United States Patent [19]

Fox et al.

[11] **3,907,287**

[45] **Sept. 23, 1975**

[54] **TETHERED BALL BATTING PRACTICE DEVICE**

[76] Inventors: **Daniel W. Fox,** 202 E. Shawn, Phoenix, Ariz. 85022; **Robert E. Fox,** 3679 W. Dahlia Dr., Phoenix, Ariz. 85029; **Anthony E. Deprima,** 3443 N. Central Ave., Phoenix, Ariz. 85012

[22] Filed: **June 11, 1974**

[21] Appl. No.: **478,774**

[52] **U.S. Cl.** ..... **273/26 E;** 273/95 A

[51] **Int. Cl.²** **A63B 69/40**

[58] **Field of Search** ..... 273/26 E, 95 A, 184 B, 273/185 C, 208, 197 R, 58 C, 58 B, 58 D; 119/118–122

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Primary Examiner—Richard C. Pinkham
Assistant Examiner—T. Brown
Attorney, Agent, or Firm—Clarence A. O'Brien; Harvey B. Jacobson

[57] **ABSTRACT**

An athletic improvement device providing activity for a pair of players: one batter and one pitcher. The ball is "pitched" to the batter by the pitcher rotating the device around his head. A perforated ball is secured to one end of a tether line, and the opposite end of the tether line is spring-attached to a pivoting member attached to a wooden insert in a plastic handgrip.

