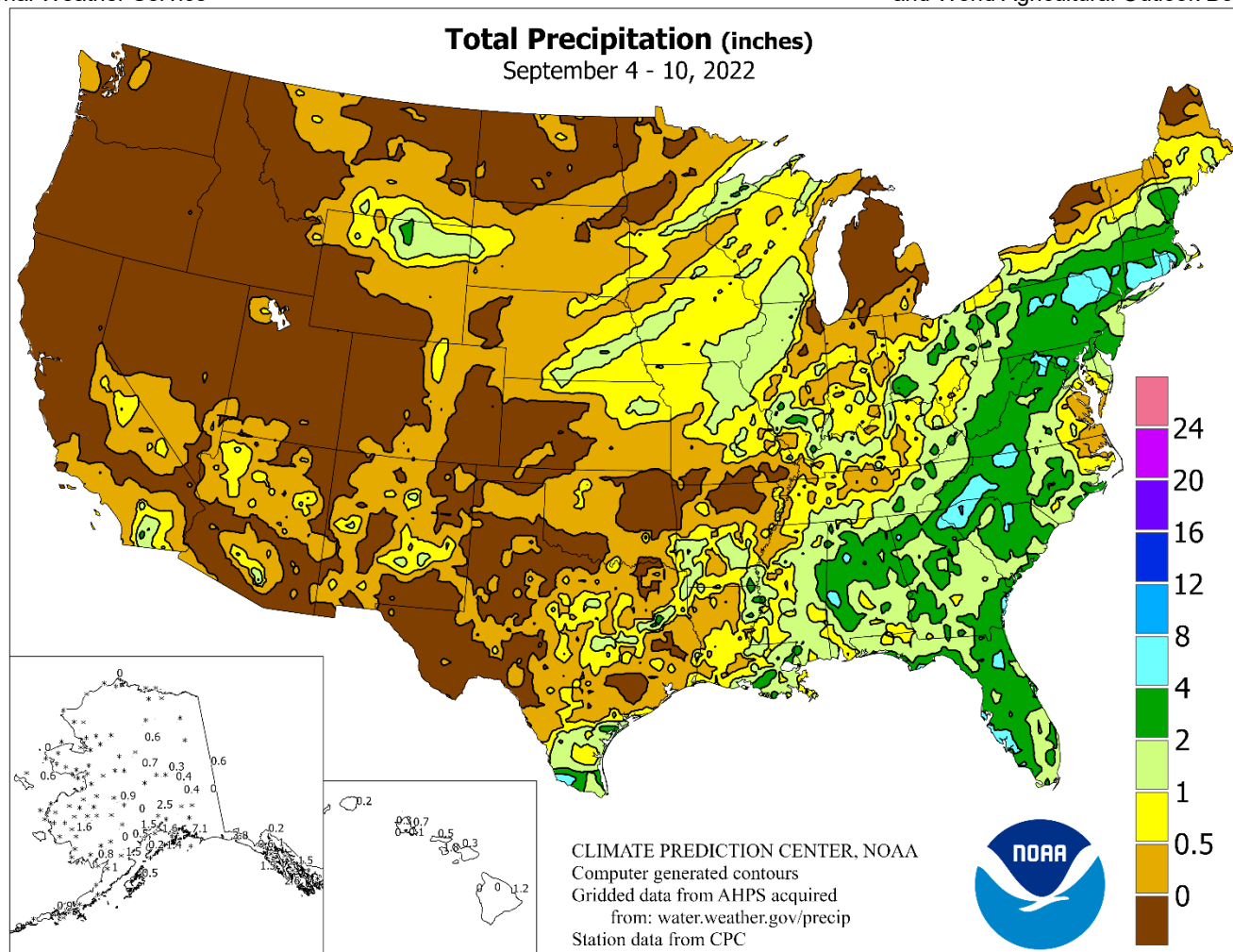


# WEEKLY WEATHER AND CROP BULLETIN

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

**September 4 – 10, 2022**

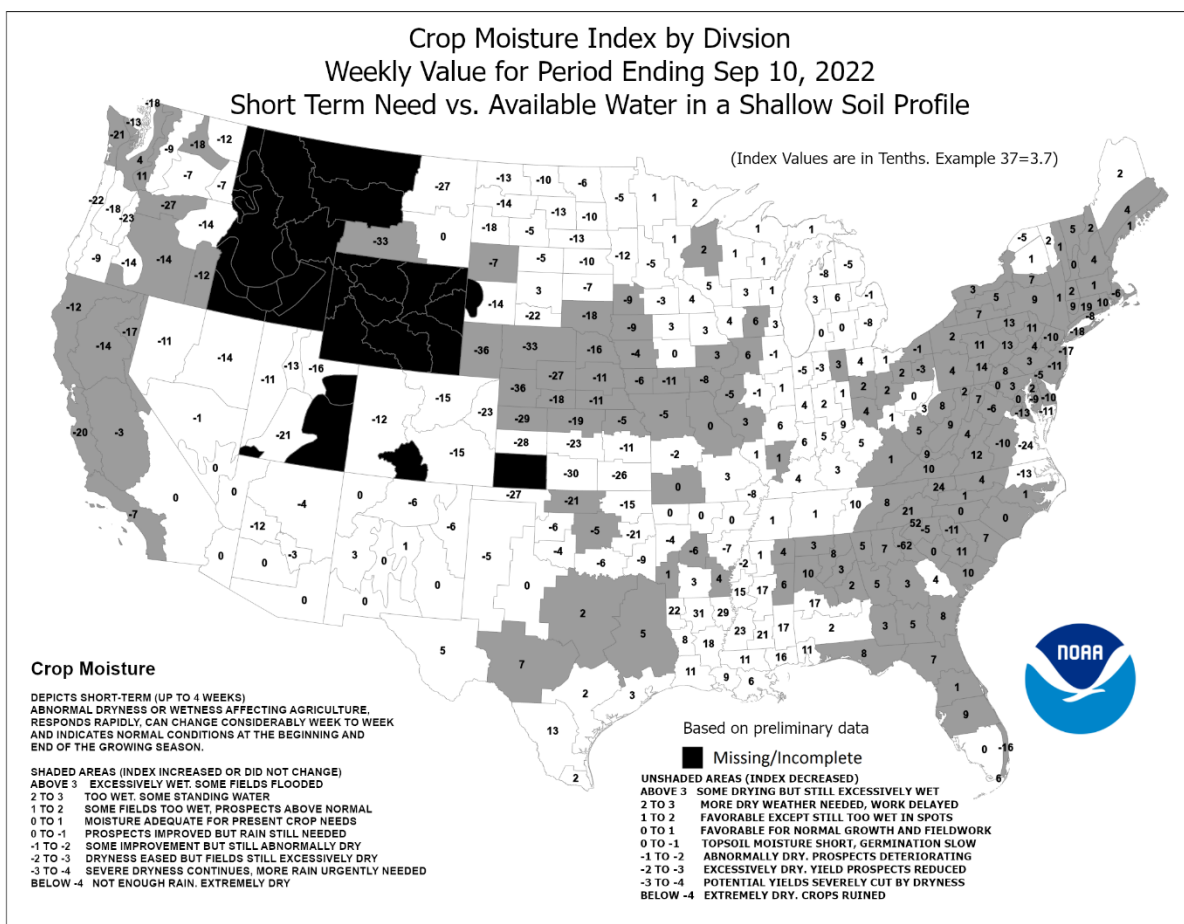
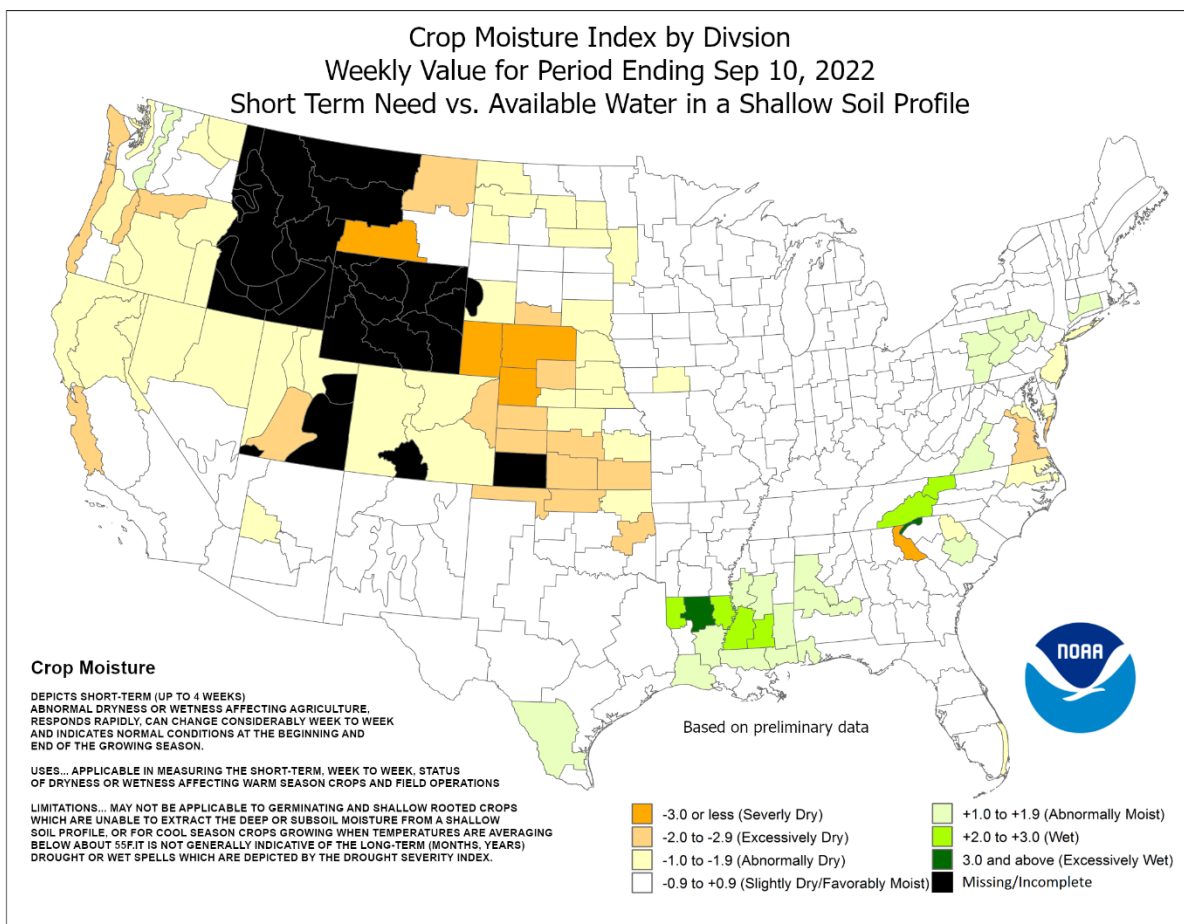
*Highlights provided by USDA/WAOB*

