

NOAA Product Highlight: Drought Tools and Resources

While drought doesn't always offer the same immediate and dramatic visuals associated with events such as hurricanes and tornadoes, it still has a huge price tag. In fact, droughts rank second in types of phenomena associated with billion-dollar weather disasters during the past three decades. With annual losses over \$5 billion per year, drought is a serious hazard with substantial socioeconomic risks for the United States.

Drought impacts come in many forms including water restrictions and damage to crops and gardens. These impacts often lead to tough decisions about what plants to water and how much to water them. Knowing what to expect when drought conditions are present or when they are on the horizon, can help everyone make these tough decisions and adapt to conditions by planting more drought-tolerant plant varieties. NOAA has several tools that can provide you with the information you need to assess and respond to your drought situation.

The Drought Portal

The U.S. Drought Portal (www.drought.gov) provides early warnings for emerging drought conditions, informs users of the drought risks and impacts in their areas, helps managers better prepare for and deal with the effects of drought, and supplies an online forum for the public to discuss drought-related issues. The Portal also lets users view current drought conditions across the country, see what impacts their states and counties are experiencing, learn about past incidents of droughts, and find links to educational resources.

The U.S. Drought Monitor and the North American Drought Monitor

The U.S. Drought Monitor (www.droughtmonitor.unl.edu) is produced through collaboration between the National Drought Mitigation Center at the University of Nebraska–Lincoln, the United States Department of Agriculture, and NOAA. The U.S. Drought Monitor map provides a summary of drought conditions across the United States and Puerto Rico, and is updated weekly by combining a variety of drought indices and indicators with local expert knowledge. The map denotes four levels of drought intensity and one level of "abnormal dryness." Also depicted are areas experiencing agricultural or hydrological drought impacts. These impact indicators help communicate whether short- or long-term precipitation deficits are occurring.

The North American Drought Monitor (www.ncdc.noaa.gov/temp-and-precip/drought/nadm) is produced monthly by authors in Canada, Mexico, and the United States, using a process similar to the U.S. Drought Monitor. The North American Drought Monitor website provides downloadable data and maps that include aggregated drought intensity and impact information, the standard precipitation index, the percent of average precipitation, and the Palmer Drought Index.

The U.S. Seasonal Drought Outlook

As part of their climate outlook product suite, NOAA's Climate Prediction Center produces the U.S. Seasonal Drought Outlook (www.cpc.ncep.noaa.gov/products/expert_assessment/seasonal_drought.html). This outlook, updated on the first and third Thursday of each month, shows predicted trends for areas the U.S. Drought Monitor depicts as experiencing drought and indicates areas where new droughts may develop.

Additional Resources

- [The Story for Spring: Drought Relief Not Likely](#) from the Climate Portal (www.climate.gov)
- [Drought Section](#) of NOAA's Monthly Climate Reports
- NOAA's [Drought Calculator](#), which estimates the amount of rainfall needed to end droughts around the United States