



Newsletter

Extension

Fruit ICM News

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Calendar

June 30: Ohio Fruit Growers Society Summer Tour and Meeting: The Ohio Fruit Growers Society (OFGS) and Patterson Family of Chesterland, Ohio invite fruit growers and direct agricultural marketers to the 2001 Ohio Fruit Growers Society Summer Tour on Saturday, June 30. Patterson Fruit Farm is a sixth generation fruit farm growing 45 acres of apples and strawberries. They have a farm market with a bakery and gift room, pick-your-own apples and strawberries, a seven-week Family Fun Fest in the fall and a wholesale cider business. Apple growers, berry growers, and direct agricultural marketers will all benefit from this information-packed program. Visit <http://www.pattersonfarm.com> for more information on their operation.

At the farm, participants will take a horse-drawn wagon ride to the Fun Fest area. This area will include scarecrow making and pumpkin painting, demonstrations on maze building, and pedal tractors; guests can also tour the treehouse and woods play area.

Participants can take an educational tour of the orchard, including IPM programs, pick-your-own with strawberries and apples, apple and strawberry production, wildlife management, and crowd control. Presenters at the farm tour will include Erik Draper, OSU Extension, Geauga County Horticulture Agent; Sandy Kuhn, Berry Coordinator; Ted Gastier, OSU Extension, Huron County Agriculture Agent; Bob Jenant and Reno Reda, ODNR Division of Wildlife; and Wayne Sperry, Patterson Fruit Farm.

Next, participants may board buses to ride to the Farm Market for a tour of the bakery, cider operation, packing area, and cold storage. Guests may also review Patterson's cider HAACP program and look over

the family golf course.

Farm/orchard tours begin at 8:00 a.m., with buses running to and from the farm market between 9:00 a.m. and 2:00 p.m. Bonus seminars include Hugh McPherson of Maize Quest from Pennsylvania, who will present "Discover Your Path to Entertainment Farming Through Mazes" from 2:15 to 4:15 p.m. near the Fun Fest area and is available for up to 30 people at \$10 per person. Ramon Battles with Tower-N-Pines (next door neighbor of Pattersons) will present an introduction to cut-your-own Christmas trees from 2:15 to 4:15 p.m. for all interested parties at no additional cost. Also, a Lake Farmpark Tour on good management practices with petting zoos (preventing E. coli O157:H7 contamination) will be available for up to 20 people for an additional \$10 per person fee and runs from 2:30 to 4:30 p.m. Pre-registration is requested for the maze and Lake Farmpark interactive seminars.

The registration fee for OFGS members is \$10 per person and \$15 per family (husband, wife and children under 18). Registration for non-members is \$15 per person and \$20 per family. Please park and register at the farm at 8765 Mulberry Road. Participants may join OFGS at the tour.

Contact the OFGS office by phone (614) 249-2424, fax (614) 249-2200 or e-mail growohio@ofbf.org for complete information.

Section 18 for Spartan on Strawberries

Source: United States Environmental Protection Agency, Washington, D.C., via Joanne Kick-Raack, OSU Extension Pesticide Education Coordinator

Attention Strawberry Producers: Help in controlling common groundsel is on the way for this year. The following is a letter dated June 15, 2001, to Diana Roll, Director of the Ohio Department of Agriculture's Pesticide Regulation

The Environmental Protection Agency hereby grants a specific exemption under the provisions of section 18 of the Federal Insecticide, Fungicide, and Rodenticide Act, as amended, to the Ohio Department of Agriculture for the use of use of sulfentrazone, formulated as bSpartan® 4F Herbicide (EPA Reg. No. 279-3220) to control common groundsel in strawberries. This specific exemption is subject to the conditions and restrictions set forth in your application as well as the following:

