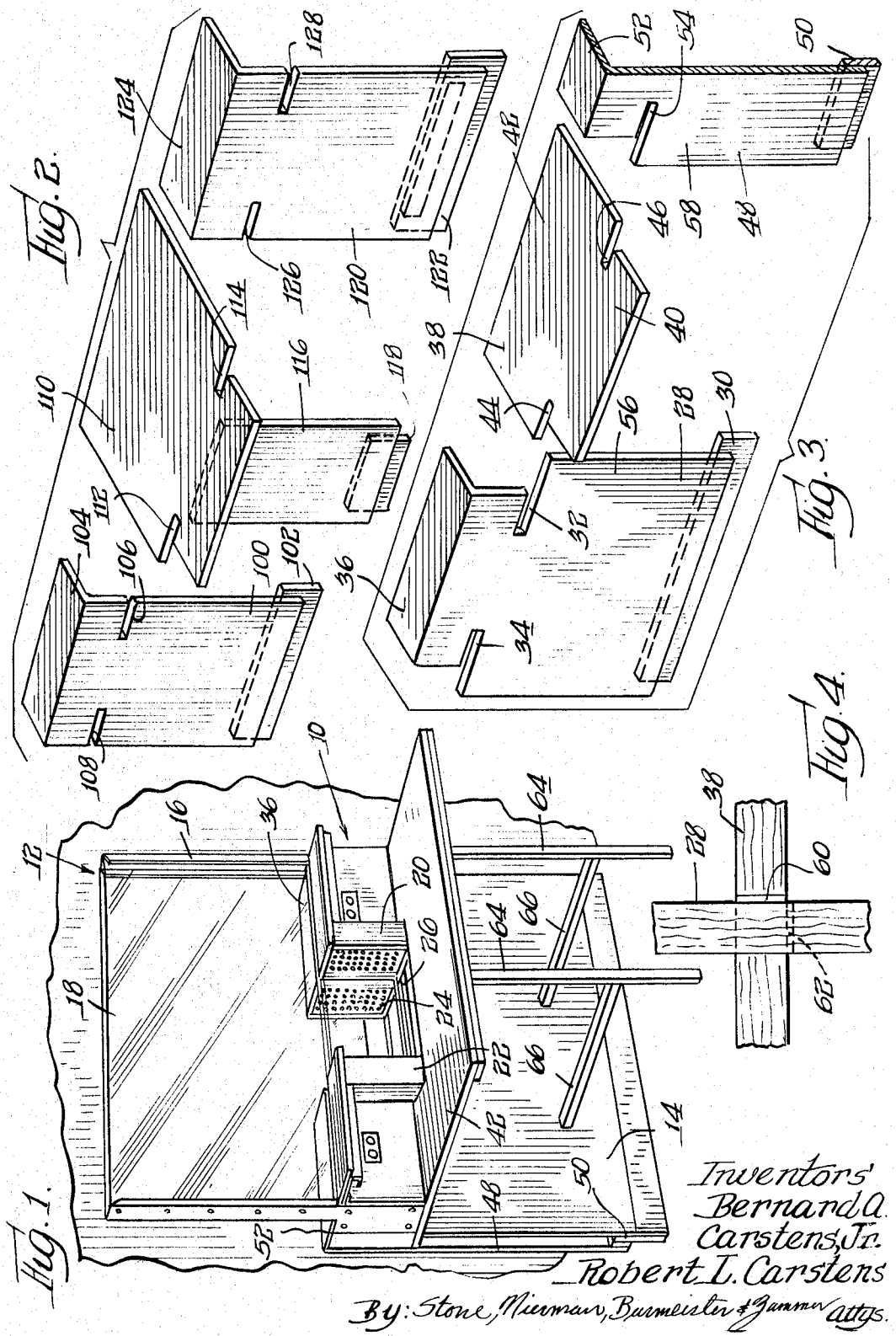
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MODULAR TELLER UNIT

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MODULAR TELLER UNIT

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This invention relates to a modular teller unit which may be erected in banks, savings and loan, currency exchanges, and the like. More particularly, it relates to a facing and support of the modular type, for a bullet resistant lower portion and a prefabricated bullet resistant teller unit for the upper portion of the counter.

Applicants' assignee is a manufacturer of a bullet resistant teller unit, such as shown in FIGURE 1. These units may be associated in straight-line construction in made-to-order counters and supports to provide a bullet resistant enclosed area.

The principal object of the present invention is to provide an exterior facing made of modular members which can be varied to suit the interior decorating colors and designs of a room while acting primarily as a facing for a support carrying steel plates in the lower portion and supporting a teller unit such as shown in FIGURE 1.

