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2,873,876

COMBINED CIGARETTE CASE AND CLOSURE MEANS

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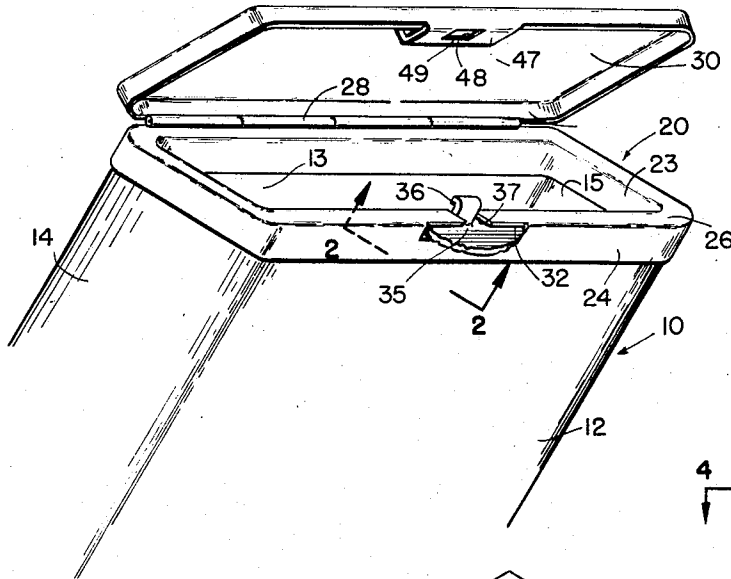


FIG. 1

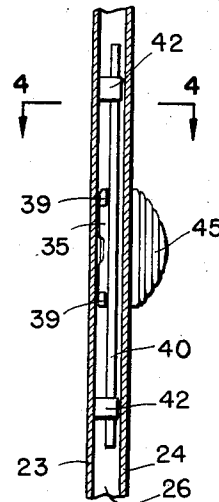


FIG. 2

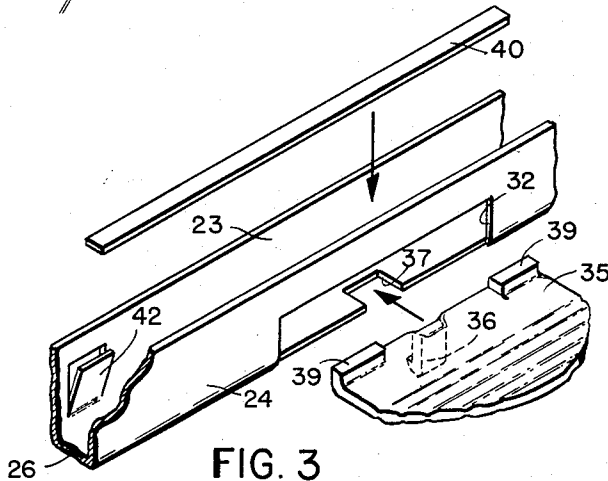


FIG. 3

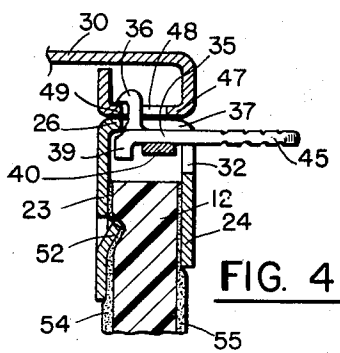


FIG. 4

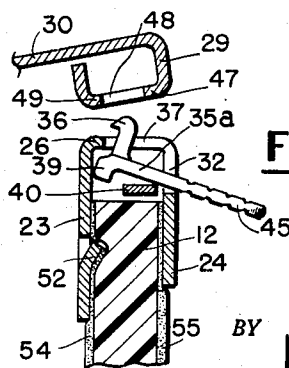


FIG. 5

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ATTORNEYS

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COMBINED CIGARETTE CASE AND CLOSURE MEANS

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3 Claims. (Cl. 220—35)

This invention relates to cigarette cases and more particularly, to a cigarette case for cigarette packages which has a hingedly connected cover member and releasable latch means for securing the cover member in a closed position therewith.

Various types of cigarette cases have been provided for enclosing both loose cigarettes and packages of cigarettes for protective and decorative purposes, such cases to be carried in a suit pocket, a handbag, and the like. However, the closure means ordinarily associated with such cigarette cases are somewhat complicated and frequently require repair. Also, many of these closure means are released in response to a squeezing action upon the finger pressure plate toward a side wall of the case. Thus, such cases are often accidentally opened when carried in the purse or pocket, thereby introducing an additional inconvenience to the user.