1. The Ohio Department of Agriculture is responsible for ensuring that all provisions of this specific exemption are met. It is also responsible for providing information in accordance with 40 Code of Federal Regulations (CFR) 166.32. Accordingly, a report summarizing the results of this program must be submitted to EPA Headquarters and the EPA Region 5 office by June 15, 2002 or prior to requesting another specific exemption for this use.
2. The product, Spartan® 4F Herbicide (EPA Reg. No. 279-3220), containing 39.6% sulfentrazone, manufactured by FMC Corporation, may be used. All applicable directions, restrictions, and precautions on the product label must be followed.
3. A maximum of 760 acres of strawberries may be treated.
4. Apply 4 to 8 fluid ounces of formulated product (0.125 to 0.25 lbs ai) per acre per application. Apply either a single application of no more than 8 fluid ounces (0.25 lbs ai) of Spartan® 4F Herbicide per

acre; or apply as a split application at renovation and dormancy. A maximum of 12 fluid ounces (0.375 lbs ai) can be applied per acre per season.

5. Applications can be made to the entire field as a broadcast spray or a spot treatment may be used to treat only those areas where targeted weeds are present or are expected. Applications may be made using ground equipment only. Application through any type of irrigation system (i.e., chemigation) is prohibited.

6. Sulfentrazone may be applied during two distinct time periods:

- Renovation: after harvest and immediately after mowing, June 20, 2001 through July 20, 2001 and
- Dormancy: from October 15, 2001 through December 15, 2001.

7. A 105-day preharvest interval (PHI) will be observed.

8. Combined residues of herbicide sulfentrazone N-[2,4-dichloro-5-[4-(difluoromethyl)-4,5-dihydro-3-methyl-5-oxo-1H-1,2,4-triazol-1-yl]phenyl]methanesulfonamide and its major metabolite 3-hydroxymethyl sulfentrazone N-[2,4-dichloro-5-[4-(difluoromethyl)-4,5-dihydro-3-hydroxymethyl-5-oxo-1H-1,2,4-triazol-1-yl]phenyl]methanesulfonamide, are not expected to exceed 0.60 ppm in or on strawberries. A time-limited tolerance will be established at this level in order to support this use.

9. An analytical methodology for the determination of sulfentrazone, 3-desmethyl sulfentrazone, and 3-hydroxymethyl sulfentrazone residues in or on various matrices was submitted with a petition for a sulfentrazone tolerance on soybeans (PP# 4F04407). A petition method validation (PMV) was successfully completed by the Agency's Analytical Chemistry Laboratory (ACL).

The Limit of Quantitation (LOQ) and Minimum Detection Limit (MDL) were determined to be 0.05 ppm and 0.005-0.025 ppm, respectively. The Agency concluded that the method is suitable for enforcement purposes. The method was forwarded to FDA for inclusion in PAM-II.

10. The EPA Headquarters and Regional office shall be immediately informed of any adverse effects or misuse resulting from the use of this pesticide in connection with this exemption.

11. The Agency has concluded that application of sulfentrazone proposed under this section 18 is not likely to have a major impact for environment/ecosystems due to small number of acres (760) treated. However, sulfentrazone is a very persistent and mobile pesticide that can leach to ground water and/or reach surface water by runoff. Therefore, the following ground-water label advisory, must be followed:

*Sulfentrazone is known to leach through soil into groundwater under certain conditions as a result of label use. Use of this chemical in areas where soils are permeable, particularly where the water table is shallow, may result in groundwater contamination. **Do no use on coarse soils classified as sand which have less than 1 percent organic matter.***

12. There are risk concerns for terrestrial and semi-aquatic plants from acute exposures to sulfentrazone. However, the endangered plants found in the state of Ohio should not be adversely affected by ground application of sulfentrazone on strawberries.

Any future correspondence in connection with this exemption should refer to file symbol 01-OH-03. If you have any further questions regarding this issue, please do not hesitate to contact Barbara Madden, of

my staff, at (703) 305-6463 or by e-mail at Madden.Barbara@epa.gov.

