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Official Publication of the
Michigan & Border Cities Golf Course Superintendents Association

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Christmas Party a Success

One hundred and fifty-eight Golf Course Superintendents, their wives, friends and guests attended the Annual Christmas Dance on December 10, 1976 at the Edgewood Golf Club.

Once again Host, Ken McRae and his wife, Elizabeth, arranged for a great night of eating and dancing. The food was outstanding. The hospitality at Edgewood is always appreciated.

Chairman of the Christmas Party,

Gerald Gill and his wife, Mary, are to be congratulated for choosing the site and selecting the menu and arranging for the delightful music. They have been doing this for several years now and have never failed to arrange for a great party. Each one just a little better than the last.

The following contributors were responsible for the cocktails and other finances:



Chairman Gerald Gill and wife, Mary. Gerald is a past President of the MBCGCSA. He is Superintendent of Tam-O-Shanter Country Club.

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Certified Superintendents Renew CGCS Credentials

Five years have passed since the Certified Golf Course Superintendent program was begun, and since the certification must be renewed every five years, the first certified superintendents now are becoming eligible for renewal.

According to GCSAA records, 38 certified superintendents are eligible for certification renewal, 18 are involved in the process and 11 already have renewed their certification.

The certification renewal program stipulates that six points must be earned during the five-year certification period in order to earn renewal. The points may be earned by any of the following methods: attendance at GCSAA Conference, one-half point each year; successful completion of GCSAA Seminar, two points; certification renewal examination (two hours), four points; current certification exam-

ination (six hours), six points.

According to a GCSAA survey, the certified superintendent earns an average of \$2,900 a year more than the noncertified superintendent. Employers often seek certified superintendents because they know that those superintendents have recognized expertise and knowledge in golf course management, and employers feel that they can rely on such individuals.

Superintendents tend to see the program as a personal benefit and an aid to finding good employment. Also, certification is seen as a means of proving oneself and one's expertise.

Application forms and additional information about the certification and certification renewal programs are available from the GCSAA Director of Education, 1617 St. Andrews Drive, Lawrence, Kansas 66044.

Christmas Dance Keeps Bob Hope Out Late . . .



The boys are telling the world that Bob hasn't gone home and it's after 10:30 P.M.
— A First . . . He even looks like he's having a good time!

Michigan — A Great Golfing State

Did you know that there are 610 golf courses in Michigan? There are only four states with more courses.

Michigan was tops in National Golf Day. Contributing Clubs gave \$9,861.10. The Great Oaks Golf Club in Rochester led with \$1,000.00.

The Michigan and Border Cities Golf Course Superintendents Association gave \$6,700.00 and the Golf Association of Michigan gave \$2,000.00 to the Michigan Turfgrass Foundation. This coupled with the \$500.00 to G.C.S.A.A., \$500.00 to the U.S.G.A. and \$300.00 to O.J. Noer Foundation, plus the contributions from Western Michigan Superintendents and the Northern Turfgrass Managers Association total slightly less than \$20,000.00. Yes, Michigan is a great golfing state.

Michigan also leads in contributions to the Evans Scholarship Program. The Golf Association of Michigan is the best organized golf association in America.

They have always worked closely with the Golf Course Superintendents Association. This past year, the Green Committee presented a Seminar and one hundred-nine people attended including Green Chairman, Committee

members, Superintendents and speakers. The subjects covered were the recommended G.A.M. Standard Chart of accounts, role of the Green Committee and Chairman and two other sessions on water management and *pca annua* management.

The State of Michigan still leads in Turfgrass Research, number of turf students (100) and in quality of golf courses.

AWARDS TO BE PRESENTED IN PORTLAND

The Distinguished Service Award, presented annually at the Conference and Show, will be given to three outstanding individuals this year. Recipients are Paul E. Weiss, Sr.; Harold W. Stodola and Robert M. Williams. The presentations will be made in Portland, Oregon, February 7, 1977.

A GCSAA Math Manual, designed to assist golf superintendents with calculations in all phases of their work, will soon be available to all GCSAA members upon written request.

