Cotton Thrips

It will not be long before cotton is planted across the Texas High Plains. And, with the cold fronts moving through our area every so often this spring we may need a reminder about thrips control in seedling cotton. On the Texas High Plains our predominate thrips species are the Western flower thrips, *Frankliniella occidentalis*, the Onion thrips, *Thrips tabaci*, and less numerous the Tobacco thrips, *Frankliniella fusca*. Damage by the thrips occurs from seedling emergence up to the 5th true leaf stage. But, the most critical period for controlling thrips is the first two weeks post emergence. Their damage is often more severe during periods of cool, wet condition when seedling growth is slowed down and when huge numbers migrate out of senescing wheat. Feeding generally occurs in the new terminal growth and on the underside of leaves causing stunted plants, deformed crinkled leaves that curl upward, and terminal loss. Severe early season damage to the young cotton plants can reduce plant stands and prevents early fruiting and maturity. The delaying of maturity can be a critical to having sufficient heat units for boll development and prevention of yield loss, particularly on the Northern High Plains.

What are your treatment options?

Insecticide seed treatments from Aeris, Avicta, Acceleron, Poncho/Votivo or Cruiser packages are probable the best option for protection from thrips because the control lasts from 18 days to 21 days after planting. Research trials have shown Gaucho Grande and Acephate seed treatments lasts at most 7 days after planting. The signs that control is declining and no longer effective is when immature thrips are found surviving on the cotton leaves. When 30% of the thrips are immatures then an foliar...
application is needed if numbers reach the action threshold. Generally, when there are good warm growing conditions the insecticide residual activity is usually sufficient to protect cotton from germination to the 5th true leaf growth stage. Use the above action threshold for making foliar application decisions when daily maximum temperatures are above 83°F the action threshold. But when there are cold fronts with daily maximum temperatures below 83°F for 4-5 days thrips may be able to cause significant damage. Under these conditions a follow-up foliar insecticide may be required and should be applied based on a modified action threshold by dividing each true leaf threshold in half. Foliar applications of Orthene/Acephate and Bidrin provides about 5 days of protection and Dimethoate about 4 days of control. This could require multiple foliar applications to prevent severe damage. It is important to control thrips before there is significant damage. Research has shown that if you use foliar insecticides and wait until you see damage or until you make a herbicide spray, the damage from thrips has already been done.

**Sugarcane Aphid (SCA) Update**

We have not even planted grain sorghum yet, but our news about SCAs are not very encouraging, except that Texas received a Section 18 Transform WG label on April 8, 2016 and the label does not expire until April 8, 2017. We had nine overwinter sites this winter from Dalhart to San Angelo that had SCAs on Johnsongrass inside of cages. One of the cages in Roscoe, Nolan County had live SCAs on April 1st which was the was the most northerly confirmation of aphid survival to date. Then April 4th and April 29th, SCAs were found in overwinter cages at Dawson and Hale Counties, respectively. But, the most alarming find was May 3rd when SCAs were found on Johnsongrass that was not in a cage or near an overwintering site in Lubbock County. This is about eight weeks earlier than last year. No SCAs have yet been found from Amarillo into the northern Panhandle. We can not predict what this means for future infestations this growing season. But, we need to be actively scouting for the SCA and the use of insecticide seed treatments should be considered. Any of the insecticide seed treatments (Gaucho, Poncho, Nipsit, Cruiser) should give up to 40 days of protection. Also, controlling Johnsongrass now may help delay SCA movement to grain sorghum and forage sorghums later. **If, at any time, you find SCAs, please, contact me, any IPM Extension agent, or your County Extension agent. This will help us better track the movement of the SCA on the Texas High Plains.**