Nov. 12, 1940. B. KELLY 2,221,300

ASH TRAY

Filed Sept. 24, 1938

FIG. 1.

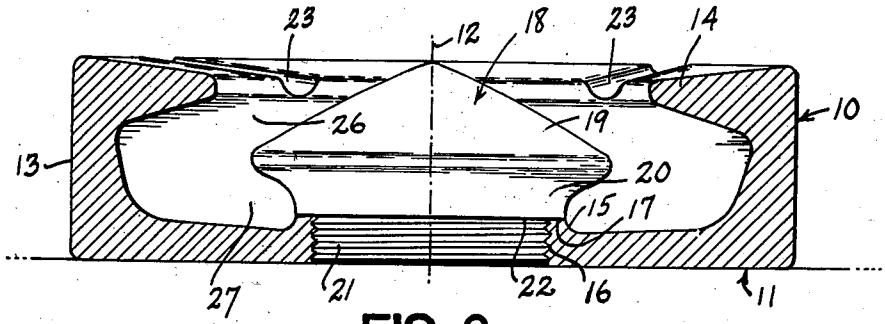


FIG. 2.

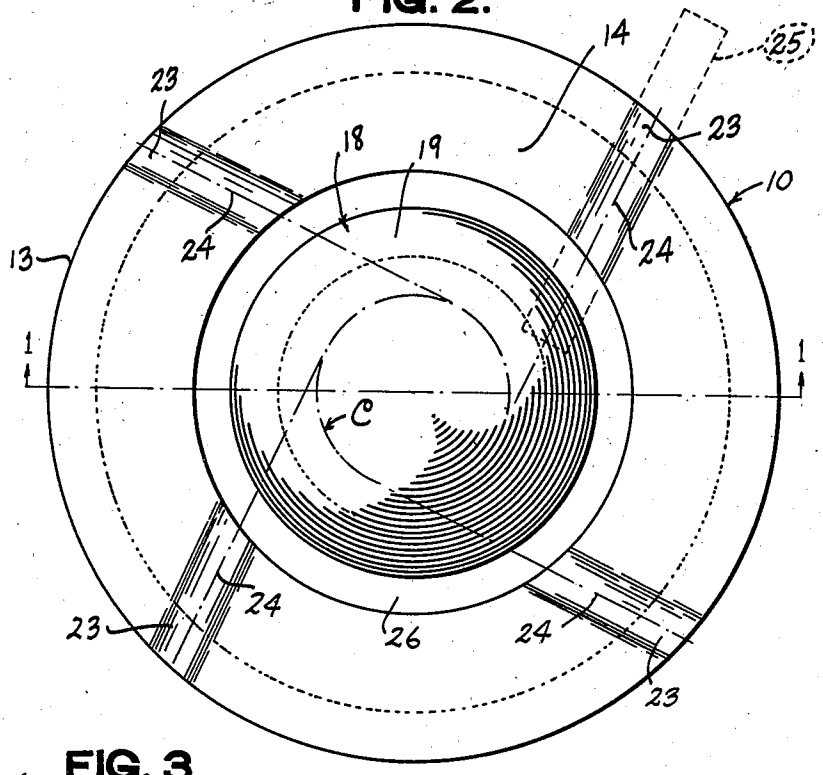
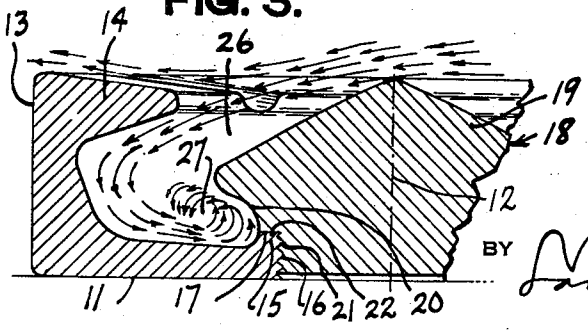


FIG. 3.



INVENTOR.

Bliss Kelly

BY Lancaster, Allwine & Rommel

ATTORNEYS.

Patented Nov. 12, 1940

2,221,300

UNITED STATES PATENT OFFICE

2,221,300

ASH TRAY

Bliss Kelly, Oklahoma City, Okla.

Application September 24, 1938, Serial No. 231,583

3 Claims. (Cl. 131—231)

The present invention relates to improvements in ash trays and the primary object of the invention is to provide an ash tray having a relatively shallow ash chamber so formed as to facilitate cleaning and tending to prevent the picking up and scattering of ashes in the chamber by cross currents of air and gusts of wind.

Another object is to provide an ash tray having a dome disposed in the ash chamber and providing a surface against which a pipe bowl may be knocked or the burning end of a cigarette may be crushed for extinguishing purposes.

Still another object of the invention resides in the provision of an ash tray having means for supporting and extinguishing lighted cigarettes.

