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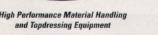


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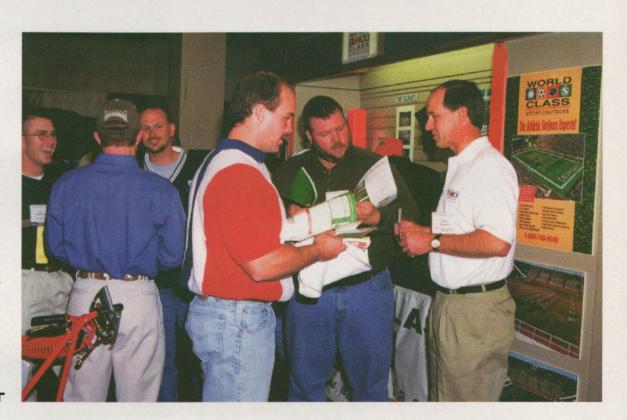
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Conferences increase professionalism

State, regional, and national conferences give turf managers the opportunity to learn from educational sessions and workshops, network, and establish relationships with suppliers.

Top industry researchers and university educators, as well as by sports turf managers from around the world, conduct most sessions. Many sports turf-specific tracks at state and regional conferences are developed with input from area sports turf managers to meet specific needs. Of course, the STMA Annual Conference is totally focused on these areas.

Sports turf managers recognize the important role suppliers fill in providing the goods and services they need to do their jobs better. Conference-related trade shows create the ideal conditions for making these important connections. Suppliers can show their new products in an atmosphere that allows easy question-and-answer exchange without having managers under pressure to get back to the field. Every meeting of sports turf managers is filled with networking opportunities. These all-important relationships provide the basis for long-term idea exchange and problem-solving connections.



STMA Chapter News

Midwest Chapter STMA: The Chapter will hold an expanded 2-day Irrigation Workshop February 11-12 at Chevy Chase Golf Club in Wheeling.

For information on the Midwest Chapter, or pending activities, visit the Chapter's website, http://mcstma.org/, or call Libby Baker at 847-263-7603 or email Bake60ft6in@aol.com.

Northern California Chapter of the Sports Turf Managers Association: The Chapter will be co-sponsoring a Sports Turf Session as a portion of the program of the NCTLC EXPO. The EXPO will be held February 20-21 at the Santa Clara Convention Center.

The Sports Turf Session runs from 1:30 to 3:30 PM on February 20. Featured on the program are: "Overview of the Association and Introduction," by Bob Milano, University of California; "Synthetic Sports Surfacing: Options, Alternatives and Care," by Greg Weisbrich and John Burke, Southwest Recreational Industries; "Baseball and Softball Facility Care: Details, Details, Details," by Mark Lucas and Nick Cole, University of California; and "Equipment Evaluation and Selection for Sports Facilities," by Dale Getz,

CSFM, The Toro Company.

For information on the Nor-Cal Chapter, or pending events, call Janet Gift at 530-758-4200.

Keystone Athletic Field Managers Organization (KAFMO/STMA): The Seventh Annual KAFMO/STMA Athletic Field Conference will be held at the Holiday Inn in Grantsville on February 21. Take the opportunity to view exhibits and visit with the exhibitors. Featured on the program are presentations by Mike Andresen, CSFM, of Iowa State University Athletics, and Dr. Peter Landschoot of Penn State, and panel discussions. Also included are award presentations, the chance to win raffle prizes, and lots of great networking opportunities.

For information on the KAFMO/STMA Chapter or upcoming events, contact Dan Douglas, Reading Phillies Baseball Club, at tel. 610-375-8469, ext. 212; or e-mail to: kafmo@aol.com.

Sports Field Managers Association of New Jersey: The Chapter announces a special 10 percent discount for SFMANJ members attending the 3-Day Athletic Field Construction & Maintenance program presented by Rutgers University February 25-27. For information on this event call 732-932-9271 or visit the website: www.cook.rutgers.edu/~ocpe.

For information on the New Jersey Chapter, or upcoming events, call Fred Castenschiold at 908-722-9830 or email to mkc@blast.net; or call Eleanora Murfitt, at 908-236-9118; e-mail to HQ@sfmanj.org

Kentucky Sports Turf Managers Association: The Kentucky Chapter will hold its Annual Meeting on February 26 in conjunction with the UK/KTC Short Course in Louisville.

