

A

n Arkansas golf club inspected by the Occupational Safety and Health Administration (OSHA) as the result of a complaint was fined \$5,250 for four "serious" violations and three "other" (lesser) violations. The violations ranged from an inadequately written Hazard Communication Program to electrical

hazards to improper safety guards and violations of OSHA's personal protective equipment (PPE) standards.

In Hawaii a public golf course that faced \$1,125 in OSHA penalties following a partial inspection had the penalties reduced to \$570. Yet that same golf course paid \$7,800 in fines following a complete OSHA inspection, which revealed six "serious" violations of OSHA standards.

And in Colorado a small public golf course investigated by OSHA after the death of a 35-year-old worker initially faced \$22,100 in penalties for three "serious" violations of OSHA's construction standards. The penalties were later reduced to \$9,500 for a single violation of OSHA's "general duty" clause, which requires employers to maintain a safe workplace for

employees. The worker was killed when a large wall of dirt collapsed on top of him as he was fixing an irrigation system leak.

These incidents are among the pages and pages of OSHA citations found in 159 inspection reports of public golf courses around the country in a recent three-year period (Feb. 9, 2002, to April 7, 2005). A review of these reports and the corresponding OSHA standards by *Golfdom* found:

► A number of golf courses that were unexpectedly visited by an OSHA inspector were cited for very high numbers of violations, including as many as 14, 26, 27 and 38 violations. In one case a golf course in New Jersey was cited for 29 violations, while OSHA inspectors found another 14 violations at the clubhouse.

► Despite several employee fatalities at golf courses around the country, accidents are not the primary reason why OSHA shows up at golf courses. In fact, most of the 159 inspections were "planned" inspections (where OSHA focuses on a certain industry with a high number of hazards and associated injuries). The No. 2 reason for OSHA inspections is complaints, followed by accidents and followed by inspections for various other reasons.

► There are no particular trends indicating how a golf course is likely to

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Golf courses inspected by the Occupational Safety and Health Administration could face multiple citations, time-consuming probes and fines

BY BARBARA MULHERN

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get into trouble with OSHA. In addition to the violations already mentioned, others found in the 159 inspection reports we reviewed included (but were not limited to): improper storage of flammable/combustible liquids, inadequate machine guarding, use of defective portable ladders, improper exit routes, failure to have an established lock-out/tagout program, and improperly maintained fire extinguishers.

► A number of golf courses with multiple OSHA violations were able to abate them by an agreed upon date and escape paying any fines. This was the case for the New Jersey golf course and clubhouse that initially faced a total of 43 violations.

Superintendents' Basic OSHA Compliance Checklist

✓ **Understand the OSHA standards that affect your operation.** Two good resources are: OSHA's Web site (www.osha.gov), and the Golf Course Superintendents Association of America (800-472-7878 or www.gcsaa.org).

✓ **Know whether you operate in a state with a state-run OSHA program.** If so, you may have to comply with even stricter standards than the federal OSHA standards. To find out, visit www.osha.gov, click on "S" at the top of the page, then on "State Plan States."

✓ **Continuously post OSHA's Job Safety & Health Protection poster or the newer You Have a Right to a Safe and Healthful Workplace poster in a central location where it can be seen easily by employees.** (You can download the required poster at no cost from OSHA's Web site.) Also, ensure that you meet any state-specific OSHA posting requirements.

✓ **Comply with OSHA's injury and illness record-keeping rules.** Maintain an OSHA Form 300 Log of Work-related In-

juries and Illnesses for the current calendar year. Use the OSHA Form 301 Injury and Illness Incident Report to record supplementary information. Also, fill out the OSHA Form 300-A Annual Summary of Work-related Injuries and Illnesses at the end of the year and post it where you post other employee notices from Feb. 1 until April 30 of the following year.

✓ **Implement a Written Hazard Communication Program.** This is one of OSHA's most often cited violations against employers. Make sure your program includes training for employees, plus the maintenance of current material safety data sheets (MSDS) and a listing of all hazardous chemicals used in your operation.

