

Composting: Heating up maintenance operations

By ROBERT STEUTEVILLE

Composting operations and/or use of recycled organic materials on the links is becoming par for the course nationwide. Composting offers the potential to save on disposal and purchasing of soil conditioners.

One example is the Pebble Beach Co. The major landowner on California's Monterey Peninsula manages hotels, wildlife areas, resort and residential property in addition to four golf courses. Until about a year ago, 2,500 tons/year of green waste from these facilities were going to a landfill.

Now, "almost everything that you can think of that is green is going to the compost operation," said Eric Love, director of forestry and ecology for the Pebble Beach Co.

Equipment and operational space are the primary challenges to getting a composting program started.

At Pebble Beach, composting takes place in a section of a company-owned quarry. The land was already disturbed, so minimal site preparation was necessary, Love said. The company purchased a new tractor with a grapple bucket and preshredder, a windrow turner and shredder/processor. The total cost was under \$200,000.

"We know we are saving thousands of dollars a month in disposal fees and labor to get the material to the dump," said Love. "The equipment will pay for itself, but we don't know how long it will take."

Organic material savings is another selling point.

"We figure it's costing us \$7 a yard for the compost. Before we were purchasing material for \$30 a yard," Love said. The compost is fairly similar in texture and pH to the formerly purchased material and is "just as good" for his purposes, he added.

The process starts with shredded brush placed in six-foot-wide windrows. Grass is incorporated into the piles with the turner to achieve better moisture and nitrogen levels. On a few occasions, during rainy periods, an inoculant was added to activate the piles. The first windrows took about six months to produce finished product, but the company since has refined its composting process.

"If we keep the temperatures high for six to eight weeks, we think we will be able to move the material and use it after three months," Love said.

Most of the material is used for

environmental restoration, particularly in new plantings of native plants. Although Pebble Beach has yet to utilize its compost in day-to-day golf course landscaping operations, some courses are starting to do just that, according to Eric Nelson, an associate professor of plant pathology at Cornell University in Ithaca, N.Y.

At nearby County Club of Rochester, compost has been successful in controlling fungal

disease. In three years of applications, fungicide use was reduced 97 percent, Nelson said.

Some composts have disease-suppressive qualities as a result of the microbial activity in the compost itself. Other composts appear to stimulate microbial activity in soil, and thus suppress fungal growth. The only exception is pure yard trimmings compost, which has no suppressive effect at all. However, yard trimmings

composts can become suppressive with the help of inoculant, Nelson said.

There are an estimated 14,000 golf courses in the United States. Many may be composting, but it is still a small percentage of the total, according to Roch Gaussoin, turfgrass extension specialist with the University of Nebraska.

Golf courses theoretically can utilize much more organic matter than they can produce in

a compost operation, according to Rod Tyler, director of product and market development with Kurtz Bros. in Independence, Ohio. The average course includes 25 acres of fairway. A half-inch application of compost topdressing would use 1,685 cubic yards of material. That calculation does not include greens or roughs. Tyler estimates that most golf courses could only produce several

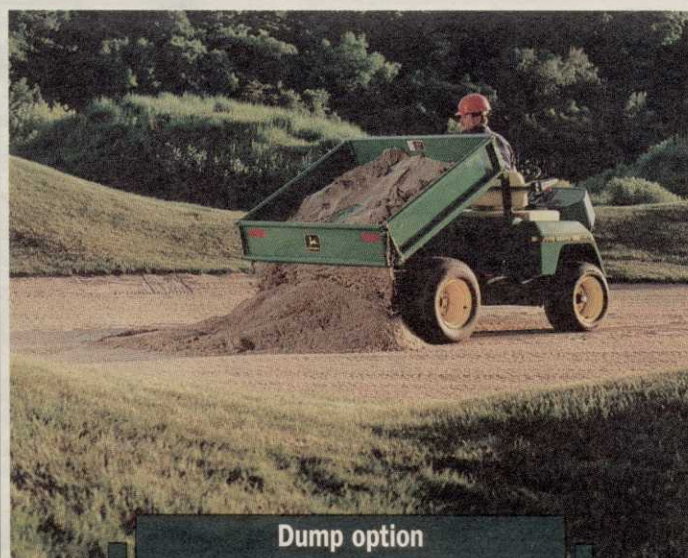
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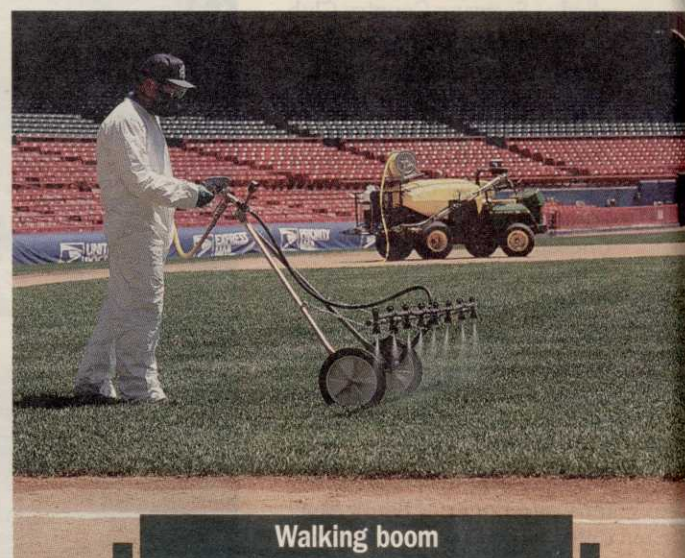
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Va. Tech, Cook offer short courses

