S. M. HIRSCH.

ADVERTISING APPARATUS.

APPLICATION FILED AUG. 14, 1914.

1,138,478.

Patented May 4, 1915.

3 SHEETS—SHEET 1.

Fig. 1.

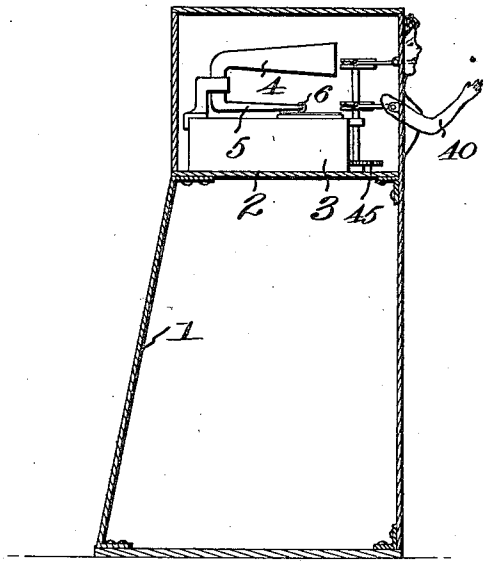
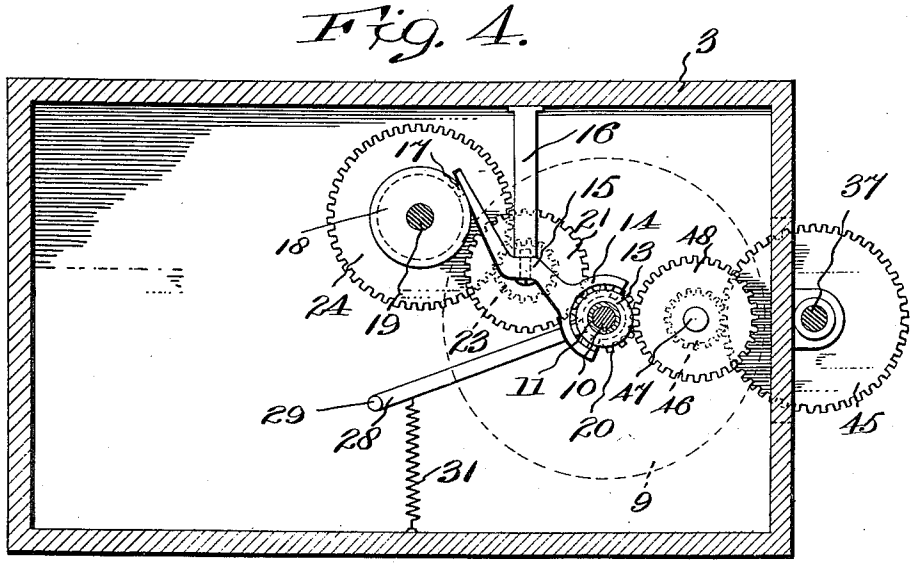


Fig. 4.



Witnesses

Edwin J. Beller.

R. J. Mawhinney.

Inventor

Sidney M. Hirsch,

by Wilkinson, Giusta & MacKaye

Attorneys.

S. M. HIRSCH.

ADVERTISING APPARATUS.

APPLICATION FILED AUG. 14, 1914.

1,138,478.

Patented May 4, 1915.

3 SHEETS—SHEET 2.

Fig. 2.

