Feb. 16, 1965 O. KRAUSS 3,169,342

CARRYING CASE FOR A PORTABLE MACHINE

Filed May 16, 1962

FIG. 1

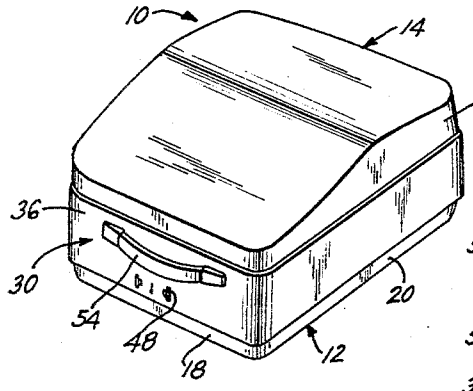


FIG. 2

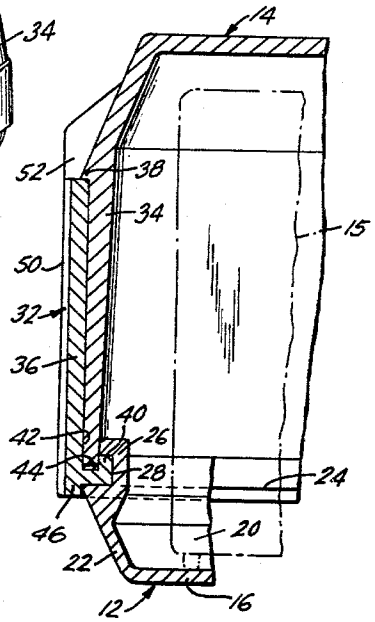


FIG. 4

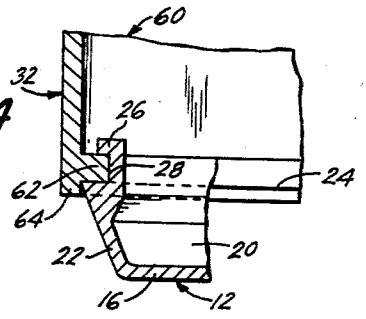


FIG. 5

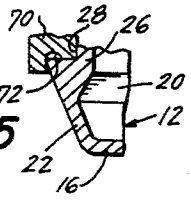
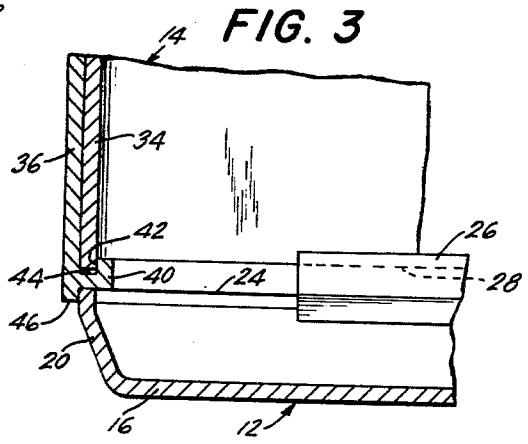


FIG. 3



INVENTOR.
Otto Krauss

BY

Michael S. Striker
Atty

United States Patent Office 3,169,342
Patented Feb. 16, 1965

3,169,342

CARRYING CASE FOR A PORTABLE MACHINE

Otto Krauss, Nurnberg, Germany, assignor to Triumph Werke Nurnberg A.G., Nurnberg, Germany

Filed May 15, 1962, Ser. No. 195,278
Claims priority, application Germany, Oct. 20, 1961, G 24,773
13 Claims. (Cl. 312—284)

This invention relates to a carrying case for a portable machine, and in particular to a carrying case for a portable business machine such as a typewriter, dictating machine or the like.

Carrying cases of the foregoing type which are frequently made from synthetic material such as plastics, comprise a base adapted to support the portable machine and a removable cover. It is essential that the removable cover when closed is firmly connected to the base, but may be rapidly removed therefrom in a convenient manner. The case should be dust-tight when closed and have a pleasing appearance.

