

WT&T
PROFILE

THE ATHLETIC FIELD MANAGEMENT MARKET



Photo courtesy of J & L Adikes, Inc.

ATHLETIC FIELD MANAGERS SAY BUDGETS ARE TOO LOW

Nearly two thirds of athletic field managers polled by Weeds Trees & Turf think their budgets for maintaining turf on athletic fields are inadequate.

Furthermore, inconsistent management structures of athletic fields and a lack of industry organization make pinpointing general characteristics difficult. Consequently, manufacturers may find it difficult to locate the person with purchasing responsibility and to better meet the needs of athletic field managers.

Pinpointing the person responsible is also a problem for trade journals trying to serve athletic field managers. This was a factor in the survey which received only a nine percent return out of 1,000 individuals polled. The 90 persons responding had 35 different titles.

According to the "Statistical Abstract of the United States", published in 1977, there are 2,700 commercial sports establishments, roughly 110,000 educational facilities with fields, and at least 19,000 municipal and county parks with fields. There should be at least 131,700 managers of athletic fields in the U.S. Using the median annual field management budget of \$10,000, the market has a conceivable value of \$1.3 billion annually!

More than 70 percent of the respondents manage park (42 percent) or university (31 percent) fields. Fifteen percent manage high school fields, 11 percent municipal stadiums, eight percent middle and elementary schools, and only two percent private stadiums.

The respondents manage from 12 to 3,750 acres, with a median figure of 173 acres. Athletic fields are one part of the total acreage managed.

The managers have an average annual budget, not including labor, of \$14,081. Figures ranged from \$275 to \$90,000. Sixty-three percent said their budgets were too small to maintain fields at a desired level. Thirty-seven percent said their budgets were adequate. Those responding negatively said they needed an average budget increase of 54 per-

Months Supplies Are Purchased.

Month	% Buying Chemicals	% Buying Equipment
January	7	8
February	12	9
March	21	16
April	18	14
May	9	9
June	5	8
July	4	8
August	7	8
September	7	5
October	5	6
November	3	4
December	3	5

Where Purchases Are Made

Item	Percent	Local Dealer	Manufacturer	Nursery
fertilizer	92%	71%	27%	2%
herbicide	82%	75%	25%	0%
seed	85%	76%	20%	4%
soil amendments	58%	76%	20%	4%

Equipment Owned by Respondents

Type	Percent	Mean	Leading Brands
Aerator	63%	2.0	Ryan, West Point, Jacobsen
backhoe	36%	1.1	Ford, John Deere, Case
broadcast applicator	77%	1.6	Lely, Cyclone, Scotts
line sprayers	38%	1.8	Hudson
mower	93%	4.5	Jacobsen, Toro, National
sprayer	60%	1.4	Meyers, Bean, Hudson, Broyhill
thatchers	26%	1.0	Ryan, Jacobsen
tractors	91%	2.2	Ford, John Deere, International Massey-Ferguson

cent to obtain desired results. One individual said he needed a 300 percent increase.

Most purchasing takes place from February through May (see table). Fall buying does not appear as common as in other Green industries. Three fourths of chemical and seed buying is done with local dealers. Five percent said bids are required.

Despite dominance of spring and

late winter buying, applications of fertilizer, herbicides, amendments and seed follow typical timing with spring and fall applications. Only six persons said they apply fungicides to athletic fields. Post-emergent herbicides are used to a far greater extent than pre-emergents.

