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Crop and Pest Management Guidelines

A Cornell Cooperative Extension Publication

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 FUNGICIDES FOR PEARS (/GUIDELINES/TREEFRUIT/INDEX93.ASPX) > ADDITIONAL SUMMER SPRAYS

Pest	IRAC & FRAC	Product	Rates	PHI (days)	REI (hrs)	Efficacy	Comments (see text)
Additional Summer Sprays							
Codling moth	1B	*Imidan 70W	2.13-5.75 lb/acre 0.75-1 lb/100 gal water	7	7-10 days	High	[6.1]
	22	Avaunt 30WDG	5-6 oz/acre	28	12	Moderate	[6.1]
	28	*†Altacor 35WDG	2.5-4.5 oz	5	4	High	[6.1,6.1c]
	28	*†Belt 4SC	3-5 oz/acre	14	12	High	[6.1]
	3A	*Baythroid XL 1EC	2-2.4 fl.oz./acre	7	12	Moderate	[6.1,6.1b,9.1a]
	3A	*Danitol 2.4EC	16-21.3 fl.oz./acre	14	24	Moderate	[6.1,9.1a]
	4A	Assail 30SG	4-8 oz/acre	7	12	High	[6.1,6.1a]
	5	Delegate 25WG	4.5-7 oz/acre	7	4	High	[6.1]
		§Carpovirusine 0.99SC	0.5-1 pt/100 gal water	0	4	Moderate	
		§Checkmate CM-F 14.3S	2.4-4.8 fl.oz./acre			Moderate	[6.2,6.2a]
		§Cyd-X 0.06SC	1-6 fl.oz./acre	0	4	Moderate	
	11A	§Deliver	0.5-2 lb/acre	0	4	Moderate	[6.1]
		§Madex HP	0.5-3 fl.oz./acre	0	4		
	11A	§Dipel 10.3DF	0.5-2 lb/acre	0	4	Moderate	[6.1]
	11A	§Javelin 7.5WDG	0.5-4 lb/acre	0	4	Moderate	[6.1]
	5	§Entrust 2SC	6-10 fl.oz./acre	7	4	Moderate	[6.1]
	5	§Entrust 80WP	2-3 oz/acre 0.67-1 oz/100 gal water	7	4	Moderate	[6.1]
	3A/28	*†Voliam Xpress	6-12 fl.oz./acre	21	24	High	[1.0,6.1,6.1c, 9.1a]
	3A/6	*Gladiator EC	14-19 fl.oz./acre 3.5-4.75 fl.oz./100 gal water			Moderate	[1.0,6.1,9.1a]
	4A/28	*†Voliam Flexi WDG	4-7 oz/acre			High	[5.1c,1.0,6.1, 6.1c]
4A/3A	*†Endigo ZC	5-6 fl.oz./acre	35	24	Moderate	[5.1c,1.0,6.1, 9.1a]	
4A/3A	*Leverage 360	2.4-2.8 fl.oz./acre	7	12	High	[1.0,6.1,9.1a]	
Comstock mealybug	16	*†Centaur 0.7WDG	34.5-46 oz/acre	14	12	High	[7.1,7.2]
	1B	*Diazinon 50WP	1 lb/100 gal water	21	96	High	[7.1,7.2,7.1b]
	21A	Portal 0.4EC	2 pt/acre	14	12	High	[7.1,7.2]
	23	Movento 240SC	6-9 fl.oz./acre	7	24	High	[5.1a,7.1,7.2]
	4A	*†Actara 25WDG	4.5-5.5 oz/acre	14/35(A)	12	High	

