

Weather Effects on Arizona Agriculture in 2007

With Arizona's diverse topography, the State's temperatures range from the wintertime cold in the higher mountain areas to the searing summertime heat of the desert areas. Arizona's wide spectrum of climate and terrain support a remarkable agricultural diversity. Virtually all crops in Arizona are irrigated, meaning yield variability is less influenced by rainfall here than in the rain-dependent agricultural states. Weather conditions are still important to crop farmers in making planting and harvesting decisions. The highest recorded temperature in 2007 was 116 degrees at Phoenix during the week ending July 8 and Parker and Yuma for the week ending September 2. Flagstaff recorded the lowest temperature of 15 degrees below zero during the week ending January 15.

January: Alfalfa condition was mostly fair. Range and pasture conditions started out the year fair to good. Temperatures were above normal for the beginning of the month and below normal for the ending. Temperatures ranged from a high of 79 degrees to a low of 15 degrees below zero. Rain fell throughout the month. Small grain planting was nearly complete the last week of the month.

February: Alfalfa condition remained the same at the beginning of the month with improvement near the end of the month. With the lack of precipitation rangeland conditions started to deteriorate throughout February. Cotton planting began in the Yuma area. Temperatures were above normal with a high of 85 degrees and a low of 7 degrees below zero.

March: Temperatures were mostly above normal for March. Temperatures ranged from a high of 100 degrees to a low of 2 degrees below zero. Precipitation fell the last week of the month in most areas, but most stations remained at below normal levels. Alfalfa condition ranged from fair to excellent, while range and pasture continued to deteriorate from the previous month. The small grain crops completed emergence.

April: Precipitation was still below normal at most of the reporting stations. Temperatures were mostly above normal ranging from a high of 106 degrees to a low of 9 degrees. Cotton planting was over half finished by the final week of the month. By the third week over two-thirds of the small grain acreage had headed.

May: Alfalfa was rated in fair to excellent condition. Range and pasture conditions remained the same as the previous month with little help from the rainfall. Small grain (barley and durum wheat) harvest began the final week and virtually all acreage had headed. Temperatures were above normal hitting a high of 106.

June: Cotton planting was virtually complete by week one and cotton bolls started to set the second week of June. Crop conditions remained mostly fair to good. Temperatures were above normal for the month with a high of 112 degrees and a low of 22 degrees. Precipitation continued below normal for most stations.

July: Small grain (barley and durum wheat) harvest was virtually complete by week two. Cotton squaring was finished by the third week of the month. Cotton condition remained fair to good for the month. Temperatures were above normal reaching a high of 116. Only three stations had received above normal precipitation to date.

August: Alfalfa condition ranged from fair to good. Due to seasonal rains, range and pasture conditions started to improve from the previous month. Cotton bolls finished setting around the third week of August. Cotton harvesting began during the last week. Temperatures were mostly below normal for the first of the month and above normal toward the end of the month. Temperatures ranged from 114 to 42 degrees.

September: Cotton harvesting continued around the State. Cotton condition was mostly good. The percent of acreage with open bolls was on par with the 5-year average. Temperatures were mostly above normal for the month. Temperatures ranged from 116 to 26 degrees.

October: October brought mostly above normal temperatures in the middle of the month with a high of 100 degrees and a low of 19 degrees. Alfalfa and cotton conditions stayed mostly fair to good. Cotton condition continued to range from fair to good. Cotton harvest was 45 percent complete by month's end, and slightly ahead of the five year average.

November: November brought temperatures mostly above normal with a high of 97 degrees and a low of 6 degrees. Little to no rain fell during the first half of the month. Sheeping off was reported for the alfalfa regions around the State. Cotton harvest was at 80 percent complete by the end of the month. Range and pasture conditions were mostly poor to good.

December: Alfalfa conditions stayed nearly the same, while range and pasture conditions improved to the fair to good range. By the end of the month, cotton harvest was wrapping up. Small grain planting started the second week of December. Temperatures were mostly below normal for this time of year, with a high of 79 degrees and a low of 0 degrees. All but two reporting stations finished the year with below normal precipitation.