2 Claims, 3 Drawing Figures

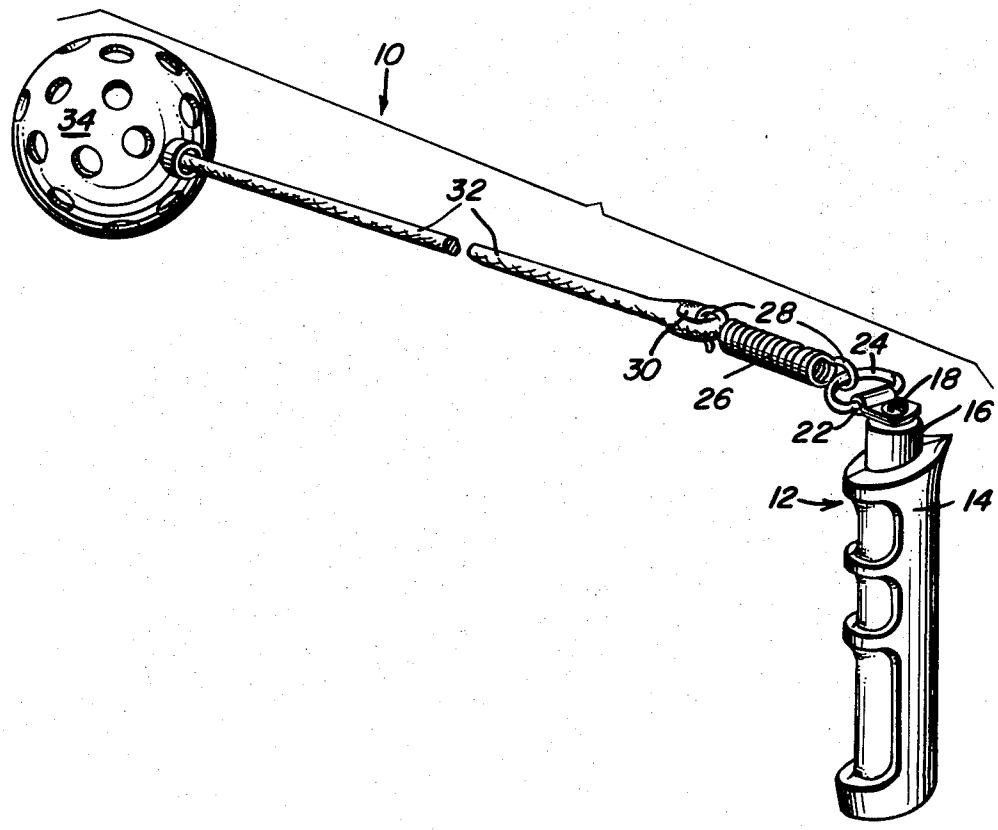


Fig. 1

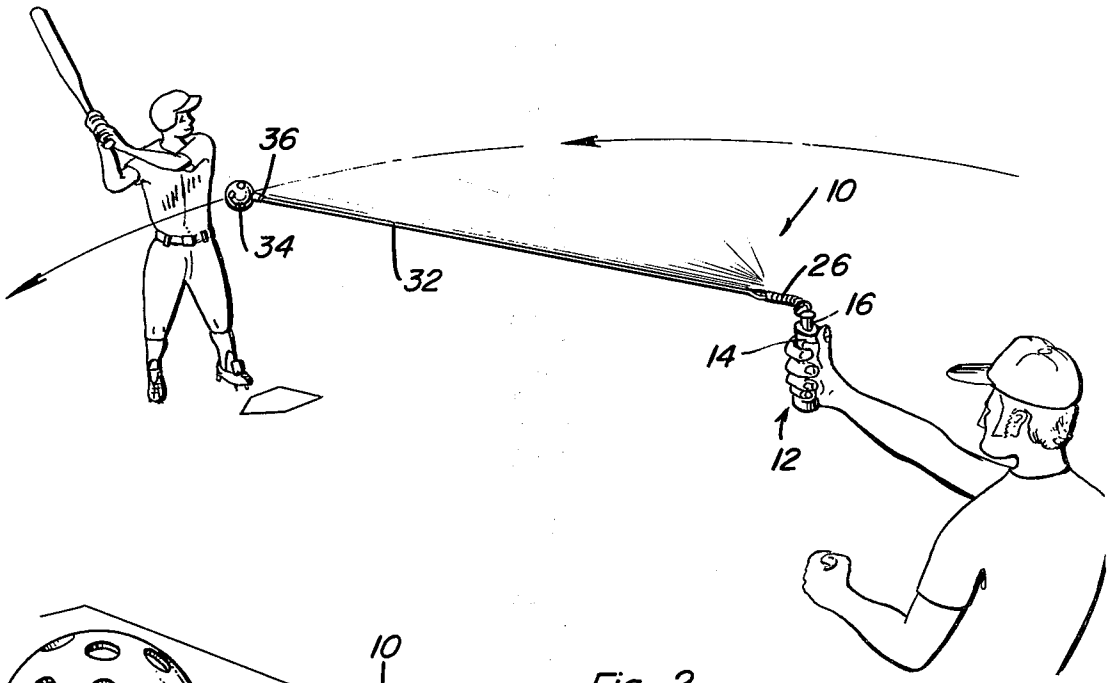


Fig. 2

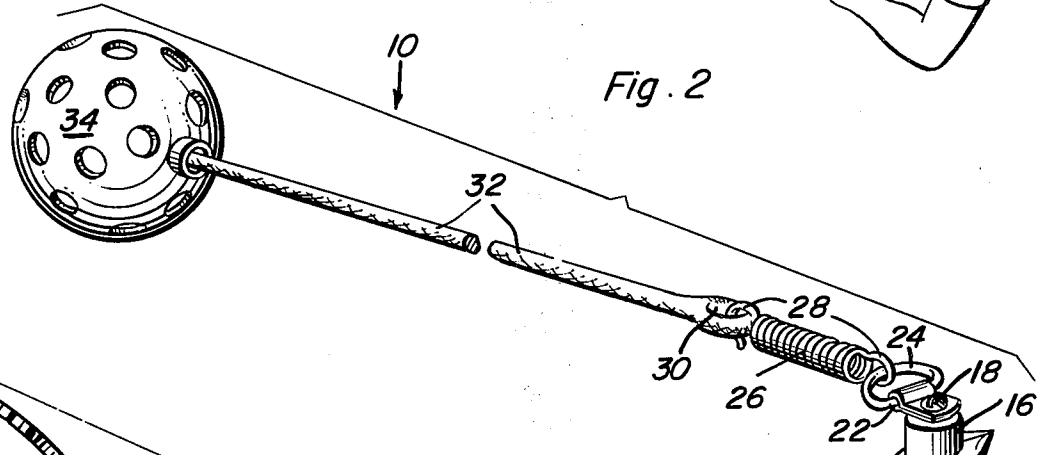
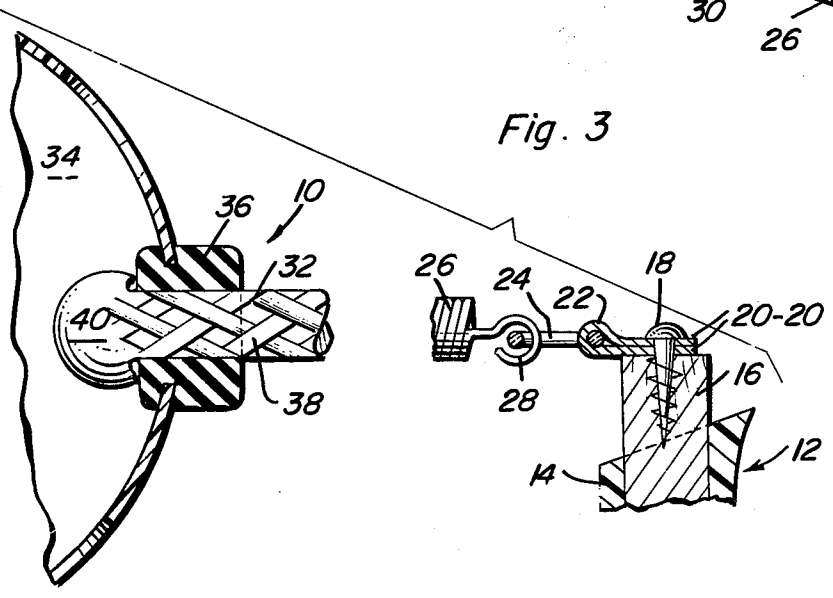


Fig. 3



TETHERED BALL BATTING PRACTICE DEVICE

FIELD OF THE INVENTION AND SUMMARY OF THE PRIOR ART

Known forms of batting practice devices are evidenced by the following U.S. patents: Papp (U.S. Pat. No. **3,351,343,** issued Nov. **7, 1967**) showing anchoring means for a ball and tethering means connection; Alexander (U.S. Pat. No. **3,531,115,** issued Sept. **29, 1970** showing a diverse ball and tether connection; Brochman (U.S. Pat. No. **3,601,398,** issued Aug. **24, 1971**) disclosing various plastic parts and connections; and Caldwell (U.S. Pat. No. **3,731,925,** issued May **8, 1973**) disclosing a barrel and control stick to vary the line of flight of a tethered ball.

SUMMARY OF THE INVENTION

Among the objects and advantages of our invention are to provide a batting practice device that is economical to construct and assemble, yet sufficiently rugged and having easily replaceable parts for continued usage in batting practice.

These together with other objects and advantages which will become subsequently apparent reside in the details of construction and operation as more fully hereinafter described and claimed, reference being had to the accompanying drawings forming a part hereof, wherein like numerals refer to like parts throughout.

BRIEF DESCRIPTION OF THE DRAWINGS

FIG. **1** is a perspective view of two athletes using the device.

FIG. **2** is a similar view but on an enlarged scale.

FIG. **3** is an exploded, partly sectional view detailing the connections for the various parts of the device.

DETAILED DESCRIPTION OF THE INVENTION

The overall device is designated by reference numeral **10** in each of the views. The handle means **12** includes a hollow, plastic, generally cylindrical handgrip member **14** having finger-gripping portions and receiving a solid wooden insert **16** in the form of a dowel that fits securely within and extends slightly beyond the handgrip member **14.**

Screw means **18** passes through apertures **20—20** in the ends of a strap means **22** that holds a portion of the loop **24.** The strap means **22** may readily slip or slide on the top of the wooden insert **16,** however, washer means (not illustrated) may be used to further provide slippage of the strap means about the screw **18** as a center and the wood screw **18** is not tightened completely thus enabling swivel movement of the strap **22** around the screw.

