

Now is the time!

Don't let January leave you in the cold!

Now is the time to take advantage of our annual Early Order Program! Until January 31, you can qualify for special discounts on chemicals including Herbicides, Insecticides, Fungicides, Growth Retardants and Tee and Green Equipment.

EARLY ORDER DISCOUNTS ON CHEMICALS

TUCO



or

Mallinckrodt



EARLY ORDER DISCOUNTS ON TEE & GREEN EQUIPMENT



Wherever golf is played...

or

STANDARD TEE & GREEN EQUIPMENT

Don't delay! Call now! This offer expires January 31. Ask how you can qualify for Anticipatory Cash Discounts!

**Chicago
TORO**
Turf-Irrigation Inc.

YOUR FULL SERVICE TORO DISTRIBUTOR

- Reliable maintenance & repair service
- Highly trained personnel ready to serve you fast.
- Complete inventory of replacement parts.

CHICAGO TORO

911 Hilltop Drive
Itasca, Illinois 60143

(312) 773-5555



Speaker - Bruce Sering, Clinic

A STRICTLY PERSONAL REMINISCENCE OF THE 29TH ANNUAL MIDWEST TURF CLINIC

Bruce A. Sering
Superintendent of Grounds
Glen View Club

Beautiful spring-like day — Don Pakkala, Superintendent of Medinah sure does have the Oak leaves cleaned up on the main drive. Wonder how the back nine looks? Nice assemblage of superintendents today — must be at least 200 and all getting younger looking. Pete Leuzinger and his committee certainly did work hard on this clinic.

Water — Dr. Joseph Rosillon —
Fresh Water Foundation:

What I learned about water: (1) If we have a stable environment, no problem with water, but the availability of water has changed and changed dramatically in the last 100 years. Key word — availability; (2) Water supply is limited, the same water we had thousands of years ago is the same water we have today; (3) There is not an unlimited supply of water and the vast majority of water is salt water. Only one percent of our water is fresh, and of that one percent, three tenths is available. The quality of this available water has altered because of pollution; (4) The rules have changed on who gets this convenient potable water. We, the golf courses, are not even on the list for who gets what water; (5) The water is under my land, it runs through my property, so it's mine. The attitude that "it's my water" is not viable anymore. We are now beginning to realize that there is no such thing as private water. We are going to have to re-evaluate the whole question of riparian rights, prior rights, licensing and everything; (6) How does a golf course get water? By making yourself important, through information, education and incentive; (7) Use recycled water from ponds, use effluent water, and have good controls on the water you do use.

I enjoyed Dr. Rosillon's talk and, of course, there was much more to it, but these were the points that stuck in my mind. His discussion also brought home to me how the Chicago area superintendents, C.D.G.A., and Midwest universities have been working on using recycled and effluent water. Most courses in the Chicago area have dug ponds in the past 20 years to collect run-off water for irrigation. The University of Illinois, with much financial aid from the C.D.G.A. and cooperation from superintendents, is hard at work and has been for a number of years pursuing the uses of effluent water. Every superintendent in the area is optimizing the use of water by cultural and mechanical means, i.e., automatic water systems, aerification, use of wetting agents, etc.

Coping with Adversity - Carl Landgrebe, C.G.C.S. -
Hinsdale Golf Club

Doom - Disasters - Adversity - Dead Grass - Floods - etc. Carl told us to keep everything in perspective. Have a positive attitude at all times even when things are looking their bleakest. That, after all is said and done, how we visualize ourselves is what matters. He gave us examples as to how he turned adversity to his own advantage. One of these was the storm water management project that cut through the golf course.

Fertilizer Evaluation - James D. Mello - Nice 'n' Green
Plant Foods, Inc.

