# United States Patent [19]

**Schachner**

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[54] **KICKING PRACTICE AID**


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[52] **U.S. Cl.** ..... **273/55 B,** 273/95 A, 273/58 C, 273/65 A

[51] **Int. Cl.** ..... **A63b 67/00**

[58] **Field of Search** .... 273/55 B, 95 A, 26 E, 97 R, 273/29 A, 58 C, 65 A, 65 E, 65 EC, 65 ED; 272/77; 119/117–122



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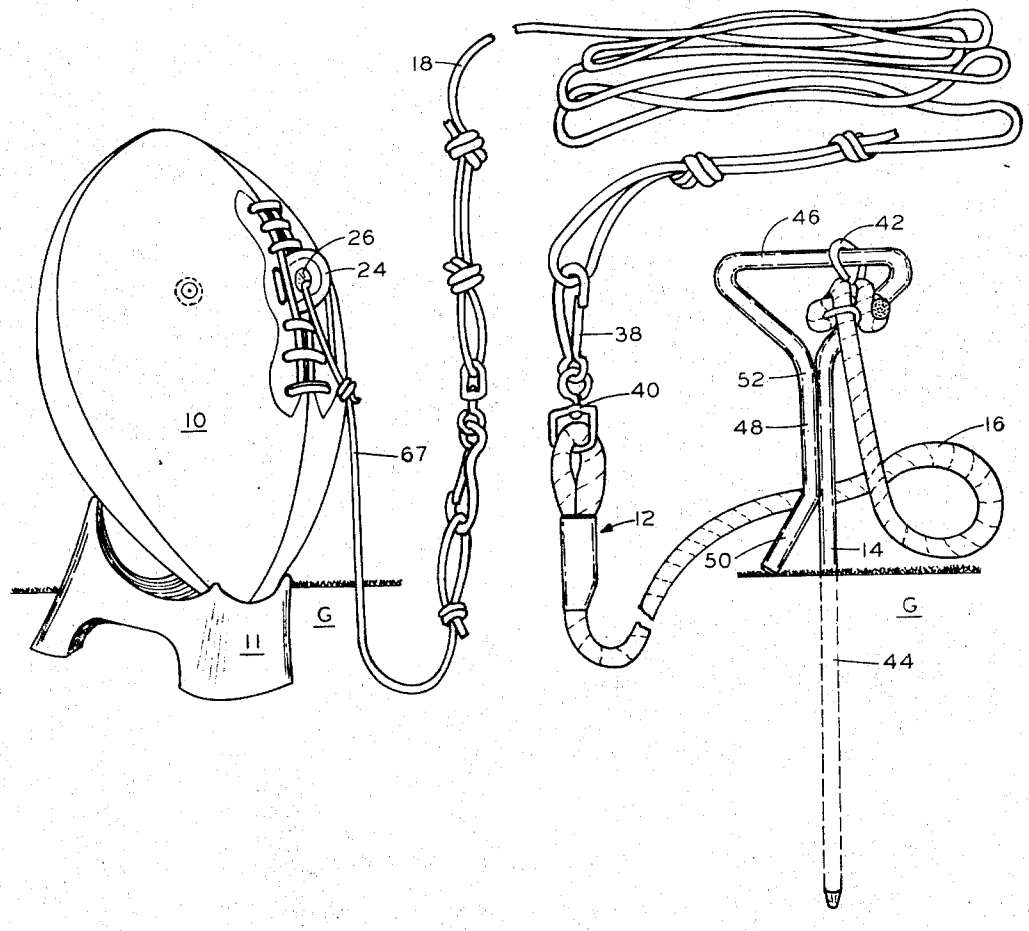
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[57] **ABSTRACT**

An apparatus for football kicking practice comprises an elastic cord and a non-elastic cord, the non-elastic cord being secured to attaching means on the football and the elastic cord being secured to a stake or other means for retaining the cord so that the ball will return to the kicker when the football is kicked.