✓ **Notify your nearest OSHA area office (or call 800-321-OSHA) within eight hours of any work-related fatality or incident that results in the hospitalization of three or more workers.**

✓ **Implement a proactive written safety program.** This will go a long way in showing "good faith effort" should you

'Wall-to-wall' inspections

Rich Fairfax, director of OSHA Enforcement Programs in Washington, D.C., says the golf industry is one industry OSHA didn't "look at much in the past, and the types of inspections we did then were the result of either complaints or accidents." When an OSHA investigator comes in as a result of a complaint or an accident, the scope of the inspection is generally limited.

Now, however, OSHA offices in many areas have targeted the golf industry for "planned" inspections — those where the inspector shows up at a golf course and goes from "wall to wall" to look for any and all safety hazards.

"Planned inspections are comprehensive inspections — we call them 'wall-to-wall' — and we try to address all of the safety hazards," Fairfax says.

Inspectors will review the maintenance shop, chemical storage area and employee use of personal protective equipment.

Andrew Trinkino, superintendent at the Fountaingrove Golf & Athletic Club in Santa Rosa, Calif., says he's not surprised golf courses visited by OSHA inspectors are often cited for multiple violations. The reason, he says, is because when OSHA thoroughly inspects a golf course these days, the inspector looks not only at the clubhouse — which Trinkino calls the "centerpiece" for the club — but also at the maintenance facility, which might be old and crowded with equipment, fuel and chemicals that don't meet OSHA's standards for proper storage.

"Because owners want perfect (golf course) conditions for the public, they buy some newer equipment but also keep the older equipment, and there's not enough space in the [maintenance facility to store it]," Trinkino says.

Carrie Riordan, director of Information and Public Policy at the Golf Course Superintendents Association of America (GCSAA), says the questions she receives from members about OSHA compliance "really run the gamut." Most questions are about signage, recordkeeping for injuries and illnesses, and documenting and instituting safety-training programs, she says.

"We also get a lot of questions about hard hats, eye protection, noise protection and how to conduct a job hazard analysis to determine what PPE is required," she adds.

REVISED MAY 10, 2005
2005 DAILY JOB ASSIGNMENTS

GREENS: GKE	MANTENIMIENTO DE TEES: TEE	FAIRWAYS: FWY
1 Cortar greens a mano (Tee)	1 Limpieza de tees a mano	1 Fairways LF 3420
2 Cortar greens con triplex	2 Cortar con Triplex todos los tees	2 Cortar los hvy con Triplex
3 Preparar el campo	3 Cortar tees y limpiezas con triplex	3 Cortar solo approaches
4 Pisar los greens	4 Cortar a mano solo los collares	4 Recoger los clippings
5 Regar	5 Cortar a mano los collares y chipping area	5 Orillar regulares y coladeras
6 Fumigar y Fertilizar	6 Cortar con Triplex tees y chipping areas	6 Reparar los divots
7 Aterado	7 Regar	7 Riego
8 Verticorte	8 Fumigar y Fertilizar	8 Fumigar y Fertilizar
9 Aterado	9 Aterado	9 Aterado
10 Remover las hojas	10 Verticorte/Picado	10 Verticorte/Picado
11 Rolar los greens	11 Ateración	11 Ateración
12 Pasadas de limpieza a mano	12 Bando de hojas	12 Ateración de approaches
13 Cortar greens a mano (Jakes)	13 Cortar a mano todos los tees	13 Recoger las hojas
	14 Triplex azules/blancos/par3	14 Limpieza de fairways con triplex
	15 Reparar divots	15 Dragar el roco
	16 Limpiar las marcas de yardage	16 Llevar arena a la casa club

