West Texas/Southeastern New Mexico Climate Summary for April 2017

Midland/Odessa Texas

U.S. National Weather Service Midland, TX

@NWSMidland

April 2017 Temperature, Precipitation, and Wind Summary

April 1st-15th: The first day of April was mild as a cold front entered the region. High temperatures were in the 70s and 80s across the northern Permian Basin and warmer along the Rio Grande River valley. By the 2nd, a low pressure system approached from the west. Moisture increased and a large swath of precipitation developed behind the front. Highest precipitation totals on the 2nd included: 1.61" near Iraan, TX, 1.30" in Cope Ranch, TX, 1.27" in Big Spring, TX, and 0.98" at Midland International Air and Space Port (MAF). Temperatures were 5-10°F below normal on the 2nd with highs mainly in the 50s and 60s and lows in the 40s with a few 30s at higher elevations. Near normal temperatures and dry air returned by the 3rd-4th. Winds increased ahead of an approaching cold front on the 4th and National Weather Service (NWS) Midland issued a High Wind Warning and a Red Flag Warning for the higher elevations. Strongest wind gusts reported were: 68 mph at Mount Locke, TX, 66 mph in the Guadalupe Mountains, 57 mph at Carlsbad, NM, 50 mph at Hobbs, NM, and 50 mph at MAF. Temperatures again fell below normal across the region on the 5th with highs mainly in the 60s and 70s and lows in the 30s and 40s. Very warm, dry, and windy conditions returned to the area on the 8th-9th. A Red Flag Warning was issued for the western counties along with a High Wind Warning for the Guadalupe Mountains. Warmest highs included 96°F at Fort Stockton, TX and Wink, TX, on the 8th, and 103°F at Rio Grande Village, TX on the 9th. Another dry cold front swept through the region on the 10th and lowered temperatures to near normal. By the 12th, an upper-level disturbance approached west Texas and southeastern New Mexico, accompanied by surface dew points in the 50s and 60s. Numerous thunderstorms developed in Eddy and Lea Counties and progressed eastward throughout the day. Some storms were severe, producing large hail up to 2.00" in diameter and damaging winds over 70 mph. A Tornado Warning was issued by NWS Midland for a storm over Eunice, NM. Rainfall increased overnight throughout the Permian Basin and prompted NWS Midland to issue a Flash Flood Watch. The highest rainfall totals on the 12th were: 2.02" at Hobbs, NM, 1.75" at Seminole, TX, 1.74" at Big Spring, TX, 1.61" at Odessa, TX, and 1.47" at Midland, TX. On the 14th, moisture remained in place with a dryline along the TX/NM border. An isolated severe storm developed in Pecos County and moved east across I-10 near Fort Stockton, TX where it produced hail up to baseball size. The atmosphere stabilized by the 15th and the dryline remained along the TX/NM border. High temperatures were mainly in the 80s around the Permian Basin with a few 90s in southeastern New Mexico behind the dryline.

April 16th-31st: On the 16th, a cold front approached from the north. The atmosphere was unstable ahead of the front with surface temperatures in the 80s and dew points in the 50s. Thunderstorms developed over the Davis Mountains and quickly became severe. As the cluster of storms grew, more developed to the north and south throughout the day. In total, NWS Midland issued 18 Severe Thunderstorm Warnings for 16 different counties. Numerous hail reports up to golf ball size were received. Highest rainfall totals on the 16th were 0.60" at Persimmon Gap, TX, 0.43" at Fort Stockton, TX, and 0.20" in Dryden, TX. Dry air returned to the area and temperatures steadily increased from the 17th-21st with daily high temperatures well above average into the 80s and 90s and lows in the 50s and 60s. A dry cold front passed through the region on the 22nd and brought temperatures down below normal. The cooldown didn't last long as warm, dry air moved in from the west on the 24th and again temperatures rose into the 90s across the western Permian Basin, and MAF achieved a new record high temperature of 95°F. Red Flag Warnings and High Wind Warnings were issued from the 24th-27th for the higher elevations and western counties. Warm and windy conditions continued until a strong cold front brought much cooler temperatures to the region on the 29th and 30th. Highs were mainly in the 60s and 70s on the 30th with record lows in the 30s at some locations including a record low of 39°F at MAF.

