

April 10, 1934.

C. K. ERNST

1,954,668

SAFE

Filed Aug. 28, 1933

3 Sheets-Sheet 1

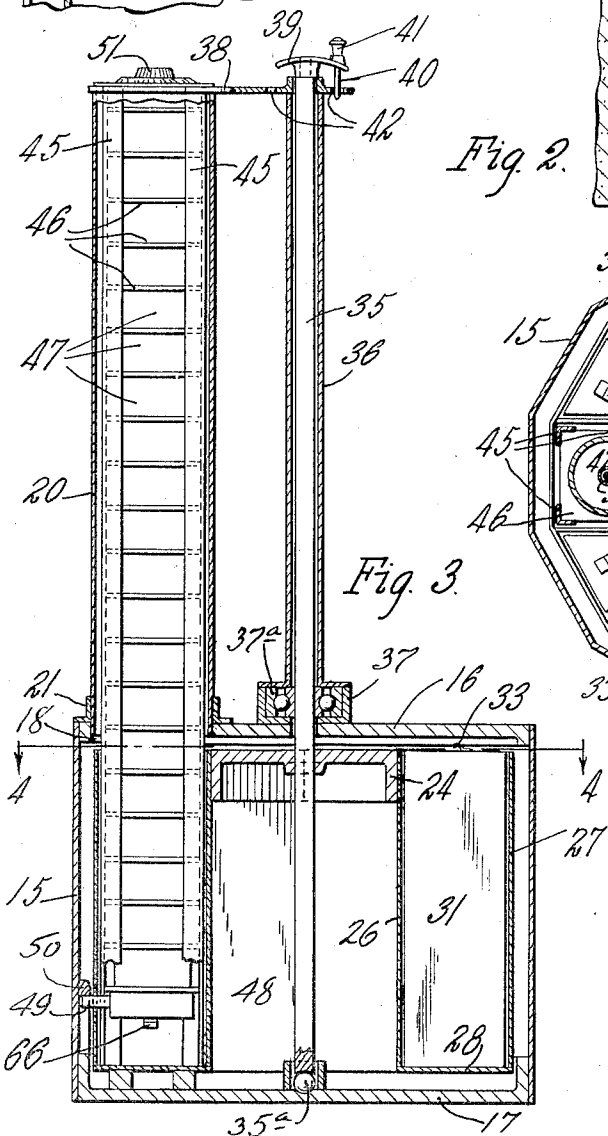
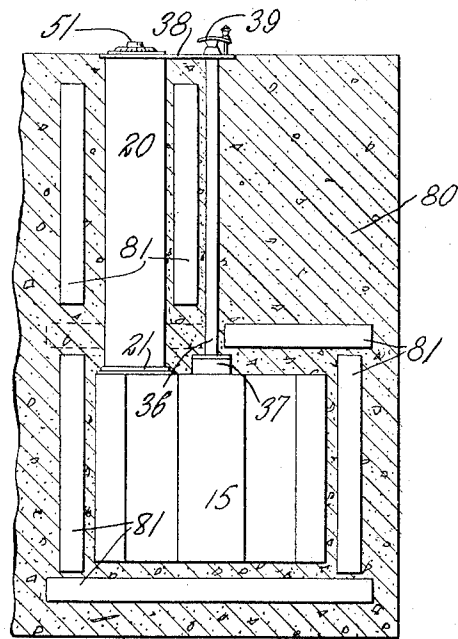
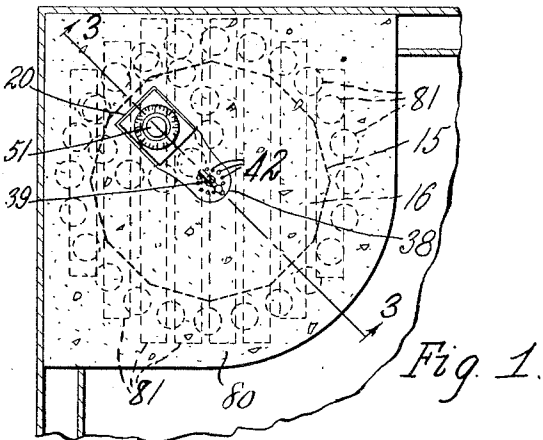


Fig. 2.

Fig. 3.

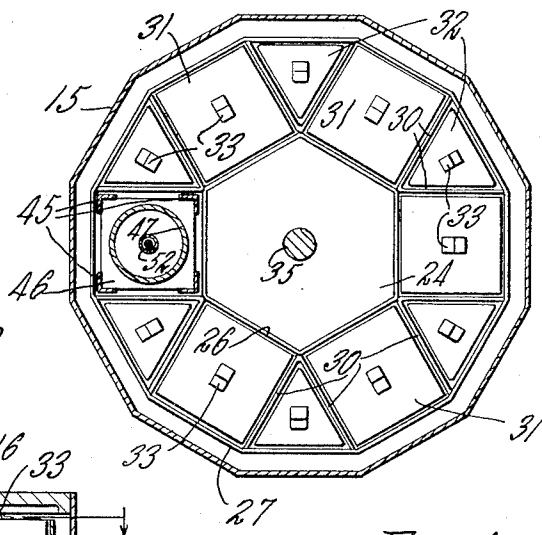


Fig. 4.

INVENTOR
Charles K. Ernst
BY
Parker, Proctor & Farmer
ATTORNEYS.