MOWED ROUGHS: ROH	TRAMPAS: BUN	JARDINES DEL CAMPO: LAN
1 HR-5111	1 Raquar las trampas	1 Deslervar, orillar y agregar mull
2 Toro Sideswinder	2 Checar las trampas (nueva y viejas)	2 Raquar plantas y arboles
3 Nacional alrededor los tees	3 Raquar trampas viejas	3 Lagunas y cascadas
4 Cortar con Sideswinder	4 Fumo	4 Tuleles
5 Cortar los intermediates	5 Riego	5 Podado de arboles
6 Fumigar y Fertilizar	6 Fumigar y Fertilizar	6 Mantenimiento de jardinerias
7 Intermediates alrededor de los greens	7 Orillado y Deslervar	7 Jardinerias de los belvedereos
8 Juntar basura	8 Agregar o quitar arena	8 Casa pequena
9 Sazon de tres cuando rotatoria	9 Juntar basura	9 Bonques
10 Riego	10 Pista y semilla	
11 Bonques	11 Bajar agua	
12	12 Arreglar los deslavados	

CASA CLUB: CLU	TRIMMING Y MISCELLANEOUS: TRI	PASTO NATIVOS: NAT
1 Cortar las en el parqueadero	1 Cortar todo	1 Cortar
2 Limpieza general	2 Cortar solo alrededor las trampas	2 Barrer y rastrear
3 Orillar y agregar mull en las jardinerias	3 Cortar alrededor los greens con Lawn Boy	3 Fumigar y Fertilizar
4 Apoyar arboles y plantas	4 Arreglar el 2 cerca del camino	4 Siembra
5 Cortar la entrada u el circulo	5 Cortar debajo de la cerca	5 Reparaciones
6 Cortar alrededor del patio de a tras	6 Cortar alrededor el green de la practica	6 Riego
7 Cortar la ladera de mercedon de	7 Cortar alrededor los "target" greens	
8 Cortar nivelwood de	8 Limpiar el taller y el parqueadero	
9 Cortar alrededor de la alberca	9 Limpiar el area de lavado	
10 Mantenimiento de las jardinerias de flor	10 Marcado de hazards	
11 Pista y semilla		
12 Retirar la nieve		
13 Mantenimiento de las lavas		
14 Cortar		

TRAMPAS: BUN

- 1 Raquar las trampas
- 2 Checar las trampas (nueva y viejas)
- 3 Raquar trampas viejas
- 4 Fumo
- 5 Riego
- 6 Fumigar y Fertilizar
- 7 Orillado y Deslervar
- 8 Agregar o quitar arena
- 9 Juntar basura
- 10 Pista y semilla
- 11 Bombear agua
- 12 Arreglar los deslavados

Double whammy

At the Club at Neville-wood, near Pittsburgh, job assignments are posted in English and Spanish.

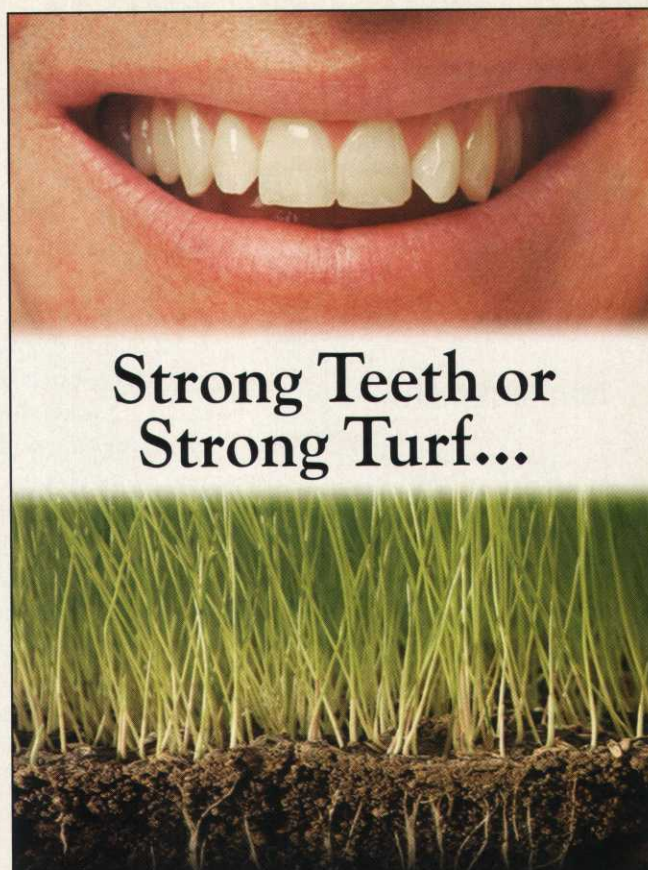
Many golf courses around the country employ a high percentage of Hispanic/Latino workers with limited English language skills. Golf courses that fall into that category are at special risk of scrutiny by OSHA because of the federal agency's major emphasis on the safety of Spanish-speaking workers.

