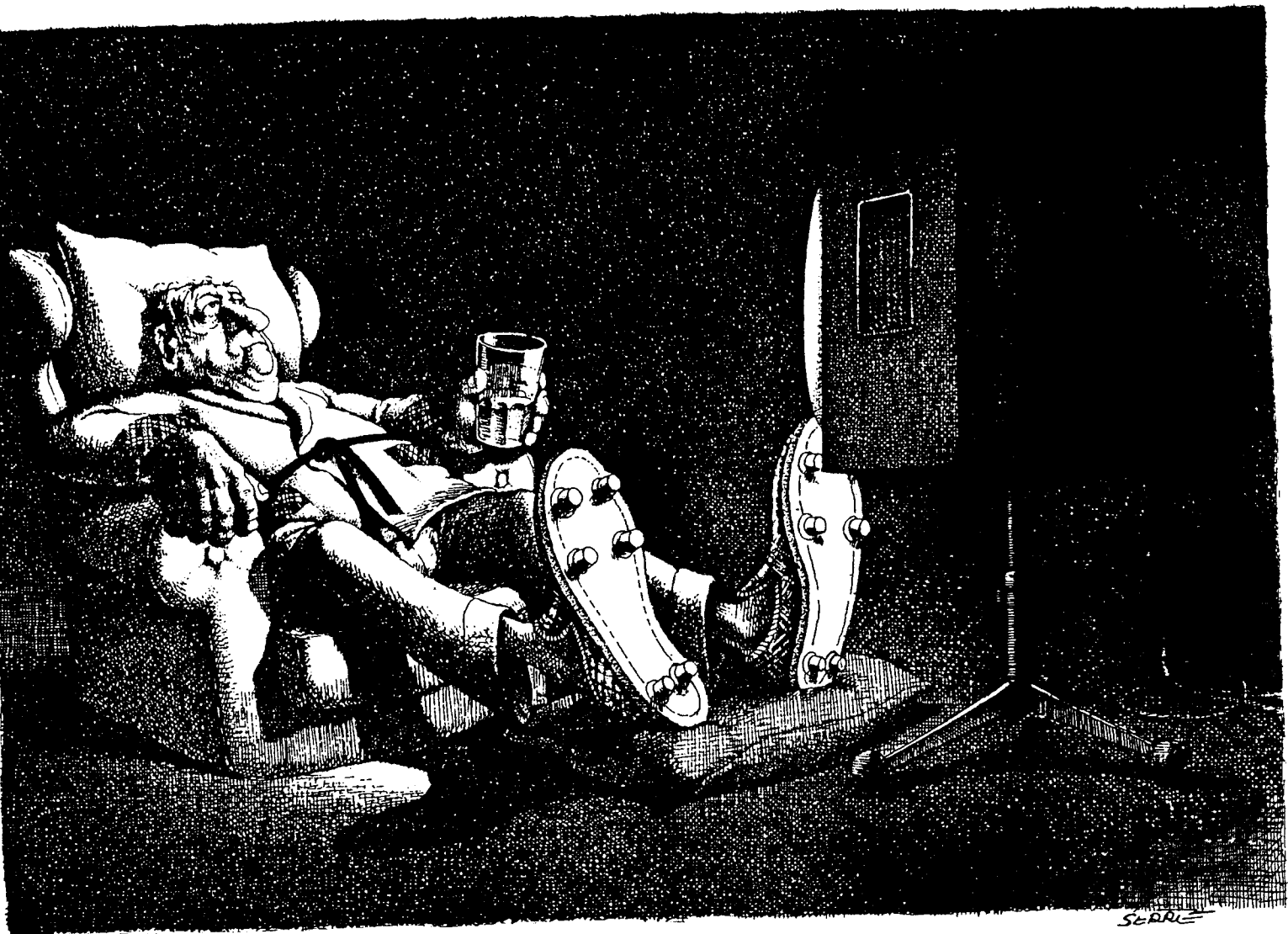


G. Stroink "Superball Problem",  
*The Physics Teacher*, Oct. 1983, 5. 466.

## ZAHL DES TAGES

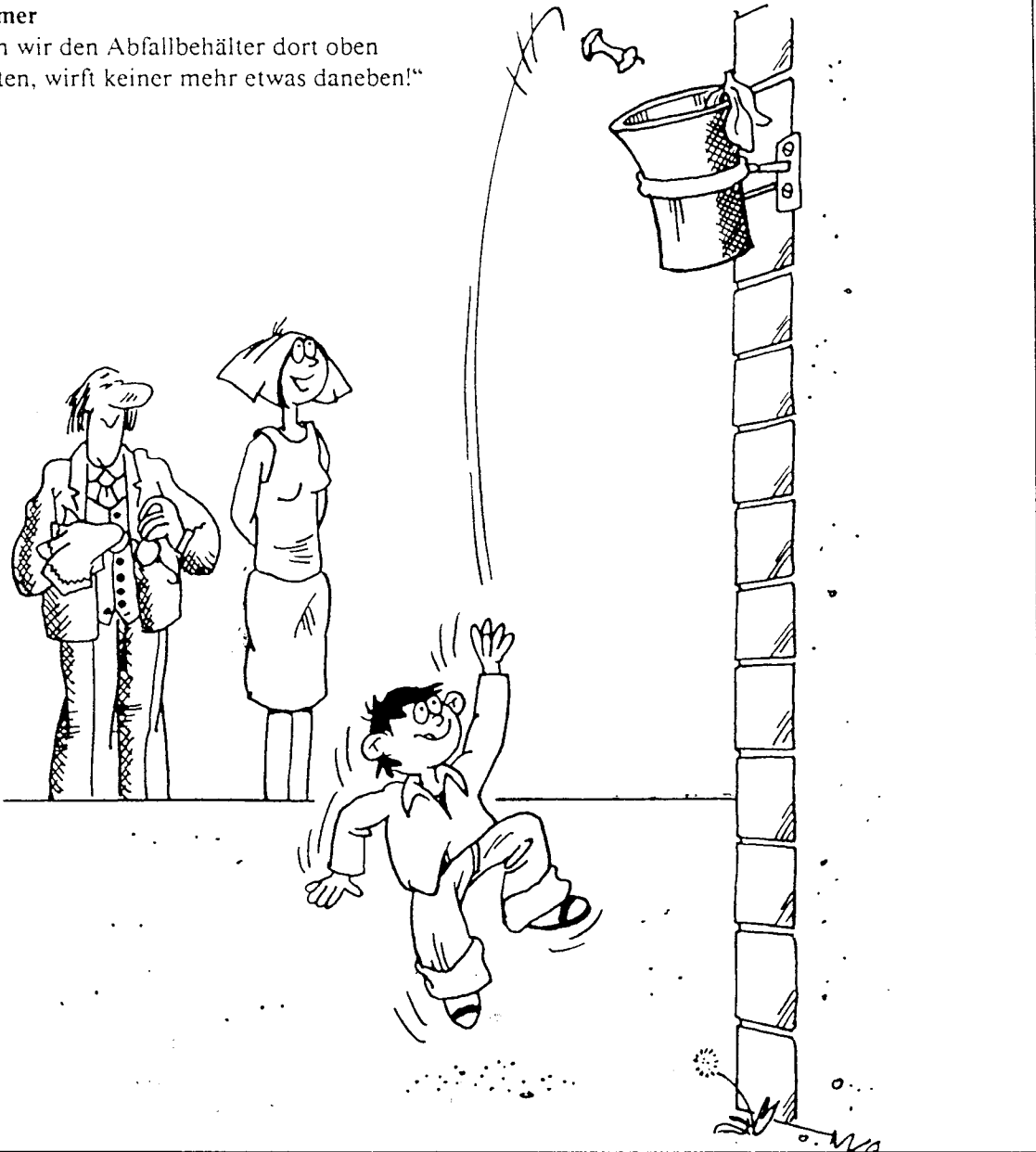
### 103

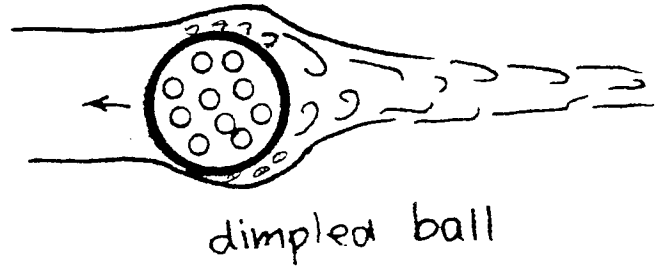
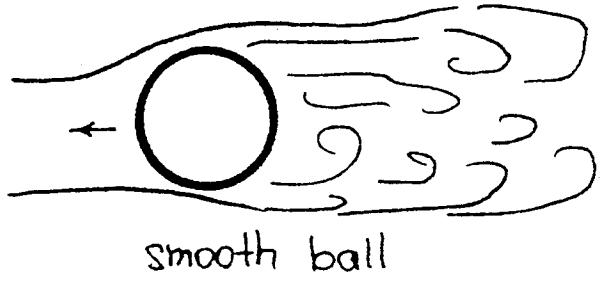
■ **Kopfballungeheuer.** Die US-Wissenschaftlerin Adrienne Witol untersuchte 60 Fußballspieler im Alter zwischen achtzehn und neunundzwanzig Jahren hinsichtlich ihres Intelligenzquotienten. Das Resultat: Gute Kopfballspezialisten (103) sind weniger intelligent als der Kicker-Durchschnitt (112). Der Grund: Durch den häufigen Aufprall des Balles auf dem Kopf mit Geschwindigkeiten bis zu 110 km/h werden mikroskopisch kleine Schäden in den Gehirnzellen verursacht.



