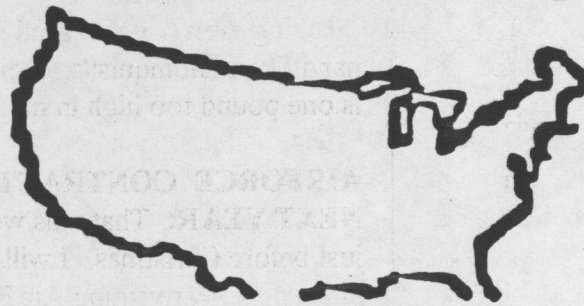


TURFCOMMS



V. 7, I. 6

Dec. 27, '93

PURPOSE: To pass on what we learn willingly and happily to others in the profession so as to improve turf conditions around the country.

ALGAECIDES AGAIN: I'm embarrassed! Algaen-X is Consan 20 with a Grace Sierra label. I was also told by two very well informed reader that Consan 20 is an excellent algaecide being able to kill algae at very low rates. It is a good thing it kills at low rates because this product is quite phytotoxic. For best results it was suggested it be used at be applied in an even larger volume of water than the label calls for. How large? A gallon every 20 square feet rather than the gallon every 40 that the label calls for. Now that is a drench! A drench application reduces the danger of phytotoxicity.

Although Algaen-X (or Consan 20) is an excellent algaecide my readers inform me it is a lousy fungicide.

Thank you readers for your comments. This, in many ways is your newsletter, much of what I print is learned from you the readers.

TGIF (TurfGrass Information File): In March I sent in a check to gain access via modem, I had requested searches and articles by phone several times over the last few years. Well here it is December 23rd and still no log on material. I've filled out the forms and called to check and got the reply that it would be mailed out very soon - two months ago. From what I've heard others have had the same problem of very, very slow response. I must say that they were always quick to send me material in response to phone requests. It appears that Michigan State can't, or doesn't want to run TGIF unless it has USGA support.

AIR SPREADER/SPRAYERS: Is your next spreader for granulars and fertilizers going to be a device that uses air for the carrier. At the Nebraska Turf Field Day in July of 1990, I saw and took pictures of such a device which was a prototype of the Broyhill Co.. I've never seen one since although I thought the idea was sound. Why fill and transport water all over the golf course if you can use air to

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dilute your concentrate and insure uniform distribution.

At the Oklahoma Turf Show I saw a second such device called Course Air put out by ATA, Inc. of Hurst, Texas. This one has the Broyhill device beat in one category it is set up to spray with water or spread dry materials with air as the carrier. It is capable of making precise applications at rates as low as 5 pounds per acre - so they claim. They have a boom cover available and note that you can apply dry materials such as seed or granular pesticides at the same time you are spraying the turf with a liquid material. For more information call (817) 274-1295, don't bother calling Broyhill, I did that; they dropped the idea.

What is the advantage to applying material using air as the carrier? How much time do you lose filling the spray tank when spraying fairways. In fact how many times have you rejected an idea to spray fairways because it took too long, and what you meant was it took too long to calibrate and then to keep filling that tank. With these sprayers the air is pulled in one side and sprayed out the other, no stopping to fill the tank.

Think about it. You'll be hearing more about this device - Dr. William Knoop is on their side.

REPLACEMENT PARTS: It is very common to have a superintendent tell you that he buys a certain brand of equipment because in his area the dealer gets parts to him much faster than those guys that have the other lines. I don't think I truly appreciated the importance of that until I went looking for a pair of 34 inch round dress shoe laces. After one shoe repair place, two grocery stores and four retail shoe outlets I was getting just a little upset. The last shoe store I walked into handed me a pair from their back room supply and wouldn't even take a nickel for them. They had heard my sad story many times over. Now where would you go for your next pair of shoes?

