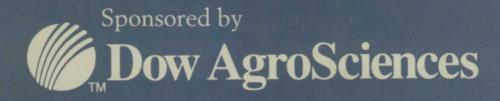


### for Today & Tomorrow



### New Chemical Class of Insect Control

urf and ornamental professionals know it takes a unique combination of nature and nurture to create a beautiful landscape. Now, a new spinosyn chemical class offers a pest management tool derived from a *naturally occurring* organism for their IPM programs. It's an innovation pairing high efficacy with a profile that can save time, money and environmental concern.

Known as Conserve\* SC (suspension concentrate) turf and ornamental insect control, this tool offers quick and effective control of a wide variety of tough insect pests, including sod webworms, cutworms, armyworms, and ornamental pests like leafminers and thrips.

Derived from the fermentation of a naturally occurring organism, Conserve offers rapid control at very low rates. Plant damage ceases immediately, and control is evident in one to three days.

At the same time, it has a profile that includes:

A "Caution" signal word, indicating reduced risk.

A four-hour WPS reentry interval.

Conserve can also be used without worry about phytotoxicity on all turfgrasses and most ornamentals.

Conserve should be applied when insect pests are young and vulnerable — just prior to the point of turf or ornamental damage. When pests are exposed to it through ingestion or contact, it acts on their nervous system's nicotinic acetylcholine receptors, stops their feeding on plant materials and quickly eliminates them.

Its unique mode of action makes it an excellent product for use with IPM programs or rotation programs designed to



fight resistance. All this without sacrificing efficacy or efficiency.

For more information about Conserve, contact your Dow AgroSciences representative or the Customer Information Center at 1.800.255.3726.

\*Trademark of Dow Agro-Sciences LLC

Conserve\* SC Turf & Ornamental Insect Control



# Taking control, responsibly

h, the damage they do. From chewing insects such as webworms and cutworms that directly consume plant tissue leaving holes or notches in grass blades, to sucking insects such as aphids and chinchbugs that actually pierce plant tissue and withdraw sap, insects can cause a lot of damage to turf, and to your business.

#### Line of Defense

How to stop them? The best control will be achieved through a multi-faceted approach — the philosophy behind IPM. The goal of IPM is to manage pests and the environment while balancing costs, benefits, public health and environmental quality. By taking advantage of some of the most effective pest control options available, you'll keep pest damage to a minimum:

• Natural Forces. Take ad-



vantage of nature. Consider climate and adverse weather conditions, soil type (heavy, poorly drained soils, for example, favor some pests) and the food and water supply pests need to live.

• Host Resistance. Many pest-resistant turfgrass varieties are available to keep pest populations below harmful levels.

• Cultural Control. Keeping turf healthy is the best defense against insect aggression. Fertilize properly, water deeply and infrequently, mow at recommended heights (never cut off more than 30 to 40 percent of the grass blades in any one cutting); cultivate properly to keep turf strong and less vulnerable to environmental stresses.

• Plant Tolerance. When damage is occurring, find a threshold level the plant can tolerate.

• Insecticidal Control. Look

to Dursban\* insecticide. Dursban offers economical control of more than 140 insect pests including worms, ants, fleas, ticks, mole crickets, aphids and chinch bugs.

### A balanced approach

When using insecticides, consider factors that can affect their performance. Here's what to consider doing to enhance their performance while still adhering to the principles of IPM: • Fertilize

regularly. Insecticides work best if an annual fertilizer program is followed along with cultural practices to strengthen turfgrass plants before pests attack.

• Identify the pest. Before applying an insecticide, positively identify the species of pests in the environ-

ment. Make sure the insect appears on the insecticide label to be applied.

• Research pest life cycles. Knowing when to control is as important as knowing what pests to control. Strike when they are most vulnerable, usually when insects are in early larval or nymphal stages. That's when they are more susceptible to treatment.

### Effective and Economical

Dursban is available in various formulations including liquid, wettable powder in premeasured water-soluble packets, granules and on fertilizer; and offers long residual control. No wonder it has remained the industry standard for professionals for more than 30 years.