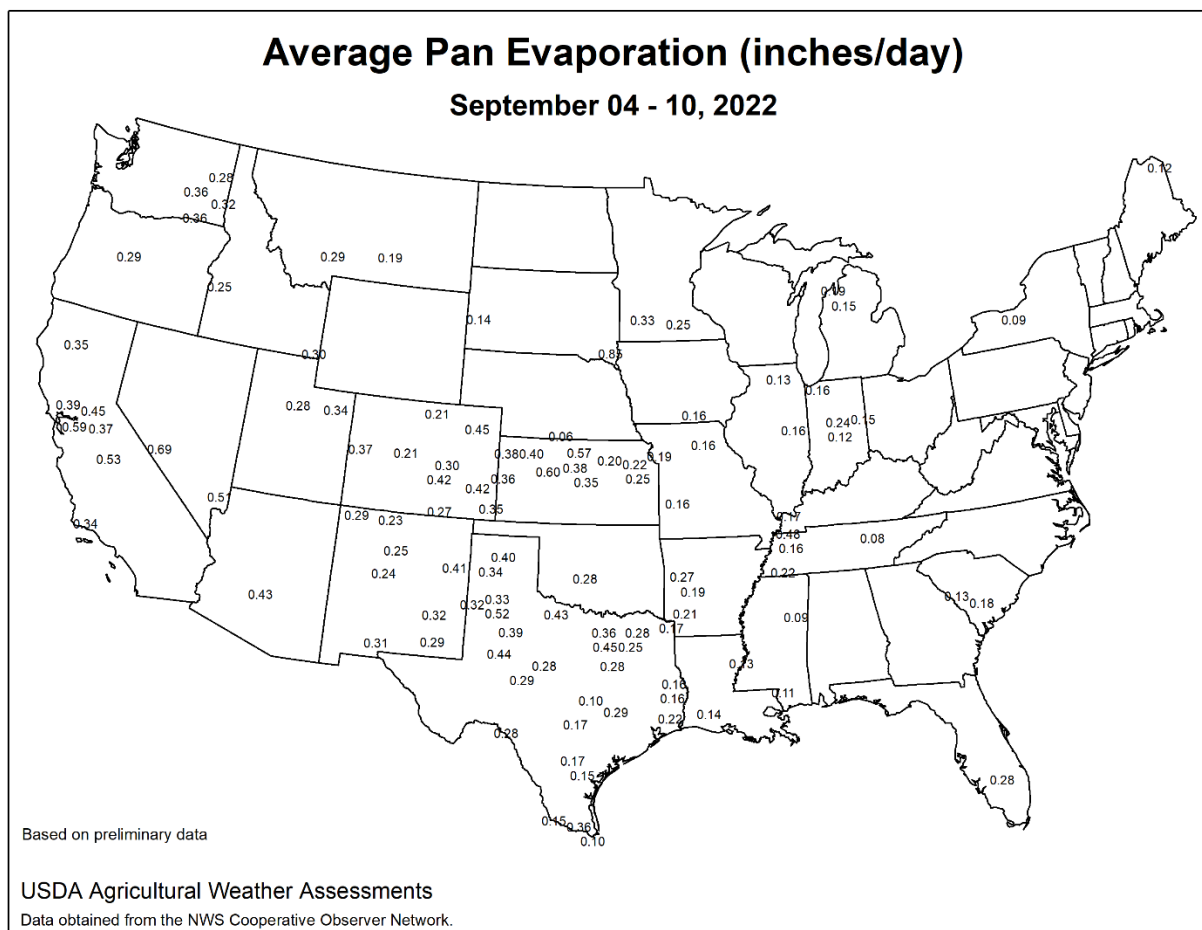
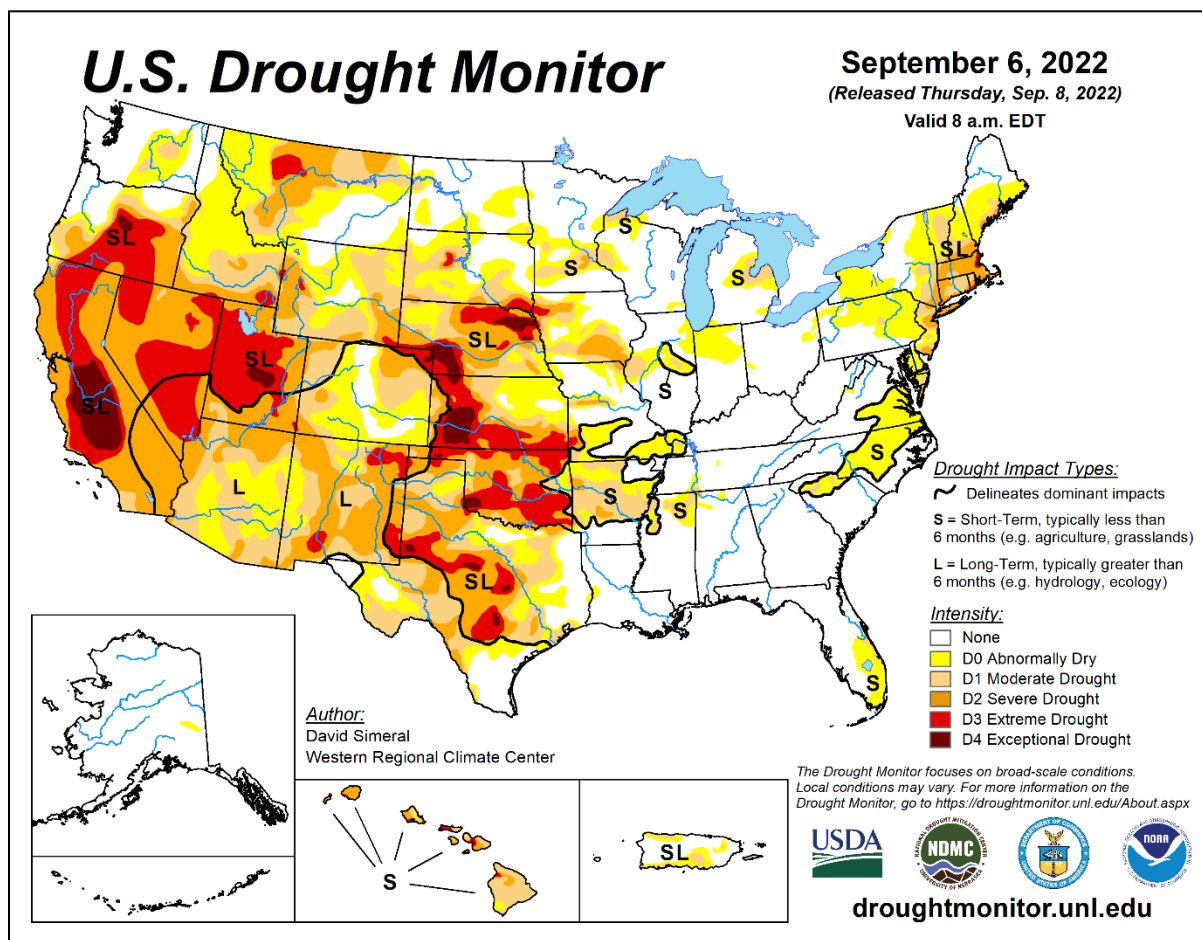
**H**heavy rain shifted into the **eastern U.S.**, where weekly totals of 2 to 4 inches or more were common. Rain was mostly beneficial in drought-affected sections of the **Northeast**, although excessive rain in parts of the **mid-Atlantic** and **southern New England** sparked local flooding. The **Eastern** rain also limited fieldwork. Meanwhile, somewhat drier weather in the **lower Mississippi Valley** favored a gradual return to fieldwork. Still, some crop-quality concerns persisted in the **central Gulf Coast States**, as mature (or nearly mature) crops

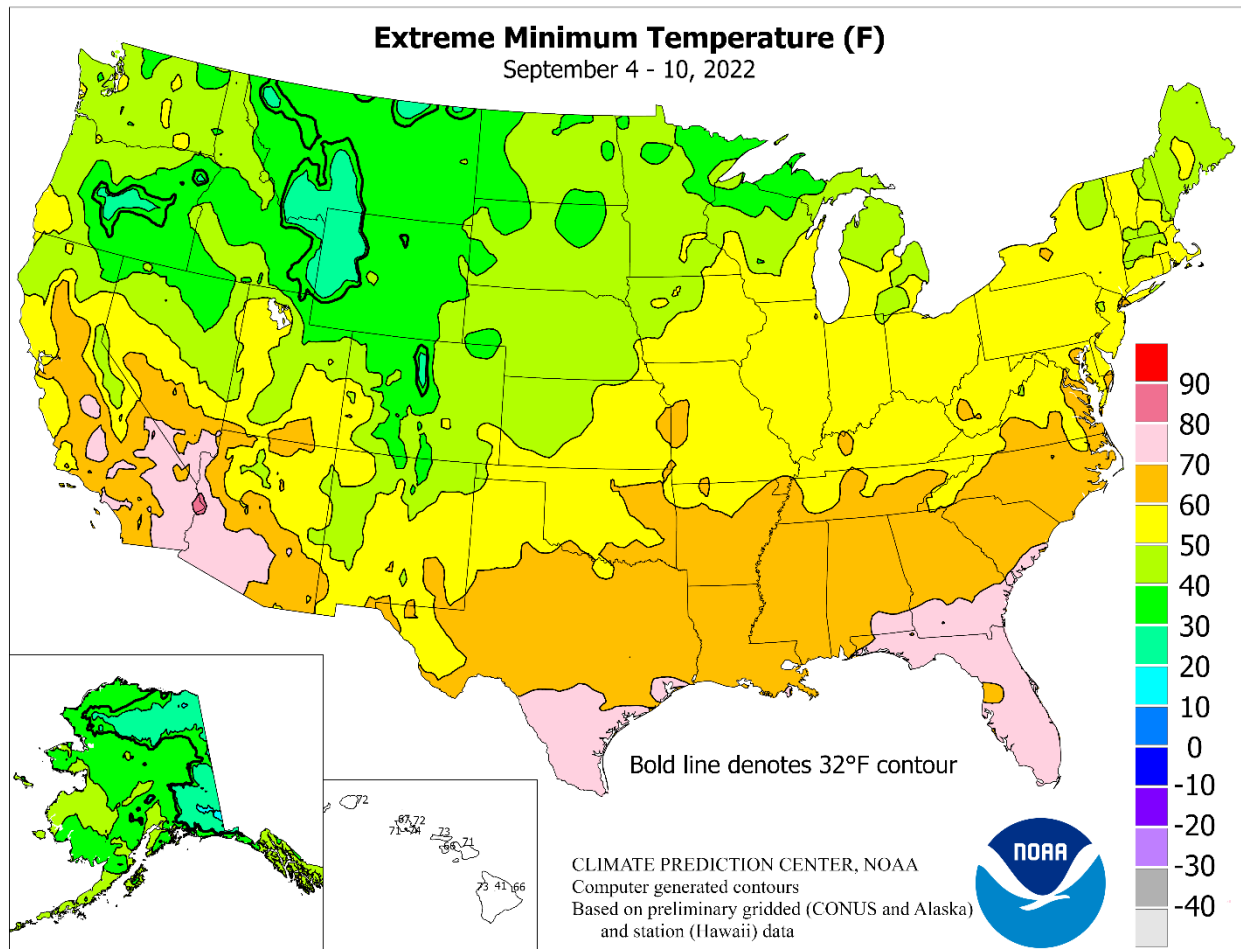
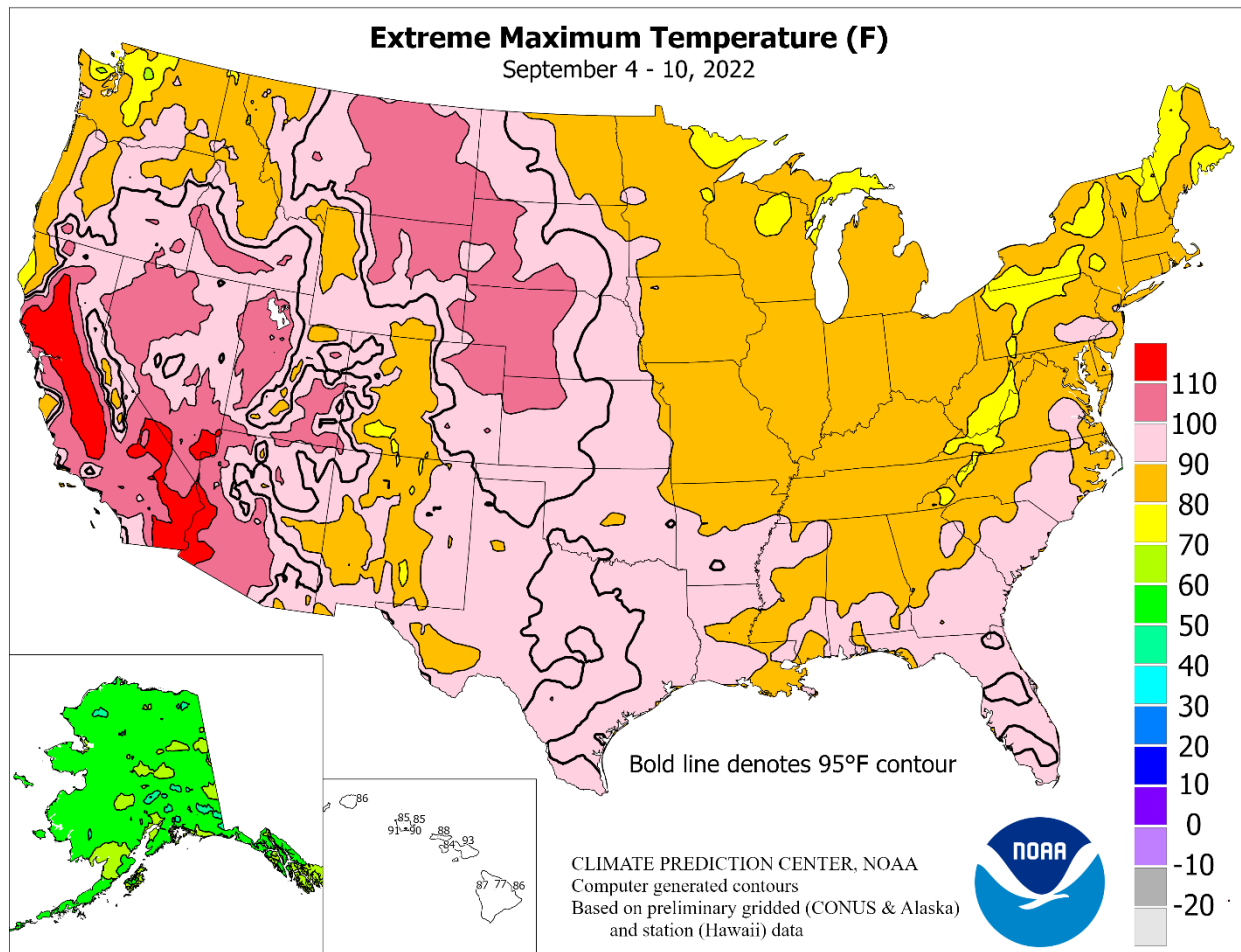
*(Continued on page 5)*

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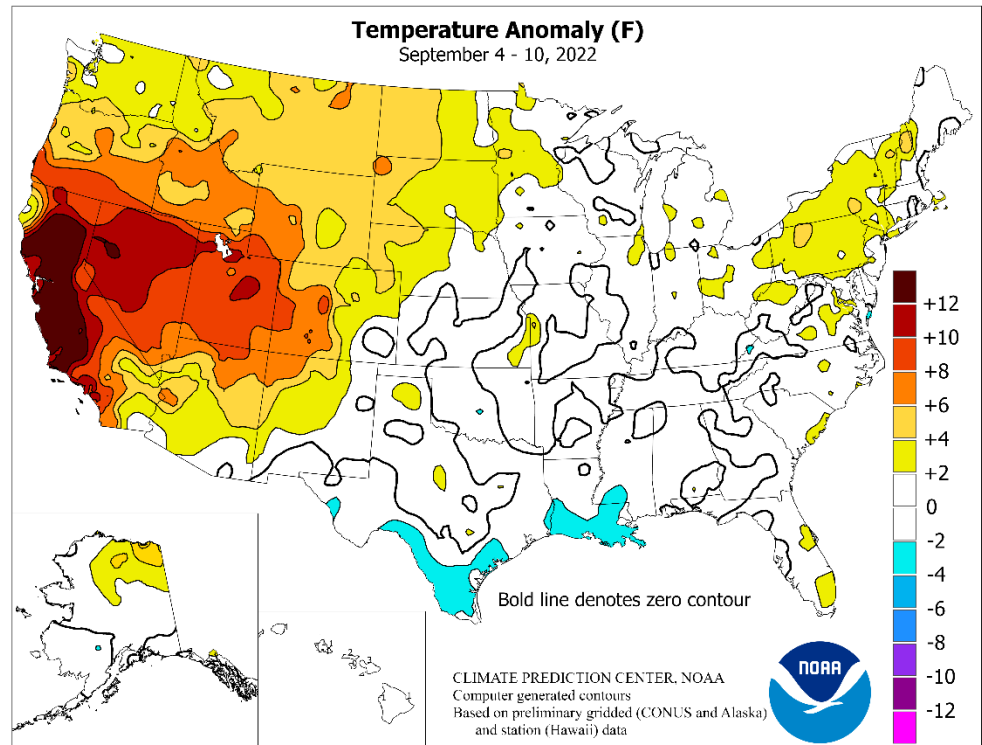




