RESEARCH QUARTERLY

19 to 45, the winners of the 500-mile race are most frequently from ages 25 to 29 inclusive.

Since the year 1911 the American Automobile Association, governing body of all sanctioned races in the United States, has used a point system for ascertaining the national driving champion for each season.² Points are awarded for the position in which each man places in the different speedway races of the year, and the national champion is thus determined. Analysis of the data reveals that, of the 23 National Auto Champions that have been selected to date, fifteen (65 per cent) were from ages 27 to 30 inclusive at the time they won national honors.

BOWLERS

In Figure 9 the solid line sets forth data for 238 bowling champion-ships, including individual events, two-man events, five-man events, and all-events.* Since some of the bowlers won more than one kind of bowling honor, the number 238 should not be taken to imply that data are presented in Figure 9 for 238 different individuals. The dash line in Figure 9 reveals the chronological ages at which 58 individual events, and all-events were won.†

It will be noted in Figure 9 that the solid line is relatively flat at the top, whereas the dash line is much narrower. This difference in the shapes of these two curves illustrates a significant fact, namely, that the shape of a performance age curve is a function not only of type of behavior; it varies also with the excellence of the performance. For example, in Figure 9, the dash line presents data for the best individual performance. The solid line, on the other hand, presents data for both individual performance and team performance. In assembling a bowling team, it is usually necessary to include as team members individuals who are not equal in skill to the best performer on the team. It seems obvious that the best individual performers are likely to demonstrate their full merit only when they perform singly. If the foregoing hypothesis be valid, the dash line in Figure 9 reveals that the most skillful individual performance in bowling is likely to occur at ages 30 to 34 inclusive. For team performance, that does not usually reach such a high standard of excellence as does the most outstanding individual performance, the peak of the age curve is less clear-cut. In other words, team success at bowling seems to be attained over a wider age range than does individual success.

RIFLE AND PISTOL SHOOTERS

The Executive Vice-President of the National Rifle and Pistol Association assembled and forwarded complete information, including the birth dates, of 307 marksmen who, collectively, had won 630 local,

^{*} For data regarding the bowlers, the writer is indebted to Mr. E. H. Baumgarten, Secretary of the American Bowling Congress.

[†] In Figure 9 both age curves make allowance for population differences at the various age levels.