GOLF COURSE NEWS
THE NEWSPAPER FOR THE GOLF COURSE INDUSTRY

A UNITED PUBLICATION
VOLUME 4, NUMBER 8
AUGUST 1992

Summit meeting
Golf Summit '92, Oct. 21-23 in Orlando, will assess the state of the game and the business of golf. ...3

Developing the North Country
The Banff Springs area of Alberta could be home to 10 new golf courses 30

Environmental liability at issue on finance front
By PETER BLAIS
Fleet Financial Group Inc. recently became the first major bank in the country to require nearly all major commercial real estate lenders to obtain environmental liability insurance before getting a loan, a move likely to be followed by other financial institutions that could add thousands of dollars to the cost of a golf course development.

Ransomes America working to sort out consumer confusion
By HAL PHILLIPS
Our goal is to have a corporate brand identity by the 1993 GCSAA Show in Anaheim.
— Irv Aal, president Ransomes America

Environmental liability
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GCSAA to conduct exclusive research
Withdraws funding slated for USGA
By MARK LESLIE
The Golf Course Superintendents Association of America has withdrawn financial support from United States Golf Association research program to launch research projects of its own.

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Environmental liability
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Course owners explore the intricacies of group buying
By HAL PHILLIPS
The National Golf Course Owners Association (NGCOA) is implementing a cost-saving measure that management companies have employed for some time: Group purchasing.

Composting is sensible, but is it profitable?
Warren's Nurseries acquires Turf Merchants
What's new in the marketplace
For more than 20 years, turf managers have known Fungo® is the fungicide they can always trust—for reliability and effectiveness.

Fungo provides broad spectrum control of most major turf and ornamentals diseases. And, Fungo is economical to use. Its systemic activity keeps on working for up to 14 days with one application.

And now, Fungo is available in dry flowable form, as well as in liquid flowable and WP. Just choose the one that’s perfect for you.

Contact your Grace-Sierra distributor today and tell him you want Fungo.

Or call us today toll-free at 1-800-492-8255.

Use Fungo. You’ll swear by it for good.
JUPITER, Fla. — Golf Summit '92, the fourth in a series of biennial leadership conferences hosted by the National Golf Foundation, will be held Oct. 21-23 at the Marriott's World Center in Orlando, Fla. As in the past, said NGF President and Chief Executive Officer Joe Beditz, "the summit will provide members of the industry the opportunity to step back and objectively examine the state of the game and business of golf... and to help determine what can be done, both collaboratively and individually, to enhance the growth and vitality of the game."

This year's summit program will focus on four major issues within the areas of:

- GOLF AND THE ENVIRONMENT
- NEW DIRECTIONS IN GOLF COURSE DEVELOPMENT
- GOLF AND THE BUSINESS OF GOLF
- FUTURE DIRECTIONS IN GOLF MANAGEMENT

Some of the answers will be forthcoming in a special study on golf and the environment that was commissioned earlier this year by the NGF (see story below). The results of this study will be presented and discussed as part of this session.

Questions to be asked by the consultant firm of Vinson & Elkins include:

1. Which environmental concerns/issues do you consider an existing or potential threat to your industry or business?
2. How do they affect you?
3. Which ones are the most important/critical to you?
4. What would you suggest be done (organizationally and/or individually) that is not being done now?

The findings of the study will be presented at the Golf Summit in Orlando in October.

### NGF commissions environmental study

**JUPITER, Fla. —** The impact of environmental regulation and legislation on the cost of developing and operating golf facilities will be assessed by the National Golf Foundation in response to numerous golf industry inquiries.

Possible industry actions could follow this analysis.

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### 1991 Average Daily-Fee Maintenance Expenses

<table>
<thead>
<tr>
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<td>Repairs</td>
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<td>Supplies</td>
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<tr>
<td>Payroll taxes/Benefits</td>
<td>$36,463</td>
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<td>Salaries</td>
<td>$156,594</td>
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**Other**

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- **Repairs:** $33,258
- **Supplies:** $46,024
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- **Salaries:** $156,594

**0**

**$100,000**

**$200,000**
Troubled course reopens despite flagging sales on home front

IPSWICH, Mass. — When Ipswich Country Club and its remaining homesites were reclaimed by the banks in October of 1990, many believed the doors of the Robert Trent Jones-designed course would never reopen.

However, the course — set amid 350 acres of white pine and hardwood north of Boston — is alive and well. The turnabout came when the club and course were purchased for $5.8 million by Ipswich Joint Venture 1 Limited Partnership, headed by Spencer Alpert, Hans E.R. Bosch and Jeffrey Rosmarin, principals of the group.

The three New York-based investors have extensive backgrounds in real estate, country club development and management.

The club is open again and accepting memberships, which the banks are hoping will fuel interest in the 67 homesites still available.

Real-estate-based developers still paying the price

In South Carolina, slower home sales have driven residential developers to sell the amenities they once counted on to hasten land sales and raise prices — their golf courses.

Nationwide, at least 10 percent of 2,600 residential developments centered on golf courses are in some sort of financial distress because of a lack of sales. And perhaps hundreds have sold — or are quietly trying to sell — their courses, either to free up cash or to get out of the flagging real-estate-related golf business.

"They're sick of it and want to get rid of it," Craig Price, VP of the New York Times News Service. Price is executive vice president of American Golf Corp. "We're talking with one developer in Chicago who thinks golf is dumbest thing he's ever seen, but he's got all these experts telling him to put in a course.

"The project is 100 percent over budget and he's not selling anything."

Many of the distressed golf course developments are the South, particularly in Florida and the Carolinas, where nearly three-fourths of all courses built in the last few years were conceived as fixtures for housing developments.

It's difficult to ascertain precisely how many courses in South Carolina are for sale since developers or their lenders are reluctant to advertise their problems. "This is a very quiet network," according to Ricky Bell, a golf course-real estate analyst based in Winston-Salem, N.C.

Bell added that Myrtle Beach continues to thrive. More than 60 courses have been constructed there since 1980, but very few with housing developments.
Sierra Club kills muni expansion

PALM SPRINGS, Calif. — Reported Sierra Club opposition, coupled with earlier objections from golfers and horse owners, led the local Planning Commission to defer action on plans to expand the 18-hole municipal golf course and move the Las Palmas Equestrian Center.

The environmental groups sought to delay commission action on the $14 million plan which would add 18 holes to the municipal course, add water and sand hazards to the existing course, and move the equestrian center to a city-owned site at Mesquite Avenue and Vella Road.

The Sierra Club in 1990 blocked the city from letting a developer build a two-hotel, 900-home resort in the undeveloped Palm Hills. It also sued to stop a developer's $960 million plan for a posh resort in the Palm Canyon area south of Murray Canyon Drive.

Golfers objected to paying higher fees to underwrite the expansion.

Course slated for ex-smelting site

ANACONDA, Mont. — The local Old Works smelting site may become a golf course.

The Atlantic Richfield Co. (ARCO) Superfund has a $1 million contract with the design firm of golf pro Jack Nicklaus, Golden Bear, Inc. Half will be for conceptual design and engineering, half for construction oversight for a "world class" course.

A golf course is considered a reasonable land use for the site, once wastes either are removed or "capped." Course completion probably will be in 1996. The course's design will incorporate an interpretive walking tour of historical features associated with the Old Works smelting site.

Insects invade Coachella Valley; superintendents fighting back

SAN DIEGO, Calif. — Bug off, aetiæs. The 84 golf courses in the Coachella Valley have been under attack by these insects who have been feasting on the roots of grass plants.

"It's tough enough to grow grass in 100-degree weather," noted Ross O'Fee, course superintendent at The Springs Club, "without being under underground attack."

The Hi-Lo Desert Golf Superintendents Association, of which O'Fee is immediate past president, recently struck back with a fund-raising golf tournament at The Springs earmarked for turf grass research and aimed at aetiæs.

The tournament realized $20,000. Greens chairmen, club presidents, club pros and other participants took many a hearty swing at a vexing problem while enjoying the day.

Pros to pay for improvements at Indy courses?

INDIANAPOLIS — The Indianapolis Department of Parks and Recreation, seeking $3.3 million over the next three years for improvements on its 12 municipal golf courses, is concentrating its search on the pocketbooks of course professionals.

Contracts with the dozen professionals, paid $3,000 a year, expire Dec. 31.

Proceeds from pro shop operations, cart fees, lessons and concessions supplement the pros' salaries.

The city plans to renegotiate with the professionals or, as the city terms it, create an enterprise fund. Whatever the terminology, the course professionals will likely be the poorer, but the city may realize much of the $1.2 million for improvements needed this year.

Indiana DEM reorganizes

The Indiana Department of Environmental Management has reorganized its enforcement efforts into a single office.

Air, water and waste management programs now are under one IDEM umbrella.

Said director Kathryn Watson: "This multimedia approach recognizes that different types of pollution violations can occur at a given site, that they may be interrelated, and they should be corrected at one time."
Judge sides with McLoughlin in libel suit against GCSAA

The most business-like and professional way to approach this thing is (to say) that we reached an amicable settlement and just let go.

— GCSAA attorney Robert Ochs

GCSAA Update

Pacific Rim office opens in Singapore

SINGAPORE — The Golf Course Superintendents Association of America has opened an extension office here in an effort to share technical expertise with Japan and other nations around the Pacific Rim.

The GCSAA will sponsor a Pacific Rim Golf Course Conference and Trade Show March 15-21, 1993, also in Singapore.

Staff members in the overseas office include Don Brethauer, manager of Pacific operations, and Linda Fortunato, international conference and show manager. They can be contacted by phone at 65-568-2224; by fax at 65-568-2473; or by writing to GCSAA (Singapore), Pte. Ltd., 2 Jurong East Street 21, #04-21C, IMM Building, Singapore, 2260.

Four seminars offered this year

LAWRENCE, Kan. — The Golf Course Superintendents of America will host four three-day executive development seminars this season.


“Technical Training for Your Spray Technicians,” a series of GCSAA training programs for golf course maintenance crew members in 1992 and 1993, will be offered at 30 locations within the United States.

By MARK LESLIE

A U.S. District Court judge reinforced wrongdoing on the part of the Golf Course Superintendents Association of America but reduced the $1.45 million judgment by half in the longstanding civil action brought by ex-GCSAA Executive Director Jim McLoughlin.

The jury a year ago had awarded McLoughlin $457,742 on his breach-of-contract claim, $500,000 in compensatory damages on his libel claim and $500,000 in punitive damages. But Judge Richard D. Rogers dropped the compensatory and punitive damages to $180,000 apiece, stating that the jury finding was excessive.

It was left to McLoughlin to accept the reduced amount or ask that a new trial be ordered. The first trial lasted 30 days, and McLoughlin opted to end the ordeal and the added expense of a new court proceeding.

McLoughlin attorney Dennis Egan of Kansas City said: “While the judge in his conservative wisdom felt it necessary to reduce the amount of the jury’s verdict, we are very pleased that (he) totally reaffirmed all the jury’s findings of wrongdoing and libelous actions that were the basis for filing the lawsuit in 1985 and the basis for the jury’s historic $1,457,000 verdict.

“The judge’s decision and jury’s verdict only work in concert to fully exonerate (McLoughlin) of the numerous false charges directed toward him during his tenure as GCSAA executive director for the period 1980-83,” GCSAA attorney Robert Ochs said: “The most business-like and professional way to approach this thing is (to say) that we reached an amicable settlement..."
Tribe supports course project

COEUR d'ALENE, Idaho — An 18-hole golf course would be a feature of a multimillion-dollar waterfront resort complex the Coeur d'Alene Tribe hopes to build on its reservation by 1993. The favored site would be on the south end of Lake Coeur d'Alene. The local tribe is one of about 150 seeking socioeconomic development grants from the Administration for Native Americans.

N.Y. developer toes the line

GORHAM, N. Y. — Developer Douglas Negley made a public apology for tardiness in hiring an engineer for his proposed $500,000 100-acre golf course, but some who attended a recent public hearing were more concerned that Robert Topping, the man Negley hired, was absent. Topping reportedly required another week to flesh out the course application. Environmentalist Barbara Fouquet worried that rain would speed erosion. Work on the 18-hole course had been underway for over a year before Negley sought permission from the town's planning and zoning boards and the state Dept. of Environmental Conservation.

The town halted work last year, charged Negley with breaking a local erosion law, and gave him six months to hire an engineer and bring his plans up to code. Board members want to ensure that a 15-foot high earthen dike near Fisher gully and a pond which would serve as the course's irrigation reservoir would not burst.

Golf Course Europe gains momentum

MONTE CARLO, Monaco—Palmer Course Design Co., Jack Nicklaus Golf Services, Buckner Europe, Globe Golf A.G., Kato International Design and The Toro Co. have all committed to Golf Course Europe Nov. 12-14, in Monte Carlo. Coupled with the International Golf Development and Investment Conference for the first time, Golf Course Europe will feature golf industry authorities who will provide developers and owners with an insight into developing a golf course, obtaining investor financing, marketing club memberships, and tapping into the Asia-Pacific golf tourism boom.

Other conference topics include the opportunities presented by the unification of Europe and the opening of Eastern Europe. For more information contact Charles Duflf at 415-453-1184.

Agenda issued for Golf Summit '92

Continued from page 3

late responsible development, while meeting the need for affordable and more user-friendly golf courses.

- PLAYER RETENTION — Driving this session is the fact that, although some 11 million people have tried it most of these have remained only occasional golfers.

In addition to learning what new initiatives are underway to improve this retention rate, Summit '92 participants also will be asked to help identify other actions which both organizations and individuals can take to nurture beginners and to encourage more occasional golfers to play more frequently.

- ACCESSIBILITY — Since 1990, there has been a growing appreciation for the fact that this issue involves not only minorities, but women, juniors and the disabled as well.

Summit '92 will ask participants to look at the progress that's been made in this issue area and help determine what more can and should be done.

Golf Summit '92 also will examine the progress made on the industry's Strategic Plan for the Growth of Golf prepared for industry review and action by the NGF and introduced in 1988. The plan, which sets forth a portfolio of strategies and action plans for maximizing the game's potential for growth, will be reexamined and updated in light of current trends in golf participation and new golf course development.

This year's meeting will be structured for audience participation. There will be breakout sessions as well as ample time reserved for questions and answers in the general sessions.

Summit '92 begins Oct. 21. Events for that day include a golf tournament and the opening reception. The general sessions will take place over the next two days. A reception and awards banquet is scheduled for the evening of Oct. 22, at which the recipients of NGF's 1992 Grafdis and Family Golf awards will be honored.

For more information or to register, call NGF's Summit '92 office at (407) 744-6006.
Putting course debuts in San Diego

SAN DIEGO, Calif. — They're popping up all over the country. In Japan, they're an innovative solution to a lack of land. Now, the San Diego Princess Resort in Mission Bay has joined a growing number of developers by promoting its new 18-hole, architect-designed, putting course.

"The course is professionally landscaped with cactus and other indigenous plantings," said Richard Kannapell, director of marketing for the Princess. "The course offers fairways, rough, bunkers and many of the challenges of a regular 18-hole course, but can be played in about one fourth the time of a standard game."

The course was designed by David Norman Fleming, president of Golf Properties Management, Inc. Fleming has worked on many California golf courses, including Singing Hills Country Club and the Rancho California Golf Club. He has served as construction consultant to such architects as Tom Fazio, Robert Trent Jones Jr., and Joe B. Williams.

Course at heart of N.C. land battle

RALEIGH, N.C. — The Council of State will meet in July to decide whether to close the Riverside Golf Course near Pembroke. The course is on property the state bought in 1984 for the site of an Indian Cultural Center. Instead, Riverside arose.

Now a board developing the center again has requested the course be closed, claiming that because of floodplains and other environmental concerns, there is not enough land at the site to support both the golf course and the center.

Legislation may be required to keep the golf course open because the General Assembly bought the site of an Indian Cultural Center. Instead, Riverside arose. Sandridge's regular 18 continues to get heavy play, about 60,000 rounds this year.

Bay area course plans dealt blow

REDWOOD CITY, Calif. — A renewed campaign to build a golf course on the southern watershed again has met strong resistance from San Francisco supervisor Bill Maher.

"San Francisco takes seriously its role as steward of the water supply of 2 million people. Efforts to develop the watershed San Francisco owns are misguided," Maher declared.

Golfers have asked that a ballot measure be prepared for November, asking voter sentiment on use of Edgewood County Park for a course.

Private CC may turn public

GREENWOOD, Ind.— Making a private country club public has raised concern among some homeowners near the Royal Oaks Country Club. They fear a public facility might bring large numbers of people and devalue the land. Said William Crooks, who lives in El Dorado II subdivision, "This is a reasonably quiet neighborhood and would not be if a public golf course were down the street."

Indianapolis businessman James O'Connor wants to buy the 425-member club, which lost $55,000 last year, then lease it to Johnson County. The public would be charged to play golf. The club would become county property at the end of a 25-year lease.

Guettler ahead of schedule

VERO BEACH, Fla. — Much verbal swinging remains as Prince Contracting Co. disputes Guettler & Sons being awarded the contract to build a second 18 holes at Sandridge Golf Course. However, the reality is that the timetable for playing readiness has been moved up to late December.

"We're a month ahead of schedule," exults golf director Bob Komarinetz. Rough shaping of the course is about three-fourths complete, and irrigation systems are being installed.

Because the project is eight percent under budget, the county was able to add $7,500 to its contract with Guettler to enlarge the practice tee and construct a 5,000 square foot nursery green with a sand trap, and also add $16,214 to its contract with Barth Construction. Barth is constructing the clubhouse.

When it comes to even nutrient distribution, consistent results and predictable growth with each and every application, blends just can't equal the performance of homogeneous greens grades fertilizers. In fact, using a blended product on your greens is kind of like using a rotary mower wall-to-wall. It's just not the most efficient tool for the job.

That being said, we'd like to build a case for our line of greens grades, because despite what you might have heard, there is a difference.