Accordingly, an object of the present invention is to provide a novel cigarette case and closure device that is simple in construction, efficient in operation, and which will overcome the aforementioned difficulties.

Another object of the present invention is to provide a cigarette case having a hingedly connected cover, including manually releasable novel closure means for securing the cover in a closed position with the side walls of the case.

A further object of the present invention is to provide a cigarette case of the above type in which the closure assembly includes relatively few parts, and is actuated toward a release position by exerting a tilting force upon the associated pressure plate in a direction substantially perpendicular to the plane of the cover member within the closed position.

A still further object of the present invention is to provide a novel closure assembly for cigarette cases having a hingedly connected cover member that includes two basic components, one of which is a unitary finger pressure plate, pivot means, and latch hook, the other member being a spring element that maintains the latch plate in proper assembled relationship within the case and biases it toward a normally closing position toward engagement with the cover member thereof.

A more specific object of the present invention is to provide a latch plate for use in cigarette cases that includes a substantially flat finger pressure plate, a latch hook extending outwardly from one side of the plate, and pivotal fulcrum means extending outwardly from an opposite side of the pressure plate.

All of the foregoing and still further objects and advantages of this invention will become apparent from a study of the following specification, taken in connection with the accompanying drawing, wherein:

Figure 1 is a fragmentary perspective view of a cigarette case made in accordance with the present invention.

Figure 2 is an enlarged transverse cross sectional view taken along line 2—2 of Figure 1.

Figure 3 is an exploded fragmentary perspective view of certain of the operating parts shown in Figure 1.

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Figure 4 is an enlarged transverse cross sectional view taken along line 4—4 of Figure 2, showing the parts in a normally closed position; and

Figure 5 is a view similar to Figure 4, showing the parts in the released or open position.

Referring now to the drawing, and more particularly to Figure 1 thereof, a cigarette case 10 made in accordance with the present invention is shown to include spaced front and back walls 12, 13, respectively, and spaced parallel side walls 14, 15. This case is closed at the bottom end and defines an open upper end having a closure assembly associated therewith.

This closure assembly includes an annular base frame 20 that is of substantially U-shaped cross section having an inner side leg 23, an outer side leg 24, and a connecting base web 26. A longitudinally extending hinge 28 associated with one edge of the base frame is pivotally connected to one side of a depending peripheral flange 29 of a cover member 30. Thus, the cover member is selectively rotatable between an open and a closed position relative to the base frame and compartment defining walls of the cigarette case. A torsion spring (not shown) associated with the longitudinal hinge 28 normally biases the cover member 30 toward the open position shown in Figure 1.

Integral latch means associated with the base frame and cover member 30 is provided selectively to maintain the cover member 30 in a closed position relative to the base frame 20 against the action of the torsion hinge spring so as completely to enclose any cigarettes contained within the case, in a conventional manner. This latch means includes a latch plate 35 which partially extends through an elongated aperture 32 defined by the outer side 24 of the annular base frame 20. This latch plate includes an angularly related latch hook element 36 that is slidably accommodated within a transverse slot 37 in the base web 26 of the annular base frame 20. A pair of longitudinally spaced lugs 39 are normally disposed in facing engagement with the inner side wall 23 of the base frame 20 and are operative to act as a fulcrum in a manner hereinafter described so as to effect the reciprocating movement of the latch hook 36 between a latching and a released position relative to the cover 30. This latch plate 35 is supported within the base frame 20 for selective reciprocating rotational movement about a longitudinal axis substantially parallel to the sides and base defining the base frame 20 by means of a longitudinally extending leaf spring member 40. This spring overlies the mid portion of the latch plate 35 and is secured at each end to the base frame by means of downwardly struck tabs 42, as clearly shown in Figures 2 and 3. The outer serrated portion 45 of the latch plate defines a finger pressure plate for actuating the closure device as will hereinafter be described. The adjacent facing portion of the cover member 30 is provided with an inwardly directed plate 47 that defines a central aperture 48 and a latch engaging lip 49. This lip 49 when moved into engagement with the latch hook 36 of the latch plate, is operative to be engaged thereby so as releasably to secure the cover in a closed position.

The entire closure assembly including the base frame 20, the latch means, and the cover member 30 is installed as a unit upon the opening defining portions of the main body of the cigarette case, the U-shaped base section receiving the side walls of the case therebetween, as clearly shown in Figures 4 and 5. Inwardly struck hooks 52 of the inside wall 23 of the base frame are operative to engage the respective walls of the cigarette case to maintain the closure assembly in proper association therewith. Of course, such walls may include decorative inner and outer coatings 54, 55, to produce substantially any desired effect.