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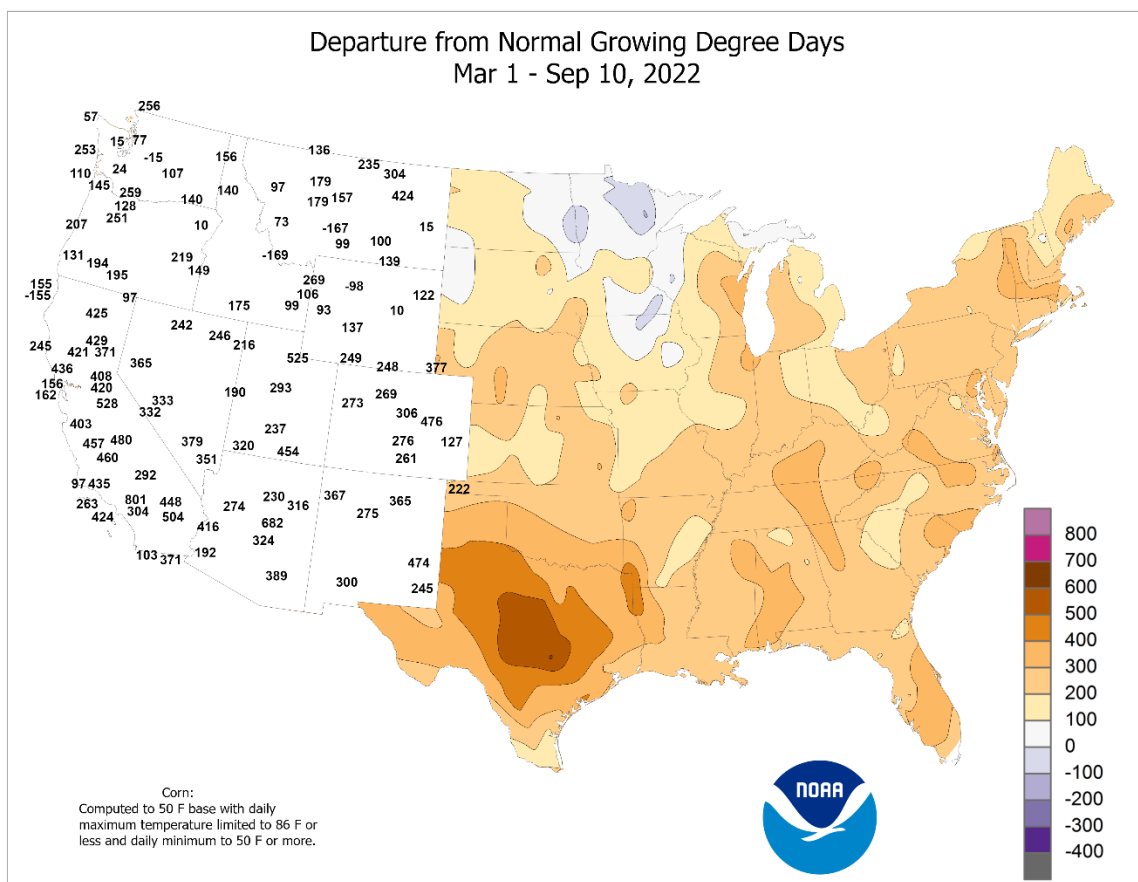
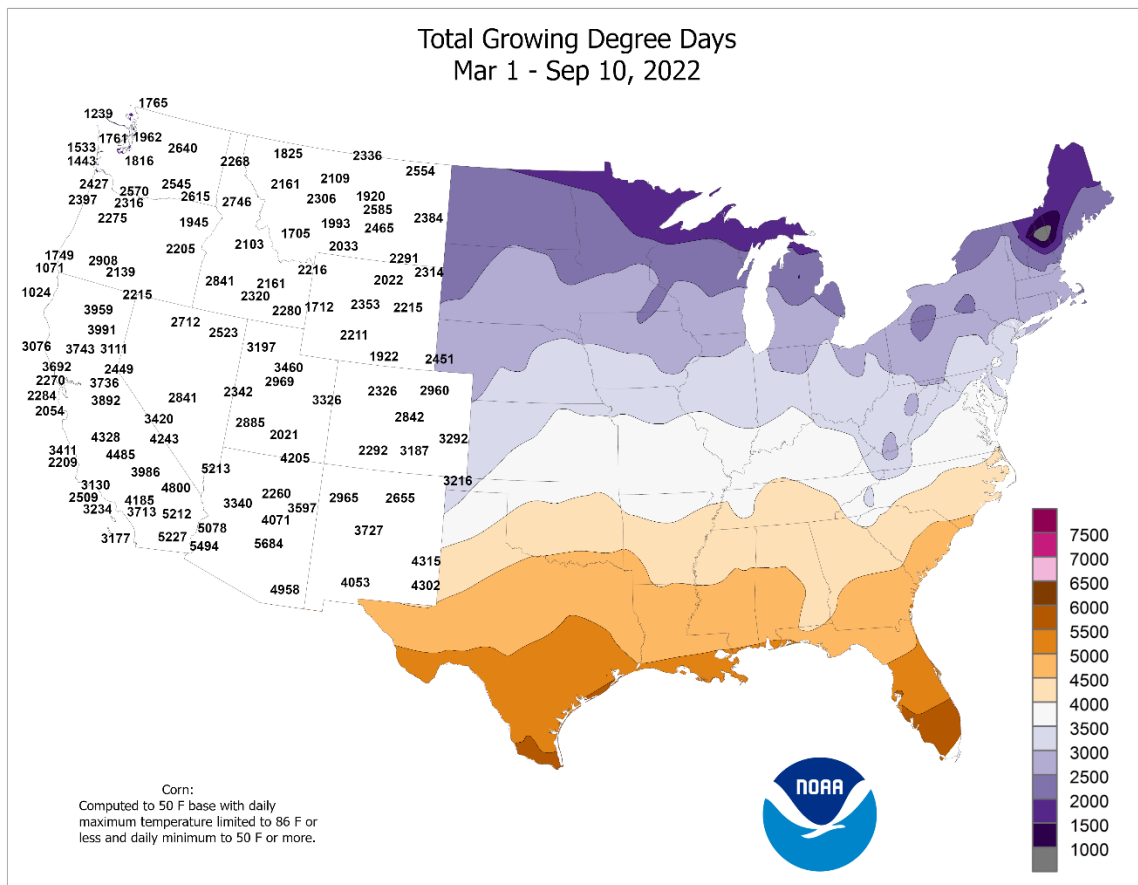
languished in still-soggy fields. Farther north, variable rainfall across the **Plains** and **Midwest** arrived too late to benefit most summer crops but locally boosted soil moisture in advance of the winter wheat establishment season. Even with the showers, parts of the **northern and central Plains** remained extremely dry. Late in the week, remnant moisture associated with former eastern Pacific Hurricane Kay resulted in scattered but locally heavy showers in the **Southwest**. Although the **Southwestern** rain improved topsoil moisture and aided wildfire containment efforts, local downpours contributed to flash flooding and debris flows. Prior to the arrival of Kay's moisture, one of the hottest weeks ever observed at any time of year across **California**, the **Great Basin**, and the **Intermountain West** resulted in hundreds of daily-record high temperatures; dozens of monthly record highs; and several all-time records. Weekly temperatures averaged at least 15°F above normal in several locations across **California**, while readings averaged more than 10°F above normal as far east as **western Colorado**. In fact, heat broadly prevailed in the **Northeast** and west of a line from the **southern Rockies to the upper Great Lakes region**. In contrast, near- or slightly below-normal temperatures covered the **Deep South**, from the **Rio Grande Valley to the Gulf Coast region**.

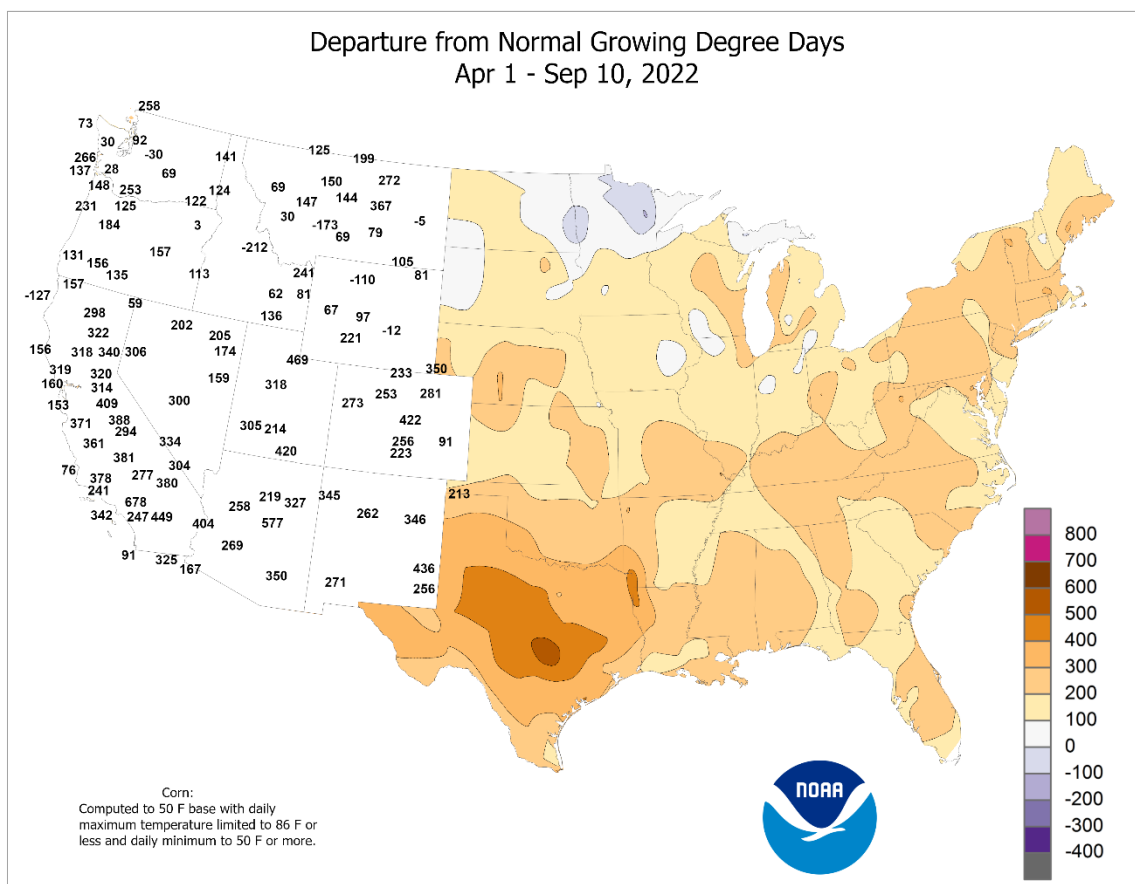
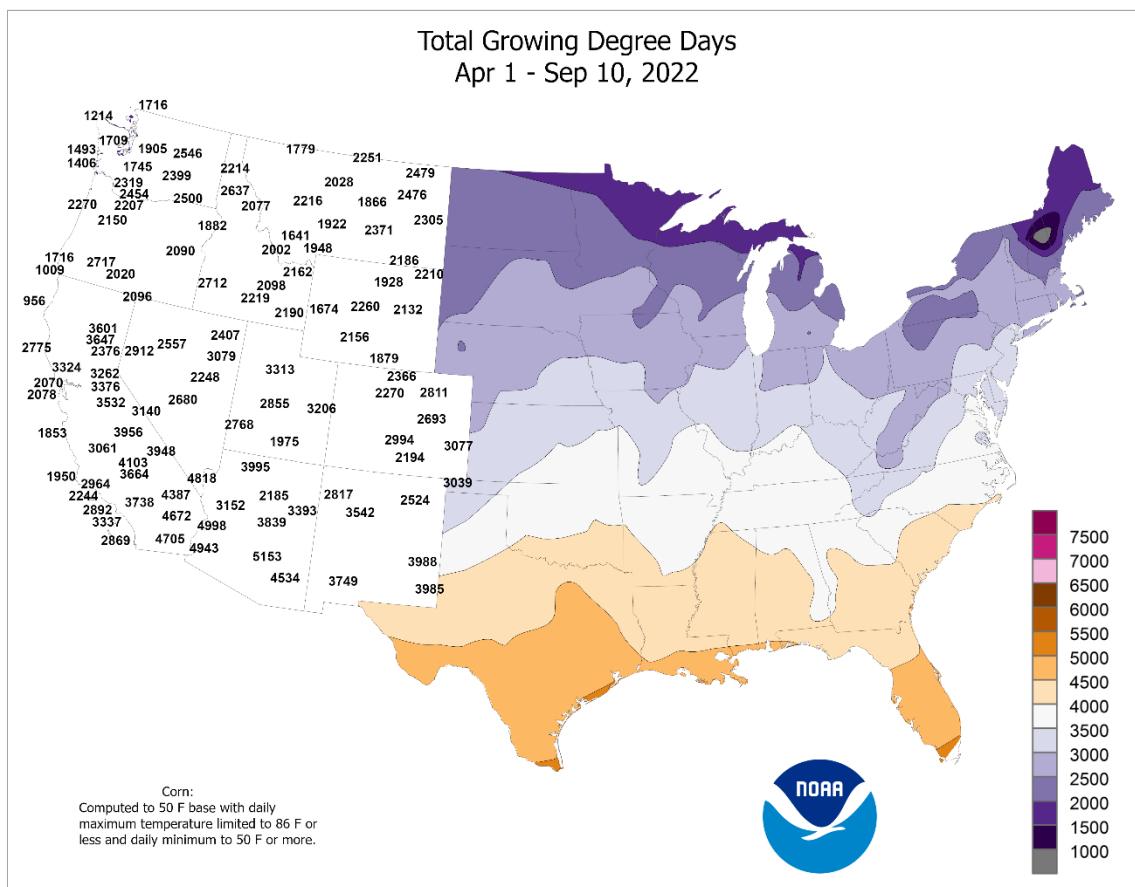
In **California**, the intense heat generally peaked on September 6 with never-before-seen temperatures in locations such as **Ukiah** (117°F), downtown **Sacramento** (116°F), **Livermore** (116°F), **King City** (116°F), **Merced** (116°F), **Santa Rosa** (115°F), and **Stockton** (115°F). **Livermore** had also attained 116°F on September 5. The previous record in downtown **Sacramento**, 114°F, had been set on July 17, 1925. **Ukiah's** former record, 115°F, had stood since September 3, 1955. Elsewhere on the 6th, **Death Valley** (125°F) matched its monthly record, originally set on September 5, 2020. Monthly record highs returned to **Idaho**, with **Burley** (101°F on the 6th) topping its September record set just 3 days earlier. The warmest September weather on record also extended to the **western slopes of the Rockies** on September 6; in **Colorado**, **Grand Junction's** high of 102°F marked the first time that city had topped the 100-degree mark after the end of meteorological summer. Meanwhile, **Salt Lake City, UT**, posted a monthly record high (102°F; previously, 100°F on multiple dates) on September 1, but went on to shatter that record with 103°F on the 3rd, 104°F on the 5th, 105°F on the 6th, and 107°F on the 7th. **Salt Lake City's** final reading tied an all-time station record, previously set on July 17, 2022, and earlier dates. Similarly, **Reno, NV**, smashed its monthly record on the 4th with a high of 104°F (previously 102°F on September 4, 2020)—but later demolished that mark with a reading of 106°F on the 6th. In addition, **Reno** began September with 8 consecutive days of 100-degree heat. **Reno's** record for 100-degree days in September had been 3 days in 2017. Except several times in July (2003, 2005, 2018, 2021, and 2022), there has never been a month in **Reno** with more than 8 days of triple-digit heat. Farther north, the week began on September 4 with monthly record highs in **Wyoming** locations such as **Worland** (102°F), **Casper** (100°F), **Riverton** (100°F), **Lander** (99°F), and **Rock Springs** (93°F). By September 7, a surge of heat in advance of a cold front led to the latest triple-digit heat on record in **Montana** locations such as **Glasgow** (106°F), **Havre** (104°F), **Helena** (102°F), and **Lewistown** (100°F). All those locations also set September records. A day later in **Nebraska**, **Valentine** (106°F on September 8) tied a monthly record previously set on September 9, 1931, and September 5, 2020. Late in the week, however, signs of autumn appeared across the **Plains** and **Northwest**. On September 10, just 3 days after posting a monthly record-tying high of 102°F, **Livingston, MT**, collected a daily-record low of 27°F. The following morning, September 11, daily-record lows dipped to 25°F in **Laramie, WY**, and 41°F in **Garden City, KS**.