April 10, 1934.

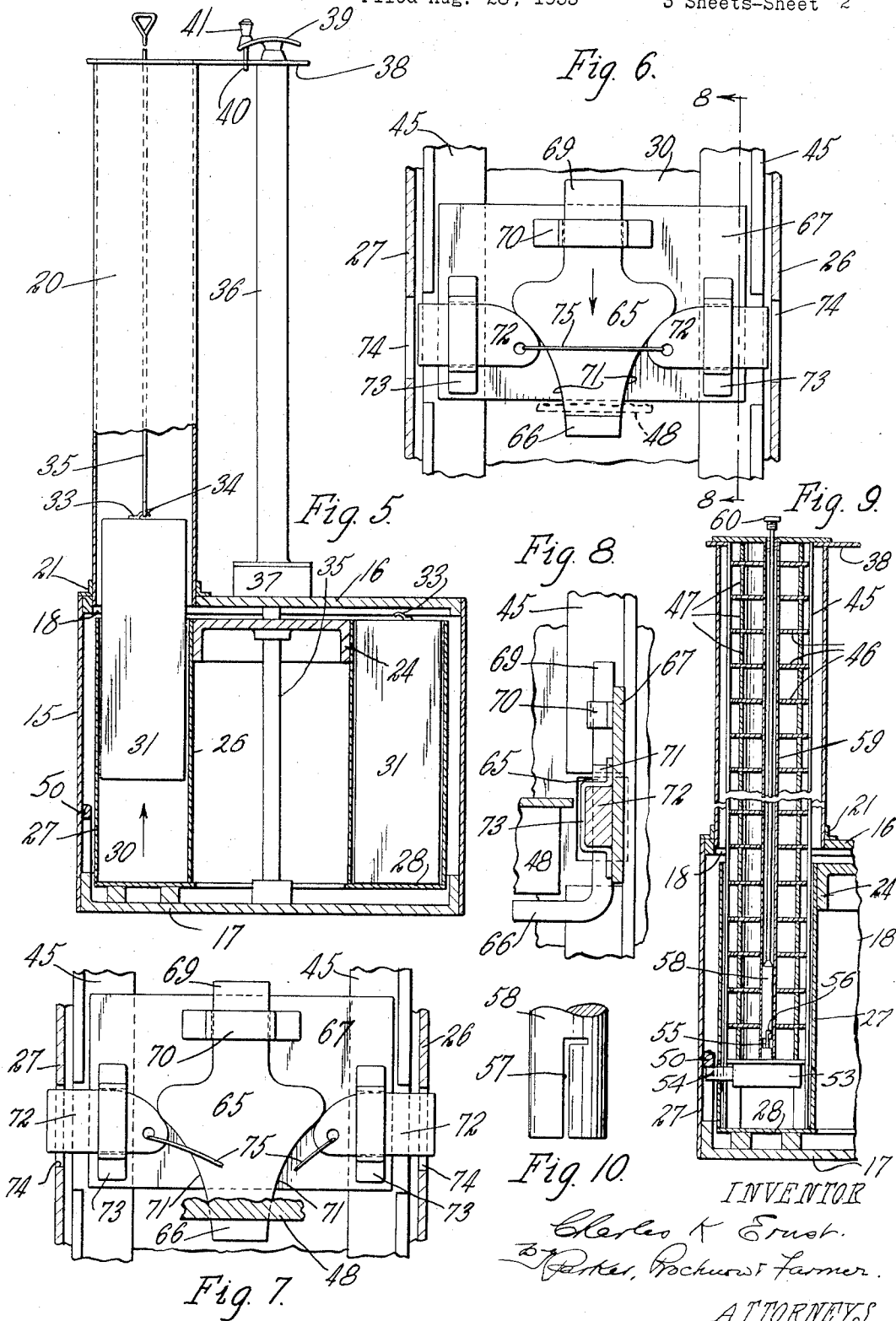
C. K. ERNST

1,954,668

SAFE

Filed Aug. 28, 1933

3 Sheets-Sheet 2



INVENTOR
Charles K. Ernst.
Parker, Rockwood Farmer.
ATTORNEYS.

April 10, 1934.

C. K. ERNST

1,954,668

SAFE

Filed Aug. 28, 1933

3 Sheets-Sheet 3

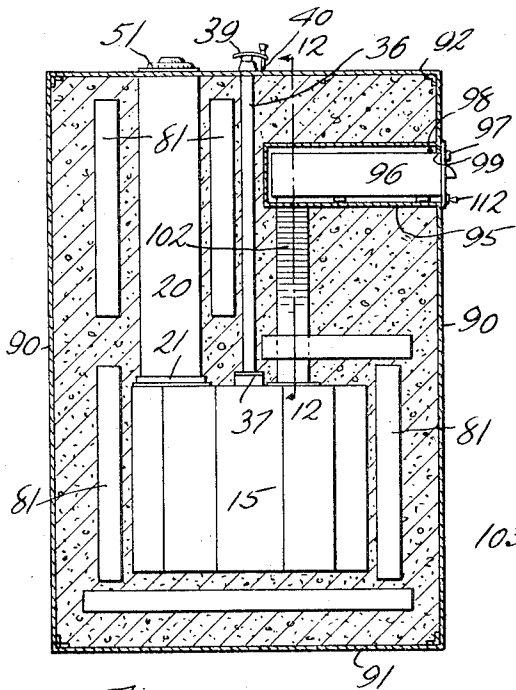


Fig. 11.