BLACKSBURG, Va. — Virginia Tech is offering a five-day program in turfgrass ecology and management starting Jan. 30, designed to provide an overview of the fundamentals of turfgrass management.

The Turfgrass Ecology and Management Short Course is designed for both new professional turfgrass managers as well as experienced managers. Thirteen faculty from different disciplines will offer 36 hours of

lectures and lab instruction.

The fee for the course is \$365, which includes the book "Turfgrass Management" by A.J. Turgeon, a notebook, a certificate, group photograph, banquet, reception and refreshments. The registration deadline is Jan. 16.

For more information about registration contact the Conference Registrar's office at 703-231-5183. For course information, contact Dr. Dave Chalmers at 703-231-5797.



COOK COLLEGE OFFERS COURSES

NEW BRUNSWICK, N.J. — The Cook College Office of Continuing Professional Education at Rutgers University is offering two short courses designed for environmental, landscape and engineering professionals.

The first, scheduled for Jan. 13 and 14, 1995, is "Lake Management" and will cover lake

ecology and lake rehabilitation measures. The course fee is \$145 and includes two meals and course materials.

The second, Jan. 31 and Feb. 1, is "Stabilization and Restoration of Disturbed Sites" and will explore ways to control erosion by establishing vegetative cover. The fee is \$195 and includes two meals and course materials.

For more information or to register contact Cook College of Continuing Professional Education at 908-932-9271, or write to P.O. Box 231, New Brunswick, N.J. 08903-0231.

Turf book out

OAKLAND PARK, Fla. — A new book to help superintendents determine how healthy their greens are and how much they're worth is now available from Turfgrass Products Publications (TPP). "Diagnostic Turfgrass Management ... For Golf Greens," by Tom Masacaro, explains how to evaluate the health and value of the greens through soil samples, analysis and data records. It also outlines a management program built around daily, weekly, monthly and annual monitoring tasks. The book has 100 color photographs and a 500-page workbook with charts and instructions.

The book is available from TPP, 4740 NE 12th Avenue, Oakland Park, Fla. 33334 or by calling 1-800-258-7477.



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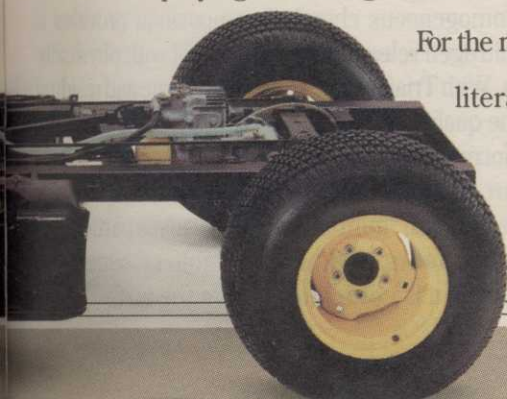
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Composting

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hundred yards of compost annually.

Kurtz has served as a consultant to help two Cleveland area courses—The Country Club and Kirtland Country Club—start low-tech windrow operations. The next project will involve Jack Nicklaus' Muirfield Country Club in Columbus, Ohio.

Composting has penetrated more into the high maintenance, expensive country clubs than the public courses, according to Steve Probasco, a sports turf marketing representative with Kurtz Bros. However, similar benefits are possible with municipally owned courses.

The City of Erie, Pa., owns and operates three municipal golf courses. The city is in its third year of operating a municipal yard trimmings composting program. About 50 percent of the compost is used on the courses, while the rest assists in landscaping along roads and in parks, according to Bruce Dougherty, chief of parks and recreation.

The Club at Nevillewood in Collier Township, Pa. has joined in a partnership with the township and nearby Scott Township to handle yard trimmings. A site was selected on an undeveloped lot in Nevillewood. Collier Township maintains the compost piles, and the costs are split among the three contributors according to how much material will be processed. Nevillewood superintendent Ken Flisek plans to use the material for flower beds initially and hopes that enough material will be generated eventually that he will be able to use some for topdressing on fairways.