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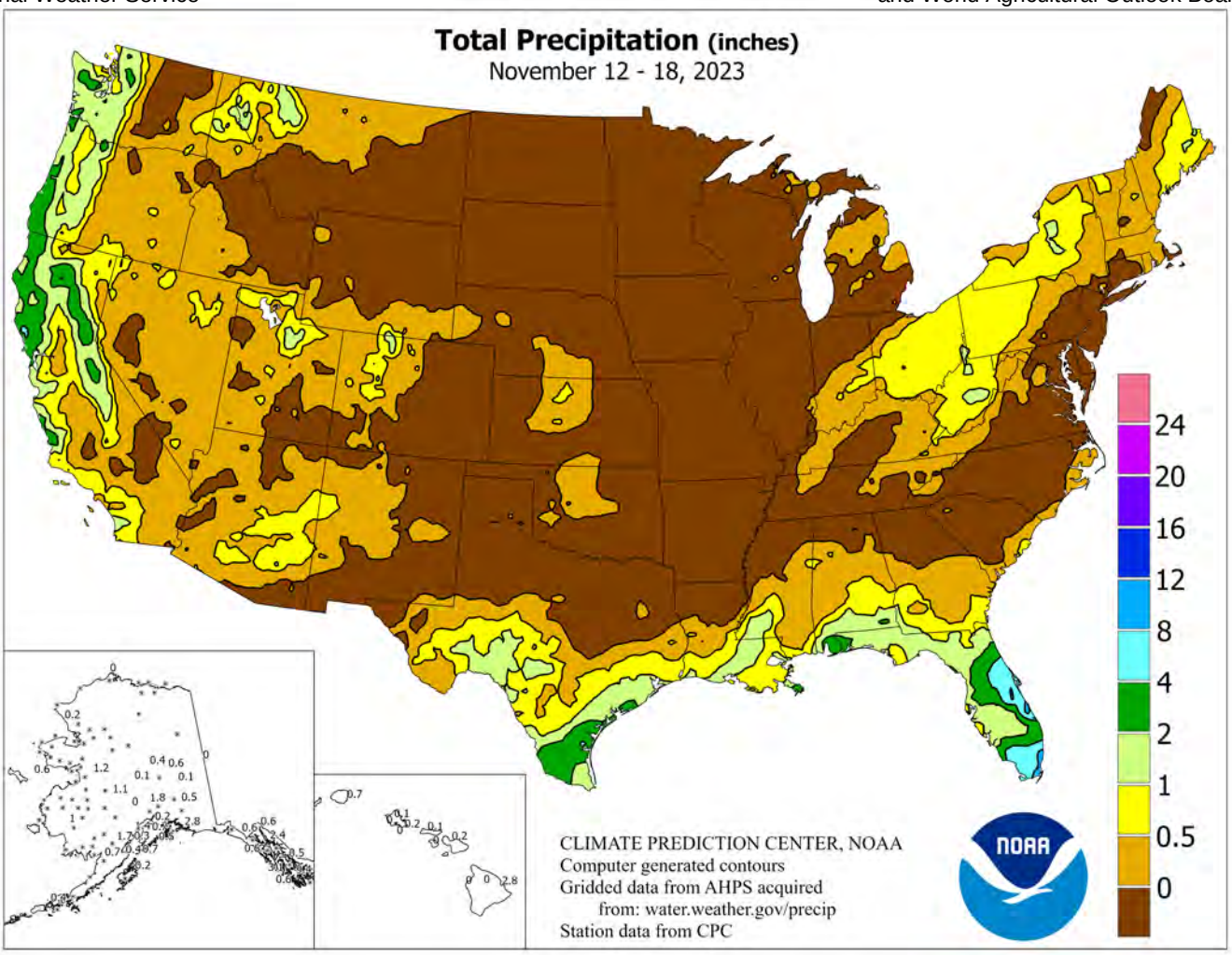
WEEKLY WEATHER AND CROP BULLETIN

U.S. DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration
National Weather Service

U.S. DEPARTMENT OF AGRICULTURE
National Agricultural Statistics Service
and World Agricultural Outlook Board



HIGHLIGHTS

November 12 – 18, 2023

Highlights provided by USDA/WAOB

Dry weather dominated much of the country, allowing most fieldwork—including summer crop harvesting and winter wheat planting—to near completion. By November 19 the U.S. corn harvest was 93 percent complete, ahead of the 5-year average of 91 percent. On the same date, harvest progress numbers for sorghum (96 percent complete), peanuts (92 percent), and cotton (77 percent) were also ahead of average. Precipitation was mostly confined to the fringes of the country—across the **Deep South** and from the **Ohio Valley into the Northeast**.

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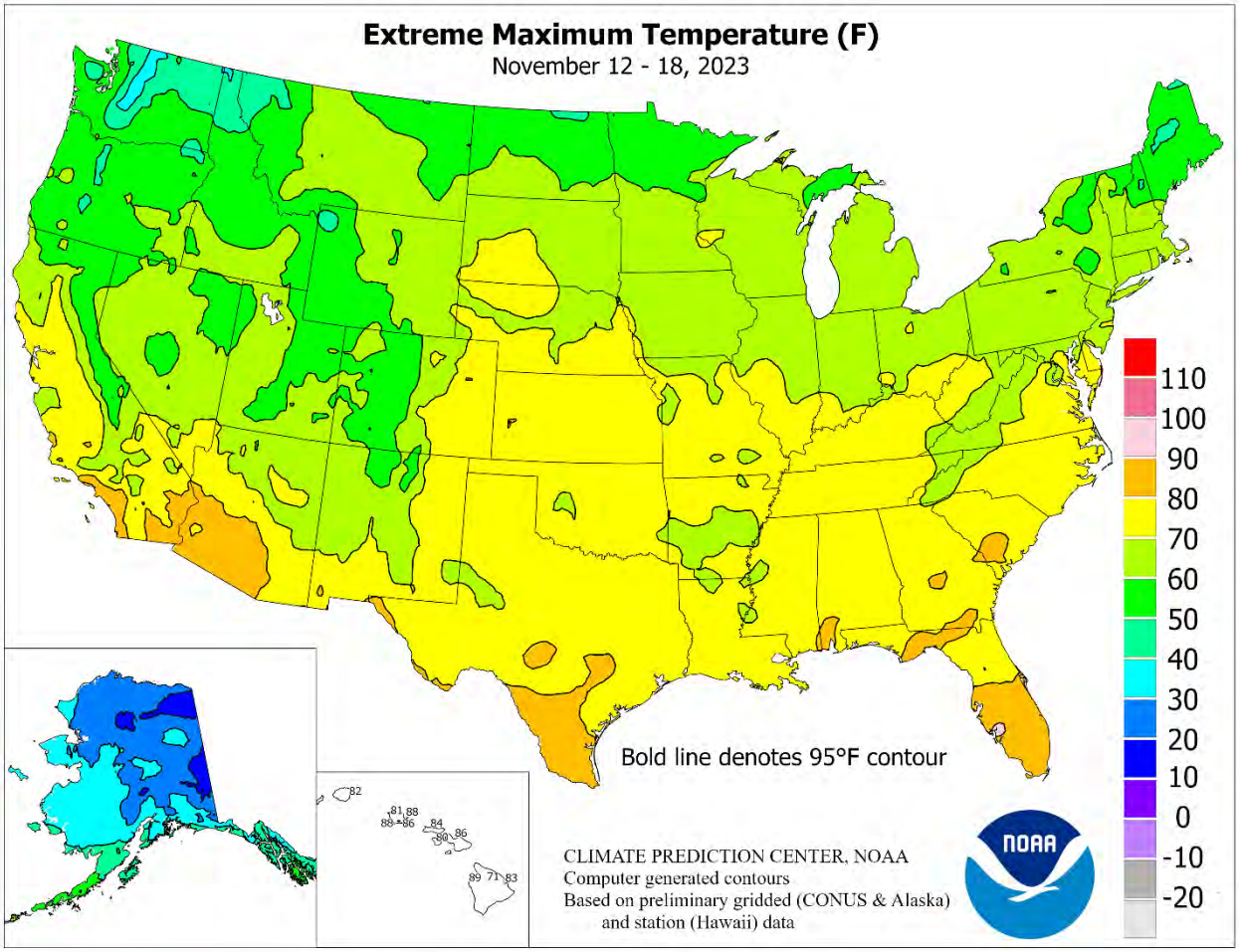
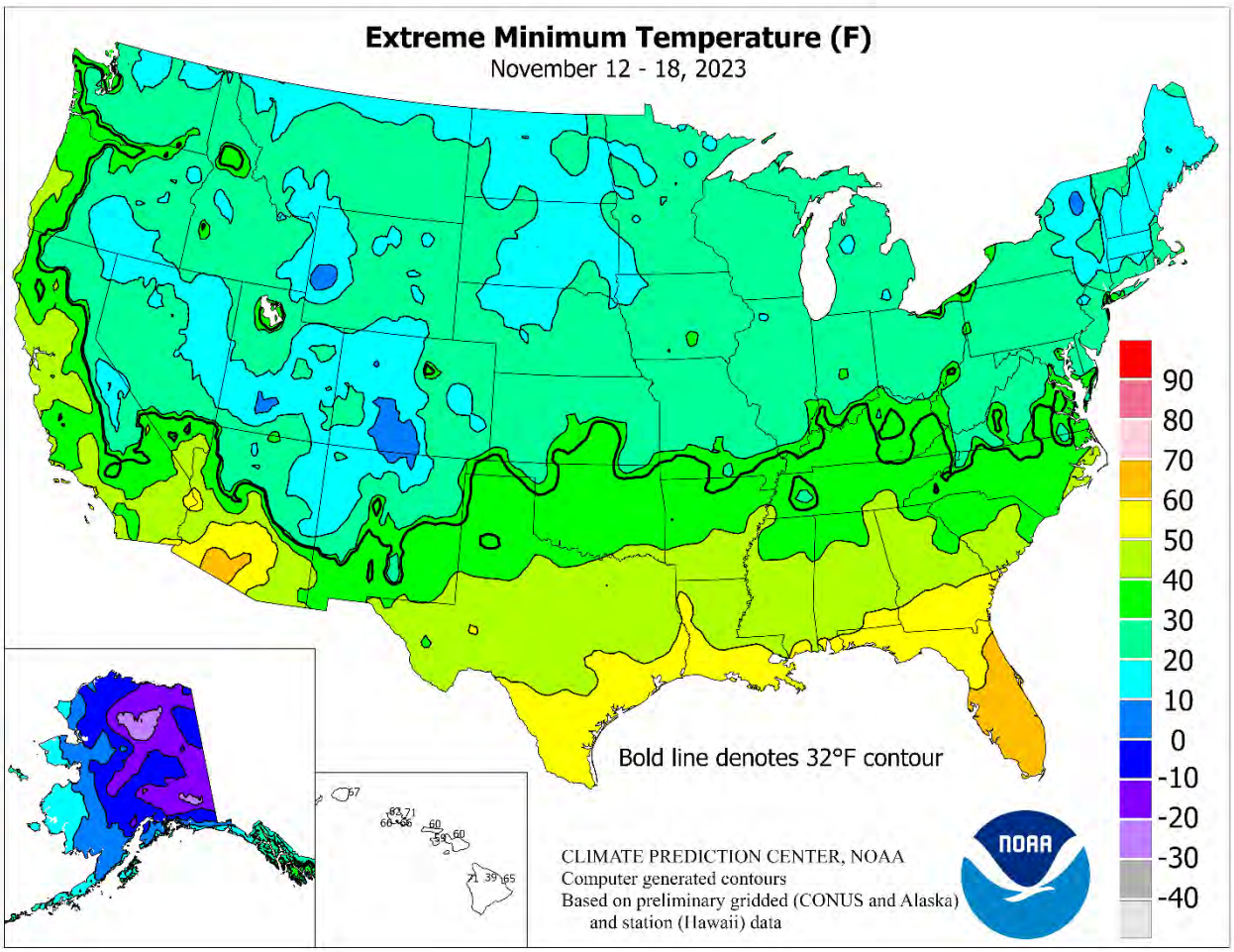
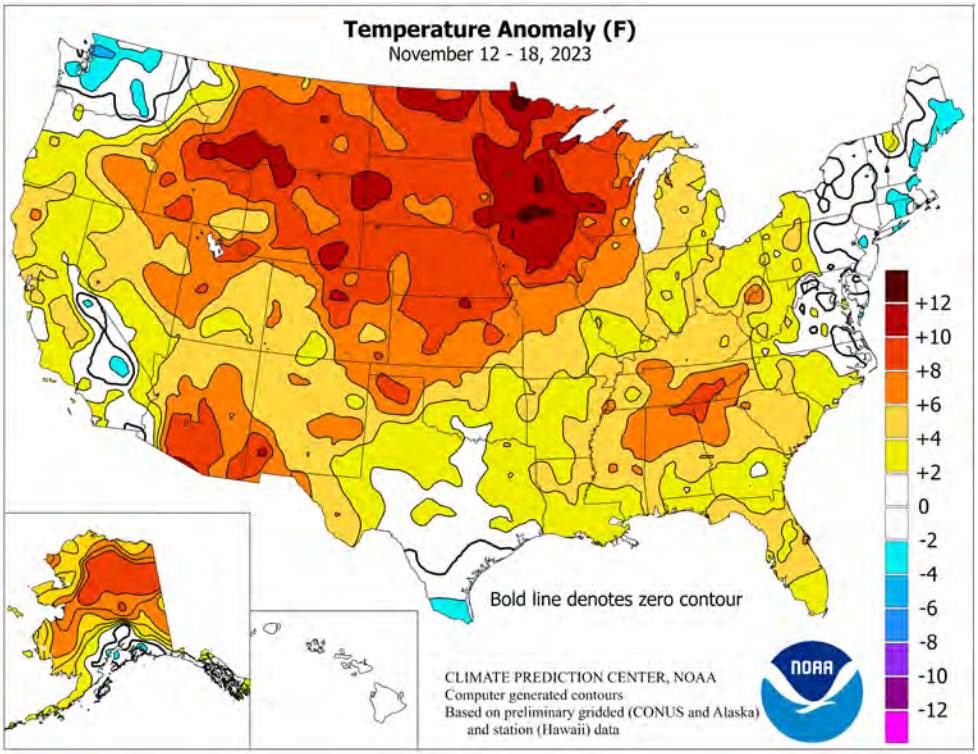

Extreme Maximum Temperature (F)
November 12 - 18, 2023
110
100
90
80
70
60
50
40
30
20
10
0
-10
-20
Bold line denotes 95°F contour
CLIMATE PREDICTION CENTER, NOAA
Computer generated contours
Based on preliminary gridded (CONUS & Alaska)
and station (Hawaii) data
NOAA


Extreme Minimum Temperature (F)
November 12 - 18, 2023
90
80
70
60
50
40
30
20
10
0
-10
-20
-30
-40
Bold line denotes 32°F contour
CLIMATE PREDICTION CENTER, NOAA
Computer generated contours
Based on preliminary gridded (CONUS and Alaska)
and station (Hawaii) data
NOAA

(Continued from front cover)

However, parts of **Florida's peninsula** received excessive rainfall (4 to 10 inches or more), as a non-tropical storm system grazed the region. During the mid- to late-week period, precipitation gradually increased across the **West**, with the highest totals in portions of the **Pacific Coast States**. However, **Western** showers were scattered and generally caused only minor fieldwork delays. For the second week in a row, near- or above-normal temperatures prevailed nearly nationwide. Temperatures broadly averaged at least 10°F above normal across the **northern half of the Plains** and the **upper Midwest**. Readings averaged more than 5°F in a much larger area stretching from the **Great Basin and Intermountain West to the northern and central Plains and the Midwest**, as well as portions of the **Southeast**. Elsewhere, near- or slightly below-normal temperatures were limited to a few areas, including parts of **southern California**, **southern Texas**, the **Northeast**, and the **Pacific Northwest**.



Early-week warmth was focused across **southern Florida**, where daily-record highs on November 12 included 92°F in **Punta Gorda** and 89°F in **Naples**. A few days later, a late-season warm spell developed across the **nation's mid-section**. By November 14, **International Falls, MN**, posted a daily-record high of 58°F. **Midwestern** warmth generally peaked on November 16, when daily-record highs surged to 70°F in **Eau Claire, WI**; 69°F in **Minneapolis-St. Paul, MN**; and 65°F in **Pellston, MI**. Warm weather extended to other regions, with daily records for the 16th reaching 78°F in **Huntsville, AL**, and 63°F in **Ontario, OR**. Late in the week, lingering warmth across the **Deep South** led to a daily-record high of 83°F (on November 18) in **El Paso, TX**.

Florida's heavy rain highlighted an otherwise quiet week. November 13-16 totals in **southern Florida** reached 12.47 inches in **North Fort Lauderdale**; 10.76 inches in **Fort Lauderdale**; 10.26 inches in **Pembroke Pines**; 9.89 inches in **Opa Locka**; and 8.84 inches in **Miami**. For all those locations, the heaviest rain fell on November 15, with **Miami** reporting 7.53 inches. That represented the wettest November day in **Miami** since November 18, 1992, when 7.56 inches fell. It was also **Miami's** wettest day during any time of year since May 22, 2012, when rainfall totaled 9.70 inches. Meanwhile, **Marathon, FL**—with 6.68 inches on the 15th—experienced its wettest November day on record (previously, 4.58 inches on November 14, 1954). Significant winds accompanied **Florida's** rain, with gusts on November 16 clocked to 57 mph in **West Palm Beach**; 51 mph in **Fort Lauderdale**; and 48 mph in **Miami**. Early on the 16th, an unofficial gust to 86 mph was recorded at **Carysfort Reef Light**, about 8 miles east-southeast of **North Key Largo, FL**. **Florida's** rain eventually shifted northward, with **Fort Pierce** noting a daily-record sum (4.33 inches) for November 16. **Fort Pierce** collected another record-setting total, 2.37 inches, on November 17. Farther west, heavy rain lingered early in the week across **southern Texas**, where record-setting totals for November 12 included 1.70 inches in **Corpus Christi** and 1.32 inches in **McAllen**. November 9-13 rainfall topped 4 inches in **southern Texas** locations such as **Port Isabel** (4.35 inches) and **Brownsville** (4.31 inches). By mid-week, precipitation arrived in parts of the **West**. In **Montana**, **Chinook** reported precipitation totaling 0.40 inch, including 2.0 inches of snow, in a 24-hour period on November 15-16. Meanwhile in **Utah**, 24-hour precipitation totals on November 15-16 topped an inch in locations such as **Deer Creek Dam** (1.39 inches) and **Mountain Dell Dam** (1.12 inches). At week's end, additional **Western** precipitation led to daily-record totals for November 18 in **Paso Robles, CA** (1.74 inches), and **Yuma, AZ** (0.25 inch).

Warmer-than-normal weather dominated **Alaska**, although near-normal temperatures covered much of the **state's southern tier**. Readings averaged at least 10°F above normal in a few areas, including much of **east-central Alaska**. However, periods of stormy weather accompanied **Alaska's** mild conditions. In **southeastern Alaska**, **Ketchikan** collected 8.33 inches of rain from November 16-18. In **south-central Alaska**, **Anchorage** achieved its snowiest November on record, with 39.1 inches falling by the 18th. The previous November record in **Anchorage**, set in 1994, had been 38.8 inches. This month's snow in **southern Alaska** has been wet, with a liquid equivalency of 3.02 inches in **Anchorage**. Finally, **Anchorage** netted a daily-record snowfall of 8.7 inches on November 13, the fourth time this month—along with November 5, 8, and 9—that at least 6 inches has fallen on a calendar day. Late in the week, the arrival of colder air resulted in the first sub-zero reading of the season on November 17 in locations such as **Fairbanks** (-8°F) and **Kotzebue** (-1°F). In **western Alaska**, a mid-month highlight (on the 15th) was peak wind gusts to 70 mph in **Cold Bay** and 63 mph on **St. Paul Island**. Farther south, a weakening cold front delivered beneficial showers across **Hawaii's western islands**, including **Kauai**. Mostly dry weather persisted farther east. Through November 18, month-to-date rainfall at the state's major airport observation sites ranged from 0.02 inch (1 percent of normal) in **Honolulu, Oahu**, to 3.13 inches (37 percent) in **Hilo**, on the **Big Island**. **Lihue, Kauai**, received measurable rain each day during the week, totaling 0.72 inch.