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Hodas elected to Directorship of the Irrigation Association

Ernie Hodas of Berkley, Michigan was elected to the Board of Directors of The Irrigation Association at its recent national convention in Newport Beach, California. Hodas is President of Century Supply Corporation of Berkley, which also operates divisions in Southfield and Bronson, Michigan and in Elk Grove Village, Illinois. The firm is an irrigation equipment supplier to the turf and agricultural markets. Hodas has been active with the Association since assuming the Presidency of his company six years ago, and has served as Program Chairman for the organization's 26th Convention in 1975 and as a member of its Landscape Irrigation and Membership Committees.

Prior to his association with Century, Hodas was President of P-G Assco Corporation for 16 years, a firm which manufactured and distributed replacement appliance parts. During this time, he served as President of the National Appliance Parts Suppliers Association. He is an associate member of the Engineering Society of Detroit, the American Society of Agricultural Engineers, the Golf Course Superintendents Association of America and other industry associations.

The Irrigation Association (formerly the Sprinkler Irrigation Association) is a 550-member organization with membership from throughout the United States and overseas. Its members are manufacturers, distributors, contractors, engineers and research personnel interested in the field of irrigation. The Association sponsors an Annual Convention and Technical Conference each year, as

well as eight regional Irrigation Short Courses for the training of industry personnel and users in both agricultural and turf irrigation. It has just recently co-sponsored with the University of Nebraska, the publication of the first Correspondence Course on Irrigation Theory and Practices, and publishes a wide variety of technical material in the field of irrigation, including the world renowned 4th Edition of "Sprinkler Irrigation" and new "Wastewater Resource Manual". The organization is also active in the field of setting standards for industry equipment.

The Irrigation Association is headquartered at 13975 Connecticut Avenue, Silver Spring, Maryland.

WHAT'S IN STORE FOR '77

As the economy continues to improve, we should see a leveling off of prices. Equipment will cost about 5% more this year but some of our materials should drop in price. Fertilizers are once more readily available and bargains can be found especially if ordered early with early delivery and early payments. A savings of 8-12% can be realized in some cases.

The National Association of Golf Course Superintendents is once again presenting helpful Seminars in Pesticide Usage, Management I Landscape and Management II. A Math manual has been added to the pesticide manual.

Take advantage of these aids. If you are not a member, join now. You can't afford not to join.

Correction of Surface Drainage

by FRITZ McMULLEN
Forestlake Country Club
Bloomfield Hills, Michigan

Good drainage is essential for the maintenance and health of turfgrass on a golf course. A great number of the problems we encounter on golf courses, either directly or indirectly, involve drainage.

Three things can happen to water which falls on a turfgrass area:

1. It can move across the surface and runoff.
2. It can infiltrate into the soil.
3. It can remain on the surface until it evaporates.

Surface drainage is imperative for removal of excess moisture during a heavy rain so that we are not depen-

dent on the soil subdrainage system or soil pores to remove large volumes of water at one time. Good surface drainage is one good tool in being able to maintain a uniform stand of turf on any heavily used turf area.

Good surface drainage in Northern regions can also prevent the loss of turf, which often results when surface moisture collects and freezes in close proximity to the crown of the grass plant.

Standing water left from a heavy downpour or from overwatering can weaken turf, make it more susceptible to disease and even cause death by

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Surface Drainage Cont.

scalding if the sun heats the water to high enough temperatures.

Excess water can also interfere with the golfer trying to play golf as well as with the maintenance crew trying to maintain the turf.

Who hasn't closed the course on a rainy day to have it stop raining and the sun come out and your members are stacked up at the starting booth waiting for you to open the course and you can't because of standing water on greens, tees and fairways possibly due to poor surface drainage.

The use of drainage tile lines in the soil can be an effective method of removing excess gravitational water, which will provide for improved air circulation within the root zone. The main purpose of the drainage lines is to lower the water table, so they should be placed at least two (2) to three (3) feet deep in the soil. It must be remembered that the presence of a drainage line at 2 to 3 feet will not improve the infiltration at the surface if the pores in the soil are compacted and will not conduct the water to the drainage lines. Some reasons for this might be: compaction, thatch or an impermeable layer of soil in the soil profile. Therefore, for quick infiltration and removal of surface water, drainage tile is not always the best answer, unless they are connected to the surface with vertical catches or a vertical trench filled with fine gravel to the surface.