Early in the week, heavy showers swept into the **East**. Record-setting rainfall totals for September 5 included 2.53 inches in **Binghamton, NY**; 2.28 inches in **Scranton, PA**; and 2.19 inches in **Providence, RI**. For **Providence**, it was the third-wettest Labor Day—a floating holiday; the record of 2.82 inches was set on September 2, 2013. **Providence** received 3.77 inches on September 5-6, while neighboring locations in **Rhode Island** netted 4 to 8 inches or more, leading to urban and suburban flooding. On September 6, lingering downpours along the **Atlantic Seaboard** led to a daily-record sum (2.86 inches) in **Atlantic City, NJ**. Elsewhere on the 6th, heavy rain in **southern Texas** produced 2.67 inches—a record for the date—in **McAllen**. The following day, **Fort Myers, FL**, measured a record-setting amount (3.12 inches) for September 7. During the second half of the week, showers and thunderstorms erupted in the vicinity of a cold front. In **Wyoming**, daily-record totals for September 8 included 1.24 inches in **Sheridan** and 0.52 inch in **Worland**. Later in **Wisconsin**, daily-record totals reached 2.00 inches (on September 9) in **Ashland** and 2.18 inches (on September 11) in **Madison**. The 11th became the wettest September day on record in **Milwaukee, WI**, where the 4.78-inch total clipped the record of 4.32 inches, set on September 8, 1941. Finally, **Southwestern** showers expanded and intensified on September 9, when Tropical Storm Kay—a former hurricane—moved within about 130 miles of **San Diego, CA**, before dissipating. Official daily-record totals for the 9th in **southern California** included 0.81 inch in **Thermal** and 0.63 inch in **San Diego**. **Lake Cuyamaca, CA**, netted 2.00 inches in a 24-hour period on September 8-9. On the 9th, **southern California's** winds—not directly associated with Kay—were clocked to 47 mph in **Ramona** and ranged from 35 to 39 mph in **Chino**, **Fullerton**, **Ontario**, and **Riverside**.

In **Alaska**, near- or slightly above-normal temperatures accompanied scattered showers. Typical, early-autumn freezes began to occur across **interior, northern, and eastern Alaska**, with **Bettles** noting its first freeze of the season (low of 31°F) on September 5. **Fairbanks** (32°F on the morning of September 11) also experienced its first autumn freeze. Meanwhile in **Anchorage**, a wet period from September 6-9 featured rainfall totaling 1.51 inches. **Valdez** measured 3.44 inches of rain on September 9. Farther south, shower activity slightly increased across **Hawaii**, although most of the island chain continued to experience short-term drought. Through September 10, month-to-date rainfall at **Hawaii's** major airport observation sites ranged from 0.19 inch (56 percent of normal) in **Honolulu, Oahu**, to 1.71 inches (also 56 percent) in **Hilo**, on the **Big Island**. On **Maui**, **Kahului's** high temperatures reached or exceeded the 90-degree mark each day from September 2-10. However, **Kahului** also noted a daily-record rainfall total of 0.22 inch on September 9.





## National Weather Data for Selected Cities

Weather Data for the Week Ending September 10, 2022

Data Provided by Climate Prediction Center

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION								RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS				
		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
																	TEMP. °F	PRECIP				
AK	ANCHORAGE	58	49	60	46	53	2	1.50	0.81	0.61	2.30	227	18.04	174	95	69	0	0	4	1		
	BARROW	43	34	50	32	39	4	0.01	-0.19	0.01	0.04	12	9.13	257	97	76	0	1	1	0		
	FAIRBANKS	59	45	62	40	52	3	0.31	0.00	0.14	0.32	71	4.91	60	89	53	0	0	5	0		
	JUNEAU	56	48	61	44	52	1	0.96	-0.93	0.30	1.56	59	54.47	152	97	76	0	0	6	0		
	KODIAK	60	47	63	42	53	2	0.49	-1.01	0.31	0.53	25	51.18	104	89	63	0	0	3	0		
AL	NOME	52	44	59	38	48	2	0.63	-0.02	0.59	1.04	113	11.52	100	92	70	0	0	2	1		
	BIRMINGHAM	84	69	86	64	76	-1	1.75	0.84	1.55	1.75	135	40.36	104	97	67	0	0	5	1		
	HUNTSVILLE	83	68	88	63	76	-1	1.20	0.38	0.76	1.48	128	38.94	103	98	66	0	0	5	1		
	MOBILE	89	71	90	68	80	0	0.96	-0.25	0.78	0.97	55	46.13	94	93	55	3	0	4	1		
	MONTGOMERY	88	72	91	70	80	1	1.16	0.17	0.43	1.16	82	43.15	113	96	63	3	0	6	0		
AR	FORT SMITH	91	68	95	65	80	2	0.07	-0.81	0.07	0.60	48	35.73	116	92	40	5	0	1	0		
	LITTLE ROCK	90	69	92	66	80	1	0.15	-0.56	0.12	0.34	33	35.04	108	89	46	4	0	2	0		
AZ	FLAGSTAFF	82	52	89	49	67	7	0.19	-0.42	0.19	0.19	21	11.88	78	80	28	0	0	1	0		
	PHOENIX	105	83	110	74	94	3	0.10	-0.07	0.07	0.10	40	1.97	34	56	19	7	0	2	0		
	PRESCOTT	88	62	93	59	75	5	0.18	-0.19	0.18	0.34	59	8.48	82	73	29	5	0	1	0		
CA	TUCSON	99	76	103	71	87	3	0.00	-0.36	0.00	0.00	0	3.69	42	56	20	7	0	0	0		
	BAKERSFIELD	107	81	115	76	94	15	0.00	-0.01	0.00	0.00	0	1.85	41	43	17	7	0	0	0		
	EUREKA	67	51	71	48	59	1	0.00	-0.11	0.00	0.00	0	14.04	58	96	78	0	0	0	0		
	FRESNO	107	78	114	76	93	14	0.00	-0.02	0.00	0.00	0	1.08	13	54	17	7	0	0	0		
	LOS ANGELES	91	73	101	71	82	12	0.12	0.09	0.08	0.12	500	1.59	17	89	45	4	0	2	0		
CO	REDDING	110	73	115	63	91	15	0.00	-0.13	0.00	0.00	0	4.89	22	38	8	7	0	0	0		
	SACRAMENTO	106	69	114	62	88	15	0.00	-0.06	0.00	0.00	0	2.19	18	61	13	6	0	0	0		
	SAN DIEGO	87	74	91	70	80	9	0.65	0.63	0.63	0.65	900	3.13	43	86	48	1	0	2	1		
	SAN FRANCISCO	87	62	96	58	75	10	0.00	-0.02	0.00	0.00	0	1.81	13	80	36	3	0	0	0		
	STOCKTON	106	72	115	65	89	15	0.00	-0.04	0.00	0.00	0	1.60	17	55	18	6	0	0	0		
	ALAMOSA	85	45	89	42	65	7	0.00	-0.26	0.00	0.00	0	9.24	169	81	16	0	0	0	0		
	CO SPRINGS	84	54	94	47	69	5	0.24	-0.12	0.22	0.39	70	12.06	83	68	28	3	0	2	0		
	DENVER INTL	86	59	99	43	73	6	0.22	-0.03	0.19	0.72	208	8.94	75	62	26	5	0	2	0		
	GRAND JUNCTION	97	62	102	56	79	10	0.00	-0.27	0.00	0.00	0	3.34	52	34	10	6	0	0	0		
	PUEBLO	90	54	101	51	72	4	0.08	-0.15	0.08	0.39	112	8.74	81	74	22	5	0	1	0		
CT	BRIDGEPORT	79	64	84	57	71	2	2.59	1.80	2.53	2.59	228	22.37	74	92	59	0	0	2	1		
	HARTFORD	78	59	86	53	69	1	3.93	3.17	2.36	3.93	362	30.95	99	94	58	0	0	3	2		
DC	WASHINGTON	85	69	91	64	77	3	0.55	-0.23	0.43	0.55	49	30.18	110	90	55	1	0	3	0		
DE	WILMINGTON	82	65	89	58	73	2	1.94	1.07	1.84	1.94	159	29.14	97	94	55	0	0	3	1		
FL	DAYTONA BEACH	91	75	94	72	83	3	0.94	-0.72	0.51	0.99	41	29.83	84	94	58	5	0	3	1		
	JACKSONVILLE	90	73	95	72	81	1	4.04	2.06	1.62	4.43	155	42.52	111	99	59	3	0	5	3		
	KEY WEST	89	77	89	74	83	-1	2.65	1.13	2.17	3.24	149	22.02	85	94	69	0	0	5	1		
	MIAMI	94	79	96	74	86	3	1.15	-1.08	0.59	1.48	46	45.20	103	86	54	7	0	3	2		
	ORLANDO	94	76	98	72	85	3	1.26	-0.19	0.59	2.24	106	34.28	88	93	51	6	0	4	1		
	PENSACOLA	89	75	92	71	82	1	0.99	-0.39	0.70	0.99	49	52.02	111	95	61	3	0	5	1		
	TALLAHASSEE	88	74	94	72	81	1	0.76	-0.43	0.67	0.76	43	48.81	106	97	61	4	0	4	1		
	TAMPA	90	78	94	74	84	1	2.74	1.03	1.64	7.26	293	46.37	128	86	62	4	0	4	2		
	WEST PALM BEACH	93	78	94	75	85	3	0.29	-1.62	0.23	0.45	16	29.63	68	89	53	7	0	3	0		
	ATHENS	83	69	92	67	76	0	1.49	0.69	0.78	2.51	219	32.54	100	98	65	1	0	4	1		
GA	ATLANTA	83	70	87	67	76	0	0.50	-0.53	0.26	0.59	40	37.50	106	93	65	0	0	4	0		
	AUGUSTA	87	70	91	67	78	1	0.76	0.01	0.40	2.15	199	39.07	122	98	59	2	0	4	0		
	COLUMBUS	85	72	90	70	78	-1	1.95	1.20	1.51	1.95	181	35.29	104	97	64	1	0	5	1		
	MACON	86	71	91	69	78	1	1.87	0.98	1.52	2.02	154	37.87	113	97	65	3	0	4	1		
	SAVANNAH	87	72	92	70	79	0	3.20	2.00	1.17	4.04	230	30.41	84	96	63	3	0	3	3		
HI	HILO	85	70	86	66	78	1	1.23	-0.99	0.73	1.69	54	59.56	71	93	62	0	0	5	1		
	HONOLULU	89	76	90	74	82	1	0.13	0.00	0.08	0.19	97	9.28	101	84	50	2	0	3	0		
	KAHULUI	90	75	93	71	83	3	0.31	0.22	0.22	0.41	302	1.23	11	80	46	5	0	4	0		
IA	LIHUE	85	76	86	72	81	1	0.25	-0.16	0.09	0.51	87	19.78	89	85	63	0	0	6	0		
	BURLINGTON	80	60	84	56	70	-1	0.45	-0.43	0.45	1.85	144	18.41	64	98	57	0	0	1	0		
	CEDAR RAPIDS	80	59	87	54	69	3	0.36	-0.44	0.36	0.36	31	16.81	63	96	53	0	0	1	0		
	DES MOINES	80	62	86	56	71	2	0.81	0.04	0.81	0.89	80	22.87	82	93	57	0	0	1	1		
	DUBUQUE	77	58	83	56	68	2	0.34	-0.46	0.34	0.34	29	23.32	85	95	63	0	0	1	0		
ID	SIOUX CITY	82	55	91	46	69	2	0.46	-0.24	0.38	0.46	45	11.58	53	98	47	1	0	2	0		
	WATERLOO	79	59	86	55	69	2	0.68	0.03	0.68	0.95	100	28.01	102	93	58	0	0	1	1		
	BOISE	92	59	104	46	75	7	0.00	-0.11	0.00	0.00	0	5.91	76	42	10	4	0	0	0		
	LEWISTON	87	57	93	51	72	4	0.00	-0.15	0.00	0.03	14	9.67	109	52	17	3	0	0	0		
	POCATELLO	90	49	101	35	70	7	0.00	-0.19	0.00	0.00	0	7.28	86	57	10	4	0	0	0		
IL	CHICAGO/O_HARE	80	64	84	62	72	4	0.00	-0.78	0.00	0.00	0	23.65	90	88	51	0	0	0	0		
	MOLINE	80	59	84	56	70	1	0.10	-0.67	0.10	1.80	160	25.33	89	95	59	0	0	1	0		
	PEORIA	82	62	87	58	72	2	0.00	-0.77	0.00	0.00	0	19.73	76	94	50	0	0	0	0		
	ROCKFORD	80	57	82	55	68	1	0.00	-0.80	0.00	0.00	0	27.80	103	93	56	0	0	0	0		
	SPRINGFIELD	81	61	86	55	71	1	0.67	-0.02	0.67	1.23	126	25.78	97	91	56	0	0	1	1		
IN	EVANSVILLE	83	65	86	59	74	2	0.23	-0.46	0.18	4.71	478	37.15	116	96	57	0	0	2	0		
	F																					