National Weather Data for Selected Cities

Weather Data for the Week Ending November 18, 2023

Data Provided by Climate Prediction Center

STATES AND STATIONS		TEMPERATURE ˚F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS TEMP. ˚F		NUMBER OF DAYS PRECIP	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE SEP 1	PCT. NORMAL SINCE SEP 1	TOTAL, IN., SINCE JAN 1	PCT. NORMAL SINCE JAN 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
AK	ANCHORAGE	29	18	39	4	23	0	0.65	0.38	0.55	9.22	162	23.43	158	92	68	0	7	4	1
	BARROW	19	7	27	-6	13	0	0.00	-0.08	0.00	0.00	0	4.59	93	89	67	0	7	0	0
	FAIRBANKS	24	5	30	-10	15	11	0.36	0.18	0.27	2.52	97	9.42	87	85	73	0	7	3	0
	JUNEAU	39	30	42	25	35	1	2.36	0.89	0.70	27.93	130	62.04	107	96	82	0	5	6	2
	KODIAK	40	29	48	23	35	-1	0.21	-1.37	0.16	11.20	54	53.96	80	79	42	0	6	3	0
	NOME	30	20	36	12	25	7	0.57	0.28	0.24	6.72	138	21.11	134	90	69	0	7	6	0
AL	BIRMINGHAM	70	51	77	44	60	6	0.08	-0.91	0.08	2.56	26	42.93	85	82	45	0	0	1	0
	HUNTSVILLE	70	49	78	40	60	7	0.06	-0.87	0.06	1.78	19	36.78	79	81	42	0	0	1	0
	MOBILE	70	57	80	52	64	5	1.69	0.61	0.92	6.33	52	47.15	78	92	68	0	0	4	2
	MONTGOMERY	69	53	77	47	61	5	0.34	-0.59	0.20	6.92	79	42.52	95	92	58	0	0	2	0
AR	FORT SMITH	67	48	70	40	57	6	0.00	-0.90	0.00	8.72	79	38.41	90	100	53	0	0	0	0
	LITTLE ROCK	67	49	70	43	58	7	0.00	-1.08	0.00	6.16	60	49.17	113	82	47	0	0	0	0
AZ	FLAGSTAFF	58	28	62	21	43	6	0.16	-0.18	0.16	1.48	34	23.21	129	84	36	0	5	1	0
	PHOENIX	84	64	89	60	74	8	0.23	0.11	0.14	0.32	22	3.20	51	60	28	0	0	2	0
	PRESCOTT	67	39	71	30	53	6	0.25	0.10	0.25	0.89	35	9.30	80	77	31	0	1	1	0
	TUCSON	82	60	86	57	71	9	0.13	0.02	0.09	0.66	30	8.50	91	67	30	0	0	2	0
CA	BAKERSFIELD	78	52	81	45	65	9	0.01	-0.10	0.01	0.33	54	8.59	171	67	21	0	0	1	0
	EUREKA	62	48	69	43	55	5	0.93	-0.17	0.28	6.90	125	27.81	93	96	69	0	0	4	0
	FRESNO	73	51	77	45	62	7	0.10	-0.09	0.08	0.19	17	12.81	145	77	30	0	0	2	0
	LOS ANGELES	73	56	83	53	65	2	0.12	-0.06	0.12	0.17	17	21.80	227	87	39	0	0	1	0
	REDDING	67	46	72	41	56	3	1.85	1.09	1.64	3.83	92	32.34	127	90	48	0	0	4	1
	SACRAMENTO	68	49	73	43	58	5	0.25	-0.09	0.21	1.06	60	14.34	103	93	47	0	0	4	0
	SAN DIEGO	73	54	80	48	64	1	0.15	-0.01	0.12	0.21	21	13.10	170	86	43	0	0	2	0
	SAN FRANCISCO	68	56	73	51	62	5	1.09	0.65	0.48	1.17	63	21.10	146	86	56	0	0	5	0
	STOCKTON	69	46	74	41	58	3	0.39	0.08	0.31	0.67	44	13.94	134	94	48	0	0	2	0
CO	ALAMOSA	58	10	64	4	34	3	0.00	-0.08	0.00	1.31	70	3.84	55	77	20	0	7	0	0
	CO SPRINGS	65	32	72	27	48	9	0.00	-0.08	0.00	2.43	102	24.85	159	62	16	0	4	0	0
	DENVER INTL	66	34	70	31	50	10	0.00	-0.15	0.00	1.10	39	18.18	130	60	18	0	3	0	0
	GRAND JUNCTION	61	32	64	22	47	7	0.17	0.04	0.17	0.79	30	6.34	76	70	29	0	3	1	0
	PUEBLO	69	26	77	20	47	7	0.00	-0.11	0.00	1.68	97	11.39	98	65	14	0	6	0	0
CT	BRIDGEPORT	54	34	63	30	44	-2	0.03	-0.65	0.03	11.26	117	40.78	105	90	49	0	3	1	0
	HARTFORD	53	28	66	21	40	-2	0.04	-0.73	0.04	15.38	141	55.00	132	93	47	0	6	1	0
DC	WASHINGTON	62	41	71	35	51	1	0.02	-0.61	0.01	4.54	48	26.83	72	85	40	0	0	2	0
DE	WILMINGTON	55	32	68	26	43	-3	0.01	-0.65	0.01	6.15	62	40.47	100	92	53	0	3	1	0
FL	DAYTONA BEACH	75	67	78	63	71	4	9.00	8.34	6.95	21.40	155	55.46	115	99	75	0	0	5	2
	JACKSONVILLE	70	60	80	56	65	3	1.22	0.76	0.93	12.68	99	42.95	86	95	73	0	0	3	1
	KEY WEST	83	75	85	72	79	2	1.15	0.72	1.07	14.46	101	28.73	76	94	72	0	0	2	1
	MIAMI	83	73	88	69	78	3	8.83	8.01	7.78	27.35	135	73.56	115	90	64	0	0	4	2
	ORLANDO	78	68	81	64	73	5	4.90	4.52	3.99	14.35	131	44.71	92	97	72	0	0	4	2
	PENSACOLA	71	58	80	56	65	3	2.04	1.02	1.59	7.47	53	51.49	84	89	62	0	0	3	1
	TALLAHASSEE	73	59	81	53	66	6	0.69	-0.03	0.56	8.81	89	46.10	86	96	65	0	0	3	1
	TAMPA	79	68	88	65	74	4	0.72	0.41	0.37	7.07	76	30.87	66	94	72	0	0	4	0
	WEST PALM BEACH	81	70	87	67	76	3	2.20	1.35	1.55	19.81	122	66.18	116	95	60	0	0	5	1
GA	ATHENS	67	49	77	40	58	5	0.00	-0.91	0.00	2.00	21	43.92	102	87	41	0	0	0	0
	ATLANTA	68	53	74	50	60	6	0.00	-0.96	0.00	3.75	39	35.74	80	80	45	0	0	0	0
	AUGUSTA	70	48	79	40	59	3	0.02	-0.59	0.01	10.40	134	56.42	144	95	45	0	0	2	0
	COLUMBUS	67	53	75	50	60	3	0.38	-0.57	0.33	5.58	66	43.09	101	90	55	0	0	2	0
	MACON	69	51	80	48	60	4	0.17	-0.63	0.17	4.56	55	40.82	99	97	53	0	0	1	0
	SAVANNAH	70	56	79	51	63	4	0.15	-0.39	0.07	3.04	32	36.00	82	91	57	0	0	4	0
HI	HILO	81	67	83	65	74	0	2.80	-0.65	0.92	10.66	38	85.35	83	97	61	0	0	6	3
	HONOLULU	83	73	86	66	78	0	0.01	-0.55	0.01	0.70	18	10.48	78	81	54	0	0	1	0
	KAHULUI	83	69	86	60	76	-1	0.16	-0.26	0.10	0.36	16	9.82	78	84	52	0	0	4	0
	LIHUE	81	72	82	67	76	0	0.70	-0.26	0.35	3.62	46	35.18	117	84	59	0	0	6	0
IA	BURLINGTON	62	33	65	25	47	6	0.00	-0.54	0.00	3.26	40	24.72	70	78	34	0	3	0	0
	CEDAR RAPIDS	62	33	66	22	47	10	0.00	-0.48	0.00	4.05	53	17.04	50	76	31	0	4	0	0
	DES MOINES	64	38	69	31	51	12	0.00	-0.45	0.00	4.32	60	23.00	67	70	31	0	2	0	0
	DUBUQUE	59	32	63	23	46	9	0.00	-0.52	0.00	7.91	97	28.99	81	75	35	0	4	0	0
	SIOUX CITY	64	29	70	21	46	10	0.02	-0.28	0.02	6.37	110	22.98	82	93	32	0	4	1	0
	WATERLOO	62	31	67	24	47	9	0.00	-0.44	0.00	5.22	73	21.16	62	76	33	0	4	0	0
ID	BOISE	62	39	67	36	51	10	0.00	-0.28	0.00	2.05	107	9.12	96	74	31	0	0	0	0
	LEWISTON	49	38	56	30	43	1	0.22	-0.07	0.22	4.06	166	9.37	83	90	67	0	1	1	0
	POCATELLO	59	26	63	22	42	7	0.01	-0.20	0.01	4.02	166	11.61	113	87	33	0	6	1	0
IL	CHICAGO/O_HARE	61	37	66	31	49	8	0.01	-0.55	0.01	5.69	70	29.58	84	73	35	0	3	1	0
	MOLINE	63	33	67	23	48	8	0.00	-0.54	0.00	7.91	104	25.40	71	76	31	0	4	0	0
	PEORIA	63	35	69	27	49	7	0.02	-0.62	0.02	4.96	59	29.42	85	77	29	0	3	1	0
	ROCKFORD	60	28	66	20	44	5	0.00	-0.54	0.00	6.96	91	28.09	81	86	32	0	4	0	0
	SPRINGFIELD	64	32	71	22	48	4	0.01	-0.63	0.01	5.79	73	29.96	85	76	24	0	4	1	0
IN	EVANSVILLE	66	37	72	33	51	5	0.12	-0.83	0.12	4.09	45	37.49	88	90	40	0	0	1	0
	FORT WAYNE	59	29	66	22	44	3	0.00	-0.70	0.00	5.00	64	30.78	85	84	41	0	6	0	0
	INDIANAPOLIS	61	35	67	31	48	4	0.31	-0.52	0.31	4.50	53	32.36	82	78	40	0	2	1	0
	SOUTH BEND	61	31	67	25	46	6	0.01	-0.63	0.01	7.77	87	35.85	100	82	37	0	4	1	0
KS	CONCORDIA	68	38	72	30	53	11	0.00	-0.26	0.00	3.96	72	21.13	78	81	31	0	1	0	0
	DODGE CITY	69	36	74	28	52	8	0.00	-0.16	0.00	2.90	74	20.60	99	90	32	0	2	0	0
	GOODLAND	69	27	75	23	48	8	0.00	-0.11	0.00	0.37	11	19.47	105	74	18	0	7	0	0
	TOPEKA	69	36	74	28	53	8	0.00	-0.40	0.00	2.38	31	19.25	56	84	33	0	2	0	0

Based on 1991-2020 normals ***** Not Available**

Weather Data for the Week Ending November 18, 2023

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS TEMP. °F		NUMBER OF DAYS PRECIP	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE SEP 1	PCT. NORMAL SINCE SEP 1	TOTAL, IN., SINCE JAN 1	PCT. NORMAL SINCE JAN 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
	WICHITA	67	38	71	32	53	6	0.00	-0.29	0.00	7.13	105	24.98	76	87	41	0	1	0	0
KY	LEXINGTON	64	39	72	32	51	5	0.04	-0.70	0.04	3.33	37	36.81	83	75	35	0	1	1	0
	LOUISVILLE	66	41	73	37	54	5	0.08	-0.67	0.08	3.77	40	35.44	82	75	33	0	0	1	0
	PADUCAH	68	37	74	32	53	5	0.06	-0.88	0.06	5.07	51	51.35	115	91	37	0	1	1	0
LA	BATON ROUGE	69	58	79	52	64	4	1.67	0.81	1.38	6.16	52	40.35	73	96	73	0	0	3	1
	LAKE CHARLES	69	58	77	54	64	2	0.51	-0.39	0.41	4.46	35	35.00	65	99	72	0	0	3	0
	NEW ORLEANS	68	61	75	58	65	2	0.85	-0.04	0.45	6.37	57	28.33	49	97	80	0	0	3	0
	SHREVEPORT	69	55	75	52	62	6	***	***	***	***	***	***	***	86	56	0	0	***	***
MA	BOSTON	53	35	66	28	44	-1	0.10	-0.73	0.10	5.00	51	39.91	105	84	47	0	2	1	0
	WORCESTER	51	31	62	23	41	0	0.07	-0.82	0.04	12.41	108	54.46	128	87	48	0	5	2	0
MD	BALTIMORE	62	34	72	29	48	1	0.02	-0.66	0.02	7.57	73	32.28	80	88	37	0	1	1	0
ME	CARIBOU	41	26	52	22	33	0	0.42	-0.33	0.36	8.91	94	35.11	98	87	61	0	7	2	0
	PORTLAND	48	25	58	20	37	-4	0.41	-0.55	0.41	8.24	71	45.87	109	97	59	0	7	1	0
MI	ALPENA	56	29	63	26	42	5	0.29	-0.19	0.28	4.52	63	27.14	100	89	42	0	6	2	0
	GRAND RAPIDS	58	30	66	24	44	4	0.06	-0.67	0.06	7.43	78	32.48	90	90	41	0	4	1	0
	HOUGHTON LAKE	54	25	62	22	40	4	0.03	-0.48	0.03	4.17	62	19.44	94	93	47	0	7	1	0
	LANSING	58	30	66	24	44	4	0.01	-0.57	0.01	7.60	101	33.03	108	86	40	0	5	1	0
	MUSKEGON	58	33	63	27	46	5	0.00	-0.68	0.00	7.38	83	28.12	89	83	44	0	3	0	0
	TRAVERSE CITY	59	31	69	28	45	6	0.21	-0.30	0.21	6.67	79	22.52	84	87	36	0	4	1	0
MN	DULUTH	52	30	62	21	41	11	0.00	-0.46	0.00	12.95	169	31.51	108	80	44	0	5	0	0
	INT_L FALLS	48	27	58	20	37	11	0.08	-0.24	0.08	5.61	91	22.44	93	88	49	0	6	1	0
	MINNEAPOLIS	59	36	69	28	48	13	0.00	-0.38	0.00	9.94	150	26.85	90	73	33	0	2	0	0
	ROCHESTER	58	33	67	24	46	12	0.00	-0.43	0.00	8.20	114	28.03	85	79	36	0	2	0	0
	ST. CLOUD	58	29	65	23	44	12	0.00	-0.31	0.00	6.49	99	24.24	89	83	36	0	5	0	0
MO	COLUMBIA	65	37	70	31	51	5	0.00	-0.65	0.00	3.44	38	29.75	77	75	32	0	1	0	0
	KANSAS CITY	65	39	70	32	52	8	0.00	-0.47	0.00	4.33	50	30.72	83	77	40	0	1	0	0
	SAINT LOUIS	68	38	75	33	53	6	0.01	-0.83	0.01	4.83	58	28.92	76	71	27	0	0	1	0
	SPRINGFIELD	66	39	71	32	53	6	0.00	-0.85	0.00	8.28	80	40.82	99	81	37	0	1	0	0
MS	JACKSON	69	55	75	42	62	6	0.67	-0.35	0.48	2.04	20	35.87	71	93	61	0	0	2	0
	MERIDIAN	68	54	77	42	61	5	0.22	-0.72	0.10	2.53	26	50.06	100	96	62	0	0	4	0
	TUPELO	69	50	77	39	60	7	0.08	-0.90	0.05	1.86	18	42.50	85	86	46	0	0	2	0
MT	BILLINGS	59	33	64	29	46	10	0.00	-0.14	0.00	2.61	83	16.54	122	67	24	0	2	0	0
	BUTTE	52	24	57	15	38	10	0.00	-0.14	0.00	4.08	178	17.28	143	82	30	0	7	0	0
	CUT BANK	50	27	60	21	38	8	0.24	0.13	0.23	1.52	78	7.80	75	80	36	0	7	2	0
	GLASGOW	50	28	55	24	39	9	0.03	-0.09	0.03	2.19	95	12.72	99	83	44	0	6	1	0
	GREAT FALLS	55	33	63	28	44	10	0.16	-0.01	0.13	4.53	159	17.05	121	72	31	0	4	2	0
	HAVRE	50	27	60	19	38	7	0.39	0.27	0.24	3.15	147	11.10	98	87	44	0	7	2	0
	MISSOULA	49	27	56	22	38	5	0.13	-0.15	0.12	3.12	108	12.46	98	90	56	0	7	2	0
NC	ASHEVILLE	64	42	68	34	53	5	0.00	-0.85	0.00	2.46	25	30.89	70	86	38	0	0	0	0
	CHARLOTTE	68	46	76	38	57	6	0.00	-0.80	0.00	1.77	20	36.44	94	78	36	0	0	0	0
	GREENSBORO	65	40	71	35	52	3	0.01	-0.75	0.01	5.84	60	35.98	91	84	36	0	0	1	0
	HATTERAS	65	51	74	40	58	-1	0.68	-0.43	0.67	8.72	54	38.97	71	99	62	0	0	2	1
	RALEIGH	68	41	75	33	55	3	0.00	-0.80	0.00	7.65	72	36.08	87	86	39	0	0	0	0
	WILMINGTON	69	49	78	44	59	3	0.90	0.06	0.61	4.96	32	46.74	84	89	51	0	0	2	1
ND	BISMARCK	55	22	63	18	39	9	0.00	-0.15	0.00	4.79	132	19.91	109	89	35	0	7	0	0
	DICKINSON	55	25	64	21	40	10	0.00	-0.11	0.00	3.73	118	14.63	95	81	32	0	7	0	0
	FARGO	55	26	60	20	40	11	0.00	-0.22	0.00	3.50	63	18.63	82	81	42	0	6	0	0
	GRAND FORKS	51	26	58	20	39	12	0.00	-0.21	0.00	4.84	100	13.75	66	81	45	0	7	0	0
	JAMESTOWN	39	37	39	37	38	9	0.00	-0.03	0.00	3.74	93	15.89	82	59	57	0	0	0	0
NE	GRAND ISLAND	67	32	72	25	49	10	0.00	-0.26	0.00	2.34	50	13.52	53	84	27	0	4	0	0
	LINCOLN	68	32	72	25	50	10	0.00	-0.30	0.00	1.99	33	17.82	64	81	29	0	4	0	0
	NORFOLK	65	29	70	23	47	10	0.01	-0.28	0.01	8.81	167	24.33	95	85	29	0	5	1	0
	NORTH PLATTE	69	23	72	20	46	9	0.00	-0.10	0.00	2.28	63	20.36	99	87	23	0	7	0	0
	OMAHA	65	34	70	27	49	9	0.00	-0.34	0.00	3.17	51	22.67	75	85	32	0	4	0	0
	SCOTTSBLUFF	66	28	72	24	47	10	0.14	0.01	0.14	2.74	95	19.07	127	75	24	0	5	1	0
	VALENTINE	66	23	76	17	45	8	0.00	-0.13	0.00	7.34	209	30.72	151	82	21	0	7	0	0
NH	CONCORD	50	22	65	15	36	-3	0.12	-0.65	0.12	6.94	68	32.94	89	97	48	0	7	1	0
NJ	ATLANTIC_CITY	58	31	68	27	44	-3	0.00	-0.72	0.00	9.00	92	32.01	79	91	44	0	5	0	0
	NEWARK	59	37	70	32	48	1	0.00	-0.73	0.00	9.83	103	40.67	99	79	38	0	1	0	0
NM	ALBUQUERQUE	62	40	68	35	51	5	0.19	0.06	0.19	1.68	71	3.78	46	78	34	0	0	1	0
NV	ELY	56	28	63	16	42	7	0.12	-0.02	0.11	1.30	70	10.78	126	75	29	0	4	2	0
	LAS VEGAS	70	51	74	46	61	3	0.08	0.01	0.06	1.36	171	4.15	116	60	29	0	0	2	0
	RENO	61	35	68	31	48	4	0.13	-0.01	0.12	0.83	80	9.98	167	76	29	0	3	2	0
	WINNEMUCCA	63	22	65	20	42	3	0.00	-0.07	0.00	2.44	172	7.93	128	64	15	0	2	0	0
NY	ALBANY	53	28	65	21	40	0	0.19	-0.46	0.15	6.54	70	39.56	109	88	47	0	6	3	0
	BINGHAMTON	49	31	61	24	40	2	0.48	-0.21	0.44	7.57	78	38.51	102	84	51	0	5	2	0
	BUFFALO	53	34	61	31	44	2	0.80	0.00	0.80	7.57	73	34.26	96	83	43	0	2	1	1
	ROCHESTER	54	31	61	26	42	1	0.43	-0.20	0.42	4.24	52	32.21	102	85	44	0	6	2	0
	SYRACUSE	53	31	65	24	42	1	0.89	0.16	0.42	6.02	65	37.49	106	82	44	0	4	3	0
OH	AKRON-CANTON	55	33	63	28	44	1	0.69	-0.01	0.69	3.81	43	33.72	90	85	39	0	4	1	1
	CINCINNATI	61	36	68	31	48	4	0.50	-0.22	0.50	5.09	61	36.15	90	87	39	0	1	1	0
	CLEVELAND	58	35	66	31	47	3	0.69	-0.08	0.69	6.45	67	39.66	108	79	35	0	2	1	1
	COLUMBUS	60	33	68	29	47	3	0.68	0.05	0.68	4.63	60	36.76	98	94	35	0	6	1	1
	DAYTON	60	35	68	30	47	3	0.76	0.06	0.76	3.91	48	31.74	85	76	33	0	1	1	1
	MANSFIELD	57	32	65	27	44	3	0.88	0.16	0.88	4.55	54	38.54	100	82	35	0	4	1	1

Based on 1991-2020 normals ***** Not Available**

Weather Data for the Week Ending November 18, 2023

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS TEMP. °F		NUMBER OF DAYS PRECIP	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE SEP 1	PCT. NORMAL SINCE SEP 1	TOTAL, IN., SINCE JAN 1	PCT. NORMAL SINCE JAN 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
	TOLEDO	60	30	69	26	45	2	0.12	-0.50	0.12	4.73	66	28.41	90	83	36	0	6	1	0
	YOUNGSTOWN	57	30	66	26	44	2	0.80	0.15	0.80	5.13	57	32.22	87	83	36	0	5	1	1
OK	OKLAHOMA CITY	68	40	72	36	54	5	0.00	-0.35	0.00	6.33	77	31.73	93	93	42	0	0	0	0
	TULSA	69	40	72	37	54	4	0.00	-0.61	0.00	8.60	91	34.19	90	88	40	0	0	0	0
OR	ASTORIA	56	40	59	36	48	1	2.50	-0.20	1.34	13.93	88	44.39	80	95	64	0	0	4	2
	BURNS	57	27	62	22	42	7	0.26	0.03	0.26	1.61	94	11.88	141	91	38	0	7	1	0
	EUGENE	57	45	65	43	51	6	0.52	-0.90	0.16	6.84	87	21.37	69	94	67	0	0	5	0
	MEDFORD	56	41	65	35	49	4	0.54	-0.07	0.39	4.88	156	10.57	77	99	66	0	0	3	0
	PENDLETON	47	36	55	33	42	1	0.24	-0.10	0.12	3.55	144	8.32	77	92	70	0	0	3	0
	PORTLAND	54	42	57	37	48	1	0.46	-0.83	0.31	8.48	105	26.20	91	89	58	0	0	4	0
	SALEM	54	41	58	36	47	1	0.66	-0.75	0.29	9.72	118	27.78	91	95	70	0	0	4	0
PA	ALLENTOWN	55	26	66	21	41	-3	0.00	-0.70	0.00	5.63	52	34.53	82	90	44	0	7	0	0
	ERIE	55	37	67	33	46	3	0.74	-0.11	0.74	6.97	63	37.26	99	76	42	0	0	1	1
	MIDDLETOWN	59	32	67	28	46	1	0.02	-0.64	0.02	6.93	66	29.89	75	88	41	0	4	1	0
	PHILADELPHIA	59	37	69	31	48	0	0.00	-0.63	0.00	6.68	70	31.27	80	84	39	0	1	0	0
	PITTSBURGH	60	33	68	28	46	4	0.68	0.03	0.68	5.06	64	27.26	76	80	34	0	3	1	1
	WILKES-BARRE	53	29	65	23	41	-2	0.16	-0.47	0.16	10.64	111	37.39	107	87	46	0	6	1	0
	WILLIAMSPORT	54	28	61	25	41	-1	0.20	-0.53	0.17	5.27	51	34.81	89	93	44	0	7	2	0
RI	PROVIDENCE	54	29	66	21	41	-3	0.16	-0.80	0.15	9.69	90	47.35	115	99	49	0	5	2	0
SC	CHARLESTON	71	53	79	44	62	4	0.21	-0.41	0.08	10.71	89	45.31	94	91	54	0	0	3	0
	COLUMBIA	70	48	79	38	59	5	0.08	-0.56	0.08	6.63	76	47.73	118	93	43	0	0	1	0
	FLORENCE	69	49	78	43	59	4	0.28	-0.34	0.28	4.10	43	36.03	88	87	44	0	0	1	0
	GREENVILLE	67	44	74	36	55	4	0.04	-0.86	0.04	1.73	18	44.72	102	83	33	0	0	1	0
SD	ABERDEEN	60	20	64	15	40	8	0.00	-0.16	0.00	4.67	101	21.68	103	89	34	0	7	0	0
	HURON	62	23	66	18	42	9	0.00	-0.19	0.00	6.06	123	17.25	77	89	31	0	7	0	0
	RAPID CITY	63	26	71	21	45	10	0.00	-0.11	0.00	3.74	126	20.46	120	78	24	0	7	0	0
	SIOUX FALLS	64	27	69	20	46	11	0.00	-0.30	0.00	3.01	51	16.80	63	83	32	0	6	0	0
TN	BRISTOL	68	34	74	29	51	4	0.09	-0.61	0.08	2.04	28	34.40	88	92	32	0	4	2	0
	CHATTANOOGA	70	48	76	43	59	8	0.00	-1.11	0.00	0.48	4	37.96	79	83	35	0	0	0	0
	KNOXVILLE	70	45	76	38	57	8	0.01	-0.93	0.01	1.08	12	38.57	85	84	29	0	0	1	0
	MEMPHIS	68	50	71	42	59	6	0.02	-1.03	0.02	3.76	39	49.25	104	79	43	0	0	1	0
	NASHVILLE	69	45	77	39	57	7	0.04	-0.81	0.04	3.47	37	33.33	75	83	35	0	0	1	0
TX	ABILENE	67	49	73	42	58	2	0.03	-0.28	0.02	5.47	84	21.20	90	93	55	0	0	2	0
	AMARILLO	69	40	75	36	55	7	0.08	-0.08	0.08	1.09	27	15.40	82	92	34	0	0	1	0
	AUSTIN	69	54	81	51	62	1	0.16	-0.52	0.12	9.61	104	22.87	70	97	61	0	0	2	0
	BEAUMONT	69	57	78	54	63	1	0.57	-0.27	0.43	5.69	39	32.60	58	98	73	0	0	3	0
	BROWNSVILLE	76	59	85	56	67	-3	1.36	0.96	1.26	6.34	58	19.91	79	100	67	0	0	2	1
	CORPUS CHRISTI	73	58	78	53	65	-1	2.24	1.78	1.67	8.33	84	25.64	88	100	71	0	0	3	2
	DEL RIO	71	57	80	52	64	3	0.59	0.39	0.55	2.53	47	14.11	75	89	61	0	0	2	1
	EL PASO	72	52	83	43	62	8	0.00	-0.09	0.00	1.51	63	3.94	49	75	40	0	0	0	0
	FORT WORTH	67	52	73	50	60	3	0.00	-0.55	0.00	10.58	120	24.46	73	93	53	0	0	0	0
	GALVESTON	68	61	73	60	65	-1	0.90	-0.01	0.80	5.89	41	21.50	52	94	79	0	0	2	1
	HOUSTON	71	57	78	54	64	2	0.74	-0.13	0.57	8.49	67	37.63	81	96	67	0	0	2	1
	LUBBOCK	65	43	72	36	54	4	0.00	-0.17	0.00	6.86	148	15.85	91	96	54	0	0	0	0
	MIDLAND	61	49	70	49	55	1	0.36	0.20	0.36	5.04	152	6.80	53	99	78	0	0	1	0
	SAN ANGELO	65	49	73	44	57	1	0.56	0.30	0.46	7.88	137	17.00	86	97	70	0	0	2	0
	SAN ANTONIO	69	54	79	49	62	1	0.30	-0.17	0.30	4.41	49	18.02	60	93	63	0	0	1	0
	VICTORIA	71	55	79	51	63	0	1.22	0.54	0.63	10.93	106	28.93	78	96	67	0	0	2	2
	WACO	69	50	75	45	60	3	0.00	-0.62	0.00	9.40	103	25.07	76	96	58	0	0	0	0
	WICHITA FALLS	69	43	73	38	56	3	0.00	-0.37	0.00	5.54	80	20.05	77	93	46	0	0	0	0
UT	SALT LAKE CITY	62	39	68	33	50	8	0.50	0.19	0.45	3.29	105	15.65	115	85	37	0	0	2	0
VA	LYNCHBURG	64	33	70	29	48	2	0.03	-0.73	0.03	4.46	49	35.74	94	91	35	0	4	1	0
	NORFOLK	64	45	76	39	54	1	0.00	-0.70	0.00	3.76	33	39.70	88	91	46	0	0	0	0
	RICHMOND	65	38	74	34	51	2	0.00	-0.69	0.00	6.24	63	31.90	78	89	37	0	0	0	0
	ROANOKE	66	38	71	33	52	4	0.03	-0.65	0.03	3.44	39	26.61	69	76	28	0	0	1	0
	WASH/DULLES	62	32	73	27	47	1	0.08	-0.62	0.08	7.65	80	26.75	69	91	37	0	5	1	0
VT	BURLINGTON	46	32	62	27	39	-1	0.45	-0.16	0.34	10.13	110	36.67	107	86	52	0	3	3	0
WA	OLYMPIA	53	33	58	29	43	0	0.79	-1.23	0.50	11.26	94	29.82	75	93	62	0	4	3	1
	QUILLAYUTE	54	35	56	31	44	0	1.43	-2.25	0.71	24.66	101	65.40	80	85	65	0	3	3	2
	SEATTLE-TACOMA	50	38	52	34	44	-3	0.47	-1.09	0.20	11.49	123	25.63	82	96	60	0	0	3	0
	SPOKANE	40	32	48	29	36	0	0.22	-0.27	0.18	2.58	81	10.00	75	96	78	0	4	2	0
	YAKIMA	49	29	56	25	39	1	0.07	-0.12	0.04	1.17	86	5.40	87	89	50	0	7	2	0
WI	EAU CLAIRE	58	29	70	24	43	10	0.01	-0.41	0.01	5.91	81	24.65	79	83	34	0	6	1	0
	GREEN BAY	59	32	66	25	45	9	0.00	-0.47	0.00	4.10	57	24.10	82	78	36	0	4	0	0
	LA CROSSE	60	35	68	28	47	9	0.00	-0.43	0.00	5.22	71	22.25	67	77	32	0	3	0	0
	MADISON	59	31	64	24	45	8	0.00	-0.53	0.00	5.99	79	27.15	78	82	35	0	4	0	0
	MILWAUKEE	61	35	67	29	48	8	0.00	-0.52	0.00	7.94	108	29.98	94	68	31	0	3	0	0
WV	BECKLEY	60	35	67	28	48	4	0.30	-0.31	0.27	7.54	100	36.54	93	79	33	0	4	2	0
	CHARLESTON	65	33	73	29	49	3	0.48	-0.24	0.48	6.26	76	32.20	77	91	29	0	4	1	0
	ELKINS	62	27	71	24	44	2	0.56	-0.06	0.42	6.24	75	37.90	89	92	32	0	7	2	0
	HUNTINGTON	65	36	73	31	51	4	0.23	-0.45	0.23	3.56	45	29.73	74	81	30	0	3	1	0
WY	CASPER	58	27	62	20	43	8	0.00	-0.15	0.00	2.47	97	14.79	129	66	26	0	5	0	0
	CHEYENNE	62	30	65	23	46	10	0.00	-0.14	0.00	1.34	46	18.06	122	65	17	0	5	0	0
	LANDER	56	29	61	25	42	10	0.00	-0.18	0.00	2.54	88	15.79	128	59	26	0	5	0	0
	SHERIDAN	62	27	65	22	44	11	0.00	-0.18	0.00	5.88	166	21.82	154	77	26	0	7	0	0

Based on 1991-2020 normals ***** Not Available**

National Agricultural Summary

November 13 – 19, 2023

Weekly National Agricultural Summary provided by USDA/NASS

HIGHLIGHTS

Much of the nation was drier than normal, although large parts of Florida, the Rockies, Southwest, and West recorded at least twice the normal amount of weekly precipitation. Some areas in Florida received rainfall totaling 5 inches or more. Meanwhile, most of the nation was warmer than normal. Parts of the upper Midwest, northern Plains, and Rockies recorded temperatures 12°F or more above normal. In contrast, some locations in Maine, Mississippi, and Washington recorded temperatures 3°F or more below normal.

