the bottom of the shade until they reach a point somewhat nearer the outer periphery of the shade than the center. This point is designated by the character 6ª. At this point, they are bent so that they assume approximately a vertical position. At the point 7 they are sharply bent and pass for a short distance in an inclined direction, the inclination being upward. At the point 8 they are again sharply bent and pass downward, the direction being not vertical but inclined outward, for a purpose as will be hereinafter explained. At the point 9 the two legs diverge in opposite directions and are bent to curved form at 10. At the point 11 they are again sharply bent, passing upward at an angle to the point 12. Here they are bent at nearly a right angle passing outward in a horizontal, or substantially, horizontal direction.

The legs, it will be clear from this description and by examination of the drawings, will comprise inclined portions between the points 5 and 6ª which inclined portions are designated by the character 13. Between the points 6ª and 7 there are vertical portions which are designated by the character 14. Between the points 7 and 8

are inclined portions which are designated by the character 15. Between the points 8 and 9 are other inclined portions which are designated by the character 16. Between the points 9 and 11 will be the already described curved portions 10. Between the points 11 and 12 will be inclined portions which are designated by the character 17, and beyond the point 12 to the end of each leg will be a horizontal portion 18.

The parts 13, as already described, are substantially parallel to that portion of the shade which is immediately above them but slightly diverging, as shown in Fig. 1. The parts 14 are substantially vertical, but also slightly diverging. The parts 15 are substantially parallel to each other but inclined upward, as shown in Fig. 2. The parts 16 incline rather sharply outward or backward, as shown in Fig. 2, while the parts 10 are substantially horizontal; the parts 17 inclining inward at about the same angle as the parts 16 incline outward.

The legs rest upon their support, which may be the upper edge of a chimney, as 19, or a globe, as 20. The curved portions 10, 10 will engage within the inner edge of the support. The horizontal portions 15 and 18 will rest upon the upper edge, and the vertical portions 14 will be substantially vertical and beyond the outer edge of the support. The device is attached or removed from its support by being held within the fingers, pressure being brought to bear on the vertical portions 14, 14. This will compress the two legs together, and draw the curved portions 10, 10 toward each other and out of contact with the support. The device may be then applied to the support. Pressure on the portions 14, 14 being relieved, the legs will separate forcing the curved portion outward into elastic engagement with the support. This will firmly hold the device in place on its support.

By separating the legs 4 a sufficient distance, and giving them a permanent set in this position, the device may be attached to a support of considerable size. The limit of size is reached only when the parts 10 may not engage with the inner walls of the support with sufficient friction to support the canopy shade over the chimney or globe; when this limit of size is exceeded the device can not be relied upon to firmly rest in place. The proportion of the spread of the legs 4, and the diameter of the support should be so governed that the legs will engage the support with sufficient friction to properly sustain the canopy. Within certain limits, however, the legs will adjust themselves automatically to support the canopy over chimneys and globes of different sizes.

The inclination of the parts 16 and 17 is important, as it permits the curved portions 10 to engage under all conditions with a solid and unbroken support. This is apparent in connection with Fig. 2 in which the canopy shade is supported upon a mica chimney. These mica chimneys are provided ordinarily with a beading 21 at the top, such beading being made of sheet metal bent over the upper edge of the mica. The length of the parts 16 and of 17 is sufficient and their inclination is enough so that as the parts 15 and 18 rest upon the upper edge of the beading 21, the curved portions 10, 10 will engage with the inner walls of the mica portion of the chimney and thereby secure a firm foundation for the legs. When the device is used in connection with a globe, as 20, in which the inner sides of the walls flare outward from the opening in the top, the inclined portions 16, 17 permit the curved portions 10, 10 to engage with the inner walls of the globe a sufficient distance below its upper edge to give a firm support for the legs.

From the foregoing description it is apparent that the portions 15 and 16 constitute claws, that the curved portions 10, 10 constitute feet, and that the portions 17 and 18 constitute claws. The claws rest upon the upper edge of the support, and sustain the weight of the canopy shade to some extent and prevent it tipping over. The feet are caused to frictionally engage with the inner walls of the support and serve by such engagement to assist in sustaining the canopy shade. The feet are sufficiently long to separate the claws 15—16 and 17—18, so that a firm base is provided, and the shade will not tip over. The portions 14, 14 of the legs constitute a handle, by means of which the device may be applied to or removed from the support. This handle as will be apparent is to one side of the opening in the support, and consequently will not be in the path of the heated products of combustion or hot air or gases rising in a vertical direction from the support.

In accordance with the provisions of the patent statutes, I have described the principle of my invention, together with the apparatus which I now consider to represent the best embodiment thereof; but I desire to have it understood that the apparatus shown is merely illustrative, and that the invention can be carried out in other ways.

Having now particularly described and ascertained the nature of my said invention, and in what manner the same is to be performed, I declare that what I claim and desire to secure by Letters Patent is:—

1. In a canopy shade, a shade portion, and a wire support therefor comprising two legs each having a portion coöperating with the shade, a substantially vertical handle portion located out of the direct path of gases from the chimney to which the shade may be applied, and bent extremities adapted to

engage solely with the upper edge and inside of the chimney, the said legs being of resilient material and normally tending to separate the bent extremities of the legs to frictionally engage them with the inside of the chimney.

2. In a canopy shade, the combination with the shade and a wire support therefor, said wire support being in two parts, each having bent extremities adapted to rest upon the upper edge of the chimney and also engage solely with the inside thereof, said parts having vertical portions serving as a handle by means of which the bent extremities may be drawn together for engaging the support with or disengaging the support from the chimney.

3. In a canopy shade, the combination with the shade, of legs, the said legs being formed of a single piece of spring wire, bent into a loop at substantially its middle, and engaging with the shade by a fastening at this point, and having a double portion substantially parallel to the bottom of the shade, and extending to a point well over the edge of the support, and at that point extending downward in a substantially vertical direction to a point below the upper edge of the support and from this point diverging and extending upward and outwardly on an incline and then downwardly on an incline to form a claw to engage with the upper edge of the support, and then at that point extending outward in a curve to form feet to engage with the inside of the support and from there upward on an incline and outward to form a claw to engage with the upper edge of the support, the claws resting on the upper edge of the support, and the feet engaging with elastic pressure with the inside of the support to hold the legs and shade in position, with a portion of the legs outside of the edge of the support, such portion of the legs constituting a handle for applying the shade canopy to the support and removing it therefrom.

4. A shade canopy having the shade portion formed of a number of leaves of mica secured together at the center by means of an eyelet, and with supporting legs, such legs being formed of a single piece of spring wire bent to form a loop at substantially its middle portion, the said loop being connected to the eyelet of the shade portion by means of a fastening, the said legs being so shaped as to run substantially parallel on one side to a point well to one side of the support, and there being bent vertically, such vertical portion constituting a handle, the wires being sharply bent up and at the bottom at an angle and then downward at an angle to form claws, and then outward on a curve to form feet, and then upward and inward at an angle and then outward to form claws, the said feet engaging with the inner side of the support and the claws with the upper edge, the handle being to one side of the opening in the support so that it will not be in the path of the ascending heated gases or air.

This specification signed and witnessed this 16th day of February, 1907.

AARON P. STORRS.

Witnesses:
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GEO. S. TRUMAN.