Areas where most of our surface drainage problems occur are: Greens, Tees, and Fairways.

Fortunately, today most courses are built by specifications and one of the primary concerns of these specifications is assurance of rapid and adequate surface and subsurface drainage and also built-in guarantees of sufficient moisture retention and available air. This shows that we have realized that in earlier construction we might not have considered surface drainage as a primary factor.

Unfortunately, a lot of superintendents have courses to live with, that haven't been built with much concern with surface drainage, whether with construction of the course or with maintenance of the course over the years.

Some suggestions for solving existing problems of surface drainage are:

French Drains: These are trenches backfilled with anything that conducts water faster than the surrounding soil - usually peat gravel. Then you can, if you choose, cover the last two inches of the trench with a calcined clay product. This prevents club faces from being damaged during play. The turf grows over or covers calcined clay somewhat faster than it does gravel. The reason for leaving the gravel filled slit trenches open to the surface of the soil is really quite simple: if any amount of soil is

Continued on Page 13

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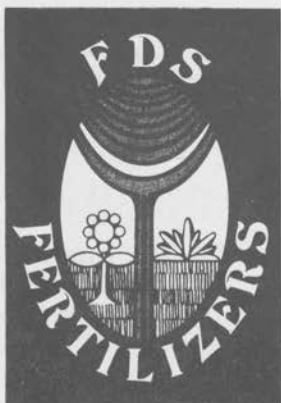
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NAME OF INTERESTED PERSON _____ DATE _____

MAILING ADDRESS _____

CITY _____ STATE _____ ZIP _____

Or you may contact the next golf course supplier who calls on you and give him the information needed for application.

Surface Drainage Cont.

placed over gravel, not only do the smaller soil particles fill or seal the pores of the gravel, but they also act as a blotter or sponge above the gravel and quite effectively keep water from entering as rapidly as necessary. These types of trenches are usually dug with self-propelled trenchers. Examples of these would be a Davis trencher or a Ditch-Witch. Now, this type of French Drain is good for tees and fairways but for greens we usually scale down the operation because of the putting surface and the size of the trenches to heal over.

For greens, we can use a chain saw for slit trenches. We do this to relieve local flooding on greens. We use an 18" chainsaw with an old chain. You cut into the green approximately 14" deep using a back and forth sawing motion. The cut is usually 3/8" wide. We, then, backfill the trench with a calcined clay

product. It takes about two weeks to heal over in good growing conditions and doesn't interfere greatly with play. You can use whatever pattern you like or just cut directly through the low spot. Areas where water used to stand for hours now will dry up in minutes.

Dry Wells: They are sometimes used as outlets where special water problems occur. They are large diameter holes bored down to a water conducting strata and filled with peat gravel. Drainage water is allowed to run into this hole and to be carried away by the lower strata. These holes are usually dug by the use of a power take-off driven posthole digger. Dry wells work fairly well at first, but silt and grass clippings may seal pores in the conducting strata. The dry wells tend to fail after a relatively short time - two to three years.

Sumps: Sumps are used to collect water from drain lines and surface

Continued on Next Page



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Surface Drainage Cont.

drainage. The water is then pumped away from the problem area. This type of installation is required where the discharge water must be raised into a higher level drain line. The sump is constructed by excavating a hole deep enough so several concrete pipes - four (4) to eight (8) feet in diameter - can be placed on end to develop a tank. Tile lines enter the sump below the ground surface at whatever depth is necessary and also surface water through the top. A small pump and motor is installed with a switch activated by a float. The controls are so regulated that the extremes of water levels between alternate fillings and pumpings are from the bottom of the inflowing tile lines down to the lowest level that will not break suction in the pump. The water collected in sump is then pumped into the higher level discharge area.

In many cases, the only remedy for poor drainage on established greens

and tees is reconstruction. Generally, reconstruction is the answer where existing soil has poor texture and structure or the area lacks surface drainage. Minor depressions or low areas that hold surface water can be eliminated by stripping off the sod, filling and grading the area and replacing the sod.