							[5.1c,7.1,7.1a,7.2a,17.2]
	4A	*Admire Pro 4.6SC	7 fl.oz./acre	7	12	High	[7.1,7.2]
	4A	Assail 30SG	4-4.8 oz/acre	7	12	High	[7.1,7.2]
	4A/28	*†Voliam Flexi WDG	7 oz/acre			High	[5.1c,1.0,6.1c,7.1,7.2]
		oil	1 gal/acre			High	[5.1c,1.0,13.1]
			1 qt/100 gal water				
			plus				
	6/4A	*†Agri-Flex SC	5.5-8.5 fl.oz./acre	35	12		
			1.5-2 fl.oz./100 gal water				
Crown rot	33	Prophyt	2-4 pt/100 gal water	0	4	High	[7.3a]
European red mite	10A	Apollo 4SC	4-8 oz/acre	21	12	High	[8.1,8.1a]
	10A	Onager 1 EC	12-24 fl.oz./acre	28	12	High	[8.1]
	10A	Savey 50DF	3-6 oz/acre	28	12	High	[8.1,8.1e]
	10B	Zeal	2-3 oz/acre	14	12	High	[8.1]
	20B	Kanemite 15SC	21-31 fl.oz./acre	14	12	High	[8.1,8.1b]
	21A	†Nexter 75WS	4.4-10.67 oz/acre	7	12	High	[8.1,8.1d,8.1e]
	21A	Portal 0.4EC	2 pts/acre	14	12	High	[8.1,8.1c]
	3A	*Brigade 10WSB	12.8-32 oz/acre	14	12	Moderate	[8.1,9.1a]
	3A	*Brigade 2EC	5.12-12.8 fl.oz./acre	14	12	Moderate	[8.1,9.1a]
	6	*Agri-Mek 8SC	2.25-4.25 fl.oz./acre	28	12	High	[8.1]
			0.5-1 fl.oz./100 gal water				
	UN	Acramite 50WS	0.75-1 lb/acre	3	12	High	[8.1,8.1a,8.1e]
	23	*†Envidor	16-18 fl.oz./acre	7	12	High	[8.1,8.1c,8.1g]
	12B	*Vendex 50WP	1-2 lb/acre	14	48	Moderate	[8.1]
			6-8 oz/100 gal water				
	3A/6	*Gladiator EC	19 fl.oz./acre			High	[1.0,8.1,9.1a]
			4.75 fl.oz./100 gal water				
		oil	1 gal/acre			High	[5.1c,1.0,8.1,8.1f]
			1 qt/100 gal water				
	6/4A	*†Agri-Flex SC	5.5-8.5 fl.oz./acre	35	12		
			1.5-2 fl.oz./100 gal water				
Fabraea leaf spot		Manzate ProStik	3.0 lb/acre				[3.3]
			1.0 lb/100 gal water				
		Topsin M WSB	1.0 lb/acre	1	48		[3.2]
			0.25 lb/100 gal water				
		Ziram 76DF	24.0 oz/100 gal water	14	48		
Fire blight		Agri-mycin	24.0-48.0 oz/acre	30	12		[2.4]
			0.5 lb/100 gal water				
		Firewall	24.0-48.0 oz/acre	30	12		[2.4]
			0.5 lb/100 gal water				
		Streptrol 17WP		30	4		[2.4]