For starters we've got five premium formulations: Country Club® 18-4-10, 18-3-12, 18-0-18, 8-4-24 and 10-18-18. All are ideal for greens, but also a sound value for fairway applications. And our distribution network is larger. So you can buy just what you need, when you need it. All for about the same price as what you'd pay for blends. So why not call your local Lemanon distributor or 1-800-233-0628 for more information. Because when it comes to greens grades, there's no match for country club.
Water costs ground airport project

SANTA MARIA, Calif. — The Santa Maria Airport District's proposal to develop a light industrial park with a 36-hole golf course has been grounded because of water problems.

Cost of 728 acre-feet of state water (one acre-foot equals 325,851 gallons) would be $2 million initially, and about $350,000 in annual payments. Airport directors termed state water too expensive. Airport officials thought this city should foot the bill for state water, since the city has been negotiating to lease the airport golf course.

The city declined. The airport board is looking for other sources of water. A storm-water retention project is a possibility. Until the water snag is solved, the project won't fly.

According to Hawaiian super

'H Golf's good for the atmosphere'

HILO, Hawaii — "Growing turf grass may not be the solution to global warming, but that type grass has a great potential to absorb carbon dioxide."

That was the message from Mauna Kea Beach Hotel golf course superintendent Bob Itamoto to the County Council Planning Committee.

People do not perceive golf courses to be beneficial for open green spaces, as they once did, Itamoto said.

Conference center, 36 holes planned for Vernon, N.J.

VERNON, N. J. — Project plans for "Evergreen at Great Gorge," featuring two 18-hole golf courses and a $3 million clubhouse atop Hamburg Mountain, have been submitted to the Vernon Planning Board Office.

A 400-room conference-center hotel also is part of the project.

Water for irrigation would be obtained from seven ponds at the top of the mountain. Pest control on the golf courses would include both use of pesticides and biological control of insects and would be through "organic" golf course maintenance.

Endangered and threatened species have been sighted near the project site, but developers say the golf courses and hotel can be built without serious detriment to the environment.

Strong opposition to Ooma II complex emerges in Kona

KONA, Hawaii — An 18-hole golf course would be part of an Ooma II development in North Kona where a 550-room hotel, 50-room Japanese style inn, 300 single and multi-family house lots, seven-acre swimming lagoon and a commercial area are planned.

But strong opposition has surfaced. At a state Land Use Commission hearing, state Rep. Mike O'Kieffe accused Ooma II developer Kahala Capital Corporation of seeking land-use approvals so the land could be sold at a profit.

The project application is similar to one rejected by the LUC in 1987 because of concerns over its effect on near-shore waters.

Landscapes Unlimited a party in contract suit

"Promises, Promises." Shavertown, Pa., excavator Anthony R. Popple has filed a federal lawsuit alleging the contractor for the proposed Glenmaura National Golf Course in Moosic promised to use him as a subcontractor but gave the work to a competitor. Popple seeks in excess of $50,000 damages from Landscapes Unlimited.

The suit alleges "the promises and conduct" of Landscapes Unlimited induced Popple to incur out-of-pocket expenses and suffer loss of profits.

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Dwindling research funds force firms' hands

Cutbacks in federal funding have colleges across the country scrambling to preserve programs that once seemed a matter of course, so the recession showing lukewarm signs of dissipation, a restoration of federal university support appears unlikely.

What does this mean to the golf industry? Plenty.

The wise allocation of research dollars is now a tougher prospect, as large university facilities struggle to fund experimentation that, until recently, may have been taken for granted.

"The problem is not limited by the amount of research money we have coming in from the outside," said Dr. Hank Wilkinson of the University of Illinois. "Companies don't come up with their own research, they'll walk behind the best."

The problem is simple: Less government funding means less research, and Wilkinson has seen the effect of the federal chintz firsthand as an associate professor of turfgrass research in the Department of Plant Pathology/Agronomy.

At a recent industry function held at Jacklin Seed Co. in Port Falls, Idaho, Wilkinson addressed a crowd of seed folks outside the Jacklin research laboratory and greenhouse.

"I can tell you right now that we don't have a green anywhere near this good at the University of Illinois," he said with a hint of admiration and melancholy.

People in the golf industry are glad to point out during times of recession that golf is recession-proof — or at least "bizarre," so please hang in there with me.) Recall the aftermath of the verdict setting free the police officers accused of beating Rodney King. Riots ensued in Los Angeles, Atlanta, Minneapolis, even Montreal. What the poor business owners in Los Angeles had to do with the acquittal of the policemen was beyond anyone's imagination. But their businesses got trashed. I thought, any cause for a riot.

Yet it's not quite that simple. With money at more of a premium, research will follow the dollars. In other words, cash-strapped research facilities will be more likely to conduct special interest testing at the behest of, say, Company X.

The way Wilkinson sees it, there are three kinds of research: 1) Practical research, which solves a problem. 2) Demonstrative research, which proves a point. 3) Futuristic research, which focuses on "the cutting edge" rather than "the practical."

"Companies are far more likely, at this point, to fund 1) and 2) — need a reason to vent their anger. Any cause for a riot."

But then along came an incident in Boston. People giving a free concert had to close the doors when the auditorium filled up. So-o-o, what else could we expect from those poor abused people left outside but to riot?

That riot set the record straight: In today's world people do not need any real reason to riot. Make-believe reasons will do.

And that's when I started pondering the golf industry's insula- tion — or lack thereof — against insanity in a society of bizarrity.

I remembered the Indian tribe in Quebec which armed its members with rifles and took over a golf course. They barricaded to keep people out and held off Mounties and other authorities for weeks. That golf course certainly was not insulated from bizarrity.

A Maryland architect, Davis Love, told me of a golf course project which drew out environmentalists in force. They didn't want the course built, they said, because it would infringe on the wildlife. Yet, a couple of miles away the problem of beating Rodney King was not so far from mind.Obviously, it's not just the golf business itself that is insulated from bizarrity: The whole of humanity is not insulated from bizarrity. Anywhere from the golf course to the stock market is a subject for bizarrity. The problem is not limited by the amount of research money we have coming in from the outside, but rather by the amount of money that we have coming in from the outside."

The message was clear: Don't count on academia to provide the amount of research it has in the past. If the golf industry is to move forward, industry members must take the research lead, because colleges and universities simply can't afford it any longer.

Yet it's not that simple. With money at more of a premium, research will follow the dollars. In other words, cash-strapped research facilities will be more likely to conduct special interest testing at the behest of, say, Company X.

"The problem is this: The interest of Company X might not be that of the state, country or even the industry," said Wilkinson. "It's a real dangerous pitfall."

"And what's more, the research will be conducted with scientific integrity."

The important difference between Mr. Sifers' comments and those of Mr. Hurdzan is that whilst Mr. Hurdzan was quite reasonable providing his opinions, Mr. Sifers was responding to direct questions by providing factual statements on the major research program conducted at Texas A&M University from 1985 to date (i.e. seven years).

When Mr. Sifers stated that moisture content in the mesh elements rootzone was always slightly higher than an equivalent non-mesh rootzone, he was referring to extensive studies undertaken over a two-year period.

Measurements were taken at four seasonal periods, at three soil depths on a large number of randomly arranged trials. The increased soil moisture content is, therefore, a fact and not a "claim" as stated in your quote from Mr. Hurdzan.

In a similar way, statements regarding redceded divot size and enhanced recovery rates due to the mesh elements inclusion are also based on extensive research data.

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Better specific and in-depth evaluations needed in national tests

By KEVIN MORRIS

The National Turfgrass Evaluation Program (NTEP), a cooperative program between the U.S. Department of Agriculture (USDA) in Beltsville, Md., and the National Turfgrass Federation, Inc., was initiated in 1980 to evaluate turfgrass varieties and experimental selections in different locations and under various management situations throughout the United States and somewhat in Canada.

Since that first test of Kentucky bluegrass in 1980, almost all the major turfgrass species have been tested or are currently being tested. At present more than 350 cultivators and experimental selections are included in 12 separate NTEP tests at anywhere from 15 to 50 locations nationwide.

These tests are conducted mainly at university sites by university turfgrass scientists using a standard format for data collection and submission. Data is summarized annually and released as public information. Interpretation of the data is left to turfgrass scientist, extension personnel, seed companies and consumers.

Many of the turfgrass species have benefited from these nationwide evaluations. Perennial ryegrass probably has been improved more over the last decade than any other grass used in the United States. Saturn perennial ryegrass, ranked number one for turfgrass quality in testing from 1987-1990, Continued on page 24

Kevin Morris is director of the National Turfgrass Evaluation Program, sponsored by the National Turfgrass Federation, Inc. and the U.S. Department of Agriculture and headquartered in Beltsville, Md.

Best Sand employee Neil dies from motorcycle crash

CHARDON, Ohio — John Neil, a 12-year employee of Best Sand Corp., died as a result of injuries suffered in a motorcycle accident June 17.

Neil, 29, was a sales representative for the company and worked primarily with the golf course and foundry industries. Daughter Kallie, his parents, grandparents and two sisters survive.
ASIA-PACIFIC'S PREMIER GOLF EVENT IS HERE AGAIN!

The Golf Asia series of exhibition and conference returns to Singapore promising to be a great success, once again attracting exhibitors and visitors from all over the world.

Asia's golf industry is continuing its tremendous boom, with an unprecedented demand on all areas of golf including golf course and resort development and equipment, apparel and accessories design and more golf course development in the 'Growth Triangle' for the next 5 years, estimated to be worth S$8 billion!

Since the pioneer exhibition in 1991, Golf Asia has experienced an incredible growth in space, sales and attendance, and has become a magnet for some of the biggest names in the golf business such as Daiwa, Bridgestone, Gary Player Design Co., Toro and Rain Bird, to name a few. Golf Asia '92 attracted 223 exhibitors and agents, with a total visitorship of over 21,300 from 22 countries, and overall exhibition space reached 10,000sqm! An overwhelming number of visitors and exhibitors from Golf Asia '92 have already expressed their intention of returning to this spectacular event.

Fantastic business opportunities await you at Golf Asia '93 - total sales of S$61m were transacted during the 4-day Golf Asia '92 exhibition with over S$130m worth of sales projected for the following 12 months. So if you're involved in this rapidly expanding industry and wish to remain ahead of the competition, make a date for Golf Asia '93 now!

In conjunction with Golf Asia '93, the 3rd Asia Pacific Golf Conference will be held at the Pan Pacific Hotel from 22 to 25 March 1993. As the region's most comprehensive golf forum, the Conference will provide vital information on key aspects within the golfing arena, while offering you the opportunity to exchange views with major golfing specialists and decision makers.

Confirm your space today by contacting Evelyn Loh, Project Manager, Golf Asia '93.

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ENVIRONMENTAL CARE EXPANDS

ATLANTA, Ga. — Bruce K. Wilson, president of Environmental Care, Inc., has announced the opening of a new branch at 999-D Peachtree Industrial Blvd. in Norcross.

Having expanded steadily since its beginning in 1968, Environmental Care’s horticulturists work with fully certified and licensed staff to provide landscape maintenance, water management services, specialized arbor care, interior landscape design, installation and maintenance; and light landscape construction.

Jack E. Mattingly, who headed the Los Angeles branch of Environmental Care, is heading the Atlanta branch.

EQUIPMENT MANAGERS’ NEEDS TOPIC

LAWRENCE, Kan. — GCSAA plans this summer a special resource committee to develop seminars addressing the mechanical, regulatory and personnel aspects of the golf course equipment manager’s job.

The resulting educational program will be introduced in greater detail at the equipment manager session of the GCSAA Conference and Show Jan. 30, 1993, at Anaheim, Calif.

GCSAA SEEKS INNOVATIVE IDEAS

LAWRENCE, Kan. — “The Innovative Superintendent,” a series of presentations by GCSAA-member superintendents, will be a feature of the Jan. 28 afternoon session of the 1993 Conference and Show at Anaheim, Calif.

David M. Bishop, GCSAA director of education, said, “We are looking for superintendents willing to share their expertise. We seek current information and new ideas.”

SAFETY HELP OFFERED SUPERS

SafetyMaster Corp., a distributor of commercial safety products, has announced it will donate 1 percent of revenues generated from golf course sales to help fund the scientific and educational efforts of GCSAA’s Scholarship & Research Fund.

Its 81-page safety equipment catalog will be distributed to GCSAA members next spring.

ZELLERS GETS REAL DEL MAR POST

TIJUANA — Craig Forrest Zellers has been named superintendent of golf for Real Del Mar Golf Course, an 18-hole course under construction at Real Del Mar, a destination resort on the coast 12 miles south of Tijuana.

Zellers will oversee all maintenance operations of the course, which is scheduled to open for public play in the fall.

He has more than 14 years of experience in the golf industry, most recently as the golf course superintendent for the Carlton Oaks Country Club in Sanue, Calif.

GOLF COURSE NEWS

By DOUG SAUNDERS

In mid-summer, course superintendents throughout the country battle their own form of severe weather. But their concept of severity can only pale to the brutality waged by Mother Nature in the treedless wasteland of Death Valley, Calif.

Temperatures range from as high as 134 degrees in the summer to a low of 191 in winter. Daytime temperatures average 129 in summer while nighttime temperatures might drop to 100 degrees, offering little reprieve from the onslaught. The oppressive sun relentlessly bakes the ground until soil temperatures can reach 200 degrees. With an average of 1.91 inches of rain a year, it seems impossible for anything to thrive here at the lowest spot in the Western Hemisphere.

Yet in the midst of nature’s own exists Furnace Creek Golf Course at the Furnace Creek Ranch. Here lies a desert oasis surrounded by the salty remnant of a dead lake, miles of sand dunes, and the wrinkled, rocky precipices of 11,000-foot mountains that hold in the stifling heat.

Here lies an 18-hole golf course that for more than 65 years has offered a form of escape from the monotony of this and world. Here is the chance to play golf in the most uninhabitable place on Earth.

Furnace Creek Ranch was settled in the late 1880s during the frantic quest for minerals throughout this stretch of California. Large deposits of borax — an essential mineral in the production of items from tires and cosmetics, to insulation and glass — were discovered.

The Harmony Borax Works, just a mile from the ranch, quickly grew and the ranch provided alfalfa for the livestock that hauled the ore across the chalky floor on the famous 20-mule team wagons.

In the 1920s, Furnace Creek Ranch had become grazing land for cattle and the area was used for mining.

Continued on page 16

Turf pioneer Beard retires

COLLEGE STATION, Texas — Dr. James B. Beard has retired from Texas A&M University after 35 years in turfgrass research and teaching, but plans to continue full-time involvement with the turfgrass industry.

The professor of turfgrass physiology and ecology in the university’s department of soil and crop sciences has with wife Harriet authored five books and a laboratory manual. He authored 228 scientific papers and 316 technical articles.

He has given numerous invitation papers and been an adviser at international conferences and symposia in the United States, Canada, England, Europe, Far East, Australia, New Zealand, Japan, Korea and Southeast Asia.

Dr. Beard pioneered investigations in turfgrass evapotranspiration, drought stress, metabolic basis of indirect heat stress, shade adaptation, wear tolerance, nitrogen and potassium stress and thatch biodegradation. Particularly hailed was his discovery of the spring root decline phenomenon in C-4 grasses.

Jensen promotes Kirchhoff

David Jensen Associates, Inc. has named Wayne Kirchhoff as project manager for the land planning and landscape architecture firm.

Kirchhoff earned a bachelor’s degree in landscape architecture from Kansas State University in 1973 and has worked for design firms in Colorado, Kansas and Arizona.
Gary Bennett: Much can be forgiven with great greens

By VERN PUTNEY

Gary Bennett, a scratch player and current national golf course superintendent's champion, is accustomed to building things from scratch.

The class 18-hole Crickentree Golf Club he oversees at Blythewood, S.C., near Columbia, may be his construction pride, but he credits much of the five-year-old course's success to father Grant and brother David. They've been a prominent part of the Crickentree team as golf teacher and professional, respectively.

Gary might be pardoned staking out the greens as his personal and maintenance crews' territory the greens, which he considers the most important part of a golf course and and the key element in course survival and prosperity.

In 18 years as a superintendent, he's never had a complaint about the putting surfaces.

Bennett spends 20 percent of his budget on greens. In his tournament and business travels, he's found "bad greens" the chief source of player and peer complaint.

At one facility, for instance, he noted that the course was in excellent condition from tees through fairways, but the greens were bad. Other players termed the course "terrible" and vowed never to return.

Bennett has played courses whose designs were at best marginal but were fun to play because of presentable greens, and courses with great reputations but not as enjoyable because conditions were not the best and the greens a cut or two below expectations.

Proud dad Grant, honored last April as co-founder, builder and pro for 13 years at the Country Club of South Carolina at Florence, said he would stack Crickentree's greens with any course on the Eastern Seaboard. He is an authority, having traveled and played extensively in 50 years as a pro.

In 1987, Gary supervised all phases of Crickentree golf course and real-estate construction. As construction progressed and with the architect's approval, he made numerous design changes, coordinating all the crews.

The course was completed three days shy of six months and everything was planted. All that remained was to grow in the grasses. The results are evident.

In 1968, Gary and David helped Grant build the Country Club, and in the late 1970s Gary oversaw construction of the South Course at Deer Track Golf and Country Club in Myrtle Beach.

The "breaks of the game" can be an overworked term in sports, but some early rough encounters shaped the Bennett family destiny.

Grant played basketball and baseball on a scholarship at Oak Ridge, N.C., Military Institute while also excelling at golf.

Since a broken arm confined his throwing abilities, Grant turned to golf and caddying as a way to make a buck. Surprisingly soon, he became a crack player and competent professional. He's a member of four South Carolina halls of fame, and Florence high school teams he coached compiled a 200-1 match play record.

Buddy Baker was national junior champion in 1968, edging in extra holes Florence high school teammate Billy Womack.

Though not a Rotary Club member, Grant in 1984 was named by Rotary International a Paul Harris Fellow. David, at 45 two years older than Gary, followed in Grant's hardship footsteps. A few years after receiving a full golf scholarship at the University of South Carolina in 1964, he was attempting to qualify for the North and South Amateur in Pinehurst, N.C., when the rains came. David ducked for cover, but a player in a great, third and fourth.