An Associated Press report released last year revealed that a Mexican worker in the United States is four times as likely to die as the average U.S.-born worker, and that Mexican workers in the United States die on the job at the rate of one per day. OSHA's own statistics show that one-quarter of the fatalities the agency investigates are related to language or cultural barriers.

"There are increasing numbers of Spanish-speaking persons on OSHA's compliance staff," Fairfax says, adding that if OSHA does an investigation and an employee doesn't speak English very well, "we'll bring back [an OSHA employee] who speaks Spanish. We always have to interview the employees."

Ron Jester, extension safety specialist at the University of Delaware, says superintendents who want to train their

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Positive reinforcement for safe actions is also a good motivator when training workers.

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Hispanic workers effectively must “understand that cultural distinctions lead to different ways of thinking.”

“Safety trainers need to understand the motivation of Hispanic workers,” Jester says. “If you tell an American (Caucasian) worker that he could get sick and die if he doesn’t wear a respirator, you will motivate him [to wear one]. With Hispanic workers (whose culture places a high importance on “family”), you need to say, ‘If you fail to wear this respirator, you could get sick and be unable to provide for your family.’”

Superintendents who want to train Hispanic workers effectively should also consider using Hispanic safety-training instructors, whenever possible, and should provide hands-on training, which allows workers to actually demonstrate the personal protective equipment or other equipment they will use, Jester suggests. Positive reinforcement for safe actions is also a good motivator when training both Hispanic and non-Hispanic work-

