

Connecticut Association of Golf Course Superintendents

APRIL, 1989

Volume 23, No. 1

CONNECTICUT ASSOCIATION

OF GOLF COURSE

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Cover Credit

CAGCS wishes to thank Richard Chalifour for his outstanding efforts in originating the new cover design for our Newsletter. Richard is the son of our President, Robert Chalifour.

A Few Well Chosen Words

It is with great disappointment that I am once again writing this article to the membership of the Connecticut Association of Golf Course Superintendents. As many of you know, I ran for Director of the Golf Course Superintendents' Association of America in 1987 and had a good showing for a new candidate. With this first year behind me and another year of preparation, I felt that I was indeed ready and everything looked and felt good. I campaigned hard, and I could not have asked for more from John Streeter and Tom Watroba who took time out from the conference and their families to assist me in my efforts.

In the final analysis, I must conclude that I let myself down by an unfortunate presentation in the Meet-the-Candidate Forum. For those of you who do not know what this forum is, I can describe it best as the longest five minutes in any candidate's life. It is the time when one stands before his peers and tells them why he feels he is qualified to seek such a position as Director of GCSAA. While I know some of you may find this hard to believe, I was actually at a loss for words at one point, and five minutes does not allow one that luxury. It is hard to believe a dream can be shattered so quickly and years of preparation are all for naught.

The future with GCSAA is not clear at this point in time. I am still involved with GCSAA in the Public Relations Committee, and I enjoy the involvement. Some say that it is an ego trip. I personally enjoy serving, and I feel my record within the CAGCS speaks for itself. I do not look to be considered better than any other superintendent. All I look to do is serve an association that has its main goal the sharing of knowledge and the advancement of our profession. If that is such an unworthy goal, then curse me all you want, but I am going to continue down that path.

Mike Wallace, CGCS

Comments From The Editor

Trials and tributes were a plenty at the '89 GCSAA conference. We start at Bradley on a cold, early morning in Feburary bound for sunny Palm Springs CA. As we descend onto a ice-covered runway in Dallas, little did we know that a 5-hour journey would turn into a 20-hour horror show. After many delays and lots of beverages, the journey finally ended and all we were faced with was lost luggage, no hotel rooms and record-breaking cold weather. However, we all did survive and there was no evidence of jet lag, as we all know that the show must go on.

Disapointment, to say the least, was felt throughout after the election results were posted at the annual meeting in Anaheim. Our own Mike Wallace was narrowly defeated (a 150-vote swing) after conducting a straight forward and noble campaign. I think he said it well in the above article. My own opinion is that this election process which we conduct has become highly-politically geared. Not always do we elect the best and most deserving people, as this past election has proven. Not that we are crying over spilled milk, but in order to gain in this election we must fight fire with fire, and that means organizing the little guys into one big guy.

The Best Equipment Is Made Right Here In Connecticut.



When preparing your 1989 budget, you should consider the high quality, great performance, and reasonable prices of SALSCO equipment.

- A. LOADERVAC TRUCK LOADERS: The Loadervac line comprises four models, ranging from an 8 h.p. tailgate loader to the big 20 h.p. machine pictured above.
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Around The Association

The following activities are happenining within CAGCS:

CAGCS recieved a plaque from GCSAA in recognition for our Association's donation to the GCSAA Scholarship and Research Fund.

Dr. Skogley of The University of R.I. also thanked CAGCS for our contribution to their Research Fund. As many of you may know, Dr. Skogley is working on developing different grass varieties for golf course use. One of his most recent releases being Providence Bent.

The Connecticut State Golf Association has expressed interest in having a joint meeting/seminar with CAGCS. Our Board is currently pursuing this invitation as we feel this venture could be very advantageous to both Associations.

The Janurary Seminar was again a success, as we netted approximately \$2,000.00. Attendance was at a maximum even with the location change to the Holiday Inn in Plainville.

The Dick Parsons Scholarships were awarded to Jon Allen and Rich Parsolati. They each received \$200.00.

