



2018 Alfalfa Insecticide Efficacy Trial –
Dickinson Co., KS.

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- Pest: Alfalfa weevil, *Hypera postica*, Pea aphid, *Acyrtosiphon pisum*
- Crop: Alfalfa; Established Fall 2017
- Location: Dickinson Co., KS
- Plot Size: 10 ft. x 30 ft.
- Experimental Design: Randomized Complete Block; 4 Replications
- Information: Sprayed with hand sprayer delivering 15 gal/acre at ca.30 psi on 27 April, 2018. Plants 2" – 11" tall, temperature 78°F, wind WSW 3-10 mph. Treatments 7 and 9 sprayed again on 4 May 2018. Temperature 71°F, wind NW 6 mph.
- Special Notes: Lowest infestation levels that we've seen in 20+ years due to sub-freezing temperatures which occurred several times during April. Each sampling period we detected large numbers of very small dead larvae
- Phytotoxicity: None noted
- Evaluation: Pre-treatment counts conducted on 28 April. Average of 3.8 larvae/ 10 stems. 10 stems randomly selected in each plot and shaken into 1 gal. bucket and counted 30 April (3 DAT), 4 May (7 DAT), 11 May (14 DAT). At this time alfalfa began flowering and efficacy trial was terminated so that field could be swathed.
DAT = Days After Treatment

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Treatment Date: 27 April, 2018

No.	Treatment	Mean No. AW Larvae/10 stems			Mean No. Pea Aphids/10 stems	
		30 April (3 DAT)	4 May (7 DAT)	11 May (14 DAT)	30 April (3 DAT)	11 May (14 DAT)
1	Untreated	4.3a	2.3a	1.3a	2.8a	25.5bcd
2	Endigo ZC 4.5 oz/a	0.0b	0.0c	0.3b	0.0b	18.8cd
3	Warrior II 1.92 oz/a + Lorsban 1 pt/a	0.0b	0.0c	0.0b	0.5ab	14.8cd
4	Warrior II 1.92 oz/a	0.3b	0.0c	0.0b	0.5ab	11.5d
5	Steward EC + silicone surf. ½% 6 oz/a	0.0b	0.0c	0.0b	2.5ab	56.8a
6	Steward EC + silicone surf. ½% 11.3 oz/a	0.0b	0.0c	0.0b	2.0ab	41.0abc
7	Mustang Maxx 4 oz/a followed by Steward EC 8 oz/a - (4 May)	0.5b	0.5b	0.0b	0.8ab	33.8abcd
8	Mustang Maxx 4 oz/a + Dimethoate 4E 16 oz/a	0.0b	0.0c	0.0b	0.0b	18.0cd
9	Steward EC 5.3 oz/a followed by Steward EC 6.0 oz/a (silicone surf. ½%) – (4 May)	0.0b	0.0c	0.0b	2.3ab	39.8abc
10	Steward EC 6.0 oz/a + Mustang Maxx 4 oz/a	0.0b	0.0c	0.0b	0.3ab	47.5ab
11	Besiege @ 8oz/a	0.0b	0.0c	0.0b	0.5ab	25.3bcd

Means within a column followed by the same letter are not significantly different ($P>0.05$; PROC ANOVA; Mean comparison by LSD [SAS Institute 2003]). Reference to specific products is provided solely for informational purposes. Experiments with pesticides on non-labeled crops or pests is part of the insecticide registration process, it does not imply endorsement or recommendation of non-labeled uses of pesticides by Kansas State University. All pesticide use must be consistent with current labels.

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