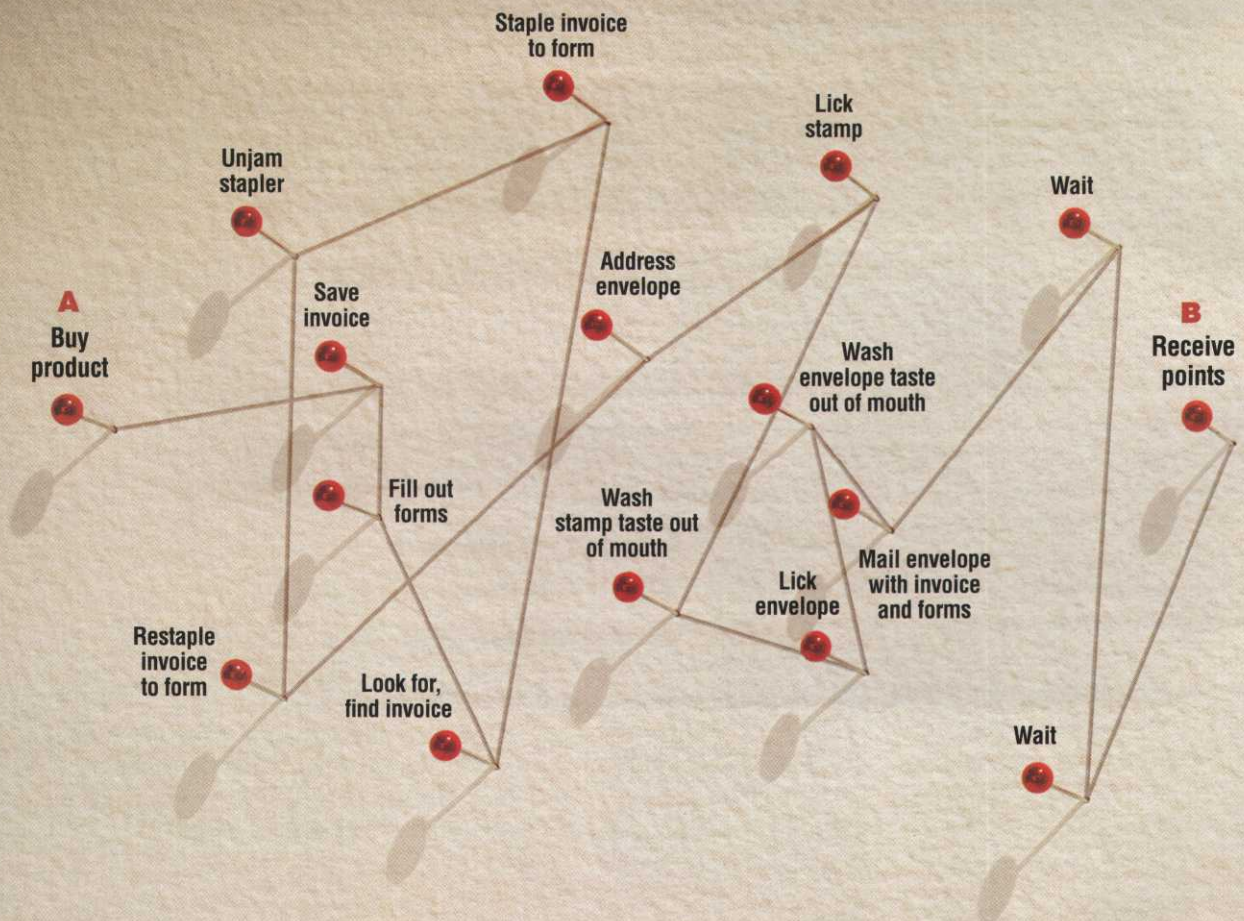
ers, he adds.

“Unless Hispanic workers trust you, they may not be willing to discuss training and work procedures,” Jester continues. “Consequently, using Hispanic instructors will often relax trainees, and they are more comfortable asking questions. Hands-on training with positive reinforcement is an excellent way to increase safety understanding.”

Being proactive

Regardless of the composition of your work force, there are many steps you can take to increase the safety of your employees and stay out of trouble with OSHA. Steve Numbers, superintendent at Westfield Group Country Club in Westfield Center, Ohio, says that because his golf course is owned by an insurance company, “being proactive about safety is an easy sell.”

Numbers says Westfield has an annual safety and loss prevention inspection, where the owners inspect both golf courses and make recommendations for improvements as



needed. Those improvements could have to do with things ranging from proper oil storage to marking of exits.

"We also have a safety committee for the company. Each of the two golf courses has a representative on it that goes to the meetings once a month," Numbers says.