The Long Range Planning Committee has had one meeting and has scheduled another for the end of April. Items on the agenda include, but are not limited to, seeking out an Executive Director; developing a survey to see what membership services you would like to see CAGCS pursue. Membership services to be surveyed would include such items as health and/or dental plans; employment service to golf clubs; education; expansion of our computer system; and whether we should establish a permanent residency for the Association.

It it has been decided to revamp the "Superintendent of The Year" format. Changes will include having a committee made up of past receipents who will nominate 3 to 5 candidates. The nominees will then be portrayed by way of a brief biography in the *Clippings*, after which time the members will be sent a ballot to cast their vote for one of the nominees.

Gary Bryant, 30 years

Congratulations to Gary Bryant, Superintendent of Manchester Country Club, 30 years as a member of CAGCS. Where did they all go? An indepth interview with Gary will be puiblished in an upcoming issue of the *Clippings*.

Did you know that 1 inch of rainfall or irrigation, over 43,560 sq.ft.(1 acre) is worth 27,143 gallons of water?

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Birth Announcements

Congratulations to Mr. and Mrs. Mike Dukette on the birth of their daughter, Natalie Eileen and to Mr. and Mrs. Scott Ramsay with the birth of a son, Bennett Scott.



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CAGCS Golf and S & R News

S & R Committee Reports

Scott Ramsay, Chairman of the S & R Committee announces that software will be available at all monthly meetings for purchase.

Scholarship Announcement

CAGCS Scholarship applications are available April 30th and must be submitted no later than May 30th to Scott Ramsay, S & R Director, P. O. Box 674, Baltic, CT, 06330. Tel: 822-8597. Anyone meeting the requirements below may request an application from Scott.

1. Immediate family of CAGCS members are eligible.

2. Employees of CAGCS members may apply if field of endeavor is turf related.

3. Applicants, other than first-year college students, must maintain a 2.0/4.0 grade point average for eligibility.

4. Applications must be requested in writing from the S & R Committee Chairman, Scott Ramsay. Any member may request an application.

5. Requests for applications must be made before April 30, 1989.

6. The deadline for submitting applications is May 30, 1989.

7. Incomplete applications will not be acted upon.

8. Each scholarship will be for a minimum of \$100, with the total number of scholarships and the amounts awarded to be determined yearly by the S & R Committee, based on available funds.

9. Interviews and copies of the applicant's transcript from his or her last attended school may be requested at the discretion of the S & R Committee.

10. An applicant must re-apply each year to determine eligibility. Scholarship availability not to exceed four years.

Golf Committee Report

Your new Golf Chairman, Peter Lewis, has announced the formats and golf sites for the upcoming 1989 Season. See inside back cover for meeting and golf destinations.

Along with a few changes in the golfing formats, Peter has announced that he will be employing the services of two mature gentlemen to handle the painstaking duties of collecting money and signing you up for golf. They will also be there to take your score cards at the end of your round. So, please do not turn in any "Tom, Dick & Harry" cards. We do require you to put last names, total score, and net score, signed and attested, preferrably turned in before you take your shower. Any incomplete cards will not be acknowledged. Following is a list of the monthly golf tournaments:

- May 23rd Pautipaug. First-round qualifying for CAGCS Championships and Met Team Championships.
- June 6th Hop Meadow. Second-round qualifying for CAGCS Championships and Met Team Championships.

Oualifications for CAGCS Championships:

- 1. Two rounds. Both rounds must be played. (May 23rd and June 6th)
- 2. Low combined total score gross and net.
- 3. In case of tie, match cards from number one handicap hole.

Qualifications for Met Team Championships:

- 1. Combined gross score of the two meetings (May 23rd and June 6th).
- 2. Any member of the Association is eligible.
- 3. The team will consist of lowest six scores of CAGCS members.

June 19th - Country Club of Farmington. Annual CAGCS Invitational. Best ball of the foursome to include superintendent, pro, green chairman, and club official.