**Abfalleimer**

„Seitdem wir den Abfallbehälter dort oben anbrachten, wirft keiner mehr etwas daneben!“





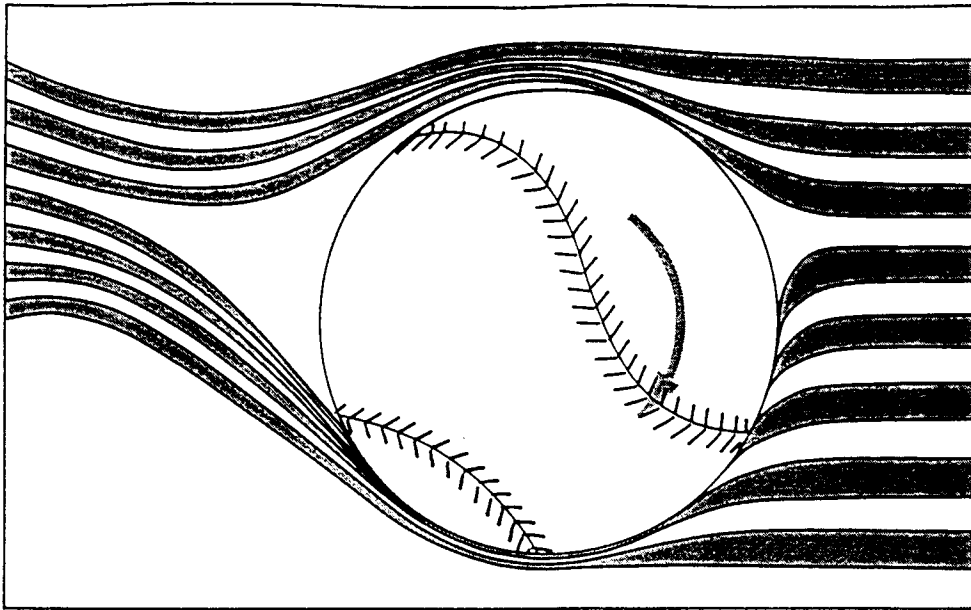
Asus 'Photon' No. 40, June 1981,

## THE DYNAMICS OF A GOLF BALL.<sup>1</sup>

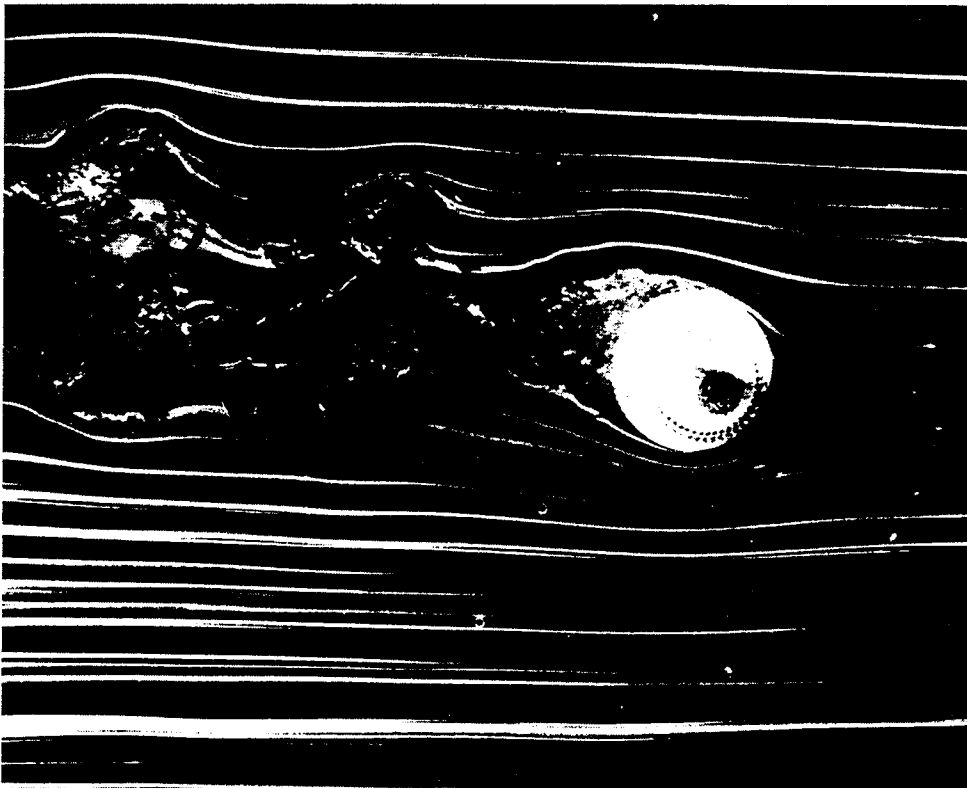
It is spin which accounts for the behaviour of a sliced or pulled ball, it is spin which makes the ball soar or "dook," or execute those wild flourishes which give the impression that the ball is endowed with an artistic temperament, and performs these eccentricities as an acrobat might throw in an extra somersault or two for the fun of the thing. This view, however, gives an entirely wrong impression of the temperament of a golf ball, which is, in reality, the most prosaic of things, knowing while in the air only one rule of conduct, which it obeys with unintelligent conscientiousness, that of always following its nose.

