Winter Kill of Putting Greens
By Peter Lees.
(Formerly of Mid-Surrey, Richmond, England)

To a great many Green Committees, "Winter Kill" of putting greens is a very serious matter and one which has to be faced to a greater or less extent every Spring. Putting greens of the punch bowl variety, those that are situated on low-lying ground where drainage is poor, are especially apt to get this "Winter Kill." Drainage, undoubtedly, is the solution of the question.

Whenever such conditions prevail, steps should be taken at once to get rid of the water so that it will not remain and freeze on the surface of the green. Even if it should not be cold enough to freeze, it should not be allowed to remain on the greens during the cold months, as it is most injurious to the grass.

Opinions naturally differ as to the best means of overcoming this difficulty, and the suggestions which follow should be understood to be methods which I have found from experience will give better results than any others which I have tried. There are, of course, many other good ways of arriving at the same result.

As has already been pointed out, the key to the situation is drainage—surface drainage pure and simple. My first suggestion is to put in a number of "soakaways," which may vary in number with the conditions which prevail. These "soakaways" should be placed so that they will draw the water from a certain area around them. They should be about four feet in diameter and, say, ten feet deep. There is no hard and fast rule regarding the size of these "soakaways" and the greenkeeper should be able to judge just what is required for each particular green. The "soakaways" should be filled to about ten inches from the top with either gravel or ashes, the latter being best, and the remaining space filled with topsoil and the turf replaced.

Usually there is no play during the bad weather when conditions similar to the above prevail, and if so, I would suggest that a part of the turf and topsoil be removed so as to give the water all possible chance of disappearing rapidly, replacement being made in the Spring. I have found this remedy to work very well.

Another way is to drain the green, herring-bone fashion, with a main drain running into a "soakaway" placed at some convenient spot outside the putting green. Four-inch agricultural drain pipes are used and covered over with ashes, the pipes being placed ten inches below the surface. Open the ground here and there on the drains, as in the way I pointed out in the case of "soakaways."

Where the level of the ground lends itself to direct drainage "soakaways" can be dispensed with altogether and the water drained into an open ditch, lake, or low-lying part of the course.

In conclusion, I wish to bring out very strongly the necessity of getting rid of the water at once and do away with any possible chance of it accumulating on the surface. I think if either of the foregoing suggestions were carried out in a systematic manner the question of "Winter Kill" would rapidly disappear, much to the relief of Green Committees and greenkeepers alike.

Golf Course Critics and Cranks
Golf Architecture
By Leonard Macomber.

The critics of golf courses are numerous. Every club swarms with them, and those who know the least usually talk the loudest.

There is the "length" crank for whom no hole is fit to play which is not one full short, or two, or three, as the case may be. Then there is the "perfect lie"