Dursban is recommended for use on all cool- and warm-

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fgrasses and can be used to treat most landscape-grown ornamentals. It can be tank mixed with most other insecticides for application to turf or ornamental plantings, broadening the spectrum of pest control. It binds with thatch and organic matter in soil, and resists leaching even in heavy rainfall.

IPM programs rely on a balanced use of control measures. For lawn care and landscape professionals, following IPM simply means more vigorous turfgrass and plants, pest identification and more efficient use of chemicals. Dursban provides effective control at low rates, which allows *you* to take control — responsibly.

## **Gallery Ensures** *Picture Perfect Landscapes*



As Rick Johnson, the seasonal color and chemical manager for Mid-America's in-house landscaping crew puts it, "We take a lot of pride in creating and maintaining beautiful landscaping and flower beds for our 27 regional complexes. They're not just landscapes, we like to think of them as showcases."

Johnson designs the landscaping, chooses the seasonal color, and develops the pest control plan for all of the properties' turf and landscaping. Johnson's efforts must be paying off because Mid-America Apartments are famous throughout Tennessee for their



Gallery

ep Out of R Children meticulous grounds keeping.

Johnson and his crew scour the garden shows in the winter to find the newest and most beautiful flowers and ornamental plants for their properties. They redesign their landscapes in both the spring and fall with approximately 20,000 new colorful blooms during each of the two seasons. This is in addition to the thousands of tulips that come up like clockwork each spring.

### Keeping Weed Worries at Bay

Because of the emphasis Mid-America places on superior landscapes with exceptional curb appeal, Johnson is particularly diligent about controlling weeds.

"Because of the huge investment we make in keeping the grounds beautiful, I simply can't tolerate weeds. Dandelions, clover, spurge—they're not only ugly, but they compete with turf and plantings for sunlight, nutrients and water."

With that in mind, Johnson prevents bothersome broadleaf weeds all year with timely applications of Gallery\* preemergence herbicide.

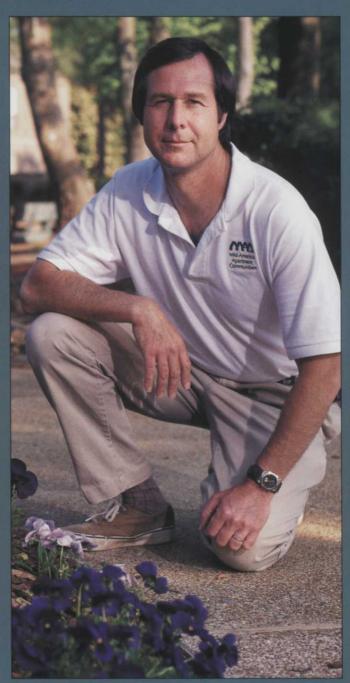
"I use Gallery because nothing else stops weeds like this product. It makes my job easier because it has a long residual and can be used on a large range of ornamental plants," says Johnson. In fact, Gallery can be used on 440 field-grown and 230 container-grown ornamentals, as well as most cool-and warmseason turfgrasses, and provides up to eight months control of even the toughest broadleaf weeds including dandelion, white clover and spurge. In all, Gallery stops 95 tough broadleaf weeds from ever emerging.

"I choose Gallery because it works. Our landscapes are weed free all season, and I like the fact we're preventing problems rather than trying to control weeds after they've erupted," says Johnson.

Stopping weeds before they emerge also offers budgetary benefits.

"Gallery saves time and ultimately money throughout the season because my crew is freed from hand-weeding or fighting tough broadleaf weeds postemergently. I'd rather spend one afternoon preventing weeds with Gallery than chasing them down all season long," says Johnson. **How Gallery Works** 

Gallery is unique. It stops weeds before they break the soil surface. For best results, apply Gallery in the spring or fall before weed seeds germinate. Spring applications prevent broadleaf weeds all through the warmer months, and fall applications prevent



Rick Johnson: "Our landscapes are weed free all season, and we're preventing problems rather than trying to control weeds after they've erupted."

both fall germinating weeds as well as those that would germinate the following spring.

