

**Wyoming Department of Agriculture:
Climate Issues Update
Fall 2010– November 22, 2010**

Climate continues to play a significant role in agriculture economics, success and sustainability. The increased variability of weather cycles and weather-related conditions makes developing a plan for flexible agriculture management one of the most important tasks for today’s agriculture producer.

Most of the state saw delayed spring moisture and late warm-up. Much of the state experienced heavy rains with localized areas of flooding causing damage to crops and irrigation infrastructures. Some producers had to replant crops and the first cutting of hay value was impacted in areas due to difficulties in getting the hay baled without getting rained on.

The WDA managed the grasshopper program in 2010 where treatment focused on rangeland. Localized areas received significant crop damage from grasshoppers so for 2011, the WDA is looking into including cropland in the grasshopper treatment program if funding is appropriated in the Department’s supplemental budget. The grasshopper hatch was late due to the cool spring, but then survived late into fall with the warm temperatures. This created the potential for the laying of more egg sacs than normal (3-4 sacs per producing grasshopper as compared to a usual 1-2). Overall, grasshoppers progressed westward across the state.

Although forage availability in the state was relatively good, vegetation in the state was not able to fully utilize all the late spring moisture due to conditions quickly changing to hot and dry. Current moisture conditions show 50.2% of the state abnormally dry with 7.6% listed as moderate drought.

As debated over the last couple of years, cap and trade legislation has the potential to impact agriculture. Terrestrial carbon sequestration was a hot topic for several years. Currently, carbon has decreased in value at the Chicago Climate Exchange. A metric ton of carbon previously topped out at \$7.40 a metric ton has lately been selling for .05 cents thus reducing the economic benefit for producers to change land management practices for the benefit of increased carbon sequestration.

As a result of the climate-related challenges agriculture producers faced in the 2010 growing season, several disaster designations were authorized for several Wyoming counties. The following table lists the 2010 Disaster Designations (DD).

Designation Number	Primary Counties	Contiguous Counties	Disaster Reason
Nebraska DD M1924	Nebraska counties	Goshen, Niobrara	Severe storms, flooding & tornados
Wyoming DD M1923	Fremont	Carbon, Hot Springs, Natrona, Park, Sublette, Sweetwater, Teton, Washakie	Flooding
Nebraska DD S3015	Nebraska counties	Laramie	Excessive rain, hail, high winds, lightning, flooding & flash flooding
Wyoming DD S3036	Carbon, Fremont	Albany, Converse, Hot Springs, Natrona, Park, Sublette, Sweetwater, Teton, Washakie	Flooding
South Dakota DD M1938	South Dakota counties	Niobrara	Severe storms and flooding

As a result, farmers in these listed areas may be eligible to receive Farm Service Agency emergency assistance for production losses due to this disaster as indicated above.

Many of the grazing decisions on public land are made using subjective determinations of drought. When looking at the National Drought Monitor, D4 is the worst drought condition category. A portion of the state was in this category from July 2, 2002 until May 5, 2005. Although very dry conditions have existed over a longer period of time, we must be cautious to base grazing decisions for the future on a broader time frame than these worst conditions. None of the State has been in the D4 category since May 3, 2005. The WDA again cautions federal agencies in decisions to reduce AUMs based on drought. Flexibility should be built into grazing decisions to allow for variability in forage production and timing of production to account for the high variability in our current weather patterns. Turnout dates and other grazing adjustments should relate to the timing of the vegetation life-cycle and timing of temperature warm-up, not a given calendar day.

The continued beetle infestations and forest die off in Wyoming continue to be of concern to us. The extent of the impacts continue to be revealed. Some of the things that are of notable concern to us include potential fire risk which leads to even more loss of grazable acres in the short term, downed timber restricting grazing distribution and livestock movement, and most importantly the long-term changes that could threaten degradation of our watersheds. Producers continue to watch this situation progress as actual impacts are yet to be determined.

Contact:

Leanne Stevenson, Manager Natural Resources & Policy Division
Cheyenne, WY
307-777-6579
lsteve@state.wy.us