Later, working as superintendent-professional at the Country Club of South Carolina, he tried to manhandle a 300-pound fairway unit and re-injured his back, which remains bothersome.

Gary didn't escape family misfortune. He was a promising freshman player at the University of Houston when a car in which he was a passenger crashed into a tree.

Gary went through a painful 23-month recovery period marked by prolonged surgery.

That ended PGA Tour dreams. He completed his education at Francis Marion College in Florence, S.C., where he was first-team All-American his senior year.

His next tree encounter, 25 years later, wasn't that damaging. Bennett was falling trees around his home Jan. 26 as the first step to building a swimming pool.

A felled limb landed on his right small finger, crushing bones and leaving the damaged digit held together only by a chewed piece of gauze.

Bennett drove 25 miles to the hospital and returned a week later for injury surgery.

And, if your existing lakes are showing signs of leakage, it may be time to retrofit with Hypalon® or PVC membrane liners fabricated for both durability and cost effectiveness.

For assistance with specifications and cost estimates on your next golf course project, contact the Watersaver Company today!

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At The Watersaver Company, We Measure Success In Zero Leakage.

For over 20 years, our lining systems have been used to prevent seepage loss in lakes for some of the country's finest golf courses.

We specialize in the fabrication and installation of membrane liners for decorative lakes, traps, greenhouses, and aquascapes. So, before you design or build your next project, talk to us.

We can assist you with the right technology that will prevent your work from becoming a real hazard.

The scenic 18th green and unique water feature at Ventana Canyon Resort near Tucson, AZ.

The scenic 18th green and unique water feature at Ventana Canyon Resort near Tucson, AZ.
Musser Foundation chooses three graduate students for scholarships

The Musser Foundation has awarded $4,000 scholarships to Richard Davis, Jeffrey Klingenberg and Zachary Reicher. Announcing the scholarships, Musser Foundation President Frank Dobie said: "We must seek new paradigms of thinking if we expect to solve the complex problems of today's world. Supporting this new generation of turfgrass scientists is the wisest move we can make."

Davis obtained his master's degree in plant pathology at Auburn University and is preparing his doctoral thesis on ecological aspects of four turf nematode species attacking creeping bentgrass at the University of Illinois. His principal advisers are Dr. Henry Wilkinson and Gregory Noel.

Reicher did his master's work at Iowa State University on the effects of pre-emergent herbicides on rooting of Kentucky bluegrass. Now at Purdue University, his doctoral thesis is on the effect of repetitive applications of fungicides on creeping bentgrass. His principal adviser is Dr. Clark Throssell.

Klingenberg obtained his master's degree from New Mexico State University. His doctoral thesis at the University of Nebraska is on development of drought-avoidance mechanisms in turf-type seeded buffalograss. His principal adviser is Dr. Terrance Riordan.

Each year the Musser Foundation, named for turfgrass pioneer Burt Musser, looks for the most promising turfgrass doctoral students in the world to award moral and financial support. To qualify for a grant, students must be in the last year of their doctoral program, have an accumulative grade point average of 3.4 or above, with their thesis on turfgrass research to the direct benefit to turfgrass science. They must also demonstrate leadership in academic and extracurricular activities.

Pesticide container report sent to Congress

EPA has submitted a pesticide container report to Congress as mandated by the 1988 amendments to the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA).

The amendments required EPA to address options to encourage or require:
- return, refill and reuse of pesticide containers;
- development and use of pesticide formulations that facilitate removal of pesticide residues from the containers; and
- use of bulk storage facilities to reduce the number of pesticide containers requiring disposal.

In gathering the information for the 235-page "Pesticide Container Study — Report to Congress," EPA held four open meetings with other federal and state agencies, industry groups, environmental organizations and other interested parties.

The first four chapters are devoted to background; chapter five covers the regulations and standards imposed by government and industry. Chapters six through 12 cover containers, current issues and practices regarding use, residue removal and disposal. Chapter 13 presents the options required by FIFRA.

The final chapter discusses long-range pesticide container management goals, suggests areas for further study and summarizes the conclusions.

Summary copies and a limited number of complete copies of the report may be obtained by contacting EPA's Pesticide Management and Disposal Staff at 703-305-5288, or Meredith Patterson at Mitchell Systems at 703-351-6758.

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Now you can turn your Toro or Jacobsen greens mower into the finest top dress brushing system ever invented, with FLEXBRUSH from Standard Golf. FLEXBRUSH enables you to save time, while avoiding unnecessary damage to your greens. It's actually a set of three brushes that follow contours and undulations like no dragging method can, and it's excellent for brushing after deep tine aeration. Plus, it installs quickly and easily.

For more information, contact your nearby authorized Standard Golf distributor.

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Furnace Creek a toasty test for Hindman’s grounds crew

Continued from page 13

became a unique destination for tourists. Scotsman Murray Millar carved out three crude golf holes so he and the tourists could play. Nine formal holes were designed in 1939 by William P. Bell, the prolific California architect who also designed Bel Air Country Club in Los Angeles and Stanford Golf Course in Palo Alto. The course was then extended to a full 18 holes in 1967, with William Bell Jr. doing the redesign.

It is a stunning contrast to the surrounding desert scene. The golf course is a lush expanse of common Bermuda grass bordered by date palms and Mediterranean tamarisk, or salt pines. The tamarisk were first planted for shade and a source of firewood. They are a fast-growing tree that can withstand the high salinity of the soil. The date palms provide shade and a cash crop to the ranch.

The course is notable in that it has all-grass bunkers, even though this seems odd in a desert. Fact is, the sand around Furnace Creek is so high in mineral content that, if it gets wet, it compacts much like concrete.

Quality sand for the traps has been tried, but the sand was no match for the fierce winds that howl through the valley. Throughout the golf course’s existence, the job of maintaining it has bordered on the archaic.

The water source for irrigation is a natural spring which pours from the nearby mountains. Water comes out of the mountain at a temperature of 87 degrees. It supplies abundant water through the winter months but dwindles in the heat of summer.

In the early years, the course was irrigated by the use of flood gates that filled the alfalfa fields with standing water. This flood irrigating continued until the early 1940s when galvanized irrigation pipes were finally laid into the course.

Cattle and sheep would graze across the fairways during the hot summer months as late as the 1950s, as the idea of golfing in the heat of July didn’t strike the fancy of many.

With the installation of irrigation lines, the course stepped into the realm of modern technology, for that time.

Time has stood still at Furnace Creek since then. Old Rainbird heads still have to be installed by hand on one of the 250 hookups that run through the course. PVC pipe was laid in parts of the course in 1967 when the second nine holes were constructed. But even today, seven greens and most of the fairways must be irrigated by manual hookups.

Dennis Maskell, Class A member of the GCSA, served as the head superintendent at Furnace Creek for 12 years and has seen all the elements can offer.

"Furnace Creek is a golf course that won’t ever be the site of a PGA Tournament, but it is an enjoyable course that offers a unique golfing experience because of where it is," Maskell said.

The biggest challenge is dealing with the high salinity of the soil. Ph levels average 8.5 and, at times, climbed as high 9.0 during his tenure. Leaching lots of fertilizers high in nitrogen helped to combat the situation, he said.

The other difficulty was having a stable water source. The sprinkler system is actually gravity-fed by the spring and pumped through the course with two 75-horsepower pumps. As the water source dwindles in summer, so does the water pressure on the system, pulling the sprinkler radius down to less than 20 feet at a head.

"The heat is something that you sort of get used to," Maskell said. "I remember one summer when we had three straight months where the temperature never dropped below 100 degrees, day or night. I got to the point that it didn’t seem hot until the mercury got up over 115."

On top of the intense heat, cold nights are not uncommon in Death Valley during the winter months. Frosts are common and the lowest temperature in Maskell’s memory was 19 degrees.

The entire golf course, both greens and fairways, is planted in common Bermuda grass. The greens, obviously, aren’t the quickest as a bit more length is needed to withstand the heat, and common Bermuda is rarely, if ever, used on greens. In the winter months, the greens are overseeded with ryegrass while the Bermuda goes dry. Continued on page 17
Continued from page 16

dormant.

Maskell has left Furnace Creek and is now working at Shadow Creek Golf Course in Las Vegas, the multimillion-dollar private course of casino tycoon Steve Wynn. In one step Maskell has gone from one of the most outdated courses to one of the ultimate state of the art continuing at Furnace Creek is Bill Hindman, a jack-of-all-trades who now has the duties of superintendent at Furnace Creek. With a force that includes one tractor, two mowing machines, three antiquated E-Z-GO carts, and a crew of four men, he works to make the course more playable.

Continued from page 13


Roundup nets 1,157

goose

Continued from page 13

"We have a lot of little lakes but it's basically dry. We only get about nine inches of precipitation a year," Kingman said of the Denver area. "Oklahoma has a lot of big lakes that aren't very populated by year-round geese. They want to build up their lakes for hunting purposes, and these geese basically don't leave during the winter." In the three days of roundup Kingman and colleagues found only six tagged geese — ones that had been taken to Oklahoma previously and had flown back to Colorado.

DOW biologist Kathi Green said: "Over the years, the goose roundup has helped stabilize the summer population and it helps Kansas and Oklahoma with their goose restoration projects. This is a really good cooperative venture that benefits everybody and helps keep goose problems at a reasonable level." Kingman said the roundup program has been done annually for the last 15 years and he has been involved the last six years.

It's something that has to be done. Superintendents have tried many ways to keep the messy geese off their courses. Starter guns work, but only for a couple of days, Kingman said.

Bill Hindman welcomes visitors at 214 feet below sea level. (Photo by Freddy Bird)

Roundup is permanent for nearly 100 percent of the geese moved out of state.

Now that the rights to distribute the Logic™ product line belong to Ciba-Geigy, your favorite fire ant bait is also supported by a firm commitment to the green industry.

To reflect this change in philosophy, Logic is now Award™.

We hope that any confusion caused by this name change will be as short-lived as the fire ant mounds where new commitment to the green industry is supported by a firm commitment to the green industry.

To evidence it, Award, worker ants will pick it up when they're out foraging for food. The increased work load and lack of new workers shortens the life span of the old workers. With the insect growth regulator, the worker ants carry it into the mound and feed it to the queen. Once the queen has been fed Award, she loses her ability to lay egg. Although she can still lay swarmer eggs, the final swarmer are sterile. New colonies can be formed.

Because whether it's called Logic or Award, worker ants are sterile. So no new colonies can be formed.

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## Mountains

**BUFFALOGRASS SCORES WELL**

Dr. Terry Riordan of the University of Nebraska reported that new varieties of Buffalograss are showing unbelievable promise in that region of the country.

The Rocky Mountain GCSA reported that Riordan told a regional U.S. Golf Association conference that two specific varieties — Prairie and 809 — are displaying almost unlimited potential in many different turf situations.

Buffalograss fairways are performing admirably at a cut of 5/8 of an inch, he said, and are consuming less water at this lower classification as a warm-season grass.

These varieties are showing excellent heat and cold tolerance, and may even rival Bermudagrass in its aggressive nature, he said.

CLAIRK TAKES OVER CACTUS APINE

Mark Clark of the Country Club of Green Valley is the new president of the Cactus and Pine Golf Course Superintendents Association of Arizona.

Clark’s slate of officers includes Vice President Scott Miller of Ventana Canyon Golf and Raquet Club, Secretary Don Farrell of the city of Mesa’s Riverwalk Golf Club; Treasurer Bill Emerson of Paradise Valley Country Club; and Past President Jerry Zidow of Papago Golf Club.

Comprising the board of directors are Jim Key of Pointe Resort — Lookout Mountain; Kent Nevitt of Fountain Hills Golf Course; Max Ortiz of Fountain of the Sun Country Club; Kirby Patt of Arizona Country Club; Kevin Smith; and Marc Snyder.

GRAY APPOINTED AT STARR PASS

Quintan Gray has been named director of golf services for Starr Pass Golf Club, an 18-hole public facility in Tucson, Ariz.

Gray has been a member of the PGA Senior Tour since 1986, having played in more than 100 tournaments.

## North Central

**MISSOURI FIELD, GOLF DAY SET**

COLUMBIA, Mo. — The Missouri Valley Turfgrass Association, in conjunction with the University of Missouri Turfgrass Field Day, will hold its 5th annual Turf Research Golf Day July 27 at the A. L. Gustin Golf Course at UM. Proceeds will be used to continue research and education programs at the university.

Participants must be a member of MVTA, MVGCSA or HAGCSA.

**MICHIGAN EVENT ANNOUNCED**

The annual Michigan Turfgrass Conference has been scheduled for Jan. 20-22 at the Holiday Inn in Lansing, Mich.

Information on the event is available from Michael Saffel of Michigan State University’s Crop and Soil Science Department, East Lansing, Mich. 48824-1325; 517-353-9022.

## South Central

**WTGCSA HOSTS TOURNAMENT**

The West Texas Golf Course Superintendents Association will host the 1992 Dow/Elanco Texas Trophy at The Club at Mission Dorado in Odessa on Sept. 13-15.

The three-day tournament is open to anyone and spouses are invited. The Lone Star Golf Course Superintendents Association will mail out information on the tournament. For more information contact Jerry Thompson at 915-523-3416.

**HUTCHERSON RECOGNIZED**

Terry Hutcherson of Amarillo (Texas) Country Club recently completed the GCSAA’s Certified Golf Course Superintendents (CGCS) program.

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**RESIDUAL EFFECTS OF TURF WETTING AGENTS**

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Southeast

HANDS-ON FIELD DAY IN N.C.
CHARLOTTE, N.C. — The Carolina Grounds Management Association’s second annual event and supplies field days Aug. 7 and 8 at Charlotte Motor Speedway is a hands-on event.

Areas have been set up for demonstrations of grounds management and landscape equipment, cellular phones and radio systems, tracks and trailers and chemicals and fertilizer.

First-day hours are from 1 p.m. to 4 p.m., the second day from 9 a.m. to 4:30 p.m.

Contact is Parry Currier at Smith Turf & Irrigation Co. 800-932-8676.

PENNINGTON SEED HONORED
Pennington Seed of Madison, Wis., has been cited as the 1992 Georgia Family Business of the Year.

The award is presented to firms demonstrating strong business and family values, contributions to industry and community and innovative business practices or strategy.

Dave Lambert, American Seed Trade Association executive vice president, traveled from Washington, D.C., headquarters to Georgia to attend the ceremony.

FLORIDA SHOW TAKES SHAPE
JACKSONVILLE, Fla. — The Florida Turfgrass Association reported that its 1992 Conference and Trade Show has yielded excellent response from trade industry professionals and show participants.

With the show four months away, more than half of the exhibition space has been contracted for display, with new booths being sold on a daily basis.

The event is slated to be held at Prime F. Osborn Convention Center here Sept. 20-23.

Themed for the surroundings, the “Turfgrass Express: On the Right Track to a Greener Florida,” the show marks FTGA’s 40th anniversary.

More than 2,000 attendees are expected.

More than 200 exhibitors from the United States, Canada and England will display new products and share the latest techniques and strategies for the turfgrass industry.

Sessions dealing with golf courses, athletic fields, sod production, and lawn care and parks and grounds will highlight the conference and trade show.

The FTA, which turns 40 this year, hopes that holding the show earlier in the fall will help attract more attendees.

Speakers Monday will discuss:
• “Research reports and pest control recommendations” in a panel moderated by University of Florida Turfgrass Coordinator Ed Freeman;
• “Chemophobia and the Turf Industry,” led by Dr. Rick Bradenburg; and
• topics impacting the turf industry in a round table led by L.B. McCarty.

Tuesday’s palette includes workshops dealing with turf disease identification and control, led by Drs. Gary Simone and D.E. Short; nematode control, led by Dr. Bob Dunn;
Course design, construction and renovation, given by Ron Garl; fertilizers and soil test fertility recommendations from Dr. Jerry Sartain;
Business analysis and management principles for turf managers, presented by Dr. John Haydu; and putting green maintenance and construction, a round table moderated by John Hoy.

Education sessions will feature:
• golf course builder Jerry Pieman discussing golf course construction techniques;
• course architect Steve Smeyers talking on course designs for the future;
• Dr. Max Brown speaking on foliar fertilization technology and use;
• Ralph White sharing on enhancing a golf course environment; and Dr. Ed Freeman dealing with environmental assessment; and Dr. Tim R. Murphy discussing weed control strategies.

STERLING HIRED
Golf West Cos. of Fresno, Calif., has hired Bob Sterling as general superintendent for the Lake Acworth Golf Course near Marietta, Ga.

Seeding began in July for the course Golf West is developing for Cobb County.

The county leased the land from the Army Corps of Engineers for 50 years on the condition it be used for recreation.

Ken Dye of Houston, Texas, is the course architect.
MAINTENANCE

GCSAA withdraws USGA funding to begin its own research projects

Continued from page 1

fine. We will continue down our road and share our information and I'm sure they will share theirs."

The GCSAA has annually contributed around $35,000 to $50,000 to the USGA research program since its inception nine years ago. The USGA is in the midst of a three-year $3.2 million commitment and expects to keep up the $1 million-a-year pace, Bloch said.

For GCSAA's part, Development Director Pat Jones said: "Our commitment to the USGA remains as strong as ever. Our job has always been as a delivery mechanism. That hasn't changed a bit."

He downplayed the loss of money to the USGA, saying, "The USGA always looked at our financial support as sort of a bonus. When we gave, it was nice, but it was more of a bonus commitment."

Charles Passios of the Hyannisport Club in Marstons Mills, Mass., the GCSAA superintendent representative on the USGA Turfgrass Research Committee, said: "If anything, the research we do will complement the research that's ongoing. There's other things to look at, and that's what we intend to do."

Jones, who will administer the research program, said the organization will fund one major project and a variety of lesser ones.

"The board of directors is considering a number of projects. The amount of money we will fund will depend on proposals from researchers," he said, explaining that he will request proposals from universities.

"One thing we really need to do is get all the information in one place, be patient, and seek to fill gaps in research," Jones said.