Jim gave us an excellent recapitulation on good nutrient management and how important the timing of applications are. I must admit to the fact that when I see slides on the relative merits of one fertilizer being better and less expensive than some other, my mind commences to wander. The eyes just seem to glaze over. I'm sure fluff has its place in our industry, but liquid applications have never seemed efficient, or a cost effective way to fertilize, not to mention uniform coverage. This conclusion was arrived at after many years on the working end of the nozzle and an observation of the results. Please, dear friends, save your 20 cent phone call telling me that it's the operator's fault the coverage was poor. Remember, I stated this is a personal reminiscence of the turf clinic.

Ataenius and Bag of Worms - Dr. Roscoe Randall -
University of Illinois

Superb dissertation on the various bag of worms that inflict damage to our golf courses. The paramount point of Dr. Randall's talk to me was his phone number - 217/333-6650. I know if there are any insect problems I cannot come to grips with, there is Dr. Randall just a phone call away ready and willing to help. Besides the recapitulation of uses of various insecticides, I learned about the menace that's attacking honeysuckle. An aphid is killing the honeysuckle. This little juice-sucker is going undetected because of its habit of folding the leaf over itself and the only research on it is printed in Russian.

I.T.F. and Research - Dr. Tom Fermanian -
University of Illinois

Join the Illinois Turfgrass Foundatin and help the University of Illinois help us. Without our support, our assistance, and our money, the research at the university cannot continue or improve. Dr. Fermanian showed us how they use computers on research projects and the utilization of data bases.

C-15 Syndrome

Dudley Smith - Silver Lake Country Club;
Dr. Dave Wehner - University of Illinois;
Dave Roberts - Michigan State University;
Pete Leuzinger - St. Charles Country Club

There was so much information in this panel discussion on the C-15 problem, it alone could have been the turf clinic. These fine men have toiled long and hard with C-15 decline and they deserve our gratitude for their efforts. It boggles the mind to think of the many long hours Pete and Dudley spent trying to save their greens. The dedication to the greenskeepers art. The unselfishness. The professionalism. It makes me proud to bask in the reflected glory of their devotion to our occupation. I'm gratified by the knowledge that we have research people like Dave Roberts and Dr. Wehner working on our problems. A real educational experience was lost for those of you who missed this particular segment of the program.

Lawn Diseases - Mr. Ed Solon - Chemlawn Corporation
Powdery Mildew - Leaf Rust - Fusarium Blight - Dollarspot - Helminthosporium (leaf spot) - Brown Patch - Smut - Red Thread - Grey and Pink Snow Molds - Pythium — Reviews of turf diseases are always in order. Ed gave us a good overall look at how these diseases affect a home lawn and the controls a homeowner may use. I see this presentation as a tool to help us to communicate with our members. We all know how members ask the superintendents about their (the members) own home problems. This talk will help us towards that end. As our President, Mike Bavier, stated in his message, "Communicating is an art both vital and simple ... There are many such chances to communicate and we must use every one of them. Because we may be denied access to situations such as Board meetings. We often give up on the many smaller, everyday opportunities. A superintendent's communications effort should always start with the small things; first, build meaningful one-on-one relationships..."

Storm Water Management - Bill Lindley - Architect, Lindley & Sons

This discourse on storm water fits in nicely with Dr. Rosillon's speech on water. Storm water is a resource out of place. If we use this run-off water intelligently, it will be an asset to our golf courses. We may use this water for irrigation as well as to beautify and enhance the entire layout. One point that hits home in Mr. Lindley's talk is that storm water management is **not** for amateur architects. So much time and money can be wasted if a less than certified engineer is used, not to mention the poor and non-functional result.

Proper Planting and Care of Trees - Jack Obert

Mr. Obert's specialty is tree planting with an emphasis on mechanical tree planters. The salient points to remember in Jack's talk were:

- (1) use improved varieties
- (2) make sure the root ball is the correct size
- (3) soil requirement of the tree you select

Sand Topdressing - Be Aware -

Dr. William Daniel - Purdue University

Dr. Daniel told us to be cognizant of all the factors that are involved in a sand topdressing program.