Corn: Ninety-three percent of the 2023 corn acreage was harvested by November 19, three percentage points behind last year but 2 points ahead of the 5-year average. Harvest progress was complete or nearing completion in 13 of the 18 estimating states.

Winter Wheat: Nationwide, producers had sown 95 percent of the intended 2024 winter wheat acreage by November 19, three percentage points behind last year and 1 point behind the 5-year average. Planting progress was complete or nearing completion in 15 of the 18 estimating states. Nationwide, 87 percent of the winter wheat acreage had emerged by November 19, one percentage point ahead of last year and 2 points ahead of the 5-year average. During the week, winter wheat emergence advanced by 15 percentage points or more in California and Missouri. As of November 19, forty-eight percent of the 2024 winter wheat acreage was reported in good to excellent condition, 1 percentage point above the previous week and 16 points above the same time last year.

Cotton: By November 19, seventy-seven percent of the nation's cotton acreage was harvested, 1 percentage point behind last year but 6 points ahead of the 5-year average. Cotton harvest advanced 10 percentage points or more during the week in eight of the 15 estimating states.

Sorghum: Ninety-six percent of the 2023 sorghum acreage had been harvested by November 19, equal to last year but 4 percentage points ahead of the 5-year average. Harvest progress was at or ahead of the 5-year average in five of the six estimating states.

Other Crops: Ninety-two percent of the nation's peanut acreage was harvested as of November 19, two percentage points behind last year but 1 point ahead of the 5-year average. Peanut harvest progress was complete or nearing completion in seven of the eight estimating states.

By November 19, seventy-eight percent of this year's sunflower crop was harvested, 16 percentage points behind last year but equal to the 5-year average. During the week, sunflower harvest advanced 13 percentage points in North Dakota.

Crop Progress and Condition

Week Ending November 19, 2023

Weekly U.S. Progress and Condition Data provided by USDA/NASS

Corn Percent Harvested

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
CO	93	86	91	94
IL	97	95	97	95
IN	94	82	90	91
IA	97	94	97	92
KS	97	97	100	96
KY	99	93	95	97
MI	85	52	67	75
MN	98	93	97	93
MO	96	94	97	94
NE	98	91	95	93
NC	100	100	100	100
ND	98	76	87	77
OH	91	68	81	83
PA	78	56	70	80
SD	99	87	93	86
TN	100	97	98	100
TX	100	97	100	98
WI	76	66	78	77
18 Sts	96	88	93	91

These 18 States harvested 94% of last year's corn acreage.

Cotton Percent Harvested

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
AL	86	79	89	80
AZ	58	51	62	63
AR	100	98	100	97
CA	89	55	75	81
GA	77	57	67	71
KS	84	65	73	50
LA	100	100	100	98
MS	98	96	99	92
MO	96	93	98	92
NC	87	72	86	78
OK	73	60	74	65
SC	72	59	73	69
TN	89	86	95	85
TX	70	56	68	63
VA	86	62	71	75
15 Sts	78	67	77	71

These 15 States harvested 98% of last year's cotton acreage.

Sunflowers Percent Harvested

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
CO	88	92	96	89
KS	92	87	90	89
ND	94	59	72	77
SD	96	72	80	77
4 Sts	94	68	78	78

These 4 States harvested 87% of last year's sunflower acreage.

Sorghum Percent Harvested

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
CO	96	85	92	91
KS	94	90	95	88
NE	97	90	95	93
OK	96	83	91	90
SD	99	86	90	91
TX	100	100	100	99
6 Sts	96	92	96	92

These 6 States harvested 100% of last year's sorghum acreage.

Peanuts Percent Harvested

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
AL	97	91	94	93
FL	100	96	97	98
GA	95	87	92	93
NC	99	96	97	91
OK	94	95	97	87
SC	93	84	91	86
TX	78	66	75	75
VA	100	99	100	97
8 Sts	94	87	92	91

These 8 States harvested 96% of last year's peanut acreage.

Crop Progress and Condition

Week Ending November 19, 2023

Weekly U.S. Progress and Condition Data provided by USDA/NASS

Winter Wheat Percent Planted

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
AR	91	87	94	88
CA	60	45	60	59
CO	100	100	100	100
ID	100	100	100	100
IL	96	96	97	96
IN	99	92	95	96
KS	99	97	98	98
MI	100	92	97	96
MO	96	85	95	89
MT	100	98	99	99
NE	100	100	100	100
NC	78	74	86	70
OH	100	99	100	98
OK	95	91	95	96
OR	100	95	99	99
SD	100	100	100	100
TX	95	82	87	89
WA	100	100	100	100
18 Sts	98	93	95	96

These 18 States planted 88% of last year's winter wheat acreage.

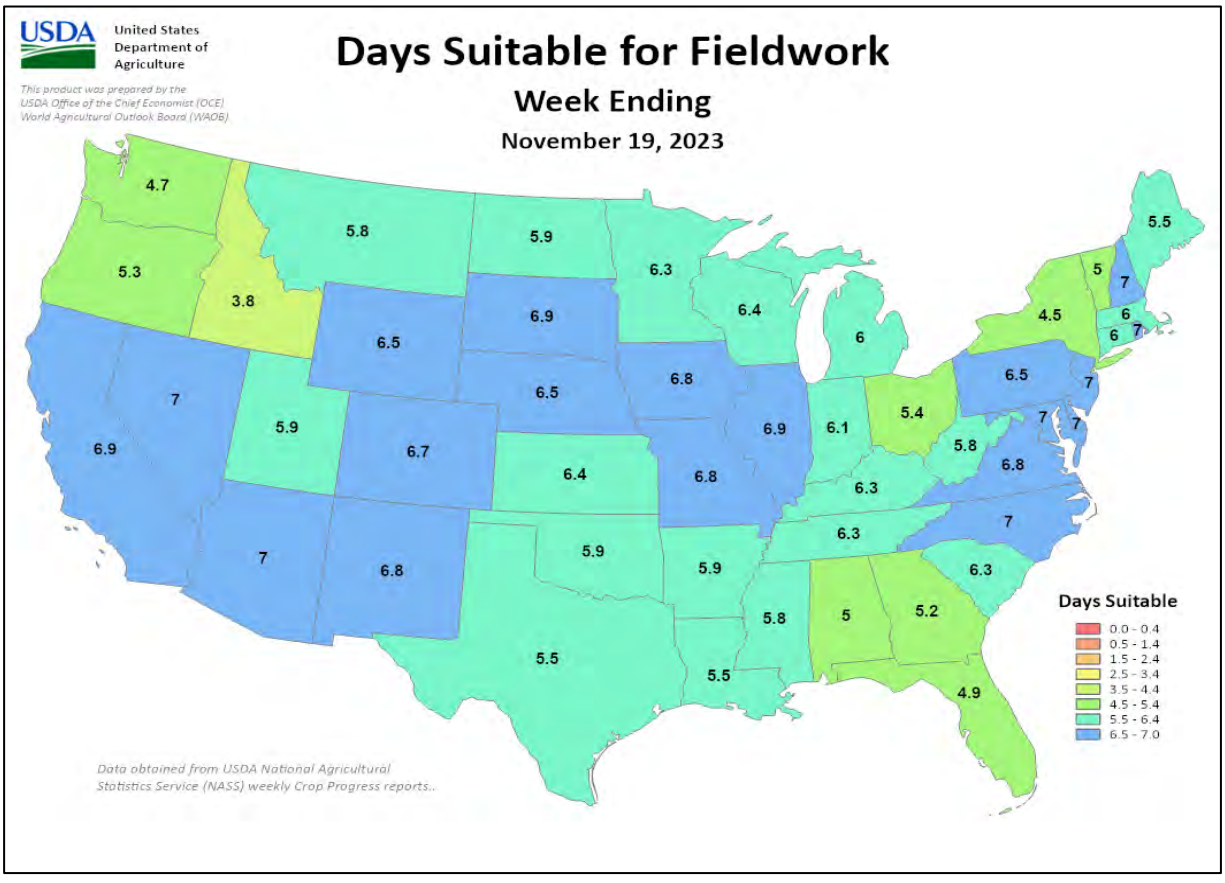
Winter Wheat Percent Emerged

	Prev Year	Prev Week	Nov 19 2023	5-Yr Avg
AR	73	70	77	72
CA	42	20	35	36
CO	99	93	95	94
ID	94	99	100	95
IL	78	85	90	83
IN	85	75	81	85
KS	80	86	91	85
MI	97	76	86	89
MO	81	65	81	74
MT	98	91	95	89
NE	100	99	100	99
NC	59	47	60	51
OH	92	90	95	92
OK	89	79	89	88
OR	82	68	80	76
SD	87	93	96	95
TX	79	66	73	75
WA	95	99	100	92
18 Sts	86	81	87	85

These 18 States planted 88% of last year's winter wheat acreage.

Winter Wheat Condition by Percent

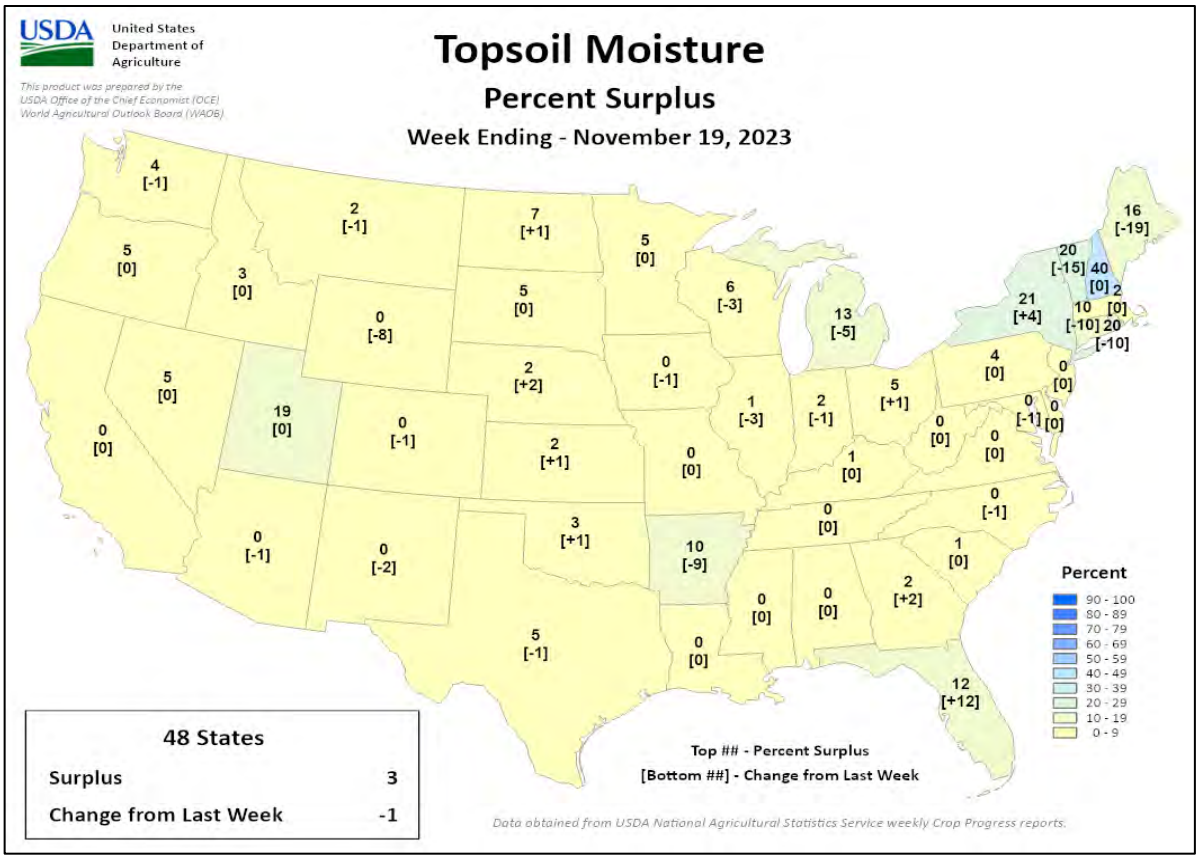
	VP	P	F	G	EX
AR	1	11	34	46	8
CA	0	0	0	40	60
CO	2	6	31	58	3
ID	1	1	18	78	2
IL	0	3	15	64	18
IN	2	4	23	62	9
KS	16	16	35	30	3
MI	0	4	53	41	2
MO	1	5	33	55	6
MT	1	4	37	21	37
NE	2	7	37	38	16
NC	0	6	38	50	6
OH	0	2	14	59	25
OK	3	8	45	41	3
OR	0	21	40	35	4
SD	3	5	39	45	8
TX	9	11	35	33	12
WA	2	8	38	45	7
18 Sts	7	10	35	39	9
Prev Wk	7	10	36	39	8
Prev Yr	15	18	35	27	5

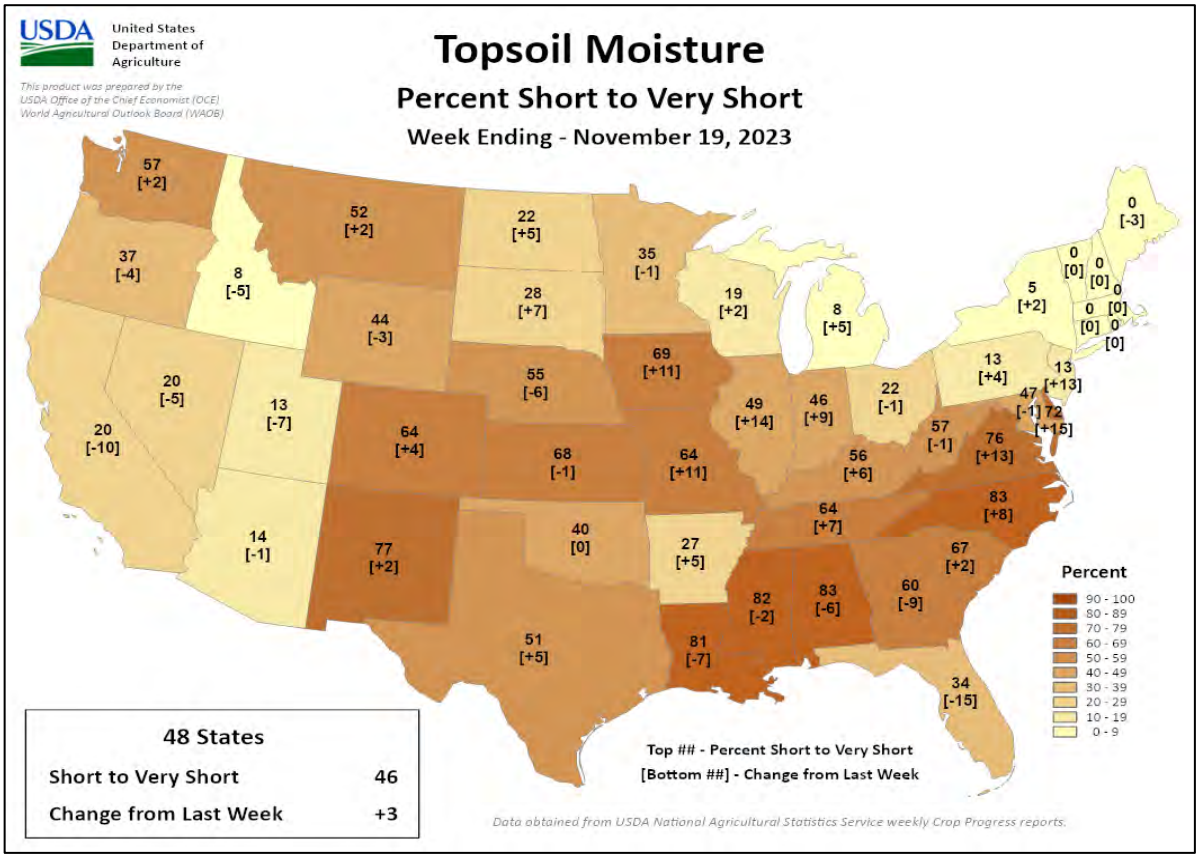


Crop Progress and Condition

Week Ending November 19, 2023

Weekly U.S. Progress and Condition Data provided by USDA/NASS

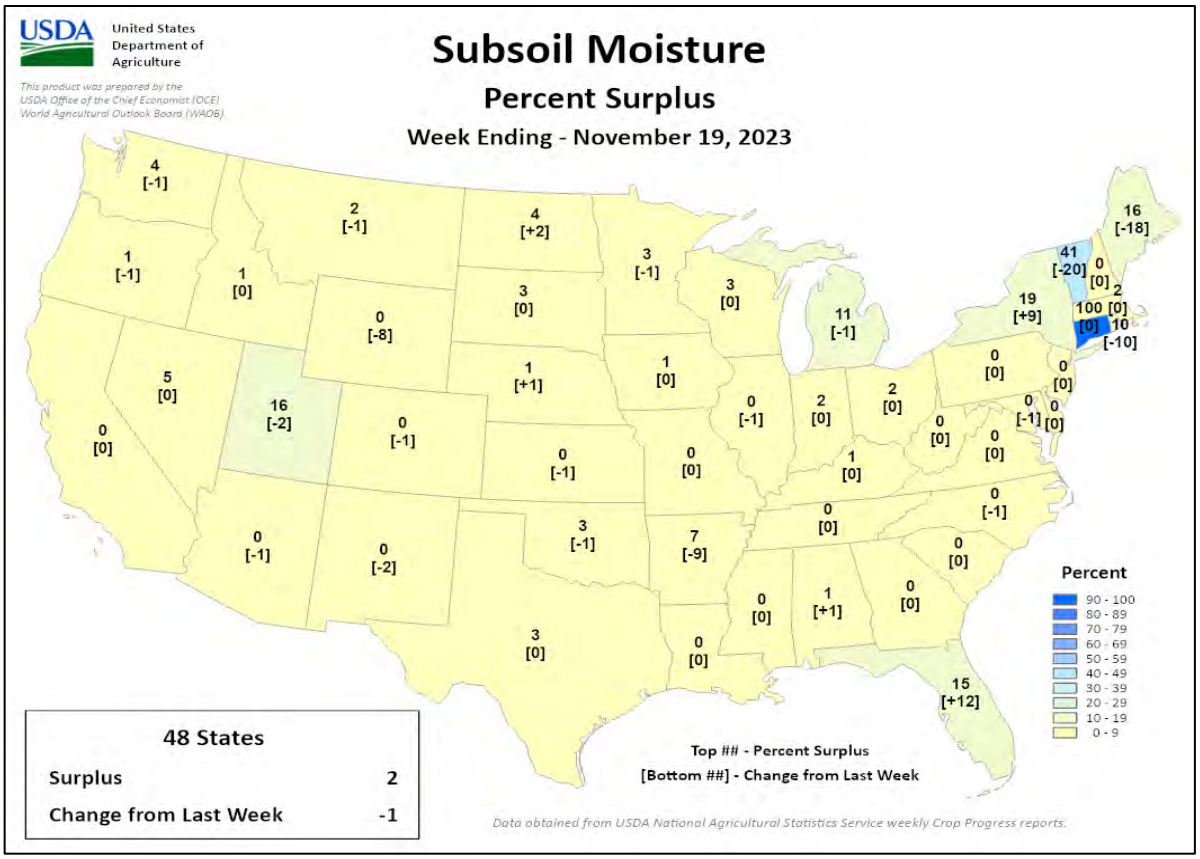


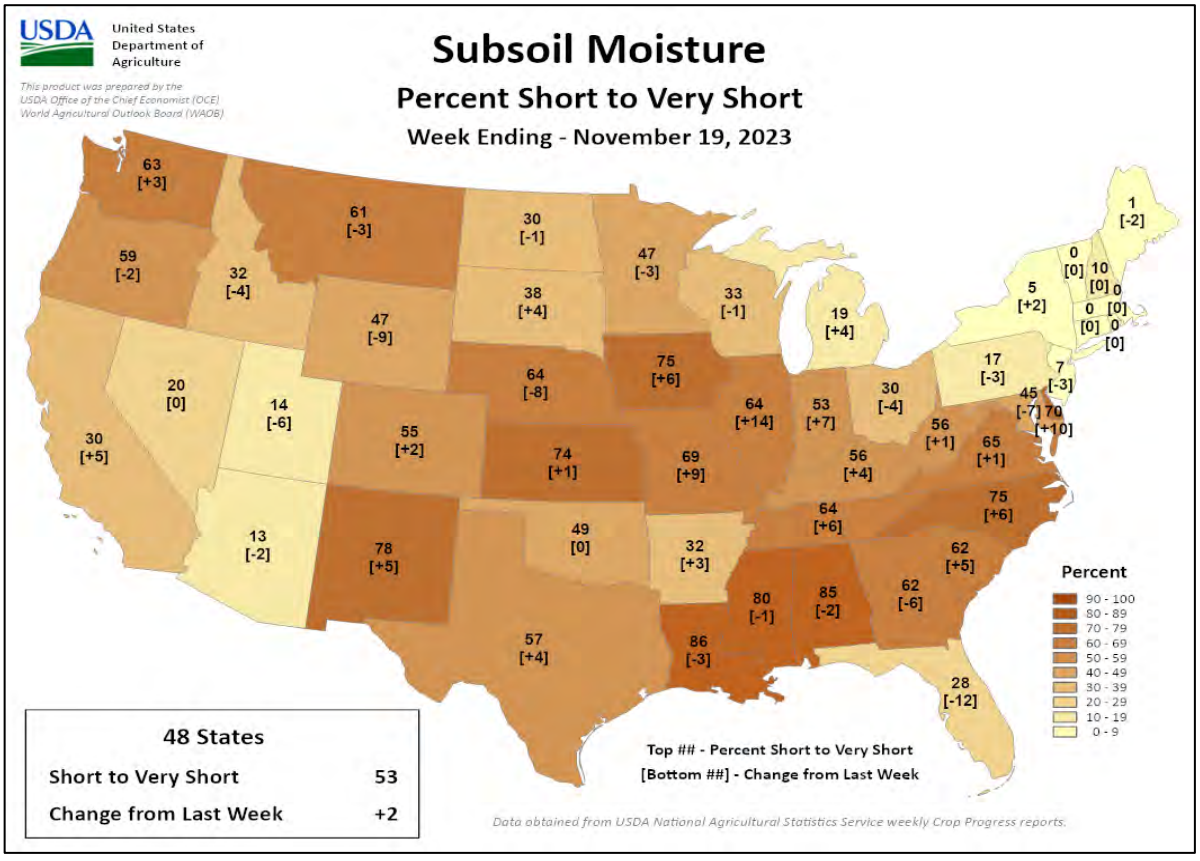


Crop Progress and Condition

Week Ending November 19, 2023

Weekly U.S. Progress and Condition Data provided by USDA/NASS





International Weather and Crop Summary

November 12-18, 2023

International Weather and Crop Highlights and Summaries provided by USDA/WAOB

HIGHLIGHTS

EUROPE: Widespread moderate to heavy rain continued over most of central, northern, and eastern Europe, with additional heavy showers easing autumn dryness in the southeastern Danube River Valley.