## Weather Data for the Week Ending September 10, 2022

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS			
		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	TEMP. °F		PRECIP.	
																	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
KY	WICHITA	89	62	94	57	76	1	0.08	-0.67	0.08	0.08	7	24.25	96	85	36	5	0	1	0
	LEXINGTON	83	64	89	56	74	2	0.93	0.25	0.89	1.15	120	38.23	117	91	57	0	0	2	1
	LOUISVILLE	84	67	86	63	76	1	0.75	0.07	0.58	1.65	173	33.89	105	93	55	0	0	3	1
	PADUCAH	85	65	88	56	75	2	0.62	-0.19	0.62	0.64	57	33.90	100	96	55	0	0	1	1
LA	BATON ROUGE	86	71	91	68	79	-3	0.56	-1.06	0.32	0.86	37	35.35	80	98	64	2	0	5	0
	LAKE CHARLES	87	70	91	67	78	-3	0.11	-1.26	0.05	1.14	59	25.33	63	98	56	1	0	3	0
	NEW ORLEANS	86	73	90	70	80	-2	0.35	-0.97	0.35	2.43	127	41.33	89	98	62	1	0	1	0
	SHREVEPORT	90	70	92	66	80	1	1.05	0.35	0.70	2.27	232	37.65	107	92	51	4	0	4	1
MA	BOSTON	74	62	83	58	68	0	0.95	0.22	0.48	0.95	92	17.92	60	92	66	0	0	2	0
	WORCESTER	73	59	83	56	66	2	3.62	2.83	2.66	3.62	319	31.13	95	95	63	0	0	2	2
MD	BALTIMORE	83	66	91	60	75	4	1.53	0.69	1.38	1.53	128	32.95	113	90	53	1	0	3	1
ME	CARIBOU	73	47	81	42	60	2	0.02	-0.70	0.02	0.02	1	28.22	110	96	49	0	0	1	0
	PORTLAND	72	55	81	49	64	0	1.36	0.64	0.89	1.36	130	26.07	84	99	53	0	0	2	1
MI	ALPENA	78	48	87	44	63	2	0.00	-0.69	0.00	0.03	3	21.14	107	96	40	0	0	0	0
	GRAND RAPIDS	77	58	83	55	68	1	0.03	-0.95	0.03	0.03	2	26.22	101	94	57	0	0	1	0
	HOUGHTON LAKE	76	48	83	44	62	2	0.11	-0.60	0.11	0.11	10	19.90	102	96	48	0	0	1	0
	LANSING	77	58	86	53	68	2	0.00	-0.78	0.00	0.55	49	27.14	122	94	57	0	0	0	0
MN	MUSKEGON	78	59	83	56	69	3	0.00	-0.87	0.00	0.00	0	22.15	102	87	55	0	0	0	0
	TRAVERSE CITY	81	53	87	44	67	4	0.00	-0.81	0.00	0.00	0	16.40	74	88	40	0	0	0	0
	DULUTH	73	53	82	44	63	4	0.90	-0.09	0.88	0.90	64	23.67	107	95	56	0	0	2	1
	INT_L FALLS	73	46	80	38	60	3	0.06	-0.63	0.04	0.06	5	27.11	151	95	52	0	0	2	0
	MINNEAPOLIS	80	60	87	52	70	4	0.11	-0.64	0.11	0.11	10	18.00	77	86	47	0	0	1	0
	ROCHESTER	75	55	83	50	65	0	0.53	-0.31	0.46	0.80	66	30.84	121	86	57	0	0	2	0
	ST. CLOUD	78	55	87	46	66	4	0.87	-0.02	0.87	0.87	67	21.61	103	97	53	0	0	1	1
	COLUMBIA	84	63	89	60	74	2	0.38	-0.52	0.38	0.62	47	24.93	80	92	48	0	0	1	0
MO	KANSAS CITY	83	61	89	57	72	0	0.59	-0.50	0.59	0.59	38	26.76	92	95	50	0	0	1	1
	SAINT LOUIS	82	67	87	63	74	0	0.97	0.26	0.51	1.19	117	39.86	138	90	57	0	0	3	1
	SPRINGFIELD	83	62	84	57	73	0	0.00	-1.06	0.00	1.00	65	31.54	99	95	46	0	0	0	0
	JACKSON	86	69	90	66	77	-1	0.56	-0.12	0.54	0.57	57	48.17	125	99	61	1	0	3	1
MS	MERIDIAN	87	71	91	68	79	1	0.40	-0.40	0.25	0.40	35	42.20	106	97	60	1	0	3	0
	TUPELO	89	71	93	66	80	3	0.50	-0.22	0.39	0.50	50	36.52	97	88	51	4	0	3	0
	BILLINGS	85	55	102	40	70	6	0.42	0.13	0.37	0.42	107	12.14	115	63	21	3	0	2	0
	BUTTE	80	38	91	29	59	4	0.00	-0.26	0.00	0.00	0	6.75	65	72	15	2	2	0	0
	CUT BANK	78	46	95	33	62	5	0.16	-0.16	0.11	0.16	35	6.67	72	73	23	1	0	2	0
	GLASGOW	88	52	106	38	70	8	0.00	-0.24	0.00	0.00	0	6.16	64	59	17	3	0	0	0
	GREAT FALLS	83	46	100	33	65	5	0.15	-0.21	0.11	0.15	29	8.87	74	64	20	3	0	2	0
	HAVRE	85	49	104	34	67	7	0.00	-0.27	0.00	0.00	0	6.53	71	67	18	3	0	0	0
NC	MISSOULA	86	47	95	39	66	6	0.00	-0.30	0.00	0.00	0	6.36	60	67	15	4	0	0	0
	ASHEVILLE	76	64	81	61	70	1	3.53	2.59	1.88	3.55	263	38.02	115	96	69	0	0	4	3
	CHARLOTTE	84	70	90	66	77	3	1.73	0.97	1.24	1.73	157	28.85	97	93	57	1	0	4	1
	GREENSBORO	80	67	87	64	74	1	2.65	1.57	1.06	2.65	173	33.77	112	96	64	0	0	5	3
ND	HATTERAS	85	73	87	69	79	2	0.30	-1.27	0.25	0.30	13	33.06	83	94	66	0	0	2	0
	RALEIGH	87	68	94	62	78	3	1.03	-0.09	0.48	1.05	65	31.03	99	97	54	2	0	3	0
	WILMINGTON	88	71	94	66	80	3	1.47	-0.43	1.26	1.47	54	31.82	76	96	59	2	0	3	1
	BISMARCK	85	52	97	43	68	6	0.00	-0.41	0.00	0.00	0	22.98	159	80	27	3	0	0	0
	DICKINSON	85	51	97	40	68	7	0.07	-0.28	0.07	0.07	14	13.63	105	78	25	3	0	1	0
	FARGO	79	52	86	43	65	3	0.12	-0.56	0.12	0.12	12	17.37	102	89	42	0	0	1	0
	GRAND FORKS	79	50	85	41	64	4	0.00	-0.53	0.00	0.00	0	19.96	124	88	39	0	0	0	0
	JAMESTOWN	80	50	88	42	65	3	0.00	-0.54	0.00	0.00	0	13.86	92	90	40	0	0	0	0
NE	GRAND ISLAND	85	58	96	47	71	3	0.53	0.00	0.53	0.53	68	10.70	49	88	37	3	0	1	1
	LINCOLN	87	57	95	47	72	2	0.79	0.02	0.79	0.79	70	17.26	76	89	40	3	0	1	1
	NORFOLK	84	57	94	44	71	3	0.48	-0.15	0.38	0.48	52	10.50	49	91	38	3	0	2	0
	NORTH PLATTE	90	51	103	45	70	4	0.12	-0.22	0.11	0.12	25	10.94	65	84	24	5	0	2	0
OH	OMAHA	83	59	90	48	71	2	0.65	-0.03	0.65	0.65	66	18.59	77	94	50	1	0	1	1
	SCOTTSBLUFF	90	54	103	45	72	6	0.01	-0.28	0.01	0.01	3	6.61	51	78	24	5	0	1	0
	VALENTINE	91	53	106	41	72	5	0.00	-0.38	0.00	0.00	0	9.45	56	75	23	5	0	0	0
	CONCORD	76	54	88	50	65	2	1.57	0.85	1.45	1.57	156	25.76	94	100	60	0	0	2	1
NJ	ATLANTIC_CITY	79	62	88	56	71	1	2.96	2.34	2.81	2.96	316	37.00	127	93	62	0	0	2	1
	NEWARK	83	66	93	61	75	3	0.63	-0.17	0.59	0.63	55	23.56	72	90	48	1	0	4	1
NM	ALBUQUERQUE	89	64	94	58	77	4	0.00	-0.26	0.00	0.00	0	6.35	94	49	19	4	0	0	0
NV	ELY	92	49	97	42	71	11	0.00	-0.17	0.00	0.00	0	3.72	52	51	9	5	0	0	0
	LAS VEGAS	103	85	110	76	94	8	0.07	-0.01	0.07	0.07	60	1.20	38	39	19	6	0	1	0
NY	RENO	98	65	104	57	81	13	0.00	-0.07	0.00	0.00	0	2.41	48	44	10	5	0	0	0
	WINNEMUCCA	98	54	106	41	76	12	0.00	-0.09	0.00	0.00	0	2.78	48	40	8	6	0	0	0
	ALBANY	77	58	87	55	68	2	2.11	1.40	1.36										