The average amount of granular fertilizer purchased is about six tons per year. Liquid fertilizer is used in

Satoh Distributors:

Alabama

Darrell Harp Enterprises, Inc.
P.O. Drawer B, Red Bay, AL 35582
(205) 356-4462

California

Allied Farm Equipment, Inc.
Drawer P1111 North Union St., Stockton, CA 95201
(209) 466-0647

Colorado

CPS Distributors, Inc.
560 South Lipan Street, Denver, CO 80223
(303) 744-6371

Florida

Florida Tractor Corporation
2575 W. Fifth Street, Jacksonville, FL 32203
(904) 388-6581

Georgia

Southeast Tractor Corporation
2935 E. Ponce de Leon Ave., Decatur, GA 30031
(404) 373-5796

Iowa

P.W. Stanke Company
108 E. Jefferson St., Wheatland, IA 52777
(319) 374-2311

Minnesota

Allied Farm Equipment, Inc.
1771 Yankee Doodle Road, Eagan, MN 55121
(612) 452-1670

Missouri

Dick Proctor Imports, Inc.
5320 Lemay Ferry Road, St. Louis, MO 63129
(314) 487-2085

Montana

Midland Implement Co., Inc.
402 Daniels Street, NP Industrial Site
Billings, MT 59107
(406) 248-7771

North Carolina

E.J. Smith & Sons Co.
4250 Golf Acres Drive, Charlotte, NC 28201
(704) 394-3361

Ohio

Hayward Distributing Company
460 Neilston Street, Columbus, OH 43215
(614) 221-5323

Oregon

R.M. Wade & Company
10025 S.W. Allen Blvd., Beaverton, OR 97005
(503) 641-1865

Pennsylvania

Stull Company
701 Fourth Avenue, Coraopolis, PA 15108
(412) 262-1405

Tennessee

The Bill Voorhees Company
700 8th Avenue South, Nashville, TN 37319
(615) 242-4483

Texas

The Stewart Company
11000 North Central Expressway, Dallas, TX 75231
(214) 691-5555

Virginia

Universal Tractor-Equipment Corp.
928 N. Meadow Street, Richmond, VA 23220
(804) 353-7806

by less than five percent of the respondents. Managers purchase an average of only 525 lbs. or 80 gal. of herbicides.

Managers purchase an average of 900 lbs. of seed per year, with a median of 300 lbs. The same amount of amendments are purchased as fertilizer.

Forty percent said they resod their athletic fields with 20 percent resodding annually. The average expenditure for sod was \$1,200. Three persons cut their own sod.

The primary grass seed used is bluegrass (63 percent), with rye (58 percent) and fescue (51 percent) close behind. Twenty percent use bermuda, which corresponds with the percentage of managers in southern states responding to the survey. Five percent indicated use of synthetic turf.

The dominant types of equipment used to maintain athletic fields are tractors, mowers, sprayers, and broadcast applicators (see list).

Sixty-three percent also have aerators.

Quick coupling systems were the most common type (64 percent) of irrigation system used by respondents. Automatic systems are used by 36 percent. Seventeen percent indicated they had no irrigation system, although three persons said they used portable tanks for watering fields. Five percent use effluent water for irrigation.

The average size of staff under the manager is six persons, with a median of five.

Baseball fields are the most common type of field maintained. Football and soccer fields are the next most common types of fields maintained. Nearly three times as many baseball fields are maintained as soccer or football fields. A third indicated they managed stadium fields. More than 40 percent manage fields with bleachers and the same percentage manage practice fields. **WTT**

One example of the materials applied to football, soccer, and practice fields in the cool season turf area:

FOOTBALL FIELD: 2½ acres

- April—1st week—Aerify four (4) times
- April—1st week—Overseed with Victa/Baron Blend—25# per acre
- April—1st week—Starter fertilizer w/Pre-Emergence—485# per year
- May—3rd week—Dry fertilizer plus dicot weed control 330# per year
- May—3rd week—Weedgrass preventer 370# per year
- June—2nd week—Aerify four (4) times
- June—2nd week—Dry fertilizer plus insecticide 450# per application
- August—2nd week—Dry fertilizer plus insecticide 450# per application
- September—2nd week—High density fertilizer 330# per application
- October—2nd week—High density fertilizer 330# per application
- November—2nd week—Overseed with Victa/Baron blend 25# per acre
- November—2nd week Aerify four (4) times

TOTAL COST\$1,403.00

PRACTICE FIELDS—9 acres

- April—2nd week—High density fertilizer 1188# per application
- June—2nd week—High density fertilizer 1188# per application
- August—2nd week—High density fertilizer 1188# per application
- November—2nd week—Athletic Blend 30# per acre
- November—2nd week—Starter fertilizer 1584# per year