Heretofore, the carrying case has normally been provided with disengageable hinges at its rear and with a lock at its front. Such hinges usually protrude from the case and when the latter is placed on a support to rest thereon, the surface of the support is often marred by scratch marks. In addition, the hinges may be damaged or bent by contact with the supporting surface of other objects. At the same time, the appearance of the case is impaired by the protruding elements.

It is an object of the present invention to provide an improved carrying case for a portable machine, which in a simple manner eliminates the disadvantages encountered in the past.

It is also an object of the invention to provide an improved carrying case for a portable machine, which is inexpensive and of a durable construction and has a smooth outer shape.

It is an additional object of the invention to provide an improved carrying case for a portable machine, in which the connecting means at the rear of the case are concealed by the cover when in place on the base so that contact of such connecting means with any outside surface is prevented while the case is closed.

It is a further object of the invention to provide a carrying case for a portable machine with rearwardly positioned, engageable connecting means which when engaged prevent the cover from being lifted straight up from the base but permit rapid disengagement thereof by slightly turning and shifting the cover.

With these objects in view, the invention includes, in a carrying case for a portable machine, a base provided with external engageable connecting means at its rear, a removable cover having a rear wall provided with internal connecting means engageable with the first-mentioned connecting means so as to prevent the cover from being lifted straight up from the base, and releasable locking means for securing the cover to the base at the front thereof with both engageable connecting means being concealed by the cover.

The novel features which are considered as characteristic for the invention are set forth in particular in the appended claims. The invention itself, however, both as to its construction and its mefhod of operation together with additional objects and advantages thereof, will be best understood from the following description of specific embodiments when read in connection with the accompanying drawing, in which:

FIG. 1 is a perspective view of a carrying case according to the invention;

FIG. 2 is an enlarged fragmentary section through the rear wall of the closed carrying case shown in FIG. 1;

FIG. 3 is an enlarged fragmentary section through the side wall of the closed carrying case shown in FIG. 1;

FIG. 4 is a fragmentary section through the rear wall of a modified carrying case; and

FIG. 5 is a fragmentary section through the rear wall of a carrying case and illustrates a further modification.

Referring to FIGS. 1 to 3, the carrying case generally indicated at 10 which is preferably made from synthetic material such as plastics, comprises a base 12 and a removable cover 14. The base 12 is adapted to carry a portable machine indicated in phantom at 15 in FIG. 2, for example, a portable business machine such as a typewriter, dictating machine or the like.

Base 12 includes a bottom 16 from which a front wall 18, side walls 20 and a rear wall 22 extend upwardly to a common terminal face 24. Integral with the base 12 is a flange 26 which extends upwardly from the rear wall 22 and at its outside has a first engageable connecting means therein in the form of a groove 28 opening to the rear of the carrying case. The lower lateral face of groove 28 is coplanar with the terminal face 24 and forms an extension thereof. As indicated in FIG. 3, flange 26 may have a reduced length as compared with the rear wall 22 of the base.

The removable cover 14 has front and rear walls generally indicated at 30 and 32, respectively, and in FIGS. 1 to 3 is composed of a hood 34 and a jacket 36 embracing the lower portion of the hood. If desired, the jacket 36 may have a color different from that of the hood. At its upper end, the jacket 36 abuts a shoulder 38 of the hood, while the lower end of the jacket protrudes beyond the hood and has an internal integral projection 40 thereon which represents a second engageable connecting means in that it is adapted to be inserted in the groove 28 of flange 26. At the same time, the projection 40 is arranged to rest on the terminal face 24 which as stated is coplanar with the lower lateral face or groove 28. In the embodiment shown, the projection 40 is continuous as it extends along all the inner wall surfaces of the hood.