BE AWARE: Sand size is very important. Select a sand with suitable particle size. See Purdue University sand analysis paper. Don't try sand topdressing program if you cannot get the proper sand.

BE AWARE: Disease patterns will change on sand topdressed greens. Dollarspot may become a problem.

BE AWARE: Frequency of fertilizer applications and the need for more N may appear.

BE AWARE: The infiltration rates of sand topdressed greens will change as more and more sand is incorporated. Careful irrigation management is needed.

As you can see the main thrust of Dr. Daniel's paper is awareness of what sand topdressing is before you start such a program. It is an excellent procedure but — **BE AWARE.**

Conclusion:

The summing up of this 29th Annual Midwest Turf Clinic is the amazing amount of knowledge one can acquire. All these first class men imparting their wisdom to us and all we have to do is soak it up. To those of you who were in attendance, use the knowledge well. To those of you who were unable to be with us, see you, God willing, at the 30th Annual Midwest Turf Clinic.

HYDRAULIC OIL DYE TORO P/N 44-2500

Toro has available an approved liquid red hydraulic oil dye. This dye has been endorsed by our hydraulic component suppliers as being totally soluble and in no way affects the warranties of their components.

The oil will be packaged in a 20 milliliter (approximately 5/8 ounce) bottle. One bottle will be sufficient to properly dye a 4-6 gallon reservoir. This dye can simply be added to the oil (does not need to be premixed) in the reservoir and it will self-mix.

Remember, hydraulic system maintenance becomes important to protect both the equipment and the property. Leakage is probably one of the major concerns of equipment operators today. There are several things that can be done to prevent unexpected leakage occurrence.

- Routine inspections of machines will often spot potential damage causing deficiencies before they develop.

- Be alert to items such as hoses rubbing on tires or against sharp metal edges.

- Inspect hoses for cuts in the outer rubber coating. If this occurs corrosion can take place on the inner hose wire braid, thus leading to eventual hose failure.

- When removing implements ensure that hoses connected to the reel motors are not twisted. Be careful how and where reel motor is placed so sharp bends are not imposed on the hoses. Careless handling of the motors could also cause the fitting to loosen.

Dirt, water, air, metal particles and improper oils are all agents which cause hydraulic component failure. No matter how well we care for our hydraulic system there will be a certain amount of build up of these contaminants in the hydraulic system. The only defense against these agents is regular hydraulic fluid changes and hydraulic filter changes.

DYE IS NOT A SUBSTITUTE FOR A GOOD PREVENTATIVE MAINTENANCE PROGRAM.

This dye can be used in any hydraulic equipment and will be available through our Parts Department at \$2.49 per bottle.

J. NOER RESEARCH FOUNDATION AIDS RARE BOOK COLLECTION AT MICHIGAN STATE UNIVERSITY

Michigan State University recently acquired, through grand funds from the O. J. Noer Research Foundation, a copy of Dr. Frederick Hanham's **Natural Illustrations of the British Grasses**, published in 1846. The book, bound in blue watered silk, contains 62 preserved specimens accompanied by a descriptive text. The planned 1,000 copies required a great deal of work by Dr. Hanham himself, since he collected and prepared all the 62,000 plants required for the anticipated 1,000 copies to be printed. Half again as many plants would be required due to culling and, understandably, only 850 were printed.