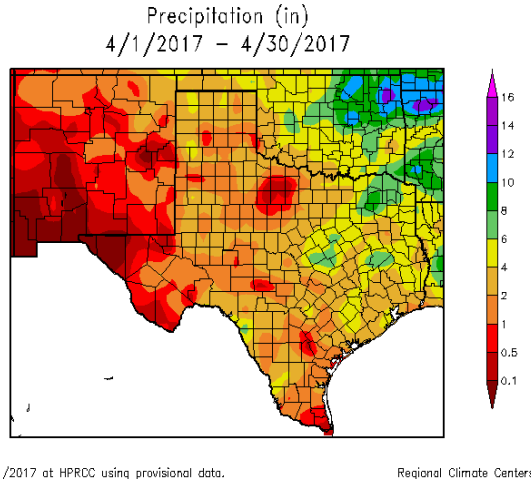
Radar of tornado warning for Eunice, NM on April 12th

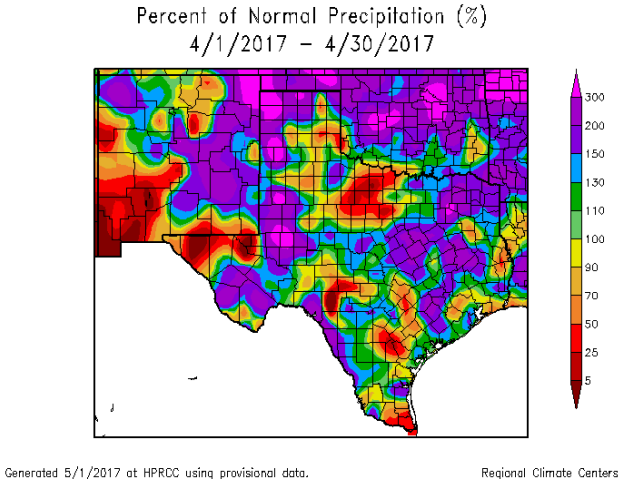
Severe thunderstorm near Fort Stockton, TX on April 14th

Funnel cloud over Alpine, TX on April 16th

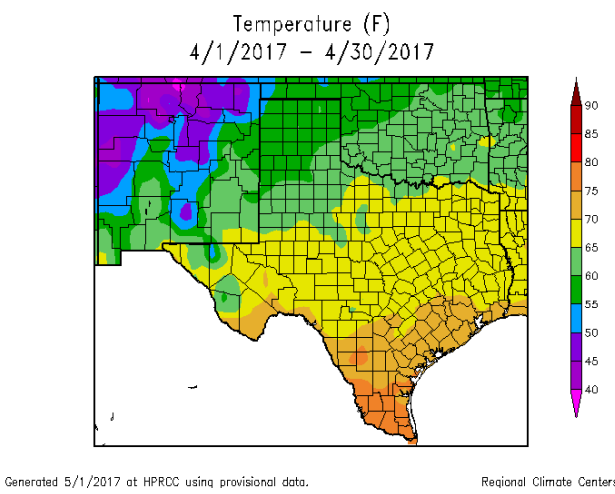
Severe warned storm over Monahans, TX on April 16th

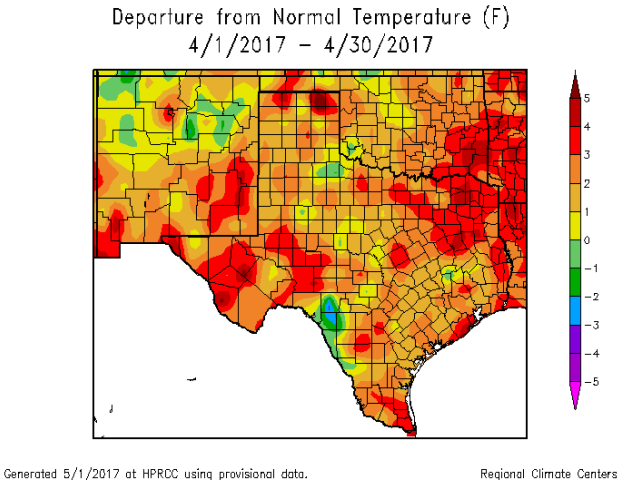
Golf ball size hail in Midland, TX on April 16th