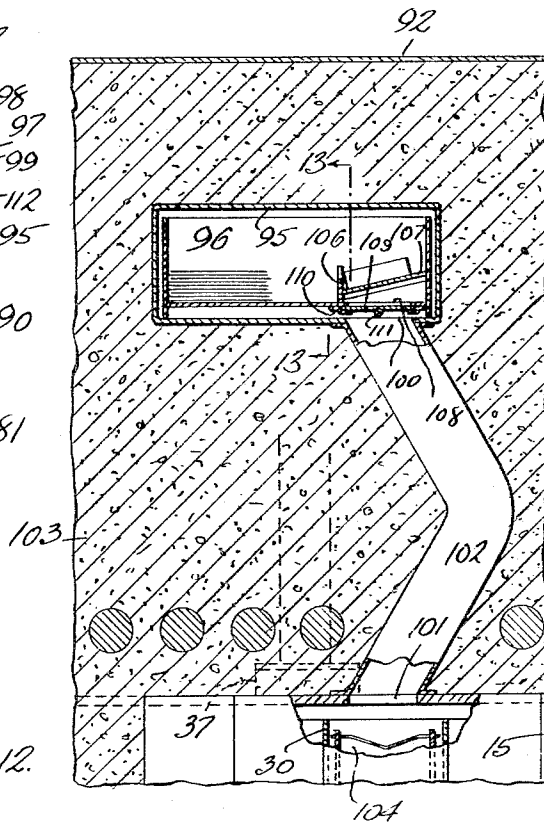


Fig. 12.

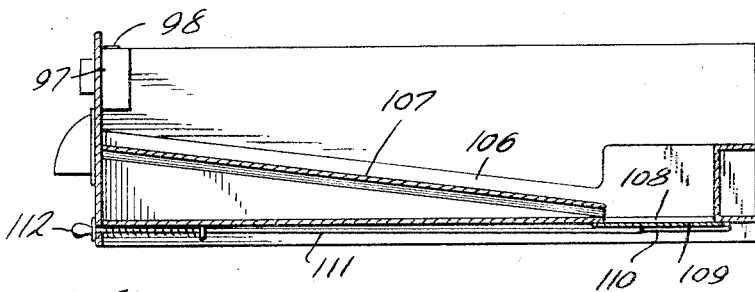


Fig. 13.

INVENTOR.

Charles K. Ernst

By Parker, Rockwell & Farmer

ATTORNEYS.

UNITED STATES PATENT OFFICE

1,954,668

SAFE

Charles K. Ernst, Buffalo, N. Y.

Application August 28, 1933, Serial No. 687,134

20 Claims. (Cl. 109—1)

This invention relates to improvements in safes in which valuables can be protected from fire and theft and particularly to safes of the kind which may be permanently installed in a building.

5 The objects of this invention are to provide a safe of this kind having a large storage capacity for valuables, which may be withdrawn only through a single, relatively small opening, and which opening is normally closed by a removable member which occupies substantially the entire space within said opening; also to provide a safe of this kind in which the valuables compartments are contained in a rotary member, any part of which may be brought into operative relation to 10 said opening, and in which the rotatable member may be locked against rotation; also to provide a safe of this kind which may be arranged in a vertical, horizontal or inclined position and which may be located below the ground, or which may be conveniently enclosed in a mass of cement or other rigid material which may be located either above or below the ground; said mass being either rigidly incorporated with a part of a building, or formed with the safe there- 15 in, as a separate portable, but relatively heavy unit; also to provide a safe of this kind in which the member confined within the passage through which the valuables compartment may be removed is provided with compartments in which 20 chemicals or other materials for repelling a burglar or robber may be contained; also to provide a safe of this kind with suitable means which may be manipulated from the upper end of the safe for actuating a lock located at the lower 25 end of the inner member which fills the inlet passage to the valuables compartments; also to provide the removable member with an emergency lock which becomes operative when the main lock is tampered with or broken; also to 30 improve the construction of safes of this kind in other respects hereinafter specified.

In the accompanying drawings:

Fig. 1 is a top plan view of a safe embodying this invention and embedded in a mass of concrete or other solid material which is secured in place in a building.

Fig. 2 is a sectional elevation thereof showing, in elevation, the metal housing of the safe.

Fig. 3 is a central sectional view, on an enlarged scale, of the safe removed from its enclosure of concrete or solid matter, on line 3—3, Fig. 1.

Fig. 4 is a sectional plan view thereof in line 4—4, Fig. 3.

Fig. 5 is a sectional elevation somewhat sim-

ilar to Fig. 3, but showing the inner locking member removed from the safe and showing a valuables compartment being removed through the passage.

Fig. 6 is a fragmentary elevation of a portion of the safe showing the emergency locking device.

Fig. 7 is a similar view showing the locking device in locking position.

Fig. 8 is a fragmentary, sectional elevation thereof on line 8—8, Fig. 6.

Fig. 9 is a sectional elevation of a safe having a locking member of modified construction.

Fig. 10 is a fragmentary elevation of the lower end of the key-holding member shown in Fig. 9.