Note from Dick Funt: Spartan 4F herbicide should NOT be applied to green strawberry leaves. This herbicide can cause damage to leaves and should be used after leaves have been removed by mowing at renovation and within 48 hours of mowing before new leaves form. It should be used after three hard frosts (24 to 26 degrees F) in the fall after plants (leaves) are dormant. Spartan 4F herbicide has been tested in Ohio and has shown excellent results for common groundsel. Spartan 4F is a selective soil applied herbicide for certain broadleaf weeds, grasses, and sedges. The mode of action involves uptake by weed roots and shoots. It requires rainfall or irrigation (at 0.5 to 1.0 inches) to be activated or shallow incorporation within 7 to 10 days after application. Do not apply after December 15 or 105 days before harvest. Do not apply to saturated soils. Do not apply if heavy rainfall is predicted to occur within 24 hours following planned application.

Editor's Note: Further use of Spartan beyond 2001 for strawberries will be dependant upon factors such as your adherence to the above conditions and restrictions. **It is essential that you follow the ground-water label advisory as listed as #11 above.**

Apple Market Loss Assistance Battle-lines Being Drawn

Source: John Wargowsky - Ohio Fruit Growers Society

The U.S. Apple Association's (USApple) efforts, in coordination with the American Farm Bureau Federation (AFBF), to secure market loss assistance for our nation's apple growers has drawn the acute attention of the White House and congressional leaders. Your assistance in contacting members of Congress from Ohio, and especially those who serve on the House Agriculture Committee (Rep. John Boehner), is being urgently requested.

The following are talking points from the US Apple Association that you may use when contacting members of Congress about the pending apple market loss assistance legislation:

- America's apple growers are experiencing the worst economic losses in more than 70 years, having lost \$1.5 billion since 1996 and an estimated \$500 million during the past year alone.
- Current apple prices, which are as low as 40 percent below the cost of production, are pushing apple growers deeper into financial crisis and driving many family farms out of existence.
- The average prices received by growers for fresh-market apples in March 2001 were the lowest in more than ten years, falling 31 percent below prices in March 1999 and 29 percent below the five-year average.
- Unfairly priced imports, excessive regulatory costs, stagnant domestic consumption, food retail consolidation, subsidized foreign competition, diminished exports and global overproduction are all to blame.
- China recently re-emerged as the leading supplier of low-priced apple juice concentrate to the U.S. market, with imports of nearly 15 million single strength- equivalent gallons during the first three months of this year. The current price of Chinese concentrate has declined to \$3.50 a gallon, roughly half the cost of production, causing renewed economic injury to U.S. apple growers and processors.
- Food Quality Protection Act (FQPA) implementation has resulted in the cancellation or restriction

of use of three of the industry's most significant crop protection tools, and threatens countless others with elimination.

- Farm wage rates have risen by more than 40% over the past ten years, dramatically increasing the labor-intensive costs of producing apples.
- U.S. fresh apple consumption has remained stagnant over the past ten years at approximately 19 pounds per person annually, in part as a result of increased imports of competing fresh fruits and vegetables.
- U.S. fresh apple exports have declined in value by 23 percent since 1996, from \$408 million to \$315 million due to unfairly subsidized competition, unfavorable currency exchange rates, and barriers to trade.
- World apple production continues to climb due to dramatic increases in production in China, which recently surpassed the United States as the world's leading producer, supplying 44 percent of the world's supply of apples.

Apple Rust Mite

Source: Adapted from IPM News, Volume 7, #15, July 24, 1997 with modifications from Penn State
<http://tfpg.cas.psu.edu/part4/table50.html>

We are receiving reports of apple rust mite (ARM) in Ohio apple orchards. ARM is found in all apple-growing areas of North America. The mites feed on leaves, mainly on the ventral (lower) surfaces causing the undersides of the leaves to become brown or bronzed while the upper surfaces remain green. Under prolonged, heavy infestations (200 or more mites per leaf), leaves become leathery and take on a silver appearance.