<sup>1</sup> Discourse delivered at the Royal Institution on Friday, March 18, by Sir J. J. Thomson, F.R.S.

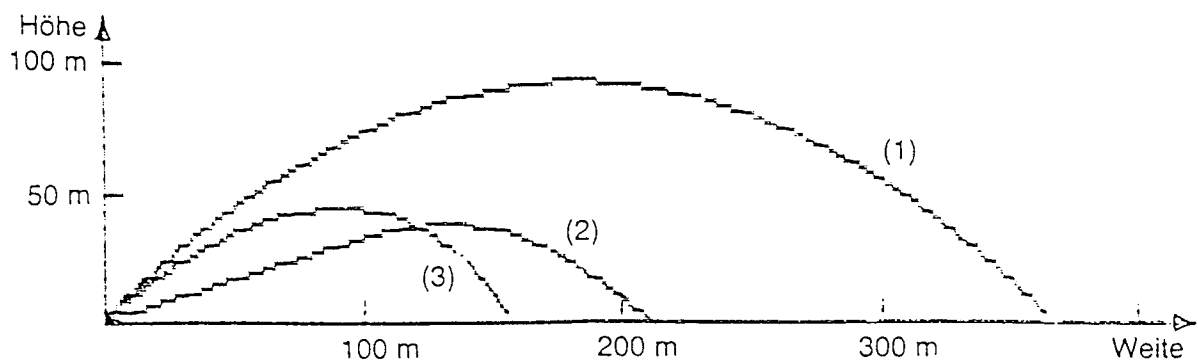
1310



*Spinning clockwise in a wind tunnel, a baseball disrupts the flow of smoke streams injected from the right. The stitches on the ball pull a thin layer of air around with them as they spin. This spinning layer causes more air to flow around the bottom than the top. The bottom air travels faster and thus makes the air pressure on the bottom of the ball lower, pushing the ball down. (Top- © Flash Fleischer. Bottom- © Prof. F. N. M. Brown of University of Notre Dame)*



*"Newton at the Bat", E. W. Schnire, W. F. Allman (Eds.)  
C. Scribner's Sons, New York, 1889.*