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With the cover member 30 in the open position as shown in Figure 1, a downward pressure upon the top thereof is operative to cause the lip 49 to urge the latch hook 36 outwardly so as to permit it to engage the inside surface of the lip and hold the parts in the closed position as shown in Figure 4, against the action of the longitudinal hinge spring tending to rotate the cover member toward the open position. By then exerting a pressure against the finger pressure plate 45 in a direction substantially perpendicular to the plane of the cover member 30 and the plane of the base member 20, the entire latch plate 35 will be rotated about a central transverse axis through the action of the fulcrum lugs 39 against the adjacent walls of the U-shaped base frame, as shown in Figure 5, to withdraw the latch hook 36 out of engagement with the latch lip 49 of the cover member 30, in which position the cover member 30 is free to move to the open position shown in Figures 1 and 5. This latch plate is held in the open position 35a against the action of the leaf spring 40 which tends to return it to the normal position 35, shown in Figure 4. It will thus be recognized that a simple and novel closure assembly for cigarette cases has been provided that has a minimum number of parts and which is actuated in response to a pressure exerted in a direction perpendicular to the plane of the associated cover and base members.

While this invention has been described with particular reference to the construction shown in the drawing, it is to be understood that such is not to be construed as imparting limitations upon the invention, which is best defined by the claims appended hereto.

I claim:

1. In combination with a case having spaced walls defining a storage compartment with an enlarged opening for removably receiving a cigarette package, a closure assembly for said enlarged opening including an annular base frame of substantially U-shaped cross section having spaced parallel sides and a connecting base wall receiving said opening defining portions of said compartment walls, a cover member hingedly connected to one end of said base frame for selective pivotal movement between an open and a normally closed position relative thereto, latch means associated with said cover member and said base frame for controlling said pivotal movement of said cover member, said latch means including a latch hook at one end and a finger pressure plate at an opposite end, one of said spaced parallel sides defining a longitudinal slot at least as long as said finger pressure plate, said connecting base wall defining a rectangular cutout at least as long as said latch hook in direct communication with said longitudinal slot, said latch plate being movable within the plane of said base frame transversely with respect to said one parallel side into assembly therewith, said rectangular cutout receiving said latch hook perpendicularly therein, said longitudinal slot receiving the adjacent portions of said finger pressure plate, said latch hook extending perpendicularly outwardly from one side of said latch plate and opening toward said one end of said plate, a leaf spring extending along an opposite side of said latch plate securing said latch plate within said base frame and yieldably preventing pivotal movement of said latch plate away from said connected base wall from a normal cover engaging position to a manually actuated cover released position, the ends of said leaf spring being secured to said connecting base wall of said U-shaped base frame, the intermediate portion of said leaf spring underlying said latch plate adjacent to one side thereof, said latch plate being confined between said leaf spring and said connecting base wall of said U-shaped base frame, and said one side of said latch plate comprises fulcrum lug means extending outwardly therefrom in a direction opposite to that of said latch hook, said fulcrum lug means engaging the other one of said spaced parallel sides of said frame.

2. In combination with a case having spaced walls de-

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fining a storage compartment with an enlarged opening for removably receiving a cigarette package, a closure assembly for said enlarged opening including an annular base frame of substantially U-shaped cross section having spaced parallel sides and a connecting base wall receiving said opening defining portions of said compartment walls, a cover member hingedly connected to one end of said base frame for selective pivotal movement between an open and a normally closed position relative thereto, latch means associated with said cover member and said base frame for controlling said pivotal movement of said cover member, said latch means including a latch hook at one end and a finger pressure plate at an opposite end, one of said spaced parallel sides defining a longitudinal slot at least as long as said finger pressure plate, said connecting base wall defining a rectangular cutout at least as long as said latch hook in direct communication with said longitudinal slot, said latch plate being movable within the plane of said base frame transversely with respect to said one parallel side into assembly therewith, said rectangular cutout receiving said latch hook perpendicularly therein, said longitudinal slot receiving the adjacent portions of said finger pressure plate, said latch hook extending perpendicularly outwardly from one side of said latch plate and opening toward said one end of said plate, a leaf spring extending along an opposite side of said latch plate securing said latch plate within said base frame and yieldably preventing pivotal movement of said latch plate away from the other one of said parallel sides of said frame from a normal cover engaging position to a manually actuated cover released position, the ends of said leaf spring being secured to one of said walls of said U-shaped base frame, the intermediate portion of said leaf spring underlying said latch plate adjacent to one side thereof, said latch plate being confined between said leaf spring and said connecting wall of said U-shaped base frame, said one side of said latch plate including fulcrum lug means extending outwardly from said latch plate in a direction opposite to that of said latch hook, said fulcrum lug means engaging said other parallel side of said U-shaped base frame, said hinged cover member including spring means normally biasing said cover member toward an open position, said latch hook in response to movement of said cover member toward a closed position engaging with said latch hook engagement means of said cover member for releasably securing said cover member in a closed position, said latch hook in response to movement of said finger pressure plate in a direction substantially perpendicular to the plane of said U-shaped base frame being rotatable out of engagement with said latch hook engagement means against the action of said leaf spring to release said cover member for rotation toward an open position by said cover spring hinge means, and said latch hook engagement means comprising portions of said cover member facing said base frame defining an aperture receiving said latch hook therebetween and defining a lip for engagement by said latch hook.