WESTERN FSU: Unsettled weather continued, with unseasonable warmth replaced by seasonally colder weather by the end of the period.

MIDDLE EAST: A slow-moving storm brought widespread moderate to heavy rain to western and central portions of the region.

NORTHWESTERN AFRICA: Drought intensified and expanded over the region under sunny skies and above-normal temperatures.

EAST ASIA: Showers in southern China benefited rapeseed, while colder weather in wheat areas farther north slowed crop development.

SOUTHEAST ASIA: Seasonably drier weather moved into northern reaches of the region, while seasonal rains increased in the south.

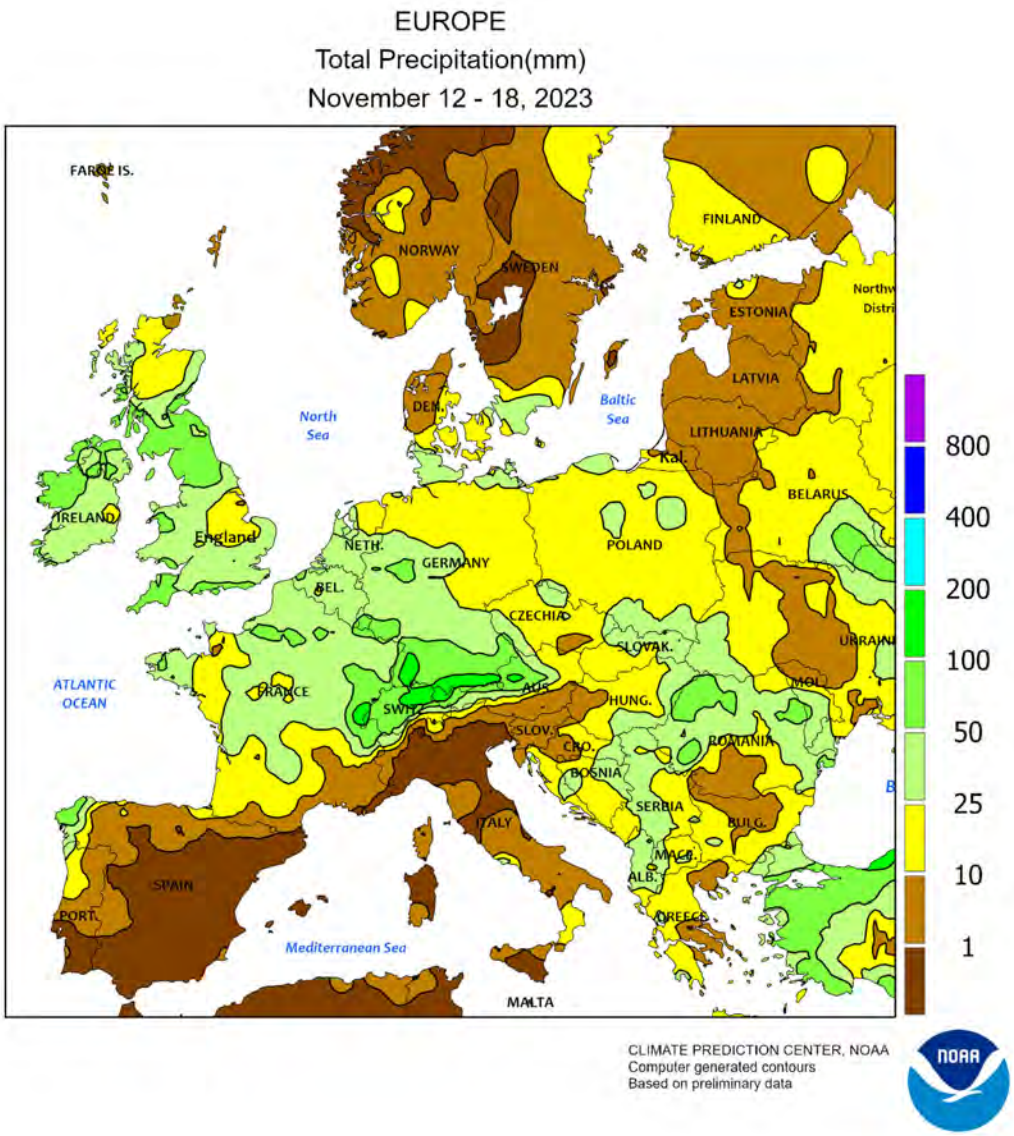
AUSTRALIA: Scattered, light showers had little impact on winter crop harvesting.

SOUTH AFRICA: Warm, sunny weather favored growth of summer crops in eastern commercial farming areas, following recent periods of beneficial rainfall.

ARGENTINA: Sunny albeit cool weather favored growth of corn and soybeans in southern production areas, while heavy rain overspread the north.

BRAZIL: Unseasonably hot, dry weather dominated key farming areas of central Brazil.

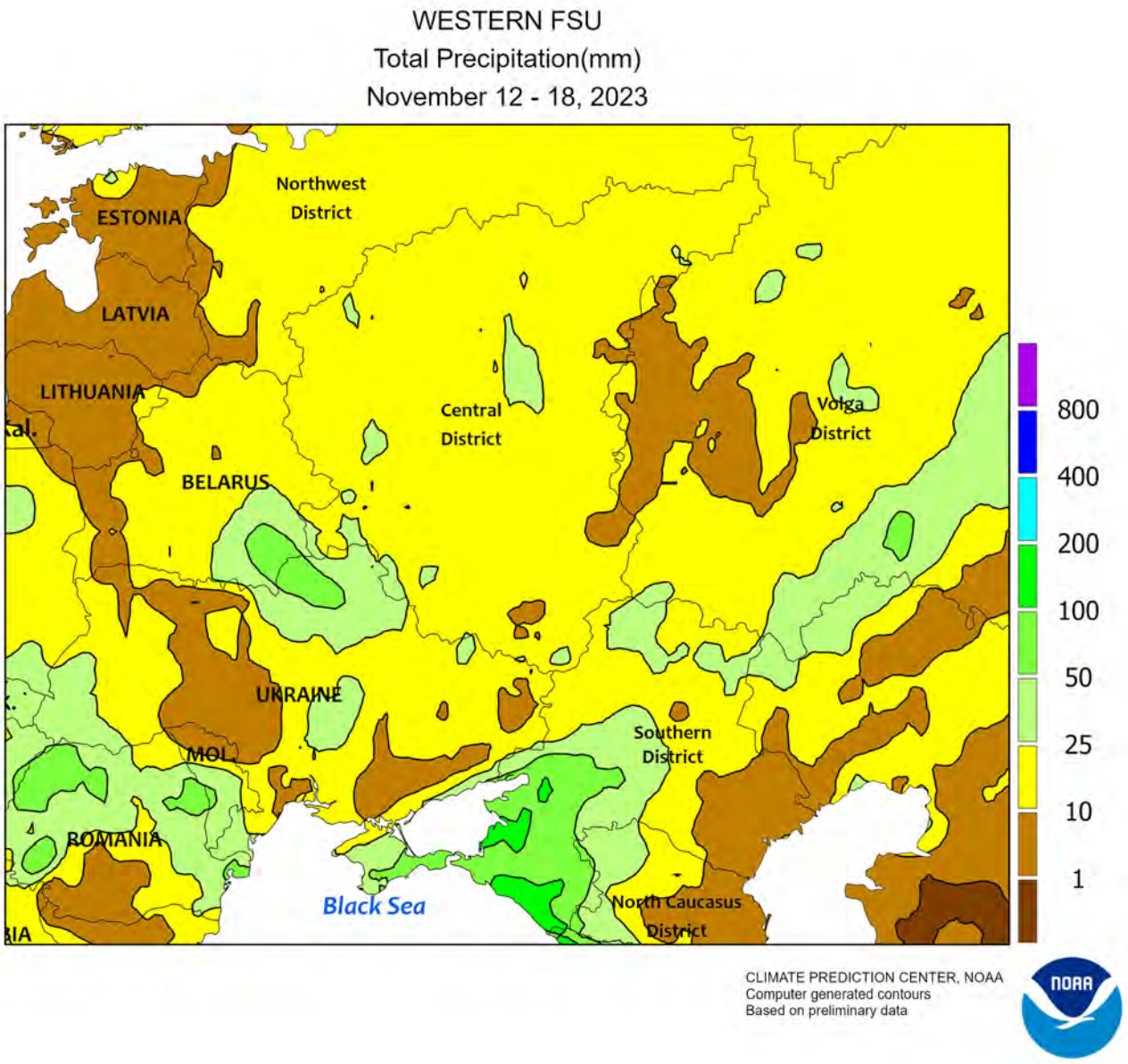
For additional information contact: mark.brusberg@usda.gov



EUROPE

Wet weather continued over most of the continent, with moderate to heavy rain in the previously dry southeastern Danube River Valley. The relentless barrage of Atlantic storms — which began in mid-October — produced an additional 10 to 100 mm of rainfall (locally more) from England and France eastward, though somewhat drier weather (less than 10 mm) was noted in southern Romania and northern Bulgaria. Despite the locally drier conditions in the southern Balkans, moderate to heavy rain (25-110 mm) alleviated short-term dryness and drought in southeastern Romania and northeastern Bulgaria. The recent spell of wet weather has impeded late winter crop establishment as well as the final stages of summer crop harvesting; 30-day rainfall has totaled 200 to 400 percent of normal over most of Europe save for southern-most growing areas. Despite the continued wet weather pattern, sunny skies in Portugal, Spain, and Italy facilitated winter grain establishment after recent rain. Temperatures averaged 3 to 7°C above normal in southwestern Europe, 1 to 3°C above normal in central and southeastern growing areas, but progressively colder in northern and northeastern portions of the continent (up to 10°C below normal in Scandinavia). In fact, rain changed to snow as colder air arrived over much of eastern Europe, though snow cover was mostly confined to higher elevations.

For additional information contact: mark.brusberg@usda.gov



WESTERN FSU

Unseasonable warmth was replaced by sharply colder weather at week's end, with widespread rain and late-week snow boosting moisture reserves for winter crops. Weekly precipitation (rain and snow) tallied 10 to 110 mm (liquid equivalent) over primary growing areas of Moldova, Ukraine, Belarus, and western Russia, further boosting moisture reserves for winter wheat, barley, and rapeseed. Rain was most welcome in southern Russia's North Caucasus District, where acute autumn dryness left soils short of moisture for proper winter wheat establishment. The recent spate of unseasonable warmth continued early in the period, with temperatures for the week averaging 2 to 6°C above normal. However, sharply colder weather settled over the region at the end of the week, with hard freezes (-2°C or lower) arriving over western and northern portions of the region. Winter crops were hastened into dormancy over these same western and northern crop areas but were still vegetative to semi-dormant in southern Russia and southeastern Ukraine.

This will be the last weekly summary for Western FSU. Coverage will resume in March 2024 to coincide with winter wheat breaking dormancy.

The WWCB focuses entirely on weather and resultant crop conditions; conflict and unrest are beyond the scope of this publication.

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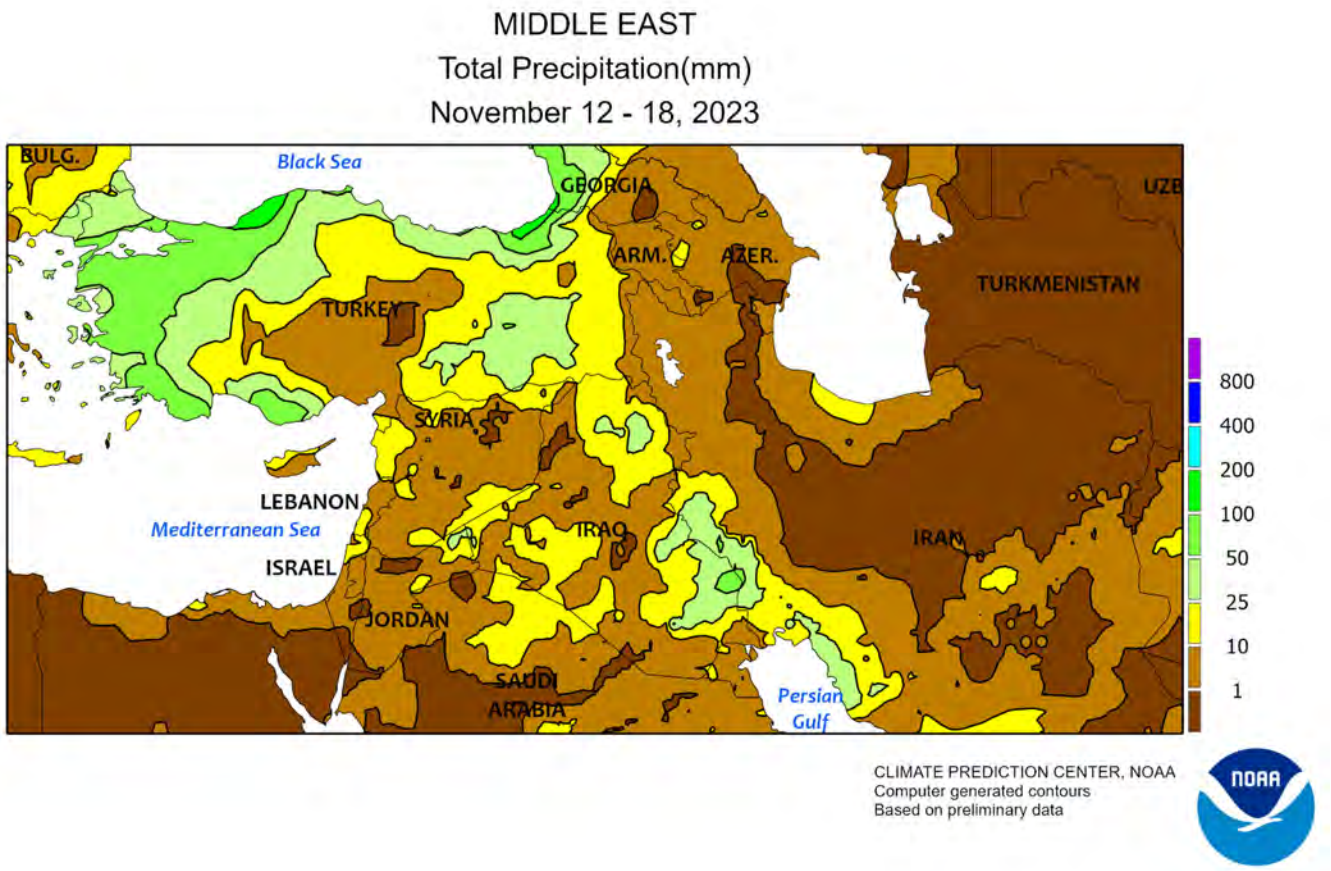

MIDDLE EAST

A slow-moving storm brought widespread rain and mountain snow to western and central portions of the region. Rainfall was moderate to very heavy (15-110 mm) across central and western Turkey, improving soil moisture supplies for winter wheat and barley on the Anatolian Plateau and easing drought in the previously dry northwest (Thrace Region). Similarly, moderate to heavy showers (10-45 mm) in southeastern Turkey benefited winter grain establishment. From eastern Syria into Iraq and western Iran, the first appreciable rain and mountain snow (10-65 mm liquid equivalent) of the season moistened soils for recently sown winter crops. Conversely, dry weather persisted over northeastern Iran, where little to no rain has fallen since mid-October. Temperatures averaged 2 to 4°C above normal from Turkey into Iraq but 4 to 8°C above normal across central and northern Iran.

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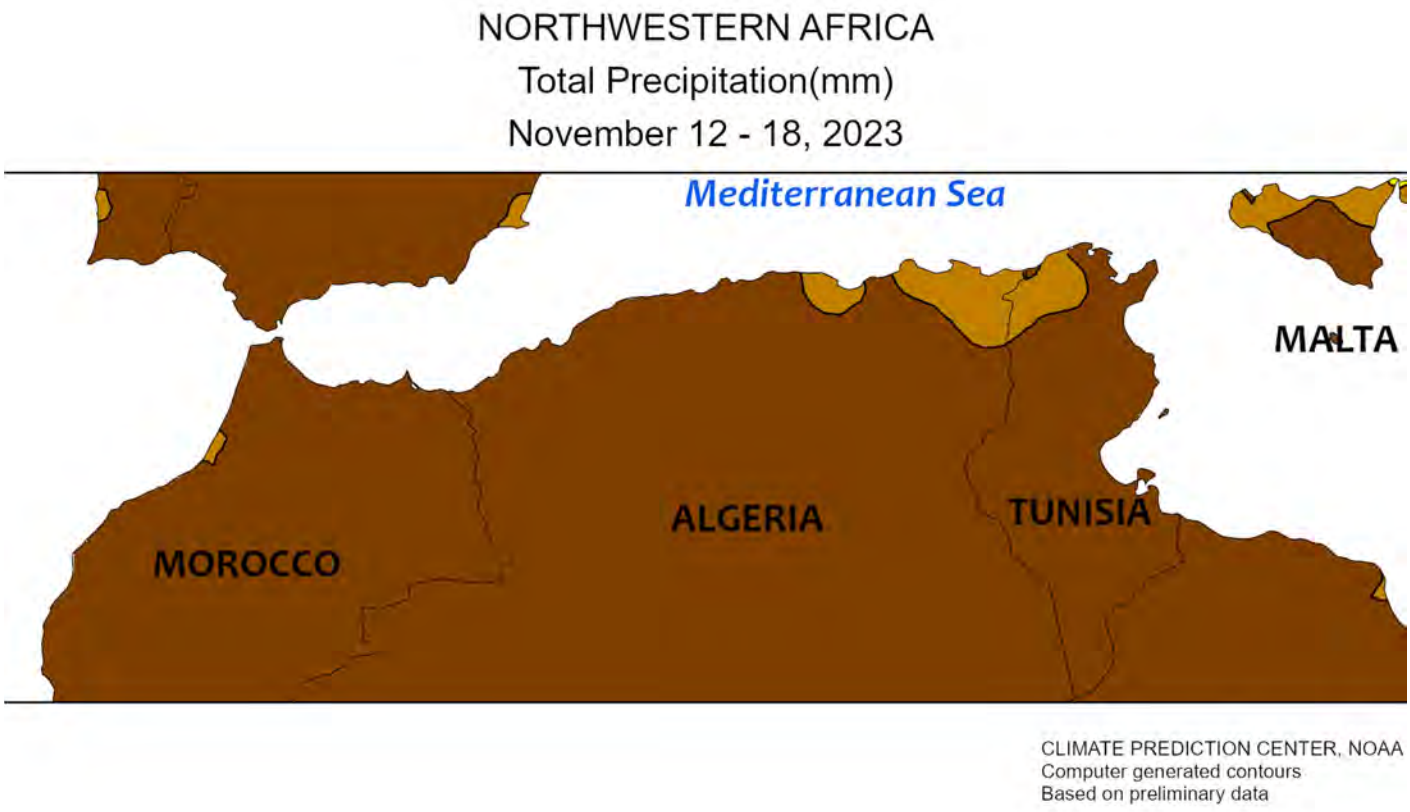

NORTHWESTERN AFRICA

Drought intensified and expanded across the region during the monitoring period. Despite favorable late-October rains in Morocco, dry conditions since have ushered this primary growing area into drought; season-to-date rainfall (since September 1) in Morocco's primary growing areas slipped to 60 percent of normal following another dry week. Meanwhile, drought intensified across Algeria and Tunisia, with many central and eastern growing areas reporting the driest start to the cool rainy season — by far — of the past 30 years. As of November 18, season-to-date rainfall has totaled: 25 mm in Algeria's central Tell Region (18 percent of normal); 18 mm in Algeria's eastern Tell Region (13 percent of normal); 19 mm in northern Tunisia's Tell Region (13 percent of normal); and 1 mm in central Tunisia's Steppe Region (1 percent of normal). Compounding the impacts of the drought were temperatures which averaged 2 to 6°C above normal, with daytime highs in the middle 30s (degrees C) in western and southern Morocco more in line with values typically seen in late May and June. Rain is desperately needed for proper winter grain planting and establishment, though crops can be planted as late as December if moisture conditions improve by then.

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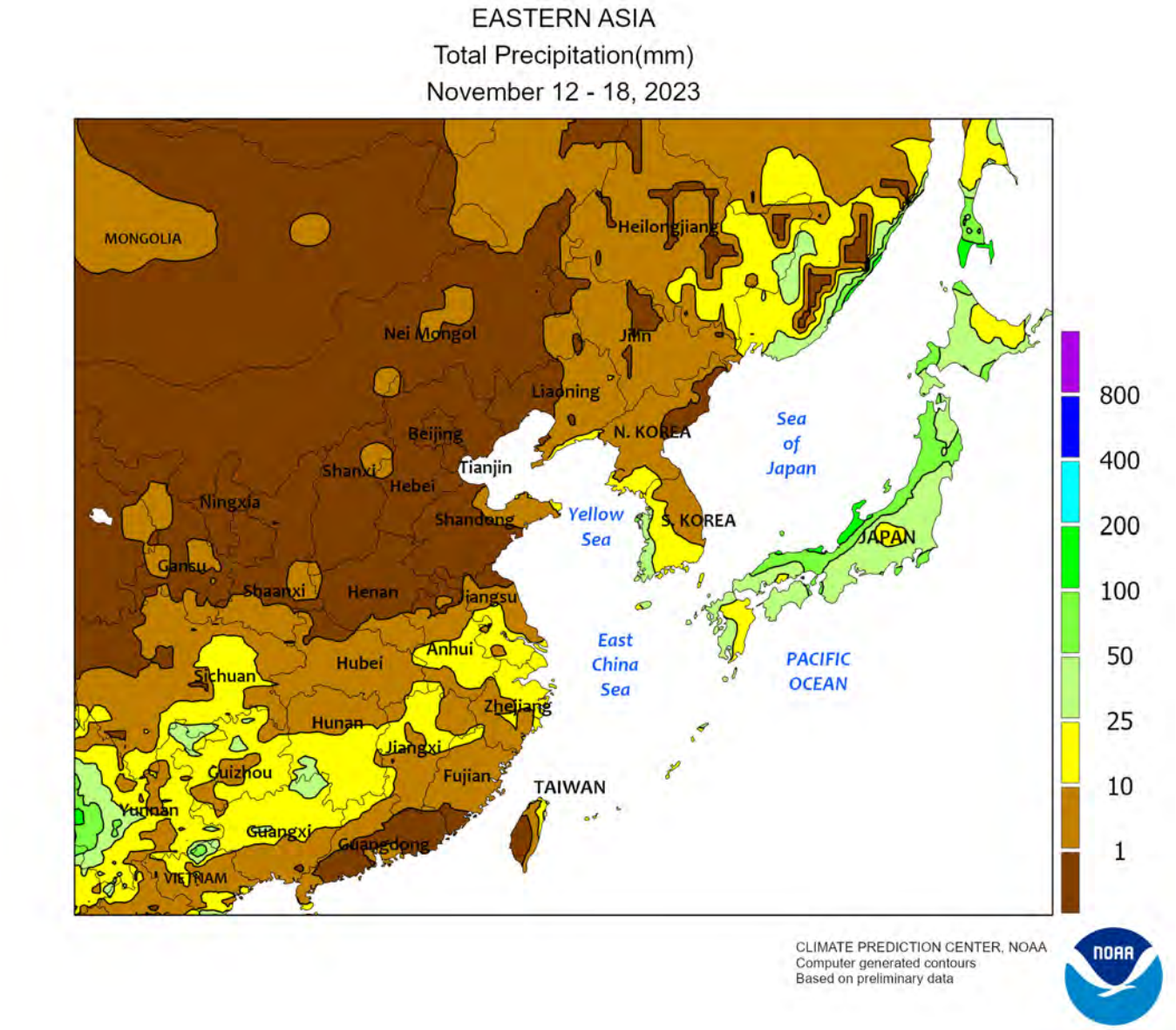

EASTERN ASIA

Showers pushed through southern China during the early half of the week. Rainfall amounts were generally below 25 mm in most areas, providing beneficial moisture for rapeseed establishment and minor winter crops. Meanwhile, dry weather prevailed in wheat areas to the north following favorable rainfall last week. Additionally, temperatures averaged as much as 4°C below normal throughout winter crop areas, slowing crop development but not initiating dormancy.

