

If you had to defend golf, courses and your profession – could you?

Here's the case every superintendent should know well

As someone involved with the game of golf, you may already be aware that golf courses are sometimes criticized for "damaging the environment."

The use of turf chemicals, the impact on water and soil quality, and the amount of irrigation water used are cited most often as public concerns about the golf industry.

Although most authorities agree that the maintenance of golf courses has comparatively little negative impact on the environment, we at the Golf Course Superintendents Association of America (GCSAA) believe that these issues must be addressed. And, through a comprehensive effort combining research, education and communications, GCSAA is leading the golf community's effort to minimize the potential for ecological harm resulting from course maintenance.

However, the biggest problem we have is public perception — or, more accurately, public misperception — about the environmental impact of courses. These inaccuracies, if left uncorrected, could pose a serious threat to the vitality and integrity of the game.

You can help GCSAA change perceptions about our industry by reviewing the following overview and sharing this information with elected officials, decision-makers and others with whom you have contact. Please do not hesitate to pass this information to others who share our belief that golf is good for the environment.

1 Research has shown that golf courses do not contribute significantly to groundwater contamination. Several university and government studies (in Massachusetts, New York and Florida) indicate that when properly applied, pesticides and fertilizers used today on golf courses do not leach into groundwater in any significant amounts.

2 Modern turfgrass management practices (such as the use of slow-release nitrogen formulations) can greatly reduce the potential for nitrogen leaching or runoff into water supplies. The organic (thatch) layer in healthy turfgrass also significantly reduces the potential for nutrient "movement."

3 An 18-hole golf course averages 140 acres. Pesticides and fertilizers are used only on certain portions of the golf course. The majority of the property often consists of natural areas that are not maintained with chemicals. These low-maintenance areas usually provide a home for wildlife, and include a diverse variety of native plants and large stands of trees.

4 Golf course superintendents are among the best-educated and most judicious users of chemical management tools. Today, most superintendents have university degrees in agronomy, horticulture or a related field. More than 3,500

superintendents also pursued continuing professional education through GCSAA last year. Although most golf courses do not apply "restricted-use" pesticides, virtually all courses with GCSAA members have at least one staff person who is state-certified in the safe handling and use of these chemicals.

5 Because turf chemicals are often expensive, golf course superintendents have an economic incentive not to apply them. What's more, many superintendents entered the profession because of a love of nature and the outdoors and are strongly committed to conservation. In a recent survey, superintendents said they give extremely high priority to selecting maintenance practices that do not have a negative impact on the environment.

6 Golf courses typically compost grass clippings, thus reducing unnecessary contributions to America's landfills. Grass clippings and leaves are usually composted in low-maintenance areas of the course. In some cases, the compost is recycled for use as a natural soil amendment. Composting is a growing and recommended practice for golf course operations.

7 The water used on golf courses can be an excellent investment in both economic and environmental terms. Irrigated golf courses generate billions of tourist and property tax dollars for state economies. (America's golf courses are also bringing an increasing number of international tourists to the United States.) When effectively irrigated, healthy turf provides numerous environmental benefits.

Properly maintained turfgrass:

- ◆ produces oxygen (carbon dioxide exchange)
- ◆ removes pollutants from the air
- ◆ cools the atmosphere (acts as a heat-sink)
- ◆ absorbs sound and glare
- ◆ prevents erosion
- ◆ filters natural and synthetic contaminants from rainfall and irrigation
- ◆ recharges critical groundwater supplies
- ◆ provides crucial "greenspace" in urban settings.

Beyond these benefits, computerized irrigation systems and improved turfgrass varieties now allow courses to use less water more efficiently to achieve the same level of conditioning.

Continuing research will provide even more "low-water" turfgrass varieties in the future.