A generally helically-shaped spring means **26** has loop portions **28—28** at each end, one connected to the loop **24,** and one connected to a looped end portion **30** of elongated flexible tethering means **32.** A hollow perforated ball means **34** of plastic material and generally rigid in construction has a double-grommet **36** fitted within one of the perforations of the ball **34.** The double-grommet has a through-hole **38** for receiving the other end of the elongated tethering means **32** therethrough.

The tip **40** of the tethering means **32** inside the hollow perforated ball **34** is expanded to retain the tip of the tethering means through the grommet within the hollow interior of the ball. The end may be expanded into a lump by applying heat to the plastic tethering line **32** which is constructed of woven or braided nylon which is somewhat resilient, thus further cushioning any shock which may occur when the batter hits the ball.

In use, and as illustrated in FIG. **1,** the pitcher rotates the perforated ball, at the end of the tethering means, around the top of his head, and the batter swings at the perforated ball as it crosses the plate. When the ball is hit by the batter, the reverse movement of the tethering means, the spring means and resiliency of the tethering means reduces the "shock" to the arm and hand of the pitcher. Similarly, by combining arm and wrist motions, while rotating the ball around his head, the pitcher can cause the ball to "curve", "dip", etc., while it is in motion.

The foregoing is consdiered as illustrative only of the principles of the invention. Further, since numerous modifications and changes will readily occur to those skilled in the art, it is not desired to limit the invention to the exact construction and operation shown and described, and accordingly all suitable modifications and equivalents may be resorted to, falling within the scope of the invention.

What is claimed as new is as follows:

1. A batting practice device comprising a handle, an elongated flexible line connected to the handle and a ball connected to the end of the flexible line remote from the handle whereby the ball and flexible line may be swung in a circular path about the handle so that the ball may pass over a plate so that a batter may practice swinging a bat at the ball as it passes over the plate, said ball being in the form of a hollow, substantially rigid plastic member having a plurality of holes therein, said handle being in the form of a generally cylindrical handgrip having finger-receiving recesses therein, a rigid dowel fixedly disposed in the handgrip and projecting axially from one end thereof and terminating in substantially a flat end with the dowel being constructed of wood, said flexible line being constructed of plastic material and having a closed loop on the end thereof adjacent the handle, a coil spring having a loop at each end thereof with the loop on one end of the spring being engaged in the loop on the line, a metal D-shaped ring engaged with the loop on the other end of the spring, a metal strap engaged with the D-shaped ring and including overlapping end portions disposed against the flat end of the dowel, a screw extending through the overlapping ends of the strap and into the end of the dowel with the head of the screw spaced from the dowel slightly more than the combined thickness of the ends of the strap thereby enabling the strap to swivel about the axis of the screw, said D-shaped ring being pivotally received in the central portion of the strap with the central portion of the strap being formed into an offset loop receiving the straight portion of the D-shaped ring to enable the D-shaped ring to pivot about an axis generally tangential to the periphery of the end edge of the dowel, the end of the flexible line remote from the handle extending through a perforation in the ball for connection therewith, said coil spring is provided for cushioning forces exerted on the ball when the batter strikes the same with the swivel defined by the screw and the pivot axis defined by the D-shaped ring and the connection between the D-shaped ring and the spring as well as the connection between the spring and the loop on the end of the line enabling

angular displacement of the line and ball thereon in any direction in relation to the handle thereby enabling the handgrip and dowel therein to be disposed substantially in a vertical direction and the flexible line and ball to move in a substantially horizontal path with the path of movement of the ball being varied by manipulative movement of the handle during manual movement thereof which causes the swinging movement of the ball and line.

2. The structure as defined in claim 1 wherein the end of the flexible line extending through a perforation includes an enlargement thereon for anchoring the line interiorly of the ball, said line including a grommet thereon engaged by the enlargement on the line and engaging the ball to prevent the line from being pulled outwardly through the perforation in the ball.

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