FLOYD & MCKAY DEEP DRILL

AERIFIER: Saw a demonstration at the Nov. meeting of the North TX Supt's Assoc.. The latest model drills holes fast and furious to a 10 inch depth, but it is still a slow machine compared to other aerifiers. At \$35,000 a piece not many will run out to buy them. I had some doubts about them as always. First, on the nice sand base greens they were on the small amount of sand pulled up worked into the surface very nicely. But, what if you want to remove the old clay soil you pull up? The agent, Rick Parker, claimed he has seen numerous methods used but, I have insisted on seeing for myself and my clients. Apparently, at the Dallas GCSAA Show in Feb. '94 you will also see a new materials injector that drops sand or Isolite or what have you, down the holes immediately after they are drilled.

Mr. Parker was handing out a copy of an article from the August, 1993, Landscape Management magazine showing some data of work done by Dr. Carrow. There is also some data on it by Dr. Carrow in the International Turfgrass Society's (ITS) latest Journal - Chapter 62. That data was from another study and although positive for aerification the Floyd & McKay machine did not look any better over all than other machines, although if you selectively choose your data you could have made any one of the machines look good. Using the ITS Journal data it appears clear that shallow aerifiers tend to create a hard pan three to four inches down thus use of a deep aerifier periodically would be helpful.

TEXAS TURF CONFERENCE: One of the first speakers tried to tell us that the DeepTine industry, the USGA Green Section, fans and USGA specifications were all part of the industries built up because of the inherent weakness of Penncross creeping bentgrass. I would have to agree that the new creeping bentgrass cultivars appear to be an improvement over the old work horse - Penncross; but they aren't that much better. He definitely had a

product to sell - the bentgrass cultivars he gets a percentage of for each pound sold.

Dr. David Kopec, turf specialist from the University of Arizona, discussed work on grasses able to survive under desert conditions with very little water in a talk labeled "Alternative Grasses for Low Maintenance Turf". Buffalograss came out the best with Yellow Bluestem Bothriochloa isacheum a somewhat distant second. Yellow Bluestem, you might recall, I brought to your attention in an earlier issue of TurfComms. It appears to be well adapted to the heavy prairie soils of North Texas and does nicely in areas receiving no more care than once a month mowing.

He also thought Lehman Lovegrass deserved some more attention as it did well at a 3 and 1/2 inch height of cut. He thought that possibly a search for strains better able to withstand closer mowing might be rewarding.

Dr. David Kopec gave a second talk on "Late Season Preparation for Overseeding" and had a couple of good thoughts worth mentioning here: Be kind to the bermudagrass in the fall if you want a good spring transition; or as he put in other words if plants could talk they would say "be nice to me and I'll be nice to you." Those of us that grow bermudagrass often think of it as almost impossible to kill but overseeding combined with shade, severe winter, or a cold wet cloudy spring can cause it to fade out to the point that come spring transition there is very little bermudagrass left. We therefore need to make sure the bermudagrass goes into the winter as healthy as possible if we expect it to survive five to seven months of winter abuse.

George Manuel, USGA Agronomist, was the next speaker I listened to. He reported that SR 1020 and other new bentgrasses were performing well in the field. Although he noted that bentgrass fairways in St. Louis could not survive last summer no matter what was done.

He feels rollers are a tournament tool only. If used only once or twice a week they will result in too much variation in putting speeds during the week. He noted that the large rotaries now on the market are excellent for mowing roughs and that leaf rakes either used by hand or attached to machine rakes are now the in way to rake bunkers.

He also pointed out that Monsanto has out a new nutsedge product that looks very promising. It should be labeled sometime in 1994, as Manage. It apparently has a great deal of safety on turfgrasses and provides good control of a wide range of sedges.

Gary Grigg, GCSAA Director and Florida supt., covered "Liability on the Golf Course". He noted that you can not allow trespassers to remain on the course because if you do the court considers them there by invite and thus more in need of your protection than as trespassers. He also pointed out that risk management is now part of a superintendents job.