Once activated by at least one-half inch of rainfall or sprinkler water, Gallery sets up a solid control area around weed seedlings. Gallery disrupts and halts root and stem development of the weeds so seedlings gradually die before breaking the soil surface.

For more information about Gallery, contact a Dow Agro-Sciences sales representative or call the Dow AgroSciences Customer Information Center at 1-800-255-3726.

### Reaping the Benefits of Preemergence Control

andscape professionals throughout the country know the beauty of green, healthy turf sur-

rounding groupings of flowers and shrubs cannot be undervalued. In addition to the aesthetic value, a vital, rich turf purifies and conserves water, helps prevent costly soil erosion and runoff. Weeds will not only damage the appearance of turf, but will reduce its quantity and quality by competing for sunlight, water, nutrients and space. Unfortunately, it only takes a few unsightly weeds to ruin the beauty and health of a well-cared-for landscape.

Surflan\* preemergence herbicide will help keep turf attractive by preventing more than 50 hard-to-control grassy and broadleaf weeds, including chickweed, crabgrass and goosegrass. Surflan has been used successfully by turf managers for more than 15 years. It also easily tank-mixes with Gallery\* preemergence herbicide in order to broaden the spectrum of broadleaf weed control even further.

#### Timing

Surflan must be applied before weed seeds germinate. In warm-season turf, Surflan can be applied in the spring for summer annual grass and broadleaf weed control, and in the fall for *Poa annua* and winter annual weed control.



Surflan\* Preemergence Herbicide

After being activated by at least one-half inch of rainfall or irrigation, Surflan sets up a "weed prevention zone" around seedlings, halting their development before they ever break the soil surface.

#### The Product of Choice

The chemistry of Surflan herbicide enables it to bind tightly with soil particles and makes it very low in water solubility. And because Surflan is low in volatility, it can wait for rain or irrigation for up to 21 days. So, even under extreme heat conditions, it won't break down like many herbicides in the marketplace. The versatility of Surflan makes it the preferred preemergent for many turf managers.

Instead of purchasing multiple products to meet their needs, increased efficiency is achieved by buying one product: Surflan. Managers will purchase less product overall and reduce the hassles of mixing and container rinsing.

And because it can be used over the top of more than 400 ornamentals, including annuals and bulbs, nothing is better suited than Surflan to sensitivesites like playgrounds,

parks, commercial areas or neighborhood yards.

### **Surflan Supply**

Recently, major improvements were made to the Surflan herbicide production facility which will help ensure that all orders will be filled on a timely basis throughout 1998. In addition, current Surflan supplies are up, so all pre-season orders can be filled.

So start planning now for the busy months ahead with Surflan preemergence herbicide.

For more information about Surflan, call Dow AgroSciences at 1-800-255-3726.

### **Trenton Thunders** Not the Only Team on the Field

he Trenton Center located in Trenton, N.J., hosts concerts, festivals, and baseball games; in fact it is home to the

Team Pro

Double A Baseball team the Trenton Thunders. Because of the level of activity at the Center, turf traffic is exceptionally heavy.

"We've reseeded in multiple areas of the field because of the heavy wear. Cleat damage alone tears the place up," says Chris Scaglione, owner of Spring Green Lawn Care located in Englishtown.

And traffic isn't the only challenge Scaglione faces at the Center. "We had put down Team\* Pro preemergent in the spring primarily to prevent crabgrass," says Scaglione. "Later, when we'd had up to 50 days with no rain with temperatures in the 90s, Team Pro was really put to the test. But even with those weather conditions, we didn't have to worry. Team Pro held up great."

Team Pro is Team\* plus the added preemergence prevention of key broadleaf weeds, including oxalis and spurge. This control comes from the same mixture of herbicides, Balan and Treflan, that's found in Team, but in a different ratio. This new ratio is even more effective on broadleaf weeds, yet still provides benefits of Team — such as exceptional crabgrass control (thanks to a high vapor pressure which spreads it



Scaglione: Better weed control for the money with Team Pro.

throughout the weed germination zone). And it's not only effective; it's more economical when compared to many other herbicides.