Snow said the major project Jones alluded to will be to "check people who have been applying pesticides — their health, blood work, that sort of thing — to see if there could be a problem. That's good because, one way or the other, we need to know. Either they're not going to find much of anything, in which case we can say, 'Here are the people who are most exposed to these products for a long period of time and we can't find anything.' Or, they're going to find something and we will know we should worry about these people."

"Superintendents and their employees will want to know if it's a threat, and what can be done about it."

Snow said he thought GCSAA will also monitor ground and surface water on golf courses, investigating "real-life situations."

"We want to get a better handle because that sort of evidence pulls weight with people in an organization — even though researchers working at universities is better science."

Bloch defined the USGA research as broad-based and said GCSAA's investigation of "specialized problems is understandable... Sometimes you have to put priorities for your organization first."

Snow welcomed the GCSAA research, saying what the USGA can do "is still only a fraction of what can be done."

He pointed out that the USGA could fund only 20 of the 100-plus projects proposed to it by universities nationwide.

For Jones, this culminates early work of his one-year-old department, but it is still only the first step toward important new research.

And Snow said: "I think our program has stimulated interest in research throughout the country. A lot of regional and state golf groups are funding research in their own states.

Jones said he does not believe GCSAA's withdrawal of funds will prompt similar local action.

"I think chapters will continue to divide their research moneys between local, regional and national efforts," he said. "But nationwide, university agricultural programs are losing funding. Local turfgrass societies and superintendents' associations are feeling more pressure to fund research."

USGA 'will make up' for funding loss

The United States Golf Association is not concerned about the loss of money the Golf Course Superintendents Association has provided annually to research projects, according to USGA Green Section National Director Jim Snow.

"Now that royalties are coming in on grasses (developed through the program), there won't be a shortfall at all this year," Snow said. "We will bring in more than the $35,000 to $50,000 the GCSAA donates. It depends on the seed yields, but the royalties could come to $80,000 to $100,000."

The bulk of the USGA research funding comes from revenues from television rights to the U.S. Open, he said. No companies contribute.

"We're committed to $3.2 million (from 1991-93), so we regret that they're not going to continue to be part of the team," said USGA President Stuart Bloch. "But the GCSAA will require all the spare cash it can find to conduct its own research."

"Terming the $1 million-a-year expense "a big item," Bloch said, "we would welcome support — from the right sources."

Pat Jones, GCSAA director of development who, along with the board of directors, will oversee the association's research program, said his first year of work in his new position "all leads to this, but this is only the beginning."

"Until now my job has principally stabilizing fund-raising, setting up the Chet Mendenhall Fund, and organizing so we can begin to do these kinds of things," Jones said.

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It controls 12 major diseases, including Leaf spot, Melting out, Brown patch, Dollar spot, and Rust, on all Southern grasses. Especially on Bentgrass tees, greens, and overseeded turf. And it's the most economical fungicide per day of control on the market.

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The cornerstone of your turf management program.
Scrutinizing ryegrasses

By Mark Leslie

Ryegrass breeding has progressed with each fervor in the last nine years that researchers may have reached perfection in some areas, according to an eminent ryegrass expert.

Dr. Reed Funk of Rutgers University said that, with all the progress, every time they have a cultivar with better, darker, finer, denser, or better mowing, it is an improvement. But I think we're at the point right now that it's questionable whether we want them any darker than the darker varieties that are coming out. It's a question whether we want them any finer.

"We have plateaued in some characteristics," Funk said tough challenges do lie ahead for ryegrass breeders in areas where "limited progress" has been made — such as in resistance to crown rust, red thread and dollar spot diseases.

"We need new sources of germplasm. We need better straining techniques," he said.

Plant breeding has been on a rocket ship

Continued on page 26

Turfgrass tests very useful — if you use them correctly

By Kevin N. Morris

The National Turfgrass Evaluation Program (NTEP) was initiated in 1980 to coordinate uniform evaluation trials of turfgrass varieties and promising selections in the United States and Canada. Tests are conducted at universities and some private institutions with most states evaluating at least one NTEP test.

Since its inception, the NTEP has collected information from more than 50 turfgrass characteristics from approximately 800 experimental and commercial cultivars encompassing 17 turfgrass species.

Annual progress reports containing data collected the previous year are released for each species tested. A final report containing all data collected is produced at the end of the testing period. These progress reports are available to anyone who requests them.

The number of experimental and commercial cultivars in NTEP tests has increased greatly the last few years — with 123 entries in the current national perennial ryegrass test — making decisions about varieties more difficult for consumers. Therefore, to use NTEP information most effectively, it is important to know how to correctly interpret the NTEP progress reports.

The first step in this interpretation process is to look at Table A — "Locations, Site Descriptions and Management Practices." This table gives information on soil type and pH, levels of soil phosphorus and potassium, whether the test was conducted in sun or shade, the amount of nitrogen and irrigation applied and the mowing height.

Make sure the tests that you are scrutinizing are managed in a similar manner as your site. Data from a Kentucky bluegrass test mowed monthly quality data as some locations may differ in cultivars is a real difference or just happened by chance. To determine if a statistical difference exists among two cultivars, subtract the smaller number from the larger value. If the difference is not as large as an overall average (mean). To best use this table, you must determine what locations are the closest geographically to your location.

When considering data from any NTEP table, you must determine what locations are the closest geographically to your location. The overall average is useful to gauge the cultivars' performance over many locations and is helpful in regional and national marketing. However, national averages can be misleading to the average consumer working within only one city or state.

The second table gives the same turfgrass quality data but presents it for each month collected. Evaluating this table can lead to a better understanding of the varieties that perform better or worse during particular months or seasons.

Many people use this table when deciding on blends of varieties. An individual may want to blend a grass that performs well in spring but poor in summer with a good spring but poor in summer with a good

Continued on page 22
### Reading the tests correctly

Continued from page 21

the LSD Value, no statistical differ-
ence exists between these two cul-
tivars for that particular character-
istic.

Table 3 ranks quality ratings over
each location. This table is useful
for quickly determining the gen-
eral performance of cultivars over
different locations and regions.

No LSD Value is present at the
bottom of this table, therefore, to
determine statistical differences
among cultivar. Consult the LSD
Values found in Table 1.

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Tolerance and Disease Resistance are
The Questions, The Solution is...

SunDevil, New From Medalist America.

If you’re tired of worrying about how the weather’s
going to affect your turfgrass, listen to this: SunDevil
from Medalist America offers improved cold tolerance
and disease resistance while requiring less water and
expensive maintenance to maintain a dense, dark
green, uniform bermudagrass turf. SunDevil greens up
early and goes dormant later in the fall than common
bermudagrass. And, SunDevil is easy to establish
because it’s seeded instead of planted in plugs. It’s
ideal for applications that require hardiness, durability,
thickness and tolerance to a variety of weather
conditions.

Choose SunDevil for lawns, parks, golf course fair-
ways and tees, cemeteries or when overseeding existing
stands of common bermudagrass to upgrade turf. It’s an
advanced generation bermudagrass that offers you the
perfect solution in areas where bermudagrass is winter
killed and cool season grasses exhibit disease problems.
If you want a seeded bermudagrass that’s lower growing,
and offers quality and uniformity of sod for less, you’ve
found the answer in SunDevil from Medalist America.

Find out how SunDevil from Medalist America can
save you time, effort and money! Contact your Medalist
representative today, 1-800-568-TURF.

### Spring greenup leaders in national ryegrass tests

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### Best in leaf texture

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Getting readings straight
Continued from previous page

Many diseases occur infre-
quently, if at all, in test plots. Most
diseases, when they occur, do not
distribute themselves uniformly
across the test area, making an ac-
curate estimation of resistance or
susceptibility very difficult.

Diseases such as summer patch
and necrotic ring spot seem to show
their characteristic frog-eye symp-
toms only after significant levels of
thatch are produced (usually two to
four years after establishment).

Diseases such as powdery mil-
dew occur mainly in shade. Some
diseases are prevalent only in cer-
tain locations—like stem rust in
the Pacific Northwest.

Making decisions concerning re-
sistance to these infrequent diseases
should follow these guidelines:

- Be careful using only one year's
data from one location. Look
closely at the LSD Value. A high
LSD Value that shows little statisti-
cal difference among all entries
probably indicates that the disease
was not distributed uniformly
enough across the plot area.

- Only consider resistance to dis-
eases that are problems in
your area.

Data on resistance to certain in-
sect pests is occasionally reported
for NTEP tests. Often, insects do
not appear uniformly across an en-
tire test or in numbers large enough
to cause significant damage.

Therefore, when a high insect
population does occur, the resulting
data can be very beneficial.

Even though only one or two
locations may report data on insect
resistance, this data can be very
useful in determining some level of
resistance or susceptibility.

The NTEP progress reports also
contain small amounts of data of
several traits including vertical
growth ratings, sod strength, win-
ter kill and wear tolerance. This
data helps determine the best culti-
vars for those situations where these
characteristics are important.

NTEP tests are shown at field
days in many states. This is a good
opportunity to see, first-hand, vari-
dity differences and discuss these
with researchers. But keep in mind
that you are looking at these varieties
on only one day of the year and their
appearance changes sometimes
daily during the growing season.

The reports can be obtained from
the National Turfgrass Evaluation
Program, BARC-West, Bldg. 001,
Room 333, Beltsville, Md. 20705.
Better evaluations needed under specific situations

Very few can claim a first place finish four years in a row!

Not in the World Series!
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Not in the Masters!
Not in the US Tennis Open!

But it did happen in the USDA Turf Trials... The winner was Saturn, 4 years in a row!

In 1988, 1989, 1990 and again in 1991, Saturn ranked first in overall quality out of 65 different varieties tested in the National Perennial Ryegrass Trials sponsored by the USDA at 22 locations all across the United States and Canada.

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Saturn is truly a Superstar! Dense, dark green and lower growing, it also topped all other varieties in mowing quality. Endophyte levels are high too! For consistent performance specify Saturn — it's consistently number one.

Continued from page 11

ranked number 45 (for turfgrass quality data averaged from 21 locations) out of 123 entries in first year data from the current national perennial ryegrass test established in 1990. Out of the 45 entries ranked above Saturn, 27 entries performed statistically better (for turfgrass quality) than Saturn.

My purpose here is not to belittle a particular variety but to demonstrate the outstanding progress that has been made in perennial ryegrasses with darker green color, better density and lower growth habit.

It appears, also, that disease resistance has been improved somewhat in these new cultivars. In addition, approximately 70 of the 123 entries contain at least 50 percent fungal endophyte which adds resistance to certain insect pests and stress tolerance.

Tall fescue is another species that has come a long way from the old, well-known, forage variety Kentucky-31. Genetic color, density and leaf texture have been greatly improved in tall fescue; increasing the use of this grass on home lawns, athletic fields, golf course roughs and other areas.

Unfortunately, the older forage and first-generation turf-type (i.e., Rebel and Falcon) cultivars seem to survive better during extreme heat, humidity and prolonged drought conditions, especially during typical homeowner management that often occurs.

But I believe breeders are trying to improve on the "survivability" of the newer, denser, lower-growing, turf-type tall fescues.

Bentgrasses (creeping, colonial and dryland types) were first evaluated by NTEP in 1989 with three separate tests established: greens management on modified soils, greens management on native soils, and a fairway/tee test. The first data was collected in 1990.

The data has shown that considerable variation is present among the entries in these tests. Genetic color and density have been improved in creeping bentgrass. In some instances, disease resistance has been improved in fine fescue. But some of the new cultivars listed by NTEP have failed to improve on the "survivability" of others in these tests.

The data has shown that considerable variation is present among the entries in these tests. Genetic color and density have been improved in creeping bentgrass. In some instances, disease resistance has been improved and in other instances it has not. The strengths found in Grasses and other grasses have been better dollar spot resistance and winter color than creeping bentgrass.

The NTEP has been a good vehicle for the introduction of newly improved species such as buffalograss and zoysiagrass. Although these two species have only been in nationwide tests for one year, considerable information has been gained on their possible adaptation and use in the United States.

Buffalograss, native to the Great Plains, has shown to be fast-spreading, drought-tolerant and, in some instances, quite attractive for well-manicured turf. Investigations are under way concerning wear tolerance and insect and disease resistance of buffalograss.

Determining locations and use situations (roughs, lawns, roadsides) where buffalo grass will work best is still under way, although the grass seems to have the most utility in the Midwest and Western United States, and somewhat less utility in the humid, Eastern states where disease pressure is greater.

Zoysiagrass has been used for more than 40 years in the United States but has seen a resurgence in interest in the last three to four years. This increased interest results from environmental concerns with pesticide use and the need for a grass that will perform well in hot, humid summers and still survive moderate cold winter temperatures.

The main drawbacks to the use of zoysiagrass (slow-spreading, vegetative establishment only) have been addressed with faster-spreading, vegetative types and seeded types currently being tested by NTEP.

Much variation exists within the different zoysia species for genetic color, leaf texture and density. Some of the zoysiagrasses approach the fineness of bentgrass. All grasses have negative aspects, with the very fineleaf zoysias being less winter-hardy and probably only suitable for use in the lower southeastern states.

Zoysiagrass may not be able to compete effectively in the marketplace with Bermudagrass and buffalo grass in many of the drier areas of the Midwest and West as the latter two species have better drought tolerance. However, zoysiagrass probably can have its greatest impact in the more humid Eastern and Southeastern states where disease and weed pressure is high and summer stress is common along with occasional "deep freeze" winter conditions.

With the improvements in the various grasses, many more seed companies have become interested in marketing these newer grasses. In fact, many of these companies are not only marketing new improved grasses, they are directly involved in the breeding, development and production process as opposed to just obtaining the right to market varieties of other companies. This situation has led to dramatic increases in the number of grasses in NTEP tests and consequently an increase in the number of NTEP entries in each test.
tend to consider, it is difficult for companies to develop and promote varieties on just these other characteristics.

In addition, I am not sure that NTEP information on wear and shade tolerance, tolerance of close mowing (less than 1 inch) and drought resistance is complete enough to detect distinct variety differences for these characteristics. For instance, I am aware of only one location that is maintaining the current national perennial ryegrass test at fairway height. Some diseases and insects occur sporadically within test plots and therefore very little data is available for these pests over several locations and years. Also, some locations have not collected as much information on these tests as other locations. This incompleteness leads to more questions than answers concerning performance.

To better serve the various needs of the different consumer groups in the United States, the following issues concerning variety development and evaluation need to be addressed:

1) More complete data collection including several locations and years. Also, some locations have not collected as much information on these tests as other locations.

2) Better evaluations under specific management situations - i.e., reduced maintenance (pesticide, fertilizer and water) and wear tolerance under golf traffic.

3) More complete data collection for turfgrass quality, diseases and drought by each university involved in NTEP testing.

The NTEP is already addressing many of these issues using different avenues. Kentucky bluegrass is now being tested in coordinated, separate low-maintenance and high-maintenance tests.

The NTEP Grants Program, initiated in 1980, is funding 23 studies ($480,000 over three years), some of which will hopefully increase our knowledge of drought tolerance, disease resistance and identification of particular locations or management situations where specific varieties offer improved performance.

The NTEP Grants Program, starting with tests established in 1992, is also partially funding the basic evaluations at universities. This funding will help university scientists conduct more uniform tests and collect better and more complete data.

In the end, the NTEP hopes to offer more complete information to consumers, which will benefit all who purchase and market turfgrass seed.

---

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Birde II / CBS II Blend
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Circle #122
Heat, drought sock seed yield, mean high prices

Low seed yields will result in higher prices this fall as late-June temperatures climbed into the highs-90s and low-100s throughout the grass-rich Willamette Valley, July brought no relief. The high temperatures were part of a devastating 1-2 punch that saw the region's rainfall during the September-June grass-growing season fall 14 inches below the average 35 to 40 inches.

As a result, fine and tall fescue production will only reach 30 to 40 percent of their normal yields, predicted Seed Research of Oregon President Mike Robinson. The ryegrass crop will be off 10 percent and maybe more if the hot, dry weather continues, he added.

"I saw one 50-acre field yesterday (June 23) that will be a total write-off," Robinson said. "This is the critical time when seeds begin dropping. The fields don't fill well in weather like this, especially in sandy areas. Many of the fields in gravelly soils around the rivers are gone."

More water-retentive, clay-soil fields are in far better shape, Robinson said. So, too, are the bentgrass plots, although a continued heat wave could also affect them. Oregon has had the greatest increase in average temperature of any of the 50 states this year," Robinson said. "Last year it rained almost every day through July 4 and we were afraid the grass would never produce. It's always feast or famine here."

According to Barry Norris, an engineer for the Oregon Department of Water Resources, drought conditions have persisted for six years now. A lack of precipitation has been exacerbated by this year's record-setting temperatures.

"It's been extremely warm here," said Norris. "We've had record high temperatures broken on several occasions. We've also had record-breaking low flows in rivers across the state—not just record-breaking, record-shattering. These rivers are down 53 percent."

News of the poor seed harvest didn't surprise Norris. "If they're depending on high-precipitation this year, they're hurting."

Ryegrass breeders pursuing major results

Continued from page 21 since the discovery in 1983 of endophyte, a fungus that lives within plants and gives them natural resistance to certain surface insects.

"Soon, with that (endophyte) clue, we found resistance to sod webworm and later to billbugs and chinchbugs and so forth," Funk said.

And the list of improvements goes on, although presence of endophytes in a grass matters less if it is being used to overseed.

Funk pointed out that of the top 45 varieties of ryegrass in the 1991 first-year results of the National Turfgrass Evaluation Program, only two were in the previous test.

Kevin Morris, director of the NTEP, said: "In this test we have almost twice as many entries as the last one. I suspect of the 123 varieties this year, 80 to 90 have never been in the test before."

Saturn, which topped the list in 1986, rated 45th in the 1991 results, which were released in July. Dimension was near the top in 1986 and is ranked 35th now in overall average.

"Most of the varieties that performed with higher averages are just coming on the market," Funk said. "They are darker, lower-growing, more stress-tolerant, more resistant to brown patch, better mowing."

Funk said plant breeders can "build on every previous cycle" of breeding.