The rare book collection is but one part of the cooperative efforts by Michigan State and the Noer Foundation to establish a collection of books, periodicals, conference proceedings and other literature dealing with turfgrass, its production and management. This includes all copies of **Goldfom** and its successors, **The National Greenkeeper** and its successors and **The Bulletin of the U.S.G.A. Green Section.**

James M. Latham, Research Director



LAKE-COOK FARM & GARDEN

TURF DIVISION

- BULK FERTILIZERS
- BAGGED FERTILIZERS
- LIQUID FERTILIZERS
- TURF CHEMICALS
- AQUATIC CHEMICALS
- TURFGRASS SEED

- ICE MELTING COMPOUNDS
- SOIL CONDITIONERS
- MULCHES
- TOOLS
- BEDDING PLANTS
- PETROLEUM PRODUCTS
and
- OIL DRY

Call your personal turf consultant today:

Bob Baker — Mike Dare — Jerry Hough — Don Michaels

Lake Villa Plant — (312) 356-9600
170 Cedar Ave., Lake Villa, IL 60046



MEET THE FAMILY

Come meet the members of the growing Pickseed family of fine grass seeds. They're all achievers each strong and gaining recognition in the grass seed industry for individual quality and performance. It's not every grass seed that gets to bear the Pickseed Family name. We're choosy and proud of it! Rigorous testing and evaluation assures that each new variety meets high Pickseed standards before it's ready for a public introduction. The Pickseed family name ... an assurance of quality from us to you.

PICKSEED
PICKSEED WEST Inc.

P.O. Box 888, Tangent, OR 97389 (503) 926-8886

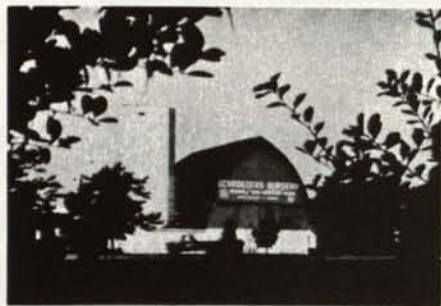


Illinois lawn
equipment inc.
Orland Park, Ill.
(312) 349-8484

Genuine authorized replacement parts
carry a factory pedigree;
Give us a try and you will find
they cost far less for such quality!

Our 28th Year

Schroeder's Nursery, Inc.



TREES - EVERGREENS - SHRUBS

Specializing in large Caliper shade trees and Ornamentals.
We also offer complete installation service.

TELEPHONE: (312) 546-9444

Arthur E. Schroeder
Richard A. Schroeder
Don Virgens

GRAYSLAKE, ILLINOIS
23379W Route 60

Nursery on Rt. 60 between Rtes. 12 (Volo) and 83 (Ivanhoe)

Nels J. Johnson, Tree Experts, Inc.

SINCE 1930

Nels J. Johnson, Sr.
Nels J. Johnson, Jr. - Karl G. Johnson
Complete, economical tree service for Private Estates,
Parks, Municipalities, Golf Courses, Cemeteries,
Schools, Industrial Areas.

All phases of Arboriculture, Diagnosing, Pruning, Treating,
Transplanting, Fertilization, Hydraulic and Mist Spraying,
Removals. Stump Routing. Municipal Forestry. Chemotherapy
for elms, and other trees.

• **FULLY INSURED** •

Graduate -- Licensed Arborists

MAIN OFFICE - 912 Pitner Avenue, Evanston, Illinois 60202
Phones: GRreenleaf 5-1877 - GR 5-5255
Hinsdale, Illinois - FA 5-0970

PAARLBERG CHEMICALS

featuring

- Par-Ex Fertilizer
- Vertagreen Fertilizer
- Du Pont Chemicals
- Chipco Chemicals
- Daconil - Dacthal
- Bean Sprayers
- All Major Turf Supplies

Quality • Value • Service

1840 E. 172nd St., So. Holland
312-474-3086 312-258-3485

LABOR-SAVING GRASSES



GLADE KENTUCKY BLUEGRASS

- Does Great in Sun Or 60% Shade
- Excellent Disease Resistance to Powdery Mildew - Stripe
Smut - Leafspot - Rust
- Quick Recovery - Fast Germinating

Adelphi

KENTUCKY BLUEGRASS

- Greens Up Earlier in Spring - Stays Green Longer In Fall
- Great Resistance To Disease

CITATION

FINE LEAF PERENNIAL RYEGRASS

- Performs Great In Hot, Humid Areas
- Improved Mowing Qualities
- Blends Well With All Other Grasses

