NWS Form E 04-2006) PRES. BY NWS I	E-5 U.S. DEPARTMENT OF COMMERC NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION NATIONAL WEATHER SERVIC	HYDROLOGIC SERVICE AREA (HSA) Columbia, SC		
MONTHL	Y REPORT OF HYDROLOGIC CONDITIONS	REPORT FOR: YEAR Feb. 2019		
TO:	Hydrologic Information Center, W/OS31 NOAA's National Weather Service 1325 East West Highway Silver Spring, MD 20910-3283	Leonard Vaughan DATE 03/12/2019		
	oding occurs, include miscellaneous river conditions below the sma conditions, snow cover, droughts, and hydrologic products issued (N			

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River Conditions for February 2019

Summary

Unlike much of late fall and early winter, precipitation during the month of February was below normal across the Midlands and Central Savannah River Area. Temperatures continued the trend of above normal through February. Rainfall for the month ranged from 3 to 4 inches across the western Midlands to the Piedmont with lesser amounts that ranged around 1 inch across the eastern and central Midlands into the Central Savannah River Area. Although precipitation was well below normal for the month, rainfall was near or above normal across the headwaters of many of the area rivers. This produced flooding and high flows on the area rivers during the month.

Precipitation

The total precipitation at Columbia Metro Airport was 0.88 inches. This was the 7th driest February on record at Columbia. The total precipitation at Augusta Bush Field was 1.14 inches. Precipitation records for Columbia began in 1878. Precipitation records for Augusta began in 1871.

Here are a few reports from NWS Coop Stations:

Lancaster (LKRS1) – 4.09 inches Chesterfield 3 E (CTFS1) – 2.68 inches Cheraw Water Plant (CEWS1) – 2.38 inches McCormick (MCCS1) – 2.22 inches Fairfield Pump Storage (PASS1) – 2.05 inches

Here are a few reports from the CoCoRaHS (Community, Collaborative, Rain, Hail and Snow Network) observers:

South Carolina:

SC-LN-2 Fort Mill 3.5 ENE - 5.30 inches

SC-LN-4 Lancaster 2.0 NNW – 4.15 inches

SC-CF-5 Pageland 9.0 WNW – 4.11 inches

SC-FR-7 Winnsboro 8.0 S – 4.11 inches

SC-RC-30 Hopkins 3.9 NNE – 3.18 inches

Georgia:

GA-LC-2 Tignall 10.2 NE - 2.57 inches

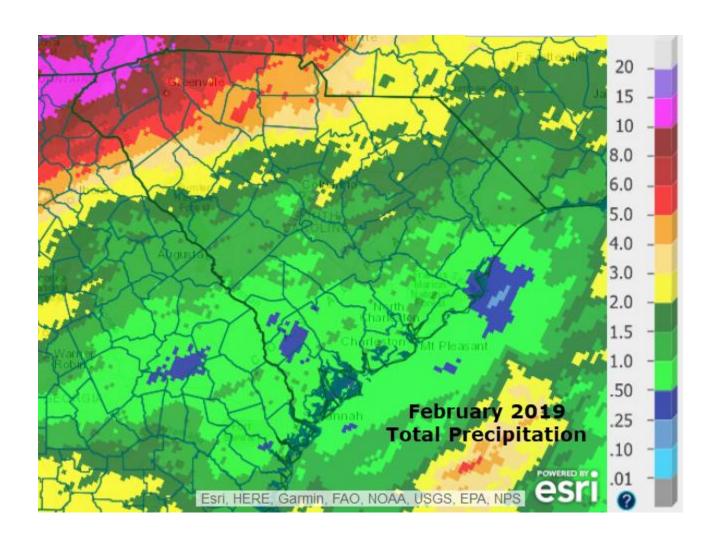
GA-MD-1 Thomson 2.5 S - 1.98 inches

GA-CU-9 Appling 2.0 E – 1.96 inches

GA-RC-9 W. Augusta 0.9 NW – 1.69 inches

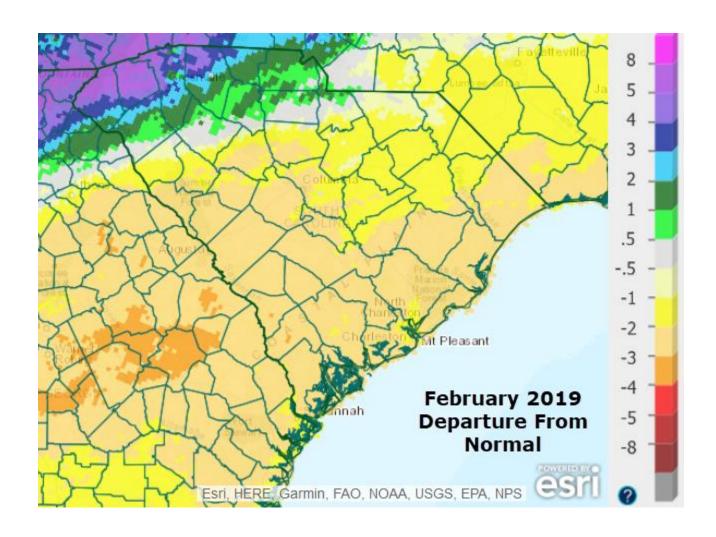
GA-BK-1 Waynesboro 3.3 SW – 1.34 inches

(Please see the precipitation maps below).