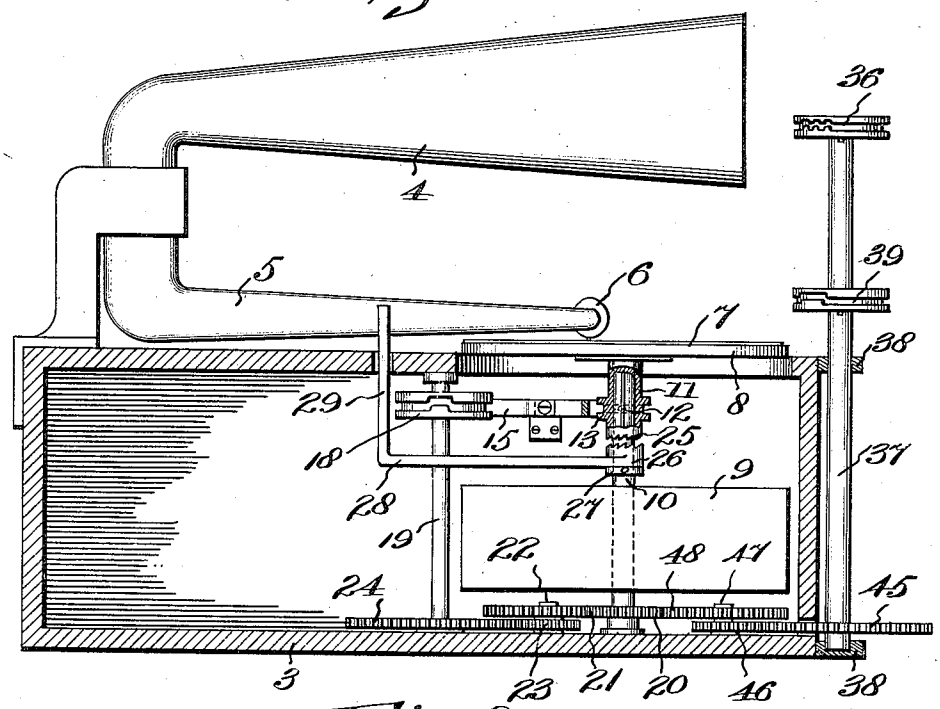
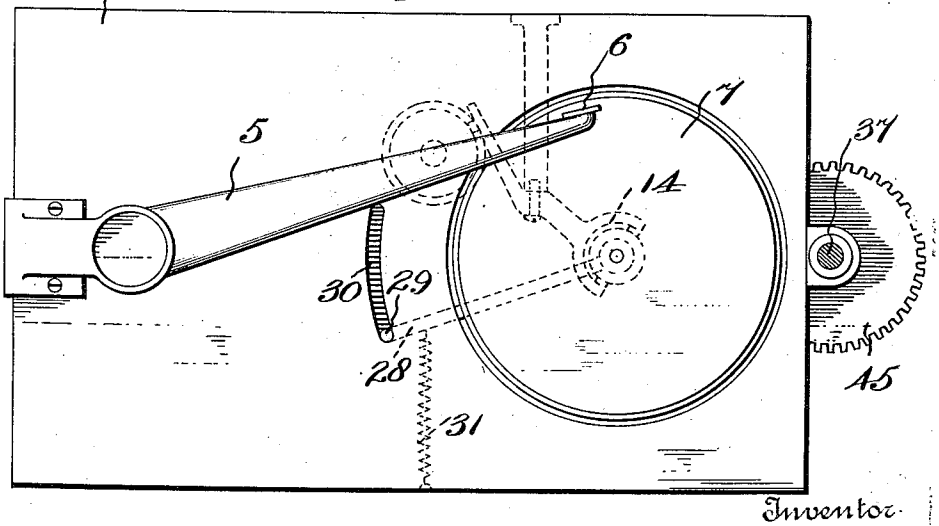


Fig. 3.



Witnesses

Edwin J. Beller.

A. J. Mackinnay.

Inventor.

Sidney M. Hirsch,

by Wilkinson Guerin & Mackay

Attorneys.

S. M. HIRSCH.

ADVERTISING APPARATUS.

APPLICATION FILED AUG. 14, 1914.

1,138,478.

Patented May 4, 1915.

3 SHEETS—SHEET 3.

Fig. 5.

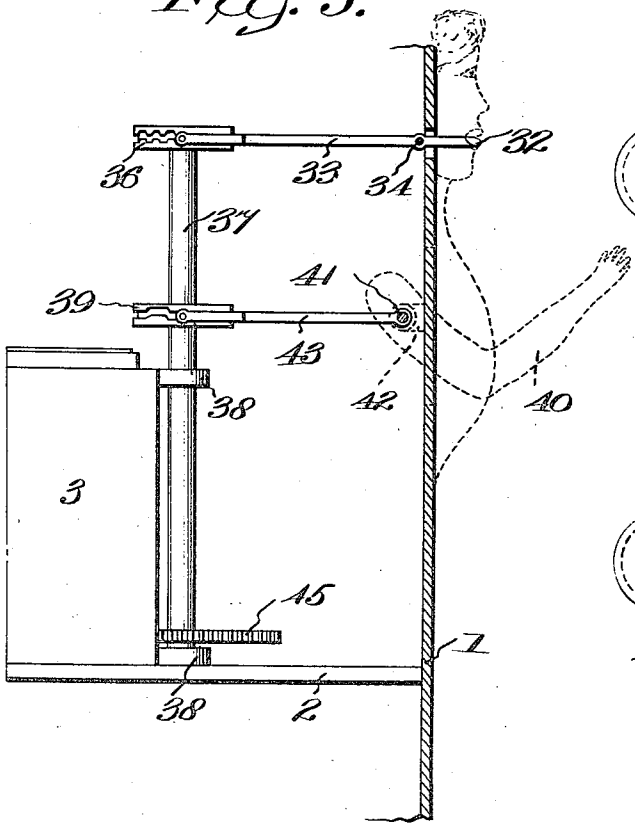
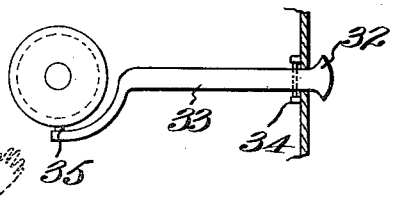