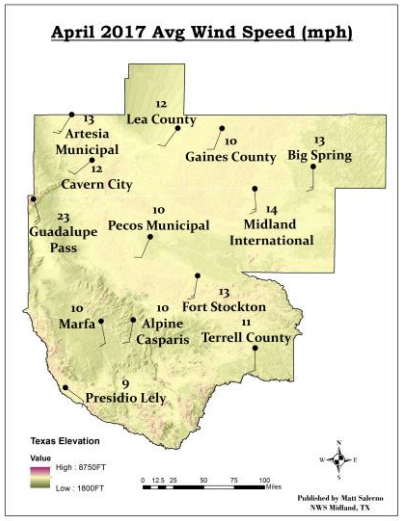


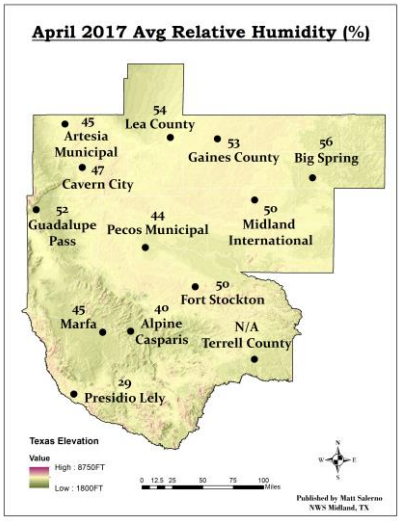
Precipitation in west Texas and southeastern New Mexico ranged from 0.00" at Presidio, TX to 2.84" at Big Spring, TX. The wettest area was the central Permian Basin and the driest regions were the upper Trans-Pecos in Culberson, Loving, Ward, and Winkler Counties, and along the Rio Grande in Presidio and Brewster Counties.



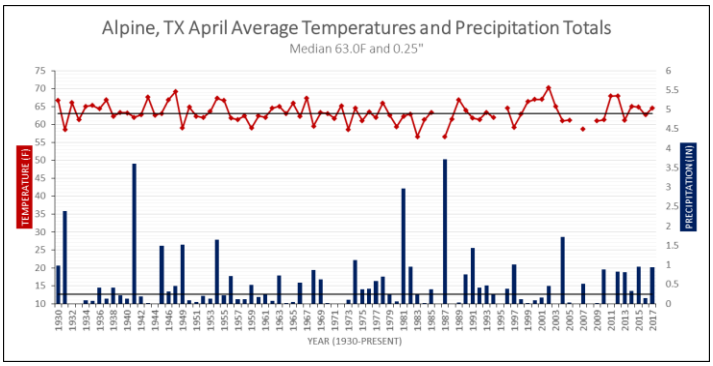


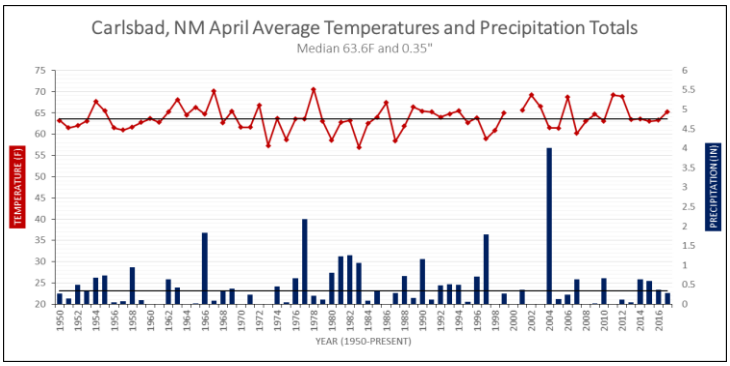
Average monthly temperatures ranged from around 52°F at Guadalupe Peak to about 77°F at Big Bend National Park. The warmest regions were in the central Permian Basin and the lower Trans-Pecos with temperatures 3-4°F above normal. Portions of Eddy, Lea, Pecos, Scurry and Mitchell Counties included temperatures near normal.