- Low Growing -
Tolerates Close
Mowing

**FOR MORE DETAILED INFORMATION AND
TEST RESULTS WRITE TO:
VAUGHAN'S**

5300 Katrine Avenue, Downers Grove, Illinois 60515, (312) 969-6300
WAREHOUSES LOCATED IN:
Bound Brook, New Jersey • Landover, Maryland • Ovid and
Grand Ledge, Michigan • Spokane, Washington

The best in turf supplies -
LESCO 100% Sulfur-Coated Fertilizers,
golf course accessories, chemicals including

LESCOSAN

A highly effective pre-emergence
(800) crabgrass and poa annua control (800)
321-5325 362-7413
NATIONWIDE Available from: IN OHIO

LAKESHORE EQUIPMENT & SUPPLY CO.

"Home of LESCO Products"
300 South Abbe, Elyria, OH 44035

McGinty BROS., INC.

LAWN CARE TREE CARE
Weed, Crabgrass and Disease Tree Spraying, Feeding,
Control/Fertilizing Surgery, Trimming, Removal
HYDROSEEDING

RT. 2, BOX 518, LONG GROVE ROAD
LONG GROVE, ILLINOIS 60047 / (312) 438-5161

J. B. DESIGN, INC.

Landscape Design & Construction

- Spreading trap sand in winter
- Tree removal and stump grinding

Call John Jackman or
Jim Bussey

for more information.....668-8129

ROSEMAN

2620 CRAWFORD AVE. 864-1842
EVANSTON, ILLINOIS

TURF EQUIPMENT HEADQUARTERS

ROSEMAN GANG MOWERS	FORD TRACTORS
TILLER RAKES	DEDOES AERIFIER
LELY SPREADERS	LOADERS
SEEDERS	LEAF MULCHERS
ROTO TILLERS	ROTARY MOWERS
HOMELITE CHAIN SAWS	HOMELITE PUMPS

SALES ● SERVICE ● PARTS ● RENTALS

BOJO TURF SUPPLY CO.

ALL MAJOR TURF SUPPLIES

BoJo

TURF
SUPPLY CO.

- PAR-EX
- Vertagreen
- Du Pont
- Diamond Shamrock
- Sand Blasters
- Cyclones
- Fore Par

R R 1, Box 52
Peotone, Ill.
312-258-3485

ASPHALT DRIVEWAYS — PARKING LOTS — ETC
"Golf Course Work a Specialty"

LEMONT PAVING CO.

SAND & STONE

115th & Archer Ave (Rt 171) - Lemont, Illinois

RAY MURPHY

257-6701

WANTED

Used Late Model Foley Reel Grinder
in good condition.

Call 815 — 469-9421, Mike Rafacz

FOR SALE

1 - 1948 Toro General Tractor, Serial #29282, 4 cylinder Ford Industrial Engine. Good condition. \$800.00.
1 - Jari Power Scythe (36" sickle bar). Excellent condition, few hours of use. Best offer.
100 - Wooden Sand trap rakes, 26" heads with 14 teeth, two support wires, 6' handle, have been painted red. 50 cents each.

Call Fred Opperman, Glen Oak C.C. (312)469-6220.

GOLF COURSE MAINTENANCE SUPERVISOR

For 18 Hole Regulation & 9 Hole Executive Municipal Golf Courses. Excellent Benefits, Vehicle provided, Salary Range \$17,000 - \$23,000. Send Resume to Jerry Zwolak, Waukegan Park District, P. O. Box 708, Waukegan, IL 60085.

FOR SALE

Ideal Reel Mower Sharpener, Model 900, like new, used 1 month, \$600.00. Contact Jerry Zwolak, Phone 312/336-8209.

AL RADKO, NATIONAL DIRECTOR, RETIRES

Distinguished Green Section Career Spanned 35 Years

Alexander M. Radko, National Director of the Green Section of the United States Golf Association, has announced his retirement effective November 30.