**1 Claim, 8 Drawing Figures**



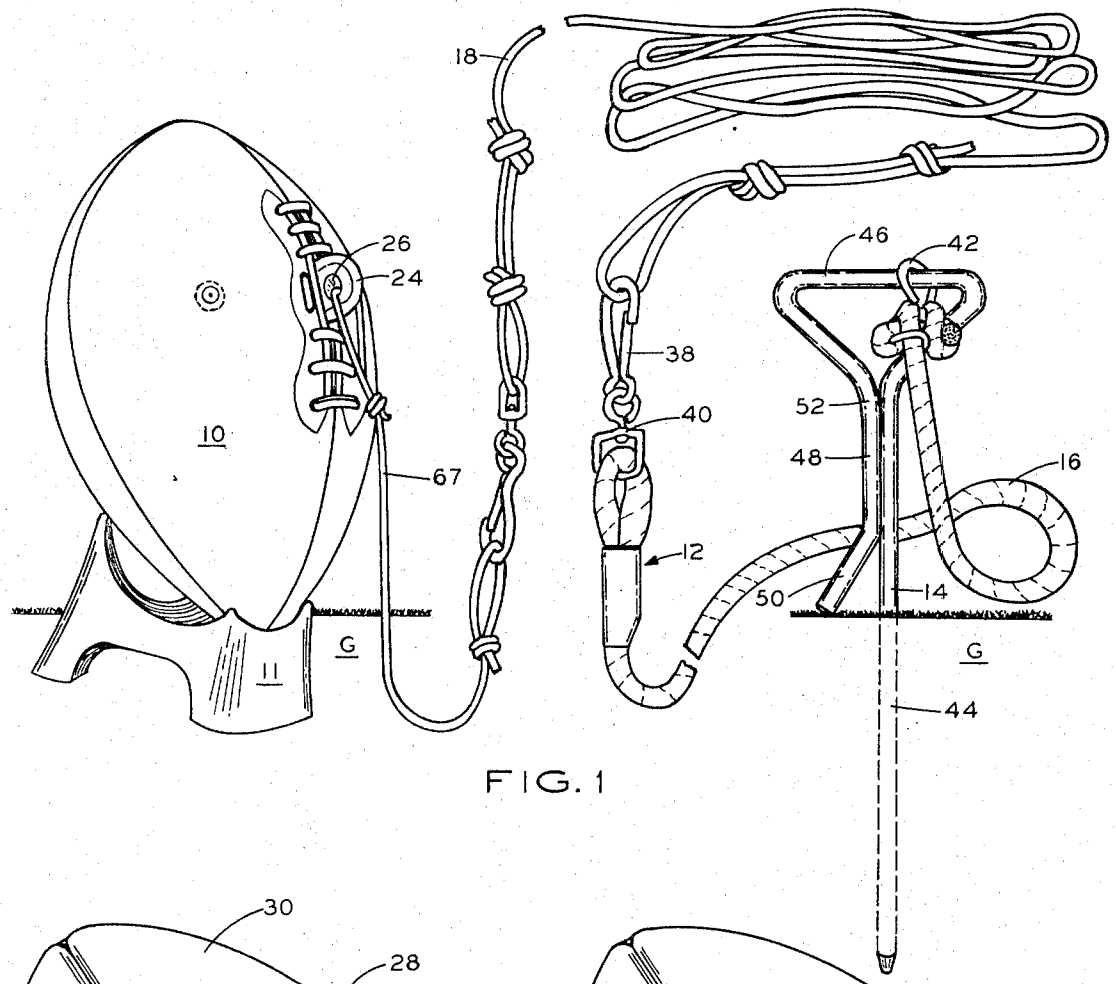



FIG. 1

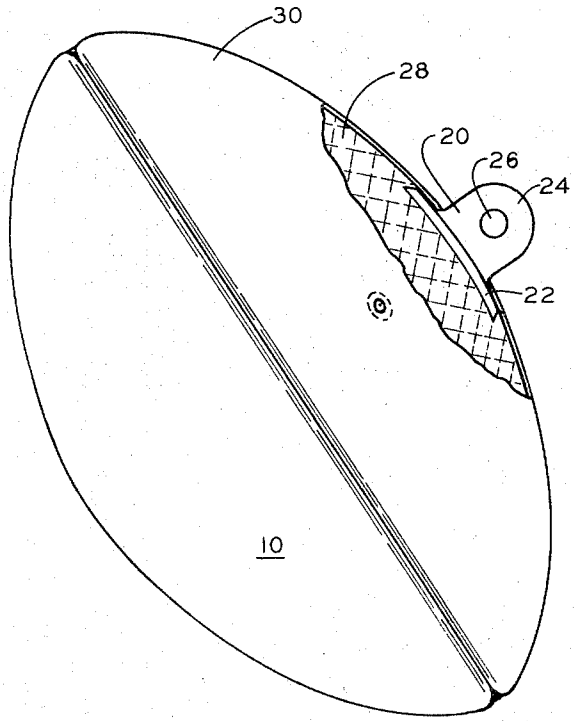



FIG. 2

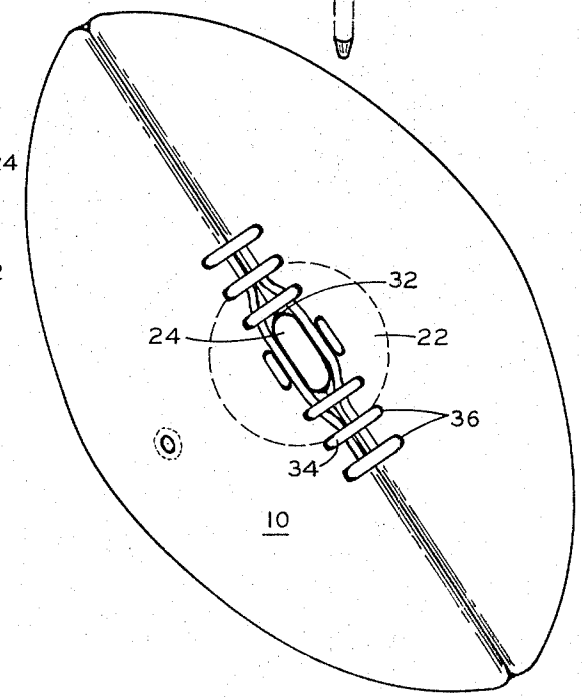



FIG. 3

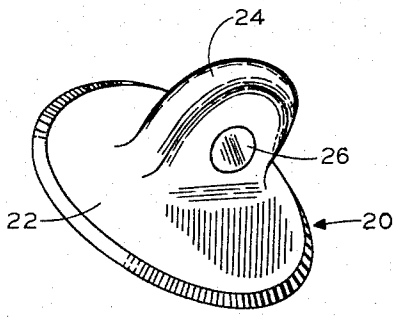



FIG. 4

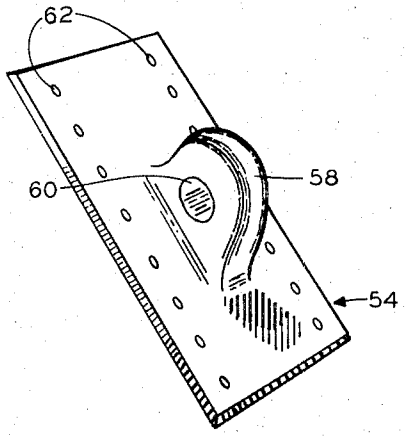



FIG. 5

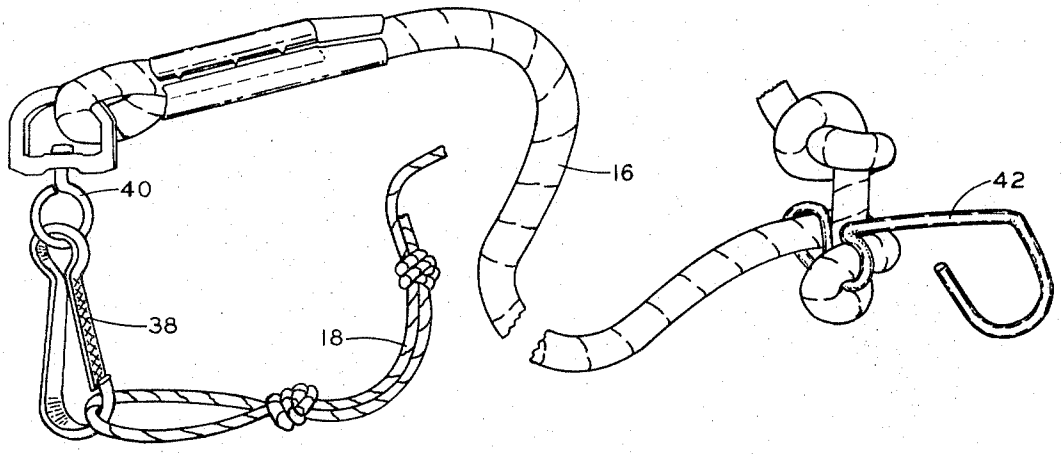



FIG. 6

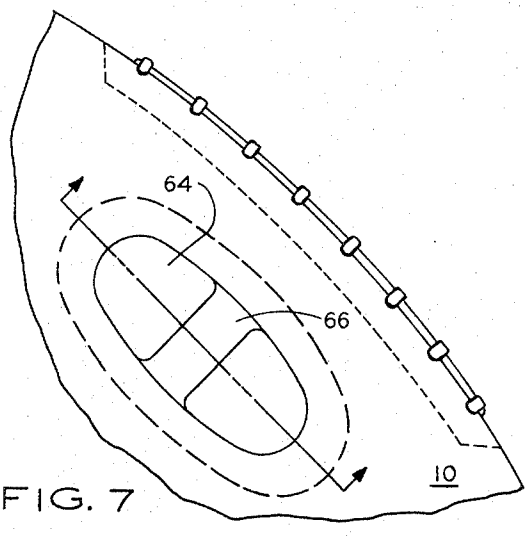



FIG. 7

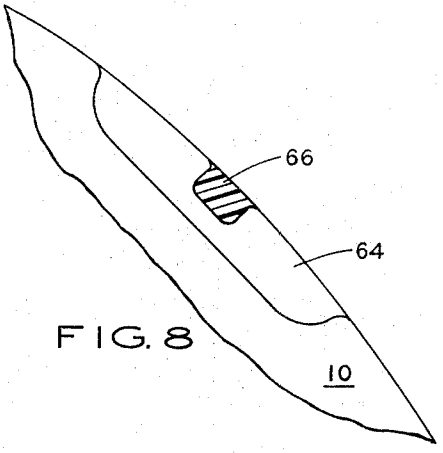



FIG. 8

# KICKING PRACTICE AID

## BACKGROUND OF THE INVENTION

This invention relates to an apparatus for football kicking practice, and more particularly to a device whereby a football will automatically return to the kicker after it has been kicked without the necessity of retrieving the ball.

In the practice of kicking in the game of football it is desirable for a kicker to be able to kick the ball without the necessity of having another party retrieve the ball or having to retrieve the ball himself. Furthermore, it is desirable to perform the kicking in a somewhat confined space indoors when the weather will not permit practice outdoors. A device that accomplishes these objectives should be capable of being set up and taken down quickly and easily and take a minimum of space for transportation and storage but should also be capable of being adjusted to accommodate kickers of different strengths, and be adaptable to different types of kicking, such as the type commonly known as "punting" and "place kicking." Lastly, it should be comprised of elements combined in such a manner that they will not foul or tangle when the ball is kicked.

## SUMMARY OF THE INVENTION

The above objectives are accomplished in this invention by the provision of tether means having a relatively short elastic cord attached to a restraining device such as a stake driven into the ground, and a relatively long non-elastic cord attached at one end thereof to the elastic cord, and at the other end thereof to the football. The non-elastic cord is preferably at least five times as long as the elastic cord. The elastic cord, however, is adjustable to provide an even greater length ratio of non-elastic cord to elastic cord. Preferably at least one swivel is provided to prevent the cords from tangling or fouling due to the rotation of the football after it is kicked.

