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GARAGE DOOR HANDLE

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This invention relates to a novel pull-down handle for overhead garage doors.

The primary object of the invention is the provision of a simple, efficient, and easily installed handle of the kind indicated, which facilitates pulling garage doors down to closed position, from inside garages, requires less effort than ropes, wires, fixed handles, and the like, and provides better control of the doors.

Another object of the invention is the provision of a handle of the character indicated above, which is composed of an upper rod portion which is adapted to be pivotally secured, at its upper end, to the inside of a garage door, adjacent the lower end thereof, and shorter lower rod portion which is pivotally secured, at its upper end, to the lower end of the upper rod portion, and has a cross bar hand grip on its lower end, whereby the initial movement and the following descending movements in pulling a garage door down to closed position are produced and accelerated or retarded.

Other important objects and advantageous features of the invention will be apparent from the following description and the accompanying drawings, wherein, for purposes of illustration only, a specific form of the invention is set forth in detail.

In the drawings:

FIGURE 1 is an inside elevation of an overhead garage door, showing the same in closed position, the door being equipped with one or more handles of the present invention;

FIGURE 2 is an enlarged and fragmentary view, like FIGURE 1, showing the handle in detail;

FIGURE 3 is a further enlarged fragmentary vertical transverse section taken through the garage door alongside of the handle;

FIGURE 4 is a fragmentary vertical section, on a reduced scale, of the handle, taken on the line 4—4 of FIGURE 5; and,

FIGURE 5 is a horizontal section, on the scale of FIGURE 4, taken on the line 5—5 of FIGURE 3.

Referring in detail to the drawings, wherein like numerals designate like parts throughout the several views, the numeral 10 designates an overhead garage door of the rigid pivotally supported type, although the invention is equally applicable to the folding type of overhead garage doors. The door 10 is illustrated as being hollow and provided with spaced outer and inner panels 12 and 14, respectively, and provided, on its inner side, with a bracing frame which includes a horizontal bottom member 16, vertical side members 18, a vertical center member 20, and the horizontally disposed on the lower end, a lower flat on the lower end of said lower bar portion and disposed at right angles to each other. The upper flat 26 is positioned between the ears 32 of the lower flat of the upper bar portion 26, and a headed pivot pin 46 extends through the ears 32 and the flat 26, whereby the lower bar portion 50, like the upper bar portion 26, is adapted to swing toward and away from the door 10. It is to be noted that, in addition, the upper bar portion 26, and hence the entire handle 24, is adapted to swing laterally on the loop 36 of the eye 34.

A horizontal cross bar hand grip 58 is secured to and extends from opposite sides of the lower flat 54 of the lower bar portion 50. The hand grip 58 comprises a metal tube having open ends 60, and being compressed at the middle thereof, to define a central flat 62. The flat 62 is engaged with the outer side of the lower flat 54 of the lower bar portion 50, and is fixed thereto, by means of a pair of laterally spaced rivets 64.

In use and operation, the garage door 10 being in a horizontal overhead position, the handle 24 being then in a freely pendant position, the operator grasps the hand grip 58, with one or both hands, and pulls downwardly on the hand grip, so as to pivot the door downwardly toward its vertical closed position. As the door is thus started toward closed position, its descent can be controlled by holding onto the hand grip 58 and manipulating the handle 24, so as to accelerate the descent or to retard the descent, according to requirements, and produce controlled closing of the door. The handle 24 is installed on the door 10, so that the hand grip 58 is suspended above the garage floor 66, the vertical length of the handle being such that the mounting eye 34 is secured to the lower part of the door, so that the handle 24 can be used for opening the door, from inside the garage, by pulling upwardly on the hand grip, so as to pivot the door up to overhead position.

The hand grip 58 has caps 68, secured on its ends, preferably of rubber-like material, which provide comfortable hand-holds and serve the additional purpose of preventing marring of the roofs or tops of vehicles entering or leaving the garage, with the door 10 in open position. The articulation of the lower bar portion 50 to the upper bar portion 26, and the articulation of the upper bar portion 26 to the door 10, permits the handle 24 to hang from the door, in the open position of the door, so that the handle 24, if contacted by the top of an unusually tall vehicle, will swing harmlessly out of the way.

While there has been shown and described herein a preferred form of the invention, it is to be understood that the invention is not necessarily confined thereto, and that any change or changes in the structure, in the relative arrangement of the components thereof are contemplated as being within the scope of the invention as defined by the claims appended hereto.

What is claimed is:

1. A handle of the character described comprising an elongated upper bar portion having upper and lower coplanar flats on related ends thereof, a lower bar portion having an upper flat coplanar with and pivoted to the lower flat of the upper bar portion, said lower bar portion having a lower end, a lower flat on the lower end of said lower bar portion and disposed at right angles...
to the flats of the upper bar portion, a cross-bar hand grip having its intermediate portion engaged with and fixed to the lower flat of the lower bar portion, and pivotal mounting means on the upper flat of the upper bar portion.

2. A handle of the character described comprising an elongated upper bar portion having upper and lower coplanar flats on related ends thereof, a lower bar portion shorter than said upper bar portion, said lower bar portion having an upper flat coplanar with and pivoted to the lower flat of the upper bar portion, said lower bar portion having a lower end, and a cross bar hand grip fixed to the lower end of the lower bar portion at right angles to the upper bar portion flats, and pivotal mounting means on the upper flat of the upper bar portion, said lower bar portion having a lower flat on its lower end disposed at right angles to the flats of the upper bar portion, said hand grip having a flat intermediate its ends engaged with a side of the lower flat of the lower bar portion and fixed thereto.

3. A handle of the character described comprising an elongated upper bar portion having upper and lower coplanar flats on related ends thereof, a lower bar portion shorter than said upper bar portion, said lower bar portion having an upper flat coplanar with and pivoted to the lower flat of the upper bar portion, said lower bar portion having a lower end, and a cross bar hand grip fixed to the lower end of the lower bar portion at right angles to the upper bar portion flats, and pivotal mounting means on the upper flat of the upper bar portion, comprising a screw eye having a shank adapted to be fixed to the door and a loop, the upper flat of the upper bar portion having a hole through which the loop is journaled.

4. A handle of the character described comprising an elongated upper bar portion having upper and lower coplanar flats on related ends thereof, a lower bar portion shorter than said upper bar portion, said lower bar portion having an upper flat coplanar with and pivoted to the lower flat of the upper bar portion, said lower bar portion having a lower end, and a cross bar hand grip fixed to the lower end of the lower bar portion at right angles to the upper bar portion flats, and pivotal mounting means on the upper flat of the upper bar portion, said lower bar portion having a lower flat on its lower end disposed at right angles to the flats of the upper bar portion, said hand grip having a flat intermediate its ends engaged with a side of the lower flat of the lower bar portion and fixed thereto, said handgrip having caps engaged on its ends.

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