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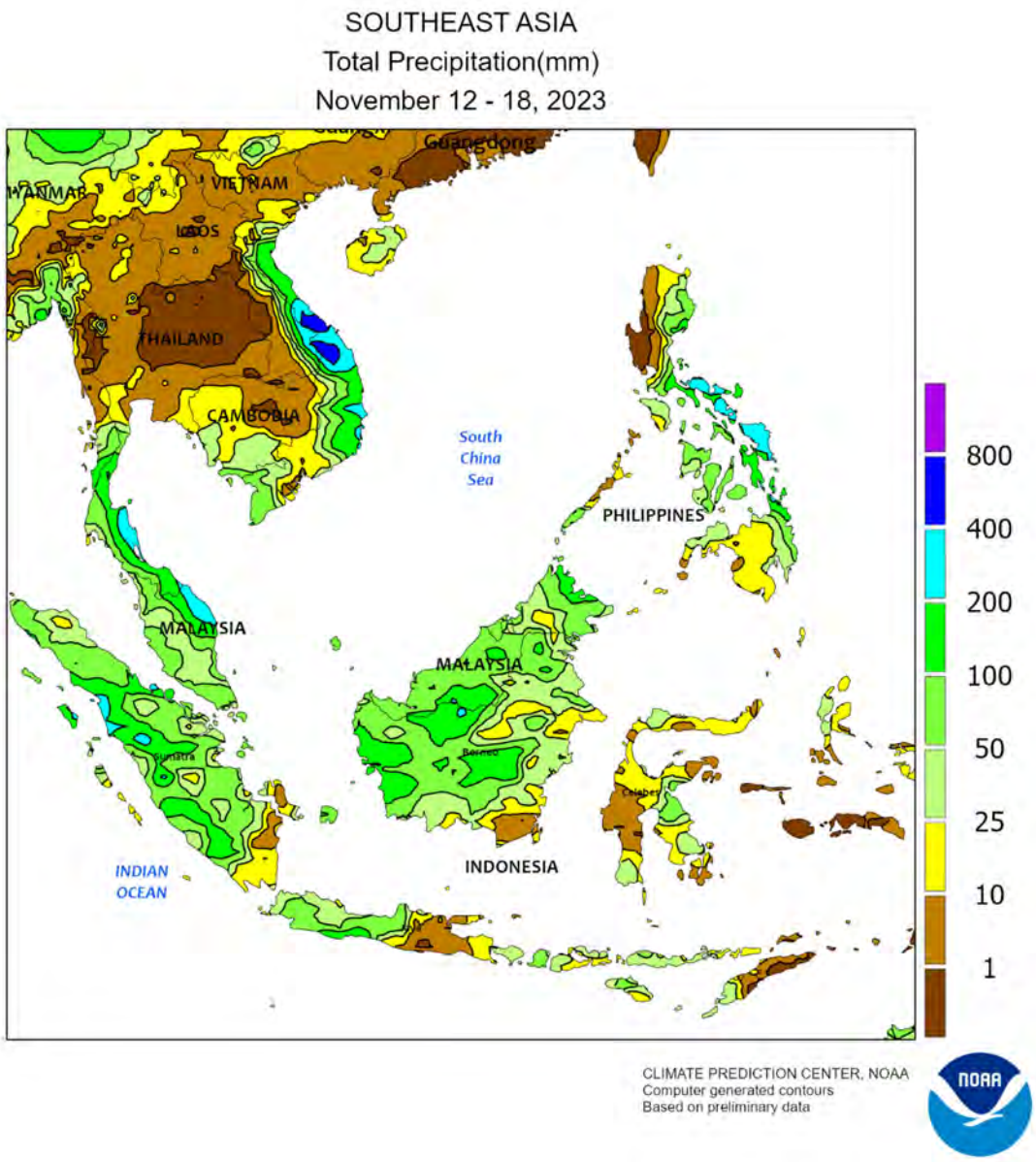

SOUTHEAST ASIA

Seasonably drier weather prevailed in Thailand following a few weeks of late-season showers. The drier conditions supported fieldwork including sowing of the dry-season rice crop. Meanwhile, a strong easterly flow brought more downpours (over 150 mm, locally topping 300 mm) and flooding to minor agricultural areas in central Vietnam. A similarly strong flow produced heavy showers (150-300 mm or more) in eastern sections of the Philippines (generally minor rice-producing areas) as well. Elsewhere, rainfall increased in southern Indonesia (Java, the largest producer of rice in Indonesia), with many locales recording over 25 mm. Even with the recent precipitation, seasonal rains have yet to become well established in Java, lagging the normal establishment date by nearly a month and forcing growers to switch from rice to other less water-intensive crops.

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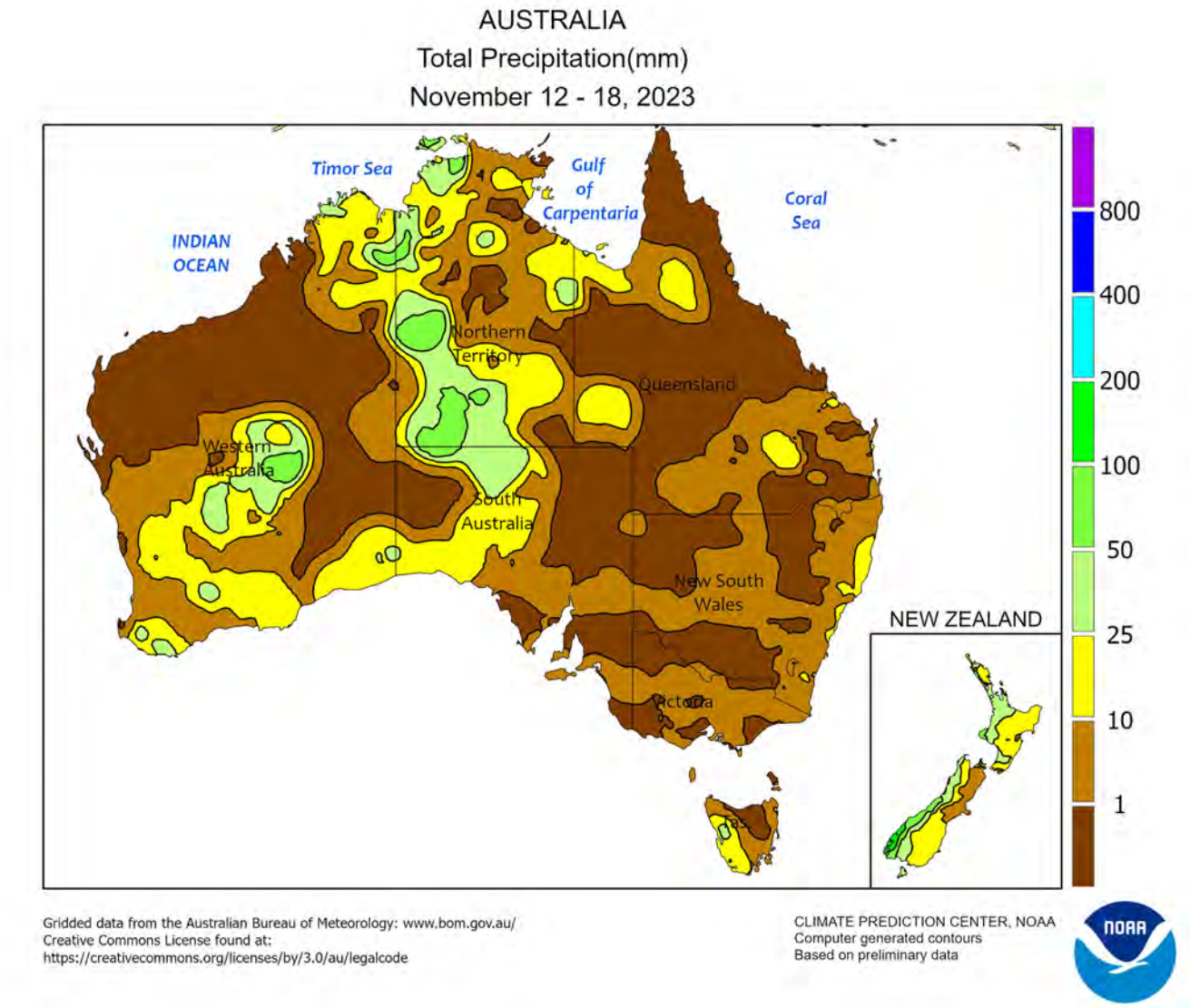

AUSTRALIA

Wet weather overspread sizeable portions of Western Australia and South Australia, but much of the rain fell outside of major winter crop producing areas. Consequently, winter crop harvesting continued to make good progress in the south and west, and the relatively dry weather helped maintain grain quality. Elsewhere in the wheat belt, showers overspread the east late in the week, but the showers were generally light and widely scattered. As a result, wheat, barley, and canola harvesting proceeded with minimal delays but soil moisture declined for germinating and emerging summer crops. Temperatures averaged up to 3°C above normal in northern portions of the wheat belt and up to 3°C below normal in the south.

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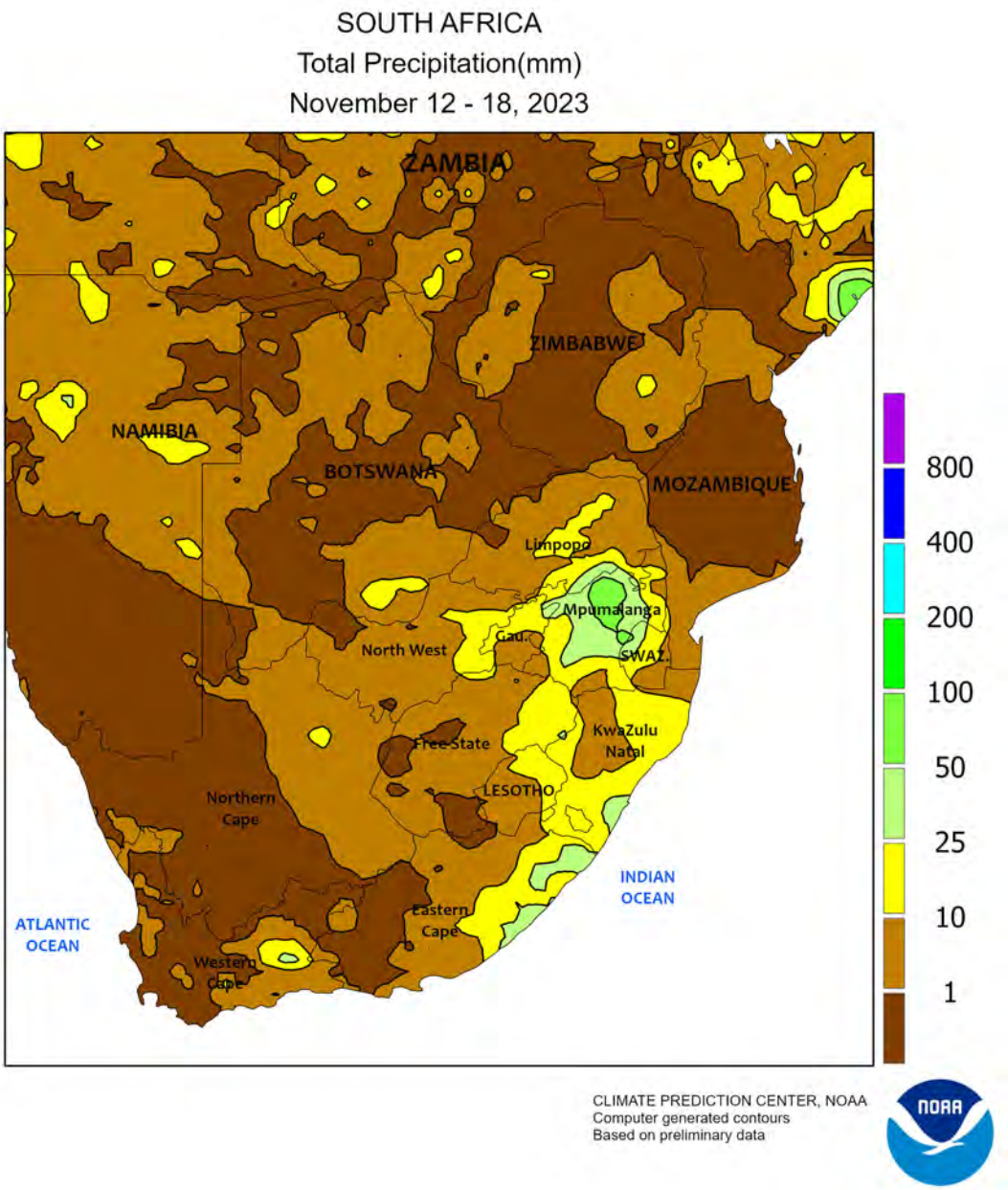

SOUTH AFRICA

Warm, sunny weather spurred growth of summer crops, including emerging to vegetative corn, in key eastern commercial farming areas. Rainfall totaled 5 to 25 mm – locally higher – from southern Limpopo southward into eastern sections of Eastern Cape. Drier weather prevailed elsewhere, including western production areas of North West and Free State. Weekly average temperatures ranged from 1 to 2°C below normal in KwaZulu-Natal and eastern Mpumalanga to as much as 4°C above normal in portions of Western and Northern Cape. Highest daytime temperatures generally ranged from the upper 20s and lower 30s (degrees C) in the wetter eastern locations to the upper 30s and lower 40s in the farming areas not receiving rainfall. Western sections of the corn belt (North West and neighboring locations in Free State and Limpopo) will need a timely onset of heavier rainfall over the next few weeks to condition fields for planting, which is typically underway in December. Meanwhile, the warm sunny weather in Western Cape aided drydown of wheat while promoting growth of tree and vine crops.

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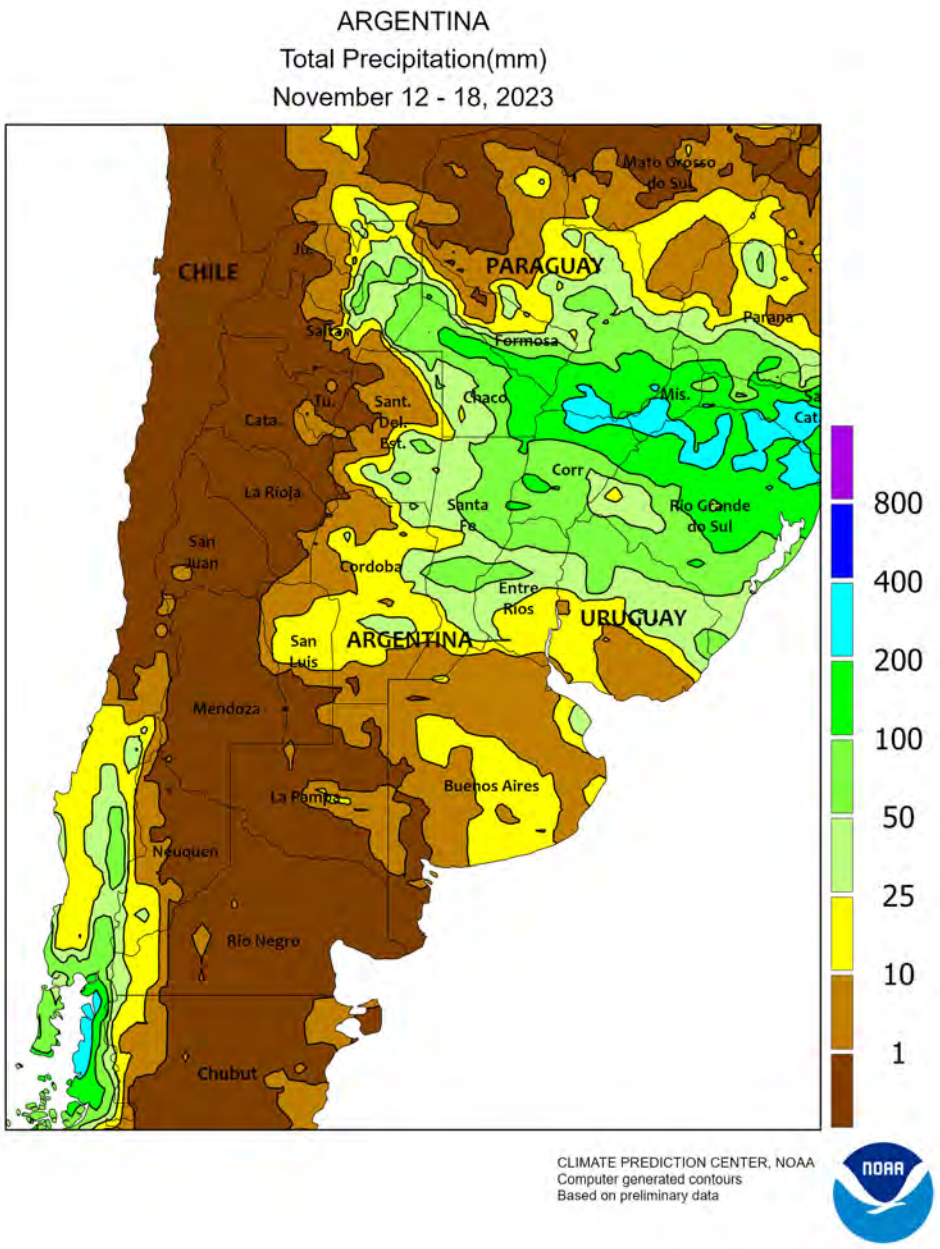

ARGENTINA

Following weeks of beneficial rainfall, sunny albeit cool weather promoted growth of emerging summer crops in southern farming areas. Rainfall totaled below 25 mm in most locations in and around Buenos Aires, promoting fieldwork that had been delayed the past few weeks due to wet weather. Weekly temperatures in the aforementioned areas averaged 1 to 2°C above normal, but while nighttime lows dropped below 5°C in southern-most crop areas, no freeze was reported. In contrast, warm weather, accompanied by unseasonably heavy showers, dominated the north. The heaviest rain (50-150 mm) fell from Chaco and northern Santa Fe eastward, providing abundant moisture for germination of cotton and other summer crops but likely causing some flooding of low-lying fields. The rain also brought some relief from excessive heat (daytime highs reaching 40°C) that lingered into the early part of the week. According to the government of Argentina, sunflowers and corn were 74 and 34 percent planted as of November 16, respectively, with soybean planting reaching 19 percent completed; cotton was 12 percent planted, compared with 25 percent last year, while wheat was 18 percent harvested, 9 points ahead of last year's pace.

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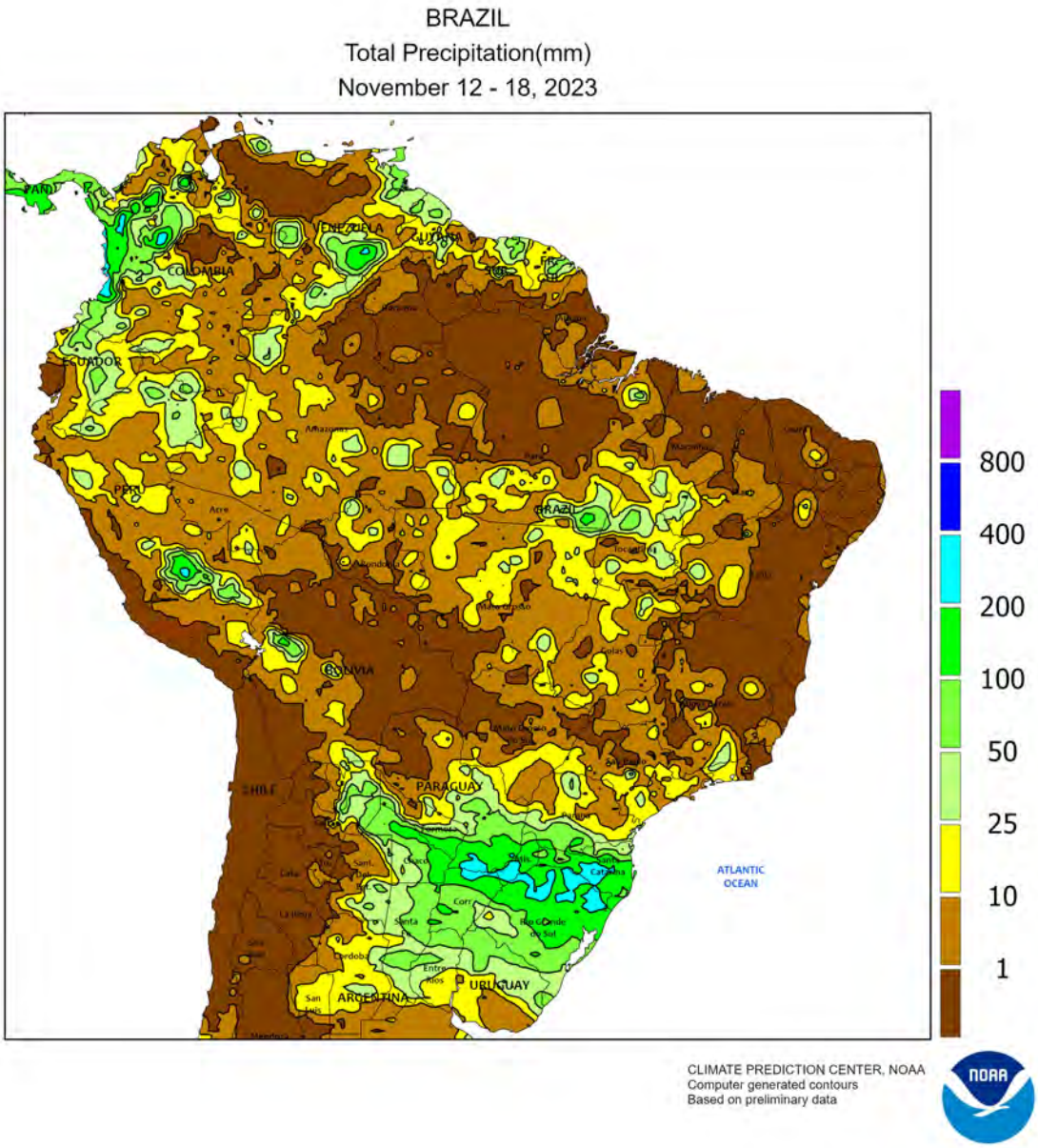
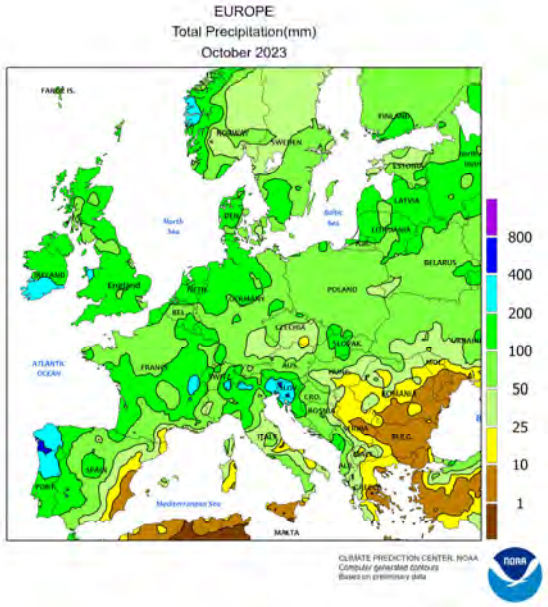


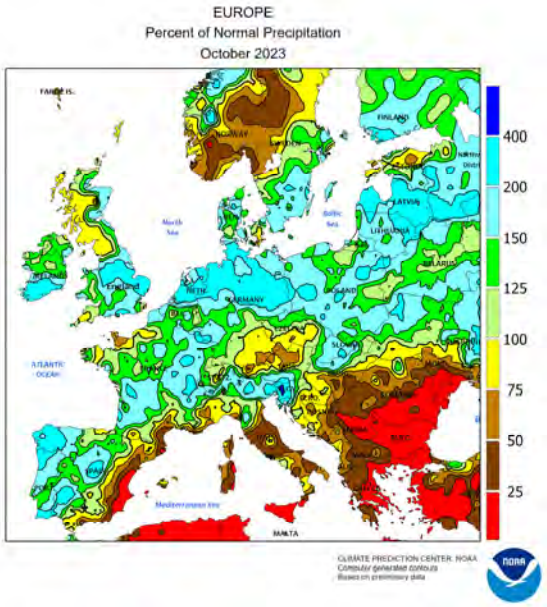
BRAZIL

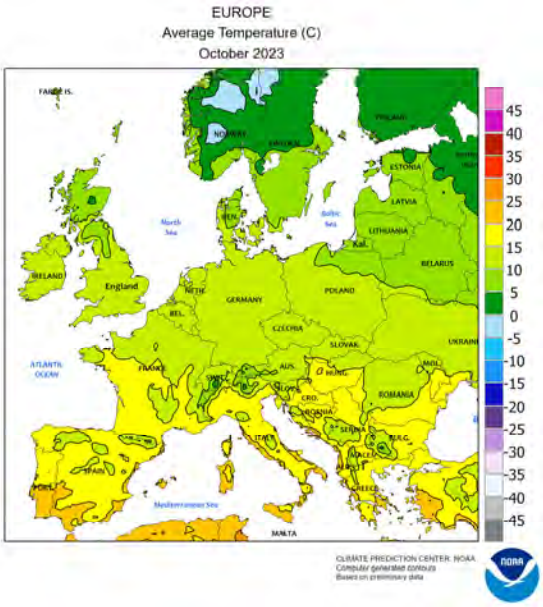
Unseasonable heat and dryness stressed emerging to early vegetative soybeans and other summer crops over a large section of central and southeastern Brazil. Rainfall was widely scattered and generally light over a broad area stretching from Mato Grosso and Mato Grosso do Sul north and eastward, with many locations recording less than 15 mm. Weekly average temperatures ranging from 2 to 7°C above normal exacerbated the impact of the dryness on evaporative losses; further still, daytime highs reaching the upper 30s and lower 40s (degrees C) posed stress on standing crops and possibly caused some irreversible damage. According to the government of Mato Grosso, soybeans were 96 percent planted as of November 17; while nearing completion, planting progressed at a lower-than-average pace since mid-October, and a portion of the crop may be harvested later than previously anticipated. The warmth and dryness extended as far south as northern Paraná, while heavy showers (25 to locally more than 100 mm) farther south maintained adequate to locally excessive levels of moisture for summer crops and unharvested wheat. According to the government of Rio Grande do Sul, corn was 81 percent planted as of November 16, while 22 percent of soybeans were planted; wheat was 89 percent harvested, up 7 points from the previous week. In Paraná, first-crop corn and soybeans were 96 and 84 percent planted, respectively, as of November 13, while wheat was 99 percent harvested.

