The Story Behind the New Herbicide Milestone™

What’s the big deal about the new herbicide released by Dow AgroSciences?

The big deal is that it is rare for a new active ingredient to be developed for use on pastures and rangelands. California rangeland managers now have a herbicide that is labeled for fiddleneck control (note: Buctril® controls fiddleneck, but is not registered for rangelands) and a more economical tool for controlling other broadleaf weeds including star thistle. Milestone™ is registered in non-crop areas such as pastures and rangelands. Milestone™ is not a federally Restricted Use Herbicide, so a restricted materials permit is not necessary.

What is it?
The active ingredient in Milestone™ is aminopyralid. Aminopyralid controls broadleaf weeds by an auxin-inhibiting mode of action, thus making it fit into the growth regulator type of herbicides. Sound familiar? You may be thinking that this is similar to 2,4-D, which has been around for over 60 years. The difference between the two is in their chemistry group. Milestone™ is in the pyridine group, while 2,4-D is in the phenoxy group. Another common herbicide in the pyridine group is Transline® (Clopyralid).
What are auxins and how does that fit with these herbicides?

Auxins can be thought of as a plant's replacement for the nervous system. They are hormones that can regulate other hormones, as well as all stages of plant development. You can think of auxins as a balancer for the plant's development of organs and other types of structures. Synthetic auxin herbicides, such as the three mentioned here, mimic these natural auxins and are readily transported throughout the plant (systemic). They control weeds because they disrupt the natural auxin balance in target plants. Essentially, breaking the auxin balance causes abnormal growth of mature cells and prevents new cells from forming. This is why you see abnormal growth and leaves turning downward after spraying a plant with 2,4-D. Hence, these herbicides are known as growth regulators. Grasses differ from broadleaf (dicots) plants in their response to these herbicides (response to auxins, translocation, and absorption of herbicide), which makes them less susceptible to control.

Has it been tested and what are the results?

Dr. Joe DiTomaso, UC Cooperative Extension Weed Specialist at Davis has research experience with Milestone™. One year results from experiments in Oregon, Washington, Idaho, and California showed no statistical difference in starthistle control between Milestone™, Transline® or Tordon®. All materials applied at label rates resulted in over 90% control.

A trial in Davis, California in 2003 indicated that Milestone™ control was greater when starthistle was sprayed in the rosette stage rather than the bolting stage. The most successful application timing for starthistle control was December, January, and February. This suggests that spraying at earlier stages of weed maturity will lead to greater success.

Control of fiddleneck (Amsinckia menziesii) by Milestone™ was tested in Davis from November of 2002 to January of 2003. Results showed over 90% fiddleneck control when it was sprayed in November, December, and January. Specific research results from Dr. DiTomaso’s trials are available at the Tehama County Cooperative Extension office.

To simplify information, trade names of products have been used. No endorsement of named products is intended, nor is criticism implied of similar products that are not mentioned.

GLENN-COLUSA WOOL GROWERS SPRING BARBEQUE

Sunday, April 23, 2006
12:00 to 3:00 PM
Lamb or Chicken Lunch from 12:30-12:30 PM
The spring barbeque will be held at the Patton Ranch – 6352 County Road 27, Orland – ½ mile West of I-5 at Road 27 Exit.

Lunch is $10 for adults - $5 for children 6-12 years old – free for children 5 and under

Events include
- No-Host Bar
- Weight Guessing Contest
- Sheep Dog Demonstrations
- Silent Auction – Raising Scholarship Funds
- Ranch Tour of Sheep, Goats, and Cattle Operations
- Hand Spinners, Alpaca, Hair Sheep, and Meat Goat Exhibits

For information or tickets contact Jane Patton @ 865-7250 or jpatton@orland.net
USDA Releases New Animal Identification System (NAIS) Implementation Plan

On April 6th, USDA Secretary Johanns released a new plan for the implementation of animal identification. The previous timeline for the implementation of animal identification has not changed significantly. What the new plan includes is updates on how the program will actually be implemented. Of particular interest is the “integration of private and state animal tracking databases with the NAIS.”

The plan states that record keeping (animal tracking databases) will be maintained by both the State and private industry. Producer information, including animal movement data, will be kept by private industry databases. The State will contain a list of all individual animal identification numbers. Participating private industry database operators will report the premise identification numbers that are in their systems to the State. This will allow the State to know where to obtain this information if the need arises.

The State will do its part through the development of what USDA describes as a metadata system. USDA defines a metadata portal as essentially “data about the data.” What this means is that private industry will hold the more descriptive types of information (meaning a higher degree of confidentiality). The metadata portal, setup by USDA, allows the State to know how to obtain private industry’s data in the case of an animal disease outbreak. USDA’s implementations plan sets up criteria for Federal and State animal health officials to obtain the data held by private industry. These criteria, along with the new implementation plan, can be viewed on the web at: [http://animalid.aphis.usda.gov/nais/](http://animalid.aphis.usda.gov/nais/)

Throughout 2006, the integration plan between private industry and the State will be in an interim/development phase. Private industry run databases can currently apply for a cooperative agreement to participate in the program during this initial development phase. USDA plans to have the integrated system fully operational in 2007. When the system if fully operational, private industry participants will be evaluated for their compliance capabilities in order to continue their involvement with the National Animal Identification System. Private industry applications, along with their database requirements, are available on the web at: [http://animalid.aphis.usda.gov/nais/ain_system/ain_integration.shtml](http://animalid.aphis.usda.gov/nais/ain_system/ain_integration.shtml)

For more information contact Josh Davy at 530-527-3101

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**STEWARDSHIP DAY**

*Saturday May 6, 2006 8 AM – 3:30 PM*

*Sponsored by Sunflower Coordinated Resource Management Plan, Tehama County RCD, and UC Cooperative Extension*

*Hosted by Bill Burrows at the Burrows Ranch*

The day’s focus will be an interactive approach to demonstrating techniques for the management of livestock, rangelands, and natural resources. As a broad subject, many different areas will be covered, which provides a great deal of opportunities to learn something new.

For more information contact the Tehama County RCD @ 530-527-3013
Or Bill and Kay Burrows @ 530-529-1535
UC Sierra Field Station Field Day
April 20th 9 AM – 3 PM
Browns Valley
Contact: Josh Davy
530-527-3101

Glenn-Colusa Woolgrowers Spring BBQ
Sunday April 23rd 12-3 PM
Contact: Jane Patton 530-865-7250 or jpatton@orland.net

Fourth Annual Meat Goat Pen Sale
Saturday May 6th Tehama District
Fairgrounds 9AM – 2 PM
Contact: Keith Carly at 530-968-5038 carly@tco.net

Dr. Temple Grandin Comes to Red Bluff
Monday May 8th 5:30-8 PM
Contact: Josh Davy 530-527-3101

Sheep Shearing School
May 30th – June 3rd
Yorkville, CA
Contact: John Harper 707-463-4495