April 6, 1965 V. FARINOLA 3,176,815

VENDING MACHINE

Filed Aug. 12, 1963

FIG. 1.

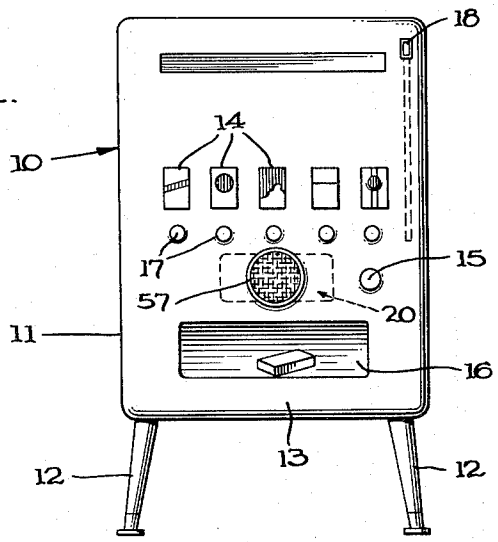
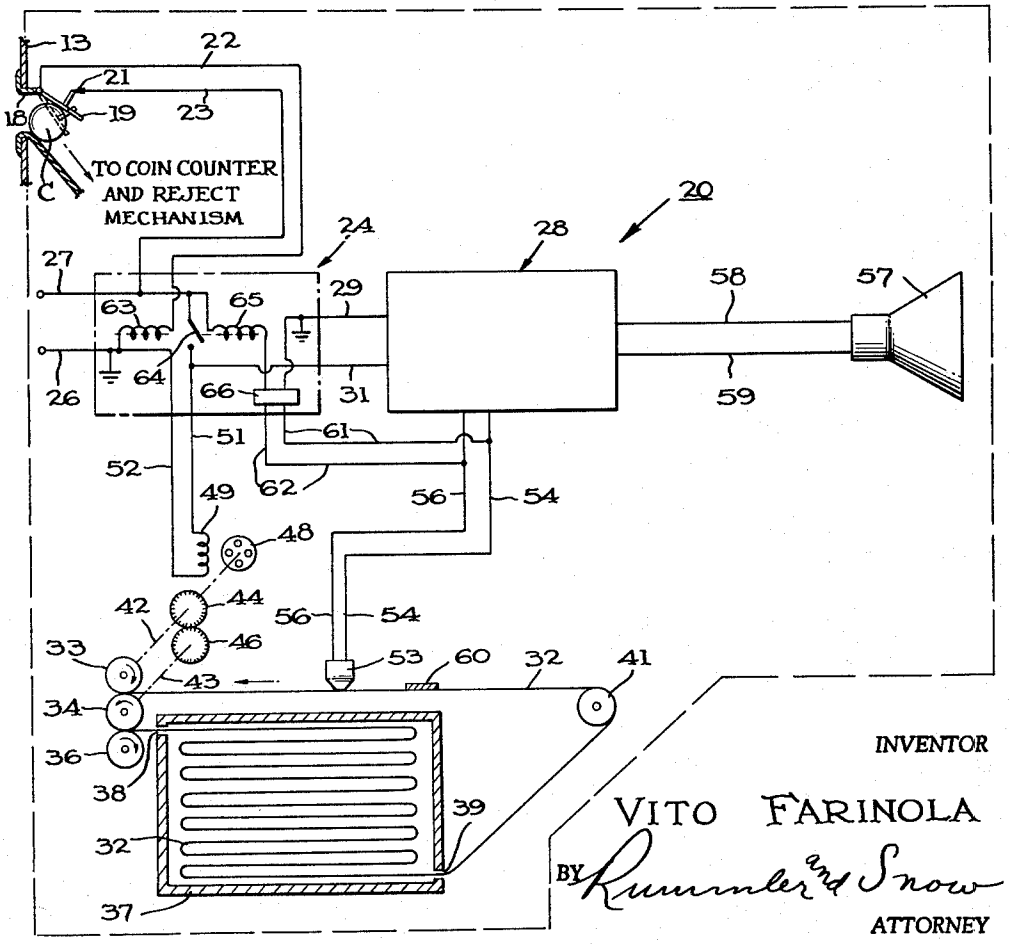


FIG. 2.



INVENTOR

VITO FARINOLA

BY Rummler and Snow

ATTORNEY

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VENDING MACHINE

Vito Farinola, 1096 Wallace Ridge, Beverly Hills, Calif.

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This invention relates generally to improvements in advertising devices for vending machines, and more particularly to a coin actuated device which will provide an audible message urging the sale of a particular brand of merchandise prior to the selection of one of the different items vended by the machine.