Fig. 11 is a view similar to Fig. 2, illustrating the safe in the form of a portable unit, and to which has been added an additional drawer or compartment for articles, and which may be placed in communication with a selected inner valuables compartment when desired.

Fig. 12 is a fragmentary vertical cross section on an enlarged scale thereof, on line 12—12, Fig. 11.

Fig. 13 is a longitudinal sectional elevation of the drawer or compartment of Figs. 11 and 12, on a larger scale, on line 13—13, Fig. 12.

Briefly stated, my improved safe includes an inner compartment for the storage of valuables, and which has a movable support for a plurality of containers for valuables, and a relatively small passage leading from the exterior of the same to the inner compartment, and through which the containers may be removed. The movable support may be actuated from the exterior of the safe to place any desired container into position or to permit the container to be removed from or replaced in the movable support through the inlet passage. The passage is normally closed and substantially filled by a removable member which may be locked in place to prevent access to the inner compartment, and this removable member preferably also locks the movable support for the valuables against movement. In the particular construction illustrated, the support for the valuables is pivoted or movable about a fixed center, but it will be obvious that this support may be movable in a straight line or otherwise than about a fixed pivot. Preferably the movable support is divided into a number of compartments for the valuables, so that if the safe is broken into, only one or a relatively small number of compartments are exposed, so that valuables in the other compartments will still be safe.

110

In the constructions illustrated, the inner compartment of the safe is annular or drum-shaped and includes an outer shell or wall 15 secured at its upper end to an annular plate 16 forming the top of the drum-shaped or annular housing. At its lower end the outer wall is secured to a bottom plate 17. The upper plate 16 is provided with an aperture 18, and an inlet passage or housing 20 is secured to this plate in register with said aperture 18 and extends thence upwardly or outwardly from the plate 16, a connecting member 21 of L-cross section being employed to form a secure connection between the housing 20 and the top plate 16 of the drum shaped or annular housing.

Within the annular or drum-shaped housing, a rotary member for supporting the valuables is arranged which, in the construction shown, includes a pivotally mounted plate 24 which has a substantially annular support for the valuables mounted thereon. In the construction shown, this portion of the rotary member includes inner and outer annular walls 26 and 27, the wall 26 being secured to a downwardly extending flange of the pivot plate 24, and the lower ends of the walls of the rotary member may be connected by means of an annular bottom plate 28. This support for the valuables may be of any desired shape or form, and in the construction shown, is divided into a number of different compartments by means of partition walls 30 connecting the inner and outer walls 26 and 27. These compartments may, of course, be of any suitable or desired shape, and in the construction shown, six compartments of square cross section are arranged alternately with six compartments of triangular cross section.

All but one of these compartments may contain a box or container for the valuables, boxes 31 of square cross section being provided in the corresponding compartments of the rotary member and boxes or containers 32 of triangular cross section are provided in the other compartments of the rotary member. Each of these containers or boxes is provided at the upper portion thereof with a suitable hook or lip 33 with which a hooked or bent end 34 of a rod 35, Fig. 5, may engage to permit any of these containers to be drawn upwardly out of its space in the rotary member by means of the rod 35.

In order to make it possible to turn the rotary member into any desired position relatively to the inlet passage 20 of the housing, the middle portion of the plate 24 of the rotary member is preferably rigidly connected to an intermediate portion of a rod or shaft 35 extending through a hole in the upper plate 16 of the inner housing and through a tube or pipe 36, the lower end of which is flanged and secured upon the top of an annular member 37 fixed to the stationary top plate 16 and serving to confine a radial thrust bearing 37a for the rod 35 which passes through and is secured to the inner race of the bearing. The lower end of the rod 35 preferably rests upon an end thrust bearing or ball 35a disposed in a retainer secured to the bottom plate 17. The upper end of the tube 36 is preferably secured to a plate 38 which is also connected to the upper end of the inlet duct or passage 20 of the housing which supports these parts in correct relation to each other. A suitable handle 39 is secured to the upper end of the shaft 35 for the purpose of facilitating the turning of this shaft, and a pin or stopper 40 having a knob 41 at the upper end thereof is slidably arranged in the han-

dle 39 and adapted to enter into any one of a number of holes 42 formed in the plate 38. These holes are so located with reference to the pin 40 that by placing the pin into a definite hole, a certain compartment of the rotary member will be placed into alinement with the inlet duct or passage 20 of the housing. The apertures or holes 42 may be provided with numbers corresponding with the numbers of the compartments in the rotary member, so that the desired compartment can be quickly placed into position to be removed through the inlet passage 20 by turning the shaft 35 until the pin 40 is placed into the correct hole in the plate 38.