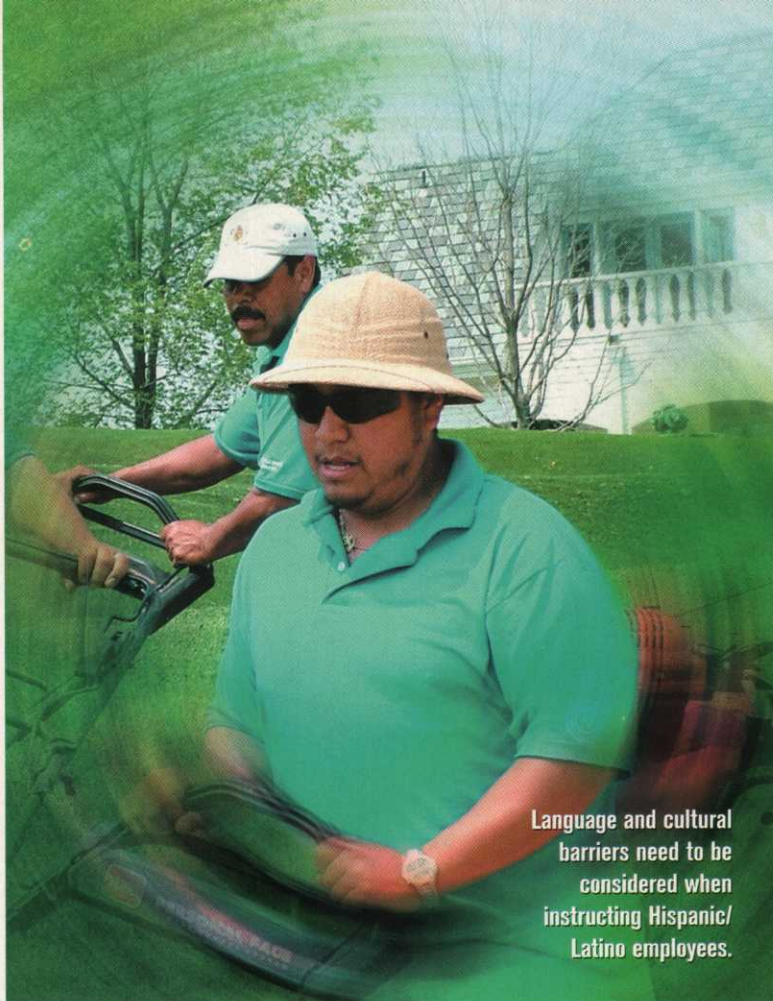
Even if an insurance company does not own your course, you can ask your workers' compensation carrier to assist you in conducting regular on-site safety audits. These persons often have checklists that you can use.

Numbers says his golf course also does the following, which can be done by any golf course, to be more safety-conscious:

- ▶ Displays safety-first emergency procedures in all areas — what to do in case of a fire, power outage, tornado, broken water pipe, chemical spill or gas leak, as well as what to do "if someone should threaten you on the phone or in person" or send a suspicious package.

- ▶ Strictly enforces safety rules, such as when hard hats or respirators must be worn.

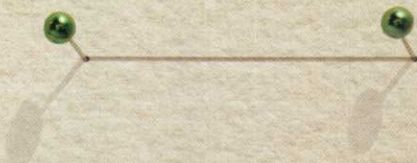
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Language and cultural barriers need to be considered when instructing Hispanic/Latino employees.

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Effective Safety Training for Hispanic Workers

✓ **Conduct training orally and in a language your workers understand.** Remember that there are different dialects of Spanish. If most of your Hispanic workers are from Mexico, enlist the help of a bilingual Mexican worker or supervisor.

✓ **Do not assume that all of your workers can read** — even in their own native language. Educational opportunities in other countries are often very limited.

✓ **Use drawings, photos and other visual aids to supplement your training.** But don't rely on a video alone, even one in Spanish. Make sure someone is available who can answer workers' questions.

✓ **Understand your workers' cultures.** Know, for example, that in many Hispanic cultures it is considered disrespectful to question persons in authority or to maintain direct eye contact.

✓ **Make sure all key safety signage is in both English and Spanish,** and that it includes symbols (pictures) if at all possible.

✓ **Consider a mentoring system** where a more experienced Hispanic employee is paired with a new Spanish-speaking employee to explain safety issues and assist in any safety-related problems.

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▶ Holds training programs each spring on cardiopulmonary resuscitation (CPR), lightning and other safety issues.

