

'Legal Era' of Pesticides Sorry State of Morale Pre-Emergence Crabgrass Herbicides



BRUSH UP on your knowledge about courts of law, the keynoter of the Ohio Turfgrass Conference advised those who handle pesticides.

"This last year has seen a proliferation of legal proceedings of all shapes and sizes, and in quantity greatly exceeding the total of all the prior years of regulation put together," stated Bernard H. Lorant, pesticide consultant and former vice-president of research and development for Velsicol Chemical Corporation.

"We have entered a new, in some respects, ominous, but perhaps necessary era in the consideration of pesticides. I call it the legal era; the era when scientific questions will be settled by formal, adversary proceedings in the courts, or in quasijudicial arenas. More frequently, questions of efficacy and safety for pesticides will be decided by lay judges.

"That the pendulum will swing too far on the ecology side, to the detriment of all, seems likely."

The pesticide industry will continue indefinitely, however, predicted Lorant, because pesticides are required. He defined two doctrines that he believes will shape the industry. The "essentiality" doctrine is the concept that a pesticide will not be used unless its use is essential and there is no safer pesticide that can substitute for it. The "preemption" doctrine-or rather the lack of it—is seriously affecting pesticide progress, he said. The proliferation of diversity of state legislation regarding pesticide application, efficacy and safety standards, and licensing is rapidly making the cost of marketing new products prohibitive.

While Lorant's remarks gave cause for pessimism, Dr. Herb Cole, Jr., Penn State University pathologist confessed that "nothing disturbs me more than the sorry state of morale regarding pesticides."

"It greatly grieves me that the issue has become polarized. Somewhere in the middle we should be moving."

Recognition of some simple truths should help establish in the public mind a place for pesticides in the whole scheme of things, he said, among them:

-Pesticides should not be regarded as a pollutant along with other sources. Pollution from industry, he contended, comes from products that have no use to man.

—Pesticide food residue hazards? Very little is known about the hazards to human health from "nature's foods." Spinach causes kidney stones in frogs and and turnips can bring on thyroid problems, he illustrated.

—While the balance of nature may keep pests and pathogens in check, the swing of the pendulum is pretty harsh. "John F. Kennedy became president of the U.S. because of the balance of nature," he claimed, citing as the basis the rampage of the Irish potato blight that caused the starvation of $2\frac{1}{2}$ million Irishmen and the emigration of thousands of others, including the Kennedys, and subsequent settlement in the U.S.

--Pesticides are not uniquely hazardous because large doses are harmful. "All materials are toxic if the amount is large enough," he reminded.

—Monoculture is asking for trouble—witness corn and southern leaf blight, Merion bluegrass and striped smut, and the American Elm and Dutch elm disease.

Also with consternation, Dr. Cole exclaimed: "Why have we as landscaping and turf specialists fought against becoming professional? Concerning licensing examinations and standards, we have defended to the death the right of every nincompoop to use anything he wants."

Harold L. Porter, chief of Plant Industry, State Department of Agriculture, explained the provisions of Ohio's new Pesticide Use and Applicator Act. Commercial pesticide applicators will be licensed in the classifications in which they demonstrate their competence through examination. They can elect to take examinations in as many as nine categories.

Among technical papers presented, Robert W. Miller, Extension agronomist reported on testing of pre-emergence herbicides for effectiveness against crabgrass.

While several materials gave 90% to 100% control, they were less effective in controlling silver crabgrass, he said.

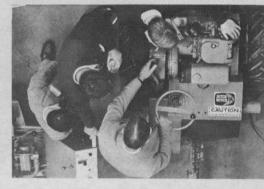
Herbicides tested were Bandane, Balan, Betasan, Arsenate, Dacthal, Tupersan, and Azak. All gave excellent control of crabgrass and foxtail except Arsenate which gave erratic results on all annual grasses but poa annua in the test. The herbicides gave fair to good control on More than 1,150 persons made it the biggest Ohio Turfgrass Conference yet. Representative pictures here offer a capsule look at the people and types of equipment and products that were brought together in Cincinnati's new convention center.

CONFERENCE



silver crabgrass with the exception of Betasan and Azak which gave only poor to fair control. On poa annua, one of the most troublesome annual grasses on golf courses, all listed herbicides, including Arsenate, gave good control except Tupersan, said Miller. Control ratings for





poa annua were based on how well the herbicide prevented plants from establishing from seed. Eliminating established poa annual was not considered in this rating, he said.

Miller explained the importance of proper use of herbicides to get the desired results. He said that no pre-emergence herbicide is completely safe to use on all turfgrasses. Some grasses are more sensitive than others to a particular herbicide. Therefore, Miller suggested that users stick strictly to recommendations when applying any one of the herbicides.





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