The first object of the invention is to combine two upright panels which support a counter at a point below the top of the panels whereby that portion of the upper part of the panels will form a facing for bullet resistant members positioned therebehind. As will appear, this objective is attained by two types of vertical panels. In one type, a seam extends downwardly from the middle of the counter; and hence for decorative purposes, the facing of the panels will be identical or closely similar. In a second embodiment, the vertical panels do not join beneath the center of the counter, which is equipped with a depending panel of its own which may be contrasting in design.

Another object of the herein disclosed invention is to provide a modular teller unit in which a pair of vertical panels are interlocked with a substantially horizontal counter or ledge to provide a supporting frame for a prefabricated bullet resistant teller unit as well as support for a bullet resistant steel plate mounted below the counter or ledge which plate cooperates with the bullet resistant teller unit.

It is a further object of the present invention to provide a modular teller unit construction which is economical to manufacture and simple to install in a location separate and apart from the location of its manufacture.

Other objects and uses of this invention will become readily apparent to those skilled in the art upon a perusal of the following specification in light of the accompanying drawing, in which:

FIGURE 1 is a perspective view of a teller unit with side portion removed in order to show the construction of the subject teller unit in which a bullet resistant teller unit is mounted on the upper portion of a counter or ledge and the front portion of the teller unit is only shown partially;

FIGURE 2 is a perspective exploded view of a modular teller unit embodying the herein disclosed invention in which the teller includes a depending panel fixed to the lower portion of a counter or ledge;

FIGURE 3 is an exploded perspective view of a modular teller unit embodying the herein disclosed invention which is similar to the unit shown in FIGURE 2, but which does not include a depending vertical panel secured to the counter or ledge; and

FIGURE 4 is a cross-section view showing the interlocking relationship between a vertical panel and a ledge with a shim wedge mounted in a slot to lock the vertical panel to the ledge.

Referring now to the drawing and especially to FIGURE 1, a teller unit is shown therein which generally includes a modular teller unit **10** with a conventional bullet resistant teller unit **12** mounted on the modular teller unit **10** and a bullet resistant steel plate **14** mounted below. The bullet resistant teller unit **12** is conventional in its construction in that it generally includes a frame **16** with a bullet resistant glass **18** mounted therein, a pair of voice boxes **20** and **22** are connected to the frame and a bullet resistant glass **24** is positioned between the voice boxes. A transaction tray **26** is positioned below the glass **24**. This particular construction of the teller unit **12** is of a well known bullet resistant construction and may be conveniently installed in any desired location as required.

Considering now in detail the modular teller unit **10** shown in FIGURES 1 and 3 it may be seen that the modular teller unit consists of relatively few parts. The modular teller unit includes a first vertical panel **28** having a kick panel **30** secured to the lower portion thereof. The panel **28** has a pair of horizontally extending slots **32** and **34** therein. A hood **36** is fixed to the upper portion of panel **28** and the hood is generally situated in a horizontal plane. A ledge or counter **38** is connected to the vertical panel.

The ledge or counter which serves as a top includes a front ledge **40** and a rear ledge **42** formed integral therewith. The ledge has a pair of slots **44** and **46** positioned therein between the front and rear ledges. A second vertical panel **48** has a kick panel **50** fixed to its lower portion and a hood **52** fixed to its upper portion which hood is substantially identical to hood **36**. The second panel **48** contains a slot **54** which is the mirror image of slot **32** of panel **28**. It should be noted that panels **28** and **48** have extended lower portions **56** and **58**, respectively, for mutual abutment under the ledge **38** when the panels are connected to the ledge.

It may be appreciated that the panels and ledges may be prefabricated in a convenient location. The panels and ledges are made of any predetermined decorative material, such as wood or any other suitable material. The prefabricated elements then are transported to a location for installation whether it be a bank, currency exchange, savings and loan institution, or other like enterprise. The vertical panels have the connecting panels and the hoods attached at the prefabrication location. At the location for installation, the prefabricated vertical panels are placed into interlocking engagement with the counter or ledge. In the instance of the subject modular teller unit, the panel **28** is positioned in slot **44** of ledge **38** while the ledge **38** is positioned in slot **32** of the same panel. It may be appreciated that the interlocking arrangement provides for a well fitting inter-relationship of the vertical panel and the ledge. In order to secure firmly the vertical panel to the ledge, shim wedges are used. As it may be seen in FIGURE 4, a shim wedge **60** is positioned in slot **44** of the ledge **38** to lock the vertical panel to the ledge **38**. In like manner, a similar shim wedge **62** (shown in dotted form) is positioned in slot **32** to secure ledge **38** to vertical panel **28**. It may be readily appreciated that the shim wedges lock the panel and ledge together in firm engagement.

