

Wheat Entomology Newsletter May 2, 2022

Dr. Erika Peirce: Erika.Peirce@colostate.edu,
661-607-1789

Dr. Punya Nachappa: Punya.Nachappa@colostate.edu,
785-383-4873



Brown Wheat Mites

Hot and dry conditions have worsened earlier reported brown wheat mite infestations. Multiple reports of heavy brown wheat mite populations near Arriba (Lincoln County) and Lamar (Prowers County). The populations were above economic threshold levels. Low to moderate levels reported near Julesburg and near northeast of Prospect Valley.

The economic threshold for this pest is not well defined, but during an outbreak spraying with insecticide is the only option. Previous research has shown that dimethoate insecticides are the most effective of currently registered products.



Figure 1: Brown wheat mite damage to wheat (left) and adult brown wheat mite (right).

Photo credit:
<https://entomology.k-state.edu/extension/insect-information/crop-pests/wheat/brown-wheat-mite.html>



Figure 2: A handful of mites!
Photo credit: Michaela Mattes

Russian Wheat Aphids

As with brown wheat mite, the dry conditions seem to have increased Russian wheat aphid populations. Low levels were observed in Arriba and Fort Collins.

Scout your fields regularly for the white or purple chlorotic streaking that the aphids cause. More information on Russian wheat aphids can be found at

<https://pnwhandbooks.org/insect/agronomic/small-grain/small-grain-russian-wheat-aphid>

Wheat Stem Sawfly

The wheat entomology lab has started scouting fields in New Raymer and Orchard, CO to determine sawfly development and possible flight timing. We found WSS larvae are beginning to pupate and some with wing nodes visible which means adults will start emerging about 2 weeks later.

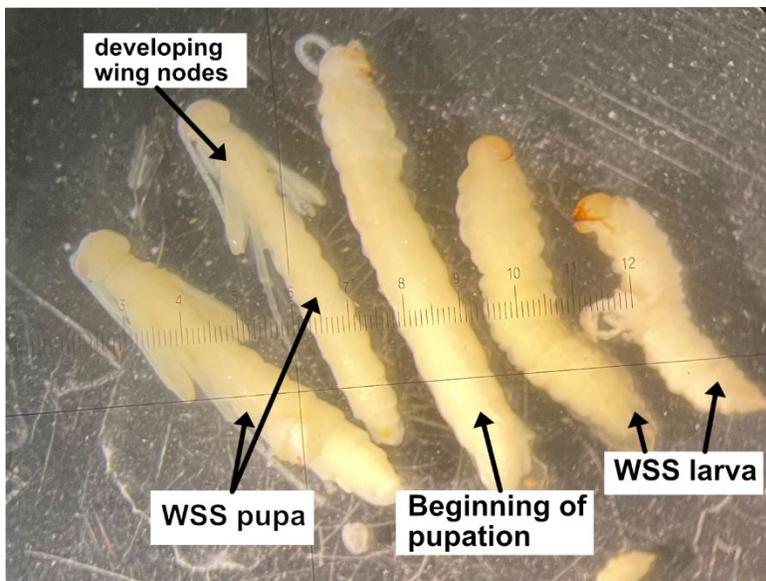


Figure 3: Picture of different stages of WSS development. Photo credit: Erika Peirce

Cutworms

Cutworm channels were observed at many northern locations, but no damage or live insects were found.

More information on caterpillars in small grains can be found at:

<https://extension.colostate.edu/topic-areas/insects/caterpillars-in-small-grains-5-577/>. Pyrethroid insecticides are effective against both army cutworm and pale western cutworm (https://wiki.bugwood.org/HPIPM:Small_Grains_Army_Cutworm).

Wheat curl mites

Currently no reports of wheat curl mites in Colorado.

There are no effective miticides for wheat curl mites so growers cannot be lax with volunteer wheat control, which is the most effective management practice for the and the viruses it vectors.

Wheat Diseases

For wheat disease updates by Dr. Robyn Roberts, please see:

<https://coloradowheat.org/category/news-events/wheat-pest-and-disease-update/>

Acknowledgments

We would like to acknowledge the tireless work of the CSU researchers and extension agents for reporting pest problems throughout the state, including Ron Meyer, Todd Ballard, Sally Jones-Diamond, Barry Ogg, Michaela Mattes Kevin Larson, Brett Pettinger, Dennis Kaan and Mel Schreiner.