"A leader of national prominence, a dedicated educator, a professional with great personal character," are but a few of the comments which have been used to describe Al Radko, a man whose 35-year career with the Green Section has been marked by many outstanding achievements and contributions to the turf management field.

Throughout his career as a Research Assistant, Agronomist, Eastern Regional Director and finally National Director, Radko has provided untiring service to golf course superintendents, the turfgrass industry and the game of golf.

Born and raised in Yonkers, N.Y., Al first became interested in golf as a caddie at the Sunningdale Country Club. The experience made a lasting impression which guided him into his career in golf.

BECAUSE WE'VE BEEN A
PRIME SUPPLIER TO
GOLF COURSES SINCE 1925:



WE HAVE THE EQUIPMENT YOU NEED.
WE HAVE THE ACCESSORIES YOU NEED.
WE HAVE THE GRASS SEED YOU NEED.
WE HAVE THE CHEMICALS YOU NEED.
WE HAVE THE PROMPT SERVICE YOU NEED.

...PLUS A STAFF OF PROFESSIONAL AGRONOMISTS.

EARLY ORDER DISCOUNTS? OF COURSE!
SPRING DATING? OF COURSE!

ONE CALL DOES IT ALL

763-6363

WE'LL COME A-RUNNIN'!



Davis

QUALITY TURF PRODUCTS,
SERVING THE PROFESSIONAL
SINCE 1925

GEORGE A. DAVIS, INC.

5440 NORTHWEST HIGHWAY,
CHICAGO, ILLINOIS 60630

(312) 763-6363



MILAEGER

Well and Pump Co.

GOLF COURSES
INDUSTRIES
MUNICIPALITIES
SUBDIVISIONS

- Deep Well Drilling and Pump Installation—
- Well Development by Acidizing & Shooting—
- All Makes of Pumps Repaired—
- 24 Hour Service—
- TONKA—Water Treatment Equipment—

BYRON JACKSON PUMPS

Division of Borg Warner Corporation
Line Shaft Turbine Pumps and Submersible
Pumps to 700 HP and 1,200 ft. Settings

Servicing Wisconsin and Illinois
for Over 60 Years

20950 Enterprise Ave.
Brookfield, WI 53005
[414] 784-3960

640 Pearson Street
Des Plaines, IL 60016
[312] 296-8707

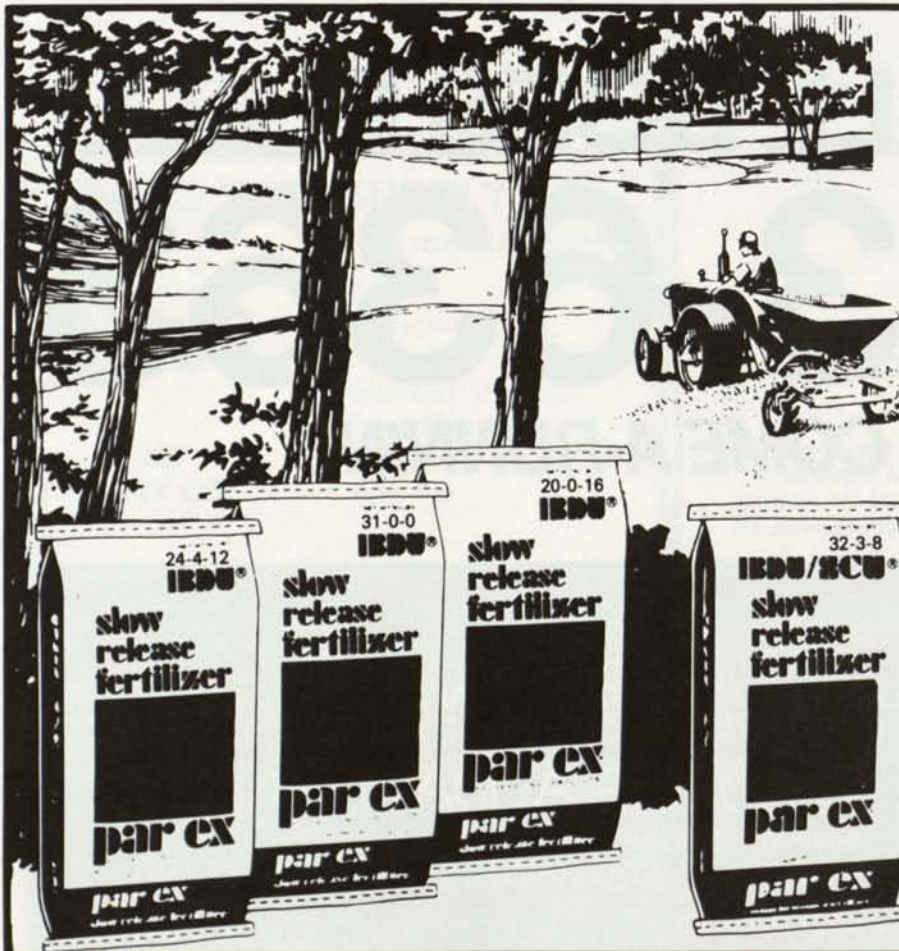
NORTHBROOK SUPPLY COMPANY
933 Cedar Lane
Northbrook, Illinois 60062
312 — 498-4491