The invention is made adaptable to an ordinary football by the provision of novel insert means that may be securing in the string area of a football for attachment of the non-elastic cord to the football. Alternatively, insert means may be molded into a molded football. A novel stake that allows for easy and positive attachment of the elastic cord to the stake, and which may be used as a reel for the cord for transportation and storage when not in use is also provided.

## DESCRIPTION OF THE DRAWINGS

FIG. 1 is a perspective view of the apparatus of my invention showing the football in position for a "place kick" and the stake partially driven into the ground.

FIG. 2 is a side view of a football, partially cut away to show the novel insert means for attaching the cord to the football.

FIG. 3 is a frontal view of the football and insert shown in FIG. 2.

FIG. 4 is an enlarged perspective view of the insert means.

FIG. 5 is an enlarged perspective view of an alternate form of insert means.

FIG. 6 is an enlarged view of the tether cords, showing a swivel and the elastic cord-adjusting means.

FIG. 7 is a fragmentary view of a molded football showing insert means molded therein.



FIG. 8 is a sectional view taken along line 8—8 of FIG. 7.

## DETAILED DESCRIPTION OF THE INVENTION

Referring now to the drawing, FIG. 1 shows a football **10** which is attached by tether means, indicated generally by numeral **12**, to a stake **14** which is partially driven into the ground, indicated by the letter G. The football **10** is shown in FIG. 1 in position on kicking tee **11** for a "place-kick." The tether means **12** comprises a relatively short elastic cord **16** and a relatively long non-elastic cord **18**. Cord **16** is preferably one-fourth inch in diameter nylon-covered elastic cord and cord **18** is preferably a No. 3 gauge multifilament propylene woven cord.

The non-elastic cord **18** is securely attached to the football **10** by plastic insert means **20** having a base **22** and a ring **24** surrounding an aperture **26** through which non-elastic cord **18** may be threaded and secured. Insert means, in turn is secured to the football **10** by placing the base **22** between inner bladder **28** and outer covering **30** before the ball **10** is infalted and allowing the ring **24** to protrude through the opening **32** in outer cover **30**. The base **22** of insert **20** may be glued to the inner bladder **28**. The opening is then laced closed by threading strings **34** through opposing rows of apertures **36** which line the opening **32** in the outer covering **30**. The ball **10** is then inflated and the base **22** of insert **20** is firmly trapped between the inner bladder **28** and outer covering **40** of football **10**.

Elastic cord **16** and non-elastic cord **18** are attached to each other by suitable means such as snaffle hook **38**. Disposed between cords **16** and **18** is swivel **40** which prevents twisting of the cords due to rotation of the ball when it is kicked. Elastic cord **16** is secured to the stake **14** by a shock-cord hook **42** which makes cord **16** easily adjustable in length.

The novel stack comprises a post **44**, one end of which is driven into the ground G, the other end of which supports an eyelet **46** to which the shock cord hook **42** is attached. A leg **48** depends downwardly from the eyelet **46** substantially parallel to and in its normal position immediately adjacent a post **44**. Leg **48** merges into a foot portion which extends downwardly and diagonally outwardly from the bottom of leg **48**. The particular arrangement of the foot **50** serves to functions: First, when the stake is driven into the ground it serves as a strengthening member as it partially enters same. Secondly, it defines, along with the eyelet **46** a reel **52** upon which the tether cord may be conveniently wound when the device is not in use. Another advantageous feature of the stake is that the leg **48** may be pulled away from post **44** slightly to allow hook **42** or other fastening means to be easily slipped along let **48** onto eyelet **46**.