In order to prevent access to the valuables compartments, a removable inner member is provided within the inlet passage 20 of the safe which is of such form as to substantially fill the inlet passage and also to extend into one of the compartments of the rotary member, to lock this member against rotation. This removable member is preferably provided near the lower or inner end thereof with means for locking the same with reference to a fixed part of the housing, and means are provided for operating the lock from an exterior portion of the safe. This inner member may be of any suitable or desired construction, that shown being built up of steel or other metal parts and including four angle bars 45 arranged at the four corners of the inner member, and a series of plates 46 secured at their outer ends to the angle bars and spaced from each other by any suitable means, such for example, as short, tubular members 47. Preferably, these parts are welded together so as to make it extremely difficult for any unauthorized person to gain entrance to the interior of the passage 20 leading to the valuables compartments. These plates 46 and tubular members 47 may, of course, be replaced by other means for substantially filling the inlet passage to the safe and which render access to the inlet passage as difficult as possible. The inner member, in the construction shown in Figs. 1 to 4 is provided with a combination lock 48 of any suitable or well known construction which is suitably secured to the lower end of the inner member and which has a bolt 49 adapted to engage with a keeper 50 which, in the construction shown, is secured to the upright outer wall 15 of the annular housing of the safe. The outer wall 27 of the rotary member is provided with an aperture through which the bolt 49 can pass to move into engagement with the keeper 50. The combination lock 48 may be actuated in any suitable or desired manner, for example, by means of a dial 51 of the kind commonly used in connection with safes, and a rod 52, Fig. 4, connects the dial 51 and the combination lock 48 and extends through the horizontal plates 46 of the inner member or, if desired, this rod or shaft may be arranged in a tube similar to the tube 35, and extending through plates 46. It will, of course, be understood that this combination lock could be mounted on a stationary housing part of the safe in such a manner that the bolt 49 could engage the part of the removable inner member which closes the inlet passage 20 in which case the dial could be mounted on a fixed part of the housing of the safe.

In the construction shown in Figs. 9 and 10, the inner member is locked by means of a tumbler or other lock 53 having a bolt 54 adapted to engage with the keeper 50 and actuated by means of a key 55. The key is preferably provided with a shank portion having the end thereof offset or

bent over, as indicated at 56, and this key may consequently be removably inserted sidewise into an L-shaped slot 57, Fig. 10, formed in the lower end of a rod 58. This rod may be inserted into a tube 59 arranged within the inner member of the safe, the upper end of the rod 58 being provided with a knob or handle 60 by means of which the rod can be turned to turn the key 55 to lock and unlock the inner member from the housing. Preferably, however, the lock 53 is so constructed that the key cannot be removed therefrom except when the bolt 54 is in locking position, so that it is impossible for a careless person to leave the inner member of the safe in an unlocked position when removing his key. By removably securing the key to the rod 58, the key can be easily carried in a pocket of the person authorized to have access to the safe and the rod 58 will be kept in a position convenient to the safe. By arranging the key in the L-shaped slot 57, it will be obvious that it is impossible for the key to get out of its operative relation with the rod 58 as long as the rod 58 is contained within the tube or pipe 59, so that loss of the key while within the tube is thus avoided.

It is also desirable in connection with this safe to provide an emergency lock by means of which the removable inner member of the safe will become locked to the safe housing in the event that the lock at the lower end of the removable member becomes displaced, as might happen by means of a bar or rod inserted through the tube 59 of Fig. 9, or through the apertures through which the shaft 52 connecting the lock with the dial extends, or possibly by means of explosives introduced between the inner member and its housing. If, for example, the lock 48 is moved relatively to the removable inner member, it is possible that the bolt 49 might be moved out of its locking position and the emergency locking means are consequently arranged to operate only in case the housing of the lock 48 is moved downwardly relatively to the removable inner member of the safe. As shown in Figs. 6 to 8 inclusive, an emergency lock-actuating cam or wedge member 65 is provided, the lower end of which has a horizontally extending toe portion 66 which extends under the housing of the lock 48 or 53. This wedge or cam member is slidably mounted on a plate 67 secured to two of the angle bars 45 of the removable inner member, and in the construction shown, this member has a part 69 guided by means of a strap 70 secured to the plate 67. The wedge or cam member, in the particular construction shown, is provided at opposite sides with wedge or cam faces 71 which are adapted to cooperate with corresponding faces of a pair of bolts 72 also guided in any suitable manner on the removable inner member of the safe, for example, by means of straps 73, and adapted to pass into slots 74 formed in the walls of the rotary drum or annular member of the safe. The two locking bolts 72 are normally held in their unlocked positions by means of a connecting link 75 which may be made of cord, wire or other breakable material, which is preferably of such strength that it will not break during the normal use of the safe. This link 75 consequently also holds the wedge or cam member in its upper position as shown in Fig. 6. This cord or wire will become broken if sufficient downward pressure is exerted on the cam member 65, for example, by the forcing down of the housing of the lock 48, which, as shown, normally occupies a position in spaced relation to the auxiliary locking means, this lock

will press against the toe portion 66 of the wedge or cam member 65 extending under the lock. When the cord 75 becomes broken, the wedge or cam member 65 will force the emergency locking bolts outwardly as shown in Fig. 7, and thus prevent removal of the inner removable member of the safe even in the event that the lock 48 is rendered inoperative.

The removable inner member, as illustrated in the drawings, being formed of a number of plates and short tubular sections 47, forms a number of compartments or spaces. In case an attempt is made by an unauthorized person to gain access to the safe, in all probability such burglar will endeavor to drill downwardly through the plates 46. In accordance with my invention, one or more of the chambers formed between the plates 46 and the tubular members 47 may contain certain materials to hamper the work of such unauthorized person. For example, the chambers may contain chemicals such as tear gas, flaring compositions, sulphur, or the like, which when released, or upon being heated will repel such unauthorized person. A flare, for example, may produce sufficient light so that the sudden flash of light may attract others and thus scare away the burglar. Other means may be contained in the various chambers such, for example, as a hard, abrasive substance, which would dull any cutting tools and be sufficiently heat-resistant to interfere with the operation of a burner.