For information on the chapter or upcoming events, contact Tom Nielsen at TNielsen@batsbaseball.com or Aaron Boggs at AVBoggs@netscape.net.

Ohio Sports Turf Managers Association (OSTMA): OSTMA will be working with The Ohio State University to put on a sport turf short course at the Huntington Club Suite at The Ohio State Stadium on March 4-5. The registration deadline is February 14. Please contact 614-292-4230 to register. For more program information please contact Pam Sherratt at 614-

STMA Chapter News

292-7457.

OSTMA will hold a hands-on workshop on field painting in Fremont Ohio on April 14. Experts on painting will share their knowledge and tricks of the trade. Event fliers will be available soon on line at www.ostma.org or by contacting headquarters at 419-824-9805.

For information on the OSTMA Chapter, or upcoming events, call OSTMA Headquarters at 888-824-9805 or Boyd Montgomery at 419-885-1982; or visit the chapter's website at www.ostma.org.

Sports Turf Managers Association of Arizona: For information on the chapter, or upcoming events, contact Chris Calcaterra at e-mail: chrisc@peoriaaz.com or tel. 623-412-4231 or Bill Murphy, at e-mail: bmurphy@ci.scottsdale.az.us or tel. 480-312-7956.

The Greater LA Basin Chapter of the Sports Turf Managers Association: For information on the Chapter or pending events, call Steve Dugas, California State University-Fullerton, at 714-278 - 3929 or email sdugas@fullerton.edu.

Southern California Chapter: For information on the Chapter, or pending activities, call Steve Wightman at 619-641-3106.

Colorado Sports
Turf Managers
Association: For information on the
Chapter, or upcoming
activities, visit the
Chapter's website,
www.CSTMA.org, or
call the CSTMA
Chapter Hotline at
303-346-8954.

Florida Chapter # 1: For information on the Chapter, or pend-

ing activities, call John Mascaro at 954-341-3115.

Gateway Chapter Sports Turf Managers Association: For information on the Gateway Chapter, or upcoming events, call Mike Krone, Missouri Baptist College, 314-392-2328 or email krone@mobap.edu.

Georgia Sports Turf Managers Association: For information on the chapter or upcoming events, contact Lori Turek at 770-509-3663 or gastma@earthlink.net.

Indiana Chapter: For information on the Chapter, or pending activities, call Terry Updike, B & B Fertilizer, at 219-356-8424.

Iowa Sports Turf Managers Association: For information on the Chapter, or upcoming activities, contact Jeff Wendel of The Turf Office at tel. 515-232-8222, or fax 515-232-8228, or e-mail: Jeff@iowaturfgrass.org.

Mid-Atlantic Athletic Field Managers Organization (MAFMO Chapter STMA): For information on the Chapter, or pending activities, call the Hotline at 410-290-5652.

Michigan Sports Turf Managers Association (MiSTMA): For information on the Chapter or pending events, contact MiSTMA Headquarters at 517-712-3407, or email Amy Fouty, University of Michigan, at

fouty@umich.edu, or go to www.mistma.org to visit the chapter's website.

Minnesota Chapter STMA: For information on the Chapter, or upcoming events, contact Jeff Hintz, Bethel College & Seminary, St. Paul, Minnesota at tel. 651-638-6075 or e-mail: j-hintz@bethel.edu.

MO-KAN Sports Turf Managers Association: For information on the Chapter, or upcoming events, call Jody Gill at 913-239-4121, Gary Custis at 816-460-6215, or Mike Green at 913-208-6158 or e-mail to mokanst-ma@aol.com.

Nebraska Sports Turf Managers Association: For information on the Chapter, or upcoming events, call Loren Humphrey at: 402-461-2324 or email to lhumphrey@cityofhastings.org.

Pacific Northwest Sports Turf Managers
Association: For information on the chapter or upcoming events, contact in Washington, Jay Warnick at
JayW@Seahawks.com or in Oregon, Mike Wagner at
MWagner@Oregon.UOregon.edu.

Tennessee Valley Sports Turf Managers

Association (TVSTMA): For information on the Chapter, or upcoming events, call Bill Marbet, Southern Athletic Fields, Inc., at 931-380-0023 or 800-837-8062 or visit the chapter's website: www.tvstma.org.

North Texas Sports Turf Managers Association: For information on the Chapter, or pending activities, contact Rene Asprion at 972-647-3393, or visit the website

at www.ntstma.org.



at www.msuna.org.