The second vertical panel **48** is positioned in slot **46** and ledge **38** is positioned in slot **54**. The ledge and the second vertical panel **48** are locked to each other by means of shim wedges which are identical to shim wedges **60** and **62**. A third shim wedge (not shown) is positioned in slot **46** to secure the second vertical panel **48** to the ledge **38** and a fourth shim wedge (also not shown) is

positioned in slot **54** between the second vertical panel and the ledge to hold the ledge in tight engagement with the second vertical panel. It may be appreciated that the teller unit arrangement described herein allows the various elements to be assembled readily and there is an inherent advantage in allowing adjustment at installation site by using shims in the various slots. There is also, an additional advantage in simplifying the manufacturing operation in the prefabrication of the various elements thereby facilitating installation by allowing a greater tolerance in the construction of the subject modular teller units.

It should be noted that the vertical panels **28** and **48** have extended portions **56** and **58** so that the vertical panels abut each other beneath the ledge **38** to provide a continuous surface. With the modular teller unit in place, the bullet resistant teller unit **12** is appropriately installed along with a bullet resistant steel plate **14**. To complete the installation a pair of legs **64** with braces **66** are attached to the ledge and the steel plate. It may be appreciated that any number of units may be installed to provide a continuous wall.

Looking now to FIGURE 2, an alternate construction is shown therein. In the alternate construction, a first vertical panel **100** is shown therein with a kick panel **102** fixed to the lower portion thereof. The panel **100** has a hood **104** secured to its upper portion and a pair of opposed slots **106** and **108** are formed therein. A counter or ledge **110** having slots **112** and **114**, has a depending vertical panel **116** secured thereto with a kick panel **118** attached to the lower portion of the panel **116**. A second vertical panel **120** has a kick panel **122** attached to its lower portion and a hood **124** secured to its upper portion. The panel **120** has a pair of slots **126** and **128** on opposite sides.

The panels **100** and **120** are secured to the ledge **110** in the same manner that panels **28** and **48** are secured to ledge **38**. In view of the fact that panels **100** and **120** do not have extension portions which abut below the ledge, the construction of the modular teller unit shown in FIGURE 2 provides a different appearance for the teller unit; however, the bullet resistant teller unit and bullet resistant steel plate are mounted in the same manner as mentioned above.

The dependent panel **116** may be made of any one of a variety of materials and colors for use in conjunction with the vertical panels to provide a pleasing aesthetic effect. It may be appreciated that the aesthetic effect of a contrasting dependent panel is substantially different from a construction in which the vertical panels abut beneath the counter.

In the foregoing description, the construction of a single unit is described in detail. It is obvious that additional units may be placed on either side of the described unit providing an installation which presents an extended bullet resistant effective wall which has a pleasing aesthetic appearance. It is equally obvious that the instant construction allows for an installation where only a single unit is utilized.

Although a specific embodiment of the instant invention has been described in detail above and shown in the instant drawing, it is to be understood that those skilled in the art may make various modifications and changes without departing from the spirit and scope of the present invention. It is to be explicitly understood that the herein disclosed invention is limited only by the appended claims.

What is claimed is:

1. A teller unit, comprising, in combination, a top having a pair of opposed slots, a vertical panel having a slot receiving the top and being positioned in one of the slots of the top and being secured to the top, a second vertical panel having a slot receiving said top and being positioned in the other of said slots of said top and being secured to said top, a bullet resistant steel plate mounted below said top and adjacent to the vertical panels, a bullet resistant glass mounted above the top and between the vertical panels, and a bullet resistant transaction tray mounted below the bullet resistant glass.

2. A teller unit as described in claim **1** wherein a voice box is mounted above the top and between the bullet resistant glass and the first mentioned vertical panel.

3. A modular teller unit, comprising, in combination, a top having a pair of opposed slots contained therein, a side having a vertical panel with a slot in said vertical panel, said vertical panel being positioned in one of the slots of the top and the top positioned in the slot of the vertical panel, said side having a hood attached to the upper portion of the vertical panel and said hood being substantially parallel to the top, a wedge positioned between the vertical panel and the top to lock the vertical panel to the top, a second side having a second vertical panel with a second slot in the second vertical panel, said second vertical panel positioned in the other slot of the top and the top positioned in second slot, said second side having a second hood attached to the upper portion of the second vertical panel and being substantially perpendicular to the second nested panel, and a second shim wedge positioned between the second vertical panel and the top to lock the second vertical panel to the top.

4. A modular teller unit comprising, in combination, a first side having a first vertical panel and a hood attached to the upper portion of the first vertical panel, said first vertical panel having a first slot contained therein, a second side having a second vertical panel and second hood attached to the upper portion of the second vertical panel, said second vertical panel having a slot contained therein opposite the slot of the first vertical panel, said second vertical panel being in abutment with a portion of the first vertical panel, a top having a pair of opposed slots positioned in each of the slots of the vertical panels and receiving the vertical panels in the two opposed slots, whereby the top and vertical panel are held together by interaction of the slots.