3. In combination with a case having spaced walls defining a storage compartment having an enlarged opening for removably receiving a cigarette package, a closure assembly for said enlarged opening including an annular base frame of substantially U-shaped cross section having spaced parallel sides and a connected base wall receiving said opening defining portions of said compartment walls, a cover member hingedly connected to one end of said base frame for selective pivotal movement between an open and a closed position relative thereto, latch means associated with said cover member and said base frame controlling said pivotal movement of said cover member, said latch means including a latch hook at one end and a finger pressure plate at an opposite end, one of said spaced parallel sides defining a longitudinal slot at least as long as said finger pressure plate, said connected base wall defining a rectangular cutout of substantially the same length as said latch hook in direct communication

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with said longitudinal slot, said latch plate being movable within the plane of said base frame transversely of said one parallel side into assembly therewith, said rectangular cutout receiving said latch hook perpendicularly therein and said longitudinal slot receiving adjacent portions of said finger pressure plate, said latch hook extending perpendicularly outwardly from one side of said latch plate and opening away from said finger pressure plate, a leaf spring extending along an opposite side of said latch plate yieldably preventing pivotal movement of said latch plate from a normal cover engaging position to a manually actuated cover released position, the opposite parallel side of said U-shaped base frame having inwardly struck tabs extending toward said one parallel side overlying and clampingly securing the ends of said leaf spring between said inwardly struck tabs and said base wall of said U-shaped base frame, the intermediate portion of said leaf spring overlying and confining said latch plate between said leaf spring and said base wall, said leaf spring yieldably resisting pivotal movement of said latch plate about its longitudinal axis within said base frame, said leaf spring and tabs lying substantially parallel to said connected base wall, and said latch plate further includ-

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ing a pair of fulcrum lugs one at each longitudinal extremity thereof extending outwardly in a direction opposite to that of said latch hook, said fulcrum lugs engaging said opposite parallel side of said U-shaped base frame in response to pivotal movement of said latch plate to said cover released position, said fulcrum lugs being disposed intermediate said leaf spring and said opposite side wall of said U-shaped base frame, and said fulcrum lugs abutting said leaf spring and preventing movement of said latch plate out of said longitudinal slot and rectangular cutout.

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UNITED STATES PATENT OFFICE
CERTIFICATE OF CORRECTION

Patent No. 2,873,876

February 17, 1959

Georg Reitzel

It is hereby certified that error appears in the above numbered patent requiring correction and that the said Letters Patent should read as corrected below.

In the grant, lines 2 and 3, for "assignor, by mesne assignments, to Randolph-Rand Corporation, of New York, N. Y., a corporation of New York," read -- assignor, by direct and mesne assignments, of one-half to Drescher & Kiefer, of Altenmittlau Kreis Gelnhausen, Germany, a German firm, and one-half to Randolph-Rand Corporation, of New York, N. Y., a corporation of New York, --; line 12, for "Randolph-Rand Corporation, its successors" read -- Drescher & Kiefer and Randolph-Rand Corporation, their successors --; in the heading to the printed specification, lines 5, 6 and 7, for "assignor, by mesne assignments, to Randolph-Rand Corporation, New York, N. Y., a corporation of New York" read -- assignor, by direct and mesne assignments, of one-half to Drescher & Kiefer, Altenmittlau Kreis Gelnhausen, Germany, a German firm, and one-half to Randolph-Rand Corporation, New York, N. Y., a corporation of New York --.

Signed and sealed this 23rd day of June 1959.

(SEAL)

Attest:

KARL H. AXLINE

Attesting Officer

ROBERT C. WATSON

Commissioner of Patents