Celeste Welty suggests that while this mite can be considered a pest because it does feed on leaves, it is rarely a problem when found at densities usually seen in orchards. Actually, ARM is thought to be somewhat beneficial because it is an alternate prey for predatory mites during periods when European red mite is scarce.

Apple rust mites are carrot-shaped and very difficult to see with the naked eye. Several university sources recommend that control measures be considered only if mite populations exceed an average of 200 per leaf with leaves selected on a random basis across the block.

Before applying sprays, determine whether the ERM and TSSM predator populations can develop rapidly enough to control ARM before they cause damage. Relative efficacy ratings of pesticides, from Penn State, based on a 1 to 4 scale with 1 = excellent control, 2 = good control, 3 = fair control, 4 = poor control are:

Pyramite - 1	Agri-Mek - 2
Diazinon - 2	Kelthane - 2
Thiodan - 2	Vendex - 2
Vydate - 2	Carzol - 3

Before using chemical ARM controls, carefully consider the possible disruption to predators and the increased likelihood of ERM flareups.

Insect Trap Catches By Week and Location

Apple

Week	Codling Moth			Redbanded Leafroller			San Jose Scale			Spot. Tent. Leafminer			OFM
	Cols.	East	West	Cols.	East	West	Cols.	East	West	Cols.	East	West	Cols.
4/2				0						0			
4/9				43						59			
4/16				24						11			
4/23	0			13		17	0		0	2		8	
4/30	6.7			2	27.5	77.3	6	0	0	3	675	175	
5/7	27.3			1	34.5	28.6	72	1.9	0	0	808	250	65
5/14	11.7	10.8		0	5.5	5.5	0	5.3	0	1	851	851	67
5/21	14.7	4.4	1.6	0	0	0	0	0	0	6	152.3	27	40
5/28	6.3	0.4	0.4	0	37.5	0	0	0	0	9	41.5	0	3
6/4	4	0.6	0.6	1	0	0	0	0	0.4	37	44.3	75	10
6/11	9.0	2.3	0.6	28	0	1.0	0	0	0	54	375	15	22
6/18	5.3	3.7	2.6	62	6.5	7.0	0	0	0	66		110	10

Peach

Week	Oriental Fruit Moth			RBLR		Less. Peachtree Borer			Peachtree Borer		
	Cols.	East	West	East	West	Cols.	East	West	Cols.	East	West
4/2	0										
4/9	0										
4/16	0	0	1								
4/23	1	0	1		52	0					
4/30	6	3.7	15.8	46	70	1					
5/7	47	23.3	18.8	43	60	3					
5/14	66	4.3	7.6	9.0	2.3	6	1				
5/21	65	4	2.4	0.7	0.8	4	9	13	0		
5/28	10	0.5	1	0	0	40	2	1.8	1	0	0
6/4	11	0.3	0.4	0	0	0	4	2	0	0.3	0
6/11	38	2.7	3.8	0	1	3	20.3	13.4	3	0.3	0.4

6/18	17	7.7	7.5	8.7	29	7	42	18	0	1.0	1.0
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Fruit Observations & Trap Reports

Insect Key	
AM:	apple maggot
CM:	codling moth
ESBM:	eye-spotted budmoth
LAW:	lesser apple worm
LPTB:	lesser peachtree borer
OBLR:	obliquebanded leafroller
OFM:	oriental fruit moth
PTB:	peachtree borer
RBLR:	redbanded leafroller
SJS:	San Jose scale
STLM:	spotted tentiform leafminer
TABM:	tufted apple budmoth
VLR:	variegated leafroller

Site: Waterman Lab, Columbus

Dr. Celeste Welty, OSU Extension Entomologist

Traps Used: STLM = wing trap, SJS = Pherocon V, Codling Moth = mean of 3 MultiPher® traps, Others = MultiPher