5. A modular teller unit comprising, in combination, a first vertical panel having a slot contained therein, a second vertical panel having a slot contained therein and being spaced from the first vertical panel, a top having a pair of opposed slots positioned between the opposed vertical panels and in the slots of the vertical panels and receiving the panels in the opposite slots, a front panel attached to the top and extending therebelow and having opposite edges adjacent to the first and second vertical panels, a shim wedge positioned between the first vertical panel and the top to secure the first vertical panel and top, and a second shim wedge positioned between the second vertical panel and top to secure the second vertical panel to top.

6. A modular teller unit comprising, in combination, a top having a pair of opposed slots contained therein, a vertical panel having a slot contained therein positioned in one of the slots of the top and the top positioned in the slot of the vertical panel, a shim wedge positioned in the slot of the vertical panel to secure the top to the vertical panel, a second shim wedge positioned in the slot of the top to secure the vertical panel to top, a second vertical panel having a second slot therein positioned in the other slot of top and the top positioned in slot of second vertical panel, said second vertical panel being in abutment with the first mentioned vertical panel below the top, a third shim wedge positioned in slot of second vertical panel to secure the top to the second vertical panel, and fourth shim wedge positioned in the other slot of the top to secure the second vertical panel to the top.

7. A modular teller unit comprising, in combination, a top having a front ledge, a rear ledge formed integral with front ledge and a pair of opposed slots between the

front and rear ledges; a first side having a first vertical panel having a slot contained therein, said side having a hood attached to the upper portion of the vertical panel, said vertical panel being positioned in one of the slots of the top and having the top positioned in the slot of the vertical panel, a second side having a second vertical panel, said side having a second hood attached to upper portion of the second vertical panel, said second vertical panel positioned in the other of the slots of the top and the top positioned in the second slot, a first shim wedge positioned in the slot of the first vertical panel to secure the top to the first vertical panel, a second shim wedge positioned in the slot of the top to secure the top to the first vertical panel, a third shim wedge positioned in the slot of the second vertical panel to secure the second vertical panel to the top, a fourth shim wedge positioned in the other slot of the top to secure the top to the second vertical panel, and a front panel attached to the front ledge and having opposite edges adjacent to the first and second vertical panels.

8. A teller unit comprising, in combination, a top having a pair of opposed slots contained therein, a first vertical panel having a slot contained therein positioned in the slot of the top and receiving the top in its slot, a shim wedge between the top and the vertical panel to secure the second panel to the top, a first hood attached to the upper portion of the vertical panel, a second vertical panel having a slot positioned in the other slot of the top and having the slot receiving said top, a second shim wedge between the second vertical panel and the top to secure the second vertical panel to the top, a second hood attached to the upper portion of second vertical panel, a bullet resistant steel plate mounted below the top and adjacent to the vertical panels, a bullet resistant glass mounted above the hood and having a portion between the vertical panels above the top, and a transaction tray mounted below the bullet resistant glass.

9. A modular teller unit comprising, in combination, a first vertical panel having a slot contained therein, a second vertical panel having a portion of said second vertical panel abutting the first vertical panel and said vertical panel being substantially on the same plane, said second vertical panel having a slot contained therein and being opposed to the slot of the first vertical panel, a top having a pair of opposed slots and having the first vertical panel mounted on one of said slots and being positioned in slot of first vertical panel substantially perpendicular to the panels, a wedge positioned between the top and first vertical panel securing the first vertical panel to the top, said top having the second vertical panel positioned in its other slot and being positioned in the slot of the second vertical panel, and a second wedge between the top and the second vertical panel securing the second vertical panel to the top.

10. A teller unit comprising, in combination, a top having a pair of opposed slots, a vertical panel having a slot receiving the top and being positioned in one of the slots of the top perpendicular to said top, a second vertical panel having a slot receiving said top and being positioned in the other slot of said top and being in substantially the same plane as the other vertical panel, a first shim wedge positioned in one of the slots of the top securing the first vertical panel to the top, a second shim wedge positioned in the slot of the first vertical panel, a third shim wedge positioned in the other of the slots of the top securing the other vertical panel to the top, a fourth shim wedge positioned in slot of second vertical panel securing the top to the second vertical panel, a front panel mounted below the top and having opposite edges adjacent to the first mentioned vertical panel, and the second vertical panel a bullet resistant steel plate mounted below the top and adjacent to the front panel to the vertical panels, a bullet resistant glass mounted above the top and between the vertical panels, and a transaction tray mounted below the bullet resistant glass.

References Cited by the Examiner

UNITED STATES PATENTS

1,512,791	10/1924	Musselman	109—12
1,875,649	9/1932	Orr	109—19
2,105,204	1/1938	Soderholm	109—19
3,017,219	1/1962	Mallett	108—42 X
3,069,216	12/1962	Vaeth	312—257 X

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