"We've made a lot of progress in the last 30 years, I think we'll make even more in the next 30 years," he said. "A big factor is we've been able to attract a number of very competent young men and women into turfgrass breeding. They will do better than the old professors that started out knowing less than they do."

Funk said more of those plant breeders are working at commercial firms than at universities.

Morris explained that more companies today want their own varieties. "They then don't have to pay royalty fees and they have more control of the supply," he said.

 Asked why a seed company would enter so many varieties of ryegrass in the national test knowing they might not win since they might not win.

"In the golf industry," he said, "the superintendent usually wants the best and has the money for it. But he also has out-of-play areas and he doesn't want to pay so much for."
BRIEFS

GLASSER OPENS ACE CONSULTANTS
Joe Glasser, former director of golf at The Cliffs of the Sea Island Golf Club on St. Simons Island, Ga., has established a golf consulting business, Ace Consultants, specializing in new facility development services and existing facility performance improvement services.


ASMCA MAKES ZIKORUS A FELLOW
At Zikorus of Canaan, Maine, was elected a fellow of the American Society of Golf Course Architects at the society's annual meeting in Southampton on Long Island, N.Y.

Fellow members are regular members who have been in good standing for 10 years or more, have reached the age of 70 and have been approved by the ASGCA annual meeting in Southampton on Long Island, N.Y.

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JOINT VENTURE PLANS FACILITY
The Stanton Property has begun construction on the golf course and infrastructure for a 500-acre development. The project includes an 18-hole private, championship golf course designed by Stephen Kay. The golf course is expected to be ready for play in early summer 1993.

A horse and bogey show...

By MARK LESLIE

Colorado is a horseman's paradise. It is also a golfer's delight. So the city of Arvada, a Denver suburb, and Zenith Development Corp. of Woodland Park have found a niche for both passions in two otherwise very different projects.

In Arvada, 140 acres of city land will be home to municipal Westwoods Golf Course and will feature 2-1/2 miles of equestrian and biking and hiking trails.

In Woodland Park, west of Colorado Springs, Zenith President Dale Ranney plans a golf community with a horse and mountain biking trail encircling the course.

"The first thing you notice in this region is the demand for horse property," Ranney said.

HORSES, GOLF A PERFECT MARRIAGE
Colorado is "an ideal horse country with spectacular golfing sites," said Jim Wilkins, superintendent of Arvada's other municipal, Lake Arbor Golf Course. City fathers hope Westwoods makes a perfect match.

Whereas horsemen in Lakewood, just seven miles away, vehemently opposed construction of Fox Hollow Golf Course, Arvada's equestrians have supported the municipal project and have been attentive onlookers during construction of Westwoods, according to Wilkins.

Norman brings Mackenzie look to American 18

From staff reports

LONG GROVE, 111. — Greg Norman and the folks at Kemper Sports Management feel golf course architect Alister Mackenzie would be happy with their new creation 35 miles northwest of Chicago — Royal Melbourne.

"We tried to be true to the traditions of the game," said Kemper Vice President Doug Schmidt. "The Royal Melbourne course in Australia is one of Greg's favorite in the world, and we feel we have kept to Mackenzie's rules of design in our Royal Melbourne."

The American version, a private course that opens to members Aug. 15 and whose grand opening will be Sept. 12, indeed fits the Mackenzie mode in all the key areas.

Mackenzie said a golf course should:
• Consist of two loops, creating different wind conditions. ("Done," says Schmidt.)
• Mix long par-4s with shorter, tough par-4s, calling for an infinite variety of shots. ("Done.")
• Have greens and fairways that are very undulating but not severe. ("Ibid.")
• Sport minimal blind shots. ("Done.")
• Stress natural beauty, not contrived by man. ("Put an asterisk on that.")
• Cause absolutely no annoyance by causing the golfer to look for lost balls. ("Only if you want to skin dive in one of the nine lakes.")
• Maintain excellent course conditions. ("We've hired Tim Sedgley from Oakhurst Country Club in Antioch, Calif.")
• Flush the sand as opposed to building overpowering bunkering. ("Done.")
• Camouflage (Mackenzie's strength). ("On the 18th the bunker is out 40 yards from the green, just like Mackenzie would do it.")

Schmidt said the course combines three natural elements.

Six holes are set in a heavily wooded area with mature oak trees. Six are set in a designated preservation prairie-wetland area. And six holes play around nine manmade lakes.

This balance in design came from the team of Norman, who was involved from the pre-planning stages; architect Ted Robinson, who did the routing plan; and Kemper Director of Golf Bob Spence, who supervised construction.

The course plays four sets of tees from 5,500 to 6,800 yards.

The 325-member club includes such notables as NBA star Michael Jordan, PGA Tour pro Chip Beck; Chicago Bears defensive end Jim Harbaugh and Ron Rivera; and Western Golf Association President Bob Alsteen, who lives off the 17th hole.

They already have a challenge — matching Normans inaugural round feat. Norman reached the 565-yard, par-5 17th, a double dogleg, from 255 yards out and stepped 15 feet from the pin.

"We will put out a plate on the fairway to commemorate that shot," Schmidt said. "People will try to duplicate that shot for years."

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Continued on page 28
Horses, golf mix in mountains of Colorado

Continued from page 27

Golf course architect Richard Phelps designed the Arvada course, working in concert with parks planner Harry Johnson, who laid out the parallel equestrian and bike trails. Wilkins will add Westwoods to his overview. Park and Recreation Department crews will care for the ash-surfaced equestrian trails and concrete biking and hiking paths. The trails will travel from property line to property line, then go through a tunnel under Quaker Street to connect with existing city horse trails. The tunnel will have unique sky-lights so the horses won't scare, Wilkins said.

Ralston Creek comes through the center of the course, and both the bike and equestrian trails will run along the creek so horsemen are separated by old-growth trees and protected from errant golf shots. "It's always scary and risky to run trails through a golf course," Phelps said. "We tried to run them along the greenbelt with a lot of foliage for protection." Phelps said the region has a lot of pedestrian-type trails on courses, but horse trails are rare. And Westwoods has the only trails he knows of that are specifically dedicated to and built for horses.

Earthwork was started on the course in March. Phelps said the front nine should be seeded this year and could open for limited play next summer. The back nine will probably be seeded next spring and open a year later. "This will be an excellent municipal golf course," Phelps said. "We have a mixture of woods, we're building ponds, and there are high points with beautiful views of the foothills and Denver."

Wilkins said: "We're looking forward to having this golf course open... There is quite a bit of wildlife: mountain lions, deer, foxes, coyotes, cranes."

AN IDEA FOR THE FUTURE

Will this idea of mixing equestrian trails and golf courses catch on?

Zenith's Ranney said these are "some of the amenities people are looking for."

Ranney's 480-acre Hawk Ridge development will include an 18-hole Scottish links-type course designed by Byron Color. Crushed, compacted granite-surfaced trails will run parallel to all roads. "There has been interest in an equestrian center with a stable," he said. But the homes will be on sites as large as five acres, so many homeowners will house horses on their own land.

Since the development is surrounded by Pike National Forest, equestrians can literally ride along the golf course and off into the sunset.

Irwin signs to design N.C. layout

Hale Irwin Golf Services, Inc. has been commissioned to design the golf course planned for The Meadowlands golf community.

The Meadowlands is located in Davidson County between Winston-Salem and High Point, N.C. The Meadowlands is a 600-acre master planned golf community near Buxby Fork Creek. The course plans to be an 18-hole par-72 semi-private country club.

The developer is W&W Properties Inc. The site has extensive old-growth oak and pine forests interspersed with gently rolling meadows. William G. Daniel & Associates of Cary, N.C., has been retained as engineers for the community. John Ranyan, development coordinator with W&W Properties, said, "Golf course construction is scheduled to begin in the fall of 1993, with an opening planned for the summer of 1995."

Architect Richard M. Phelps will provide the architectural planning for earthmoving, drainage, features construction and other technical aspects of the course, and produce the architectural plans used in course development.
Builders add education and certification to conference

ST. LOUIS — Two days of educational sessions and a cocktail reception on the eve of the PGA Championship will highlight the annual membership meeting of the Golf Course Builders Association of America, Aug. 12-14 at Doubletree Hotel here.

The semi-annual conference of golf course construction contractors and specialists will be the first with a formal tie to the PGA of America's premier tournament.

"We held the meeting last summer at the PGA because the time and place — Crooked Stick in Carmel — were convenient. But the tie seemed so natural that we've formalized the relationship for the next three years," said Phil Arnold, GCBAA executive vice president.

GCBAA President Jerry Pierman added: "Our annual winter meeting is at the International Golf Course Conference and Show with the Golf Course Superintendents Association of America, the people who maintain the courses we members build. So it seems fitting that we also meet regularly with golf professionals, the people who have the closest relationship with the ultimate users of golf courses."

Thursday morning's educational session will focus on the Allied Associations of Golf, featuring speakers from the PGA of America, United States Golf Association, Club Managers Association of America, GCSAA and the Society of Golf Course Architects.

"With the recent explosion of golf course construction, many of our members have been so busy building courses that they haven't had time to learn about the other professions that make up the golf industry, particularly those who move onto a course after it is built," Arnold said. "This session should bring them up to date."

Already committed is Jim Snow, director of the USGA Green Section, who is expected to confer with the builders about revisions to the USGA's construction recommendations.

Friday's activities will feature educational sessions devoted to recent scientific and technological development affecting the construction industry. In addition to a presentation by noted agronomist Dr. J. Kevin Mathias of the University of Maryland, several of the GCBAA associate members will speak briefly.

Final item on the agenda is Friday afternoon's two-hour written certification examination for members who have completed all other steps in the application process to become a Certified Golf Course Builder.

Jack Nicklaus' addition to Reynolds Plantation opens

GREENSBORO, Ga. — The Jack Nicklaus-designed Great Waters Golf Club at Reynolds Plantation on Lake Oconee opened July 11.

Great Waters, which takes its name from the English translation of the Indian word "oconee," is a par-72 layout stretching 7,062 yards from the back tees. The course features nine holes directly along or across the waters of the 19,000-acre Lake Oconee. Great Waters began accepting non-member play on July 20.

"All of us at Reynolds Plantation are extremely proud of what Jack Nicklaus has created at Great Waters," said community president William Pracher. "We gave him a spectacular piece of land and he turned it into an even more spectacular golf course."

Two holes in particular may claim more than their share of the accolades. One is the 11th, a par-4 of 358 yards from the back tees that plays downhill toward a green set on a peninsula. In fine-tuning the design, Nicklaus actually shortened the hole slightly in an effort to tempt the longer hitters to attempt the ultimate, driving the green.

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CIRCLE #125

August 1992
Banff area pushing for major golf development

By PETER LAI

S

purred on by a provin
cial government push
ning for tourist dollars, 10
golf courses are planned within the shadow of leg-
endary Banff Springs Golf Club
outside Canmore, Alberta, Canada.

The biggest project is Three
Sisters Resort, a proposed 72-hole


golf course community that could
add 12,000 residents over the next
20 years to Canmore, a 6,000-per-
son township located just outside
the gates of Banff National Park.

"The Wind Valley area is the
chief concern," said Barry Gunn,

a reporter with the weekly
Canmore Leader. "It's an environ-
mentally significant area. Three
Sisters has focused its efforts
there."

Public hearings before the re-
cently formed Alberta provincial
Natural Resources Conservation
Board (NRimet) on the controver-
sial project were scheduled to
conclude in late July or early Au-
gust.

To make certain both sides are
heard and an environmentally
sound decision made, developers
are required to pay for both Envi-
nmental Impact Assessments as
well as the expenses of interven-
ors (those determined to be af-
fected by the project) and their
 hired experts to testify before the
NRimet, according to Canmore
Director of Planning and Devel-
 opment Paul Bates.

Three Sisters developers have
already spent about $1 million on
the project, Gunn estimated. The
environmental group Earth First
was among those granted inter-
vener status, Gunn said.

If approved, the Three Sisters
project would still need to be re-
viewed by local officials. What will
happen there is a mystery since
all six Town Council members
are up for re-election this fall.

"The potential is there for all of
them to be replaced," Gunn said.

"Many people are upset with how
they have handled things."

According to Bates, three of
the Three Sisters courses were
previously approved by the neigh-
boring Municipal District of Big
Horn. Canmore has since annexed
the area. The town accepted Big
Horn's approval of one course.
But time limits have expired on
the other two. Stop-work orders
have been placed on those 36
holes, the subject of the recent
 NRimet public hearings. Develop-
 ers have yet to submit an applica-
tion for the fourth layout.

Other local projects include:

- Hyatt Regency Golf Course,
an approved 18-hole layout owned by Canmore Alpine Development Co. expected to start construc-
tion in late summer or early fall.
- Mountain Meadows Golf
Course, an 18-hole facility previ-
ously approved by the Municipal-
ity of Big Horn and annexed by
Canmore. The time limit has ex-
pired and the project would have
to be reviewed again.
- Kananaskis Country Golf Course, an
18-hole golf course and 50-stall
 recreational vehicle park located
in Big Horn.
- River's Bend Golf Course, a
planned 18-hole, 150-stall RV park
in Big Horn.
- An 18-hole proposed course
affiliated with the Kananaskis Coun-
try Golf Course, an existing 36-hole
 facility in Kananaskis Country. Im-
 provement District No. 5. The dis-

tract is managed by the provincial
government. In late June, the
planned facility became the first
golf course project to go through
the NRimet review process. Devel-
opers were still awaiting the
NRimet's decision in early July.

"I don't think all the projects
proposed will be approved," Bates
said. "What the Resources board
does with the Three Sisters project
will be a good gauge of what's
going to happen around here."

"There's a healthy split of opin-
ion within the community. Wild-
life and the rivers are very impor-
tant to many people. Some aren't
sure golf courses are the best use
of the land. Others don't like what
they believe golf represents.

"But the Hyatt project got solid
support. The course really seems
to work with the land."

Canmore was mainly a coal-
mining town until the late 1970s.
When that industry fell on hard
times, tourism became the area's

Continued on next page
Banff region looks to attract hordes of golf-thirsty tourists

Continued from previous page

Real estate values have shot up the past decade, angering some residents and would-be residents opposed to Three Sisters and the 2,000 new homes it could add. A basic, three-bedroom home in the Canmore area has climbed to $140,000, much higher than 10 years ago, Gunn said.

If growth continues, some fear Canmore could eventually mirror the town of Banff, a resort that rivals communities like Aspen and Vail, Colo.

Three Sisters — with its four courses, 2,000 homes, resort hotel and re-zoning requirements for a portion of Wind Valley — was expected to take two months.

"You can't compare the two projects," Bygrave said. "Three Sisters is a mega-project. Ours is a mini-project.

"Still, it was frustrating to have to go through that process since we are in an area that was already zoned for what we wanted to do. There was some opposition, but not much."

The same can't be said of Three Sisters. Big Horn Municipal Manager Sam Hall said the controversy surrounding the bigger project involves the perceived environmental sensitivity of Wind Valley; fears the hundreds of miles of abandoned coal mine tunnels that underlie the property render it unstable; and the fact that Three Sisters Calgary-based development company is not local.

"Some projects seem to get a lot of negative press and others don't," Hall said.

Attempts to reach Three Sisters officials were unsuccessful.

Perry Dye opens European office, inks first pact


Dye will design the 18-hole championship golf course around a castle — Schloss Seltenheim — the baronial home of the Hapsburg family. Dye will provide other services including construction supervision, shaping, and a maintenance consultant beginning with grow-in. The project will also include a nine-hole Romantic course and practice facility designed by Architect Ing. Gerold Hauser, president of The European Society of Golf Course Architects, and a clubhouse designed by Wien & Klimbacher.

With the establishment of a site office at Seltenheim, Dye expects to coordinate its other European business from this location.

Legends opens North Course, readies South

FRANKLIN, Tenn. — The North Course at Legends Club of Tennessee opened for play June 27. The Club's South Course will open later this year.

Legends Club will be the permanent home of the Tennessee PGA, the Tennessee Golf Association and the Tennessee Golf Hall of Fame. Legends Club of Tennessee is owned and operated by Kite/Cupp Golf Enterprises. Based in Atlanta, Ga., the board of directors of Kite/Cupp Golf Enterprises is chaired by Robert E. Cupp and Tom Kite Jr.

Management of the clubs will be directed by the board of directors of Kite/Cupp Golf Enterprises, Inc., with their directions carried out by the club director. Members will be appointed to serve on the Clubs' Golf Committees to insure that they have teaching programs, tournaments, and events that actively promote the enjoyment of the game for the entire golf communities.

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Courses approved

Golf Course News is publishing these lists monthly from our sources and with the assistance of Forecast Golf Marketing & Financial Systems, Inc. of Richmond, Va. They include courses that have been planned or approved around the country in the past month. When the planned courses newly approved in the U.S. chart. We would appreciate your help in updating this section. To contact us call 207-846-0000 or write Golf Course News, P.O. Box 997, Yarmouth, Maine 04096.

Under "Type" — D=Daily Fee; P/Private; M= Municipal.

Under "Class" — R= Regulation; E=Executive; P=Par 3.

Under "Work" — N=New; R=Renovation.

Courses newly planned in U.S. and Canada

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For Mulligan nine looks to add through subtraction

SLATERVILLE, Utah — There no longer is a 10th hole at Mulligan's Golf Course just north of Ogden, but the current nine-hole setup has length comparable to the previous yardage.

Two new holes, a par 4 and a par 5, supplanted two short holes, and two par 3s became doglegs par 4.

Jimmy Blair, Mulligan's owner/developer/professional, said land logistics meant the course had to be either ten or eight holes.

A new Mulligan's practice facility has opened in West Jordan, and the Mulligan's layout will expand to 18 holes within two years.

With a playing partner's grudging consent, it's still a "must for wilt watch."
Lenders may impose environmental liability insurance

Continued from page 1 past, "but it has not been routine," said Bill Love, a principal in the Maryland-based golf course architectural firm Ault, Clark & Associates.

"I can understand the reasoning. But I don't know what ramifications it might have on development. I can't see that amount of money stopping a project, although I know developers won't like it."