Your Headquarters for Maintenance Supplies

Hand Tools	Aerosols
Power Tools	Hand Cleaners
Piping Tools	Chain Supplies
Shovels	Safety Equipment
Rakes - all kinds	Locks
Fasteners	Battery Cables
Maintenance Chemicals	Ladders
Drills	Metric Fasteners
Electrical Terminals	Brushes

This is just a partial list

... We will Help you with those Hard to find Items ...
Call us today 312-498-4491



par ex®

PROFESSIONAL PRODUCTS

IBDU® (31-0-0) and PAR EX® fertilizers with IBDU are custom formulated for high maintenance, high quality turfgrass. Check with your local PAR EX territory manager or distributor for other available grades.

Turf Products Ltd.
West Chicago, IL 312/668-5537

Paarlberg Chemicals Co.
South Holland, IL 312/474-3086

Olsen Distributing Co.
Barrington, IL 312/381-9333

Professional Turf Specialists
Normal, IL 309/454-2467

Cliff Beiden
Eglin, IL 312/697-IBDU

Rowland's Equipment, Inc.
Barrington, IL 312/381-1084



TERSAN® 1991 + Daconil 2787

Put the proven performers together for even better control of brown patch, dollar spot and other serious diseases.

TERSAN® 1991 fungicide and Daconil® 2787 are two of the most effective disease control products on the market. And now, these proven broad-spectrum fungicides are labeled for tank mixing. Together, they give you even better control of major turf diseases than with either product used alone. You get improved control, yet without the problem of phytotoxicity common with some tank mixes.

A TERSAN 1991/Daconil 2787 tank mix will give you consistent performance against brown patch and dollar spot—the two most troublesome diseases on turf each summer. You'll also get strong action on leaf spot and other important diseases. It's the kind of performance superintendents depend on when a quality course can't be compromised.

*Daconil 2787 is a registered trademark of Diamond Shamrock Company.

Tank mixing brings other advantages, too. With TERSAN 1991 in your tank, you get systemic action for protection from within the turf plant. Disease control is longer lasting and is less affected by rainfall or frequent irrigation. Tank mixing fungicides with different modes of action also reduces chances of benzimidazole resistance. You help insure the long-term effectiveness of TERSAN 1991 in your disease control program.

This year, plan on using TERSAN 1991 in combination with Daconil 2787. It's the tank mix turf diseases can't match.



With any chemical, follow labeling instruction and warnings carefully.

