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T. R. DUNCAN WHISTLING TOY Filed Feb. 18, 1946 2,485,142

2 2↓ FIG.5. 90 FIG.2 Ð Ś FIG.1 T M 3 THEODORE R. DUNCAN, BY ATTORNEY

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# UNITED STATES PATENT OFFICE

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#### WHISTLING TOY

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2 Claims. (Cl. 46-179)

This invention relates to improvements in children's playthings, particularly a whistling toy, and one of the chief objects of the invention is to provide a new, amusing and harmless toy which can be manufactured at a low cost.

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Another object is to provide an improved toy wherein the parts possess a new mode of assembling and operation.

A further object of the invention resides in the provision of a toy wherein new and different whis- 10 tling effects are both humanly and mechanically produced.

A still further object is to provide in a toy of the nature set forth one which can be used also as a bathtub toy wherein water can be sucked 15 in and blown out again similar to a water pistol.

With the foregoing in view, together with such other objects and advantages as may subsequently appear, the invention resides in the parts and in the combination, construction and peculiar ar- 20 within the tubular member 8, secures the inner rangement of parts hereinafter described and claimed and illustrated by way of example in the drawing in which;

Fig. 1 is a part sectional and side elevation.

Fig. 1 as indicated by the arrowed line 2-2 in Fig. 1; on a somewhat larger scale.

Fig. 3 is a fragmentary section taken on line -3 of Fig. 2.

Referring in detail to the drawing, therein is 30 shown a tubular member 8 constructed of any suitable material either transparent or otherwise, having its ends closed by a pair of members 9 and 10 each of which has a central opening 11. Housed within the tubular member 8 is a globular body 12 contoured to the inner periphery of the member 8 and adapted to roll or slide therein when the tube is canted, or be reciprocated in said tubular body when the latter is moved back and forth in a line parallel to its longitudinal axis, the object being to mechanically drive out air through one of the central openings while simultaneously entraining air into the tube through the other of said openings in the mechanical production of different whistling effects or musical sounds.

At least one of the apertured members 9 or 10 consists of a whistle which is composed of a pair of concave disks 13 and 14 having in their juxtaposed relation their convex faces directed outwardly.

Disk 13 is provided with an annular peripheral flange 15 which projects in a direction so as to surround or envelop the concave face thereof; and disk 14 is provided with an annular flange similar to the flange 15 but which projects in a direction 55 the tubular member as aforesaid. When the body

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so as to envelop or surround the convex face thereof, said flange 16 being rebent outwardly over itself to provide a second annular flange 17. Between said flanges 16 and 17 results an annular space within which is housed both the flange 15 of the disk 13 and the end of the tubular body 8, such parts being secured in their assembled relation by a crimping operation applied to the outmost flange 17.

When the flanges 15 and 16 are brought into juxtaposition or the flange 16 is telescoped into the flange 15, these flanges will be held temporarily in the desired relationship until the end of the tubular member 8 is in turn slipped over the flange 15 instant to the crimping operation that crimps flange 17 securely to the tubular member thereby retaining the assembled parts in their operative position.

The crimping operation confines the body 12 and outer disks in a permanent predetermined relationship and strengthens the tube and protects it from wear or damage.

When the tubular member 8 is constructed of Fig. 2 is an elevation of the right hand end of 25 a transparent material and the body or marble 12 is colored, the toy is especially suited for infants as the motion of the marble would be visible, and by canting the tube would produce an entertaining sound. The toy is also suitable as a bathtub plaything since water can be sucked in and blown out again in the manner in which a water pistol operates. Owing to the imperforate spherical body 12 having a close, but free working fit within the tubular, whistle-carrying, member 8 with which it is combined, it acts effectively as a piston to cause the air to produce whistling sounds, and at the same time a durable device results wherein danger of the piston becoming "stuck" is reduced to the minimum.

In the operation of the device as a whistle, air is drawn in through the aperture at one end and forced out through the aperture in the other end. When the tubular member is briskly shaken a loud whistling effect results. If whistles of dif-45 ferent pitch are used (the one sounding a third or fifth higher than the other) an entertaining sound or chord results, as the whistles sound together. If the finger is intermittently placed over the aperture of either whistle while shaking the tube, a series of staccato notes like a melody 50 can be produced. If the tube is slowly canted a variety of low, cooing or whistling sounds result. Thus the body 12 operates as a piston member under the influence of gravity when canted in 12 acts as a piston member the same can be constructed as an ordinary piston.

What is claimed is:

1. In a whistling toy having a tubular body and walls fixed to and closing the ends of said body, 5 said end walls being provided with apertures adapted to produce a whistling sound when air is forced therethrough, an imperforate spherical member fitted to roll axially within said tube so as to force air through the respective end apertures under pressure suitable to effect a whistling sound.

2. A whistling toy as defined in claim 1 wherein each of said end walls comprises an inwardly bowed disk provided with a peripheral flange fit- 15 ted against the interior of and directed outwardly of the body, a second outwardly bowed disk mounted adjacent said first disk and having a peripheral flange fitted telescopically within the

flange of said first disk, the flange of the second disk being doubled outwardly over the outer edges of the first flange and over the end of the body and having its outer end crimped inwardly into the body, said disks being provided with whistling apertures.

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