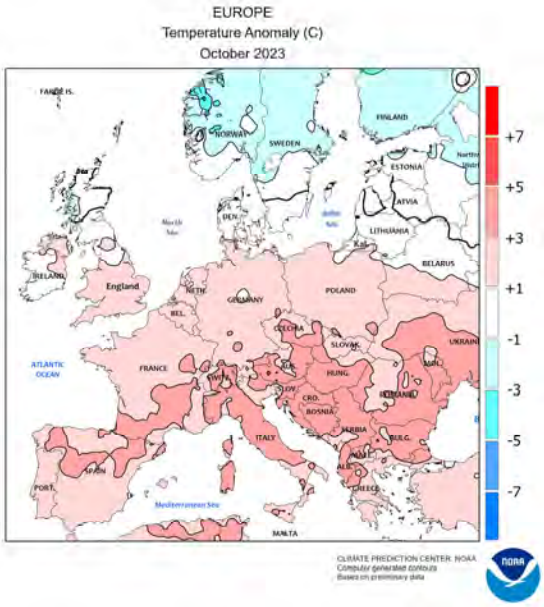
For additional information contact: mark.brusberg@usda.gov

October International Temperature and Precipitation Maps









EUROPE

Increasingly wet but very warm weather prevailed across much of the continent during October, though dry conditions prevailed from southeastern Spain into Greece and the southern Balkans. Temperatures averaged 2 to 5°C above normal over most of Europe, with daytime highs reaching the lower to middle 30s (degrees C) in Portugal, Spain, western and southern France, and the lower Danube River Valley. The summer-like heat accentuated soil moisture losses brought on by acute dryness in southeastern Europe, where monthly rainfall tallied less than 50 percent of normal (locally less than 25 percent). However, dry weather in Greece facilitated flood recovery efforts following historic September rainfall and promoted cotton harvesting. In contrast, heavy rain across much of the Iberian Peninsula signaled a favorable start to the 2023-24 Water Year and provided some relief from multi-year drought. Likewise, wet weather in northern Italy boosted irrigation reserves for warm-season crops and further eased or erased the last vestiges of long-term drought. Meanwhile, monthly rainfall averaged 100 to 250 percent of normal over most of central and northern Europe, slowing summer crop harvesting and other seasonal fieldwork but boosting moisture supplies for winter grain and oilseed establishment.

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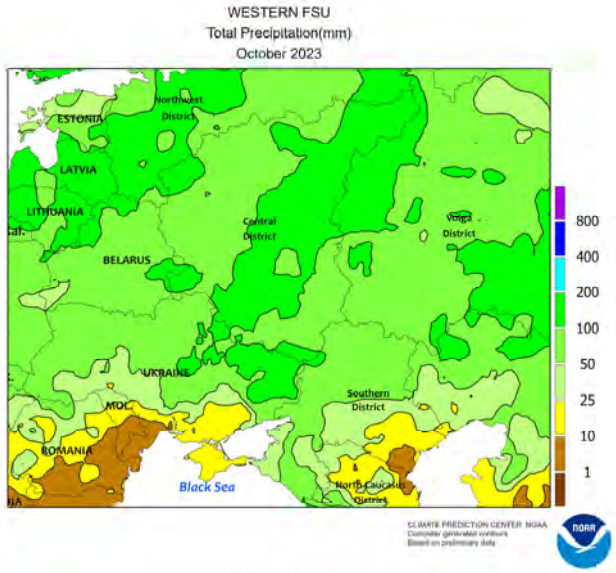
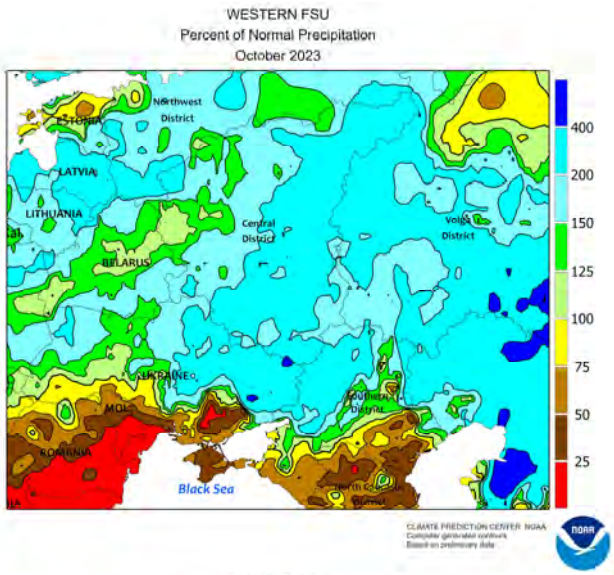
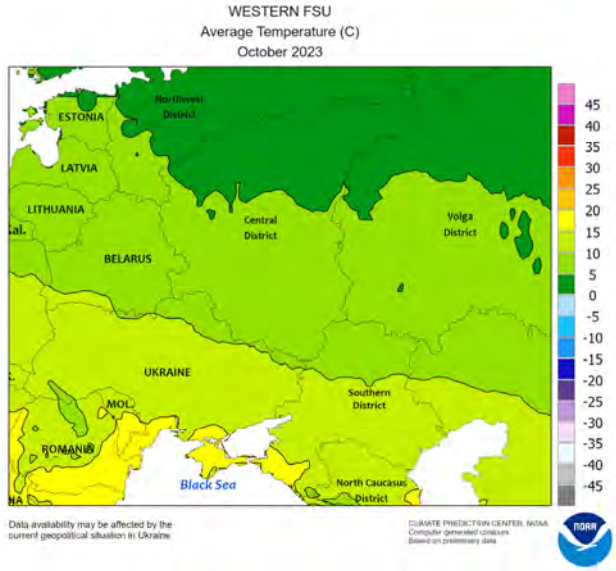
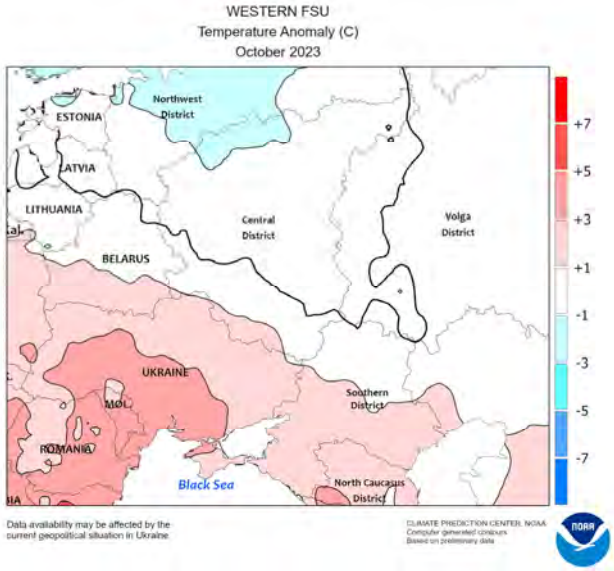






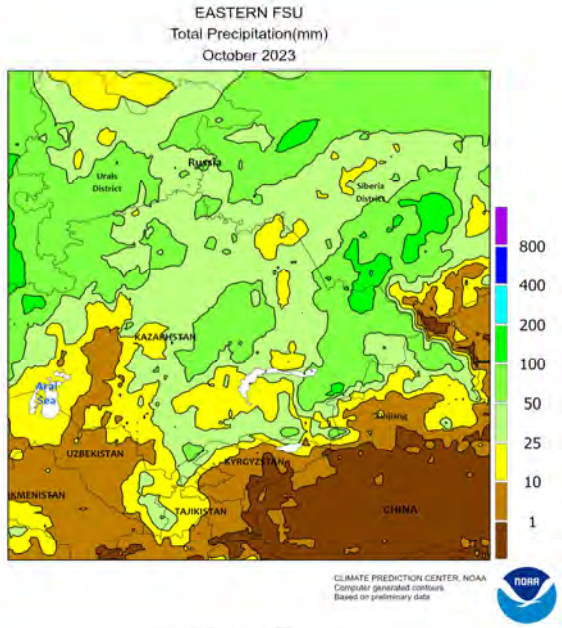


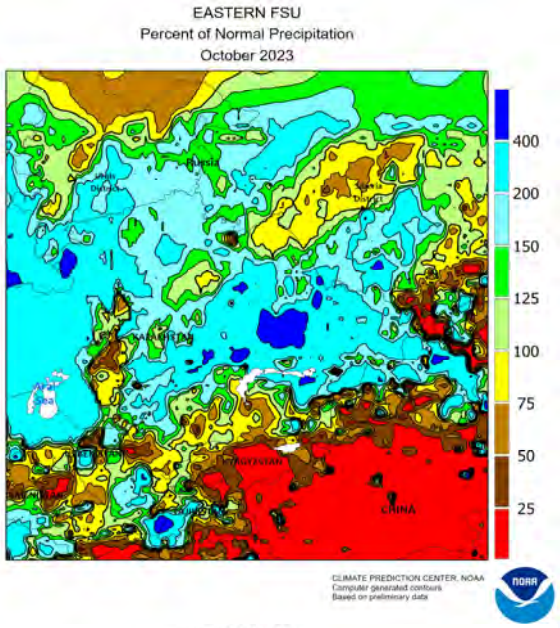
WESTERN FSU

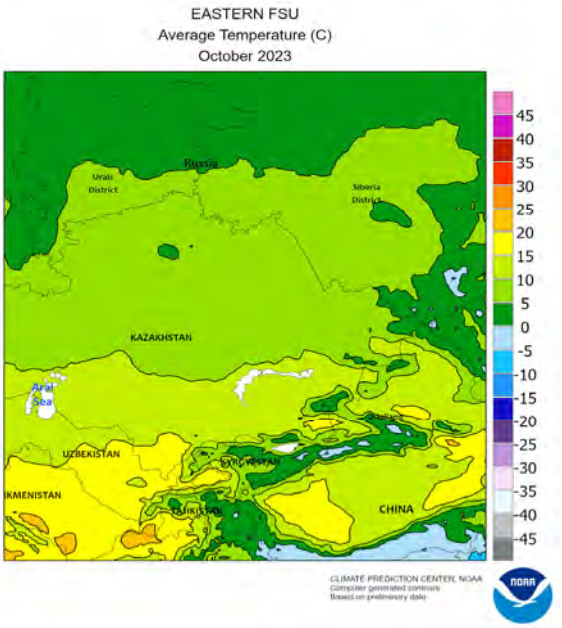
Dry conditions near the Black Sea Coast contrasted with widespread moderate to heavy rain elsewhere during October. Little to no rainfall was reported in southern Moldova and southwestern-most Ukraine (Odessa), with drier-than-normal conditions extending eastward along the Black Sea Coast into southern Russia. Otherwise, near- to above-normal rainfall (90-300 percent of normal) prevailed from Belarus and western Ukraine eastward. The wet weather slowed summer crop harvesting but improved soil moisture for winter grain and oilseed establishment following a very dry September. Temperatures averaged 2 to 5°C above normal over primary winter crop areas of Moldova, southern Ukraine, and southwestern Russia, enabling winter crops to benefit from the late-arriving moisture.

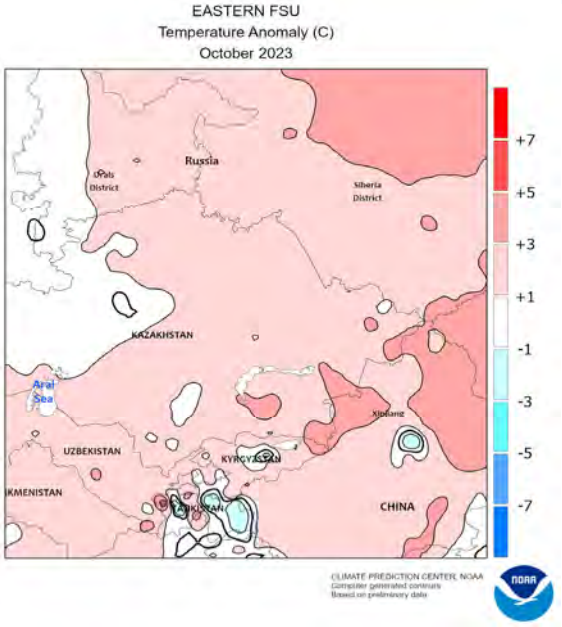
The WWCB focuses entirely on weather and resultant crop conditions; conflict and unrest are beyond the scope of this publication.

For additional information contact: mark.brusberg@usda.gov







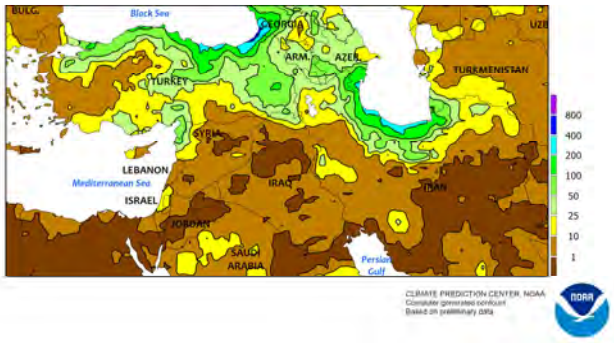


EASTERN FSU

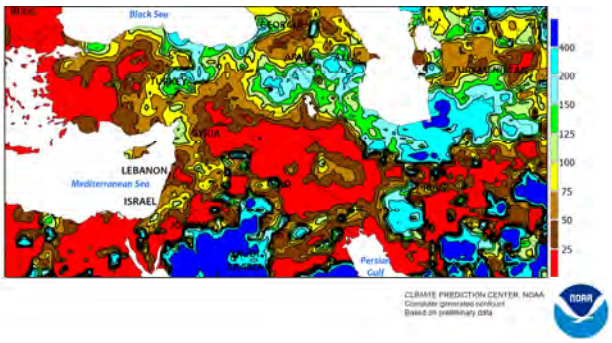
Moderate to heavy rainfall continued into October over the spring grain belt, while the first rain of the season arrived farther south across the region's cotton and winter wheat areas. Wet weather (90-300 percent of normal, locally more) persisted for a second consecutive month from the southern Urals District in Russia eastward across northern Kazakhstan into the Siberia District. The rain further hampered spring grain harvesting and lowered crop quality and yield prospects somewhat. Farther south across the Commonwealth of Independent States (CIS), the first widespread rain and mountain snow of the 2023-24 Water Year arrived from central Turkmenistan eastward across Uzbekistan, southern Kazakhstan, and western portions of Kyrgyzstan and Tajikistan, though eastern-most portions of the CIS were dry. The bulk of the cool-season rain and snow in the CIS falls from November into May. Temperatures for the month averaged 2 to 4°C above normal nearly everywhere save for near-normal temperatures in Russia's Urals District and northwestern Kazakhstan.

For additional information contact: mark.brusberg@usda.gov

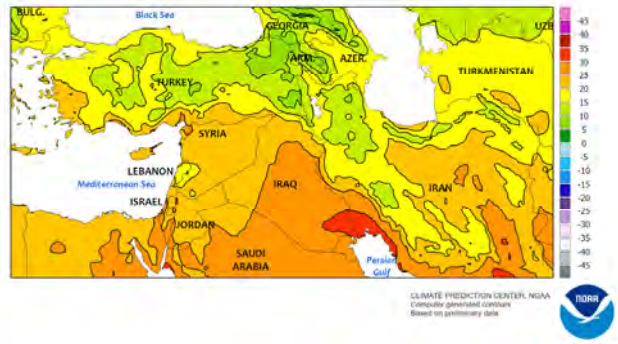
MIDDLE EAST
Total Precipitation(mm)
October 2023



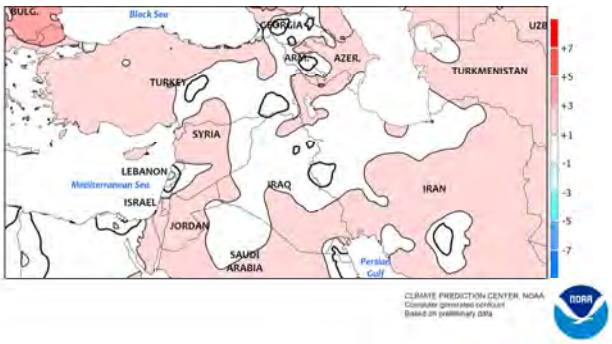
MIDDLE EAST
Percent of Normal Precipitation
October 2023



MIDDLE EAST
Average Temperature (C)
October 2023



MIDDLE EAST
Temperature Anomaly (C)
October 2023



MIDDLE EAST

Mostly dry and warm weather prevailed during October. Appreciable rain (25 mm or more) was limited to the Black and Caspian Sea Coasts as well as eastern Turkey and the adjacent eastern Mediterranean Coast. Otherwise, dry conditions favored seasonal fieldwork but reduced soil moisture for winter wheat and barley establishment, especially in western and northwestern Turkey where winter crops are typically sown first. However, light to moderate showers in northeastern Iran (Khorasan) moistened soils for winter barley. Temperatures averaged near normal in central growing areas but up to 3°C above normal in central and western Turkey as well as central and eastern Iran.

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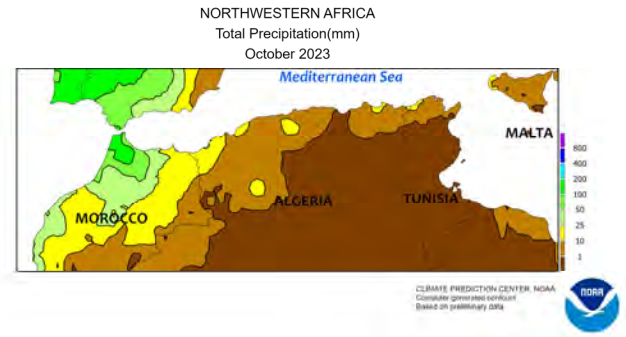
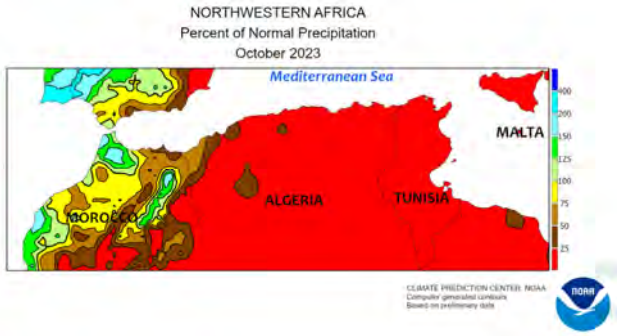
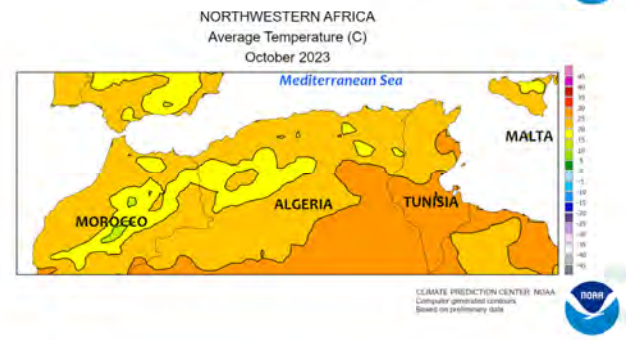
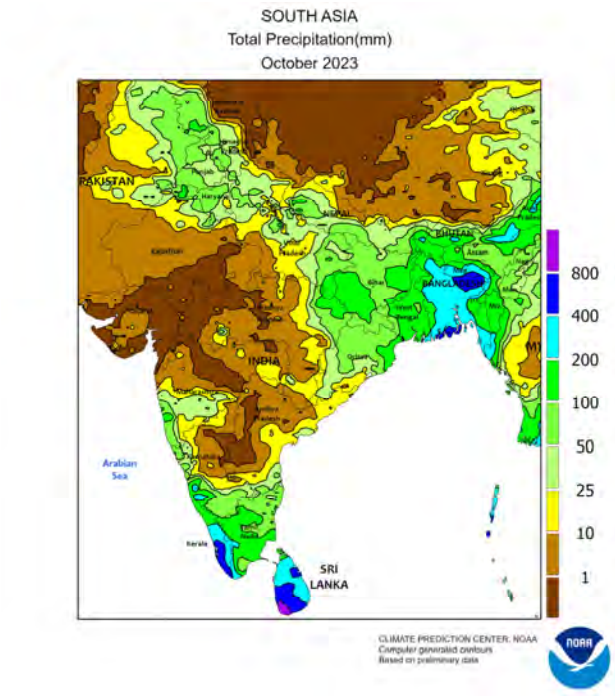


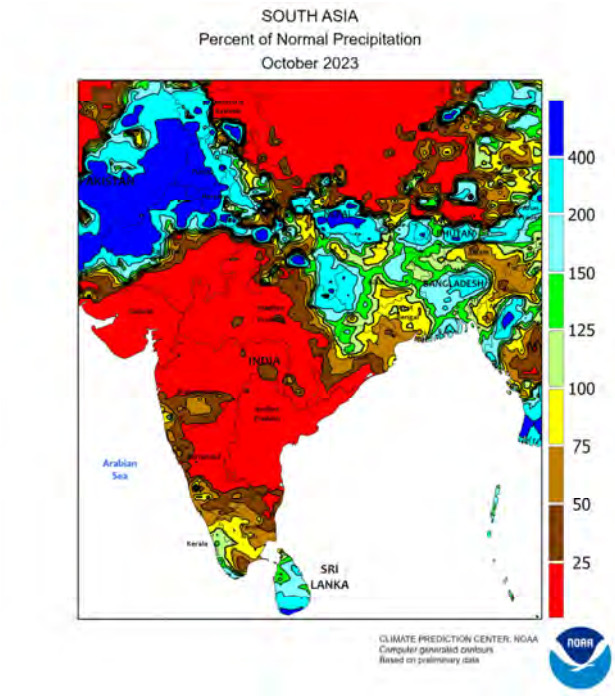


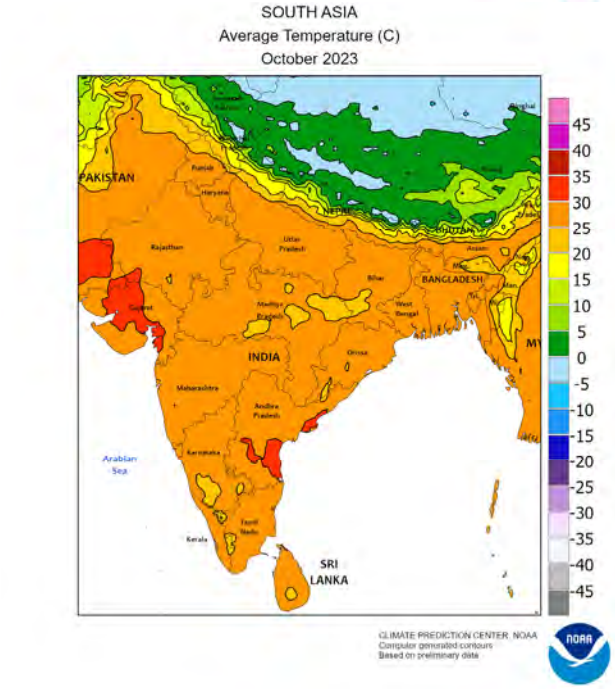


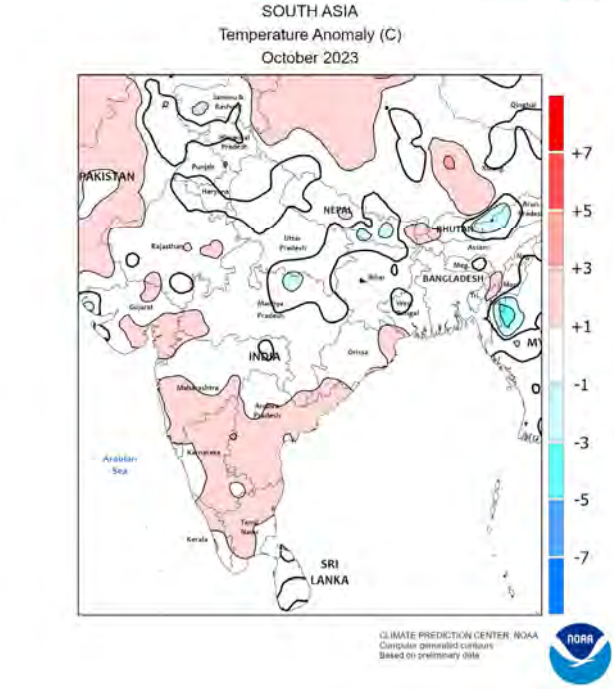
NORTHWESTERN AFRICA

Outside of some rain in Morocco, the historically dry start to the 2023-24 Water Year continued into October across much of the region. October showers (10-50 mm) in western and northern Morocco conditioned soils locally for winter grain sowing later in autumn. Conversely, little to no rainfall was reported across Algeria and Tunisia, where cool-season rains typically arrive in October and September, respectively. Exacerbating the near-complete dryness in central and eastern croplands were temperatures which averaged 2 to 4°C above normal for the month, with daytime highs (35-38°C) more on par with values seen during the summer months.