A further object of the invention is to provide an ash tray having a dome disposed in the ash chamber and means for supporting lighted cigarettes in tangential relation to the dome.

A still further object of the invention is to provide an ash tray having a dome removably secured thereto.

Other objects and advantages of the invention will become apparent during the course of the following detailed description, taken in connection with the accompanying drawing, forming a part of this specification and in which drawing:

Figure 1 is a vertical sectional view of the ash tray.

Figure 2 is a top plan view of the same.

Figure 3 is a fragmentary vertical sectional view of the ash tray and indicating by means of arrows the direction and path of travel tending to be followed by a current or gust of wind passing thereover.

In the drawing, which for the purpose of illustration shows only a preferred embodiment of the invention, and wherein similar reference characters denote corresponding parts throughout the views, 10 designates the ash tray body, preferably in the form of a solid of revolution, and having an end 11 perpendicular to the axis 12 of the solid of revolution and constituting a base. Extending upwardly from the end or base 11 is a peripheral rim 13 carrying an inwardly extending tapering flange 14 overhanging the base. Projecting upwardly of the base is a boss 15 co-axial with the solid of revolution and having a central screw threaded opening 16 encircled by an annular shoulder 17. Disposed coaxially of the solid of revolution is a dome 18 comprising a conoidal head portion 19, a reduced neck portion 20 and a still further reduced screw threaded stem portion 21 removably secured within the opening 16 and forming an annular shoulder 22 at the lower end of the neck portion, this shoulder coinciding with and engaging the shoulder 17 of the boss 15.

Spaced around the upper surface of the annular flange 14 is a plurality of semi-cylindrical grooves 23 having their longitudinal axes 24 extending in tangential relation to a given circle C having a diameter less than that of the flange 14. Each groove 23 preferably is of a width and depth substantially equal to the diameter and radius, respectively, of a given size cigarette 25 to be seated therein, and of a length greater than one-fourth and preferably slightly less than one-half the length of the given size cigarette 25. By proportioning the depth and width of each groove 23 to closely approximate the contour of the lower half of the given cigarette seated therein, the cigarette if burning, will be extinguished when the lighted end burns down to the part lying in the groove. The specified length of the groove is such that a burning cigarette may be seated in a position of stable equilibrium in the groove and will become extinguished before the center of gravity of the cigarette shifts, due to consumption of the cigarette, to a position of unstable equilibrium. As an additional safeguard against falling of the lighted cigarette from the tray, the flange 14 is inclined inwardly by tapering toward the free edge thereof.

Between the dome 18 and the base 11, rim 13 and flange 14 is defined a downwardly and outwardly inclined annular passageway 26 terminating in a downwardly and inwardly inclined annular chamber 27. The walls of the passageway 26 and chamber 27 are so formed that any cross currents of air entering the chamber thru the passageway will be directed, as shown by the arrows in Figure 3, along an involute path terminating in a circular path or eddy within the chamber.

It will be noted that any ashes deposited in the cavity will tend to roll beneath the undercut dome and to a position mostly out of sight, and that the contents, even tho the tray be tipped to a ninety degree angle, will not spill out. The tray may be manufactured from any suitable material, such as porcelain, glass, or terra cotta.

Various changes may be made in the form of invention herein shown and described, without departing from the spirit of the invention or the scope of the following claims.

I claim:

1. In an ash tray, a solid of revolution having one end perpendicular to the axis of said solid

of revolution and constituting a base, a peripheral rim extending upwardly from the base, an inwardly extending flange carried by the peripheral rim in overhanging relation to the base, and a dome extending upwardly from the base and co-axial with said solid of revolution, said dome including an upwardly flaring neck merging with an upwardly tapering head, said base, rim, flange, and dome defining a shallow annular cavity having walls so formed as to direct any air currents entering the cavity along a substantially involute path and into a substantially circular path within the cavity.

2. In an ash tray, a solid of revolution having one end perpendicular to the axis of said solid of revolution and constituting a base, an axial boss extending upwardly of the base, said base including a central opening and an annular shoulder encircling the opening, and a dome including a reduced neck portion and a further reduced stem portion forming an annular shoulder at the base of the neck portion, said last-named shoulder resting on and coinciding with the annular shoulder of said base, and said stem portion being disposed in said central opening.

3. In an ash tray, a solid of revolution having one end perpendicular to the axis of said solid of revolution and constituting a base, an axial boss extending upwardly of the base, said boss including a screw threaded central opening and an annular shoulder encircling the opening, and a dome including a reduced neck portion and a further reduced screw threaded stem portion forming an annular shoulder at the base of the neck portion, said shoulder resting on and coinciding with the annular shoulder of said boss, and said stem portion having internal screw threaded engagement with the central opening of said boss.

BLISS KELLY.