

gen. The nitrogen in the stems varies from 2.0 to 3.0 percent; in the stalks from 3.0 to 4.0 percent; and in the dust from 2.0 to 2.5 percent. Phosphoric acid is usually present in small amounts running between 0.5 and 1.0 percent. Potash occurs in the stems in amounts ranging from 5.0 to 10.0 percent, and in the stalks in amounts ranging from 4.0 to 5.0 percent. Tobacco waste is sometimes burned and the ashes used as a fertilizer. Such ashes are rich in potash but the nitrogen is lost. When ground fine tobacco waste is a valuable source of nitrogen where immediate availability is not required.

A few golf courses have reported good results from the use of tobacco waste as a fertilizer. Unless it can be purchased at a reasonable figure its use is not advocated. The nitrogen is of course beneficial to turf grasses but ordinarily the potash is not required, at least in such amounts, and furthermore, it may have a tendency to increase the weed problem.

Seaweed.—Seaweed is highly regarded in the Coast States as a source of potash for certain cultivated crops. The different kinds vary in fertilizing constituents. Some are relatively high in nitrogen and others in potash. It has been said that one load of manure is equal to two and a half loads of fresh seaweed or one and three-fourths loads that have lain in a pile for a month. Seaweed may be used to advantage in the compost pile when it can be obtained for the cost of carting provided the distance is not too great. Decomposition may be hastened by mixing with some manure and ammonium sulfate.

Velvet Bent at the Mountain Ridge Country Club, West Orange, N. J.

By A. D. Burton, Greenkeeper

A few years ago the Mountain Ridge Country Club decided to build nine new holes and remodel the old ones. At that time bent seed was not obtainable so the greens were sown with a mixture and with the idea in mind of getting bent into them later.

The architect had a nursery prepared, and as the old fairways and rough had a lot of velvet bent in them, sod was taken from these and planted in the nursery in rows about four feet apart. We had a hard time in selecting our stock on account of the men being unfamiliar with grasses, and as much of the selection for the nursery could not be supervised all kinds of grasses such as redtop, red fescue, and rough-stalked meadow grass were planted with the bent.

At that time I was working for the architect but when we finished construction I was retained by the club as Greenkeeper so the care of the nursery came under my charge.

I had a new plot of ground prepared for which additional selections were made. These stolons were planted and covered as advised by THE BULLETIN and that fall we had about 8,500 feet of nursery planted to all kinds of velvet bent. Later many of the coarser varieties were weeded out and the plot kept mowed down to nearly putting green length. This turf was fertilized with ammonium sulfate in May, June and July, and was a nice piece of turf.

That fall we planted 13,000 feet more which grew well with the exception of that planted late in the season. For this planting the selection of bent to be used was made entirely by myself.

The sod from the oldest nursery was used to patch greens and also in enlarging one green.

Last fall I lifted the turf of mixed grasses from the No. 10 green as I was not satisfied with the soil condition. I found three inches of humus under the turf so I dug it out and dumped it on a compost pile to be used later in topdressing. This green was then sodded with velvet bent from the two-year-old nursery but it was necessary to finish the job with sod from the second nursery which was only one year old.



The tenth green at Mountain Ridge C. C. This green is composed entirely of velvet bent



Another velvet bent green, the fourth, at Mountain Ridge C. C.

The No. 4 green, where humus was also discovered and removed, was also sodded with velvet bent from the second nursery, but in this case the work was done so late in the fall that the temperature was

below freezing at night. This job was finished on November 28. The turf came through the winter well but required a lot of rolling in the spring to get it level enough for a putting surface.

No. 10 green, which is of sod three years old, two years in the nursery and one year on the green, was fertilized with a total of 112 pounds of ammonium sulfate from May through September and top-dressed four times. It has never had brown-patch, nor has No. 4.

In growing velvet bent it is possible to get turf by planting pieces of sod, but they must be small and closely planted because they thicken out in clumps and do not spread rapidly.

Velvet bent makes a beautiful sod of even texture and a better putting surface than creeping bent, does not require so much top-dressing, nor does it throw out runners on top of the green like the coarser types of creeping bent but thickens out into a fine carpet.

At the recent meeting of the Green Section in Washington discussion arose as to velvet bent's ability to heal. I would like to say that that depends on the operation. I have a man patching my greens who makes a very neat fit. Careful watering is required after patching. If this is done it heals as quickly as any other grass. Sometimes the plugs that are put back when the holes are changed are scarred. That is caused by the men filling the hole too full and then pounding away at the plug. This, of course bruises the turf, and then you have a scar. The same thing happens if your plug is a little too high for the mower will scalp it but if care is taken to make a neat patch the trouble is overcome.

On three of our mixed bent greens brown-patch attacked the coarser bent this summer most seriously, which explodes the theory that these coarser strains are less susceptible than the velvet bents.

We have not lost any velvet bent by winter kill.

In our section, northern New Jersey, I find velvet bent rather slow in making a start, but as the warmer weather approaches it comes along well and continues to do well although crab grass will invade it to some extent and must be weeded out.

I have some velvet bent which reseeded itself in the nursery. It is growing well and if it continues to do so I will develop it separately.

NOTE.—We have seen the two velvet bent greens of which Mr. Burton speaks in this article and can vouch for the beauty of their turf. While they are not of a single strain of velvet bent in either case, they are composed of plants so well matched in color that the general effect is one of uniformity. Plants of a dark bluish green color have been selected for these greens.—EDITORS.

Selection of Course for Walker Cup Matches, 1928

H. H. Ramsay, Secretary of the United States Golf Association, announces that the Executive Committee, assuming that the Walker Cup competition will be held in 1928, has selected the Chicago Golf Club at Wheaton, Ill., as the course for the competition. The committee received an offer from the Bob O'Link Golf Club of Highland Park, Ill., for the international matches but the competition was finally awarded to the Chicago Golf Club, which is one of the charter members of the United States Golf Association.

This is the first time that the Walker Cup matches have been played away from the Atlantic Coast and the golfers of the Chicago district are keenly interested in the event.