The jacket 36 is provided with a channel-like recess 42 extending into the projection 40 and adapted to receive the edges of hood 34 at the open ends thereof in spaced relation to the bottom of the channel-like recess 42 so that a space 44 remains therebetween. Bonding material such as glue or cement may be used to secure the hood 34 and jacket 36 to each other with the space 44 serving to receive excess bonding material. If desired, the lower edge of the hood may have pin shaped projections thereon which may engage corresponding holes in the projection 40 and may be secured to the latter by fusing or welding.

Furthermore, jacket 36 has an edge or rim portion 46 which is adapted to overlap the upper edges of base 12 in a dust-tight manner. A releasable lock 48 serves to secure the front wall 30 of the cover to the front wall 18 of the base. A pair of rib means are provided on the rear wall of the removable cover 14, one of which is shown in FIG. 2 and includes a rib portion 50 integral with the jacket 36. Since the latter covers the rear wall of the hood only partly, a complementary rib portion 52 is provided on the hood so as to form an extension of rib portion 50. These rib means serve to support the carrying case in a rest position when the case is placed on a surface with its lock 48 and handle 54 disposed at the top.

It will be clear that while the projection 40 is in engagement with the groove 28, the cover 14 cannot be lifted straight up from the base 12. To remove the cover from the closed case shown in FIG. 1, the lock 48 is released and the cover is then turned slightly about the engaged connecting means 28, 40 by gripping its handle 54,

until the rim 46 is positioned just above the terminal face 24 of the base. The cover is then shifted to the rear a small distance until the projection 40 has been moved out of the groove 28, whereupon the cover may readily be lifted from the base. The described procedure is reversed to close the case. It will be apparent from the embodiment shown that only a very small angular movement of cover 14 is required to disengage the rim 46 from the front wall 18 of the base or to engage it therewith and such angular movement may be facilitated by allowing a small clearance between the projection 40 and the walls of groove 28.

FIG. 4 illustrates a modified embodiment having a removable cover 60 which comprises a single integral hood-shaped member, instead of being composed of a hood and a jacket. The projection 62 is integral with the cover 60 and of simple shape as no recess is required to receive the edges of a separate hood member. In analogy to the first embodiment, the projection 62 serves to engage the groove 28 in flange 26 of base 12 and at the same time to rest on the terminal face 24 of the base. Cover 60 has an integral rim 64 thereon similar to the rim 46 of FIGS. 2 and 3. This rim is again arranged to overlap the edges of base 12 and form a dust-tight closure therewith.

FIG. 5 illustrates a further modification including a projection 70 which is similar to the projections 40 and 62, except for the fact that it is provided with a recess 72 in the region of its root. The recess 72 which is preferably of semi-circular shape will facilitate the initial turning of the cover and will also minimize the formation of stresses in the region of the edges of groove 28 when the case is opened or closed.

It will be evident from the foregoing description that the carrying case according to the invention is of simple construction and, therefore, easy to manufacture. The cover and base are connected in a dust-tight manner and are firmly and securely united, while the engagement and disengagement of the parts can be carried out rapidly. The engageable connecting means are concealed by the cover when in place on the base to prevent contact between such connecting means and any surface on which the carrying case may be placed to rest thereon. Thus, the supporting surface will not receive scratch marks and there will be no danger of the connecting means being bent or otherwise damaged by undue impact.

While several embodiments of the invention have been illustrated and described, it is not intended to limit the invention to the details shown since various modifications and structural changes may be made without departing in any way from the spirit of the invention.

Without further analysis, the foregoing will so fully reveal the gist of the present invention that others can by applying current knowledge readily adapt it for various applications without omitting features that, from the standpoint of prior art, fairly constitute essential characteristics of the generic or specific aspects of this invention and, therefore, such adaptations should and are intended to be comprehended within the meaning and range of equivalence of the following claims.