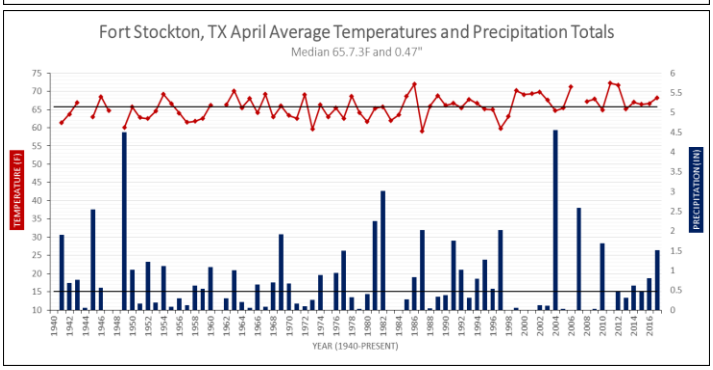


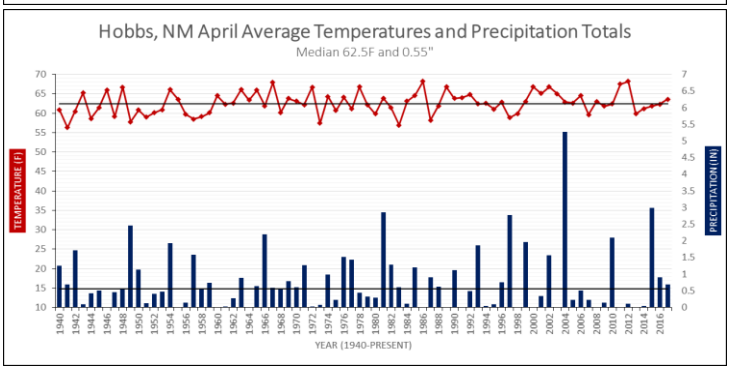


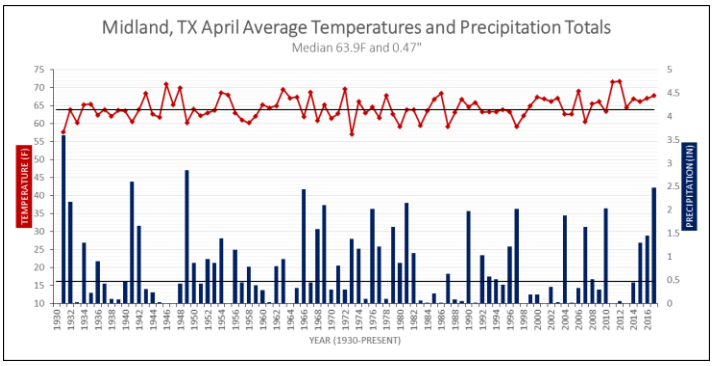
Average wind speeds ranged from 9 mph at Presidio to 23 mph at Guadalupe Pass. The strongest wind gusts occurred at Guadalupe Pass, TX and Carlsbad, NM. Average relative humidity values ranged from 29-56%.

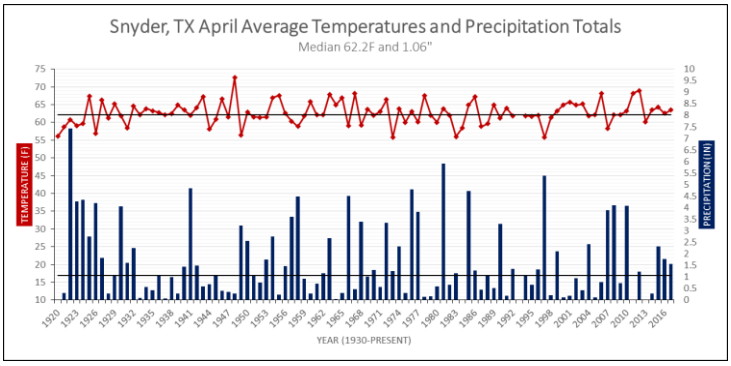












Note: Each location has a slightly different period of record. Data gaps within each graph indicate missing data for those years.

April Temperature and Precipitation	Avg Temp (°F)	Departure from Avg (°F)	Temp Ranking (Period of Record)	Precip (In.)	Departure from Avg (In.)	Precip Ranking (Period of Record)
Alpine COOP	64.6	+1.4	T-27th Warmest	0.94	+0.42	15th Wettest
Carlsbad Airport	65.3	+1.7	19th Warmest	0.28	-0.23	T-33rd Wettest
Fort Stockton COOP	68.2	+2.7	17th Warmest	1.51	+0.75	13th Wettest
Hobbs COOP	63.6	+1.6	T-28th Warmest	0.68	+0.15	30th Wettest
Midland International	67.8	+3.4	T-13th Warmest	2.48	+1.83	4th Wettest
Snyder COOP	63.5	+1.0	T-35th Warmest	1.57	-0.19	35th Wettest

The graphs above show April temperature and precipitation records for six individual weather stations at select cities. April was a variable month with many temperature swings and widespread heavy rainfall events. All six locations were slightly warmer than normal, but had temperature rankings outside of the top 10 for warmth. Midland, TX was the warmest city compared to normal with a temperature departure of +3.4°F and was tied for the 13th warmest April on record. Snyder, TX was the coolest of the six cities with a temperature departure of +1.0°F and no significant temperature ranking. Parts of west Texas were very wet, especially at Midland, TX which experienced its 4th wettest April on record. Daily rainfall records were broken at MAF which included 0.98" on the 2nd and 1.47" on the 12th (for reference the average April precipitation at MAF is 0.65"). Precipitation was slightly below average in southeastern New Mexico and this is evident from the monthly total of 0.28" at Carlsbad, NM (0.23" below normal). Snyder, TX also had a precipitation deficit in April with a monthly total of 1.57" (0.19" below normal).