Sandy areas and steep banks around greens and tees tend to dry excessively and require frequent supplemental moisture to maintain satisfactory growth. Aeration and soil conditioners have been effective in reducing runoff and conserving moisture in these areas.

Other tools which are available to superintendents that are helpful in improving surface drainage are:

A. Making sure that all existing tile lines on your course are working to full capacity and their outlet areas are clear. This check on your drainage lines should be done on a regular basis.

Continued on Page 16

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Surface Drainage Cont.

B. Making sure you have an up-to-date map of all the drainage lines and systems on your course and that you keep this up to date including any new drainage systems you may install.

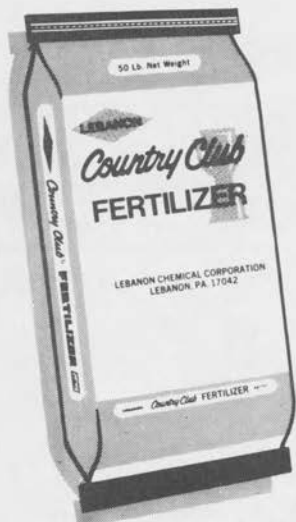
C. Another good tool which is nice to have is a topographic map of your golf course and surrounding area. This comes in handy during any new construction.

D. It is also good to have a transit and level in your shop so that you can check the level and pitch of any new construction on your course. Remember when you eye it in, it is never thoroughly right and may cause future problems.

E. It is important to remember that irrigation lines and drainage lines need to be planned together or you will apply water that might not be able to drain fast enough in wet weather or during extended heavy watering schedules.

F. A good tool that most superintendents forget about using when trying to improve a drainage problem on his course is outside agents: other superintendents in the area, the U.S. Soil Conservation Service or your county drain commission. These are all available to you on your request.

G. Finally, one of our major problems on courses today is that either during construction or during reconstruction, we change our final grading so that it won't drain water into the mains or laterals of our drainage systems. This is not done on purpose but by anxiety to finish a project on the course on the part of the superintendent or green's committee with the final results costing more time in reconstruction or an area of poor drainage which will eventually cost your club lost playing time and real maintenance headaches. Take your time to get an overall picture of the finished product.



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CENTURY RAIN-AID OPENS SOUTHFIELD HEADQUARTERS

As in nature, winter is the dormant season for distributors of lawn sprinkling equipment and irrigation systems. But it's hardly a hiatus for nurserymen and landscape architects who are already busily planning for Spring and Summer. 1977. Of special interest to these groups is Century Rain-Aid's move to new headquarters in Southfield, with emphasis on greatly enlarged customer facilities and a free Sprinkler and Irrigation Design Service that includes custom drawings and specifications, free cost estimates, and complete installation instructions.

Century Rain-Aid specializes in sprinkling and irrigation systems large and small - as small as a residential front lawn, and as large as a 50-acre country estate, an 18-hole golf course, a college campus or a 3,000 acre farm. On or about December 15th, Century Rain-Aid moves into a new 10,000 sq. ft. building at 25235 Telegraph Road, Southfield, Michigan. Says Ernie Hodas, President -

"It will more than double our present storage capacity and customer service facilities. The new layout includes lots of space for parking anytime, even in rush hours. . . plenty of counter space and people to provide prompt service. . . and ample display areas for showing merchandise. The new building also has two big drive-in bays for easy loading and pickup. And the Telegraph Road location is easily reached from downtown Detroit or the suburbs via the expressways and U. S. 24."

To speed customer deliveries and the handling and processing of orders, a time-sharing computer facility will be utilized in conjunction with Dis-tronics, a Western Union Subsidiary. It will handle all billing and other accounting functions. Commenting on



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EXCLUSIVE FRANCHISED DISTRIBUTOR

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Century Rain Aid

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"Today water conservation is more than simply good ecology. High water rates hit everybody right in the pocket-book. Sprinkler controls and automatic shutoffs on irrigation equipment are a must. Our Design Department will furnish custom drawings and specifications for residential, commercial and industrial applications free of charge. We will also recommend the equipment and type of system best suited to each individual need, and provide free cost estimates.