July 11th - New Canaan. Stableford (quota system) Tournament. (or rain date for CAGCS and Met Team Champ. if necessary)

August (TBA) - Madison Golf Club. Family Day, Scotch

September 12th - Wamponoag (Joint meeting with New England Superintendents' Association

President's Cup and McLaughlin Trophey. October 4th - Glastonbury Hills. Annual S & R Tournament. Scramble format.

October 17th - Blackledge. Superintendent/Assistant Tournament - two-man best ball.

November 7th - Suffield. Scramble.

Prize Breakdown and Rules:

1. 20% to 30% of prizes go to Gross Division

2. 70% to 80% of prizes go to Net Division

3. All ties will be broken on number one handicap hole 4. All cards must be dated, signed, attested, and turned in within 15 minutes of completion of play.

5. Kickers - The last number in posted gross score wins the kickers. The number will be drawn by the Committee upon completion of play.

6. Tournament entry fee is \$10. (\$7 for Gross and Net prizes and \$3 for kickers)

Anyone playing golf is required to pay for lunch or dinner, whichever pertains.

Ellington Ridge Bunker Renovation - Major Success -

by Mike Dukette, Clippings Staff

Ellington Ridge Country Club now has a more picturesque, more challenging and fairer golf course to show for its newly completed bunker renovation project. As part of a very ambitious, long-term goal to improve its golf course, the members decided in 1984 to completely rebuild all the bunkers on the golf course. The entire irrigation system was being updated, and the club had the financial security to tackle the ambitious plan of redesigning and rebuilding all of its bunkers.

The Geoffrey Cornish designed layout is a long, relatively flat course that just needed to be fine tuned to make it into the course the members wanted. It could be seen from the original blue prints that many bunkers were added to the original layout as afterthoughts. A lot of the bunkers never came into play because of poor placement. Many were too close to the teeing areas, or too far out of the line of play. Others were not visible from the tees or fairways and many greenside bunker shots could be negotiated with a firmly stroked putter. Several traps measured only five feet wide, yet were some fifty yards long.

The course itself is on very well-drained soil, but several bunkers had drainage problems due to a compacted subsoil.

The shale type subsoil layer had worked its way up into many bunkers and contaminated the sand with hardpan and small rocks. Many courses in the New England area face similar problems.

Brian Silva was chosen as the golf course architect for the project both because of his partnership with Geoffrey Cornish and because of other work Silva has done in the New England area. Hole by hole plans were written out by Silva, although exact blue prints were not drawn up. This would allow onsite flexibility during the construction phase. This flexibility was to allow the architect the final approval on all finished work by the contractor.

Dave Vibber, the golf course superintendent, began looking for a contractor to do the actual construction work early in 1985. Due to the boom in both areas and national golf course construction and renovation, no contractor could be secured in 1985. Vibber cited this as a problem other superintendents will face if they are planning a construction project in the near future. Both golf course architects and experienced construction contractors have been overwhelmed by the recent boom in the popularity of golf.

A contractor was secured in May, 1986. He was to start in August, 1986, but backed out at the last minute due to another golf construction job in Maine. This delayed the project until 1987. Faced with the possibility of delaying the start of the project for another year, a contractor with limited experience was chosen. Actual work started in August, 1987. However, due to the contractor's health problems and an inexperienced crew, work progressed slowly, and only three holes were completed by winter. The club had included an escape clause in the contractor.

The course then secured the services of Jerry Deemer of Country Golf, Inc., Traverse City, Michigan, in February, 1988. Work began immediately and the entire project was completed by mid-May. Vibber described the last contractor as "the hardest working crew he had ever experienced in any business". "Work progressed maybe a little too fast." "They had everything ripped up", cited Vibber. Yet, in the end proved "flexible and cooperative". Vibber added that it is very important that the contractor used in these types of projects must have a "flair for the artistic so that the finished work is both easy to maintain and aesthetically pleasing".