TOTAL COST\$1399.00

SOCCER FIELD — 2½ acres

- April—2nd week—Fertilizer with weedgrass preventer 370# per year
- May—2nd week—Fertilizer plus Dicot weed control 330# per year
- June—2nd week—High density fertilizer 330# per application
- August—2nd week—Fertilizer plus insecticide 450# per year
- September—3rd week—High density fertilizer 330# per application

TOTAL COST\$695.00

SATOH
We'll move the earth for you.

PURDUE UNIVERSITY: THREE TYPES OF TURF

Melvin J. Robey is superintendent of athletic facilities at Purdue University, West Lafayette, Indiana, a position he has held for the last ten years. He received his Bachelor's degree from Utah State University and his Masters at Purdue, both in turf management. He is author of the book *LAWNS*, published by Davis McKay Company in New York and has another in the works which will be out soon.



All of the athletic facilities at Purdue University under the supervision of Melvin J. Robey are used extensively. They include an outdoor track, hockey field, baseball diamond, a natural turf practice field, a synthetic turf practice field, and the football stadium, a Prescription Athletic Turf system.

The stadium is used for spring football practice, anywhere from two to four times per week, averaging probably twice. In the Fall, it is used maybe 25 to 30 times for practice and games. It has also been used for the women's hockey games, and probably will be again this year. The field is seeded with a mix of Bonnie Blue, Baron, Nugget and Glade. It has just been recently resodded for the first time in four years. Plans in-

After the sod is put down, it is lightly rolled. The PAT system does not have a crown.

The first step in resodding the center of the practice field is removing the existing turf.



clude overseeding heavily this fall with Warren's A-34. The center of the practice field is resodded every year after spring ball is over. This includes an area about 40 feet wide and 30 feet long. The practice fields and baseball diamond have been overseeded with Manhattan ryegrass for the last ten years. This has proven to be a very tough, durable grass for athletic areas, according to Robey.

All of the fields except the stadium receive a complete fertilizer, including four pounds of nitrogen,

per year. The stadium receives more.

Normal herbicide applications include a mixture of 2,4-D, dicamba and MCP, depending upon the species of weed. Pre-emergence weed control includes applications of Dacthal. Diazinon and malathion provide insect control.

Grubs and the like have not been too much of a problem, says Robey, but leaf hoppers are, from a standpoint of annoyance to the football players.



Vacuuming the stadium turf gives it a well manicured look.

An endzone design requires painstaking measurement and painting.



We stand out like a green thumb.



Because we're the only magazine to reach the entire residential lawn care service industry.

This is a growth market of 8,000 companies selling chemical lawn care and maintenance services to the 45 million home owner/residential turf market in the U.S.

A market with a 25% growth last year. And \$1.25 billion in sales. And we hit the top management.

Stand out in the one magazine covering the fastest growing service industry in North America. Join us.

Contact:
Steve Stone
Nat'l. Ad Director
757 Third Avenue
New York, New York 10017
(212) 421-1350

A Harvest Business Publication.
Subsidiary of Harcourt,
Brace Jovanovich, Inc.

**LAWN
CARE
INDUSTRY**

Purdue University

The fields are normally mowed twice a week in the Spring and Fall, sometimes three times if growth is especially rapid. Frequency is cut down to once per week during the hot season.

Mowing height varies slightly for the fields. The baseball infield is mowed at one inch, while the outfield is mowed at 1¼. The other

areas are all mowed at one inch. Height depends primarily upon the coaches preference, according to Robey, and management procedures are developed accordingly. The stadium is the only athletic field that is on a preventative disease program. Manhattan's susceptibility to pythium becomes a problem in the stadium, where air circulation is

limited. The stadium is sprayed every ten days. The other fields are watched with a sharp eye for disease signs and sprayed accordingly.