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Century Rain-Aid is exclusive distributor for Rainbird, Nelson, and Safe-T-Lawn products. Impartial industry sources rate the firm as one of the fastest-growing specialists in residential, commercial and industrial irrigation systems east of the Mississippi. Along with its new headquarters in Southfield, Century Rain-Aid also maintains branches in Berkley and Bronson, Michigan, and Elk Grove Village, Illinois.

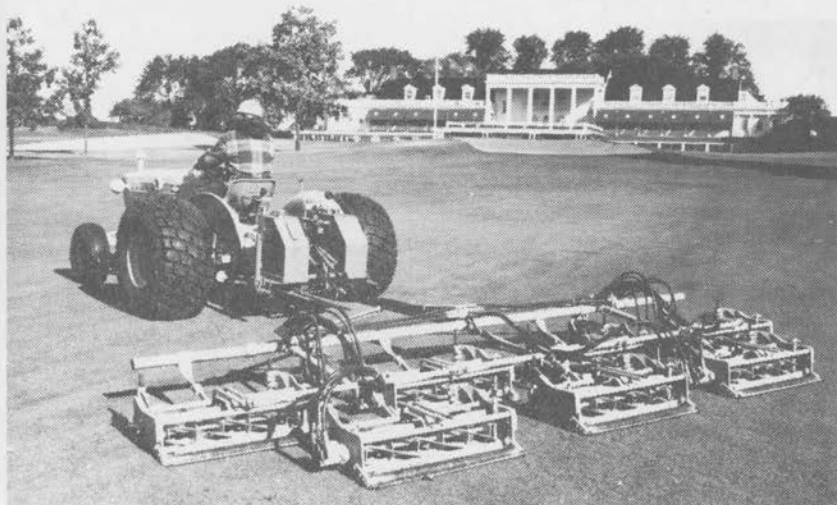
- COMING EVENTS -

**GCSAA 48th INTERNATIONAL
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PORTLAND, OREGON
FEBRUARY 5 - 11, 1977**

**MIDWEST REGIONAL TURF
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West Lafayette, Indiana 47907
FEBRUARY 28 - MARCH 2, 1977**

If at first you don't succeed, you'll get a lot of advice.

ROSEMAN TOW-TYPE HYDRAGANG



HEIGHT OF CUT

$\frac{1}{2}$ " to $\frac{3}{4}$ " in any desired increment. 6" front caster wheels $\frac{1}{2}$ " to $2\frac{1}{2}$ ". 8" front caster wheels $1\frac{1}{4}$ " to $3\frac{1}{4}$ ". Cutting height is gauged by ground reference to provide even cut over undulations.

WIDTH OF CUT

30" per unit. Cutting swath varies for 3, 4, 5 & 6 mowers with maximum of 15' for 7 gang.

TRANSPORTATION WIDTH

From operator's position all mowers are quickly raised and locked into 8' transport width. Overall length 12'.

TRANSPORT CONTROL

Five control levers raise or lower number 4, 5, 6 or 7 units individually and the three center units simultaneously.

REEL

$7\frac{1}{2}$ " diameter 4-blade or 6-blade. Heavy duty chrome-nickel alloy.

REEL POWER — Each reel mounted directly to individual hydraulic motors.

POWER SHARPENING — Back lapping by reversal of control valve handle.

BEARINGS — Anti-friction reel & roller. **MOWER FRAME** — All steel welded.

ADJUSTMENT — Hand, no tools needed.

BED KNIFE — Oil-hardened alloy steel.



LAWN EQUIPMENT CORPORATION

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NEW JACOBSEN® 70" TRIPLEX TRIMMER



The all new JACOBSEN TRIPLEX TRIMMER is the answer to quality mowing in areas that require a lot of maneuverability.

With a mowing speed of up to 4 mph and a transport speed of 7 mph, this 70 inch mower puts a professional finish to fine turf. Great for getting under overhanging branches and shrubs, it will ring trees and be on its way without a second look.

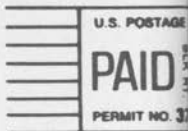
Hydrostatic drive eliminates clutching and shifting in tight areas. Your right foot controls forward and reverse . . . no need to take your hands off the steering wheel while maneuvering in tight places.

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