on Ohio golf courses.

The project is funded by the federal government through the Pesticide Impact Assessment Program. Questionnaires were sent in early August to all golf courses in Ohio, asking pertinent questions to determine the type and quantity of pesticides used. Budgetary information was also requested, in order to determine how financial restrictions influence pesticide use.

Dr. Martin told GOLF BUSINESS in mid-September that the researchers had received almost 100 completed questionnaires at that point, and that final tabulations would probably be done sometime this month.

The tabulated information will be summarized and submitted to the federal Environmental Protection Agency to express the importance or need of various pesticides being scrutinized through the Rebuttable Presumption Against Registration process.

EPA's RPAR program is supposed to weigh the benefits of using currently registered pesticides against possible environmental damage that may occur through their application, but EPA emphasis is usually on the latter. According to Martin, pesticides used in Ohio and now being investigated include Tersan 1991, Tersan LSR, Fore, Sevin, and Nemagon. If use of these products is important to you, it is vital to let EPA know, through this survey and the Pesticide Impact Assessment Program.

When the EPA has finished reviewing the pesticides, one of several things may happen to them:
1. The pesticide would be returned to registration.
2. It would be registered, but have some restricted uses.
3. It would be severely restricted in its uses.
4. It would be taken off the market and all its uses cancelled.

Golf courses surveyed on pesticide use

Drs. Philip O. Larsen, David P. Martin, and Richard L. Miller from the departments of plant pathology, agronomy, and entomology (respectively) at the Ohio Agricultural Research and Development Center have initiated a program to assess pesticide use on Ohio golf courses.

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habit; finer leaves; and a broad genetic base for greater disease resistance under varied climatic conditions. Dr. Duich said the new variety will grow "a little less vigorously" than Penngrass, but will still be competitive with Poa annua. Courses which have planted Penneagle report it has excellent putting and playing qualities.

Development of the new bentgrass began in 1958 with 156 vegetatively propagated bent, according to Dr. Duich. From that broad base, 21 plants were selected for turf performance. These were selected in combinations of threes and through turf screening and other testing, were narrowed down to four parents. Dr. Duich reports that more than a ton of seed was involved in the testing program. Penneagle has been tested in Canada and in a seven-state area with broad climatic conditions.

GOLF CARS

E-Z-Go predicts "banner year" in '79

Distributors of E-Z-Go golf cars placed record-breaking orders for the new 1979 models introduced at the company's annual three-day sales convention held in August in Minneapolis, headquarters city for the division of Textron Inc.

Some 55 distributors from 36 states and U.S. territories viewed three- and four-wheeled gas and electric golf cars with a completely redesigned front end. Said E-Z-Go President David F. (Fritz) Myers, "The most visible benefit to our customers is an improved, more comfortable ride and long-term reliability."

He added, "The streamlined suspension that led to the weight loss also paves the way for easier servicing and maintenance, in addition to extending battery life and improving efficiency in the electric models." The 1979 gasoline-powered golf cars weigh 50 to 77 pounds less than their 1978 counterparts, the three-wheel electric model shows a 55-pound weight difference, and the four-wheel electric shed a whopping 100 pounds.

With the introduction of the 1979 line, the golf car firm celebrates its 25th year in the industry.

EDUCATION

Daily fee workshop scheduled by NGF

The National Golf Foundation has scheduled its fourth annual daily fee workshop for November 20-22, 1978, at the Marriott Inn in Orlando, Fla. All owners, operators, and employees of daily fee golf courses are invited to attend.

According to P.J. Boatwright III, assistant director of information services for the NGF, "The seminar's format allows participants to ask all their questions and discuss all their problems. They learn how to make their golf courses more profitable and more enjoyable for customers through question-and-answers sessions, panel discussions, the success stories of other operators, guest lectures, and the like."

Programs scheduled include:

- "Profit Motive Course Operations,"

In addition, Arnold Palmer has accepted an invitation from NGF Executive Director Don Rossi to attend a dinner in Palmer's honor on the night of Tuesday, November 21.