The safe described may be installed in any desired location or position and preferably is embedded, except for the plate 38 and the dial and handle mounted thereon, in solid material, such as concrete. The safe may, for example, be placed into a hole dug below a basement or cellar floor and surrounded by a mass of concrete, or if desired, the device may be positioned in some other portion of a building above the ground, and the concrete may be poured around the safe in such a manner as to become a part of the building or of the foundations, or it may be secured to parts of a building, such as the floors, walls and the like. In Figs. 1 and 2, the safe is shown as being built into the walls in a corner of a building, and 80 represents a mass of concrete or other rigid material which surrounds the safe and 81 represents suitable reinforcing members of metal or other composition which increase the difficulty of access to the safe. These reinforcing members may, for example, be in the form of metal bars of a suitable composition which is difficult to cut, drill or fuse. Such reinforcing members are preferably arranged above, below and around the sides of the safe so as to protect all parts thereof.

It may be desirable to install a safe of the kind described in a room or office, in which case the safe may be embedded in a mass of reinforced concrete or other material in a manner to form a portable safe unit. Such an arrangement is illustrated in Figs. 11 and 12 wherein the concrete surrounding the safe is completely enveloped in a metal sheath, comprising a continuous side wall 90, a bottom wall 91, and a top wall 92. The latter may, if desired, replace the top plate or member 38 of the first construction, or said member can be secured to such a plate. The top and bottom walls 91 and 92 are preferably welded to the corresponding edges of the side wall 90, and the outer surface of the structure may be enamelled or finished to present an attractive appearance.

When used in an office or place of business it

may be desirable to provide means, other than the movable inner compartments, to receive articles of value, such as cash for change, or rolls of coins, to thereby avoid the necessity of taking out the removable inner member, and actuating the rotary member, merely for obtaining change and the like.

Accordingly I provide a drawer, cash box, or the like container, which is removably secured in the concrete of the portable unit, but is entirely independent of the safe proper and which may be left unlocked, if desired, during business hours. In the construction illustrated there is formed a laterally opening, metal-lined recess or chamber 95 extending into the concrete above and in spaced relation to the annular chamber 15 for the rotary inner member, and in which is received a metal drawer or box 96. Said drawer may be provided with an ordinary tumbler lock 97, the bolt 93 of which is engageable with a depending part 99 of the sheathing, at the top of the chamber 95, for removably securing the drawer in locked position, with the front wall thereof abutting the edges of the recess and closing the latter.

In order to protect the cash or articles normally placed in the drawer 96 means are provided by which communication may be had between the recess 95 and a part of the safe proper, such as a compartment of the inner movable member thereof. The inside of the drawer 96, however, normally does not communicate with said inner rotary member, but may be instantly placed in communication therewith in a manner to quickly discharge the cash or articles in the drawer into a compartment of the inner member. This may be done at the close of business each day, the valuables being removed by way of the inlet 20 and replaced in the drawer when business is resumed, or, such action may be effected in an emergency, as when a holdup is threatened.

One way of effecting such purpose is illustrated in Figs. 11 and 12, wherein the bottom wall of the recess or chamber 95 is formed with a hole 100. This hole is in communication with a similar opening 101 in the top wall or plate 16 of the inner annular drum 15, by means of a tortuous tube or passage 102 embedded in the concrete 103 of the safe structure. The opening 101 preferably is disposed in alinement with one of the valuables compartments, in which a suitable open-topped container 104 has been inserted. Preferably, this particular compartment is positioned at all times in alinement with the passage 102, except when the movable inner member is rotated for the purpose of retrieving the container 104, or other containers from the safe by way of the inlet 20. The container 104 may have a bail or other part formed to be engaged by the rod 35.

To effect communication between the inside of the drawer 96 and the passage 102, when desired, the drawer is constructed as follows. Extending lengthwise of the interior is a vertical partition 106, between which and a side wall of the drawer is a false bottom or plate 107 inclined toward the rear and also preferably toward the partition, see Fig. 13. The plate 107 terminates short of the rear of the drawer and adjacent the front edge of an opening 108 in the bottom of the drawer and which is in alinement with the opening 100. This opening is normally closed by a slide 109 arranged in guides 110 and controlled by a spring actuated rod 111, having a knob 112 at the front of the drawer. Consequently when articles

such as rolls of coin and other like objects are placed upon the plate 107 they will have a tendency to move toward the opening 108, so that upon uncovering the latter by actuation of the slide 109, the articles will roll rearwardly and drop through the openings 108 and 100, and thence through the passage 102 and opening 101 to the safe compartment below.

Obviously, any objects of value in the other part of the drawer 96 can also be deposited in the safe, at any time by actuating the slide and dropping the articles through the passage.

By this construction, ready accessibility may be had to the articles in the drawer, while nevertheless these articles can be readily discharged at will, into the interior of the safe, where they will be relatively inaccessible, due to the remoteness of the hole 100 and the tortuous form of the passage 102, even though the lock 97 be broken and the drawer 96 removed.