The finished project can be described as eye catching, with



creative use of mounding. To correct the initial design and layout problems, several fairway bunkers were eliminated and others were placed more into the driving areas of the better players. Bunkers were brought into the edge of the fairways and placed more exactly into the corners of doglegs. The bunkers were also reconstructed to provide "flashing" from the tee areas. Flashing is provided by constructing bunkers so that the sand in the bunker is visible from the tee area. A "flash of sand" is visible - this aids in depth perception for the golfer and also gives the hole better definition. It also makes the entire layout more asthetically pleasing.

The major consideration during all construction and renovation work should be drainage. "There is enormous surface runoff from greens during rainstorms" Vibber noted. It becomes especially important that drainage patterns be identified before construction. Vibber felt that the superintendent is most aware of the drainage patterns and should be consulted on this through planning and construction. This prevents situations where water actually drains into bunkers from surrounding areas and washes the sand away from the edges of bunkers. Traps must also be bermed to prevent surface water from entering from adjoining areas. Water can also enter the trap laterally from below the surface if there is insufficient vertical drainage in surrounding areas. "Every trap should have drainage tile installed, even if a problem is not expected" stated Vibber. This prevents water buildup in bunkers. At least six inches of sand should be installed in bunkers. Although there is an initial problem of golf balls embedding in it, the sand will provide its own drainage media, thereby reducing washouts along the edges. Vibber could not emphasize enough the need for drainage.

There are many things to consider during the actual construction phase. Large amounts of fill and loam must be available at all times. Ellington Ridge spent over \$40,000 on fill and loam for the project. Some holes required over 500 yards of fill. Work cannot progress without a constant flow of these needed materials. Approximately 5.5 acres of bluegrass sod were used for the project. Availability of sod was scarce because most of the work was done in early April. A source was secured in Rhode Island which had sod available because of its more temperate winter and spring. The course received its first load of sod on March 24. Few sod growers in the Connecticut Valley had sod available that early in the spring.

It is also difficult to minimize damage from large trucks carrying fill and loam out and around the golf course. Traffic patterns must be staked and the superintendent must be sure to communicate to control vehicle flow. Vibber noted that if he were to start another project, he would strive to communicate his drainage concerns more forcefully to the architect and his field representative. Be sure the architect is available during the construction phase. Fortunately, this was not a large problem at Ellington Ridge.

The bunker renovation will mean budgeting for additional labor in the coming years. The number of bunkers was increased from 62 to over 80. A lot of this was done through additional mounding and through dividing big bunkers into several smaller ones. Many areas now require hand rotary mowing, both because of the slopes and the narrow turf tongues between bunkers. The mounding had to be done due to the relative flatness of the course. Some hand mowing was inevitable. The increased maintenance costs were expected and have been included in budgeting. The last problem Vibber encountered was finding high quality loam when the club decided to add 10 new tees as an afterthought to the project. Loam quality varies greatly with the supplier, and it is important to find a reputable source.

"The membership has a better golf course to play" quoted Vibber. It plays erasier for the high handicap golfer and harder for the better player. It is now a course the members can be proud of.



Election Results From GCSAA Conference

LYON ELECTED GCSAA PRESIDENT

Dennis D. Lyon, CGCS, City of Aurora (Colo.) Parks Department, was elected President of the Golf Course Superintendents' Association of America during the Association's annual meeting, February 13th, in Anaheim, California. Lyon succeeds John A. Segui, CGCS, Berwyn, PA.

"The opportunity to serve as President of GCSAA is a once-in-a-lifetime chance to give back to the Association and profession that have given so much to me," Lyon says. "I view this opportunity as an honor and a privilege."

Lyon's career as a golf course superintendent began in 1972 when he accepted the position of assistant superintendent at Heather Ridge Country Club in Denver, Colorado. A year later, he became superintendent at the City of Aurora's Aurora Hills Golf Club. He has been part of that same municipal operation ever since.

In his more than 15 years as golf division superintedent for the City of Aurora, Lyon's responsibilities have expanded to include three other golf courses and various other duties related to the city's parks and recreation programs.