Denver-based environmental insurance company Eric Group Inc. helped design Fleet's program, according to Karen Scherger, Eric Group's communications director.

The policy, she said, will cover pre-existing conditions that went undetected before the loan was made; pollution that migrates onto or off from the property; and pollution caused by tenants.

At least 35 of the nation's 50 largest banks have indicated to the Eric Group they are considering requiring environmental liability insurance, Scherger said.

So far, Fleet is the only one to require it on a facility-wide basis," she said. "We would consider a golf course as a qualifying project and require the insurance," said Fleet Vice President Joanne McClatchy.

Fleet has not financed a golf course project in two years and considers courses "a discouraged credit," she added.

While the insurance policy protects banks in the event of foreclosure, the policy is primarily intended to shelter developers from getting burned for millions of dollars to clean up something they did not know was there, Eric Group Vice President Glen Sibley said.

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DOGWOOD COURSE OPENS
AT GARDEN VALLEY GOLF RESORT

Texas Golf Association Immediate Past President A.J. Triggs calls Garden Valley Golf Resort's new Dogwood Course "one of the premiere courses built recently in Texas. Good design, unbelievable beautiful and a delight to play."

The 6,860-yard, par-72 layout, 75 miles east of Dallas, was designed by Sanford & Associates of Jupiter, Fla. It lies on heavily wooded, rolling terrain, along lakes, with water affecting 11 holes, and incorporates a variety of dogleg lefts and rights.

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**Study: Average Canadian plays more than the average Yank**

JUPITER, Fla.—Green fees are higher north of the border than in the United States.

The National Golf Foundation's new report on golf in Canada shows that the average weekend green fee at an 18-hole public facility there runs $24.42 (Canadian) or about $20 in U.S. currency. The average in the U.S. was $16.44 in 1990.

NGF's survey of more than 1,700 facilities in Canada is the third in a series of research on golf in Canada. Earlier studies show that not only does the average person in Canada play more than the average American, but there are more public golf courses there.

The new report examines capital expenditures, maintenance expense, number of employees, capacity utilization, and how owners/operators view environmental concerns, increased competition and the ability to increase fees impacting their operations.

Among report insights:

• A majority of Canadian facility owners reinvest an appreciable amount of their revenues back into their operations. More than 78 percent of survey respondents reported making a recent capital expenditure, with the average outlay about $365,000 (Canadian). Attracting the highest percentage of expenditures were clubhouse renovation, irrigation systems and playing surface improvements.

• Since 1988, the average 18-hole weekend Canadian green fee at a public facility increased 52 percent.

• The average maintenance budget for public golf facilities (including semi-privates) in Canada is approximately $115,300 (Canadian). This compares to $270,300 for private facilities.

• Canadian facility owners and operators are most concerned about maintenance and labor costs and their ability to increase fees. Other areas of concern are availability of water, environmental issues and insurance costs.

**Virginia reports pent-up demand**

There is a consensus of pent-up demand for good golf courses in Virginia, but bankers must step up if developers are to get off the ground.

An 18-hole course is scheduled to open next year at Loe's Hill residential community in Spotsylvania County, near Fredericksburg; but there's a faraway look when others are mentioned.

A dollar shortage sidelined plans for a PGA of America's 18-hole public course on the 270-acre Union Mill Park that transects the city and Prince William County. Four 18-hole courses in Prince William County and two in Stafford County are planned over the next three years, the economy permitting.
Proposed wetlands changes would clarify definitions

Consistent with President Bush's Wetlands Protection Plan, which he issued last Aug. 9, the U.S. Environmental Protection Agency and the Army Corps of Engineers have issued a proposed rule they say would clarify and improve the wetlands regulatory program under Section 404 of the Clean Water Act. The proposed rule includes three changes to the regulations. One would clarify the definition of "discharge of dredged material." Another would clarify when the use of pilings in wetlands should be regulated. The third would codify that prior converted croplands are not regulated under Section 404.

The public has until Aug. 15 to provide comment to the agencies. "These proposed changes would close a loophole in the Section 404 regulations that has allowed discharges of excavated material to go unregulated, resulting in the destruction of wetlands," said EPA Administrator William K. Reilly. "At the same time, we can ensure that some 60 million acres of prior converted cropland remains in productive use outside the scope of the Section 404 program."

The definition of "discharge of dredged material" would include discharges associated with land-clearing, ditching, channelization and other excavation activities when those activities destroy or degrade wetlands or other U.S. waters. This proposed change would not affect the existing exemptions for normal farming, ranching and silviculture practices. The agencies' current definition of "discharge of dredged material" excludes minimal, incidental soil movement occurring during normal dredging operations. Application of this language in the field has sometimes led to inconsistent results, they say.

For example, some small excavation discharges resulting from land-clearing and drainage in wetlands have been excluded from regulation, even though the discharge was part of an activity that had significant effects on wetlands or other U.S. waters. This proposal would continue to regulate only those activities that involve a discharge of dredged material in U.S. waters. EPA and the Corps believe the proposed revised definition of "discharge of dredged material" will improve regulatory consistency and wetlands protection.

The second proposed change incorporates existing Corps guidance on when the placement of pilings should be regulated. In the past, some development projects have been constructed on pilings in order to avoid Section 404 regulation, the agencies say. Under the proposed, pilings that support structures normally built on fill, such as office buildings and multi-family housing, would be regulated under Section 404 since the pilings serve the same function as "fill material."

Palm Harbor undergoing greens, tees renovation

PALM COAST, Fla. — Palm Coast's oldest golf course, Palm Harbor, is reconstructing its tees, greens and clubhouse. The course closed June 1 and is scheduled to reopen Dec. 1, according to Fred Kleinfelder, director of golf maintenance for SunSport Recreation. The ITT Community Development subsidiary operates Palm Coast's four golf courses, tennis clubs, marina and restaurants. All SunSport facilities are open to the public.

Palm Harbor's approximately 550 members have been offered full member privileges at either Cypress Knoll or Matanzas Woods golf clubs until Palm Harbor construction is complete. Matanzas and Palm Coast's fourth golf course, Pine Lakes Country Club, were designed by Arnold Palmer and Ed Seay, while Cypress Knoll is a Gary Player course.

The 6,572-yard Palm Harbor layout, designed by Bill Amick, opened its front nine in 1971 and back nine two years later. Tilton Turf Farms, Inc., of Tilton, Ga., is rebuilding the tees and greens and restoring them to their original size. Kleinfelder said the work is necessary because hybrid Bermudagrass greens revert to unsuitable grasses after about 20 years, and tees and greens gradually lose their original shape and grade.

The Palm Harbor clubhouse expansion, being handled by ITT Community Construction, will put the pro shop, locker rooms and 19th Hole under one roof.

Di Giacomo constructs Art/Rock formations that communicate time, force and motion inherent in the rock.

Representative Projects:
- Dove Canyon Country Club, Orange County, CA; A Jack Nicklaus Signature Course
- Tomato Golf Club, Naito, Japan and Green Hill Seki Golf Club, Nagoya, Japan; J. Michael Poellot Golf Design Group
- Knikoa Country Club, Okayama, Japan; Robert Trent Jones, Jr.
- Wood Ranch Country Club, Temecula, CA; Theodore G. Robinson, Inc.
- Art Lake Golf Club, Osaka, Japan; Golf Plan Incorporated
- Rotary Golf Club, Kobe, Japan

Di Giacomo constructs Art/Rock formations that communicate time, force and motion inherent in the rock.
CMX Golf formed

PHOENIX, Ariz.—CMX Group, Inc., a sports- and development-oriented engineering and project management company, has created CMX Golf. Focusing on the golf engineering market, CMX Golf will facilitate and support design goals of the architect, coordinate owners' needs and integrate the course into the surrounding infrastructure. It will be headed up by Darrell Wilson.

Graham signs for Indonesian project

PHOENIX, Ariz.—Former U.S. Open and PGA champion David Graham, along with Scottsdale golf course architect Gary Panks, have announced Scottsdale-based Graham/Panks International has been retained to design a championship 18-hole layout in Indonesia.

Located 24 miles southwest of the country's capitol city of Jakarta in the foothills of the Puncak Mountains, the Royal Jakarta Golf Club "will bring a whole new standard of golf course design to Indonesia," said Graham, a 20-year veteran of the PGA Tour.

"Indonesia has not seen much new golf course activity in the past decade," he said, "certainly not of this caliber. We see a new trend developing. Indonesia is right on the heels of Thailand as far as its own golf boom is concerned. It will be the country to watch in the 1990's."

The Royal Jakarta Golf Club, scheduled to open in the fall of 1993, is being developed by P.T. Fajar Marga Permai, headquartered in Jakarta. The site consists of 3,300 acres of rugged, hilly terrain in a tropical rain forest just south of the Equator. Master-planned for an elaborate golf course resort and residential community, groundbreaking is expected early this fall.

Industry research

Continued from page 10

but 3) is what gives an industry longevity," said Wilkinson. "Companies should start funding 3) and try to do 1) and 2) themselves.

"The bottom line is the industry needs to understand what will keep them on the cutting edge. More and more they'll have to pay for their futuristic research."

Some segments of the golf industry already employ these tactics. Many seed companies farm out their futuristic research to universities while tackling the practical and demonstrative research in house. This is manageable for larger companies with the resources to fund in-house research projects.

It's not so workable for the smaller firms.

"You can't take a small company and expect it to create that kind of research facility," Wilkinson admitted. "If you're a small company, you have to really focus your research dollars.

"Because if you don't develop it, you'll have to buy it."

Golf not insulated

Continued from page 10

down the road a shopping mall, complete with acres of hot-top parking, went through the public-hearing process with nary a word of distaste.

Wouldn't it be wonderful if more of the general public thought of golf courses as Brendan Gill does? In the August issue of Architectural Digest he writes: "Golf courses are among the most pleasing objects that man has fashioned out of nature—in the arts jargon of our day, they are sculptural earthworks that happen also to function well in ecological terms, shielding from the gross asphalt intrusions of suburbia several million acres of grass, trees, ponds, streams and wetlands. As for tennis, from an aesthetic and ecological point of view it is virtually a cipher."

Oh, for more Brendan Gills in the world. Instead, we have people with no eyes to see, ears to hear, or hearts to receive the truth. We have people who are quick to verbally assassinate a politician with the audacity to speak out against a rap singer who espoused the idea that black people should kill white people. How dare he? They asked. We have people who loot even the businesses that have paid their wages. We have roving gangs in the streets.

And, no, the golf industry is not insulated from insanity in this society of bizarrity.

Three years ago the late Don Rossi, then-executive director of the Golf Course Builders Association and former head of the National Golf Foundation, told me vandalism was a major problem on j courses. And that was before the new era of hard-nosed, club-wielding, no-reason-needed rioters.

So, watch out, say your prayers, for you never know when this violence is coming your way.
GCSAA, McLoughlin settlement resolved

Continued from page 6

and just let go.

"Speaking of the McLoughlin suit — one of four the GCSAA has lost in recent years — Ochs added, "Certainly with any major piece of litigation it gives one a comfort level to have yesterday's business done."

He said "under no circumstances" would GCSAA members be assessed to help pay the bill, adding that "a substantial amount of insurance company money went into this (to pay) for the judgment."

For his part, McLoughlin said: "It's not a question of being pleased it's over. I'm primarily pleased because of the results which totally exonerate me and other good staff members at GCSAA at the time."

In his post-trial ruling on GCSAA's appeal of the verdict, Judge Rogers reaffirmed the jury's lost in recent years — Ochs added, "...essarily or intentionally false..."

these statements were recklessly disregarding the falsity of the statements in question."

In its appeal of the jury's judgment, the GCSAA said accusations of financial records being stolen were untrue, and that McLoughlin had himself removed records from the headquarters.

The jury found several statements the GCSAA attorney approved the letter, the judge wrote, adding: "Under these circumstances, we believe the defendant may be charged with knowingly or recklessly disregarding the falsity of the statements in question."

"In sum, we find there was evidence to support the jury's finding of malice in connection with the verdict upon plaintiff's libel claim."

"There were indications that the jury considered the statements were sufficiently false to support the jury's verdict on libel."

"In sum, we find there was evidence to support the jury's finding of malice in connection with the verdict upon plaintiff's libel claim."

Schilling did not return phone call regarding the case."

BONITA BAY, Fla. — Bonita Bay plans to offer its members 54 holes of golf, building its reputation along with Bay Island, a third championship golf course built using nine holes of the existing Marsh course."

The Marsh, opened in January 1985, will be split, with nine new holes added to the back nine to create Bay Island, and nine new front holes built to recreate The Marsh.

Construction of the new course should begin in the spring of 1985, and Arthur Hills, who designed the other two courses, has already begun the design for the 18-hole course."

Like The Marsh and Creekside, the new course will complement the natural features of the Bonita Bay property. A wetlands slough will frame many of the new holes and a few holes may have views of Estero Bay. "There will be a nice balance of lengths among the course," said Hills.

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PHOTO CREDIT: Photo courtesy of Nat Binns, golf course superintendent, Lakewood Country Club, Rockville, Maryland, (unretouched photo)

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### CASPER GOLF RETAINED AT SWAN POINT

**VIENA, Va.** — Billy Casper Golf Management (BCGM) has been retained by USX Realty Development for a project in southern Maryland. BCGM was originally retained to do a thorough membership feasibility study for the club. As a result of the program, development designed by Casper, USX retained the golf management firm to implement the membership program. Swan Point is the world’s largest championship golf course that was redesigned three years ago by Bob Cupp.

### JAMESBURG, N.J.

**Mariana Nork has been appointed general manager of Forsgate Country Club. Del Giorno has been appointed general manager of Forsgate Country Club. Del Giorno brings more than 22 years of experience in the hospitality industry to the position. Prior to joining Forsgate, Del Giorno worked for Benchmark Hospitality Group, a full-service golf course development and management company.**

### NORKO TO MANAGE CLUB FOUNDATION

**ALEXANDRIA, Va.** — Mariana Nork has been appointed manager of The Club Foundation, formerly the Club Management Institute Foundation. She will act as a liaison for the foundation’s board of governors and direct the foundation’s national “Campaign for Excellence.” Nork is director of development at National Museum of Women in the Arts, Washington, D.C., where she directed corporate and major donor solicitations, developed long-range planning, and designed and implemented a planned giving program.

### HICKMAN HIRED ON AT BROADMOOR

Bob Hickman has been named director of golf operations for the Broadmoor in Colorado Springs. A PGA Master Professional with 40 years experience under his belt, Hickman is a former director of golf at Medinah Country Club Corp. Hickman replaces one the top superintendents found out they were interested and decided to take a chance.”

### ELON OF the art of maintenance for hire: Best of both worlds?

**JACKSONVILLE, Fla.** — When Ray Grady signed on as general manager in early 1989, the 45-hole Bobby Jones Municipal Golf Complex was losing money, the city was going broke paying the debt service on renovations, and the facility was in generally poor shape, despite a high maintenance budget.

One maintenance worker had 45 years experience in the maintenance-for-hire business. Both superintendents followed him. Some couldn’t even read and write. We had an extremely high payroll for the quality of work we were getting.”

Grady decided it was time to hire a golf course maintenance company, an outside contractor who did not own the golf course, thereby avoiding the conflict of interest that often arises when a maintenance company also owns the golf course. The contractor would be responsible for overseeing the day-to-day operations at golf courses across the Southeast. Hopkins will also play an integral role in the new acquisitions process for Riverside.

### Payroll woes solved at municipal complex

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### Ruling ensures equal-opportunity tee times

**A Michigan ruling could change the way golf clubs nationwide organize their weekend tee times. Gov. John Engler recently signed his name to legislation giving women equal access at private clubs — and to all the amenities offered by those clubs. Its effect is this: Clubs may no longer keep women from teeing off at certain times or exclude them from areas such as all-male bars and restaurants. Violations will be reported to the Civil Rights Commission, and if discrimination is found, the club could lose its liquor license.**

### Five added to Club Corp. fleet

**DALLAS — Club Corp. of America has added five clubs to its growing national and international roster of city, country and city-athletic clubs.**

During May, CCA purchased the Capital City Club in Columbia, S.C., and signed four management agreements, which included the Carolina Club in Chapel Hill, N.C., and three country clubs north of the border in Canada.

### ISS Golf Services superintendent Jim Corcoran (top right) reviews pesticide application with trainee Ken Gokey. In photo below, Jim Riesenberq of Cincinnati shows off his barnstorming equipment.
New publication tracks trends in daily fee, resort management

Golf course managers and operators take heed: A recent publication warrants your attention. Trends in Resort and Daily Fee Golf, 1992 Edition is a statistical review incorporating operating and financial data on approximately 100 daily fee, resort and semi-private golf courses throughout the United States. The data used in this edition was compiled from the year ending Dec. 31, 1991.

This publication is designed as a reference and management/operational aid for golf course operators and others in the golf industry. It shows results in the following categories: revenue per round, average income and expenses, golf course maintenance expenses, maintenance costs per hole, and average expense variations 1991 vs. 1990. The results are reported by region and by type of course: resort, daily fee, semi-private.

The Uniform System encourages the uniform categorization of revenues and expenses, plus the uniform presentation of financial information to maximize the management information available to the operator. Most large and many smaller operators have already adopted the system.

The Trends report sells for $50 to members of the NGCOA, $75 to non-members. The Uniform System of Accounting for Daily Fee and Resort Golf Courses sells for $20 to members, $30 to non-members. To order either, call 1-800-933-4262.

Barnstormers

Continued from page 39

When it comes to covering a lot of ground, the competition isn’t the only thing that matters.
The ups & downs of regional buying

Somewhere between group and individual buying lies the purchasing hybrid of regional buying.

Management companies with a geographic concentration of courses have for years purchased chemicals on a regional basis. The same goes for sand and top-dressing — any maintenance need nearby courses might have in common.

If enough courses share needs, and the distance isn’t too great, regional buying makes sense.

And with the advent of technology like the Hydroject and Verti-Drain, management firms have seen fit to buy one or two per region. The regional buying makes sense.

Courses might have in common.

But it can save you a lot of money. Not every course needs its own Verti-Drain."