What is claimed as new and desired to be secured by Letters Patent is:

1. A carrying case for a portable machine, comprising, in combination, a substantially rigid base including a front portion and a rear portion and adapted to carry said portable machine, said rear portion being provided with engageable connecting means positioned at its outside and facing to the rear of said carrying case; a removable substantially rigid cover including a front wall and a rear wall and fitting said base to enclose said portable machine, said rear wall being provided with engageable connecting means positioned at its inside and adapted to engage said first-mentioned engageable connecting means so as to prevent said removable cover from being lifted straight up from said base; and releasable locking means for securing said front wall of said removable cover to said front portion of said base to close said carrying case with both of said engageable connecting means being covered by said rear wall of said removable cover, whereby said removable cover when in place on said base will prevent contact of said engageable connecting means with a surface on which said carrying case may be placed to rest thereon.

2. A carrying case for a portable machine, comprising, in combination, a substantially rigid base including a front portion and a rear portion and adapted to carry said portable machine, said rear portion being provided with engageable connecting means positioned at its outside and facing to the rear of said carrying case; a removable substantially rigid cover including a front wall and a rear wall, said cover having a lower rim portion fitting said base to enclose said portable machine, said rear wall being provided with engageable connecting means positioned at its inside and adapted to engage said first-mentioned engageable connecting means so as to prevent said removable cover from being lifted straight up from said base while permitting tilting of said cover relative to said base to an extent sufficient to lift the rim portion on said front wall upwardly from said base, one of said engageable connecting means being in the form of a groove, and the other one of said engageable connecting means being in the form of a projection insertable in said groove; and releasable locking means for securing said front wall of said removable cover to said front portion of said base to close said carrying case with both of said engageable connecting means being covered by said rear wall of said removable cover, whereby said removable cover when in place on said base will prevent contact of said engageable connecting means with a surface on which said carrying case may be placed to rest thereon.

3. A carrying case as set forth in claim 2, in which said projection has a recess therein positioned to facilitate movement of said projection into and out of said groove.

4. A carrying case as set forth in claim 3, in which said recess of said projection is of semi-circular contour and positioned in said projection adjacent the root thereof.

5. A carrying case for a portable machine, comprising, in combination, a substantially rigid base including a front portion and a rear portion and adapted to carry said portable machine, said rear portion being provided with engageable connecting means positioned at its outside end facing to the rear of said carrying case; a removable substantially rigid cover including a front wall and a rear wall and fitting said base to enclose said portable machine, said removable cover having edge means overlapping the edges of said base when in place thereon, said rear wall being provided with engageable connecting means positioned at its inside and adapted to engage said first-mentioned engageable connecting means so as to permit said removable cover to be detached from said base only after being turned relative thereto; and releasable locking means for securing said front wall of said removable cover to said front portion of said base to close said carrying case with both of said engageable connecting means being concealed by said rear wall of said removable cover, whereby said removable cover when in place on said base will prevent contact of said engageable connecting means with a surface on which said carrying case may be placed to rest thereon.

6. A carrying case for a portable machine, comprising, in combination, a subtsantially rigid base including a front portion and a rear portion and adapted to carry said portable machine, said rear portion having a groove therein positioned at is outside and opening to the rear of said carrying case; a removable cover including a front wall and a rear wall and fitting said base to enclose said portable machine, said rear wall having an internal projection thereon adapted to be inserted in said groove of said rear portion of said base so as to prevent said removable cover

from being lifted straight up from said base; and releasable locking means for securing said front wall of said removable cover to said front portion of said base to close said carrying case with both said groove and said internal projection being covered by said rear wall of said removable cover when in place on said base.

7. A carrying case for a portable machine; comprising, in combination, a base provided with a bottom adapted to carry said portable machine and further provided with a front wall, side walls and a rear wall extending from said bottom upwardly to a terminal face, said rear wall being provided with a flange extending upwardly therefrom and having a groove therein positioned at the outside of said flange and opening to the rear of said carrying case with the lower lateral face of said groove being coplanar with said terminal face; a removable hood-shaped cover fitting said base to enclose said portable machine and having an internal projection therein adjacent its open end, said internal projection being adapted to rest on said terminal face of said base and at the same time engage said groove so as to prevent said removable cover from being lifted straight up from said base; and releasable locking means for securing said removable cover to said front wall of said base to close said carrying case with said flange, groove, and internal projection being concealed by said removable cover when in place on said base.