The City of Aurora's parks and recreation program is said by many to be one of the nation's best. The program has twice been cited as the best managed in the country by the National Sports Foundation. Its most recent award in 1984 was for cities with populations of 100,000 to 250,000.

Lyon joined GCSAA in 1974 and is an active member of the Rocky Mountain GCSA. He has served in nearly every local and national leadership position imaginable. His GCSAA involvement includes a term as Chairman of the Certification and Education Committees. He has also served GCSAA as Secretary/Treasurer and Vice President.

Lyon, who became a certified golf course superintendent in 1978, received a bachelor's degree in horticulture from Colorado State University and a master's degree in management from the University of Northern Colorado.

The Association's 53rd President is the first to have come from the "government side" of golf course management -- the municipal operation. Lyon's background in city-owned, dailyfee golf has given him a unique perspective on what is becoming on the the hottest issues facing the industry today: the growing need for more accessible public courses.

"We are all aware that the number of people playing the game of golf in this country is experiencing tremendous growth," Lyon says in the March issue of <u>Golf Course Management</u> magazine. "That growth, in my opinion, has resulted in an increase in the quality of public golf courses and in the professionalism of the public golf course superintendent. The public golfer in most areas of the country has come to expect quality golf course conditions and has been willing to pay for it."

In the <u>Golf Course Management</u> magazine interview, Lyon addresses many of the other important issues facing the industry today, including environmental considerations, membership growth within the GCSAA, and further strengthened ties to other international golf organizations.

"The Golf Course Superintendents' Association of America is composed of highly skilled professional men and women who are dedicated to the 'art and science' of producing fine golf turf," Lyon adds. "We are the best in the world at what we do, and what we do is provide the world with outstanding golf courses."

Other Election Results

Gerald L. Faubel, CGCS, Saginaw (Michigan) Country Club, was elected Vice President. Re-elected as a Director and appointed Secretary/Treasurer was Stephen G. Cadenelli, CGCS, of the Metedeconk National Golf Club in Jackson, New Jersey. Also re-elected as Director was Randy Nichols, CGCS, of Cherokee Town & Country Club, Dunwoody, Georgia. Elected as a new GCSAA Director was Gary T. Grigg, CGCS, of Shadow Glen Golf Club, Olathe, Kansas. Randy P.

Zidik, CGCS, of Rolling Hills Country Club, McMurray, Pennsylvania, was appointed by President Lyon to fill the unexpired term of Director Faubel. Zidik will serve a one-year term.

William R. Roberts, CGCS, of Lochmoor Club, Grosse Pointe, Michigan, and Joseph G. Baidy, CGCS, of Acacia Country Club, Lyndhurst, Ohio, continue serving terms as Directors.

Officers serve one-year terms, and Directors are elected to two-year terms.

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Do You Really Understand Your Irrigation System? By Dennis Petruzelli Turf Products Corp., Irrigation Division

With "Old Man Winter" performing his mixed bag of tricks on us, what better time to evaluate your irrigation system? After this past season of intense weather extremes, many superintendents easily found flaws in their golf course which may have "snowballed" into other damaging problems. Although good drainage is an integral part of sound turf management, equally important is efficient irrigation application.

Irrigation, in general, is probably the most taken for granted as well as the most mis-understood by many turf managers. You "push" a button or "thread-in" a quick coupler sprinkler and "boom", instant water. "Yeah, that area looks like it needs 20 minutes", a phrase that may sound common. But how much water is 20 minutes? Is it too much or too little? Can you tell me how many gallons per minute output your sprinklers are capable of? Hopefully, in this brief article I can help you understand your system - possibly improve it, and maybe even change your water management strategy.

What is irrigation? A thought that comes to mind is controlled, artificial rain: A method of applying water to plans for replenishing evaporative losses from normal plan biological processes. Irrigation can also be an effective tool in cooling down grass plants in extreme hot weather (syringing) and transporting applied chemicals/fertilizers into soils, as well as plant root zones. It is used as a supplement for periods of dry weather in keeping turf alive. Water should be considered a rare commodity, so applying it efficiently, without waste, should be your goal.