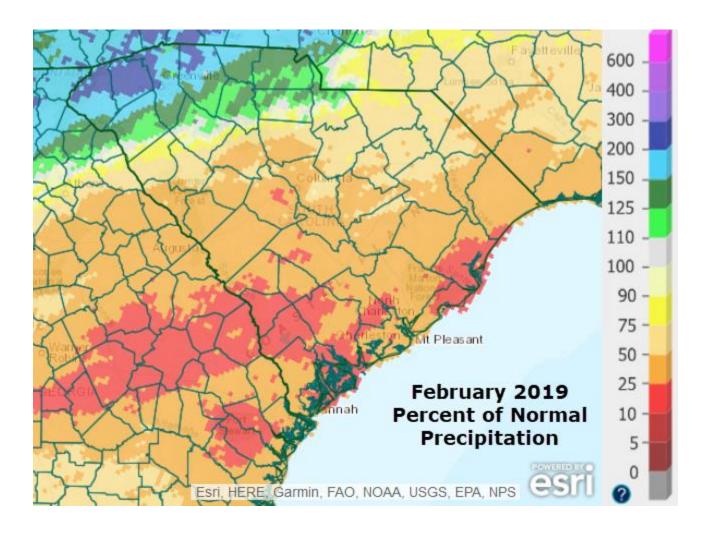
February 2019 Total Precipitation (inches)

Source: Advanced Hydrologic Prediction Service, NWS



February 2019 Precipitation Departure from Normal (inches)

Source: Advanced Hydrologic Prediction Service, NWS



February 2019 Percent of Normal Precipitation

Source: Advanced Hydrologic Prediction Service, NWS

February 2019 precipitation at observation sites was as follows:

Station	Rainfall	Normal	Departure From Normal
Augusta (AGS)	1.14	3.92	-2.78
Augusta (DNL)	1.23	4.03	-2.80
Columbia (CAE)	0.88	3.61	-2.73
Columbia (CUB)	1.46	3.65	-2.19
Orangeburg (CUB)	0.73	3.59	-2.86

River/Flood Conditions

Minor flooding occurred on many of the area rivers during the later portion of February. January. A series of low pressure systems moved up along the Appalachian Mountains and produced widespread heavy rainfall in the headwaters of the area rivers. Rainfall amount of 2 to 4 inches occurred across western North Carolina and the mountains of South Carolina.

Along the Congaree River, minor flooding occurred at Carolina Eastman and the Congaree NP-Gadsden. At Carolina Eastman, the river reached the flood stage of 115.0 feet on the morning of the 21st. The river crested at 117.0 feet on the morning of the 22nd. At the Congaree NP-Gadsden, the river reached the flood stage of 15.0 feet on the morning of the 21st. The river crested at 16.16 feet around noon on the 22nd. At Cheraw on the Great Pee Dee River, the river reached the flood

stage of 30.0 feet on the early afternoon of the 22nd. The river crested at 36.57 feet on the morning of the 24th. At Whitmire on the Enoree River, the river reached the flood stage of 25.0 feet on the morning of the 23rd. The river crested at 25.50 feet during the late afternoon of the 23rd. The Saluda River at Chappells reached the flood stage of 14.0 feet on the late evening of the 23rd. The river crested at 18.76 feet on the afternoon of the 24th. The pool height at Lake Wateree reached the full pool level of 100.0 feet just after midnight on the 24th. The pool height crested at 101.74 feet on the afternoon of the 25th.

Drought Conditions

The area remains free from drought, although precipitation amounts have fallen below normal for much of the Midlands and Central Savannah Area River. February was especially dry with many areas only receiving 1 to 2 inches of rainfall.

(Please see the maps below).

Drought in South Carolina

Residents in drought:

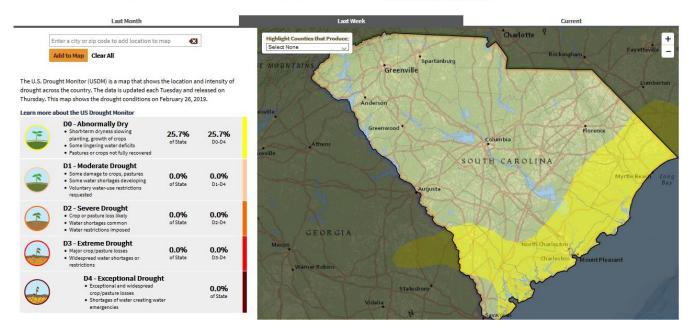


1,031,000 more in abnormally dry areas.