South Texas Sports Turf Managers Association: For information on the Chapter, or upcoming events, call Craig Potts, Texas A & M University, at tel. 979-458-8841, or e-mail: CPotts@athletics.tamu.edu.

Virginia Sports Turf Managers Association: For information on the Chapter, or other upcoming events, contact: Bob Studholme, Fairfax County Park Authority via e-mail: Robert.Studholme@FairfaxCounty.gov or at 703/374-8590

Wisconsin Sports Turf Managers Association: For more information on the Chapter, or other pending events, call Richard Miller at 608-756-1150.

Chapters on the Grow:

Las Vegas: For information on the chapter developing in Las Vegas, contact Rod Smith, Grounds Manager/Cashman Center at e-mail: rms@lvcva.com or at tel. 702-386-7140.

New York: For information on the chapter forming in Central New York, contact Kevin Meredith, National Soccer Hall of Fame, at e-mail: Kevin@wpe.com or at tel. 607-432-2953.



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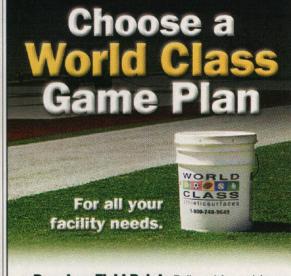
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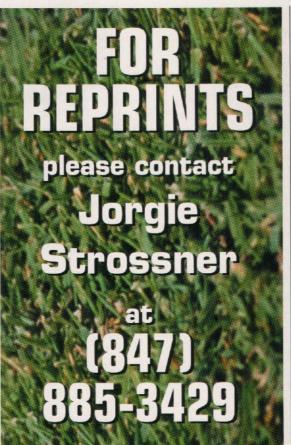
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Advertisers' Index

Company	Page #	R.S.#
Anderson Lawn Products	29	116
Bannerman	24-25 (regional)	113
BASF	Cover 2	100
Broyhill	10	104
Colorado Lining	- 44	128
Covermaster	23	111
Fipronic/Bayer	24-25 (regional)	112
First Products	36	122
First Products	44	126
Goulds Pumps/ITT	15	106
Greenone Industries	36	123
Lebanon Turf	27	115
Oil Dri/Pro's Choice	21	109
Partac/Beam Clay	22	110
PBI/Gordon	35	120
Profile Products	40	136
Redexim Charterhouse	32	118
ROOTS	31	117
Shindaiwa	13	105
Southwest Recreational Industries	44	129
Sports Turf Co.	26	114
Textron	45	135
Textron Golf & Turf	Back Cover	134
TifSport Growers Association	5	101
Triangle Market Sales	33	119
Turf Feeding Systems	44	127
Turfgrass America	7	102
Ty-Crop	41	124
United Horticulture Supply	17	107
Varicore Technologies	Cover 3	133
WaterWick	44	130
West Coast Turf	9	108
World Class Athletic Services	44	131

Soil pH

A local city hired a company in July to hydro-seed a ballpark with common bermudagrass. They said they watered the seed in and there was rain during that time. The city did a soil test and the pHs ran from 2.3 to 3.9. I went to the park on November 1; in one area of a soccer field, there was a patch about 10 feet in diameter that did not come up, but the rest of the grass had sprouted and was trying to grow. In the baseball field the pH was 2.3. The outfield did not come up except a few seeds did sprout. There are not a lot of weeds growing in the outfield. The grass along 1st and 3rd base lines came up. I told them that I didn't know what would cause the spot in the soccer field not to sprout, and I wasn't sure why the outfield seed did not sprout more seeds and why the grass came up along the base lines. Do you have any thoughts on this? The city has held up the company's check, they want to know why the grass didn't come up.

t sounds like these fields were built on a very poor site. The problem seems to be directly related to soil pH, as you speculated. There are likely some other issues that are influencing turf growth, which I will mention, but the overriding problem is pH.

To be honest, I am surprised that anything came up if the pH is indeed around 2.3. That is very acidic. At soil pH below 4.8, aluminum (Al) and manganese (Mn) become much more soluble and can be sufficiently high in soil solution to cause direct plant root toxicity. So the seeds may germinate, but the young roots are damaged almost immediately. These effects can be equally detrimental to turfgrasses or weeds. With low soil pH, Al and/or Mn toxicities often occur in conjunction with other stresses; namely, deficiencies of Mg, K, Ca, or P. At the low pHs mentioned, iron toxicity is possible and high H+ can be directly toxic to plant roots. In some soils, pyrite (FeS2) can accumulate under waterlogged conditions so that when the soils are drained for development they become extremely acidic as the pyrite oxidizes to generate sulfuric acid. Each of these scenarios provides a harsh environment to establish and grow grass.