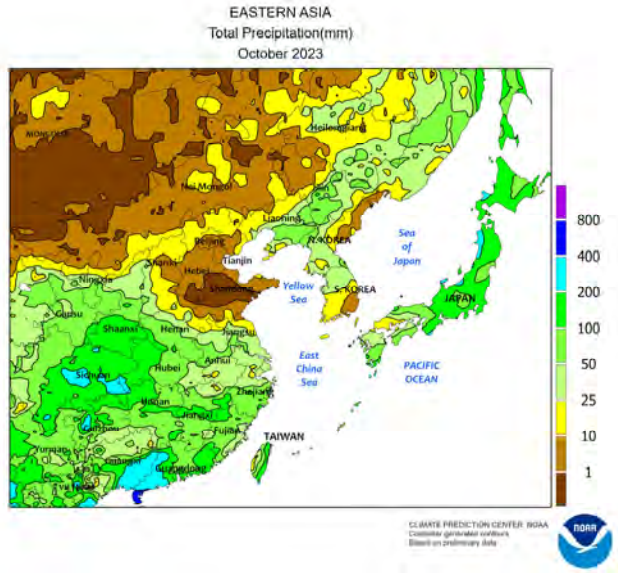


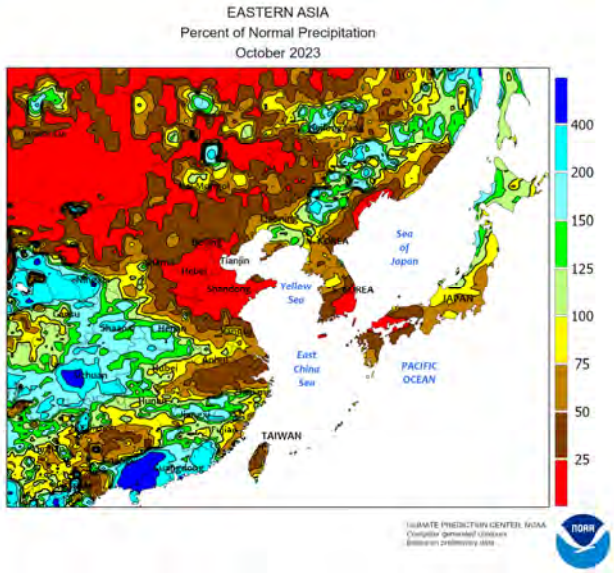


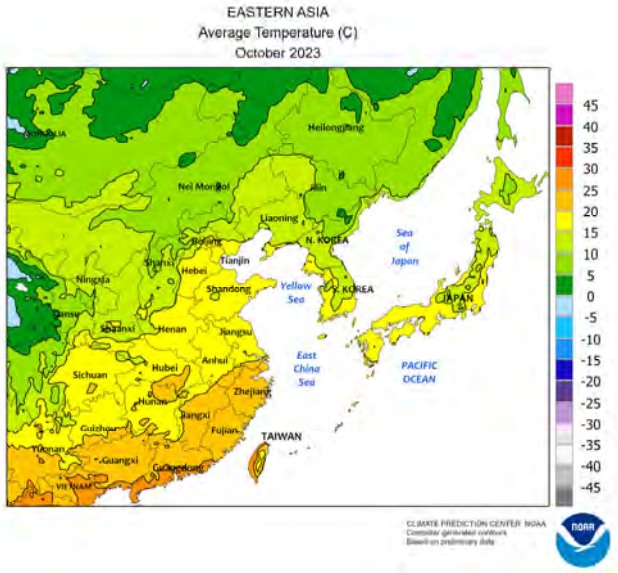
SOUTH ASIA

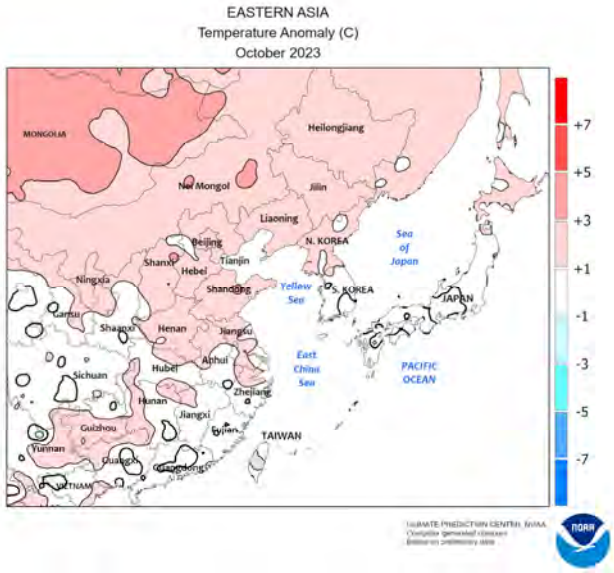
The withdrawal of the southwest monsoon from India and the surrounding areas proceeded at a near-normal pace in October, fully withdrawing by October 19 (according to the Indian Meteorological Department). As such, seasonably drier weather overspread much of the region, supporting maturation and harvesting of kharif crops in India and Pakistan as well as the beginning of rabi crop sowing in both countries. Notable wetness (topping 150 mm of rain, as much as 300 percent of normal), however, continued in some outer reaches of the north, northeast, and south through month's end, causing some fieldwork delays but overall benefiting irrigation supplies.

For additional information contact: mark.brusberg@usda.gov









EASTERN ASIA

Despite widespread showers across eastern and southern China during October, rainfall totals were well below average in some key agricultural areas. In particular, the lower Yangtze Valley received less than half the normal rainfall, while little if any rain occurred on much of the North China Plain. While the dryness facilitated fieldwork, more moisture would have been welcome to aid winter crop establishment, especially toward the end of the month when temperatures peaked over 30°C (10°C above normal) in wheat areas. Meanwhile, precipitation was above to well above average in the upper Yangtze Valley (150-400 percent of normal) and southern-most locales (over 400 percent of normal) where a pair of tropical cyclones made landfall.

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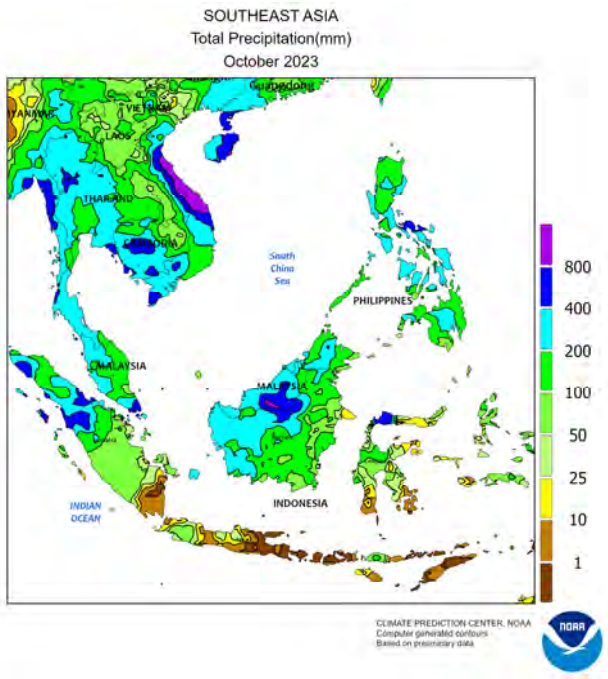

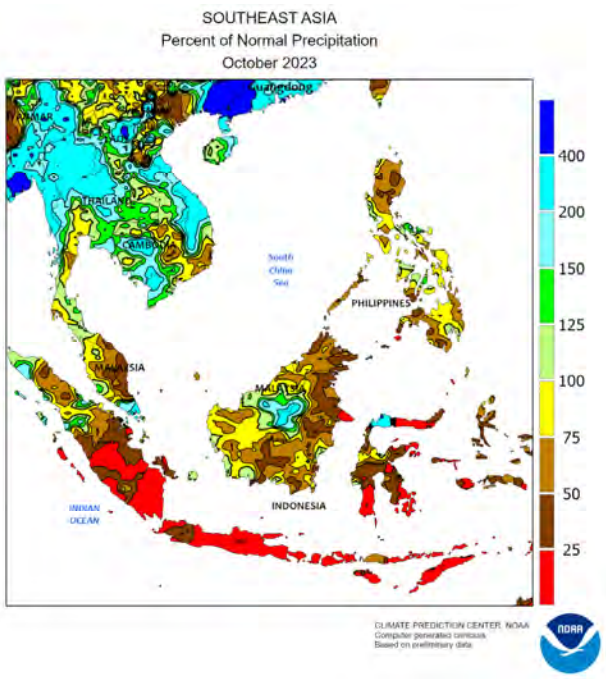

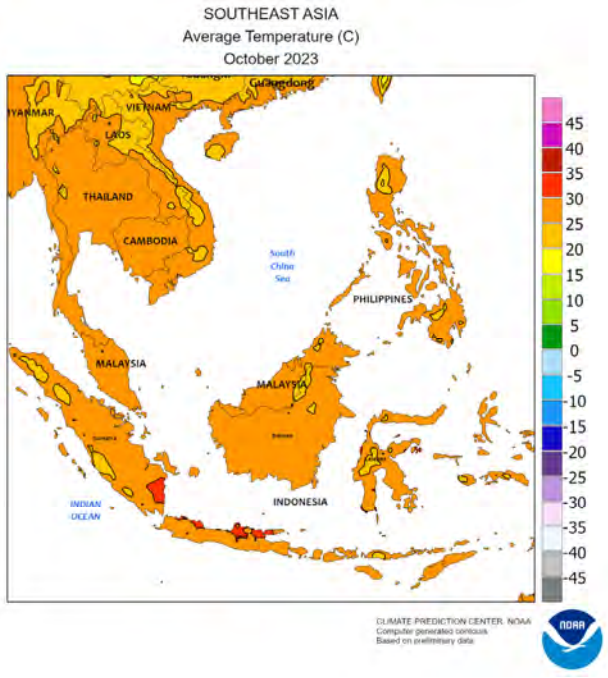

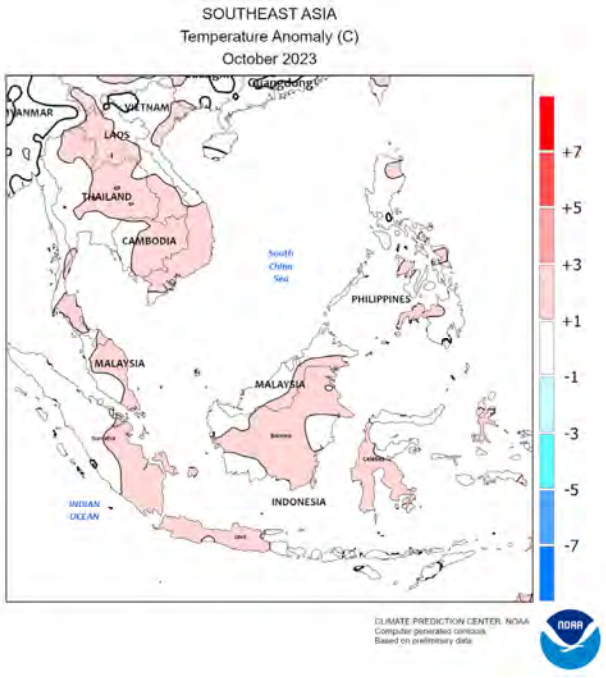

SOUTHEAST ASIA

Unseasonably heavy October rainfall across Thailand and southern Indochina provided favorable moisture for rice planted later in the season; harvesting of the earliest planted rice was underway. Rainfall totals topped 200 mm (about 200 percent of normal) in many locales which also bolstered irrigation supplies prior to sowing activities for the dry-season crop. Indeed, the wet weather was most pronounced in minor agricultural areas of central Vietnam where over 1,000 mm was reported. Meanwhile in the Philippines, similar rainfall totals to Thailand were recorded, but were below average (locally below 50 percent of normal) in this part of the region. The drier-than-normal conditions benefited the bulk of main-season rice that was maturing and actively being harvested. Elsewhere, lighter-than-normal precipitation in Malaysia and neighboring portions of Indonesia supported oil palm harvesting, while dryness in southern Indonesia (Java) reflected the delayed onset of seasonal rainfall, discouraging first-crop rice sowing.

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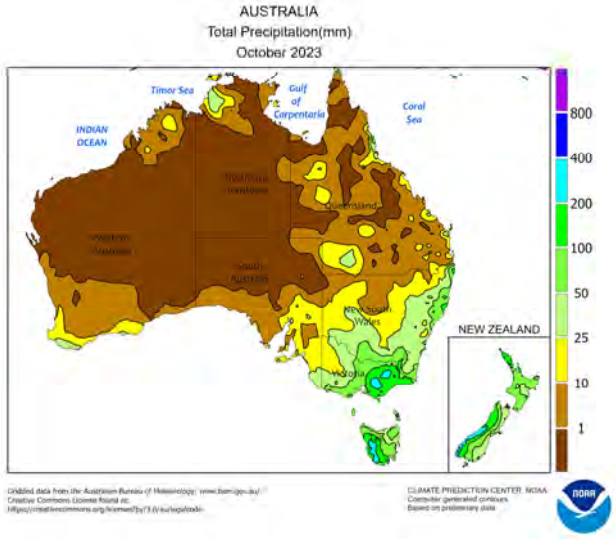
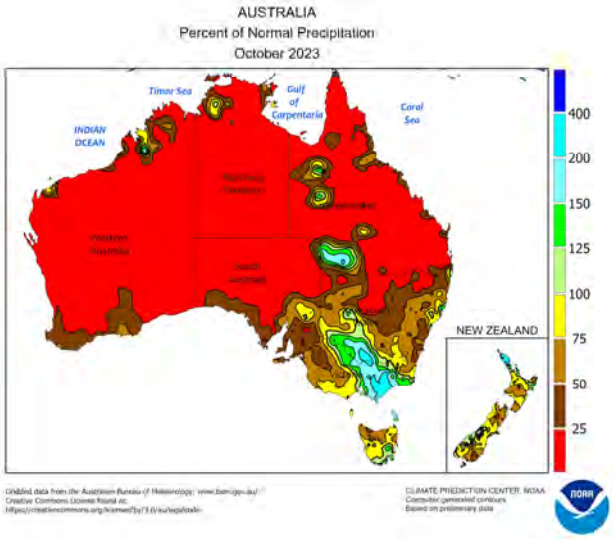
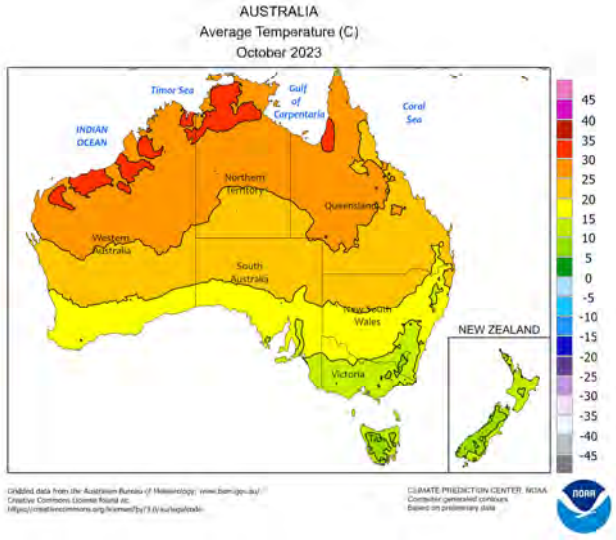
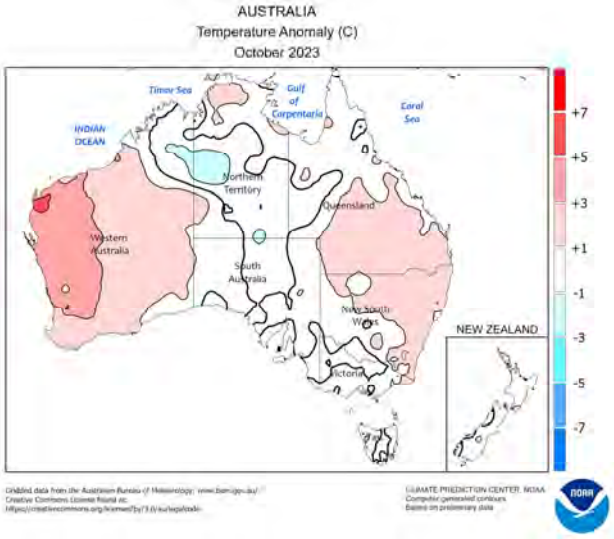


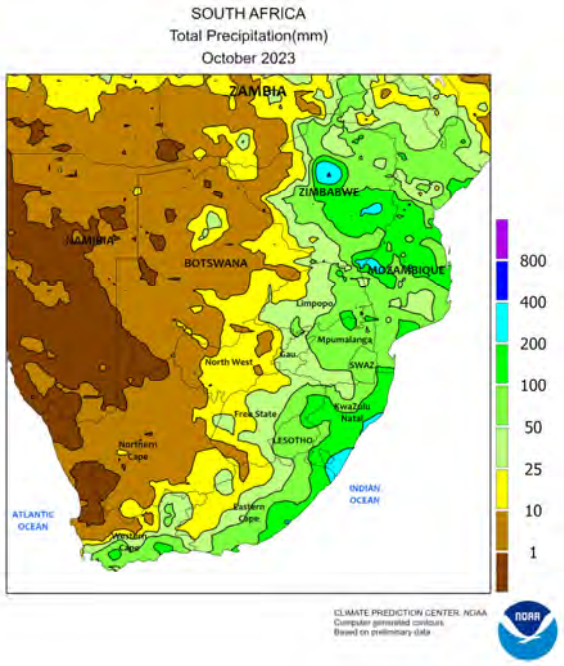


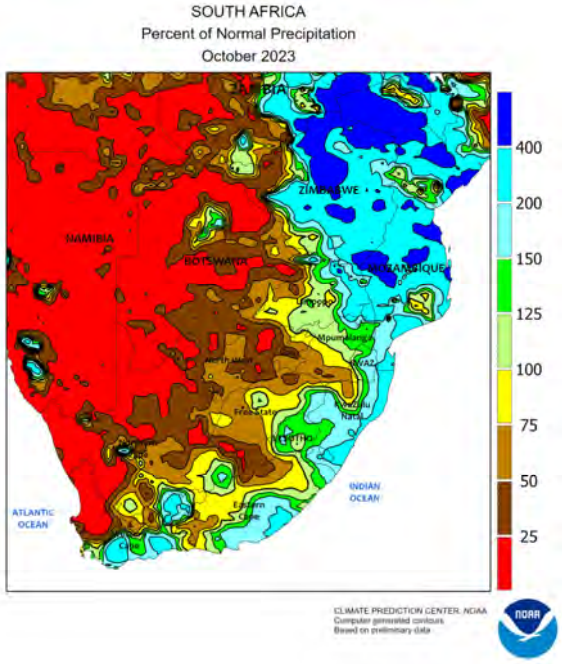


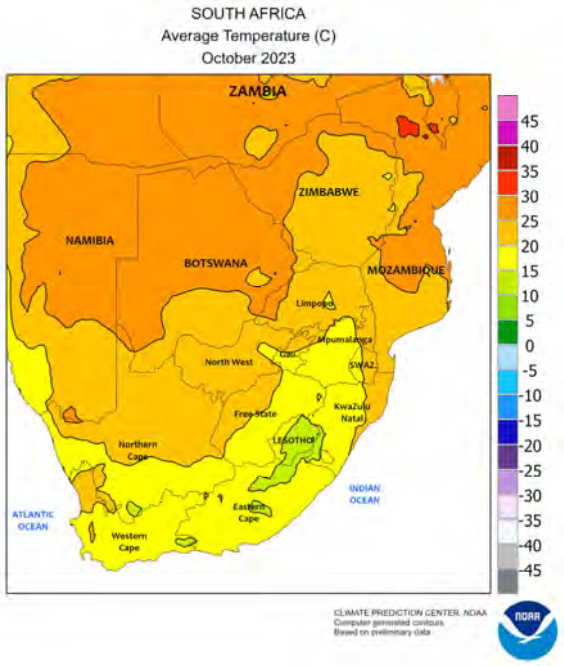


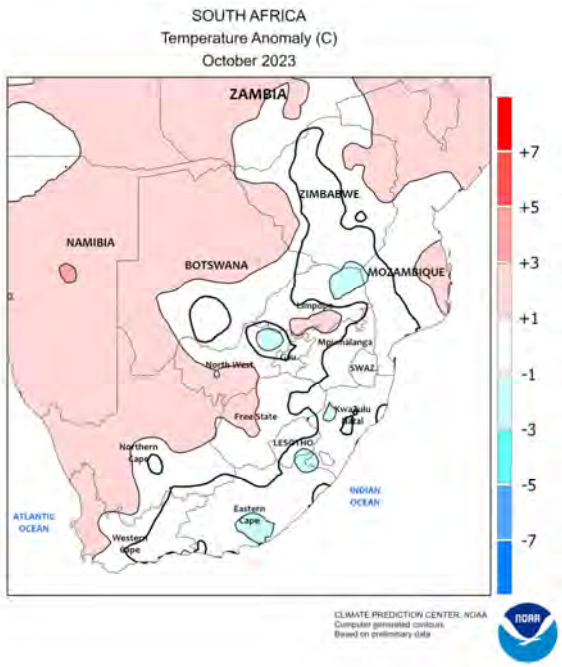
AUSTRALIA

Soaking rain overspread parts of southeastern Australia at the beginning of October, providing timely moisture for flowering to filling winter grains and oilseeds. The rain was very beneficial for wheat, barley, and canola, helping to maintain good crop conditions and yield prospects in Victoria and southern New South Wales. Elsewhere in the wheat belt, mostly dry weather dominated throughout October, reducing the amount of soil moisture available to winter crops. Additionally, frequent heat plagued western and northeastern portions of the wheat belt. The combined heat and dryness were unfavorable for immature winter grains and oilseeds, leading to further reductions in yield prospects while accelerating crops toward maturity. Indeed, the hot and dry weather promoted early winter crop harvesting in some areas. In the east, the dryness allowed summer crop planting to proceed, but sowing was skewed toward irrigated crops, such as cotton, while the lack of soil moisture deterred planting of dryland crops, such as sorghum.





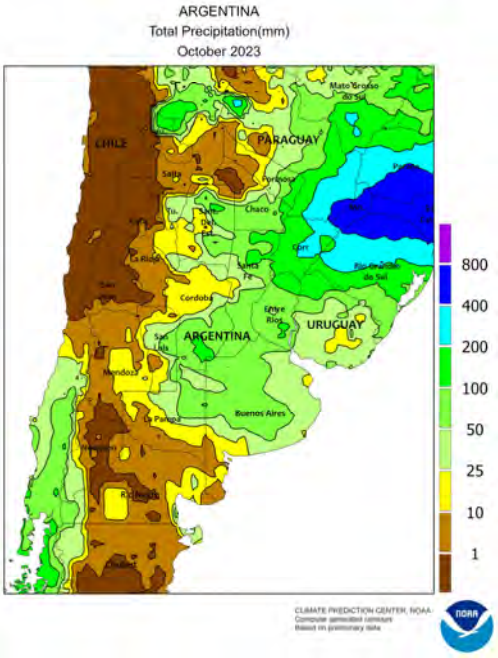


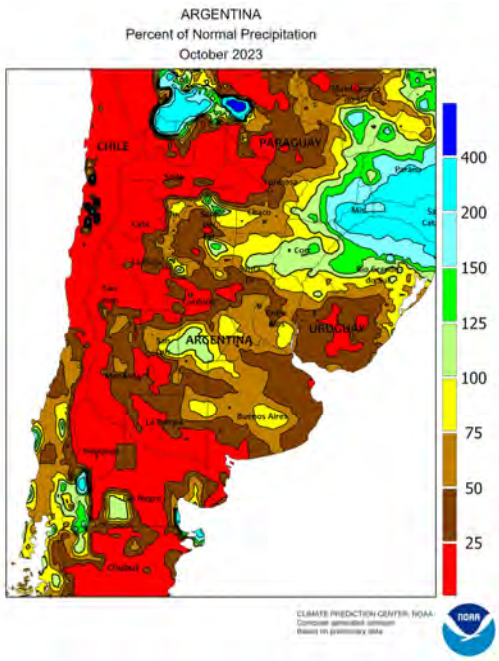


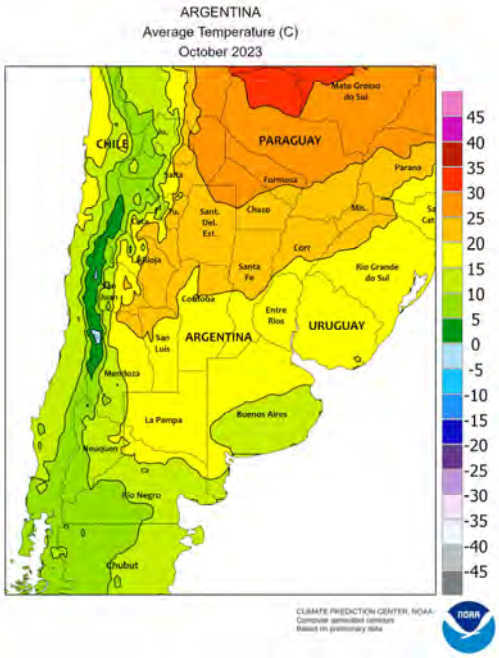
SOUTH AFRICA

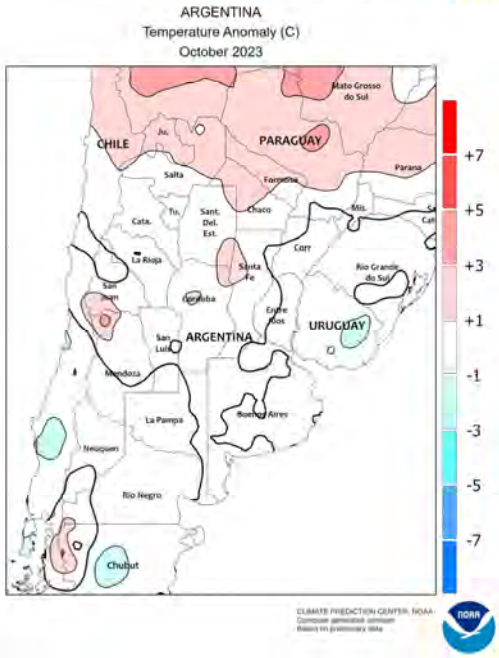
The timely onset of seasonal rainfall benefited summer crops in areas that typically begin receiving rainfall in October. This included eastern sections of the corn belt (Mpumalanga and environs) and the main sugarcane areas in KwaZulu-Natal. However, near- to above-normal temperatures maintained high evaporative losses, particularly in the drier western corn areas (North West and neighboring locations in Free State) where highest daytime temperatures reached the middle and upper 30s (degrees C). The planting window for corn in the western half of the corn belt is November and December, so farmers still have time to gain sufficient moisture to avoid planting delays. Elsewhere, unseasonably heavy rainfall provided a late-season boost in moisture for irrigated summer crops over much of Eastern and Western Cape; by month's end, however, drier conditions – combined with seasonal warming – favored growth of wheat and other crops in Western Cape benefiting from the increased sunshine.