One of the principal objects of this invention to provide a device suitable for attachment to a vending machine, with said device or apparatus being capable of producing an advertising message of short length which will be initiated substantially simultaneously by the dropping of a coin into the coin receiving slot of the vending machine.

Another object is to provide in a vending machine a message which will be repeated each time coins are dropped into the machine, the message going through a cycle which is initiated by the insertion of a coin into the mechanism and, because the duration of the message is of so short a length, the user of the mechanism will delay a selection until after having listened to the complete message, and will thus be influenced toward selection of the product advertized by the message. Apparent here is the fact that the main object of the invention is to provide for the audible emission of an advertising message prior to the time that a purchaser makes a selection from the merchandise vended by said vending machine.

Still another object is to provide a vending machine including structure in a container for providing an advertising message which can be repeated each time the machine is operated by the insertion of a coin into the mechanism, the duration of the message being short so that the consumer will delay a selection of a product until after hearing the complete message, and in which the container may be installed in existing vending equipment.

Another object is to provide in a vending machine a structure for initiating and completing a repetitious advertising message where the initiation of such message is achieved by depositing one or more coins into the mechanism, the message being repeated until the user has completed his selection, or until he has actuated a coin return.

Other objects and important features of the invention will be apparent from a study of the following specification taken with the drawings which together describe and illustrate a preferred embodiment of the invention and what is now considered to be the best mode of practicing the principles thereof. Other embodiments may be suggested to those having the benefit of the teachings herein, and such other embodiments are intended to be reserved especially as they fall within the scope and spirit of the subjoined claims.

In the drawing:

FIG. 1 is an elevational view of a vending machine embodying the attached advertising device according to the present invention; and

FIG. 2 is a schematic diagram illustrating a message repeating device adapted to be operated by the insertion of a coin into the mechanism seen in FIG. 1.

Referring now to FIG. 1 of the drawing, the improvements according to the present invention are embodied in a vending machine referred to generally by the reference numeral **10**, and including a cabinet structure **11** supported upon legs or feet **12**.

The structure **11** has a front panel **13** having a plu-

rality of windows **14** therein each displaying an article of merchandise vended by the machine, for example, cigarettes, the articles of merchandise being retained in a suitable rack, not shown, such as is conventional in machines of this type. Each of the articles of merchandise can be delivered to a delivery chute **16** by the actuation of a selector knob **17** mounted on the front panel **13**.

As is common in machines of this type, any one of the selector knobs **17** cannot be actuated until the user has deposited the correct denomination in coins, and the machine accordingly has a coin receiving slot **18** for the reception of coins in the proper amount and kind. Upon receipt thereof, a selector knob **17** may be actuated to accomplish the delivery of the article of merchandise to the delivery chute **16**. A reject button **15** can be actuated to return the coin if a selection is not made, or if coins of an improper amount have been inserted into coin receiving slot **18**, and the rejected coins move to the delivery chute **16**. The above information is necessary in order to show the use and the relationship thereto of the present invention.

The invention comprehends the provision of a device which may include a container and having the circuit components on printed circuit boards and constructed so that the circuitry is potted, and in which said device will provide an advertising message which is repeated each time the machine **10** is operated. The advertising message is preferably of a short duration so that the user of the machine will delay the selection of merchandise until the message cycle has been initiated and completed. Structure is provided which will initiate and complete a message cycle. This control unit **24** comprises a bistable switch **64**, a switch-closing solenoid **63**, a switch-opening solenoid **65**, and a frequency or signal responsive device **66** the function of which will be hereinafter described. The advertising message is repeated until the user has completed his selection, or has caused the coins to be rejected by the reject button **15**.

A continuous record medium **32**, preferably of the elongated, endless magnetic type, is driven by a pair of capstan rollers **34** feeding the elongated record medium **32** into a magazine **37**. Preferably, the magazine **37** is arranged to receive the elongated record medium **32** in a plurality of superposed layers therein, the record medium **32** entering the magazine **37** at an entrance slot **38**. The record medium is withdrawn from the magazine **37** at a slot **39** and is trained about an idler roller **41**.

The capstan rollers **33** and **34** are mounted on shafts **42** and **43** respectively, these shafts having meshing gears **44** and **46** thereon. Shaft **42** is driven by a motor **47** having a rotor **48** and a field structure **49** connected in leads **51** and **52** to the control unit **24**.