It takes a long time to make these agreements work. It also takes time to convince people in your own company it's the right thing to do.' — Mike Heacock, American Golf Corp.

significant on the expense side of the ledger. But we've really just started."

It's a long process, according to management company executives. Kemper Management, for example, didn't begin concentrating on group buying until three years ago — and the strategy is still evolving.

"We certainly haven't been doing it since day one," explained Steve Lesnick, president and CEO at Kemper. "You have to be a certain size to make it worthwhile. We're large enough now (14 clubs nationwide) that we can get the type of buying power that a group buyer can realize."

Further, added Heacock, "It's not an easy deal. Everybody wants to do it, but the mechanics are very difficult. There are potential savings out there, but you have to manage it.

The NGCOA recently entered into a partnership with Truck Centers, Inc., whereby NGCOA members can purchase GMC vehicles at a savings of 2 to 7 percent, depending on the option package. The NGCOA and its 1,112 members have also arranged for volume deals with U.S. Sprint and Alamo rental cars.

Negotiations are underway on purchasing the following products in bulk: golf cars, maintenance equipment, golf course chemicals and uniforms. The job of negotiation falls to NGCOA Executive Director Mike Hughes.

"Because of our size, we've been received well by manufacturers," said Hughes. "What we've tried to do is concentrate on the 10 or 15 items that are most

fashioned independence.

"Superintendents and club managers aren't used to being told what to buy," according to Mike Heacock, who administers centralized purchasing for American Golf Corp. "But it doesn't make sense for our 36 courses in Southern California to use different sand. So you've got to get everybody in a room and hash it out.

"This is why golf course superintendents associations aren't purchasing organizations. People can decide they don't want to spend as much this year, then someone else backs out and the deal is dead. What are you going to do? Sue them?"

The NGCOA and its 1,112 members have been curtailed.

"One of the dangers with this regional idea is you start getting into the trucking business," said Mike Heacock of American Golf Corp. "If you share too much, you need a fleet of trucks to keep up. We don't want to be in the trucking business — we're in the golf business."

"But it can save you a lot of money. Not every course needs its own Verti-Drain."

The value of such a deal is not so much the price savings. The real value lies in allowing companies like AGC and Kemper — no longer hostage to distributors — to deal directly with factories.

The value of such a deal is not so much the price savings. The real value lies in allowing companies like AGC and Kemper — no longer hostage to distributors — to deal directly with factories.

"This allows us to go way beyond price," Heacock explained. "It comes down to a question of 'How does, say, Toro support American Golf?' and rice versa."

Cushman increases your productivity with a complete line of 5th Wheel Implements.

Only Cushman increases your productivity with a complete line of 5th Wheel Implements.
Maintenance companies hired on

Continued from page 39

firm paid to maintain the facility for the city. To avoid any political backlash, Requests For Proposal (RFP) required the maintenance company to offer employment to all course employees. If the employees refused, which the four senior staff members eventually did, they were offered transfers to other city departments, keeping their benefits intact.

"Things couldn't have worked out better," said Grady, who settled on Tampa, Fla.-based ISS Golf Services following a nationwide search.

The complex is making money. And it is in much better shape, he said, following ISS renovations and additions that included flower beds, irrigation lines, rebuilt bunkers, new distance and out-of-bound markers, upgraded equipment and improved maintenance practices.

ADVANTAGES AND DISADVANTAGES

Golf course maintenance companies have been around for some time, ISS, which maintains 144 holes in Florida, has been in the business 10 years. California-based Environmental Golf took over DeBell Golf Course in Burbank 15 years ago and has since added two more courses for a total of 72 holes.

Professional Turf Managers Inc. of Lakeeland, Fla., (22 holes) and Serviscape of Michigan City, Ind., (27 holes) are two other experienced firms.

Generally, a maintenance company hires all employees (including the superintendent), provides most of the supplies and equipment and plans for future maintenance projects.

ISS Business Development Manager Steven Sanford said contracting maintenance services has several benefits for owners and managers:

- Fixed maintenance costs that are adhered to throughout the year.
- The ability to do additional projects — bunker renovation or fairway aeration for instance — with special work teams employed by the contractor.

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- Access to expensive, occasional-maintenance equipment an individual course cannot afford, but a maintenance company can share between several facilities.
- Reduced liability exposure since employees work for and equipment belongs to the maintenance provider.

"Boards of directors, pros and clubhouse managers may change. But by employing a maintenance company, at least the course quality stays consistent," said Serviscape President Peter Sinnott.

The disadvantage, at least from the existing crew members' viewpoint, is they may lose their jobs.

"We encourage the existing staff to make an application with our firm to continue employment at the same course," Sanford said. "When an existing employee is hired, it has proven mutually beneficial for the employee and our organization."

"We hope superintendents look upon the golf course contracting industry as an opportunity for growth and career advancement."

Salaries can also be affected.

"Sometimes pay and benefits have to be downgraded, especially with a municipal agency," said Bob Schofield, Environmental Golf's vice president of golf management.

Surrendering control is the biggest fear of owners, according to Schofield.

"Maintenance can be a very personal thing to an owner or board," he explained. "As homeowners, they have no problem personal or hired expertise in the pro shop or food and beverage operations may want to retain control in those areas, but is happy to turn over maintenance to an outside expert, Schofield added.

STEADY GROWTH SEEN

Management companies that run the entire golf operation, like American Golf Corp. and Club Corporation of America, have experienced tremendous growth in the last decade. Maintenance-only firms report a far less spectacular increase.

"I don't see maintenance companies taking over the golf market, but enjoying a steady growth," said Provisional Turf Managers President Jim Sartain.

Tougher environmental, disability and employee laws are headaches owners will increasingly want to turn over to outside companies, Sartain predicted. Municipal as well as low- and mid-priced daily-fee facilities looking to maximize profits are best suited for contract services, Sinnott said.

"I wouldn't rule out high-end daily-fee or private facilities. But private courses, at least, don't have the same profit motivation," he added.

A detailed RFP is the key to selecting the right maintenance company, Grady said.

"The more rigid the RFP, the better," the Bobby Jones general manager advised other managers and owners. "If the club says it will spend $700,000 annually on maintenance, everyone applying will say they can stick to it. Make them specify what they will do for that money."
Composting makes sense; but will it make money?

By HAL PHILLIPS

Spurred on by necessity, the commercial composting industry is poised to make a lasting impression on golf courses interested in organic fertilizer, peat-substitutes and mulch products.

- In the case of J.C. McMaster, an impression has already been made. More than 160 golf courses in Texas and the Southeast have used McMaster’s Rice Hull Compost in rootzone mixes designed to meet those guidelines recommended by the United States Golf Association Green Section.
- During a recent symposium in Ohio, researchers reported instances where composted materials actually contributed to disease suppression in bentgrass.
- And as landfill space dwindles across the nation, Ohio-based O M. Scott Co. and Pennington Seed of Madison, Ga., have each created composting stations where grass clippings, leaves and brush are removed from municipal dumps, decomposed, and sold to golf courses, farms and landscaping operations.

What we’ve seen across the nation is an effort to reduce the amount of leaves and brush, yard trimmings and grass clippings in the country’s landfills, explained Dr. Clark Gregory, better known as “Compost Man” to his faithful followers. “Municipalities have a responsibility to deal with this stuff when it’s left on the sidewalk.

Projects like these are especially interesting for golf courses because these materials tend to help water quality because of the slow-release nature of the product. Eventually, they could reduce dependence on inorganic fertilizer.

Golf courses constitute an intriguing case Continued on page 46

BIERIFS

AMERICAN PRIDE TAPS RUSELORSKI

MCPHERSON, Kan. — American Pride Golf Products, manufacturer of golf carts and accessories, recently named Pete Ruselowski as national sales manager in charge of golf car sales. “He’s been selling golf cars for 21 years. Most people will remember him from Columbia Par Car,” noted Rex Whitehill, American Pride president. “He has a reputation for taking care of his customers, on price and service. That will certainly continue, now that he’s with American Pride.”

BRYANT TO DIRECT PSI SALES

Dallas-based Pumping Systems, Inc. has appointed Bob Bryant director of sales. In his new position, Bryant will be responsible for maintaining customer relations and supervising sales promotion through PSI’s worldwide sales and distribution network. He will also provide factory-level support to designers and specifiers of golf course and other turf irrigation systems.

FOLEY JOINS WEATHER-MATIC

DALLAS — Weather-matic has announced the appointment of Foley Flo Marketing as the regional sales representative for Weather-matic’s Northeastern territory. The principals of Foley Flo are Bryan Foley and Steve Bridgewater. Foley Flo will assist and support distributors, contractors and specifiers.

API RELOCATES

Agricultural Products, Inc., has announced its relocation to a new, larger manufacturing facility in Ontario, Calif. Located near the junction of interstates 60 and 15, the new plant is approximately two miles from Ontario International Airport. The new location will provide room for API’s ongoing expansion of their drip irrigation fittings, accessories, tubing, filter lines and other water-handling products.

GIRARD MOVES UP AT RAINBIRD

GLENDORA, Calif. — Jackie Girard has been appointed senior marketing and customer service clerk for the Golf Division of Rain Bird Sales, Inc. In her new position, Girard will be responsible for handling field inquiries and expediting all requested information. Prior to joining the golf team, Girard worked as an accounts payable processor for Rain Bird Corporate Services.

Werner replaces retiring Wehner at Miles

PITTSBURGH — After more than 40 years of service, Heinz K. Wehner, executive vice president of Miles Inc. and president of its Agriculture Division, retired June 30. Succeeding Wehner is Hermann R. Werner.

Wehner began his career with Miles Germany-based parent company in 1951 in his hometown of Lima, Peru. Successive promotions in Peru and Mexico brought him to Kansas City, Mo., as director of marketing for the Agricultural Chemicals Division of the former Mobay Corp.

In 1990, Wehner became head of both the Agricultural and Animal Health divisions in Kansas City and was named to the company’s board of directors and executive committee.

Concurrent with the formation of Miles last Jan. 1, Wehner was named president of the company’s Agriculture Division. The division encompasses the Crop Protection/Specialty Products, Animal Health Products, and Consumer Household Products.

Werner joined Miles’ parent company in 1953 and has held increasingly responsible management positions Germany and South America. In 1986, he joined the former Mobay Corp., as vice president and general manager of the Dyes, Pigments and Organics Division.

RISE Annual Meeting set for nation’s capital, Sept. 12-14

WASHINGTON, D.C. — RISE (Responsible Industry for a Sound Environment) will hold its Annual Meeting Sept. 12-14, at the Ritz Carlton Tysons Corner Hotel in McLean, Va.

“We anticipate highly productive and informative sessions covering current issues of keen interest to those involved in the specialty industry,” said RISE Chairman William H. Culpepper, commercial director of Specialty Products at DowElanco.

“Year’s theme — Ris- ing to the Challenges, 1992 — reflects our commitment to addressing the concerns we are facing on the legislative and regulatory fronts and to become more proactive in promoting the benefits of our industry’s products.”

The first general session, “Where the Industry is Going,” will include a panel discussion with EPA officials on the turf insecticide “cluster” analysis for benefits and granular effects. The second session, “Where RISE is Going,” will concentrate on the association plans for the coming year.

For further details and registration information, contact RISE at 202-872-3860, or write RISE, 1155 15th St., NW, Suite 900, Washington, D.C. 20005.
Jacklin cultivates relations with Chinese turf industry

POST FALLS, Idaho — Jacklin Seed Co. has announced it will donate seed testing equipment to the Seed Testing Laboratory of Beijing Agricultural University.

The laboratory, valued at more than $7,000, includes a MI S-100 Microscopic Inspection Station, a Unitron ZSM Microscope, and a 150W halogen fiberoptic light.

The state-of-the-art equipment package was custom manufactured by Hoffman Manufacturing Company of Albany, Ore.

The donation was made in recognition of Beijing Agricultural University's position as the leading grass seed testing facility in China. Further, the equipment will assist with the development of seed testing standards and procedures which will be standardized with United States rules, thus facilitating joint seed trade between China and the U.S.

The donation was made during a recent trip to China by Jacklin Seed research and marketing officials. During the same trip, Jacklin was selected to be the first honorary international member of the China Pratacultural Association (CPA).

In selecting Jacklin, the CPA cited the firm's participation in and contribution to forwarding Association goals. The CPA — composed of more than 6,000 producers and marketing companies involved in seed production and reclamation throughout China — is dedicated to controlling China's seed quality standards.

Lisa Dacey and Rick Miller have joined the Domestic Marketing Department at Jacklin Seed Co.

Dacey comes to Jacklin from Eastern Washington University, where she served as program manager for External Professional Development programs.

ITODA names Davis executive director

The Independent Turf and Ornamental Distributors Association (ITODA) has announced the appointment of Robert H. Davis as its first executive director.

The two-year-old, non-profit incorporated association, representing independent distributors whose total annual chemical purchases exceed $45 million, required professional management to guide its growth and expanded agenda, according to ITODA President Herbert Lea of Lea Green Meadows Inc. of Temple Hills, Md.

Davis comes to ITODA with more than 17 years of association management experience and will provide ITODA with a base of operations just outside Washington, D.C. For more information on the ITODA, call 703-360-2554.

Turf Merchants sold to Warren's Nurseries

The Genesis Group has reached an agreement in principle to sell its wholly owned subsidiary, Turf Merchants, Inc., to Warren's Turf Nurseries of Crystal Lake, Ill.

From the company's headquarters in Tangent, Ore., TMI General Manager Steve Tubbs explained that "customers and growers should expect business as usual" in their dealings with TMI. Management, sales and operations personnel are all expected to stay on, he added.

From Warren's corporate offices in Crystal Lake, Mike Holmes, general manager of Warren's, offered some background on the acquisition:

"We have been involved in discussions with the Genesis Group for several weeks now, and are pleased that these discussions have resulted in the signing of a formal purchase agreement (which took effect at the close of business on July 10)." Warren's has been involved to a small extent in the turf seed business for nearly 30 years, going back to Ben Warren's introduction of several elite bluegrass varieties like A-34 BenSun. We became more directly involved in 1990 via the acquisition of Davenport Seed Corp., a producer of both turf and reclamation seed.

"Given TMI's broad product list of proprietary turfgrass seed and their extensive North American distribution network, it seems like a good fit to bring us into a fully integrated, full product and service line position in the turfgrass industry."

For every bag of 18-5-18 you buy, we'll donate 50¢ to research on groundwater quality.

That's why we're donating 50¢ on every bag of Country Club® 18-5-18 to the GCSAA Scholarship & Research Fund, for research on groundwater quality.

Of course, there are other reasons to buy 18-5-18. Including its balanced, one-to-one nitrogen/potassium ratio. And homogeneous granules for
Sharek retires from Melex; promotions ensue

Executive Vice President C. W. Sharek, one of the original incorporators of Melex USA, Inc., retired, effective May 31.

Sharek has been responsible for directing the overall operations of the Golf Car Division since the company's inception in 1973. He will continue to serve as corporate adviser to the company. Sharek was a principal involved in the original design production and introduction of the Melex golf car.

President Marek Tralik also announced the following promotions and appointments:

- C.W. Sharek Jr. has been promoted to executive vice president and in addition to other responsibilities will direct the overall operations of the Golf Car Division.
- J.R. "Jim" Moran has been promoted to vice president-field sales, Golf Car Division.
- J. Bryan Taylor has been promoted to vice president-marketing, Golf Car Division.
- Shirley E. Wilson has been promoted to corporate controller.
- C.K. "Charlie" Emery has been appointed regional manager.

Ransomes' corporate identity

Continued from page 1

have sorted out its growing pains. "It's a fine line we must walk," said Irv Aal, president of Ransomes America. "We obviously have a tremendous amount of brand equity in terms of Cushman, Brower, Steiner and Ryan. I think, at the moment, it may be confusing. In fact, I can understand the confusion in the marketplace.

"But we're trying to come up with a strategy that will get our name out while preserving our brand equity. It's an ongoing thing. But we're in the final stage of deciding just how to present ourselves to the public.

"Our goal is to have a corporate brand identity by the 1993 GCSSA Show in Anaheim."

The internal portion of this strategy happened in June, when Ransomes restructured into four primary business units: turf, professional lawn care, consumer, and industrial/commercial.

When all is said and done, Aal explained, superintendents will deal with one distributor — in the Turf Division — for all Ransomes products, be they Cushman (Ryan), Steiner or Brower.

Internally, the reorganization is a fait accompli. Ransomes America — part of the Ransomes Group established by Ransomes plc of Ipswich, England — started by moving its headquarters to Minneapolis earlier this year. In addition to Aal, who joined the corporation in 1991, top management includes Doug McCormick, vice president of sales and marketing; Ed Nachtsheim, vice president of finance; Mike Bruggeman, vice president of human resources and public affairs; and Mary Jaques, director of engineering and technology.

Prior to joining Ransomes, Aal co-founded the Phoenix International Corp., a specialized electronics company based in Fargo, N.D. Previously, he was involved in the farm equipment industry, serving in executive positions with Sperry New Holland, International Harvester and Steiger Tractor Inc.

"I felt it was important that we reassess where Ransomes was going. To that end, we reorganized internally before we reorganized externally," Aal continued. "I suppose it's an overused term, but we would like to think Ransomes is a product-driven company."

For superintendents caught off guard by the corporate transition, product questions remain: "Is my Ransomes dealer currently selling Cushman?" "Does my Cushman dealer now sell Steiner and Brower, or just Ryan and Cushman?" These are some of the queries that prompted the shake-up at Ransomes, and Aal answered them this way:

"We're aware of these problems. We really had three strong organizations selling through three separate distribution channels. And they overlapped."

"If I'm a superintendent, I should be able to go to one source for all of those products. That's our goal. It's happening even as we speak, but we still have a long way to go."

"It may sound trivial compared to the corporate overhaul currently underway, but the 'paint question' also remains unresolved. Ultimately, we're going to have one family color," Aal explained.

Will it be the green and red of Ransomes, Cushman green or perhaps a combination of the two? Stay tuned.