Even before considering sprinklers or electric valves, we need a starting point - basic hydraulics. In all practicality, water cannot be compressed. Since it is not compressible, water must be pressured for our usage. Pressurization is developed by mechanical force such as a pump or by using the water's own weight, i.e., water tower. In the United States, pressuer is measured in pounds per square inch and/or feet of head. If you can visualize a column of water one foot high with an area of one square inch, it will weight 0.433 pounds. The column of water will exert a pressure of 0.433 PSI at its base due to its own weight. How is this information useful to you? Well, in terms of elevation on your golf course, the static pressure at your pump station or city water source (in a non-pumping situation) must be appropriately determined to effectively irrigate with good pressure. To simplify, if your pump station or city water source 10 feet lower than the golf course's highest elevation, 4.33 PSI will be "lost" to friction losses. Conversely, the pump station or city water source at the highest elevation "feeding" 10 feet down will increase operating pressure by 4.33 PSI. Adequate pressure throughout the golf course is essential to operate sprinklers at their optimum. Keep in mind, whether you use impact drive or gear drive sprinklers, they will require a range of 80-100 PSI at the base of the head to perform their best (unless the new low

pressure type sprinklers are utilized, requiring 40-70 PSI range.). As you can see, knowing your course elevations in regard to your pump station or city water source is important. If you do not have elevation information in your records, try your local Town Assessor's Office which in most cases they will make you a copy at no charge.

Do you know your irrigation equipment? In your record files, you should keep performance literature of your sprinklers, and other equipment such as pumps, valves, and controllers. Such information should include model numbers, degrees of rotation, nozzle size(s), and gallons per minute output. The "GPM" data from this literature can help determine the amount of water approximately applied for an irrigation cycle (unless you have a flow gauge). One factor to consider when speaking of sprinklers, especially brass, is the age of the nozzles and how abrasive your water source is. Brass is a very soft metal that in time will "wear" in an abrasive situation. Nozzles that are 10 to 15 years old may actually be applying more water than it is designed to do. So what, you say? If your system was carefully designed or programmed to operate nine fairway sprinklers at one time when new, is now aged, you could be "overtaxing" your pumps due to something as simple as worn nozzles. It may be a good idea to check your nozzles, if they are aged, to get optimum performance.

Another use of the "GPM" data is determining precipitation rates of your sprinklers. If this informatioan is not provided in your litature records, it can be calculated with the formula(s) below:

For triangular sprinkler space

 $\frac{\text{GPM x 96.3}}{\text{Spacing x .866}} = \text{ inches/hour}$

For square and single row spacing

 $\frac{\text{GPM x 96.3}}{\text{Spacing}^2} = \text{inches/hour}$

Once calculated, we can theoretically determine how long a sprinkler should operate. Time adjustments will most likely be needed, depending on the severity of wind, shade, rock, thatch depth, evapotranspiration rate, soil type and slope in any particular area. Finding the proper run times for specific areas may take some experimenting, but at least you have a starting point from your calculation.

Precipitation rates and water scheduling go "hand-in-hand". With a determined precipitation rate and considering a 1" of water per week standard (rain or irrigation), frequency of irrigation must be scheduled. For example, our fairway sprinkler has a 0.1"/hour precipitation rate. We hypothetically want to irrigate daily, but "lightly". (continued next page)

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<u>1.0"/week</u> 0.5"/hour

= 2 hours watering/week

<u>2 Hours</u>	= .28 Hours x 60 Minutes/Hour
7 Days	(17 Minute Cycles)

From experience, in my opinion, this is too much water application on a daily basis. One inch per week is merely a standard to work from. The turf, in many cases, will survive nicely with less applied irrigation. This is purely a manager's judgment call, considering his own preferences and agronomic situations.

One last consideration to irrigation scheduling is the growing usage of evapotransporation rate information. Through years of weather data record keeping, "ET" rate information is available through your irrigation distributor. Somewhat regional locales can be used for approximating "ET" loss at different times of the year. Today's "state of the art" equipment has the ability to automatically change pre-set run times to replace "ET" lost to the atmosphere, a truly "automatic" system.