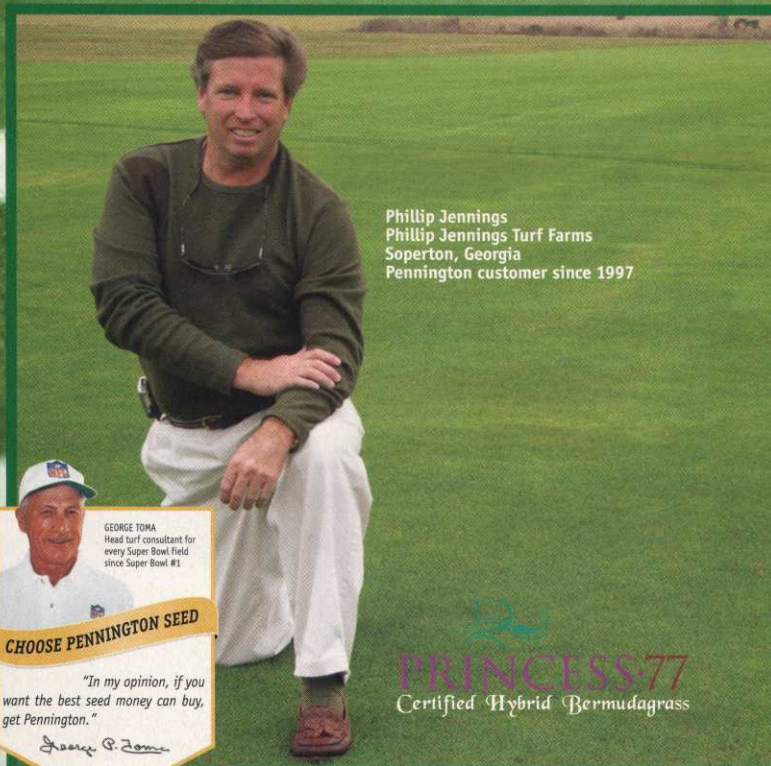
▶ Has employees mark off items on weekly checklists to ensure they remember to wear their safety goggles and follow other safety-related rules.

"Safety training does not have to be expensive," Riordan says. "OSHA materials are available free online (www.osha.gov), and we can help direct superintendents to other resources, such as the State OSHA Consultation Service. Also, superintendents are good about networking — they can call their peers and find someone with a good safety program.

"Golf course facilities need to make sure they're in compliance with all OSHA regulations," Riordan continues. "And you have to have zero tolerance when someone violates a safety rule at your golf course." ■

Barbara Mulhern is a freelance writer from Belleville, Wis.

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YOUR BEST PROTECTION FOR THE STRESS THAT LIES AHEAD

With last year's disaster at Shinnecock Hills Golf Club still fresh on many minds, the United States Golf Association (USGA)

has created a list of 14 points that guide the process of conducting the tournament. Here's what I hear the 14 points entail:

1. When 36-hole leaders are at 5 under or better, ratchet up course conditions. If a green becomes too fast for play, tell the media it was a mistaken rolling or faulty weather prediction that caused it.

2. Try not to alter media spin between Saturday, Sunday and Monday mornings. Use phrases like, "It has been brought to our attention;" and, "For some reason a different person on the grounds staff rolled that green today." This instills sense that you, as a committee person, are not really hands-on.

3. If a par 3 turns into a farce, have the organization's executive director make a joke on television about it being the toughest par 4 in America. Humor purportedly distracts from the gravity of the situation, although I never learned that at Stanford.

4. Ask NBC not to show image of green that was "mistakenly rolled" just as it is being double-cut. That might send the wrong message that "mistaken rolling" and the "wrong weather forecast" weren't the case.

5. If you are the director of rules and competitions and The Golf Channel's Rich Lerner asks if you're going to water the already-baked greens on Saturday evening during a howling wind, say that the course is "right where you want it." You can always blame the antiquated irrigation system later.

6. If one of our good friend\$ at NBC would like an interview during times of trouble, comply, even if it puts you in the position of speaking about issues you have no control.

7. When NBC's Johnny Miller declares a hole "unplayable," then and only then do you stop play to apply water to help keep balls from rolling off the green.

8. Schedule the USGA president for a photo-op presentation at the NBC booth on Sunday to soak up feel-good vibes after puff-piece shows him high-fiving underprivileged

Dipping Into USGA's 14-Point Spin Cycle

BY GEOFF SHACKELFORD



DEFLECT ALL

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youth during staged clinic. If questions come up about course set-up issues, blame "perfect storm" of wind, sun, hole location and an accidental rolling that never happened.