## Weather Data for the Week Ending September 10, 2022

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION								RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS			
		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	TEMP. °F		PRECIP.		
																	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE	
OK	TOLEDO	81	61	87	55	71	3	0.57	-0.08	0.57	0.57	60	32.83	136	92	53	0	0	1	1	
	YOUNGSTOWN	78	60	84	54	69	4	0.73	-0.14	0.51	0.73	59	32.57	118	97	64	0	0	3	1	
	OKLAHOMA CITY	89	65	91	59	77	-1	0.20	-0.76	0.12	1.58	118	18.33	69	88	36	2	0	2	0	
OR	TULSA	90	65	91	63	78	1	0.00	-0.98	0.00	1.91	137	26.25	91	92	39	3	0	0	0	
	ASTORIA	74	51	85	47	63	3	0.04	-0.37	0.04	0.04	6	41.69	107	92	50	0	0	1	0	
	BURNS	90	44	101	32	67	8	0.00	-0.11	0.00	0.00	0	4.66	63	54	10	4	1	0	0	
	EUGENE	88	51	91	46	69	5	0.00	-0.25	0.00	0.00	0	18.77	71	82	22	3	0	0	0	
	MEDFORD	99	59	107	51	79	10	0.02	-0.09	0.02	0.02	12	7.18	68	65	13	7	0	1	0	
	PENDLETON	86	53	92	47	69	3	0.00	-0.11	0.00	0.00	0	11.03	132	59	16	3	0	0	0	
PA	PORTLAND	86	60	93	56	73	6	0.00	-0.29	0.00	0.00	0	22.87	109	72	26	1	0	0	0	
	SALEM	88	55	92	47	71	6	0.00	-0.24	0.00	0.00	0	24.26	108	76	20	3	0	0	0	
	ALLENTOWN	80	61	89	52	71	4	1.45	0.51	0.97	1.45	110	31.67	102	94	53	0	0	3	1	
	ERIE	75	62	82	57	69	2	0.65	-0.33	0.51	0.65	47	26.88	99	93	68	0	0	3	1	
	MIDDLETOWN	80	66	92	60	73	4	2.71	1.87	1.89	2.71	227	29.71	106	91	59	1	0	3	2	
	PHILADELPHIA	83	68	91	62	75	3	1.35	0.54	1.21	1.35	118	25.80	88	90	51	2	0	2	1	
	PITTSBURGH	77	62	81	56	69	2	2.13	1.37	1.20	2.13	195	28.87	104	96	61	0	0	4	2	
	WILKES-BARRE	78	62	83	56	70	4	4.48	3.59	2.22	4.48	354	30.95	118	94	65	0	0	4	3	
	WILLIAMSPORT	78	64	82	56	71	4	2.70	1.74	1.50	2.70	197	26.02	91	99	63	0	0	4	2	
RI	PROVIDENCE	77	60	85	58	68	1	3.74	2.85	2.25	3.74	303	28.00	88	95	61	0	0	2	2	
SC	CHARLESTON	89	74	95	72	82	3	0.97	-0.64	0.67	1.49	64	36.69	97	93	60	3	0	4	1	
	COLUMBIA	88	72	92	69	80	2	0.92	0.02	0.81	0.92	71	30.92	93	97	56	3	0	4	1	
	FLORENCE	88	71	92	66	79	2	1.87	0.96	0.92	1.87	140	28.70	90	97	56	3	0	4	2	
SD	GREENVILLE	82	68	88	65	75	0	3.20	2.37	1.75	3.30	275	39.00	115	95	62	0	0	4	2	
	ABERDEEN	84	52	92	37	68	5	0.04	-0.49	0.04	0.04	5	16.94	99	93	41	2	0	1	0	
	HURON	86	54	98	41	70	5	0.12	-0.51	0.12	0.13	15	13.93	76	92	32	3	0	1	0	
	RAPID CITY	85	53	98	38	69	4	0.20	-0.10	0.12	0.20	45	14.05	107	80	29	5	0	2	0	
	SIOUX FALLS	83	58	94	46	71	5	0.52	-0.15	0.52	0.52	54	19.37	95	89	44	1	0	1	1	
	TN	81	64	84	57	73	2	0.97	0.26	0.47	0.97	93	32.70	107	95	58	0	0	4	0	
	CHATTANOOGA	83	70	87	68	76	1	1.95	1.05	1.00	2.15	170	41.54	113	92	62	0	0	4	2	
	KNOXVILLE	82	68	87	64	75	1	1.53	0.80	1.08	1.84	181	39.85	115	96	61	0	0	3	1	
	MEMPHIS	88	72	94	68	80	2	0.87	0.20	0.48	2.22	243	39.50	108	88	53	3	0	4	0	
TX	NASHVILLE	85	68	88	63	76	1	0.30	-0.44	0.18	0.95	93	40.95	123	85	50	0	0	2	0	
	ABILENE	94	69	97	65	82	3	0.38	-0.17	0.38	0.99	125	8.58	48	82	30	7	0	1	0	
	AMARILLO	89	60	94	55	75	2	0.00	-0.47	0.00	0.03	4	11.25	70	82	28	6	0	0	0	
	AUSTIN	94	71	96	67	83	0	0.43	-0.37	0.35	0.46	40	13.17	56	94	39	7	0	2	0	
	BEAUMONT	88	71	92	69	80	-2	0.24	-1.23	0.21	0.36	17	30.15	73	99	58	4	0	2	0	
	BROWNSVILLE	91	75	97	73	83	0	0.52	-0.85	0.25	1.07	57	16.91	101	94	58	4	0	4	0	
	CORPUS CHRISTI	91	76	96	75	83	1	0.59	-0.70	0.54	1.38	76	18.87	89	93	58	4	0	3	1	
	DEL RIO	90	72	94	70	81	-2	0.00	-0.56	0.00	0.98	119	5.23	37	94	48	4	0	0	0	
	EL PASO	91	66	95	63	79	1	0.00	-0.39	0.00	0.01	2	5.61	79	57	20	6	0	0	0	
	FORT WORTH	92	71	95	66	82	0	0.00	-0.66	0.00	0.33	34	26.49	105	83	35	6	0	0	0	
	GALVESTON	89	79	92	78	84	0	0.09	0.00	0.09	2.77	0	25.30	0	81	57	3	0	1	0	
	HOUSTON	90	71	94	70	81	-1	0.02	-1.02	0.02	0.59	39	30.33	91	97	52	5	0	1	0	
	LUBBOCK	90	63	93	60	76	2	0.00	-0.62	0.00	0.41	47	10.23	73	80	28	4	0	0	0	
	MIDLAND	90	65	92	62	78	1	0.00	-0.48	0.00	0.07	10	6.34	60	81	27	5	0	0	0	
	SAN ANGELO	94	67	96	63	80	2	0.00	-0.65	0.00	1.77	194	7.47	49	90	29	7	0	0	0	
	SAN ANTONIO	92	74	96	72	83	1	0.08	-0.69	0.08	0.94	86	7.87	35	90	43	6	0	1	0	
	VICTORIA	89	71	94	70	80	-2	0.06	-1.03	0.06	0.57	37	14.92	52	100	60	4	0	1	0	
	WACO	96	69	98	65	83	2	0.00	-0.71	0.00	0.39	39	11.68	50	90	38	7	0	0	0	
	WICHITA FALLS	95	65	98	61	80	1	0.03	-0.67	0.03	0.09	9	11.74	56	89	29	7	0	1	0	
	UT	98	69	107	56	83	13	0.00	-0.24	0.00	0.00	0	6.25	57	38	11	5	0	0	0	
	VA	83	66	88	61	74	4	0.65	-0.27	0.44	0.65	49	33.29	114	93	55	0	0	4	0	
	LYNCHBURG	85	71	90	68	78	3	0.00	-1.17	0.00	0.00	0	24.46	72	90	54	1	0	0	0	
	NORFOLK	87	66	91	61	76	3	0.23	-0.78	0.11	0.23	16	27.81	88	95	48	2	0	4	0	
	RICHMOND	81	68	87	66	74	3	3.05	2.11	1.20	3.05	224	32.85	111	92	60	0	0	4	3	
	ROANOKE	84	65	90	58	74	3	1.91	1.07	1.15	1.91	161	29.04	100	95	55	1	0	4	2	
	WASH/DULLES	76	58	85	57	67	3	0.14	-0.63	0.12	0.14	12	23.72	94	95	59	0	0	2	0	
	VT	79	47	86	42	63	2	0.00	-0.37	0.00	0.00	0	31.83	113	95	32	0	0	0	0	
WA	OLYMPIA	71	50	91	43	60	2	0.57	-0.17	0.57	0.57	55	60.34	104	90	51	1	0	1	1	
	QUILLAYUTE	78	56	91	53	67	4	0.01	-0.29	0.01	0.07	17	24.79	118	77	32	1	0	1	0	
	SEATTLE-TACOMA	82	53	89	46	68	4	0.00	-0.15	0.00	0.01	5	9.42	90	57	17	0	0	0	0	
	SPOKANE	86	49	93	45	68	4	0.00	-0.08	0.00	0.00	0	4.06	80	73	18	2	0	0	0	
	WI	77	55	88	51	66	3	0.83	-0.06	0.59	1.03	82	16.61	70	96	55	0	0	2	1	
	YAKIMA	78	56	86	53	67	4	0.32	-0.36	0.32	1.11	112	23.87	111	89	57	0	0	1	0	
	LA CROSSE	79	60	87	54	69	3	0.13	-0.73	0.13	0.13	10	21.91	86	93	52	0	0	1	0	
	MADISON	78	56	83	53	67	3	0.20	-0.58	0.20	0.47	42	25.96	100	93	59	0	0	1	0	
	MILWAUKEE	78	63	85	62	71	4	0.01	-0.70	0.01	0.01	1	23.13	92	86	56	0	0	1	0	
WV	BECKLEY	73	62	78	60	68	1	1.40	0.72	0.85	1.40										

## August Weather Summary

### Weather

*Weather summary provided by USDA/WAOB*

**Highlights:** Drought-easing August rainfall in the southwestern and south-central U.S. improved topsoil moisture and revived rangeland and pastures. However, much of the rain arrived too late to significantly benefit drought-ravaged summer crops, including cotton and sorghum. By August 28, more than one-third of the nation's cotton (36 percent) and sorghum (44 percent) were rated in very poor to poor condition. On the same date, U.S. rangeland and pastures were rated 46 percent very poor to poor, improved from 52 percent on August 14.

In contrast, drier-than-normal August weather—accompanied by above-normal temperatures—dominated the central Plains and western Corn Belt. Although less than one-fifth of the U.S. corn (19 percent) and soybeans (13 percent) were rated in very poor to poor condition on August 28, values were considerably higher in hotter, drier areas west of the Mississippi River. In Nebraska, for example, 34 percent of the corn and 28 percent of the soybeans were rated very poor to poor in late August.

Drier-than-normal conditions also dominated the Northwest, contributing to dozens of late-summer wildfires but favoring small grain maturation and harvesting. By early September, more than five dozen Northwestern wildfires were in various stages of containment, with some of the larger fires resulting in smoky conditions and air-quality degradation. North of Salmon, ID, the Moose Fire—burning since July 17—had charred more than 107,000 acres of vegetation by early September.

Farther south, another month of widespread, monsoon-related showers led to drought relief, most notably in the Four Corners States. However, locally heavy showers also led to flash flooding, especially in recently burn-scarred areas. Las Vegas, NM, near the site of the fully extinguished, 341,735-acre Calf Canyon/Hermits Peak Fire—the largest in modern state history—has had its primary water source threatened by toxic, ash- and debris-laden runoff into the Gallinas River. Even with Southwestern summer rainfall, chronic, underlying drought has resulted in continuing low levels in major reservoirs, including those in the Colorado River Basin. Near Las Vegas, NV, the surface elevation of Lake Mead rose slightly during August, but remained more than 170 feet below where the lake level stood as recently as early 2000, when the Southwestern mega-drought began.

Meanwhile, abundant August rainfall across the Deep South contributed to fieldwork delays and concerns about the quality of unharvested summer crops. Some of the heaviest rain fell across southern Texas, where a disturbance moved

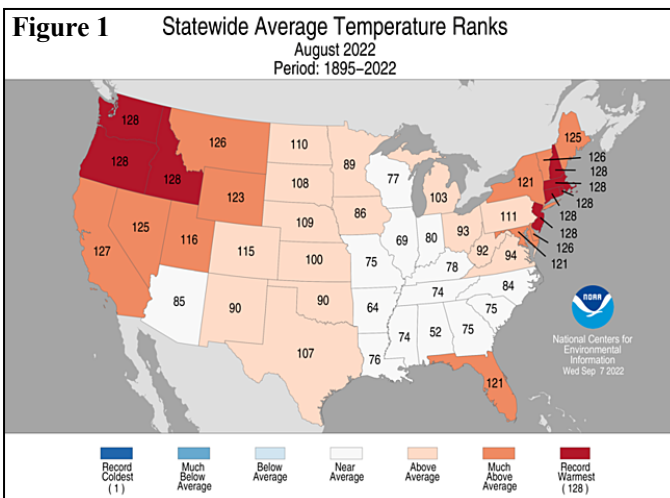
inland in mid-August, and late in the month from northeastern Texas to the central Gulf Coast States. Flash flooding struck the Dallas-Fort Worth metropolitan area on August 21-22, followed a few days later by a week-long loss of potable water in Jackson, MS, when floodwaters from the Pearl River overwhelmed an already compromised water-treatment facility.

Monthly temperatures did not stray far from normal in the Deep South and from the Mississippi Valley eastward, except in Florida and the Northeast. Conversely, August readings averaged as much as 5°F above normal in southern New England and environs, accompanied by significant, short-term drought. Elsewhere, August temperatures broadly averaged at least 5°F above normal from the Pacific Northwest to the northern High Plains, as well as parts of California.

During the 4-week period ending August 30, drought coverage in the Lower 48 States decreased nearly 6 percentage points, from 51.4 to 45.5 percent, according to the *U.S. Drought Monitor*. August rain across the previously drought-stricken southern Plains helped to reduce national coverage of extreme to exceptional drought (D3 to D4) from 19.0 to 13.1 percent. However, those significant August improvements were partially offset by worsening drought across the northern and central Plains, western Corn Belt, and parts of the Northeast.

Finally, the tropical Atlantic Basin was extremely quiet in August, with no named cyclones. It was the first time since 1997—and before that, 1961—without a named Atlantic Basin storm during August. However, the tropics came to life soon after August ended, with Danielle becoming the Atlantic Basin's first hurricane of the season on September 2.

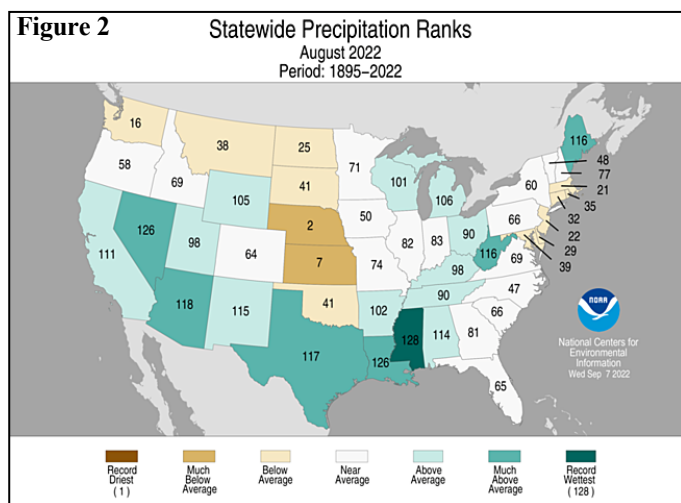
**Historical Perspective:** According to preliminary data provided by the National Centers for Environmental Information



the contiguous U.S. experienced its eighth-hottest, 19th-wettest August during the 128-year period of record. The nation's August average temperature of 74.55°F was 2.45°F above the 20th century mean, while precipitation averaged 3.04 inches—116 percent of normal.