8 GCSAA and the entire golf community are firmly committed to seeking answers through research. The United States Golf Association is funding a three-year \$3 million research that will provide a number of those answers. ➔

9 In addition to turf-related benefits, courses provide other important ecological and community assets. Golf courses are:

- ◆ key sanctuaries for birds and other wildlife.
- ◆ disposal and treatment sites for (effluent) wastewater.
- ◆ attractive and environmentally sound “covers” for closed landfills and other ecologically damaged sites.
- ◆ places for non-golf recreational activities such as jogging, walking, birdwatching, cross-country skiing and fishing.
- ◆ businesses that provide hundreds of thousands of skilled and semi-skilled jobs.
- ◆ places for social interaction and community events.
- ◆ civic benefactors that give major contributions to charities.
- ◆ the keystone of a multi-billion-dollar industry nationwide.
- ◆ community improvements that add value to land, thus increasing local tax bases.

10 On golf's behalf, GCSAA has developed a strong and cooperative relationship with the U.S Environmental Protection Agency and other major regulatory groups. Though governmental affairs, professional education and public information, the association strives to make environmental responsibility a basic precept for its members.

Golf has the motivation, the resources and the willingness to address the issues now, before environmental questions seriously impede the growth of the game. By pursuing this enlightened path, it is hoped that golf will be increasingly perceived as a model environmental industry of the 1990s.

Endangered Species Act to be implemented

The Endangered Species Act will be implemented this fall and enforcement will follow at the end or next year,” said Steve Johnson, director of field operations for EPA's office of Pesticide Programs. EPA has not explained how the potential areas of habitation and lists of specific endangered species will be communicated to end-users of pesticides. States are also having a tough time mapping areas and marking buffer zones for pesticide restrictions. Look for more information about the Endangered Species Programs in the month ahead. GCSAA is staying in close contact with EPA on this issue.

U.S. government now favors stopping local pesticide laws

The Bush Administration now favors amending FIFRA to prohibit local governments from regulating the sale and use of pesticides, according to Victor Kimm, deputy assistant administrator for EPA's office of prevention, pesticides and toxic substances. This reversal of opinion was presented as testimony to the House Subcommittee on Department Operations, Research and Foreign Agriculture, Committee on Agriculture, on March 4.

Kimm said that EPA had weighed the competing policies, and the administration now believes that a political subdivision of a state should be prohibited from regulating pesticide sale and

use — unless the state has acted affirmatively to allow local regulation. Kimm added that any local regulations that went into effect before Jan. 1, 1992, should remain in effect unless the state acts affirmatively to pre-empt them.

“We wish to make it clear that such an amendment would not affect the exercise of local authority pursuant to any other federal laws. Similarly, due change would not affect current federal authority under FIFRA or statutes regarding pest control and eradication,” Kimm said.

EPA wants to wipe out ‘gray language’ in pesticide labels

EPA is reviewing several pesticide labeling issues that topped the concerns reported on a survey of state and regional EPA offices. “Gray language” is one of the major concerns, according to the survey.

State regulators said they prefer requirements like “do not” and “shall not” over unenforceable advisory statements like “should not” or “avoid drift.” Another leading concern is whether hazard statements apply to both the concentrate and the diluted product, or only to the concentrate.

Superintendents should continually look for changes in labels, especially in the language concerning safety precautions and re-entry requirements.

FIFRA panel says re-entry label requirements apply to everyone

The State FIFRA Issues and Research and Evaluation Group's (SFIREG) working committee on enforcement and certification has decided that re-entry requirements on pesticide labels prohibit all persons from re-entering an applied area.

“If the label states, ‘Do not enter treated area within 24 hours,’ we interpret that as saying no one, including golfers, can enter that area within 24 hours,” said John Longnecker, committee chair and chief of Pennsylvania's Division of Agronomic Services.

The statement was made as part of the SFIREG report to the American Association of Pesticide Control Officers annual meeting in Arlington, Va.

Longnecker also said his committee has asked EPA for proposed rules to clarify the label wording. Superintendents concerned about label warnings should contact their state pesticide control official.

Steve Johnson, director of field operations for EPA's Office of Pesticide Programs, has issued a plea for more information from state pesticide officials. Johnson says his office not only needs to know the number of violations and amount of fines, but also more specific information about the violations themselves — the types of violations and whether they were determined to be willful.

“We need this information to determine the direction and help fulfill the intent of our regulations,” Johnson said. “The more we know, the better decisions federal regulators can make.”