

The turf on our green is red fescue, with some German bent, resulting from last fall's reseeding.

The only further suggestion we have to make is that it would be better if the application were made quite early in the spring so that the burned grass would have a chance to recover before the arrival of players. We are preparing to repeat the experiment about September 1, on another green infested with chickweed, as we believe we will then get quicker results from the reseeding. With spring seeding, in our latitude, we can not expect the seed to germinate before May 1.

It might be of interest to note, in this connection, that we did not observe that any other weeds, nor any coarse grasses, were killed by the chemical. I would state also that our application was made on a bright, clear day, which was followed by a spell of similar weather, a condition undoubtedly favorable for the action of the chemical, which otherwise might have been hindered in its effectiveness by the falling of rain.

Brown-Patch

LYMAN CARRIER

Brown-patch made its appearance here at Washington on May 27, and about the same time we had reports of it from Toledo, Chicago, and St. Louis. Greenkeepers should be on the alert to recognize these brown spots when they first appear, and apply the remedy—Bordeaux mixture.

As soon as we discovered the trouble, we got out the gun and dusted the entire grass garden except where we expect to experiment with different methods of treatment for this disease. At the time of this writing (June 2) there has been no additional spread of the affected spots and no evidence of new points of infection.

It is surprising how easy it is to apply this powder when one has the proper equipment with which to do the work. With either the dust gun or the wheelbarrow duster the time required to treat a green need not exceed five minutes, and the expense for materials is negligible. Bordeaux powder costs us in one hundred-pound lots 10 cents a pound, and when applied with a dust gun, one pound appears to be ample for an average-sized green. There does not seem to be much choice between the dust gun and the wheelbarrow duster for applying the powder. It might be said that the wheelbarrow duster applies the powder more evenly, and the dust gun more thoroughly. Such a statement needs explaining. The wheelbarrow duster drops the dust directly onto the turf in an even manner, and as the hopper is twelve feet long, it covers a wide area. The dust gun, with the aid of a gentle breeze, will cover a still wider strip but the powder is deposited in a heavier layer near the operator than it is a few feet away. This, however, is not a serious fault so long as there is a sufficient covering of the dust at all points to prevent the fungus from getting in its deadly work. There is a tendency for the wheelbarrow duster to drop the powder in little pellets, which is not so desirable as having a complete dust covering all over the blades of grass. In dusting orchards, small fruits, or fields of cotton, it has been found satisfactory to blow a cloud of dust into the air and let it settle where it will on the foliage.

We believe it is best to dust when there is dew on the grass or immediately after watering. Under such conditions the powder sticks to the leaves better than it does if everything is dry.

With either the dust gun or the wheelbarrow duster it is necessary, in order to do a satisfactory dusting, to have the powder absolutely dry. Freshly made Bordeaux dust is nearly white in color, and it will remain that color as long as it is free from moisture. But if it stands exposed to the air, especially in rainy weather, it will absorb moisture, which is evidenced by the white anhydrous copper sulfate taking on the characteristic color of blue-stone. It then becomes pasty and is likely to gum up the feeding apparatus. It has been found that the wheelbarrow duster works best when the hopper is full of the powder and the operator walks at a rapid pace, thus giving a decided jar to the machine.

Watering Putting Greens

A Discussion

Here's what some of the fellows believe about watering putting-greens. Most of them have had long experience.

My belief is that the best results are obtained by saturation, provided greens are properly drained. Twice a week is sufficient, and even three times in the driest weather would do no harm. Sprinkling keeps the roots so near the surface they are more likely to be affected by the heat of the sun. I favor watering very late in the day, but would prefer to have it done at night, if possible.

JAS. L. TAYLOR,

The Elkwanok Country Club, Manchester, Vt.

In regard to watering greens, we find that with good sprinklers and plenty of pressure we get very satisfactory results. We water always after sundown.

F. C. ARMITAGE,

Toronto Golf Club, Long Branch, Ontario.

In considering the question of sprinkling putting-greens, climatic conditions should, of course, be taken into consideration. Seaside golf courses enjoy conditions of moisture which do not prevail in the plains states west of the Mississippi river. As you are, of course, aware, we in this territory experience long and severe droughts during midsummer, and we have found by practical experience that in order to keep our greens soft and thoroughly saturated with moisture, it is necessary during periods of dry weather to sprinkle them every other night.

We employ a man who comes on duty at 5 p. m. and works until 1 o'clock the following morning. He is able properly to look after the sprinkling of nine greens each night. This enables us to sprinkle each green three times a week, no work being done Sunday night. The results obtained have been very satisfactory, the ground being thoroughly wet to a depth of two or three inches. This keeps the surface soft so that a ball pitched onto the green holds.

We have experimented with various types of sprinklers and have come to the conclusion that the only proper way to sprinkle the greens is by means of a rotary sprinkler with a standard 4 or 5 feet high with two revolving arms which distribute the water vertically upward in a very fine spray-like mist. Water so distributed comes as near a natural rain as any method that can be employed, and this certainly is the object to be attained. Any sprinkler delivering the water close to the ground or which has some of the outlets pointing horizontally or down, tends to wash the soil away from the roots of the grass, which of course is bad.

The temperature of the water is an important factor. Water from deeply driven wells or artesian wells is usually too cold. We take water from a large lake in front of the club house, and the water in the lake during the sprinkling season runs from 50 to 70 degrees. Some clubs, where they are obliged to use cold well water, first pump the water into an outside basin or artificial lake and then repump it, after it has become warm and aerated.