24.0-48.0 oz/acre

			24.0-40.0 oz/acre				
Green fruitworms	1A	*Lannate 90SP	0.5-1 lb/acre	7	48	High	[9.1,10.1a]
	1A	*Lannate LV 2.4L	1.5-3 pts/acre 0.75 pt/100 gal water	7	48	High	[9.1,10.1a]
	28	*†Belt 4SC	3-5 fl.oz./acre	14	12	High	[9.1]
	6	*Proclaim 5SG	3.2-4.8 oz/acre 0.8-1.2 oz/100 gal water	14	12	High	[9.1]
	3	*Warrior II with Zeon Technology	1.28-2.56 fl.oz./acre	21	24	High	[9.1,9.1a]
	3A/28	*†Voliam Xpress	6-12 fl.oz./acre	21	24	High	[1.0,6.1c,9.1,9.1a]
	3A/6	*Gladiator EC	14-19 fl.oz./acre 3.5-4.75 fl.oz./100 gal water			High	[1.0,9.1,9.1a]
	4A/28	*†Voliam Flexi WDG	4-7 oz/acre			High	[5.1c,1.0,6.1c,9.1]
	4A/3A	*†Endigo ZC	5-6 fl.oz./acre	35	24	High	[5.1c,1.0,9.1,9.1a]
	4A/3A	*Leverage 360	2.4-2.8 fl.oz./acre	7	12	High	[1.0,9.1,9.1a]
Obliquebanded leafroller	11A	§Agree 3.8WS	1-2 lb/acre	0	4	High	[10.1,10.1b,10.2]
	18	*†Intrepid 2F	8-16 fl.oz./acre	14	4	High	[10.1,10.1a,10.2]
	1A	*Lannate 90SP	0.5-1 lb/acre	7	48	Moderate	[10.1,10.1a,10.1b,10.2]
	1A	*Lannate LV 2.4L	1.5-3 pts/acre 0.75 pt/100 gal water	7	48	Moderate	[10.1,10.1a,10.1b,10.2]
	28	*†Altacor 35WDG	2.5-4.5 oz/acre	5	4	High	[6.1c,10.1,10.1b,10.2]
	28	*†Belt 4SC	3-5 fl.oz./acre	14	12	High	[10.1,10.1b,10.2]
	3A	*Baythroid XL 1EC	2.4-2.8 fl.oz./acre	7	12	Moderate	[9.1a,10.2]
	5	Delegate 25WG	4.5-7 oz/acre	7	4	High	[10.1,10.1b,10.2]
	6	*Proclaim 5SG	3.2-4.8 oz/acre 0.8-1.2 oz/100 gal water	14	12	High	[10.1,10.1b,10.2]
	11A	§Deliver	0.5-2 lb/acre	0	4	High	[10.1,10.1b,10.2]
	11A	§Dipel 10.3DF	0.5-2 lb/acre	0	4	High	[10.1,10.1b,10.2]
	11A	§Javelin 7.5WDG	0.5-4 lb/acre	0	4	High	[10.1,10.1b,10.2]
	5	§Entrust 2SC	6-10 fl.oz./acre	7	4	High	[10.1,10.1b,10.2]
	5	§Entrust 80WP	2-3 oz/acre 0.67-1 oz/100 gal water	7	4	High	[10.1,10.1b,10.2]
	3A/28	*†Voliam Xpress	6-12 fl.oz./acre	21	24	High	[1.0,6.1c,9.1a,10.1,10.2]
	3A/6	*Gladiator EC	14-19 fl.oz./acre 3.5-4.75 fl.oz./100 gal water			Moderate	[1.0,9.1a,10.1,10.2]
	4A/28	*†Voliam Flexi WDG	4-7 oz/acre			High	[5.1c,1.0,6.1c,10.1,10.2]
	4A/3A	*†Endigo ZC	5-6 fl.oz./acre	35	24	Moderate	[5.1c,1.0,9.1a,10.1,10.2]
4A/3A	*Leverage 360	2.4-2.8 fl.oz./acre	7	12	Moderate	[1.0,9.1a,10.2]	
Pear psylla	16	*†Centaur 0.7WDG	34.5-46 oz/acre	14	12	High	[12.2,12.2d,12.5]
	21A	†Nexter 75WS	6.6-10.67 oz/acre	7	12	Moderate	[12.5a,12.5]
	21A	Portal 0.4EC	2 pts/acre	14	12	High	[8.1c,12.5]
	23	Movento 240SC	6-9 fl.oz./acre	7	24	High	[5.1a]

	3A	*Asana XL 0.66EC	9.6-19.12 fl.oz./acre 7.3-12.8 fl.oz./100 gal water	28	12	Moderate	[12.2, 12.2a, 12.5]
	3A	*Danitol 2.4EC	16-21.3 fl.oz./acre	14	24	Moderate	[12.2, 12.2a, 12.5]
	4A	*†Actara 25WDG	5.5 oz/acre	14/35(A)	12	High	[5.1c, 7.1a, 12.2, 12.5]
	4A	*Admire Pro 4.6SC	7 fl.oz./acre	7	12	Moderate	[12.5]
	4A	Assail 30SG	4-8 oz/acre	7	12	Moderate	[12.2, 12.5]
	5	Delegate 25WG	4.5-7 oz/acre	7	4	High	[12.2, 12.2c, 12.5]
	6	*Agri-Mek 8SC	2.25-4.25 fl.oz./acre 0.5-1 fl.oz./100 gal water	28	12	High	[12.5, 12.5b]
		§M-Pede	2 gal/100 gal water			Moderate	[12.3]
		§Surround 95WP	50 lb/acre	0	4	Moderate	[12.6]
	3	*Warrior II with Zeon Technology		21	24		[12.2, 12.2a, 12.5]
	3A/6	*Gladiator EC	14-19 fl.oz./acre 3.5-4.75 fl.oz./100 gal water			High	[1.0, 9.1a, 12.5]
	4A/28	*†Voliam Flexi WDG	7 oz/acre			High	[5.1c, 1.0, 6.1c, 12.5]
		oil	1 gal/acre 1 qt/100 gal water plus			High	[5.1c, 1.0, 13.1]
	6/4A	*†Agri-Flex SC	5.5-8.5 fl.oz./acre 1.5-2 fl.oz./100 gal water	35	12		
Pear rust mite	21A	†Nexter 75WS	5.2-10.67 oz/acre	7	12	Moderate	[12.5a, 13.1]
	21A	Portal 0.4EC	2 pts/acre	14	12	High	[13.1]
	6	*Agri-Mek 8SC	2.25-4.25 fl.oz./acre 0.5-1 fl.oz./100 gal water	28	12	High	[13.1]
	23	*†Envidor	16-18 fl.oz./acre	7	12	High	[12.5a, 13.1]
	12B	*Vendex 50WP	1-2 lb/acre 6-8 oz/100 gal water	14	48	Moderate	[13.1]
		oil	1 gal/acre 1 qt/100 gal water plus			High	[5.1c, 1.0, 13.1]
	6/4A	*†Agri-Flex SC	5.5-8.5 fl.oz./acre 1.5-2 fl.oz./100 gal water	35	12		
Pear scab		Flint	2.0-2.5 fl.oz./acre 0.67-0.8 oz/100 gal water	14	12		[3.4]
		Manzate ProStik	3.0 lb/acre 1.0 lb/100 gal water	BL, 77(A)	24		[3.3]
		Sovran 50WDG	3.2-6.4 oz/acre 1.0-1.6 oz/100 gal water	30	12		[3.4]
		Topsin M 70WP	1.0 lb/acre 0.25 lb/100 gal water	1	48		[3.2]
		Topsin M WSB	1.0 lb/acre	1	48		[3.2]

