

Onion thrips research 2022

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Onion thrips insecticide program

In an onion thrips pesticide program we applied insecticides at different thrips thresholds. We also tested the benefits of fungicides for disease control. Pesticide were applied with a backpack sprayer and onion thrips and green tissue measurements were taken weekly.

Onion thrips larvae



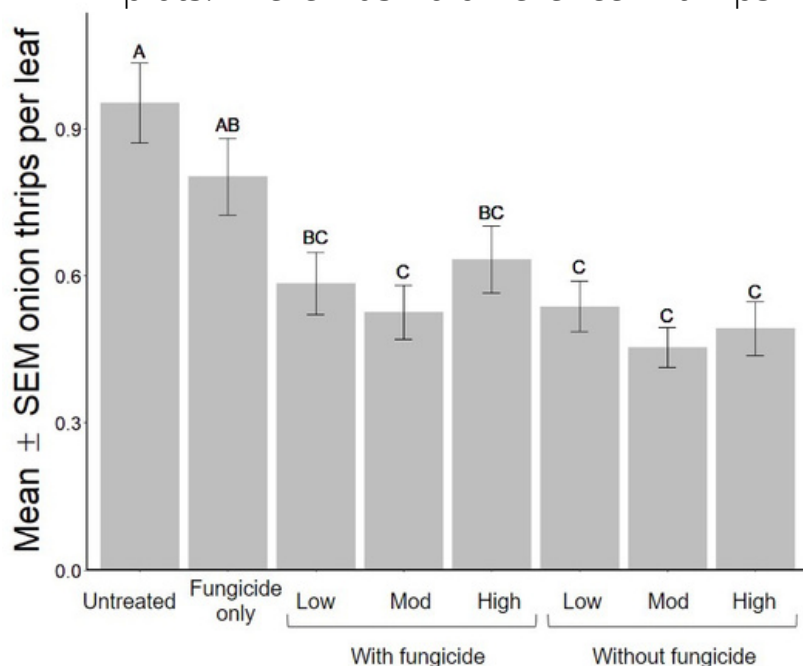
Onion thrips damage



Pathogen damage



Spray programs with insecticides reduced thrips numbers compared to the untreated plots. There was no difference in thrips numbers between spray programs.

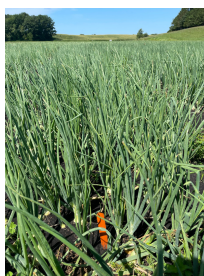


Treatment	Insecticide	Fungicide
Untreated	-	-
Fungicide only	-	Miravis Prime Alt. Bravo WS
Low threshold (0.5 thrips/leaf) + Fungicide	Week 1 + 2: Movento Week 3 + 4: Minecto Pro Week 5 + 6: Radiant	Miravis Prime Alt. Bravo WS
Moderate threshold (0.6 thrips/leaf) + Fungicide	Week 3 + 4: Minecto Pro Week 5 + 6: Radiant	Miravis Prime Alt. Bravo WS
High threshold (1 thrips/leaf) + Fungicide	Week 5 + 6: Radiant	Miravis Prime Alt. Bravo WS
Low threshold (0.5 thrips/leaf)	Week 1 + 2: Movento Week 3 + 4: Minecto Pro Week 5 + 6: Radiant	-
Moderate threshold (0.6 thrips/leaf)	Week 3 + 4: Minecto Pro Week 5 + 6: Radiant	-
High threshold (1 thrips/leaf)	Week 5 + 6: Radiant	-

All applied with Syl-Tac 1% v/v

Green Tissue Results:

There was no difference in the amount of green tissue among treatments; photos from Aug. 2:



Untreated



Low threshold + fungicide



High threshold

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Testing colored mulches:

We tested the effect of colored plastic mulches on onion thrips colonization of onion plants. Using 6 different commercially available mulches, including 3 different "silver" mulches, we placed 3 onions on each mulch and counted the number of onion thrips per plant.



Photo of mulch experiment.

Gray, red, and black mulches had lower thrips numbers than silver and white mulches.