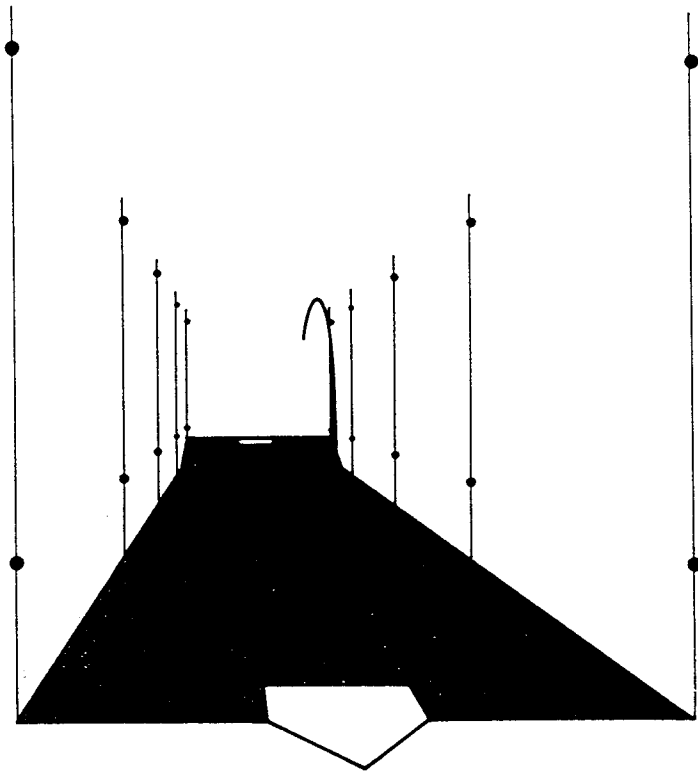
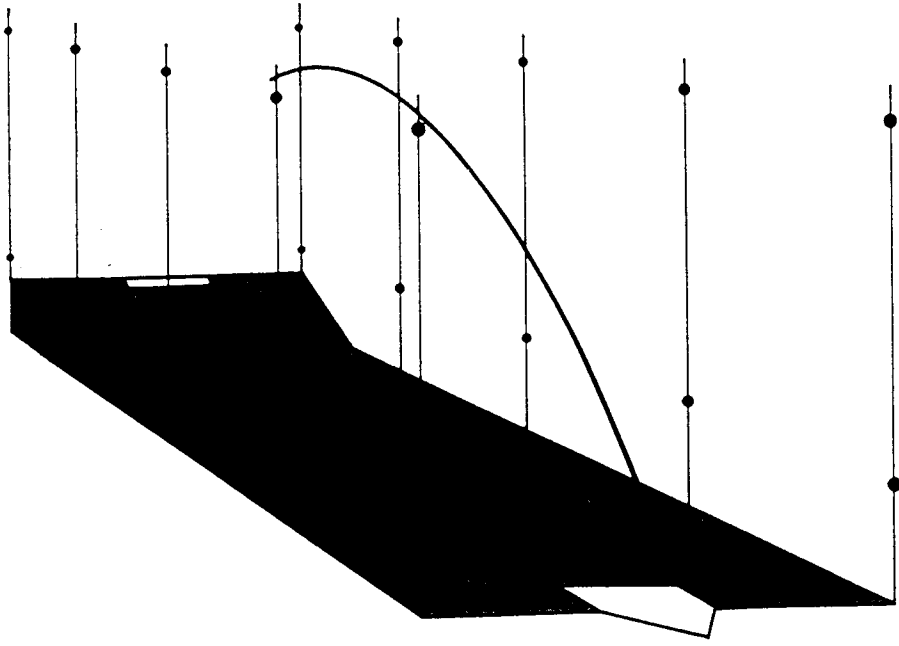


(1) ohne Luftwiderstand, (2) mit Luftwiderstand und Auftrieb, (3) mit Luftwiderstand.

Die Maximalwinkel sind <sup>1</sup>a)  $45^\circ$ , <sup>3</sup>b)  $39^\circ$ , <sup>2</sup>c)  $15^\circ$ .