One other very important factor in "knowing" your irrigation system is verifying sprinkler head spacings. This could be valuable time spent and all information gathered should be documented on your irrigation plan (if you have one). You might be surprised by some of the results (especially those annual dry spots you keep battling). I think that numerous system inadequacies are caused by inexperience, random nozzle changing without consideration of area(s) needs, and the fact that we are all learning from those errors. The industry, in general, has more qualified people and even the golf course superintendents are more knowledgeable due to training from local distribution, National Superintedent Association Seminars, and from even in the turf schools.

Keep aware, if you're planning to change sprinklers in an area, that 75% of total sprinkler throw (radius or diameter) is deemed effective coverage. Effective coverage is the zone which turfgrass receives ample water for survival. Also, another point to consider is avoiding full circle and part circle sprinklers operating on the same zone (unless nozzles can be utilized to yield compensating water delivery in G.P.M.). Obviously, a part circle sprinkler will deliver twice the amount of water to a given area than a full circle sprinkler.

As you can see, it takes a lot of work and time to fully understand your irrigation system, develop watering strategies, scheduling, and produce an efficient as possible system. I could go into further depth on a number of these topics, but there is not enough space available to do so in this Newsletter. By presenting some basic ideas, and briefly explaining them, I believe it is enough information to help you. If you experience severe "constraints" from your system, and have attempted some improvements unsuccessfully, you may want to either contact your local irrigation distributor, or hire a consultant for an in-depth evaluation.



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CONNECTICUT ASSOCIATION OF GOLF COURSE SUPERINTENDENTS

DATE	EVENT	LOCATION	HOST
May 23	CAGCS Monthly Meeting 1st Round CAGCS & Met Championships	Pautipaug Country Club Baltic, CT	Scott Ramsay
June 6	CAGCS Monthly Meeting 2nd Round CAGCS & Met Championships	Hop Meadow Country Club Simsbury, CT	Mike Wallace
June 19	CAGCS Monthly Meeting Invitational	Country Club of Farmington Farmington, CT	Peter Lewis
July 11	CAGCS Monthly Meeting Stableford	Country Club of New Cannan New Canaan, CT	Michael Reeb
August (TBA)) CAGCS Family Picnic Mixed Scotch	Madison Country Club Madison, CT	Mike Chrzanowski
August 30	URI Annual Turfgrass Field Day	University of Rhode Island Turfgrass Research Farm	Dr. Richard Skogley
September 12	CAGCS Monthly Meeting (Joint w/N.E. Supts. Assoc.) President's Cup & McLaughlin Trophy	Wampanoag Country Club West Hartford, CT	Robert Johnston
October 4	CAGCS Monthly Meeting S & R Tournament (Scramble)	Glastonbury Hills Country Club Glastonbury, CT	
October 17	CAGCS Monthly Meeting Superintendent/Assistant	Blackledge Country Club Hebron, CT	Thomas Gresh
November 7	CAGCS Monthly Meeting Annual Meeting	Suffield Country Club Suffield, CT	Thomas Watroba

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Allen Lawnmower/Ransomes 197 Main Street Agawam, MA 01001 Albert McLean (413) 786-8111

Alpine Tree Care, Inc. 44 Slocum St., Norwalk, CT 769 N. Mountain Rd., Newington, CT Ken Clear (847-1855) Alan Carey (953-1776)

Breudan Corp. of Connecticut John Deere Golf Equipment Bolton, CT 06040 Scott Lowe, Frank Savakis & Jeff McDowell (203) 647-1774

The Cardinals, Inc. 166 River Road Unionville, CT 06085 John Callahan (203) 673-3699

James Carriere & Sons, Inc. Trap Sand - Partac Topdressing Port Chester, NY Bill Carriere (914) 937-2136

Chas. C. Hart Seed Co. 304 Main Street, P. O. Box 9169 Wethersfield, CT 06109 Roy Sibley, Ron Holcomb (203) 529-2537

