UNITED STATES GOLF ASSOCIATION GREEN SECTION



Southwestern Office

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COLLEGE STATION, TEXAS

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Southwestern Turfletter

BEARD

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YOU COULDN'T FIND A BETTER TIME....It becomes more important this year to do a good job of winter clean up around the course. Most areas suffered an extremely hot summer and many trees and shrubs were either completely lost or severely damaged by the high temperatures. Those that survived need attention. Dead limbs and branches should be pruned by making clean cuts close to the trunk of the tree. A long stub may rot and later cause the decay of the tree or be attacked by insects. Wounds which are larger than a square inch in area should be dressed with a high quality roofing asphalt, shellac or other suitable wound dressing material to hasten healing and reduce the possibility of decay. Of course, those trees that did not make it should be removed and replaced now. Your local nurseryman should be able to suggest the best species for your area. Don't overlook the importance of trees on your course. Wherever possible, use evergreens as they will cause no leaf raking problem in the fall.

FERTILIZER IS IMPORTANT...People will always be faced with the problem of wanting to buy more things than they can afford. The wife wants new living room furniture and you absolutely need a new "over & under" shot gun. Of course, the same holds true for the golf course, only in a different way. Membership interests vary and there are always more places for the money to be spent than there is money available. When it comes to matters pertaining to the golf course, you're the man who must recommend so much for new equipment, re-designing of holes, water and irrigation increases, fertilizer, new grasses, insecticides, fungicides, soil conditioners and amendments, and so on. Embarking upon a new program of course improvement, it is easy to be carried away and cut corners by saying "Well, we can get by for one year with less of this and less of that." This reasoning process occurs every year and often works out all right. Nevertheless, as superintendent, there is one item in your budget

that you should never cut back on; one item which should always be on the top of your list - are we thinking of the same one - it's fertilizer! That's it - second to none for turf maintenance from Maine to California. Of course water is necessary; new equipment important; good soil condition, insect, disease and weed controls are all vital factors. But when your fertilizer budget is reduced in favor of some other item you are losing the best tool you have in providing good turf for good golf.

GYPSUM AND THE WINTER SCHEDULE...Back in September an article appeared in your South-western Turfletter on Gypsum and its use on soils that are high in sodium. Gypsum tends to neutralize extremely alkaline soils such as those of West Texas and New Mexico. Now that late fall or early winter is upon us - the suggestion still stands that an application of 150 to 250 lbs. of high grade gypsum per 1000 sq. feet will help those who have soils as described above. Try a small test plot this year and apply now.

SOIL TESTING - PRO OR CON Where do You Stand?

The value and accuracy of testing soils has always been a controversial subject. It came up at a recent get-together and perhaps you have wondered about some of these same points:

Question: It seems to me that most soils men from our State Colleges leave the impression that soil testing is a waste of time. What is the Green Section's stand on this?

Answer: Perhaps you have misunderstood the meaning of men from the State Colleges who have commented on soil testing. Certainly, soil testing is not a waste of time, though it is subject to many faults in the way of interpretation of tests. The Green Section recommends periodic soil testing because it is believed that this is desirable in keeping up with the needs of your turf.

Question: How accurate are soil tests? Are the rapid tests sufficiently accurate, and what are the difficulties as far as accuracy is concerned?

Answer: Laboratory soil tests are quite accurate and even rapid soil tests are accurate enough to give good indications of soil nutrient status. However, all of the tests depend upon the use of an extraction agent for determining the amounts of the various nutrient elements available for plant growth. These extraction solutions are supposed to extract the same amount of nutrients that are available to the growing plants. Naturally, these extracting agents never have exactly the same "extracting ability" as the plants. Therefore, the soil tests must be coupled with long experience and correct interpretation before we can place complete reliability in them.

Question: I've been told that the test for nitrogen is of no real value. Is this true and, if so, why?

Answer: The tests for nitrogen are of questionable value. This does not come from the difficulty in measuring the amount of available nitrogen present but from the fact that the soil will change from day to day. Much of the nitrogen in the soil is contained in an organic form, or in a form not available to plants. Nitrification proceeds in the soil as a result of bacterial activity and therefore more nitrogen is becoming available all the time. Ordinarily plants will use this nitrogen

as it becomes available or it will leach out of the soil. If you sample the soil on any given day you might find a relatively small amount of available nitrogen present. However, if you took a sample of that soil and stored it for two days you may find considerably more nitrogen present. If the soil were stored in a can for a week in a warm place where nitrification could proceed, you would find much more nitrogen in the soil. Therefore, the figure for available nitrogen does not give a real indication of the nitrogen status of the soil. Fortunately, turf is an excellent indicator of the amount of nitrogen present and it is quite easy to see when turf is in need of nitrogen. It will be pale green in color and will grow rather slowly when nitrogen is low. On the other hand, when sufficient nitrogen is present, it will grow rapidly enough to require frequent clipping and the color will be good.

Question: If nitrogen cannot be tested for accuracy - how can phosphorus and potassium? They're all elements.

Answer: Phosphorus and potassium are generally present in the soil in a different state than is nitrogen. A large part of the nitrogen in a soil is present in an organic form, whereas in most soils phosphorus and potassium are present in mineral form. Phosphorus and potassium do not depend completely on a process of bacterial activity to become available; therefore, the phosphorus and potassium status of a soil does not change nearly so rapidly as does nitrogen.

Question: How long has soil testing been going on?

Answer: Soil testing was conducted as early as 1845 in England by Daubeny. He used carbonic acid as the extracting meagent.

LOOK FOR MORE Q & A'S ON SOIL TESTING LATER

MEET ME IN ST. LOUIS - LOUIE....Superintendents and their chairmen should make their plans now for the trip to St. Louis and the 26th National Turfgrass Conference and Show. The dates are January 16 through 21, Hotel Jefferson, St. Louis, Missouri. Further information may be obtained by writing to Mr. Agar M. Brown, Golf Course Superintendents Association, St. Charles, Ill.

AND COLLEGE STATION, TEXAS - TOO....At the Annual Texas Turfgrass Conference - December 13, 14 and 15. Many already have this meeting on their travel agenda. This year's program has an outstanding group of speakers and panel members. Don't miss this one.

BILL BENGEYFIELD, who has recently joined the Green Section Staff, has been working in the Southwestern Office during the last month. The greater part of this Turfletter represents Bill's journalistic efforts. Thanks, Bill.

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