Apple: 6/13 to 6/20

STLM: 66 (up from 54)
 RBLR: 62 (up from 28)
 CM: 5.3 (down from 9.0)
 SJS: 0 (unchanged)
 OFM: 10 (down from 22)
 DWB: 0 (unchanged)
 TABM: 0 (down from 3)
 VLR: 2 (unchanged)
 OBLR: 1 (down from 6)

Peach: (6/13 to 6/20)

OFM: 17 (down from 38)
 LPTB: 7 (up from 3)
 PTB: 0 (down from 3)

Site: East District; Erie & Lorain Counties

Source: Jim Mutchler, IPM Scout

Traps Used: STLM=wing traps, SJS=Pherocon-V, Others=MultiPher®

Apple: 6/13 to 6/19

CM: 3.7 (up from 2.3)

SJS: 0 (unchanged)
OBLR: 1.2
RBLR: 8.0

Peach: 6/13 to 6/19)

OFM: 7.7 (up from 2.7)
LPTB: 42.0 (up from 20.3)
PTB: 1.0 (up from 0.3)
RBLR: 8.7 (up from 0)

Other pests include white apple leafhopper, potato leafhopper, green apple aphid, plum curculio strikes

Beneficials include: lacewing eggs, larvae, adults, orange maggots, white maggots, lady beetles

Site: West District; Huron, Ottawa, & Sandusky

Source: Gene Horner, IPM Scout

Traps Used: STLM=wing traps, SJS=Pherocon-V, PC = circle traps, Others=MultiPher® traps

Apple: 6/13 to 6/19

CM: 2.6 (up from 1.3)
RBLR: 7.0 (up from 1.0)
SJS: 0 (unchanged)
STLM: 110
PC: 0

Peach: 6/13 to 6/19

OFM: 7.5 (up from 3.8)
LPTB: 18.0 (up from 13.4)
PTB: 1.0 (up from 0.4)
RBLR: 29.4 (up from 1.0)
TPB: 0

Other pests include green apple aphid, white apple leafhopper, green peach aphid, green apple aphid, lilac borer, apple rust mite,

Beneficials include lady beetles, banded thrips, lacewings (all stages)

Phenology

Coming Events	Range of Degree Day Accumulations	
	Base 43° F	Base 50° F
Lesser peachtree borer flight peak	733-2330	392-1526
Spotted tentiform leafminer 2 nd flight begins	795-1379	449-880
San Jose scale 1 st generation crawlers present	987-1247	569-784

Akron - Canton	771	488	932	614	1132	778	1294	905
Cincinnati	1156	808	1336	953	1541	1123	1726	1273
Cleveland	786	513	945	636	1148	804	1309	930
Columbus	1076	746	1258	894	1478	1078	1655	1221
Dayton	1033	720	1213	865	1423	1040	1604	1186
Mansfield	792	512	953	638	1151	802	1320	935
Norwalk	793	519	960	651	1164	820	1326	946
Piketon	1137	783	1312	923	1522	1098	1711	1252
Toledo	807	529	983	670	1196	847	1359	976
Wooster	827	543	989	670	1185	831	1353	964
Youngstown	750	473	900	587	1083	736	1234	852

The Ohio Fruit ICM News is edited by:

Ted W. Gastier
 Extension Agent, Agriculture
 Tree Fruit Team Coordinator
 Ohio State University Extension Huron County
 180 Milan Avenue
 Norwalk, OH 44857
 Phone: (419)668-8210
 FAX: (419)663-4233
 E-mail: gastier.1@osu.edu

Information presented above and where trade names are used, they are supplied with the understanding that no discrimination is intended and no endorsement by Ohio State University Extension is implied. Although every attempt is made to produce information that is complete, timely, and accurate, the pesticide user bears responsibility of consulting the pesticide label and adhering to those directions.

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Keith L. Smith, Associate Vice President for Ag. Adm. and Director, OSU Extension.

TDD No. 800-589-8292 (Ohio only) or 614-292-1868

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