For additional information contact: mark.brusberg@usda.gov



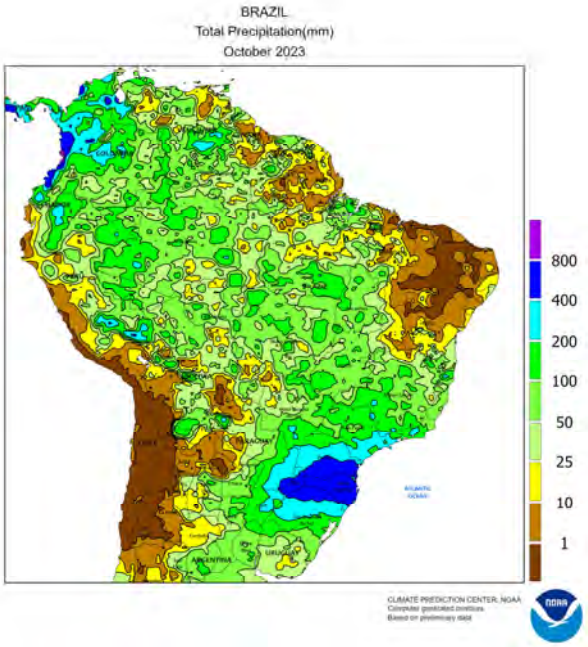


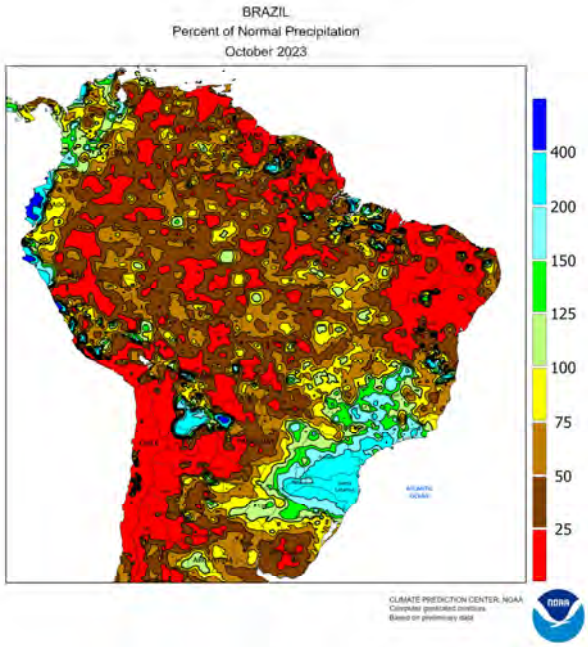


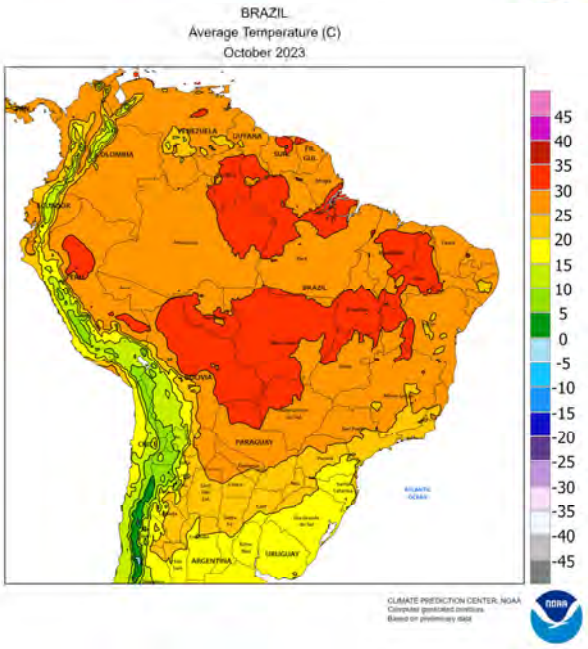


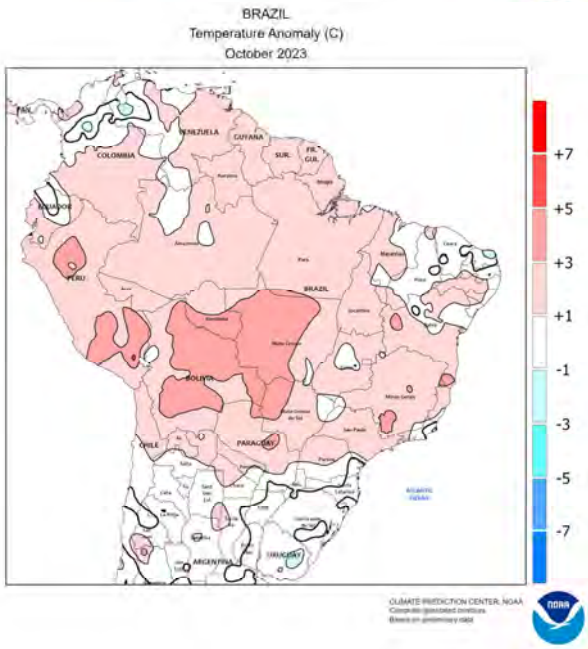
ARGENTINA

Following a protracted period of dryness, moderate to heavy showers developed nearly region wide toward the latter half of October. While providing a much-needed boost in moisture for germination and establishment of summer crops, much of the moisture arrived too late for wheat and barley in Argentina's more northerly production areas. An exception was Buenos Aires, where, according to government reports, little wheat had reached flowering before the onset of the rainfall. October temperatures averaged near to slightly above normal, although frost was common throughout the month in the climatologically cooler southern farming areas; although freeze damage was noted, no irreversible damage had been reported. In contrast to the southern coolness, daytime highs reached the lower and middle 40s (degrees C) on numerous occasions in the far north, stressing early planted summer crops and keeping fields too dry for additional plantings.





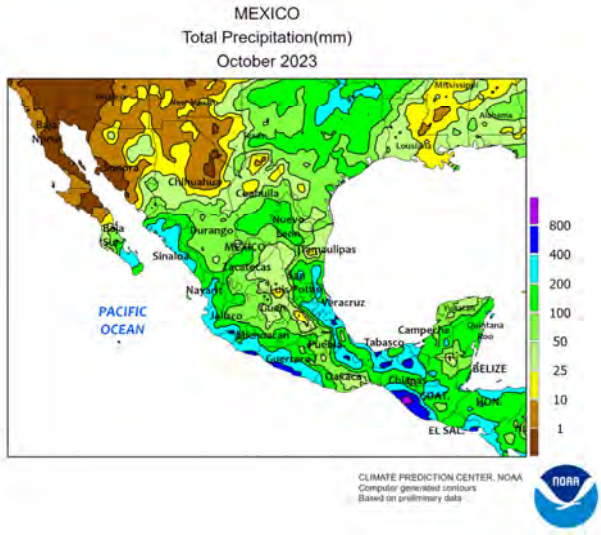


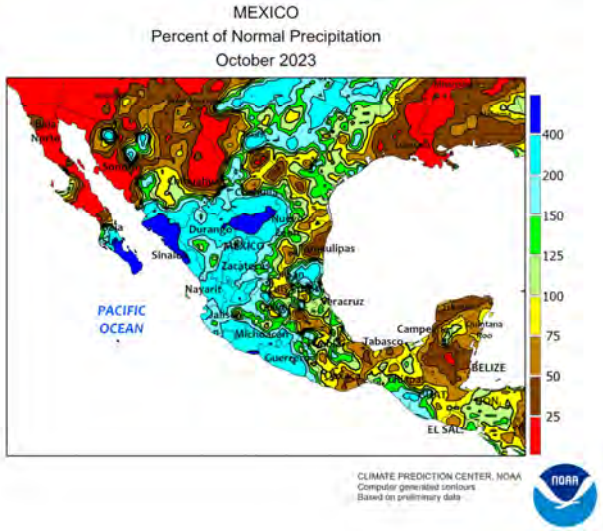


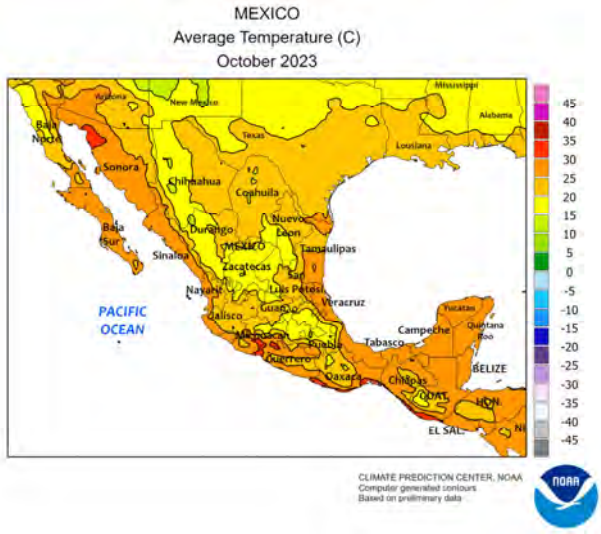
BRAZIL

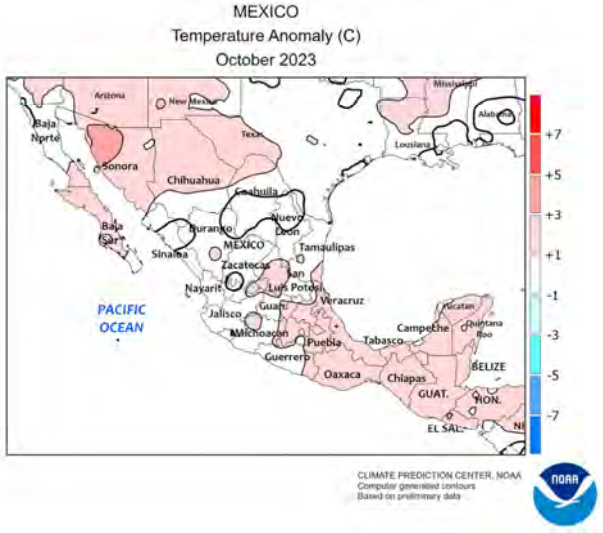
In October, frequent, occasionally excessive rain in southern farming areas contrasted with erratic showers and heat in key summer production areas in central and northeastern Brazil. The heaviest rainfall (monthly accumulations exceeding 200 mm) was concentrated over Paraná, Rio Grande do Sul, and eastern Paraguay; while maintaining abundant levels of moisture for corn and soybeans in early stages of development, the moisture was untimely for unharvested wheat. Rainfall was both below normal and late in arriving farther north, reducing moisture for soybean germination and resulting in some localized planting delays, as noted by reporting from the government of Mato Grosso. Monthly average temperatures were as much as 2°C above normal as far south as Paraná, with daytime highs frequently reaching the upper 30s and lower 40s (degrees C), exacerbating the effects of the low rainfall in the drier northern locations. In Mato Grosso, October average temperatures were the highest in at least 30 years, averaging 2 to 4°C above normal throughout the state.

For additional information contact: mark.brusberg@usda.gov





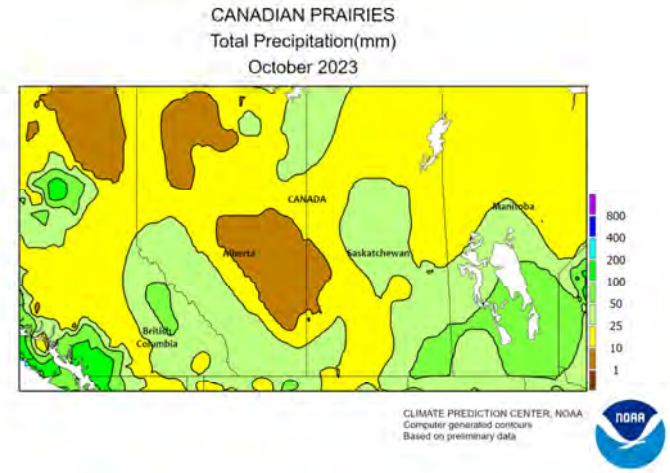


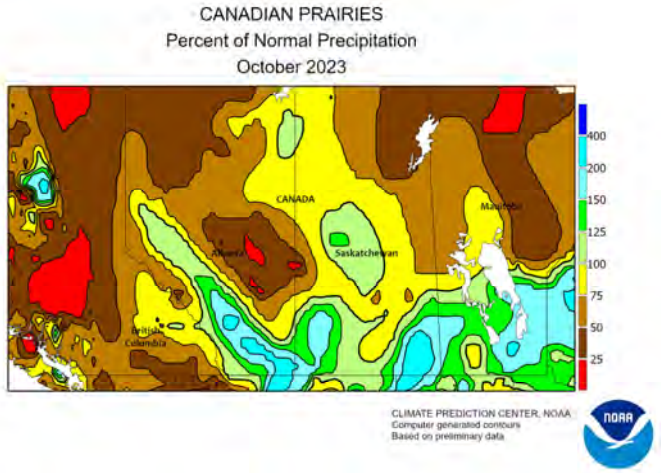


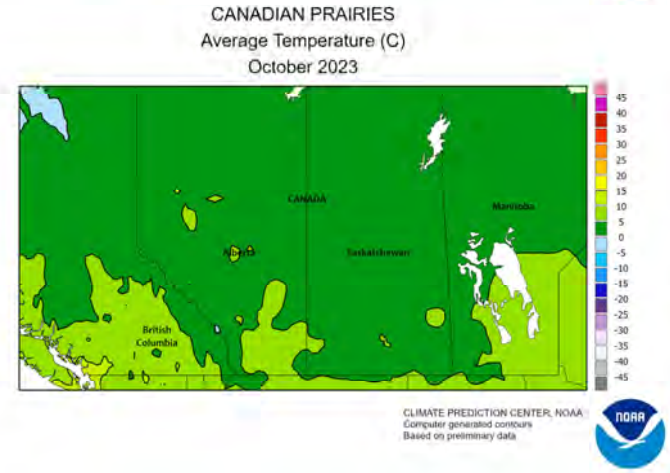
MEXICO

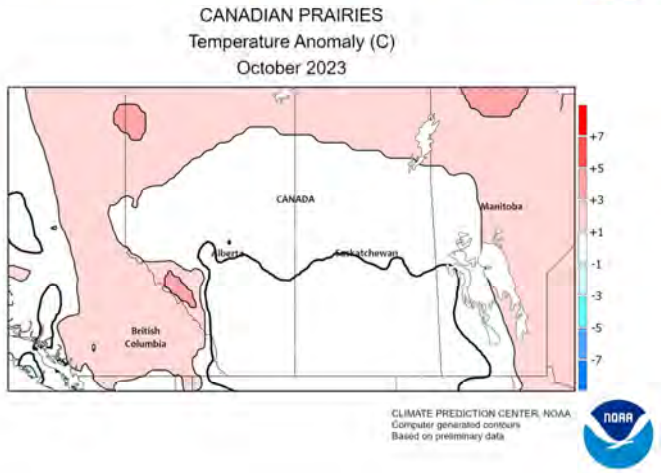
Four tropical storm systems made landfall during the month of October, causing local damage to crops and infrastructure along the southwestern coast but bringing much-needed moisture to many inland farming areas still struggling with season-long drought. The strongest and deadliest of these storms was Hurricane Otis, which struck on October 25 near Acapulco, with maximum sustained winds of 145 knots. While the influx of moisture helped to replenish reservoirs at a time when seasonal rainfall is typically diminishing, several pockets of dryness lingered. Notable dry spots included Sonora and northern farming areas of Chihuahua – most recently impacted by the weaking monsoon circulation – and farming areas in and around northern Veracruz, an important producer of sugarcane. According to the government of Mexico, reservoirs were at 48 percent capacity nationally as of October 31; Sinaloa reservoir levels were at 33 percent capacity, well below last year's levels (73 percent) but up 5 points from the previous month due to runoff from the storms.

For additional information contact: mark.brusberg@usda.gov









CANADIAN PRAIRIES

During October, extended periods of dryness supported the final stages of spring grain and oilseed harvesting, with provincial reports depicting near completion of all fieldwork by mid-month. One notable exception was in Manitoba, where corn and sunflowers were 49 and 58 percent harvested, respectively, as of October 24. Above-normal rainfall brought some relief from drought to farming areas in Manitoba and southern Alberta, although much of the region remained in drought as the drier albeit colder winter months approached. According to the Canadian Drought Monitor, the majority of the Prairie agricultural districts were recording some degree of drought as of October 31, with Extreme to Exceptional Drought (D3 and D4) persisting in southern Alberta and neighboring locations in Saskatchewan.

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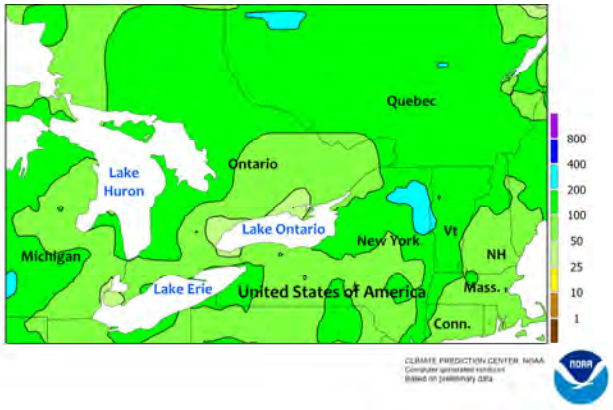
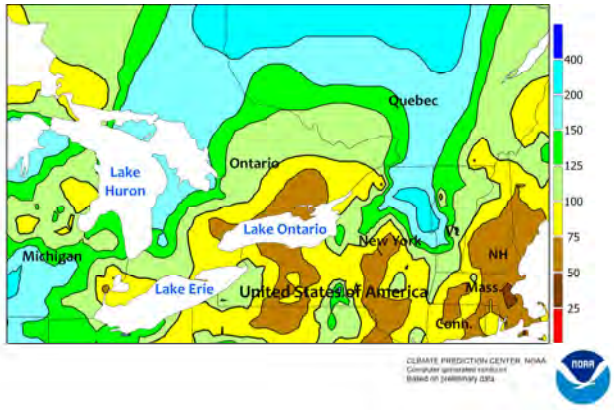
SOUTHEASTERN CANADA
Total Precipitation(mm)
October 2023



SOUTHEASTERN CANADA
Percent of Normal Precipitation
October 2023



SOUTHEASTERN CANADA
Average Temperature (C)
October 2023

SOUTHEASTERN CANADA
Temperature Anomaly (C)
October 2023

SOUTHEASTERN CANADA

A warmer-than-normal October, accompanied by periods of dry, sunny weather, favored the latter stages of summer crop harvesting and spurred growth of emerging winter wheat. Monthly average temperatures ranged from 1 to 4°C above normal, with the warmest locations concentrated in southern Quebec and eastern-most Ontario. Despite the unseasonable warmth, however, all locations recorded a season-ending freeze (temperature at or below -2°C) by the end of October. In Ontario, the hard freeze, combined with a drying trend during the latter half of the month, aided drydown and harvesting of corn and soybeans, although additional moisture would be welcome for winter wheat establishment before crops enter dormancy.

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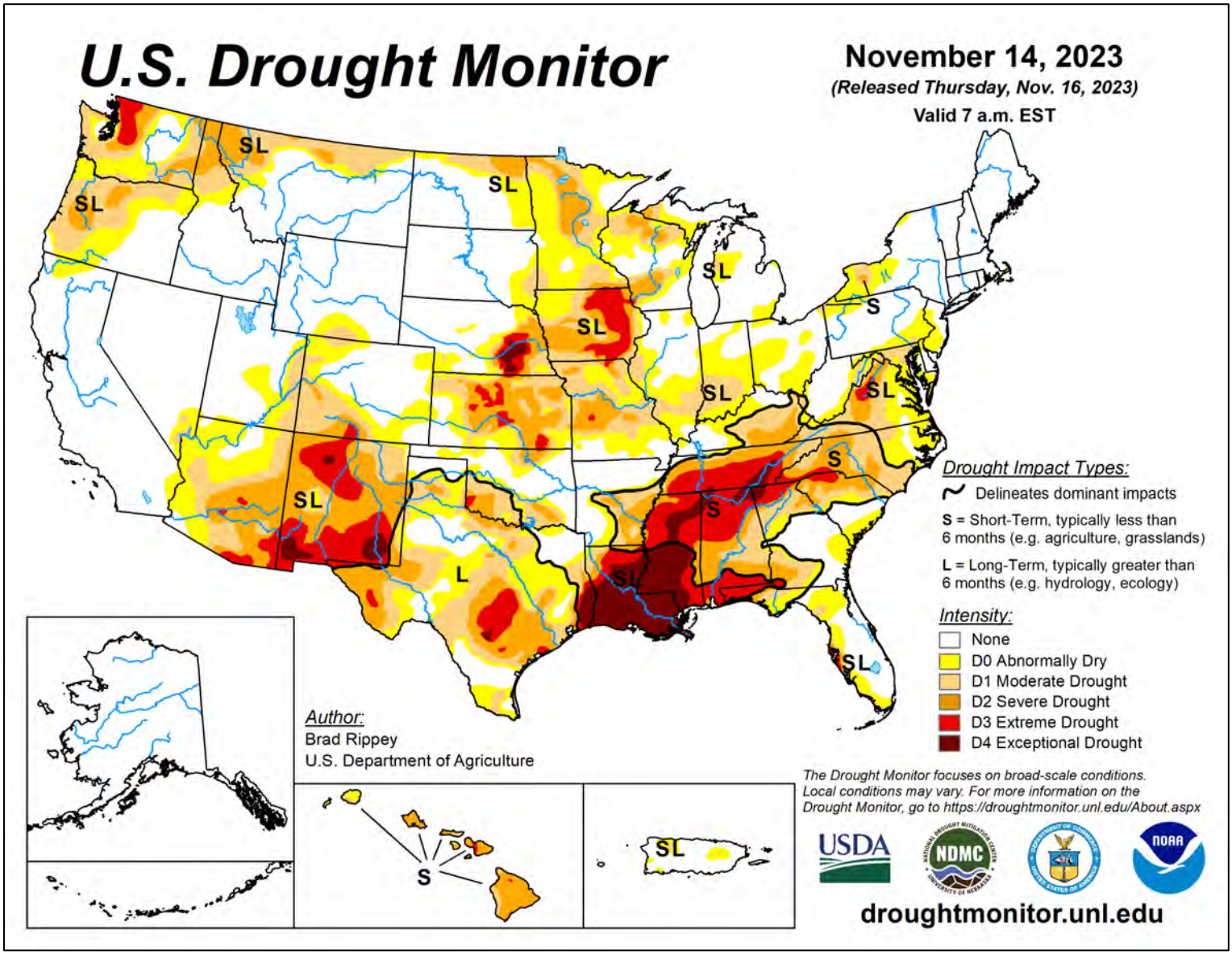

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Correspondence to the meteorologists should be directed to:
***Weekly Weather and Crop Bulletin*, NOAA/USDA, Joint Agricultural Weather Facility, USDA South Building, Room 4443B, Washington, DC 20250.**
Internet URL: **www.usda.gov/oce/weather-drought-monitor**
E-mail address: ***brad.rippey@usda.gov***

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