Fig. 6.



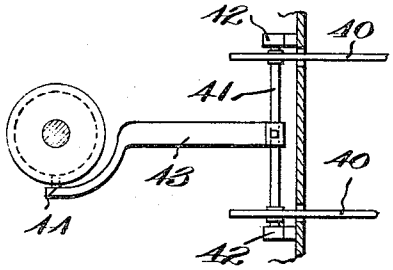
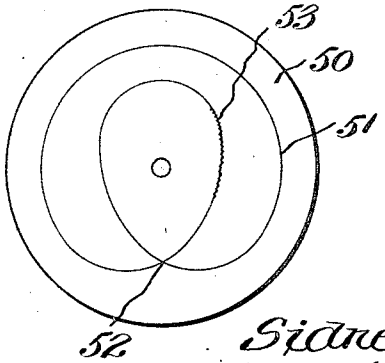


Fig. 7.

Fig. 8.



Witnesses

Edwin J. Beller.

A. J. Mackinney.

Inventor

Sidney M. Hirsch,

by Wilkinson Guiste & Mackaye,

Attorneys.

UNITED STATES PATENT OFFICE.

SIDNEY M. HIRSCH, OF NASHVILLE, TENNESSEE.

ADVERTISING APPARATUS.

1,138,478. Specification of Letters Patent. Patented May 4, 1915.

Application filed August 14, 1914. Serial No. 856,834.

To all whom it may concern:

Be it known that I, SIDNEY M. HIRSCH, a citizen of the United States, residing at Nashville, in the county of Davidson and State of Tennessee, have invented certain new and useful Improvements in Advertising Apparatus; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

The present invention relates to advertising apparatus, and has for an object to provide an advertising apparatus which consists in a speaking and gesticulating human figure that will make a recitation in advertisement of some article or product and perform a gesture to accompany the recitation.

It is another object of the present invention to provide an advertising apparatus which consists of a frame constructed to represent a human figure and providing a housing for a phonograph for reproducing the recitation or speech, and in accordance with the present invention the phonograph employed is preferably of the disk and horizontally-swinging-reproducer-arm type.

A further object of the invention resides in providing an advertising apparatus wherein a human figure is employed, and suitable mechanism arranged in operative connection therewith to actuate the lips of the figure in imitation of the articulations reproduced by the phonograph; and further to actuate the arms simultaneously to perform a gesture to accompany the speech.

The invention still further contemplates the provision of an advertising apparatus of the above character employing a phonograph for reproducing the recitation, and the phonograph will be constructed to automatically return to initial position and repeat the record without further manipulation than the operation of the motor which drives the turn-table for holding the disk.

With these and other objects in view the invention consists in the novel details of construction and combinations of parts more fully hereinafter disclosed and particularly pointed out in the claims.

In the accompanying drawings forming a part of this application, and in which similar reference symbols indicate corresponding parts in the several views:

Figure 1 is a vertical sectional view of an advertising apparatus constructed in accordance with the present invention, and illustrating the phonograph and associated mechanism in elevation. Fig. 2 is a vertical sectional view of a phonograph constructed in accordance with the present invention. Fig. 3 is a top plan view of the same with the horn removed. Fig. 4 is a horizontal sectional view of the same. Fig. 5 is an elevational view of the lip and arm actuating mechanism showing the frame wall in section. Fig. 6 is a plan view of the lip-actuating mechanism. Fig. 7 is a plan view of the arm-actuating mechanism; and Fig. 8 is a plan view of a disk record that may be employed in conjunction with the present invention.

Referring more particularly to the drawings, wherein one embodyment of the invention is illustrated, 1 designates a frame having its front wall constructed to represent a human figure, as indicated at 2, and as shown in Figs. 1 and 5 the representation is preferably that of a girl.

