Thatch Control

Dragging the field with wire mesh or chain-link fence helps dig up any remaining thatch prior to overseeding.

The Key to Turf Management

By Barbara Augsdorfer

Thatch provides cushioning for football and soccer players and children at play, and a healthy layer of thatch is the mother's milk of baby turf. However, if left unchecked, thatch can be as much a curse as a blessing: Ask any baseball outfielder who has had a ball "snake" away from him. Thatch may be a sure thing, but unlike death and taxes, thatch can be controlled.

"You can't worry about creating thatch. When you get it, you get rid of it," says Alan Sigwardt, head groundskeeper for Joe Robbie Stadium in Miami, FL.

Because the stadium is a multiuse facility, Sigwardt has to balance his turf-care program to meet the needs of both the baseball Marlins and the football Dolphins. "The Marlins were on a two-week road trip [right after the All-Star break] in July, so we core-aerified and topdressed the field with sand," he explains. "That will be the last time I thin it out for this year."

Sigwardt manages the stadium complex with a staff of five. They verticut once a year during the summer and overseed the 419 bermuda with perennial ryegrass.

When the Dolphins start pre-season camp, Sigwardt must adjust his thatch management strategies accordingly. "We bring the turf height up from 3/4 inch to one inch for NFL, and let the thatch get a little thicker," he explains. "It's so tropical here that the bermuda doesn't go completely dormant, and the divots created by football players don't heal well."

By the end of the football season the turf has taken a real beating. "We resod every January," Sigwardt continues.

"Last year after the Super Bowl, as soon as the game was over, we were running sod cutters and removing sprinkler heads. We did a total replacement job — liner, irrigation pipes, everything. It was a six-month job that had to be completed in six weeks — in time for Opening Day for the baseball season."

Listen to the Coach

Communication is an important aspect of thatch management. "One of the key things is communication between the coaches and the people taking care of the field," says Scott Cisson, landscape architect for Arizona State University in Tempe. "We handle things according to preferences of the coaches," he states.

Cisson explains that the late Jim Brock, who coached the ASU Sun Devils baseball team to several College World Series titles, was instrumental in the turf process. "He liked to use a blend of manure and sand for topdressing, so we would adjust our schedule around what he wanted," Cisson explains. "We would work with each of the coaches, and if the coach did not have a preference, we would do whatever was applicable in a particular situation."

The baseball fields at ASU can be used well into winter, which can make for a tight 90-day turnaround to get the field ready for spring. Other fields are maintained on an as-needed basis.

The Weather Factor

For many turf managers, thatch management varies each year depending on weather conditions. Every turf manager knows that rain coupled with drainage problems or too much rain for the drainage system to handle in too short a time period can cause major problems on turf. If a turf manager is fortunate enough to have a say in the design of the field, he can solve many problems before they begin.

Chad Casella is the head groundskeeper for the Piedmont Phillies, the single-A affiliate of the Philadelphia Phillies, in Kannapolis, NC. The team moved from Spartanburg, SC, last year, and Casella made the move as well. "We have a new field that was constructed in late 1994 and finished early this year," Casella says. "The sod was laid 18 days before Opening Day."

During the field's construction, Casella specified a sand base. "We've received as much as three inches of rain in an hour," he says. "The field drained in 30 minutes."

The Tifway II hybrid bermuda is mowed at 3/4 to 5/8 of an inch and fertilized every seven to ten days. During road trips longer than four days, Casella, along with one full-time assistant, runs a slicer to improve drainage. Topdressing is done once each spring, summer and fall to keep thatch in check during the season. He verticuts the field in the fall after the season.

Turf managers must perform magic to get green grass when everyone's lawn is yellow. "We verticut during the transition time in June and July to take out rye, then again in September before we overseed the bermuda with rye," says Sam Clay, head groundskeeper for the Tulsa (OK) Drillers, the double-A affiliate of the Texas Rangers. "We have bermuda 419 in the summer and overseed with perennial rye. We have rye in April, bermuda in summer and rye again in fall," he explains. "That way we have color in April and May."

The bermuda is usually cut at 5/8 of an inch but raised to one inch when the rye is down.
Tifway 419 and common bermuda are used on the field for the Greenville Braves, in Greenville, SC, the double-A affiliate of the Atlanta Braves. Field Superintendent Matt Taylor has to topdress his field every month because his field sits on a clay base. “We aerify every month and topdress with a mix of 80-percent sand and 20-percent peat,” he explains. “We mow every day and pick up the clippings and keep the thatch at 1/4 to 1/2-inch thick. “During the spring we have to slice to get the bermuda to rise.”

Aggressive Maintenance

“We have a full-blown turf-management program here,” says Sal Genito, a landscape architect and the manager of grounds for California State University, Fresno. The turf is Santa Ana hybrid bermuda. Practice fields are topdressed in May, and the main baseball field is toppedressed in June with 25 tons of sand. Also in June, the football practice fields are dethatched and aerated. Bulldog Stadium is dethatched and aerated in July. Overseeding begins in late August or early September with Medalist 10.

“We have a standard,” Genito explains. “We want to maintain at least 1/2 inch of thatch. We monitor that throughout the season, then make recommendations to the coaching staff or adjustments to our schedule. Once that 1/2 inch of thatch is gone, we resod the fields.”

Genito did some research before selling his aggressive turf-management program to the people who make the budget decisions. His research of facilities throughout California revealed some interesting facts. For example, the Rose Bowl in Pasadena and Stanford Stadium in Palo Alto are “restricted-use” facilities. The Rose Bowl hosts 50 events and Stanford Stadium hosts 25 events each year. “These facilities have tremendous thatch-management programs,” he reveals. On the other end of the spectrum, facilities such as Anaheim Stadium and the Los Angeles Memorial Coliseum host more than 100 events each year. Both facilities have to be resodded each year. “I just wanted to highlight the fact that you can’t arbitrarily use a field and expect it to hold up,” he says.

For Chris Bunnell, grounds supervisor with the Escondido Union School District in Escondido, CA, and president of the Southern California STMA, appearance and performance, while important, are second and third behind safety. “I have middle and elementary schools, including playgrounds and sports fields,” Bunnell explains. “This means everything from recess to youth soccer and adult baseball leagues. We are more concerned with safety than performance — for example, ball roll. If we can keep bare spots from appearing, we’re happy.”

Bunnell and his staff service 19 sites totaling 120 acres of turf. “It’s like a small golf course with 19 holes,” he says. His staff of 12 uses aeration to control thatch. Overseeding with perennial rye and some slit-seeding is also done. A potential liability headache is avoided by not applying chemicals to the turf on school days.

Thatch management is clearly one of the most important aspects of a turf manager’s job. Sports turf managers must walk a fine line among safety, performance and aesthetics. Successful thatch-management can play a key role in maintaining field safety, performance and appearance. Proper thatch management also aids in disease control and in maintaining the overall health of the turfgrass. Solid thatch-control techniques are a key component of an overall turf-management program.