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Industry takes an interest in composting

Continued from page 43

because they occupy both ends of the composting spectrum. They create large amounts of grass clippings and brush — and when it comes to composted mulch and fertilizer, golf courses are potential users too.

"Every superintendent with a little bit of land should be composting on the golf course," according to Dr. Doug Hawes, a Dallas-based turf consultant. "Many golf courses don't have the available land, so industry can compost and sell it back to the courses. There's certainly a market there."

Hawes — formerly a consulting agronomist to the USGA Green Section, Mid-Continent Region — believes composting is more than responsible waste reduction. In addition to indicating its disease-suppression capabilities, studies have shown compost to be helpful in snow mold reduction.

"Down the road, it may be an alternative to mercury," said Hawes.

According to 1990 figures supplied by the Professional Lawn Care Association of America (PLCAA), lawn and yard waste constitutes 20 percent of all solid waste; and grass clippings constitute a full 50 percent of the lawn and yard waste. Twelve states have effectively banned the landfilling of yard trimmings; and expect that number to double before the year 2000. Enter companies like McMaster, Scott and Pennington, who drive the "waste" away and recycle it into organic mulch, peat and manure products.

"If you put your mind to it, you can put almost anything back into the soil."

— J.D. McMaster

McMaster has been in the composting business nearly 30 years. "I'm 62 years old," he said. "And being born in 1930, you don't throw nothin' away. If you put your mind to it, you can put almost anything back into the soil."

The rice hull — the husk of a rice grain — was considered useless by the commercial rice industry before McMaster came along. Now his rice hull product routinely replaces peat in the soil mixing process.

According to Brooks Pennington, president of Pennington Seed, aggressive, industrial composting is a win-win situation. "We've been going to municipalities and saying, 'Hey, you're hauling grass clippings and leaves to your landfill. We can take that and put it to use.'"
Irrigation Assoc. plans seminars to complement November conference

The Irrigation Association's 1992 International Exposition and Technical Conference — scheduled for Nov. 1-4, in New Orleans — will feature a variety of technical sessions covering topics of relevance to those involved in agricultural, turf and landscape irrigation.

Topics covered in agricultural sessions include: "Surge Flow: The American Irrigation Success Story" by Joe Denggeler of the Texas A&M Extension Service; "Agriculture: The Dilemma of Water Conservation vs. Irrigation Management" by Shlomo Pleban of Orange Enterprises; and "Soilwick Self Regulating Sub-surface Irrigation" by Samir Ismail of the College of Agriculture, Alexandria, Egypt.

In sessions devoted to turf and landscape, topics include: "Alternatives for Conserving Landscape Water Dollars" by Robert Beccard of Aqua Engineering; "The Use of Emitter Lines in Landscape Irrigation" by Tom Bressan of The Urban Farmer Store; and "Gray Water -- A Secure Future for Golf Courses in the United States" by Banner!

The conference will also host three business seminars designed to be beneficial to everyone. They include: "Stress Management" by Dr. Chrisman Wilson of the Psychology Department at Tulane University; "Building a Winning Team" by independent consultant Jim Whitt; and "Motivation" by Dr. John Keller.

For more information about the programs and registration, contact Martha Lindauer at 703-524-9544, or fax your correspondence to her at 703-524-9544.

***

The Irrigation Association is also hosting a series of educational programs in conjunction — but preceding — the Association's 1992 Technical Conference in New Orleans.

On Friday and Saturday, Oct. 30 and 31, the IA will hold a two-day School of Irrigation which will cover the basics of water movement, infiltration and evapotranspiration rates for system design.

The registration fee for IA members is $150. The fee for non-members is $175.

The IA will also offer a one-day Micro-Spray Design Workshop on Saturday, Oct. 31. The course is being taught by Dr. Charles Burt of Cal Poly State University, San Luis Obispo.

The registration is $150 for IA members and $200 for non-members.

Finally, the IA will offer a full-day Water Auditor Training course on Oct. 30. The session covers the basics of landscape irrigation water auditing. The course, which addresses evaluating the performance of irrigation systems, will cost IA members $130 and non-members $200.

All the above courses can be used to help irrigation professionals participating in the Association's School of Irrigation.

For more information or to register for a course, contact Denise Stone at 703-524-1200.

EPA gives the 'OK' on ConSyst

Continued from page 43

turfgrasses and many ornamentals. Designed to be both curative and preventive for a broad spectrum of disease, ConSyst is also fungistic to pythium species.

However, the product was useless until June, when the EPA freed it from 54 months of bureaucratic bondage. Yet it was another branch of the federal monolith that pushed the waiting game into another overtime period.

"We had several (EPA) project managers overseeing ConSyst — they kept switching project managers," King explained. "In fact, last year the particular project manager was called away by Desert Storm and that set us back."

"What can you do about that?"

GREENSBORO, N.C. — The EPA has also approved a new formulation — turf — of Ciba-Geigy's systemic fungicide, Subdue. The new incarnation is called Subdue+ WSP.

Said Owen Towne, Ciba-Geigy project manager: "The new formulation offers an alternative that features less potential applicator exposure and easier container disposal. We listened to turf managers' concerns, and we think Subdue+ WSP's package helps the industry address those concerns head-on."
Controlling snow mold

Grace-Sierra Horticultural Products Company has introduced Penstar PCNB turf fungicide for long-lasting control of snow mold, brown patch and other key turf diseases. New Penstar 75WP and 10G turf fungicides have the same label and use rates as other PCNB products.

Penstar 75WP is a preventive, wettable powder soil fungicide. It's available in granular form. Both products are not yet available in California. For more information, call 1-800-492-8255.

Reduced spray drift

The Wind Cone, new from Environmental Technologies, is designed to control spray drift and can be retrofit to any sprayer to reduce off-target drift by up to 300 percent. Made from durable polyethylene plastic for years of trouble-free service, it's designed to let you spray when you want to — not just when the wind lets you. For more information, call 1-306-343-7811.

Hidden water works

The Skid-N-Pump from Greenscape Pump Services, Inc. is designed to provide an unobtrusive, cost-effective package for water transfer, fountains, waterfalls and irrigation applications. Skid-N-Pump can be designed with either a submersible turbine or submersible trash-style pump and comes with a U.L. Listed Control Panel.

The skid is also designed to keep the pump intake approximately one foot off the bottom of the water source, and the flexible SBR hose allows for easy maintenance access or relocation.

The Skid-N-Pump is designed to eliminate the need for wet well structures and concrete pump slabs. For more information, call 1-214-395-0346.

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Matthew Shaffer
Director of Golf Operations
Hershey Country Club
Hershey, PA
Determining soil moisture

Automata, Inc. of Grass Valley, Calif., has introduced its new Aqua-Tel soil moisture sensor capable of a distributed measurement averaged over 30 inches (Model Aqua-Tel 1), thus replacing several one-point sensors needed for averaging soil moisture.

The distributed measurement allowed by Aqua-Tel, as opposed to one-point measurements, is designed to improve the chance of getting a reading representative of the growing area.

For more information, contact Automata at 916-273-0380.

CIRCLE# 208

Power screens

GLENDORA, Calif.—Power Screens, a new graphics interface package for use with Maxi System V computer controllers, has been introduced by the Golf Division of Rain Bird Sales, Inc.

The new program offers direct access to key screens, increased visibility of databases via windows and a full selection of interactive time- and labor-saving features.

The simultaneous multi-station satellite control is designed to increase watering flexibility while reducing system operating time. A mouse is also available.

For more information, call 1-818-963-9311.

CIRCLE# 209

Toro on the road

The Workman currently stars in a five-month, cross-country tour designed to showcase Toro’s new multi-purpose vehicle.

The Toro Roadeo, which kicked off in mid-July, features onsite video orientations, vehicle/accessory demonstrations, test drives, and question-and-answer sessions.

The Workman features an extra large, full-size bed or split cargo system designed to haul 27 percent more bulk and 25 percent more weight than what users were previously used to.

As with all Toro products, the new line of vehicles will be backed by the firm’s 48-Hour Delivery Program, in which any part not immediately available from Toro distributors can be delivered within 48 hours anywhere in the contiguous United States.

For more information on the Workman, the Roadeo or other Toro products, call 612-887-8350.

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CIRCLE# 149

Ditch n' Stitch

The lightweight, self-contained TC-4 Stitcher, new from Vermeer Manufacturing Inc., restores narrow trenches and reduces "settling" problems. It combines the proven compaction aid of vibratory force with a rugged static compacting wheel for more positive restoration results.

The all-hydraulic Stitcher applies compaction at any level down to 26 inches. Call 1-515-628-3141 for more information.

CIRCLES 207

Easy clean-up

COMPTON, Calif.—Kubota Tractor Corporation recently unveiled its new F1098, an economy soft-sided enclosure for F Series front mowers with two-post ROPS.

With replaceable reinforced vinyl sides with Velcro edging standard, the F1098 can be easily removed for warm weather use. The F1098 is also equipped with tapered, full-length windshield safety glass and single-speed electric wiper.

For more information, call 1-213-444-7000.

CIRCLE# 206
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Doak designs
second career
as book author

Praise is coming from many corners for
golf course architect Tom Doak’s new book,

“Tom Doak is a practicing golf architect and a dedicated student of golf design,”
said noted course designer Tom Fazio. “He is also quite good at explaining many
of the technical aspects of golf architecture in easily understood terms.

“This book will appeal to many golfers who find golf architecture a fascinating
subject and want to learn more about it.”

Doak is known to many as architecture editor for
GOLF Magazine. Said editor-in-chief George Peppe: “On one level, this is a lucid book inside
the mind of a golf architect. On a second, more important level, it’s an instruction book —
tells you how to read a course.”

A Traverse City, Mich.-based designer, Doak is considered one of the brightest
young stars on the architectural horizon. Among his best-known works is Black For-
est at Wilderness Valley in Gaylord, Mich.,
listed as one of the Top 10 New Courses
You Can Play in GOLF Magazine.

He has also done High Pointe Golf Club in
Williamsburg, Mich., and The Heathland
Course at The Legends in Myrtle Beach,
S.C. He is working on facilities in Char-
lotte, N.C., and Elverson, Pa., 45 minutes
west of Philadelphia.

Shortly after graduating from Cornell
University, Doak worked for architect Pete
Dye, getting involved in such projects as
PGA West. “Of all the things I learned from
Pete,” Doak wrote, “the most important
was how much was involved in getting
a great golf course from the dream to the
ground. That is one lesson I hope will come
across clearly in this book.”

It does.

Doak delves deeply into the areas of
routing, esthetics, design psychology,
greens, tees, fairways, hazards, practice
courses, restorations and renovations.

Superintendents and developers might
find the chapter “Maintenance — The
Architect’s Perspective” particularly interes-
ting.

“The golf architect has a vested interest
in maintenance because, as conditions
change, so does a golfer’s perception of
the design,” Doak wrote.

“The architect must be careful not to
design features which are impossible to
maintain, or are so costly that they under-
mine the economics of the project.”

The 256-page book contains 56 illustra-
tions and a foreword by Ben Crenshaw.
The cost is $22.95. Anatomy of a Golf Course
is available from Lyford & Burford Publish-
ers, 31 West 21 Street, New York, N.Y.
10010; telephone 212-620-9580.

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### Calendar

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**December**

1 — GCSAA spray technician training program in Grover, Mo.*
2-3 — Pacific Coast Turf & Landscape Conference & Trade Show in Seattle. Contact Scott White at 800-275-1918.
2-4 — Rocky Mountain Regional Turfgrass Association Annual Conference and Show in Denver. Contact 303-388-3440.
5 — GCSAA spray technician training program in Las Vegas, Nev.
10 — GCSAA spray technician training program in Scottsdale, Ariz.*
15 — GCSAA spray technician training program in Castle Rock, Colo.*

**January**

10 — GCSAA spray technician training program in Little Rock, Ark.*
11-15 — Cornell Cooperative Extension Turfgrass Short Course at Cornell University, Ithaca, N.Y. Contact Joann Gruttadaurio at 607-255-1792.
12 — GCSAA spray technician training program in Galena, Ohio.*
4-16 — Mid-America Horticultural Trade Show in Chicago. Contact Donn Sanford at 708-526-2010.

**February**

8 — GCSAA spray technician training program in Dallas.*
10 — GCSAA spray technician training program in San Antonio, Texas.*
16 — GCSAA spray technician training program in San Marcos, Calif.*
23 — GCSAA spray technician training program in Atlanta.*
25 — GCSAA spray technician training program in Franklin, Tenn.*

**March**

2 — GCSAA spray technician training program in Oceans Mills, Md.*
4 — GCSAA spray technician training program in Aurora, Ill.
10 — GCSAA spray technician training program in Helena, Mont.*

* For more information or to register, contact the Golf Course Superintendents Association of America education office at 800-472-8787 or 913-841-2240.

August 1992, 53
Hammering away at a maintenance nightmare

Burning Tree CC staff solves drainage problem

By STEVEN RENZETTI

The ultimate in deep-tine aeration? That's what a seasoned and sympathetic maintenance worker might have thought we were up to last fall as a jackhammer rammed up and down through the surface of the 15th green at Burning Tree Country Club in Greenwich, Conn.

Either that, or maybe we'd just spent too much time around the 19th hole.

But as crazy as we may have appeared, we'd spent considerable time. The Burning Tree CC staff had isolated the problem. Workers at Burning Tree CC installed PVC pipes to solve a drainage problem on the 15th green. The first had to drill through the putting surface and underlying ledge with a jackhammer. Superintendent Steve Renzetti reports the 15th is now one of the top greens on the Greenwich, Conn., layout.

Rather than surfacing in one spot, the iron-laden liquid created a large, soggy patch measuring almost 30 square feet. This created an inconsistent green, where it was near impossible to maintain quality grass.

Hammering away at a maintenance nightmare

The green was built over a natural spring. In addition to occasionally large amounts of water, it also released extremely high concentrations of iron. Discolored turf appeared from time to time.

Lady Luck looked to be on our side when our first test hole hit what appeared to be the main source of water.

The simple solution — run drainage tile down the middle of the green, trap the water below the surface and run it out the back before it had the chance to reach the top.

We brought in plywood sheets, sod cutters, shovels, edges, utility vehicles and our most experienced crew. An hour into the project, the foreman called on the radio.

"Boss, we hit some rock," he said.

"Well, take it out," I answered.

"No. You don't understand," he came back. "We hit ROCK."

He was right. Ten inches down were huge boulders, some the size of office desks. So much for the simple solution.

Having committed ourselves to the investigation-before-rebuilding route, we headed to the rental store. There we picked up a 75-cubic feet per minute compressor and jackhammer with carbide tip bits.

Knowing the granite-like rock would not chip easily, the three-man crew settled into what they knew would be a lengthy job. They turned tacks hammering the stone. Two days and many tired muscles later, they broke through.

A slow trickle of water passed through the trench they created down the green's center. We laid 4-inch perforated PVC drainage pipe back-filled with pea gravel. That was covered with filter fabric overlaid with 10 inches of top mix.

Even though the rest of the green was formed from native soil, we went with a 80-15-5 topdress mix over the reconstructed area to maximize water percolation into the drain tile.

Soil aeration over the terraced area helped further break down any possible layering in the resodded area.

Six weeks later, I dared anyone to spot the drain tile. Today, the 15th green is one of the better and more consistent greens on the course.

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The Haiad method is the easiest way to quench your turf's thirst and ensure deep root growth.

A fully-developed root system is your turf's best defense against disease. Having committed ourselves to the investigation-before-rebuilding route, we headed to the rental store. There we picked up a 75-cubic feet per minute compressor and jackhammer with carbide tip bits.

Knowing the granite-like rock would not chip easily, the three-man crew settled into what they knew would be a lengthy job. They turned tacks hammering the stone. Two days and many tired muscles later, they broke through.

A slow trickle of water passed through the trench they created down the green's center. We laid 4-inch perforated PVC drainage pipe back-filled with pea gravel. That was covered with filter fabric overlaid with 10 inches of top mix.

Even though the rest of the green was formed from native soil, we went with a 80-15-5 topdress mix over the reconstructed area to maximize water percolation into the drain tile.

Soil aeration over the terraced area helped further break down any possible layering in the resodded area.

Six weeks later, I dared anyone to spot the drain tile. Today, the 15th green is one of the better and more consistent greens on the course.

Whether you use an injector system, pellet or granules, Haiad covers more turf than any other wetting agent on the market. Haiad is so economical, you can apply it during the entire irrigation season.

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...water gets to the root of the problem.

The simple solution — run drainage tile down the middle of the green, trap the water below the surface and run it out the back before it had the chance to reach the top.

We brought in plywood sheets, sod cutters, shovels, edges, utility vehicles and our most experienced crew. An hour into the project, the foreman called on the radio.

"Boss, we hit some rock," he said.

"Well, take it out," I answered.

"No. You don't understand," he came back. "We hit ROCK."

He was right. Ten inches down were huge boulders, some the size of office desks. So much for the simple solution.

Having committed ourselves to the investigation-before-rebuilding route, we headed to the rental store. There we picked up a 75-cubic feet per minute compressor and jackhammer with carbide tip bits.

Knowing the granite-like rock would not chip easily, the three-man crew settled into what they knew would be a lengthy job. They turned tacks hammering the stone. Two days and many tired muscles later, they broke through.

A slow trickle of water passed through the trench they created down the green's center. We laid 4-inch perforated PVC drainage pipe back-filled with pea gravel. That was covered with filter fabric overlaid with 10 inches of top mix.

Even though the rest of the green was formed from native soil, we went with a 80-15-5 topdress mix over the reconstructed area to maximize water percolation into the drain tile.

Soil aeration over the terraced area helped further break down any possible layering in the resodded area.

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**Most convenient controls in the industry.** Unlike competitive units, the self-propelled T1224 puts all controls at the operator’s fingertips for easier operation and increased productivity.

**Lower overall maintenance costs.** Our virtually unpluggable tines last up to three times longer than competitive tines. So you get more consistent hole depth throughout your course, while spending less time and money changing tines. What’s more, the Aero Kings’ simple, durable designs are easier and more economical to maintain than gear-driven units. They also cover more ground in an hour than competitors, giving you the best overall aeration value.

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