Fusarium hasn't been a problem in the stadium, but dollar spot, pythium and leaf spot can cause problems if not kept after. Snow-mold hit hard this year, hitting the ryegrass a little harder than the blue. Quite a bit of grass was lost, although not enough to cause major concern.

The stadium does have heating cables, but Robey wasn't able to use them at all this year, due to the coal shortage.

Equipment used to maintain the fields include a nine-gang reel mower, a seven-gang hydraulic reel mower, a smaller riding reel mower, a 48-inch rotary, and four 21-inch trim mowers. A monofilament trimmer is also frequently used. Utility vehicles include two trucksters, a pickup and a dump truck. A 100 gallon chemical sprayer and fertilizer spreader are used from the back of one of the trucksters.

There are three full time employees whose primary concern is athletic field maintenance. During the summer Robey picks up three to five college students.

Robey has found that he can maintain the natural turf systems with considerably less money than the artificial. He does feel a need for all three types of fields across the country. "The National League football players just held a vote and decided that they like the sand root-zone of the PAT system to play on the best," says Robey. (There are 11 PAT systems installed around the country presently.)

The Athletic Department at Purdue, of which Robey is a part, is responsible for maintaining its own facilities. Robey feels that it is much easier to maintain nice facilities under such a program. "I'm able to be associated much more closely with the various programs and coaches, and know what their needs are. I'm also able to explain my problems to them," Robey adds.

One thing Robey does like to stress, in maintaining athletic facilities, is that it is extremely important for the band to have a practice area other than the game field. Marching in place, as a band tends to do, creates severe compaction problems. The band will often do more damage to the field than the football team will." **WTT**



Banvel®
tough on weeds,
easy on turf.

Beautiful results! How often have you tried a herbicide only to end up with poor control or damaged turf? No longer. Banvel® 4S, Banvel® +2,4-D, and Provel® give you economical control of more than two dozen difficult weeds. Weeds that other herbicides often miss. The translocating action of Banvel® and Provel® attacks the entire weed, roots and all, to get at deep root and regrowth problems. True season-long herbicides, they can be used in warm or cool, wet or dry weather, and store through the winter without loss of potency. They mix readily in hard or soft water, and may be applied with conventional spray equipment. **Banvel® 4S for tough weeds, Banvel® +2,4-D for pre-mixed chemicals and broader spectrum control of broadleaves, and Provel® for pre-mixed chemicals and broader spectrum broad-leaf control with less Dicamba.** You get beautiful results, at a cost you'll find pretty attractive, too!



Before using any pesticides, read the label.

Velsicol

VELSICOL CHEMICAL CORPORATION
"The turf chemical specialists"
341 East Ohio Street, Chicago, IL 60611
(312) 670-4592

Circle 140 on free information card

ROLLINS COLLEGE: HEAVY USE OF EIGHT ACRES

Jim Boston is assistant to the physical plant director at Rollins College in Winter Park, Florida. One of his areas of responsibility is the grounds at Rollins, including the athletic facilities.

"We're fortunate if we can keep the fields in good shape half a year . . . because of constant use."

Rollins College in Winter Park, Florida, has only eight acres of athletic grounds. However, the patterns of use are intense, and Jim Boston, assistant to the physical plant director, fights problems common to all turf managers.

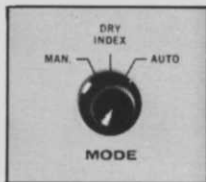
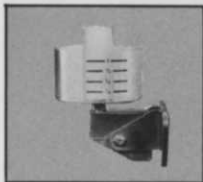
A fertilization program, and control of disease and insects are the items of major concern to him. However, he is limited to how much he can do and when, because the fields are in use almost constantly. The soccer field, for example, is also used for intramurals during the day and through the off sports season. "We're fortunate if we can keep the field in good shape half a year, much less a full year, because of this constant use," says Boston.

"We're involved with a very limited space. We're in an area that is built up in every direction with no room for us to expand. Our baseball outfield is used for soccer practice, because the game is so damaging to turf. The only area that we can treat properly and keep in a condition where we don't have an excuse is the infield of the baseball field, because it is not used for anything but baseball."