The frame 1 is provided with a partition 2, on which is supported the casing 3 of a phonograph, of which 4 designated the horn or amplifier, 5 the horizontally swinging tone arm, and 6 the sound box carried at the outer end of the tone arm 5, in the usual manner. The stylus or needle of the sound box 6 travels in the usual manner in the groove produced in the disk record 7, the same being supported upon a turn-table 8 which receives continuous rotary motion from a motor 9 of any suitable character.

The motor 9 is located within the casing 3 of the phonograph and operates to drive a vertical shaft 10 journaled in the casing, and through which the rotary movement is imparted to the turn-table 8.

Unlike the usual construction, in which the turn-table is mounted directly on the drive shaft, the turn-table 8, in accordance with the present invention, is mounted on a sleeve 11 journaled for vertical movement on the drive shaft 10, but locked to rotate with the latter through a spline 12.

Upon the sleeve 11 is formed a collar 13, for engagement by the yoke 14 of a lever 15, fulcrumed to swing in a vertical plane on a bracket 16 projecting from one side wall of the casing 3. The opposite arm of the lever 15 is provided with a projection 17, as indicated in Figs. 3 and 4, for engaging the groove in a cam disk 18, mounted on a ver-

tical shaft 19 journaled in the casing 3, and arranged to be driven through any suitable reducing gearing from the drive shaft 10.

The gearing herein shown, and that preferably adopted in practice, consists of a pinion 20 mounted on the drive shaft 10 below the motor 9, and the pinion 20 meshes with a gear wheel 21 mounted on a stub shaft 22, which latter also carries a pinion 23 in mesh with a gear wheel 24 mounted on the cam shaft 19. The cam disk 18, through the instrumentality of the lever 15 is adapted to lower the turn-table 8 to disengage the record from the stylus of the sound box 6, after the record has been played, and permit the tone arm 5 to be returned to initial position, whereupon the turn-table 8 will be again raised to elevate the record into engagement with the reproducing stylus and repeat the record.

The lower end of the sleeve 11 is provided with clutch teeth 25, which, when the sleeve descends, engage with coöperating clutch teeth formed on a collar 26 loosely fitted over the drive shaft 10 and resting upon a set collar 27. To the clutch collar 26 is connected a horizontal arm 28, provided at its outer end with a vertically upturned extension 31 arranged to project and operate through an arcuate slot 30 produced in the top wall of the phonograph casing 3; and the projecting portion of the extension 29 engages the tone arm 5 for returning the same to initial position after the turn-table has been lowered to disengage the record and stylus when the reproduction is finished. Upon return of the tone arm 5 to initial position and elevation of the turn-table 8 to permit repetition of the record, the arm 28 is retracted by means of a coil spring 29 connected between the same and the adjacent wall of the casing.

The figure 2 on the front wall of the frame 1, may be constructed with any suitable lip and arm movement, but I preferably employ the construction shown in Figs. 5 to 7 inclusive, wherein the nether lip 32 of the figure is constituted of the outer end of the short arm of a lever 33 pivoted at 34 in the front wall of the frame. The lever 33 is provided at its opposite end with a projection 35 engaging the groove in a cam disk 36 mounted on a shaft 37 journaled in bearings 38 secured to the phonograph casing 3. Mounted on the shaft 37, below the cam disk 36, is an arm-actuating cam disk 39, and arranged opposite the arms 40 of the figure. The arms 40 are mounted on a rock shaft 41 journaled in bearings 42 projecting from the front wall of the frame, and the rock shaft 41 is arranged to be actuated from the cam disk 39 through the instrumentality of a lever 43 mounted on said rock shaft and provided at its free end with a projection 44 journaled in the groove of the cam disk 39.

The shaft 37 may be driven in any suitable manner by mechanism arranged for that purpose, but I preferably drive the same from the motor 9 of the phonograph by reducing gearing similar to that employed for driving the cam shaft 19, as above described. Such mechanism as shown to advantage in Fig. 2, consists of a gear wheel 45 mounted on the shaft 37 and meshing with a pinion 46 mounted on a stub shaft 47, on which latter is also mounted a gear wheel 48 in mesh with the pinion 20 on the drive shaft 10 of the phonograph mechanism.