Hotter U.S. weather occurred during August only three times in the 20th century—in 1936, 1937, and 1983—but has been more recently observed in 2003, 2007, 2011, and 2020. Meanwhile, a record was broken with an August average minimum temperature of 62.26°F (previously, 62.13°F in 1983), an impressive 3.20°F above the 1901-2000 mean.

State temperature rankings (figure 1) ranged from the 52nd-coolest August in Alabama to the hottest August on record in three Northwestern States (ID, OR, and WA) and five Northeastern States (CT, MA, NH, NJ, and RI). Top-ten rankings for August warmth extended to five additional Atlantic Coast States (DE, FL, MD, ME, and NY), along with Vermont, as well as California, Montana, Nevada, and Wyoming. Meanwhile, state precipitation rankings (figure 2) ranged from the second-driest August in Nebraska to the wettest on record in Mississippi. August dryness extended to Kansas (seventh-driest August), while top-ten wetness affected Louisiana and Nevada.



**Summary:** Northwestern heat temporarily eased early in the month. Still, three consecutive daily-record highs were set from July 30 – August 1 in Montana locations such as Missoula (102, 104, and 103°F) and Helena (101, 101, and 102°F). Meanwhile in Texas, San Angelo's streak of triple-digit high temperatures lasted 37 days, from July 4 – August 9. Previously, San Angelo's longest stretch with high temperatures of 100°F or greater lasted 28 days, from July 2-29, 2011. In early August, extreme heat returned across the northern and central Plains. In Nebraska, Scottsbluff posted a daily-record high of 103°F on August 1. The following day, Valentine, NE, registered 109°F, a record for August 2, while record-setting high temperatures in South Dakota soared to 106°F in Mobridge and 105°F in Sioux Falls. Parts of Florida also remained hot, with Tampa and Fort Myers collecting daily-record highs of 96°F on the 2nd. By August 3, another day of heat in the south-central U.S. led to daily-record highs in Roswell, NM (106°F), and McAllen, TX (105°F). Elsewhere in the nation's mid-section, record highs for August 4 surged to 105°F in Miles City, MT; 102°F in Dickinson, ND; and 101°F in Sheridan, WY. The Plains' heat peaked on August 5 with daily-record highs in Pierre, SD (109°F); Chadron, NE (109°F); and Denver, CO (101°F). Cheyenne, WY, tied a monthly record with a high of 98°F on the 5th.

In early August, monsoon-related shower activity expanded in the West. In California, Mount Shasta City noted consecutive daily-record rainfall totals (0.72 and 0.43 inch, respectively) on August 2 and 3. Reno, NV, received 1.22 inches on August 3—a record for the date. Farther east, localized downpours developed in the Midwest. Saint Louis, MO, received 4.32 inches of rain on August 3, just 8 days after experiencing its wettest day on record (8.64 inches on July 26). Saint Louis had not received more than 4 inches of rain on an August day since 1946, when 4.31 inches fell on the 15th. Over the next few days, showers remained active in several regions, including the central Appalachians and parts of the Midwest. On August 5, for example, daily-record amounts included 2.60 inches in Bluefield, WV, and 1.64 inches in Watertown, SD. Record-setting totals for August 6 reached 1.97 inches in Mason City, IA, and 1.54 inches in Chattanooga, TN. In California, record-shattering totals for August 5 were 1.46 inches in Death Valley and 0.71 inch in Bishop. The only wetter day in Death Valley's history was 1.47 inches on April 15, 1988. Previously, the wettest August day in Death Valley had occurred in 1936, when 1.10 inches fell on the 5th. Meanwhile in Nevada, August 5-6 featured consecutive daily-record rainfall totals in Eureka (0.63 and 0.47 inch) and Tonopah (0.67 and 0.18 inch).

Early-month heat was impressive in the Northeast, where record-setting highs for August 4 rose to 99°F in Albany, NY, and 98°F in Boston, MA, and Concord, NH. Additionally, Boston tallied a trio of daily-record highs (97, 98, and 98°F) from August 6-8. Portland, ME (96 and 95°F), and Providence, RI (95°F both days), posted consecutive daily-record highs on August 7-8. Meanwhile, record-setting high temperatures also dotted the western and central U.S. In Kansas, for example, Russell collected consecutive daily-record highs (108 and 107°F, respectively) on August 6 and 7. In the Pacific Coast States, daily-record highs included 98°F (on August 7) in Anaheim, CA, and 102°F (on August 8) in Omak, WA. Anaheim tallied another record-setting high (99°F) on August 11. As the middle of the month approached, heat returned across the northern High Plains and the Northwest. In Wyoming, triple-digit, daily-record highs for August 10 included 101°F in Casper and 103°F in Greybull and Worland. Except for a single day last year (101°F on June 15, 2021), Casper had not been above the 100-degree mark since July 30, 2006. Hot weather also prevailed in the southern Atlantic States, where daily-record highs soared to 98°F (on August 10) in Wilmington, NC, and 95°F (on August 13) in Vero Beach, FL. In contrast, cool, rainy weather in the Great Lakes region held August 13 maximum temperatures below the 65-degree mark for the first time on record in locations such as Ashland, WI (high of 63°F), and Grand Rapids, MI (62°F, along with a daily-record rainfall total of 1.85 inches). Elsewhere, Laredo, TX, noted a high of 97°F on August 12—the first maximum temperature below the 100-degree mark in that location since June 29.

Another streak in Laredo, days without measurable rain, ended at 77 days (May 26 – August 10). Laredo received rainfall totaling 0.61 inch on August 11-12, followed by a 7.37-inch deluge on August 14-15. For Laredo, the 6.82-inch total on the 15th represented the wettest August day on record in that location (previously, 6.29 inches on August 7, 1974) and the wettest calendar day at any time of year since May 13, 1928, when 7.20 inches fell. The heavy rain in southern Texas, which began on August 13, was attributable to a disturbance that did not have time to become a full-fledged tropical cyclone before making landfall. Still, some areas in coastal Texas received more than an inch of rain on the 13th, with August 13-15 totals

climbing to 6.20 inches in Corpus Christi and 3.70 inches in Bayview. As the low-pressure system drifted generally westward before being absorbed by the Southwestern monsoon circulation, August 14-15 rainfall topped the 4-inch mark in locations such as Cotulla (4.45 inches) and Alice (4.01 inches). In western Texas, Terrell County Airport—near Dryden—received 6.27 inches on August 15-16. Unrelated to the disturbance but elsewhere in Texas, Dallas-Fort Worth received its first measurable rain (0.41 inch on August 10) since June 3. Farther north, upper Midwestern downpours were observed in several areas. With a 5.44-inch total, August 7 was the wettest calendar day on record in Sioux Falls, SD, surpassing 4.59 inches on August 1, 1975. Sioux Falls also observed a 24-hour rainfall record, with 5.67 inches falling during the 24-hour period ending at 9 am CDT on August 7 (previously, 5.07 inches on September 19-20, 2018). Midwestern daily-record totals for August 7 included 3.40 inches in Appleton, WI, and 2.08 inches in Mason City, IA. Rockford, IL, received 6.15 inches on August 7-8, aided by a daily-record sum of 3.23 inches on the 8th. Later, the focus for heavy rain briefly shifted across the mid-South, where record-setting amounts for August 9 totaled 3.94 inches in Texarkana, AR, and 3.53 inches in Monroe, LA. Across the interior Southeast and central Appalachians, daily-record totals for August 10 included 2.63 inches in Clarksburg, WV; 2.46 inches in Chattanooga, TN; and 1.81 inches in Louisville, KY. Pensacola, FL, netted 4.59 inches on August 11, a record for the date.

In mid-August, monsoon-related showers spread northward from the Southwest. By August 11, daily-record totals were noted as far north as Casper, WY (0.68 inch), and Stanley, ID (0.58 inch). Las Vegas, NV, also received 0.58 on August 11, with higher totals in nearby areas contributing to extensive flash flooding in the city. Later in Arizona, record-setting rainfall totals for August 13 reached 1.56 inches in Nogales and 0.39 inch in Yuma. For Yuma, it was the wettest day in well over a year, since 1.12 inches fell on January 20, 2021. In Utah, 24-hour rainfall totals included 1.20 inches (on August 13-14) in Kanab and 0.84 inch (on August 14-15) at Bryce Canyon Airport. Later, primarily on August 20, severe flash flooding struck Moab, UT, where rainfall totals of an inch or more were common. In other areas, spotty showers resulted in a few daily-record rainfall totals exceeding 2 inches; examples included: 3.54 inches (on August 15) in Charleston, WV; 2.86 inches (on August 19) in North Myrtle Beach, SC; 2.26 inches (on August 19) in Sisseton, SD; 2.19 inches (on August 20) in Tuscaloosa, AL; and 2.17 inches (on August 16) in Vichy-Rolla, MO. In Maine, daily-record totals for August 17 reached 1.97 inches in Bangor and 1.29 inches in Houlton. In western Texas, ongoing showers led to daily-record amounts of 2.00 inches (on August 20) in Midland and 1.41 inches (on August 18) in Lubbock.

In mid-August, heat lingered across the southern Plains and the mid-South. With a daily-record high of 104°F on August 15, Little Rock, AR, experienced its hottest day since July 22, 2016. Hot weather also continued in Florida, where daily-record highs soared to 98°F in Fort Myers (on August 20) and Vero Beach (on August 17). Vero Beach's reading tied a monthly record most recently attained on August 2, 1999. Miami, FL, posted consecutive daily-record highs of 96°F on August 17 and 18. In contrast, cool, damp weather settled across the mid-Atlantic and Ohio Valley. Temperatures failed to top the 70-degree mark in locations such as Columbus, OH (high of 70°F on August 14), and Roanoke, VA (69°F on August 15). Another batch of cool air held the August 16 maximum temperature in Hastings, NE, to 65°F—the lowest August high in that location since August 11, 1997. Farther west, however, persistently hot weather

settled across much of California, the Great Basin, and the Northwest. In western Montana, Missoula tallied a trio of triple-digit, daily-record highs (100, 100, and 101°F) from August 17-19. August 17 featured daily-record highs of 103°F in Boise, ID; Burns, OR; and Winnemucca, NV. Redding, CA, collected daily-record highs of 110°F on August 16, 17, and 20. In Washington, record-setting highs for August 18 included 108°F in Ephrata and 104°F in Omak. Salt Lake City, UT, reached or exceeded the 100-degree mark each day from August 16-18, including a daily-record high of 101°F on the 18th. Warmth also returned across the Northeast, where Portland, ME, tallied a daily-record high (90°F) for August 19.

Dramatically heavy rain fell on August 21-22 in northeastern Texas before shifting to the central Gulf Coast States. Rainfall totals of 4 to 10 inches were common, with 10- to 15-inch amounts observed in the hardest-hit areas. In Texas, flash flooding engulfed Dallas-Fort Worth (DFW), followed by extensive lowland flooding in the lower Mississippi Valley and environs. DFW received 3.53 and 5.66 inches, respectively, on August 21 and 22. The 2-day total, 9.19 inches, fell in slightly under 24 hours. The only wetter 24-hour period in DFW's history occurred on September 4-5, 1932, when 9.57 inches fell. Ironically, DFW had recently experienced 67 days, from June 4 to August 9, without measurable rain—the second-longest such streak on record in that location, behind only 85 days from July 1 – September 23, 2000. Meanwhile, daily-record totals for August 21 included 1.87 inches in Greenwood, MS; 1.71 inches in Blacksburg, VA; and 1.57 inches in Lawton, OK. Rainfall edged southward the following day, when record-setting rainfall totals for August 22 reached 4.41 inches in Shreveport, LA, and 3.74 inches in Longview, TX. Generally beneficial showers swept across the Northeast on August 22; daily-record amounts topped the 2-inch mark in Allentown, PA (2.56 inches), and Portland, ME (2.19 inches). Heavy rain lingered for several days in the central Gulf Coast States, extending into southern Arkansas. On August 23, daily-record amounts exceeded 3 inches in Monroe, LA (3.79 inches); Jackson, MS (3.53 inches); and El Dorado, AR (3.20 inches). Daily-record totals surpassed the 5-inch mark in Lafayette, LA (5.49 inches on August 25) and Jackson, MS (5.05 inches on August 24). On August 23-24, consecutive daily-record totals were established in Mississippi locations such as Jackson (3.53 and 5.05 inches) and Vicksburg (3.04 and 2.90 inches). Jackson received 10.43 inches of rain from August 22-25. Subsequently, the Pearl River in Jackson crested 7.37 feet above flood stage on August 29—the second-highest level in the last 35 years, behind only 8.67 feet on February 17, 2020. The rain-swollen Pearl River contributed to a loss of potable water in Jackson, Mississippi's most populous city. Eventually, showers became more numerous across the North, where daily-record totals included 0.83 inch (on August 24) at Lake Yellowstone, WY; 1.47 inches (on August 25) in Rapid City, SD; 1.99 inches (on August 27) in Eau Claire, WI; and 2.83 inches (on August 26) in Pierre, SD. On August 26, Portland, ME, received 1.52 inches—its second daily-record sum in 5 days. Elsewhere, spotty Southwestern showers lingered into late August. In Utah, Kodachrome Basin State Park received rainfall totaling 0.56 inch in a 24-hour period on August 20-21. Later, Death Valley, CA, netted a daily-record sum (0.17 inch) for August 25.