The depth of the soil sample for pH analysis may explain the differential success between fields. Usually toxicities are found in the subsoil, even though it sounds like these soils have a pretty low pH through much of the rootzone. After sprouting, some of the plants may have found enough surface soils in the soccer field with an acceptable pH to get established.

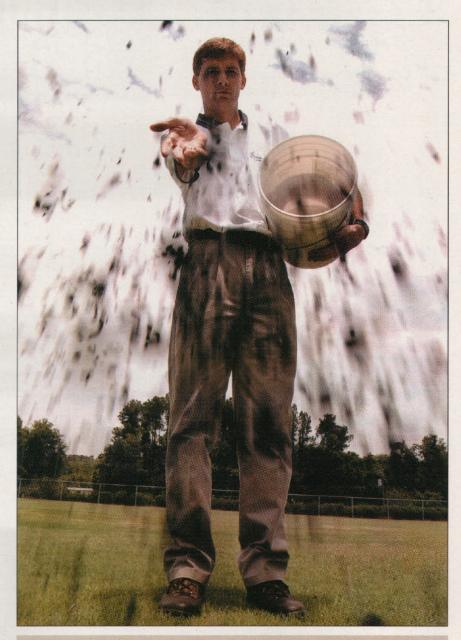
When the soil sample was taken, you may have gotten a mixture of the higher pH surface soil and the low pH subsurface soils. The 10-foot diameter bare circle may or may not be due to the soil pH. It is such an isolated incident on the field that it sounds like it could be due to a pathogen (i.e. disease). The length of establishment (July to November) may be due to the generally low pH reducing seedling vigor. In the baseball field, I suspect the pH was generally worse than the soccer field. The grass came up around the baselines due to the clay from the baselines having a higher pH, plus it had a higher CEC that was able to hold on to some of the nutrients.

The other issue I alluded to that may contribute to poor germination is hydroseeding bermudagrass. While hydroseeding is a great way to establish many grasses, I have generally seen better establishment results with bermudagrass (and other warm-season turfgrasses) with drill seeding, or some other type of seeding that places the seed just below the soil surface.

I hate to see bermudagrass established in pHs less than 5.0; especially since the best time to effectively and efficiently alter soil pH is before establishment. With a pH less than 5.0, the soil should have been treated before seeding. Since the baseball field established so poorly, you may want to have a lime requirement test run. Using those results, mechanically mix the required lime to neutralize as much of the acid soil and

subsoil as possible. Incorporation is important since lime that is only surface applied takes years to penetrate very deeply into the profile.

Once the turf is established, surface applications of lime every 3-6 months may be needed to maintain healthy turf. To determine how liming treatments affect pH below the surface, soil samples can be collected from deeper depths, such as comparing 0 to 3, 3 to 6, 6 to 9 and 9 to 12 inches. While this level of attention may sound excessive, the very low pH values of these fields are going to warrant more inputs to maintain functional athletic fields.



Have Questions?

Send them to Grady Miller at the University of Florida, PO Box 110670, Gainesville, FL 32611, or email gmiller@mail.ifas.ufl.edu. Or, send them to Dave Minner at Iowa State University, 106 Horticulture Hall, Ames, IA 50011, or email dminner@iastate.edu.

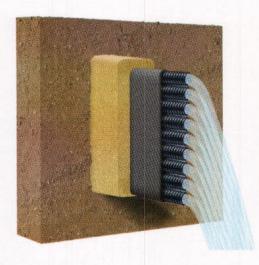
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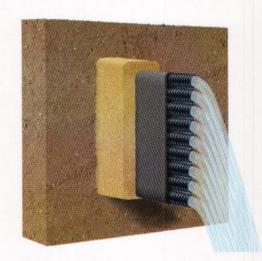


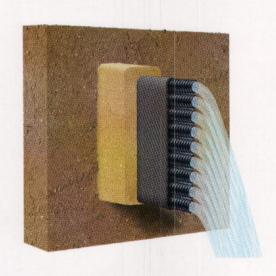




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