Lee Niles, an irrigation consultant from San Antonio, said that irrigation systems were now running about 1/4 of the cost of constructing a3 new golf course. He noted that laws are often severely restrictive on effluent use and the laws vary from county to county let alone state to state. In Texas chlorine must usually be injected before distribution. In many areas you can't apply effluent near streams, wetlands or ponds. Another problem is the need to have 60 micron filtration systems to keep some automatic systems running because the dirty water plugs valve ports. He urged superintendents to test their irrigation water frequently. He also noted that when you are pumping 1000 gpm you will put on 100 pounds of solids (silt and clay) if your water contains 25 ppm solids in suspension.

Jim Moore, USGA agronomist, discussed "Managing Bentgrass in the '90s". He has found that the most successful superintendents had a relatively simple program. He noted that no one

should be applying more than 1/2 lb. of N/M/application. But, then I nearly choked when he came up with a program of 7 to 8 lb. N/M, 2 to 3 lb. of P/M, and 8 lb. of K/M. Those levels I find a little high.

He went on to make two other important points. First, that water management separates good superintendents from the rest. Secondly, the "surrounds" are becoming the second most important area on the golf course. Most golfers hit at least one shot from them on each hole.

Jim Moore's second talk was entitled "Hidden Costs in Green Construction". In his previous talk he noted the importance of the "surrounds" and in this one he pointed out that it is becoming common to sod around the greens to reduce the development of gullies, etc. during establishment.

He said that going out 30 feet from the edge of the green with sod could cost \$74,000 for 18 holes and practice greens. He gave a detailed breakdown of costs on a new golf course based upon the following assumptions: Total square footage = 120,000; Number of greens to be built = 20; Sales tax = 6.35%.

ITEM	TOTAL COST	COST/FT.	% of TOTAL
Testing	2,500	0.02	1
Gravel	6,996	0.06	2
Rz Sand	41,975	0.35	10
Cl Sand	14,575	0.12	3
Drain Tile	3,000	0.02	1
O.M.	22,737	0.19	5
Blending	9,712	0.08	2
Fertilizer	1,000	0.00	0
Sod	73,767	0.61	17
Irrigation	12,000	0.10	3
Photos	2,000	0.00	0
Fumigation	12,000	0.10	3
USGA	4,000	0.03	1
Permits	2,000	0.02	0
Lost revenue	0	0.00	0
Loan cost	0	0.00	0
Contractor	189,000	1.58	44
Subtotal	397,262	3.29	91
Architect	39,726	0.33	9
TOTAL	\$436, 718	\$3.62	

These are the summary only. If you wish a copy of his complete breakdown of each of these components either call me for a copy or call Jim (817) 776-0765. As Jim pointed out this is just one example all these figures are subject to local variations.

Dr. Doug Brede, a plant breeder now with Jacklin Seed Co., discussed the advantages of new turf type redtops for overseeding. Redtop, *Agrostis alba*, is a close relative of creeping and colonial bentgrass. It is most often used as seeding for indoor Floriculture and Horticulture shows. Before the 60's it was often included in lawn seed mixes. Dr. Brede claims that new cultivars to be released soon, will have excellent color and will provide you with a much smoother spring transition than perennial ryegrass do in overseeding.

Keith Ihms, Supt. Pine Forest Country Club, Houston, showed us how it is justifiable to use washed sod vs. sprigs for a new or rebuilt green or greens. That might seem hard to believe with washed sod costing \$1.08/sq. ft. and spriggs costing \$0.12/sq. ft. But, if it takes you five weeks longer to open the sprigged greens than the loss of income during that five weeks might well offset the cost of the sod. It did at Bear Creek Golf World in Houston. However, beware of the layer that will be incorporated into the surface even with washed sod.

For another more detailed similar discussion of sod vs. seed read the Nov./Dec. 1993 issue of the USGA Record. There is an excellent article in there by Dave Blomquist discussing the pros and cons of these options. Keith Ihms and his bosses forgot to include the cost of living with the layer resulting even from washed sod. On the other hand Dave Blomquist's seeding rate of 2 lb./1000 is one pound too high in my opinion.

AIRFORCE CONTRACT SIGNED FOR NEXT YEAR: That was welcome news to hear just before Christmas. I will travel the U.S of A. again next year visiting Air Force Bases.