			0.25 lb/100 gal water				
		Ziram 76DF	24.0 oz/100 gal water	14	48		
		*†Merivon	4-5.5 fl.oz./acre	0	12	High	
	7	*†Fontelis	16.0-20.0 fl.oz./acre	28	12		[3.7]
	7+11	Pristine 38WDG	14.5-18.5 oz/acre	0	12		
Pearleaf blister mite	1A	Sevin 80 Solupak	1.88-3.75 lb/acre	3	12	High	[14.2]
	1A	Sevin XLR Plus	1.5-3 qt/acre	3	12	High	[14.2]
Phytophthora Rots	33	Prophyt	2-4 pt/100 gal water	0	4	High	[7.3a]
Powdery Mildew		*†Merivon	4-5.5 fl.oz./acre	0	12	High	
Redbanded leafroller	11A	§Agree 3.8WS	1-2 lb/acre	0	4	High	[16.1]
	1B	*Imidan 70W	2.13-5.75 lb/acre	7	7-10 days	High	[16.1]
	28	*†Altacor 35WDG	2.5-4.5 oz/acre	5	4	High	[6.1c,16.1]
	28	*†Belt 4SC	3-5 fl.oz./acre	14	12	High	[16.1]
	3A	*Baythroid XL 1EC	2.4-2.8 fl.oz./acre	7	12	High	[9.1a,16.1]
	5	Delegate 25WG	4.5-7 oz/acre	7	4	High	[16.1]
	6	*Proclaim 5SG	3.2-4.8 oz/acre	14	12	High	[16.1]
			0.8-1.2 oz/100 gal water				
	11A	§Deliver	0.5-2 lb/acre	0	4	High	[16.1]
	11A	§Dipel 10.3DF	0.5-2 lb/acre	0	4	High	[16.1]
	11A	§Javelin 7.5WDG	0.5-4 lb/acre	0	4	High	[16.1]
	3A/28	*†Voliam Xpress	6-12 fl.oz./acre	21	24	High	[1.0,6.1c,9.1a,16.1]
	3A/6	*Gladiator EC	14-19 fl.oz./acre			High	[1.0,9.1a,16.1]
			3.5-4.75 fl.oz./100 gal water				
	4A/3A	*Leverage 360	2.4-2.8 fl.oz./acre	7	12	High	[1.0,9.1a,16.1]
San Jose scale	16	*†Centaur 0.7WDG	34.5-46 oz/acre	14	12	High	[20.1,20.2]
	23	Movento 240SC	6-9 fl.oz./acre	7	24	High	[5.1a,20.2,20.2a]
	4A	*Admire Pro 4.6SC	2.8 fl.oz./acre	7	12	Moderate	[20.2]
	4A	Assail 30SG	8 oz/acre	7	12	Moderate	[20.1,20.1a,20.2]
	7C	Esteem 35WP	4-5 oz/acre	45	12	High	[20.1,20.1a,20.2]
	3A/28	*†Voliam Xpress	6-12 fl.oz./acre	21	24	Moderate	[1.0,6.1c,9.1a,20.2]
	4A/3A	*†Endigo ZC	5-6 fl.oz./acre	35	24	Moderate	[5.1c,1.0,9.1a,20.2,1.0a]
	4A/3A	*Leverage 360	2.4-2.8 fl.oz./acre	7	12	Moderate	[1.0,9.1a,20.2]
Spotted wing Drosophila	1B	*Imidan 70W	2.13-5.75 lb/acre	7	7-10 days	High	[17.2]
			0.75-1 lb/100 gal water				
	3A	*Asana XL 0.66EC	4.8-14.5 fl.oz./acre	28	12	High	[9.1a,17.2]
	5	Delegate 25WG	4.5-7 oz/acre	7	4	Moderate	[17.2,17.2a]
	5	§Entrust 2SC	4-10 fl.oz./acre	7	4	Moderate	[17.2,17.2a,17.2b]
	5	§Entrust 80WP	1.5-3 oz/acre	7	4	Moderate	[17.2,17.2a,17.2b]
Stink bugs, incl. Brown marmorated stink bug	1A	*Lannate 90SP	0.75 lb/acre	7	48	High	[10.1a,18.2,18.2a]
	1A	*Lannate LV 2.4L	2.25 pts/acre	7	48	High	[10.1a,18.2,18.2a]
	3A	*Baythroid XL 1EC	2.4-2.8 fl.oz./acre	7	12	Moderate	[9.1a,18.2]
	3A	*Brigade 10WSB	6.4-32 oz/acre	14	12	High	[9.1a,18.2]
	3A	*Brigade 2EC	2.6-12.8 fl.oz./acre	14	12	High	[9.1a,18.2]
	3A	*Danitol 2.4EC	10.7-21.3	14	24	Moderate	[9.1a,18.2,18.2a]