"The rest of the field does have some weeds," says Boston. "It has some worn areas, simply because we can't control it." Boston feels that the key to maintaining healthy turf lies in the root system. "When turf-grasses are trampled down, just worn out so to speak, they're going to bounce back and fill in the bare spots a lot faster if the roots are strong, deep and healthy."

One very important aspect of keeping healthy turf in the South is pH. "We use dolomite lime to keep pH at its optimum to get the best growth from the grass during the periods when you have to try and coax it to do so. We apply 10 tons per year."

"Every two or three months, I



WE WROTE THE BOOK ON CONTROLS

Weather-matic controllers can operate any size sprinkler system effortlessly and automatically, on almost any type of watering program. Our reliable electronic controllers offer automatic, semi-automatic or manual operation; variable timing, 14-day calendar programming, dry indexing; Rain-Stat®; modular expandable and command/satellite models.

THE TURF IRRIGATION MANUAL

A definitive reference book on landscape irrigation just published by Telsco. Copies may be ordered from the factory.



MAIL TO: Weather-matic Division Telsco Industries • Box 18205C • Dallas, Texas 75218

Please send me information on

- Residential controllers
- Heavy-duty industrial controllers
- Command/satellite control systems
- Turf Irrigation Manual

NAME _____

COMPANY _____

ADDRESS _____

CITY _____

STATE _____

ZIP _____

Weather  matic.

Circle 143 on free information card

Rollins College

will pull plugs from our fields and check the condition of the root system. If I am satisfied with it, but yet the greenness I want isn't there, I'll apply heavy nitrogen or iron to bring it out. If not, then I will apply something that will be more beneficial to the roots. When I'm trying to recover an area, I'm more concerned with the roots than I am the top. The top will come if the roots are there."

Both of the athletic fields at Rollins are bermudagrass. No overseeding is done, because the facilities aren't in use during the

"Sometimes we have to water day and night to supplement the rainfall."

winter months. That can be good and bad, according to Boston. "We would like our facilities to be growing and recovering during winter, but they're not because it is winter. They're also not in use, so we're not really in that bad of a shape."

Right now is the rainy season, and the fields might get rainfall almost every day. This past winter there was maybe only one shower during three or four months. During those periods, Boston relies heavily on irrigation through his quick coupler system. "Sometimes we may have to water night and day to supplement the lack of rainfall. We don't like to water at night, because of the increase in disease susceptibility, but we're more concerned with keeping the grass alive than we are with fungi."

"I'd say that nematodes and mole crickets are our biggest pests. We have our fields treated for nematodes at least once a year. For some reason this also tends to drive the mole crickets out. It doesn't kill them, they just leave."

"Since our soil is 90 percent sand, and with the heat in Florida, we have a considerable weed problem. I approach it a little differently than most, however, because of the timing of our baseball and soccer programs.

Spring baseball practice begins right after the winter months and their game season comes in right behind that. So you've got a decision

"Do you want to kill the weeds and leave bare spots or do you want the games played on a green outfield?"

to make. Do you want to go in and kill the weeds and leave bare spots to gradually fill in, or do you want the games played on a green outfield. The spectators from the stands can't tell if they're weeds or grass. I wait until May before I treat for broadleaf weeds. I lose a month of growing time, but the baseball team had a green outfield."

Boston does not consider the budget for athletic field maintenance high, neither does he feel that it is low. "You have to look at

"We don't get the dollars that we'd like to have, but we get enough to do a decent job."

priorities. You've only got so many dollars for the school to work with and our athletic facilities are not on the very top of the priority list. We don't get the dollars that we'd like to have, but we get enough to do a decent job."

One full-time employee takes care of the athletic grounds. An additional person is hired during the summer. "I'm fortunate to have an individual that's taking care of the grounds who really cares about what he is doing and enjoys the results of his labor. That's the key to the whole ball game in taking care of turfgrass." **WTT**