Cost is $125 for members of the NGF or the National Association of Public Golf Courses; $185 for nonmembers (but includes 1979 NGF associate membership); and $75 for additional persons from same facility. Register by November 1.

Contact: National Golf Foundation, 200 Castlewood Dr., North Palm Beach, FL 33408 (phone 305/844-2500).

RESEARCH

Automatic sprayer eliminates pouring

United States Department of Agriculture researchers are developing an experimental sprayer designed to avoid most handling risks for spray equipment operators.

The work is being done by Donald L. Reichard at the Ohio Agricultural Research and Development Center, Wooster.

"On our sprayer all liquid flows are controlled from the control panel by the operator," he said.

"Metering pumps draw the chemicals from their containers and mix them with water in a small mixing chamber on the way to the spray nozzles."

This system eliminated the dangerous pesticide-pouring operation as well as the disposal of left-over tank mixtures, he said. Also, the operator can flush the containers from the control panel.

TURF

Wastewater irrigation symposium planned

Leaders in industry, government, universities and the business of golf will participate in a two-day symposium on wastewater irrigation of recreational turf Nov. 12-14 at the Arlington Park Hilton, Arlington Heights, Ill.

National authorities on the subject who are scheduled to speak include:

- Dr. Ian Pepper, University of Arizona; Dr. Dennis Keeney, University of Wisconsin; Dr. Vic Younger, University of California; Dr. A.E. Dudek, University of Florida; Stephen Poloncisk, federal Environmental Protection Agency, based in Chicago; and Dr. Boyd G. Ellis, authority on chemical properties of soil and water.

Also, Dr. James Watson and James Adams of Toro Co.; John Brewer of Johns-Manville Co.; Phil Wogan, Richard Nugent, Marvin H. Ferguson and David Gill of the American Society of Golf Course Architects; and Charles Wilson of the Milwaukee Sewerage Commission.

The conference is a joint effort of the USGA Green Section, the American Society of Golf Course Architects and the National Golf Foundation.

The event is open to the public. For further information, contact any of the following: Al Radko, national director, USGA Green Section, P.O. Box 1237, Highland Park, NJ 08904, 201/572-0456; E. Larry Packard, ASGCA, 11 S. LaGrange Rd., LaGrange, IL 60525, 312/352-2113; Don A. Rossi, executive director, National Golf Foundation, 200 Castlewood Dr., N. Palm Beach, FL 33408, 305/844-2500.

MANUFACTURERS

Toro on NYSE; plans $10 million expansion

Trading of Toro Co. stock began last month on the New York Stock Exchange big board with the company symbol TTC.

The Minneapolis-based company also announced plans for a new manufacturing facility in Fairmont, Minn., a second manufacturing plant in Riverside, Calif., and plant expansion in Hudson, Wis.

David T. McLaughlin, Toro's chairman and chief executive officer, said the three projects are part of a $10 million capital spending program planned for fiscal year 1979, which began August 1. This is the largest capital budget in company history.

McLaughlin also reports that estimated sales for the fiscal year ended July 31 would be between $225 and $227 million, an increase of more than 40 percent over last year's sales. He said the expected earnings for the year would be almost double earnings of $2.08 per share for fiscal year 1977.

TOURNAMENTS

San Diego LPGA event cancelled by floods

The Ladies Professional Golf Association event scheduled this month in San Diego has been cancelled due to flood damage to the Whispering Palms Country Club, Rancho Santa Fe, Calif.

Course superintendent Larry Jones told GOLF BUSINESS at the end of September that 18 holes had been closed for about a month and 9 holes for about 2 months because of flood damage. Play on the courses is now "as close to normal as you could expect," Jones said, but just how to repair the more extensive erosion-damaged portions has yet to be decided. He indicated, however, that further damage is possible yet this year due to the erosion.

Initial repair work consisted mainly of cleaning up 1 1/2 feet of sand deposited over four or five holes. "We made mounds of the sand," Jones reported, "then seeded it in with bermuda grass and some ryegrass for quick germination."

Tournament officials have said there is a very good likelihood the tournament will be rescheduled next year.