8. A carrying case of synthetic material for a portable business machine, comprising, in combination, a base including a front portion and a rear portion and adapted to carry said portable business machine, said rear portion having a groove therein positioned at its outside and opening to the rear of said carrying case; a removable cover including a hood and a jacket embracing said hood and extending beyond the open end thereof, said removable cover fitting said base to enclose said portable business machine, said jacket having an internal projection thereon adapted to be inserted in said groove of said rear portion of said base so as to prevent said removable cover from being lifted straight up from said base; and releasable locking means for securing said removable cover to said front portion of said base to close said carrying case with both said groove and said internal projection being concealed by said removable cover when in place on said base.

9. A carrying case as set forth in claim 8, in which said hood and said jacket of the removable cover are secured to each other by means of bonding material, and in which said jacket has a channel-like recess therein to receive the edges of said hood at the open end thereof in spaced relation to the bottom of said channel-like recess, whereby excess bonding material may be accommodated at the bottom of said recess.

10. A carrying case as set forth in claim 8, including a plurality of rib means on the outside of said removable cover for supporting said carrying case in a rest position, one portion of each rib means being integral with said hood and the other portion of each rib means being integral with said jacket.

11. A carrying case for a portable machine comprising, in combination, a substantially rigid base member adapted to support said portable machine and having a front portion and a rear portion; a removable substantially rigid cover member including a front wall and a rear wall and having a lower rim portion fitting said base member so as to enclose said portable machine; a pair of cooperating releasable connecting means respectively formed only on said rear portion of said base member and said rear wall

of said cover member, said pair of connecting means interengaging each other and preventing when interengaged said removable cover member from being lifted straight up from said base member while permitting tilting of said members relative to each other to an extent sufficient to lift the rim portion on said front wall upwardly from said base member so as to permit after such tilting disengagement of said connecting means from each other and separation of said members by moving said members in transverse direction relative to each other, said connecting means being located when said members are connected to each other in their entirety within said cover member thus preventing contact of said connecting means with a surface on which said carrying case may be placed; and releasable locking means for securing said front wall of said cover member to said front portion of said base member to prevent said members when thus secured from tilting with respect to each other.

12. A carrying case for a portable machine comprising, in combination, a substantially rigid base member adapted to support said portable machine and having a front portion and a rear portion; a removable substantially rigid cover member including a front wall and a rear wall and having a lower rim portion fitting said base member so as to enclose said portable machine; a pair of cooperating releasable connecting means respectively formed only on said rear portion of said base member and said rear wall of said cover member, said pair of connecting means interengaging each other and preventing when interengaged said removable cover member from being lifted straight up from said base member while permitting tilting of said members relative to each other to an extent sufficient to lift the rim portion on said front wall upwardly from said base member so as to permit after such tilting disengagement of said connecting means from each other and separation of said members by moving said members in direction transverse to said rear wall relative to each other, said connecting means being located when said members are connected to each other in their entirety within said cover member thus preventing contact of said connecting means with a surface on which said carrying case may be placed, one of said connecting means including a groove formed in one of said members and facing a portion of the other of said members extending over the groove and the other of said connecting means including a projection projecting from said portion of said other member into said groove and substantially filling the same; and releasable locking means for securing said front wall of said cover member to said front portion of said base member to prevent said members when thus secured from tilting with respect to each other.

13. A carrying case as set forth in claim 12 in which said groove is formed in an outer upper portion of said rear portion of said base member and in which said projection is in form of a rib projecting inwardly from a lower portion of said rear wall of said cover member.

References Cited in the file of this patent

UNITED STATES PATENTS

2,777,245	Aaron et al.	Jan. 15, 1957
2,861,385	Childs	Nov. 25, 1958
2,878,848	Coltman	Mar. 24, 1959
2,984,382	Florsheim	May 16, 1961
3,086,676	Dilatush	Apr. 23, 1963