The safe described has the advantages that the storage space therein for valuables is materially greater than the inlet to this space through the part 20 of the housing. This materially increases the difficulty of obtaining access to the valuables stored in the inner part of the safe and also makes it possible to provide within the inlet passage a removable inner member which substantially fills this inlet passage and, therefore, greatly increases the difficulty of obtaining access to the valuables. The inner removable member, furthermore, has the advantage of preventing turning of the rotatable drum or annular member when the removable inner member is in its operative or locking position, and consequently, if a burglar gains access to a portion of the safe through a side of the mass of concrete, he can only steal such valuables as may be contained in the compartments of the rotatable member adjacent to the portion of the concrete which has been removed and the remaining compartments of the rotatable member are still inaccessible.

The safes have been shown in the accompanying drawings with their inlet portions 20 disposed in a vertical position, but it will be obvious that the safes may be arranged with this part in a horizontal or inclined position, and the construction of the safes shown may be varied materially without departing from the scope of this invention.

I claim as my invention:

1. A safe having a space for valuables at one end thereof and having an elongated passage leading to said space, a member arranged within said space and movable to place different portions thereof into registration with said passage, a member removably arranged in said passage and substantially filling the same, and means for locking said removable member to said safe.

2. A safe including a housing having a space for valuables at one end thereof and having an elongated passage terminating in a portion of said space, a unitary member arranged in said space and including a plurality of fixed compartments for valuables and which member is movable as a whole to place any of said compartments into alinement with said passage to permit the removal of valuables from said member, means for locking said member against movement, and an elongated member adapted to be positioned lengthwise of and locked in said passage and substantially filling said passage to obstruct the same and prevent access to said movable member.

3. A safe including a housing having a space for valuables at one end thereof and having an

elongated passage leading to said space, a member rotatably mounted in said space and having a plurality of compartments for valuables and rotatable to place any of said compartments into position to permit the valuables to be removed through said passage, a removable inner member in said passage and extending into one of said compartments and holding said rotary member against turning, and means for locking said removable member to said housing.

4. A safe including an inner compartment having a movable member for supporting valuables, an elongated passage leading to a portion of said space, an elongated removable member within said passage which substantially fills said passage to prevent access to said valuables space, locking means located in the inner portion of said compartment for locking said removable member to said safe, and means operable from the exterior of said safe for actuating said locking means.

5. A safe including an inner space for valuables and an elongated passage leading to a portion of said space, a movable support having a plurality of compartments selectively movable into registration with said passage to permit access thereto, and a removable inner member extending substantially throughout the length of said passage and into one of said compartments of said movable support and adapted to be locked to said safe to prevent withdrawal of said removable member and to hold said support against movement.

6. A safe including an inner space for valuables and a passage leading to a portion of said space, a support for valuables in said space and movable to place different portions thereof into registration with said passage, a member insertable into said passage and substantially filling the same, a lock mounted on the inner end of said insertable member and cooperating with said safe to hold the insertable member against movement out of said passage, and means on the outer portion of said member for actuating said lock.

7. A safe including a housing having a space for valuables at one end thereof and an elongated passage leading to said space, an inner member arranged in said passage and substantially filling the same both lengthwise and crosswise thereof, means for locking said inner member to said housing including a lock arranged at a distance from the outer end of said inner member for locking said inner member against removal from said housing, an auxiliary lock including a locking member movable into a position to lock said inner member to said housing, a link which normally holds said locking member in unlocked position, and means actuated by the movement of said first mentioned lock out of its correct relation to said inner member for breaking said link and moving said locking member into locking position.

8. A safe having a space for valuables at one end thereof and having a relatively long inlet passage leading to said space, a member removably arranged in said inlet passage and substantially filling the same, means for locking said member to said safe, a receptacle for valuables having an aperture therein, movable means normally closing said aperture and which are operable from the exterior of said safe for uncovering said aperture, a tortuous duct communicating at one end with said valuables space, and which has its other end in alinement with said aperture in said receptacle, so that when said

aperture is uncovered, articles in said receptacle may be dropped into said valuables space through said duct.

9. A safe having a space for valuables at one end thereof and having a relatively long inlet passage leading to said space, a member removably arranged in said inlet passage and substantially filling the same, means for locking said member to said safe, said safe having a recess remote from said valuables space, a tortuous duct connecting an opening in said recess with said valuables space, a receptacle removably arranged in said recess and having an opening registering with the opening to said duct, movable means normally closing said receptacle opening and which may be actuated from the exterior of said safe without moving said receptacle relatively to its recess, to place said openings into communication so that articles may pass there-through and through said duct into said valuables space.

10. A safe having a space for valuables at one end thereof and having a relatively long inlet passage leading to said space, a member removably arranged in said inlet passage and substantially filling the same, means for locking said member to said safe, said safe having a recess remote from said valuables space, a tortuous duct connecting an opening in said recess with said valuables space, a receptacle removably arranged in said recess and having an opening registering with the opening to said duct, an article supporting member in said receptacle which is inclined toward said opening in said receptacle so that, movable means normally closing said receptacle opening and which may be shifted, without moving said receptacle in its recess to place said openings into communication when said movable means is shifted, said articles will move by gravity along said inclined member and be guided into said openings and will pass thence through said duct into said valuables space for subsequent removal through said inlet passage upon removal of said member therefrom.

