## Quarterly Climate Impacts and Outlook

# Southern

June 2018

## **National** – Significant Events for May and Spring, 2018



The average U.S. temperature during May was 65.4°F, 5.2°F above average, and the warmest on record. The spring average U.S. temperature was 52.4°F, 1.5°F above average. The May U.S. precipitation was 2.97 inches, 0.06 inch above average. The spring average U.S. precipitation was 7.91 inches, 0.03 inch below average.

## **Regional** – Climate Overview for March to May 2018

#### **Temperature and Precipitation Anomalies**

Departure from Normal (F) 3/01/2018–5/31/2018



enerated 6/10/2018 at HPRCC using provisional data.

Overall, temperatures throughout most of the Southern Region were between 2°F below to 5°F above normal for the period spanning from March to May 2018. There were areas of 3-5°F above normal temperatures in Texas and Oklahoma. There were a few areas in eastern Louisiana, Mississippi, and Tennessee that were 1-2°F below normal. Percent of Normal (%) 3/01/2018–5/31/2018



5 25 50 70 90 100 110 130 150 200 300 Generated 6/10/2018 at HPRCC using provisional data. NOAA Regional Climate Center

Spring precipitation varied spatially throughout the Southern Region. Areas in western Texas received 25 percent or less of normal precipitation. In contrast, areas of south central Mississippi and eastern Tennessee received 150–200 percent of normal precipitation. Most areas in the central part of the region received near normal precipitation.

#### Highlights for the Region

Temperatures varied spatially throughout the Southern Region. The western part of the region experienced above normal temperatures, and the remainder of the region experienced near normal temperatures.

Spring precipitation also varied spatially throughout the Southern Region. Parts of Texas and Oklahoma received 25 percent or less of normal precipitation, and parts of western Tennessee and south central Mississippi received 150– 200 percent above normal precipitation. The main climate impact for spring in the Southern Region was extreme temperatures. In April, temperatures were well below normal, and in May the temperatures were well above normal. May 2018 was also the region's warmest May on record.

#### Streamflows

May average streamflow versus historical streamflow



This figure illustrates May average streamflows in the Texas Gulf and Lower Mississippi Basins as compared to historical streamflows. Louisiana, Tennessee, and Mississippi have near normal streamflow. Eastern Texas and southern Arkansas are experiencing below normal streamflow. Northern Mississippi is experiencing above normal streamflow.



## **Regional Impacts** — For March to May 2018

#### **Extreme Temperatures**

April temperatures were well below normal for parts of the Southern Region. In contrast, May was the warmest May on record for the Southern Region (1895–2018). In April, western Tennessee, north and central Arkansas, central and northeastern Oklahoma, and an area in central Texas experienced temperatures 6° to 8°F (3.33° to 4.44°C) below normal. Most of Arkansas and Oklahoma, central and western Tennessee, northern, central, and southeast Mississippi, central and southern Louisiana, and northeastern Texas were 4° to 6°F (2.22° to 3.33°C) below normal. May temperatures were above normal throughout most of the Southern Region. Western Oklahoma and northern Texas experienced temperatures 8° to 10°F (4.44° to 5.55°C) above normal. Most of Arkansas, Tennessee, and Oklahoma, northern, central and western Texas, northern Louisiana, and northern and central Mississippi experienced 4° to 8°F (2.22° to 4.44°C) above normal. There were only a few areas in southwest Texas that experienced slightly below normal temperatures. The statewide temperature rankings for May were as follows: Arkansas (first warmest), Louisiana (third warmest), Mississippi (fourth warmest), Oklahoma (first warmest), Tennessee (second warmest), and Texas (second warmest).



Above: Departure from normal temperature in April (left), in May (middle), and May temperature ranks (right).

**CPC** – Three-Month Outlook

#### Temperature

**Precipitation** 

**Outlook for June to August 2018** 





According to the Climate Prediction Center, June through August temperatures for the Southern Region are expected to be above normal, continuing the pattern of recent weeks. Chances are highest in far western Texas and decrease from west to east across the region.

There is an equal chance of above or below normal precipitation from June through August across most of the Southern Region.Tennessee, eastern Mississippi, and southeastern Louisiana have a chance of receiving above normal precipitation.

### Hurricane Outlook

NOAA's Climate Prediction Center is calling for a 75 percent chance of a near to above normal 2018 Atlantic tropical cyclone season. CPC calls for a 70 percent likelihood of 10 -16 named storms (average: 12), 5–9 hurricanes (average: 6), and 1–4 major hurricanes (average: 3).

## **Gulf Regional Partners**

Earth Scan Laboratory at Louisiana State University (esl.lsu.edu)

NOAA/NWS Climate Prediction Center (cpc.noaa.gov)

NOAA/NOS Gulf of Mexico Coastal Services Center (csc.noaa.gov)

NOAA Gulf of Mexico Collaboration Team (regions.noaa.gov)

NOAA/NESDIS National Centers for Environmental Information (ncei.noaa.gov)

NOAA/NWS Southern Region (srh.noaa.gov)

Southern Climate Impacts Planning Program (southernclimate.org)

Southern Regional Climate Center (srcc.lsu.edu)