Country Club Cars of N.E. 10 Shoreham Road East Windsor, CT 06088 Dick Kaupin - Dick Mather (203) 623-3871

East Haven Landscape Products 10 Mill Street East Haven, CT 06512 Bud Escola (203) 467-6260

Egypt Farms, Inc. Golf Course Topdressing White Marsh, MD 21162 John Strickland (301) 335-3700

Fairway Landscapers, Inc. Green, Tee, Bunker Construction South Glastonbury, CT 06073 Walter Varni (203) 633-1273

Glenmore Landscape Service RR3, Box 199, Hackgreen Road Pound Ridge, NY 10576 Glenn S. Moore (914) 764-4348

Imperial Nurseries Horticultural Distribution Center Granby, CT 06035 John Perrotti, Jr. (203) 653-4541 **Tom Irwin Company** 11 B A Street Burlington, MA 01803 (617) 273-0143

Lesco, Inc. 20005 Lake Road Rocky River, Ohio 44116 Mike Donahue (800) 321-5325

Larchmont Eng. & Irrig. Co. Box 66, Larchmont Lane Lexington, MA 02173 Steve Butler, Michael Gimmelfarb (617) 862-2550

The Magovern Company Windsor Locks, CT 06096 Carl Wallace - Peter Moran (203) 623-2508 - Windsor Locks (203) 348-8211 - Stamford

Mantek

12 Bradley Street Branford, CT 06405 Bob Reinhold (203) 481-4321

Metro Milorganite P. O. Box 267 Hawthorne, NY 10532

John Wistrand (914) 347-4222

O. M. Scott & Sons Proturf Division Marysville, OH 43041 Al Arison (203) 336-9890

Old Fox Chemical, Inc. 249 Shaker Road Enfield, CT 06082 Mike Dukette (203) 749-8339

Partac Topdressing Kelsey Park, Great Meadows, NJ 07838 (800) 247-2326/(201) 637-4191 Bill Carriere (914) 937-5479 Steve Kotowicz (203) 792-3032

Pipe & Irrigation Equipment 243 Woodmont Road, P. O. Box 3049 Milford, CT 06460 Paul J. Roche (203) 878-0658

Pro-Lawn Products, Inc. 30 Nashville Road Bethel, CT 06801 Steve Kotowicz (203) 792-3032

Purple Kings Farm Williamstown, MA 01267 Ralph C. Mason (413) 458-3184 (413) 458-4646 The Reichert Company Automotive Lubricant Distributor Riverside, CT 06878 Frank Reichert (203) 637-2958

Ro-Brand Products, Inc. Automotive & Industrial Fasteners 319 Cooke Street Plainville, CT 06062 (203) 747-1621

Somers Turf Supplies P. O. Box 2294 Devon, CT 06460 Bill Somers (203) 878-2108

Terre Co. Clifton, NJ 07014 Byron Johnson, Jr. (203) 748-5069 (201) 473-3393

Tuckahoe Turf Farms, Inc. Bluegrass/Fescue Turf - Penncross West Suffield, CT Skip Deubel (203) 668-1226 (collect)

Turf Products Corporation 1496 John Fitch Boulevard South Windsor, CT 06074 Mark Loper - John Ferry (203) 528-9508

Turf Specialty, Inc. 60 Merrimack Street Hooksett, NH 03106 Dave Schermerhorn, Ed Wiacek (800) 228-6656

U A P Products Box 116 East Glastonbury, CT 06025 Henry Lesinski (203) 659-1217

Valley Farms Nursery & Supply Sod - Turf Supplies Simsbury, CT 06070 Joseph D. Bidwell (203) 651-8555

Westchester Turf Supply, Inc. P. O. Box 198 Lincolndale, NY 10540 Bob Lippman (Home: 914-248-5790) (914) 248-7476

Winding Brook Turf Farm, Inc. 240 Griswold Road Wethersfield, CT 06109 Donald Grant (203) 529-6869