11. A safe having a space for valuables at one end thereof and having a relatively long inlet passage leading to said space, a member removably arranged in said inlet passage and substantially filling the same, means for locking said member to said safe, said safe having a recess remote from said valuables space, a tortuous duct connecting an opening in said recess with said valuables space, a receptacle removably arranged in said recess and having an opening registering with the opening to said duct, said receptacle having a front wall closing said recess and an article supporting member which is inclined toward said receptacle opening, a slide normally closing said opening, and means extending to and operable from the exterior of said safe for shifting said slide to uncover said opening, whereby articles on said inclined member will move by gravity along said inclined member, through said openings and said duct and be deposited in said valuables space while said receptacle is locked.

12. A safe including an inner chamber for valuables and a relatively long inlet housing leading thereto and which with said chamber is embedded in a mass of solid material, a member arranged in and filling the greater portion of said housing and which is removable therefrom to permit valuables to be deposited in said chamber through said inlet housing, means for locking said removable member in said inlet housing, a tortuous passage arranged in said mass

and having communication with said inner valuables chamber, and means normally closing said passage against access and which means are operable from the exterior of said mass to open said passage so that articles may be deposited in said inner valuables chamber through said passage without taking said removable member out of said inlet housing.

13. A safe including an inner chamber for valuables and a relatively long inlet housing leading thereto and which with said chamber is embedded in a mass of solid material, a member arranged in and filling the greater portion of said housing and which is removable therefrom to permit valuables to be deposited in said chamber through said inlet housing, means for locking said removable member in said inlet housing, a valuables compartment arranged in said mass of material, and a tortuous passage arranged in said mass and leading from said compartment to said inner chamber and through which articles may be deposited in said inner chamber without taking said removable member out of said inlet housing, whereby said articles can only be removed from said chamber by subsequently removing said member from said inlet housing to provide access to said chamber.

14. A safe including a valuables compartment remote from an end thereof, a tortuous passage having one end thereof accessibly disposed adjacent said end of said safe and which communicates at its other end with said valuables chamber so that articles may be deposited therein through said passage, and a second relatively long passage leading from said end of said safe to said chamber and through which articles in said chamber may be removed, and means operable from said end of said safe for locking said second passage.

15. A safe including a valuables compartment remote from an end thereof, a second valuables compartment disposed adjacent said end of said safe, a tortuous passage leading therefrom to said first compartment and through which articles may be dropped into the latter, a second, relatively long passage extending from said first compartment to said end of said safe and through which articles in said first chamber may be removed, and lock controlled means for closing said second passage.

16. A safe including a housing having a space for valuables, an elongated passage leading to said space, a removable member substantially filling and obstructing said passage both lengthwise and crosswise thereof, a lock for locking said member to said housing and which is arranged at a distance from the outer end of said member, an auxiliary lock, normally unlocked for locking said member to said housing in the event that said first lock is shifted in other than its intended manner and which remains in unlocked position when the first lock is properly actuated for the removal of said member, and relatively to which said first lock is disposed in predetermined, adjacent relation, and said auxiliary lock being actuated to lock said removable member to said housing by the engagement of said first lock therewith in an attempt to force said first lock by breaking through said member.

17. A safe including a housing having a space for valuables, an elongated passage leading to said space, a removable member substantially filling and obstructing said passage both lengthwise and crosswise thereof, a lock for locking said

member to said housing and which is arranged at a distance from the outer end of said member, an auxiliary lock, normally unlocked for locking said member to said housing in the event that said first lock is shifted in other than its intended manner and which remains in unlocked position when the first lock is properly actuated for the removal of said member, said auxiliary lock being disposed in said passage inwardly beyond said member and said first lock and having bolts, and a part disposed in predetermined adjacent relation to said first lock and which is engageable thereby to shift said bolts into locking position by bodily movement of said first lock toward said part in an attempt to force said first lock by breaking through said member.

18. A safe including a housing having a space for valuables at one end thereof and an elongated passage leading to said space, a removable inner member formed to be arranged in said passage so as to substantially fill the same both lengthwise and crosswise thereof and form a formidable obstruction to said valuables space, means for locking said inner member to said housing and including a key-operated lock carried by said inner member and which is arranged at a distance from the outer end thereof and which is protected from access from the outer end of said passage by said intervening inner member when the latter is in operative position in said passage, and a rod adapted to be inserted into said inner member and which rod is formed to removably hold a key at the end thereof to actuate said lock and release and enable said inner member to be removed.

19. A safe including a housing having a space for valuables at one end thereof and an elongated passage leading to said space, an inner member arranged in said passage and substantially filling the same both lengthwise and crosswise thereof, means for locking said inner member to said housing and including a key-operated lock arranged at a distance from the outer end of said inner member, a small passage extending through said inner member and leading to said lock, and a rod adapted to be passed lengthwise through said passage, said rod being formed to removably hold a key at the end thereof for actuating said lock.

20. A safe including a housing having a space for valuables at one end thereof and an elongated passage leading to said space, an inner member arranged in said passage and substantially filling the same both lengthwise and crosswise thereof, means for locking said inner member to said housing and including a key-operated lock arranged at a distance from the outer end of said inner member and the outer end of said passage whereby said inner member acts as a formidable obstruction to said valuables space and intervenes between said lock and the outer end of said passage, a passage of small cross section leading from the outer end of said passage to said lock, a rod adapted to be passed lengthwise through said passage, said rod being formed to removably hold a key for actuating said lock, and which is applied to said rod by a sidewise movement before said rod is inserted into said passage and which is held against disengagement from said rod when the latter is inserted into said passage by the walls of said passage.

CHARLES K. ERNST.