This is:

of the state's population, 23% more in abnormally dry areas.



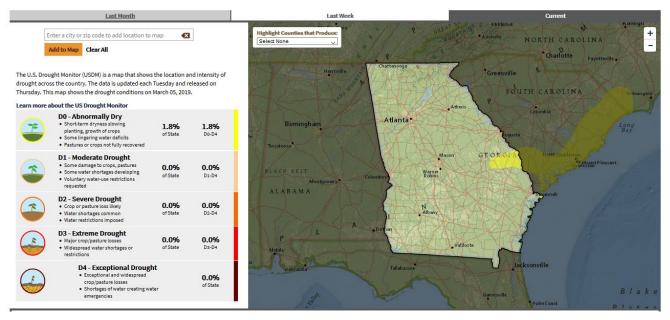


Drought in Georgia





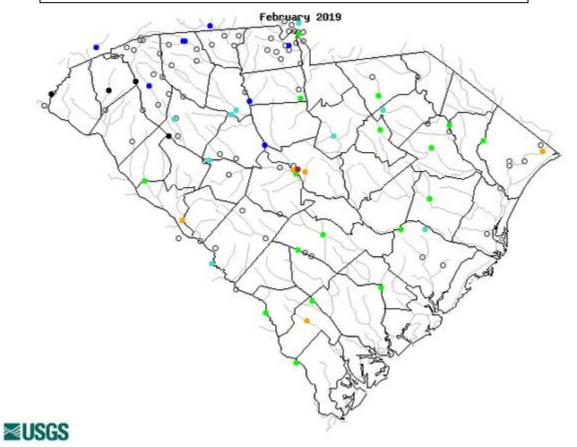




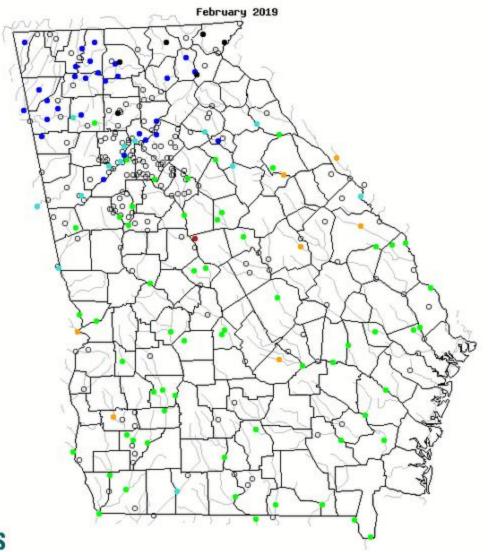
Streamflow Conditions

Monthly average stream flows during February across the Midlands and Central Savannah River Area ranged from Much Above Normal to Normal across the Broad River, Santee River, Savannah River, Catawba/Wateree River, Lynches River and Edisto River Basins. Even with the below normal rainfall, high rainfall totals in the headwaters produced flows at or above normal for this time of year across the area.

Stream Flow Compared to Historical Stream Flow for the Month



Explanation - Percentile classes							
•		•	•			•	0
Low	<10	10-24	25-75	76-90	>90	Lliab	Not-ranked
Low	Much below normal	Below normal	Normal	Above normal	Much above normal	High	Not-ranked



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Explanation - Percentile classes							
		•	•		•	•	0
ow	<10	10-24	25-75	76-90	>90	High	Not-ranked
	Much below normal	Below normal	Normal	Above normal	Much above normal		Not-ranked

Temperatures

February 2019 temperatures were above normal for the month. Temperatures averaged from 4 to 6 degrees above normal across the region.

The monthly average temperature at Columbia (CAE) was 53.2 degrees. This value was 4.7 degrees above the normal of 48.5 degrees. The highest temperature during the month was 83 degrees reached on the 7th. The lowest temperature was 25 degrees that occurred on the 1st.

The average temperature for the month at Augusta (AGS) was 55.8 degrees. This value was 6.7 degrees above the normal of 49.1 degrees. The highest temperature during the month was 85 degrees reached on the 7th. The lowest temperature was 26 degrees that occurred on the 1st.

The average temperature for the month at Orangeburg (OGB) was 54.9 degrees. This value was 5.3 degrees above the normal of 49.6 degrees. The highest temperature during the month was 81 degrees reached on the 7th. The lowest temperature was 28 degrees that occurred on the 1st.

Hydrological Products

The following products were issued during February 2019.

DGT	Drought Statements	0
ESF	Hydrologic Outlooks	2
FFA	Flash Flood Watches	0
FFS	Flash Flood Statements	0
FFW	Flash Flood Warnings	0
FLS	Flood Statements	52
FLW	Flood Warnings	7
FLS	Areal Flood Advisories	0