In FIG. **5** there is shown an alternate insert **54** having a base **56** and a ring **58** defining an aperture **60**. Base **56** of the insert **54** is lined with parallel rows of apertures **62** which are spaced to correspond to and align with opposing rows of apertures **36** lining the opening **32** in the oute covering of the football **10**. To secure this insert **54** to football **10** the strings **34** are threaded through apertures **62** in the insert when the ball is laced.

When the use of a molded football is contemplated, as shown in FIGS. **7** and **8**, the cord attaching means includes a recess **64** in the ball **10** and a rib **66** extend-

ing across the recess **64** substantially flush with the contour of the surface of the footgall **10** so that no part of the attaching means extends outwardly from the surface of the football. An obvious advantage of this version is the ready interchangeable use of the ball as a part of the apparatus and in an ordinary manner. While the recess and rib arrangement is shown on the side of the football **10,** it may also be provided at the end of the ball to allow the apparatus to be used for passing as well as kicking.

In a molded football an insert such as insert **20** may also be molded into the ball with the ring **24** protruding as in the case of the laced ball (not shown).

In operation, the ball **10** is simply kicked, either off a tee **11** as shown in FIG. **1,** or punted, with the tether means **12** lying loosely on the ground. When the tether becomes fully extended by the flight of the ball, the elastic cord **16** will stretch and snap back abruptly, causing the ball to return to the kicker.

Most satisfactory results are obtained by using an elastic cord about three feet long and a non-elastic cord about 30 to 50 feet long, depending on the strength of the kicker. The tether should be long enough to prevent the ball from returning to the kicker too abruptly, and yet must not be too long for a kicker not to be able to fully extend the cord and sufficiently stretch the elastic cord **16** to cause the ball to snap back to the kicker. With a given length of non-elastic cord, the amount of "snap-back" can be varied for different strengths of kickers by merely adjusting the length of the elastic cord **16.** The shorter the elastic cord, the greater the snap-back. As shown in FIG. **6,** the elastic cord may be shortened by merely sliding the cord through the loops in the shock cord hook.

For indoor use or on artifical turf it would obviously not be feasible or desirable to drive a stack into the playing surface. For such use a bag filled with water or other heavy material may be used as the restraining means instead of a stake.

It should be emphasized that the elastic cord **16** is attached to the stake **14** or other anchoring means and not to the ball. By so arranging the cords, the "snap-back" force of the elastic cord **16** acts on the non-elastic cord **18** as well as on the ball **10** and thereby insures more efficient return of the ball to the kicker.

While the longer cord **18** has been referred to as "non-elastic," it should be recognized that virtually all cords will stretch somewhat when they are used to abruptly arrest the movement of a flying object.

To enable the non-elastic cord **18** to be more easily attached to the football, and to further ensure against twisting of the tether there may be provided a short leader cord (not shown) about a foot or so long and attached to the ring **24** of the insert **20,** and another swivel (the same as swivel **40**) between the leader cord and the non-elastic cord. A second snaffle hook (the same as hook **40**) may also be provided to enable the non-elastic cord to be easily snapped onto a loop in the leader cord in the same manner that the elastic cord is attached to the non-elastic cord as shown in FIGS. **1** and **6.**

While there has been described a preferred form of kicking apparatus in accordance with the invention, it will be appreciated that many changes and modifications may be made therein without, however, departing from the essential spirit of the invention.

I claim:

**1.** An apparatus for football kicking practice comprising a football; tether means having an elastic cord and a non-elastic cord, said non-elastic cord being adapted to be attached at one end thereof to said football and at the other end thereof to one end of said elastic cord; a stake for restraining the other end of said elastic cord when said football is kicked, means for attaching said non-elastic cord to said football, said stake comprising a post, one end of which is driven into the ground, the other end of which supports an eyelet to which said elastic cord is attached, a leg depending downwardly from said eyelet parallel to said post, and a foot portion extending diagonally outwardly from said leg portion, said eyelet and said foot portion defining a reel upon which said cords may be wound when said apparatus is not in use, and said leg being slightly resilient to allow one end of said elastic cord to be easily slid over said leg onto said eyelet to securely attach said tether means to said stake.

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