In practice, the record 7 of the phonograph will contain a speech or recitation in advertisement of some article or product, such for instance as "Won't you have a coco-cola with me?", which will occupy but a small portion of the groove of the record, the remainder of the latter being blank. In this manner, while the turn-table 8 carrying the record 7 is continuously rotated, the speech will be reproduced periodically; and at each recurrence of the speech, which will be preferably at substantially half minute intervals, the gearing for the shaft 37 will be so arranged and proportioned that the cam portions of the disks 36 and 39 on said shaft will arrive in position to actuate the mechanisms associated therewith. The projection 35 of the lip-actuating lever 33 will encounter the cam portion of the disk 36, which will be arranged after the manner shown in Fig. 5 to operate the lip 32 in imitation of the articulations which are being reproduced from the record of the phonograph.

Simultaneously, the cam groove of the disk 39 encounters the projections 44 of the arm 43 and raises the same to actuate the rock shaft 44 and move the arms 40 of the figure to perform the gesture to accompany the speech.

After the tone arm 5 of the phonograph has been moved across the record 7, in the usual manner, and arrived at the end thereof, the gearing, interposed between the drive shaft 10 and the cam shaft 19, will be so timed as to bring the cam portion of the disk 18 into engagement with the projection 17 of the arm 15, and raise the same about the fulcrum 16 to depress the opposite end 14 of the lever and lower the sleeve 11 and turn-table 8, whereby the record 7 will be removed from engagement with the stylus of the sound box 6. At the same time, the teeth 25 on the sleeve 11 are moved into engagement with the teeth on the clutch collar 26 to couple the latter and drive the same from said sleeve. The collar 26, being thus connected with the drive shaft 10 is rotated thereby, and carries with the same the arm 28 and vertical extension 29 the latter operating through the arcuate slot 30 in the casing top and engaging tone arm 5 to move

the same to initial position, as shown in Fig. 3. After this movement has been accomplished for returning the tone arm 5 to such initial position, the cam portion of the disk 18 will disengage the projection 17 of the lever 15 and move the same to the elevated position shown in Fig. 2, whereupon the lever will again engage the groove in the record and the repetition of the same will be proceeded with.

When the turn-table 8 has been elevated, as just described, the teeth 25 will be raised out of engagement with the teeth of the clutch collar 26, and the same will be left free upon the drive shaft 10. The arm 28 will thereupon come under the influence of the spring 31, which will automatically retract the same and the extension 29 to the position shown in Fig. 3, in readiness to engage the tone arm 5 and return the same after the record has been again played, as will now be understood.

Referring more particularly to Fig. 8, I have here illustrated a record 50, designed to be employed in conjunction with the present advertising apparatus, and the use of which will dispense with the mechanism for automatically returning the tone arm of the phonograph to position to constantly repeat the record. In accordance with the invention, the record 50 is provided with a continuous and closed groove 51, connecting the inner and outer convolutions of the same at the junction 52. A small portion of this groove 51 may contain the reproduction, as indicated at 53, and the remainder of the groove remain blank. In this manner the lever continuously traversing the groove will intermittently reproduce the speech contained at 53, during which interval the lip and arm actuating mechanism will be operated in the manner above described.

Instead of having the figure of the girl in relief, as shown in Figs. 1 and 5, it may be simply printed on paper, poster fashion, and pasted on the front face of the frame 1, see Fig. 5.

I have illustrated and described preferred and satisfactory constructions, but obviously changes could be made in the herein described apparatus which could be used without departing from the spirit of my invention.

I claim:—

1. In an advertising apparatus of the character described, the combination of a figure, a pivoted lever having its outer end constructed to form one of the lips of said figure, a rock-shaft, arms for said figure mounted on said rock-shaft, an actuating lever for said rock-shaft, a motor and connections arranged between said motor and said lip and arm actuating levers for operating the same simultaneously, substantially as described.

2. In an advertising apparatus of the character described, the combination of a frame, a figure on said frame, a phonograph supported within said frame for reproducing speech as issuing from said figure, a lever pivoted in said frame and having its outer end constructed to form one of the lips of said figure, a rock-shaft journaled in said frame, arms for said figure mounted on said rock-shaft, an actuating lever for said rock-shaft, a cam shaft journaled in said frame, reducing gear connections between said phonograph driving mechanism and said cam shaft for actuating the latter to complete one revolution during each traversing movement of the needle over the phonograph record, and a pair of disk cams mounted on said cam shaft and engaging each of said lip and arm actuating levers to operate the same simultaneously with the reproduction of the phonographs, substantially as described.

In testimony whereof, I affix my signature, in presence of two witnesses.

SIDNEY M. HIRSCH.

Witnesses:
JOE LOWENSTEIN,
LEOPOLD LOWENSTEIN.