Scaglione notes, "Team Pro gives me far better weed control for the money than pendimethalin did, and it really prevented breakthrough. I'm glad I made the switch."

Scaglione makes two applications per year. "We put it down at recommended rates. One application in early spring,

> and another six weeks later on spots that I feel are 'crabgrass prone' those areas that receive high amounts of sun," he says.

Team Pro is available on fertilizer and is safe on established ornamentals. And, it won't stain customers' property like

pendimethalin. Informs Scaglione, "Team Pro is easy to work with. And it doesn't stain our equipment either."

Team Pro can be used on both cool-and warm season turf, and it offers increased consistency on everything from spurge to oxalis. Unfortunately, the Thunders performance hasn't been quite as consistent. The team made it to the playoffs in '96 but then failed in 1997. Scaglione believes he knows what prevented the team from going all the way. "The turf looks so good this year — it distracted the players," he jokes.

If you'd like further information about Team Pro or any other Dow AgroSciences product, call your Dow Agro-Sciences sales representative or the Dow AgroSciences Customer Information Center at 1-800-255-3726.

### **Dow AgroSciences** A Commitment to Science and Technology

By GARY DENHART, General Manager, Turf, Ornamental and Technical Products

he big picture—the panorama of the turf and ornamental industry-hangs on two pegs. On one side, scientific advances within the industry make new products available to our customers. On the other, new technologies enable explovice support beyond anything we could have dreamed but a decade ago. In the quest for innovation for lawn and landscape professionals, Dow Agro-Sciences has positioned itself to take full advantage of both scientific innovation and new technologies to speed the fruits of discovery to our customers. **Positioning for the Future** 

On January 1 of this year, DowElanco officially changed its name to Dow AgroSciences, reflecting its new status as a wholly owned subsidiary of The Dow Chemical Company. This followed Dow's acquisition of Eli Lilly and Company's portion of what was once a joint venture.

The consolidation and name change reflect our broad, strategic commitment to agricultural industries — from turf and ornamental, to crop production and urban pest control. They also strengthen our ability to fund new scientific discovery through our traditional pest control products and to bring you, the customer, the technologies needed to stay competitive in a changing market.

Also critical to this initiative is our majority ownership of the biotechnology venture Mycogen, which researches, develops and markets genetically enhanced, insect-resistant crops. This collaboration will teach us even more about the science of agriculture.

### **New Products in the Pipeline**

As we chart our course for the next millennium, we continue our commitment to commercialize one significant new product in a major global market each year. For example, the recent introduction of Conserve\* SC turf and ornamental insect control offers turf and ornamental professionals a new insecticide with the benefits of uct. Even as you read this, potential new products are traveling through our scientific pipeline so that we can be the first to offer you new and improved ways to serve your cus-

### Bringing it all to You

As technology drives our research forward, it also helps us to communicate it to you, to listen to you, and complete the circle by responding with more innovation. Communication is the critical link between our 20 research centers around the world and your day-to-day needs.

#### Web Site Coming

One way we accomplish this is through Internet technology — specifically a new Web site to debut in early April. Log on for complete product information, along with usage tips and other additional helpful data. In the future, look for even more ways to communicate through cyberspace.

Secondly, we continue to educate and promote environmental stewardship through various national, state and local professional associations, such as Responsible Industry for a Sound Environment (RISE), The Professional Lawn Care Association of America (PLCAA), Golf Course Superintendents Association of



America (GCSAA), and various other local state and national associations.

And last, but certainly not least, we promote the human touch, with more than 25 sales and technical support representatives dedicated to the turf and ornamental marketplace. If you have a question or concern, we would like to hear from you at our Customer Information Center, 1-800-255-3726.

Dow AgroSciences has been a leader in the turf and ornamental industry for more than 20 years. With your help, we can continue that leadership role as the industry continues to evolve.

**Dow AgroSciences**