9. When NBC's Dan Hicks jokes that you've gone from talk of growing the game to growing grass, act nobly like USGA President Fred Ridley did: Do not encourage Hicks or any form of humor. That's very dangerous.

10. Deflect all player criticism as just standard behavior of today's spoiled tour pro. If the critical player in question did not break 80, have staff member suggest that the player "gave up after the first hole."

11. Following the tournament, send a letter to host club apologizing for insinuation that the staff or volunteers did something wrong. Do not make the letter public, but make sure that the following groups scrutinize the letter: USGA in-house legal, our lobbyist/public relations firm Powell-Tate, Lee Abrams at Mayer, Brown & Platt, all attorneys on the executive committee and any other willing lawyers.

12. Going into following year's U.S. Open, use confusing and irrelevant baseball metaphors to distract skeptics, just as our executive director recently did when he told *The Los Angeles Times*: "I have told our people that we took one high and inside. So don't dust yourself off and dig in like Willie Mays."

13. Have USGA Green Section staffer write e-mail to critical writer suggesting that column writing is a dubious way to make living. Then let staffer go back to writing his reports.

14. When all else fails, recite former USGA President Sandy Tatum's line that states, "We're not trying to humiliate the best players, we're trying to identify them." It never fails. Well, almost never.

Contributing editor (and satirist) Geoff Shackelford can be reached at geoff@geoffshack.com.

TURFGRASS TRENDS

FERTILIZATION

Nitrogen Uptake and Leaching on Greens

What are the implications for superintendents?

By Karine Paré and William J. Johnston

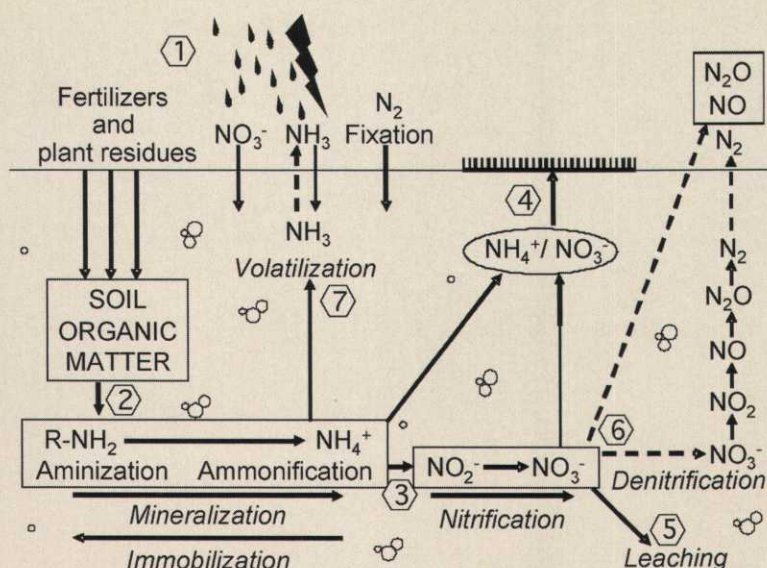
Superintendents know that management of putting greens is an art. Greens are often made of high-porosity sand that does not retain water or nutrients very effectively. Also, putting green grasses are cut extremely short, which does not allow a deep root system to develop and take up nutrients from deep in the soil profile. Therefore, putting greens require frequent irrigation and fertilizer applications to maintain high turfgrass quality.

Superintendents need to be aware that such management increases the potential of fertilizer leaching into ground water. Nitrogen (N) leaching can occur on putting greens, but the intensity is highly variable (Brown, 1982; Mancino and Troll, 1990; Shuman 2001).

In order to prevent the escape of N fertilizer applications into the environment, it is important to understand how N cycles in the turfgrass environment (Figure 1).

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FIGURE 1



Nitrogen cycle (modified from Havlin et al., 1999).

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