The closing of the bistable switch **64** causes the motor **47** to be energized to move the elongated record medium **32**, as seen in FIG. 2. The closing of switch **64** also connects the amplifier unit **28** to the power source by means of leads **29** and **31**. The amplifier unit **28** is preferably transistorized to eliminate the warming up period. A pick-up **53** is arranged to cooperate with the moving record medium **32** and is connected in a circuit including leads **54** and **56** to the amplifier unit **28**, and a transducer **57** connected by leads **58** and **59** properly amplify the message recorded on the record medium **32**.

Structure is provided preferably in connection with the elongated record medium **32** for stopping the motor **47** when the message cycle has been completed. To this end, tape **32** may be provided with indicia **60** thereon such as a pulse outside the audible spectrum and arranged to cooperate with the pick-up **53**.

From the foregoing description it is believed evident that there has been provided a novel advertising device

characterized by the provision of apparatus which will initiate and complete a message cycle for influencing the selection of a purchaser of vending machine merchandise.

While the invention has been described in terms of a preferred embodiment thereof, it is evident that other forms of a message reproducing device may be provided such as a conventional record disc or a magnetic disc where the message is recorded thereon in any suitable fashion. The scope of the invention is accordingly not intended to be limited by a precise embodiment as herein shown, other embodiments being intended to be reserved especially as they fall within the scope and spirit of the claims here appended.

What is claimed is:

1. A vending machine for selecting and vending different brands of merchandise, comprising plural sources and separate selection means for each source, coin receiving means including coin acceptance means for enabling said selection means to be operated, means for providing a cyclically, repetitiously, audible message directed to one of said brands of merchandise including a record medium and means for driving said record medium through a complete message cycle, means for amplifying said message including a pick-up cooperating with said record medium and a transducer, control means for energizing said record medium driving means, said amplifier means connected to a source of power through said control means, and means actuated by the presence of a coin at said coin receiving means for actuating said control means to initiate a message cycle prior to said operation of one of said selection means.

2. A vending machine for selecting and vending different brands of merchandise, comprising plural sources and separate selection means for each source, coin receiving means including coin actuated means for enabling said selection means to be operated, means for providing an audible message directed to one of said brands of merchandise supported within said structure including a record medium and means for driving said record medium through a complete message cycle, means for amplifying said message including a pick-up cooperating with said record medium and a transducer, control means for said record medium driving means and said amplifier means including a source of power connected to said control means, means actuated by the presence of a coin at said coin receiving means for actuating said control means to initiate a message cycle and means providing for repeating a message cycle when a coin remains at said coin receiving means and said selection means is not operated.

3. A vending machine for selecting and vending different brands of merchandise, comprising plural sources and selection means for each sources, coin receiving means including coin actuated means for enabling said selection means to be operated, means for providing an audible message directed to one of said brands of merchandise supported within said structure including a record medium and means for driving said record medium through a complete message cycle, means for amplifying said message including a pick-up cooperating with said record medium and a transducer, control means for said record medium driving means and said amplifier means including a source of power connected to said control means, means actuated by the presence of a coin at said coin receiving means for actuating said control means to initiate a message cycle prior to said operation of one of said selection means, and means on said record medium and connected in circuit with said control means for ending a message cycle.

4. An advertising device for attachment to a vending machine having plural sources, coin receiving means and separate selection means for each source, comprising a container including means for providing an audible message from a record medium, said message directed to a brand of merchandise contained in one of said sources, and means for driving said record medium through a complete message cycle, means for amplifying said message including a pick-up means cooperating with said record medium and a transducer, control means for energizing said record medium driving means, said amplifier means connected to a source of power through said control means, means actuated by the presence of a coin at said coin receiving means for actuating said control means to initiate the message cycle prior to the operation of one of said selection means, and means on said record medium connected in circuit with said control means for terminating a message cycle.

5. An advertising device for attachment to a vending machine having plural sources, coin receiving means, and separate selection means for each source, comprising a container, means therein for providing an audible message including a record medium, said message directed to a brand of merchandise contained in one of said sources, and means for energizing a motor for driving said record medium through a complete message cycle, means for amplifying said message including a transducer, control means for said record medium driving means and said amplifier means, and means actuated by the presence of a coin at said coin receiving means for actuating said control means to initiate a message cycle prior to operation of one of said selection means.

References Cited by the Examiner

UNITED STATES PATENTS

2,626,785	1/53	Lewis et al.	194—15
2,679,917	6/54	Andres	194—15 X
2,792,920	5/57	Sutphen	194—6
2,925,475	2/60	Zorn	194—15 X
2,944,116	7/60	Vershoven	194—15 X

FOREIGN PATENTS

305,267	2/29	Great Britain.

SAMUEL F. COLEMAN, *Acting Primary Examiner.*

ERNEST A. FALLER, JR., *Examiner.*