		fl.oz./acre				
4A	*†Actara 25WDG	4.5-5.5	14/35(A)	12	Moderate	[5.1c,18.2,18.2a,1.0a]
	§Surround 95WP	50 lb/acre	0	4	Moderate	[12.6,18.2]
3	*Warrior II with Zeon Technology	1.28-2.56 fl.oz./acre	21	24	Moderate	[9.1a,18.2]
3A/28	*†Voliam Xpress	6-12 fl.oz./acre	21	24	Moderate	[1.0,6.1c,9.1a,18.2]
3A/6	*Gladiator EC	14-19 fl.oz./acre 3.5-4.75 fl.oz./100 gal water			Moderate	[1.0,9.1a,18.2]
4A/28	*†Voliam Flexi WDG	6-7 oz/acre			Moderate	[5.1c,1.0,6.1c,18.2]
4A/3A	*†Endigo ZC	5-6 fl.oz./acre	35	24	High	[5.1c,1.0,9.1a,18.2,1.0a]
4A/3A	*Leverage 360	2.4-2.8 fl.oz./acre	7	12	Moderate	[1.0,9.1a,18.2]
Twospotted spider mite	10B Zeal	2-3 oz/acre	14	12	High	[8.1]
	20B Kanemite 15SC	21-31 fl.oz./acre	14	12	High	[8.1,8.1b]
	21A †Nexter 75WS	4.4-10.67 oz/acre	7	12	Moderate	[8.1,8.1d,8.1e]
	21A Portal 0.4EC	2 pts/acre	14	12	High	[8.1,8.1c]
	3A *Brigade 10WSB	12.8-32 oz/acre	14	12	Moderate	[8.1,9.1a]
	3A *Brigade 2EC	5.12-12.8 fl.oz./acre	14	12	Moderate	[8.1,9.1a]
	6 *Agri-Mek 8SC	2.25-4.25 fl.oz./acre 0.5-1 fl.oz./100 gal water	28	12	Moderate	[8.1]
	UN Acramite 50WS	0.75-1 lb/acre	3	12	High	[8.1,8.1e]
	23 *†Envidor	16-18 fl.oz./acre	7	12	High	[8.1,8.1c,8.1g]
	12B *Vendex 50WP	1-2 lb/acre 6-8 oz/100 gal water	14	48	Moderate	[8.1]
	oil	1 gal/acre 1 qt/100 gal water plus			Moderate	[5.1c,1.0,8.1,8.1f]
6/4A	*†Agri-Flex SC	5.5-8.5 fl.oz./acre 1.5-2 fl.oz./100 gal water	35	12		



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12.2 Pear Disease Notes
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PMEP Links:

PMEP Cornell Store (<http://store.cornell.edu/c-873-cornell-coop-ext.aspx>)

PIMS (<http://pims.psur.cornell.edu/>)

PMEP Home (<http://psep.cce.cornell.edu/>)

PSUR Home (<http://psur.cce.cornell.edu/>)

"Need Certification Credits? Get them at the PMEP Distance learning Center (<http://pmpcourses.cce.cornell.edu/>)".

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