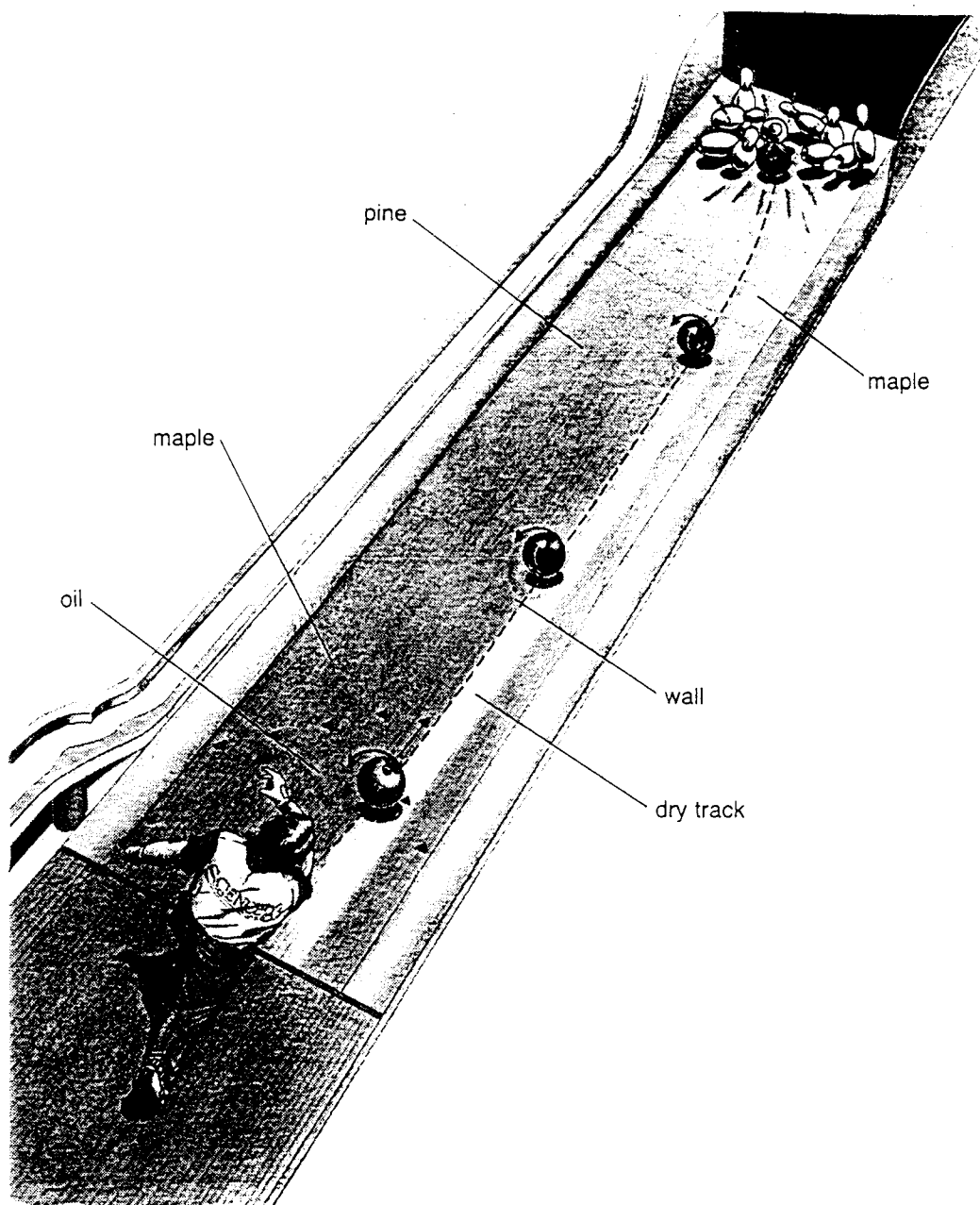
L. Mathelitsch, • Aufgabebuch 1;  
bnt, Wien, 1990.





Once photo analyst Jim Walton gathered the data from the photographs and fed it into a graphics computer, he could reproduce McGregor's curve from any viewpoint in any direction. When viewed from the stands, top, the curve seems much tamer than when looking down the "tunnel," bottom, as a right-handed batter would. (adapted by Flash Fleischer)

'Newton of the Bat', E. W. Schnier, W.F. Allman (Eds.)  
Ch. Scribner's Sons, New York, 1984.



A bowling alley is made of maple at both ends and pine in the middle. The first fifteen feet of a lane is coated with oil so that the ball slides instead of rolls, thereby conserving its spin. As the oil tapers off, the gripping action of the pine makes the ball begin to roll. When the ball hits the last part of the lane, an oil-free area known as the "rug," the combined spinning and rolling cause the ball to curve into the pocket. Because each ball picks up oil as it rolls, it creates a track of dry wood on the lane. If a ball is thrown along the oil at the edge of this track, above, and begins to drift, the friction of the dry wood makes it hook back and follow the wall of oil down the lane. The American Bowling Congress says Glenn Allison had the advantage of such a wall on the far right side of the lane when he bowled his recordbreaking 900 series. Unscrupulous bowling alley owners sometimes put an extra-thick layer of oil down the middle of their lanes to produce a guiding wall and boost the scores of their clients. (© Robert A. Soulé)

*Newton at the Bat*, E. W. Schnie W. F. Allman (Eds.)  
 G. Scribner's Sons, New York, 1984.