Late in the month, extreme heat was focused across Florida's peninsula, California, and the Northwest. In Florida, Fort Myers reached or exceeded the 95-degree mark each day from August 20-25, including a trio of daily-record highs (98, 97, and 97°F) during the first half of the 6-day hot spell. Meanwhile in Montague, CA, where no measurable fell during the month, a

daily-record high of 102°F occurred on August 21. Other triple-digit, daily-record highs included 101°F (on August 21) in Winnemucca, NV; 100°F (on August 22) in Santa Rosa, CA; 100°F (on August 23) in Salt Lake City, UT; and 102°F (on August 25) in Dallesport, WA. Record-setting heat extended to southern California, where Lancaster logged consecutive daily-record highs (106 and 109°F, respectively) on August 22-23. Similarly, Bishop, CA, tallied a pair of daily-record highs (105 and 102°F, respectively) on August 23-24. Less than a week later, a new trickle of daily-record highs began across the Northwest. By August 30, Portland, OR, attained 100°F, its fifth triple-digit reading of the year. The only other times Portland recorded five 100-degree days in a year were 1941, 1977, and 2021. Meanwhile in Washington, Seattle (90°F on August 30) noted its 12th day this year with a high of 90°F or greater, tying an annual record set in 2015. Record-setting heat expanded to the remainder of the West on the last day of August, with southern California locations such as Burbank (112°F) and Anaheim (106°F) setting monthly record highs. Burbank's record had been on the books since August 26, 1944, when the high reached 111°F. Partly on the strength of the late-month heat wave, several Northwestern towns—including Dallesport, WA, and Redmond, OR—completed their hottest August, breaking records that had been set in 1967. Scottsbluff, NE, also experienced its hottest August, edging a 1983 standard. Near the Atlantic Seaboard, it was also the hottest August on record in locations such as Newark, NJ, and West Palm Beach, FL.

As the month ended, locally heavy showers and thunderstorms dotted several areas, including the South, East, and lower Midwest. Daily-record rainfall totals ranged from 2 to 4 inches in locations such as Atlantic City, NJ (3.52 inches on August 28); Del Rio, TX (3.19 inches on August 30); Saint Simons Island, GA (2.46 inches on August 29); and Lubbock, TX (2.25 inches on August 31). In the Midwest, daily-record amounts reached 1.99 inches (on August 29) in Indianapolis, IN, and 1.90 inches (on August 28) in Joplin, MO. The wettest August on record came to an end in Jackson, MS (12.75 inches; previously, 11.51 inches in 2008) and Dallas-Fort Worth, TX (10.68 inches; previously, 10.33 inches in 1915). In addition, Charleston, WV, completed its wettest summer on record, with 24.43 inches, surpassing its June-August 1958 record of 23.13 inches. Conversely, Kearney, NE, received monthly rainfall totaling just 0.13 inch, edging its August 1900 record of 0.19 inch.

In Alaska, another month of widespread precipitation and moderate temperatures erased much of the remaining dry signal from earlier in the year and further tamped down the wildfire threat. Fairbanks, one of the few remaining dry spots, received August rainfall totaling 1.39 inches (66 percent of normal). Another dry location, Delta Junction, netted 0.92 inch (46 percent of normal) during August. Farther south, however, Anchorage marked its wettest August day in one-quarter century (since August 21, 1997). The August 8 total of 1.48 inches was also the wettest day in Anchorage September 29, 2015, when 1.56 inches fell. The monthly total of 6.80 inches (232 percent of normal) in Anchorage represented the third-wettest August on record in that location, behind 9.77 and 8.37 inches, respectively, in 1989 and 1997. In the Aleutians on the 9th, a 1.75-inch sum in Cold Bay represented the wettest August day in that location since August 13, 1985, when 1.97 inches fell. A week later, on August 16, Alaskan daily-record rainfall totaled 1.90 inches in Kodiak and 1.01 inches in Bethel. In addition, near- or below-normal temperatures covered much of the state in mid-August, except for patchy warmth in eastern and southeastern Alaska. In the Aleutians, Cold Bay reported a monthly record-tying low (32°F on August 18) and its earliest

first freeze on record. The only other time Cold Bay dipped to 32°F before the start of meteorological autumn was August 28, 1999. In contrast, Fairbanks reported an above-normal daily average temperature each day from August 12 through the end of the month, a span of 20 days. Late-month precipitation was particularly heavy in southeastern Alaska, where Juneau netted a daily-record rainfall of 2.28 inches on August 29. Juneau's August rainfall reached 9.05 inches (141 percent of normal). Yakutat's August rainfall climbed to 15.94 inches (115 percent of normal), followed by 8.43 inches from September 1-3. Parts of interior Alaska received heavy rain late in the month, with a daily record being set on August 31 in McGrath (0.84 inch). In western Alaska, Nome reported consecutive daily-record totals (1.33 and 0.57 inch, respectively) on August 30-31.

August was another generally quiet month across Hawaii, with a significant increase in drought coverage. In fact, according to the U.S. Drought Monitor, Hawaiian drought coverage increased from 39.7 to 94.0 percent during the 4-week period ending August 30. During August, less than one-tenth of an inch of rain fell in Kahului, Maui (0.06 inch, or 11 percent of normal), and Honolulu, Oahu (0.07 inch, or 8 percent). Kahului also experienced unusually hot weather, with 4 days of 95-degree heat during the month. As a result, Kahului eclipsed its August 2019 record of 3 days with highs of 95°F or greater, although the record for any month (5 days in September 2019) still stands. In contrast, several daily-record lows were set or tied in Lihue, Kauai, including a pair of 66°F readings on August 16-17. Lihue also netted a daily-record rainfall of 0.80 inch on August 26, helping to boost its monthly total to 2.19 inches (94 percent of normal).

## Fieldwork

*Fieldwork summary provided by USDA/NASS*

August was warmer than average for much of the nation. Large areas of California, the Northeast, Pacific Northwest, northern Plains, and northern Rockies recorded temperatures 4°F or more above normal. In contrast, much of the Mississippi Valley, Southeast, and Southwest were cooler than normal. Meanwhile, much of the Pacific Coast, Pacific Northwest, and central and northern Plains were drier than normal, but at least twice the average amount of rain fell in much of the Great Basin and parts of California, as well as the lower Mississippi Valley, Rockies, Southwest, and Texas.

By August 7, ninety percent of the corn had reached the silking stage, 4 percentage points behind last year and 3 points behind the 5-year average. On that date, 45 percent of the corn was at or beyond the dough stage, 8 percentage points behind last year and 4 points behind average. Six percent of the corn acreage was denting, 1 percentage point behind last year and 3 points behind average. By August 21, ninety-seven percent of the corn had reached the silking stage, 3 percentage points behind last year and 2 points behind the 5-year average. On that date, 75 percent of the corn was at or beyond the dough stage, 8 percentage points behind last year and 4 points behind average. Thirty-one percent of the corn was denting, 7 percentage points behind last year and 4 points behind average. Four percent of the corn acre was mature by August 21, equal to both last year and the average. By September 4, ninety-two percent of the corn was at or beyond the dough stage, 2 percentage points behind last year and 1 point behind average. By September 4, sixty-three percent of the corn was denting, 9 percentage points behind last year and 4 points behind average. Fifteen percent of the corn was mature by September 4, four

percentage points behind last year and 3 points behind average. On September 4, fifty-four percent of the corn acreage was rated in good to excellent condition, 5 percentage points below the same time last year.

By August 7, eighty-nine percent of the soybean acreage had reached the blooming stage, 1 percentage point behind last year but 1 point ahead of the 5-year average. Nationally, 61 percent of the soybeans had begun setting pods, 9 percentage points behind last year and 5 points behind average. By August 21, ninety-seven percent of the soybeans had reached the blooming stage, equal to both last year and the average. Eighty-four percent of the soybeans had begun setting pods, 3 percentage points behind last year and 2 points behind average. By September 4, ninety-four percent of the soybeans had begun setting pods, 2 percentage points behind both last year and the average. Nationally, leaf drop was 10 percent complete by September 4, seven percentage points behind last year and 4 points behind average. On September 4, fifty-seven percent of the soybeans were rated in good to excellent condition, unchanged from the same time last year.

Eighty-six percent of the 2022 winter wheat acreage had been harvested by August 7, eight percentage points behind last year and 5 points behind the 5-year average. Ninety-five percent of the winter wheat had been harvested by August 21, four percentage points behind last year and 2 points behind average. Nationwide, producers had sown 3 percent of the intended 2023 winter wheat acreage by September 4, two percentage points behind last year but equal to the average. Progress was most advanced in Colorado at 13 percent planted, 8 percentage points behind last year but 4 points ahead of average.

Ninety-five percent of the nation's cotton had reached the squaring stage by August 7, eight percentage points ahead of last year and 2 points ahead of the 5-year average. By August 7, sixty-nine percent of the cotton had begun setting bolls, 8 percentage points ahead of last year and 5 points ahead of average. By August 21, ninety-eight percent of the cotton had begun setting bolls, 10 percentage points ahead of last year and 3 points ahead of average. By August 21, nineteen percent of the cotton had open bolls, 6 percentage points ahead of last year and 1 point ahead of average. By September 4, ninety-seven percent of the cotton had begun setting bolls, 4 percentage points ahead of last year and 1 point ahead of average. By September 4, thirty-nine percent of the cotton had open bolls, 11 percentage points ahead of last year and 7 points ahead of average. On September 4, thirty-five percent of the 2022 cotton was rated in good to excellent condition, 26 percentage points below the same time last year.

By August 7, fifty-five percent of the sorghum had reached the headed stage, 12 percentage points behind last year and 9 points behind the 5-year average. Twenty-five percent of the sorghum was at or beyond the coloring stage by August 7, equal to last year but 2 percentage points behind average. By August 21, seventy-nine percent of the sorghum had reached the headed stage, 10 percentage points behind last year and 7 points behind the 5-year average. Thirty-seven percent of the sorghum was at or beyond the coloring stage by August 21, five percentage points behind both last year and the average. By August 21, twenty percent of the sorghum was mature, equal to last year but 2 percentage points behind average. By September 4, ninety-two percent of the sorghum had reached the headed stage, 6 percentage points behind last year and 5

points behind average. Sixty-two percent of the sorghum was at or beyond the coloring stage by September 4, nine percentage points behind last year and 5 points behind average. By September 4, twenty-eight percent of the sorghum was mature, 3 percentage points behind last year and 1 point behind average. Twenty percent of the 2022 sorghum had been harvested by September 4, one percentage point ahead of last year but 1 point behind average. Twenty-one percent of the sorghum was rated in good to excellent condition on September 4, thirty-six percentage points below the same time last year.

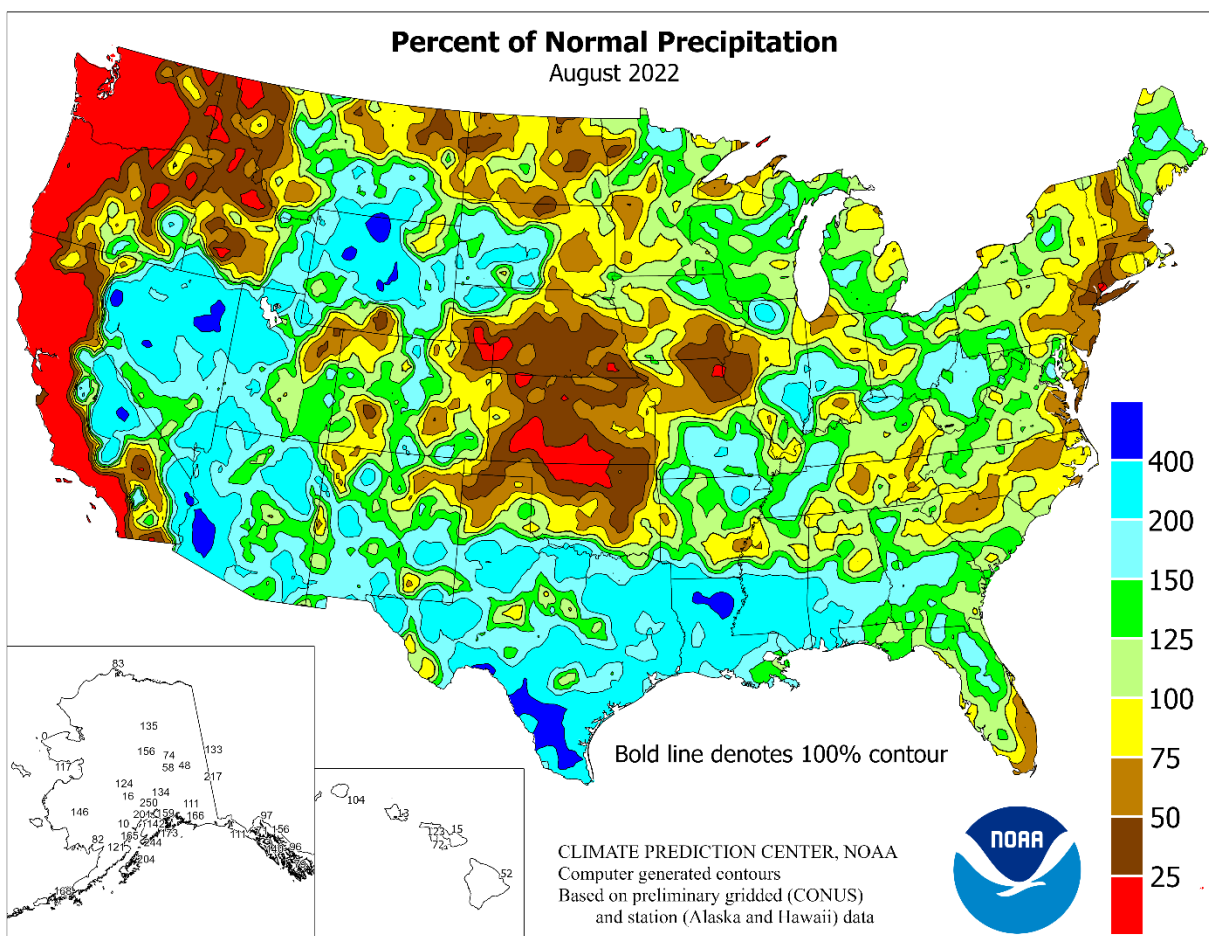
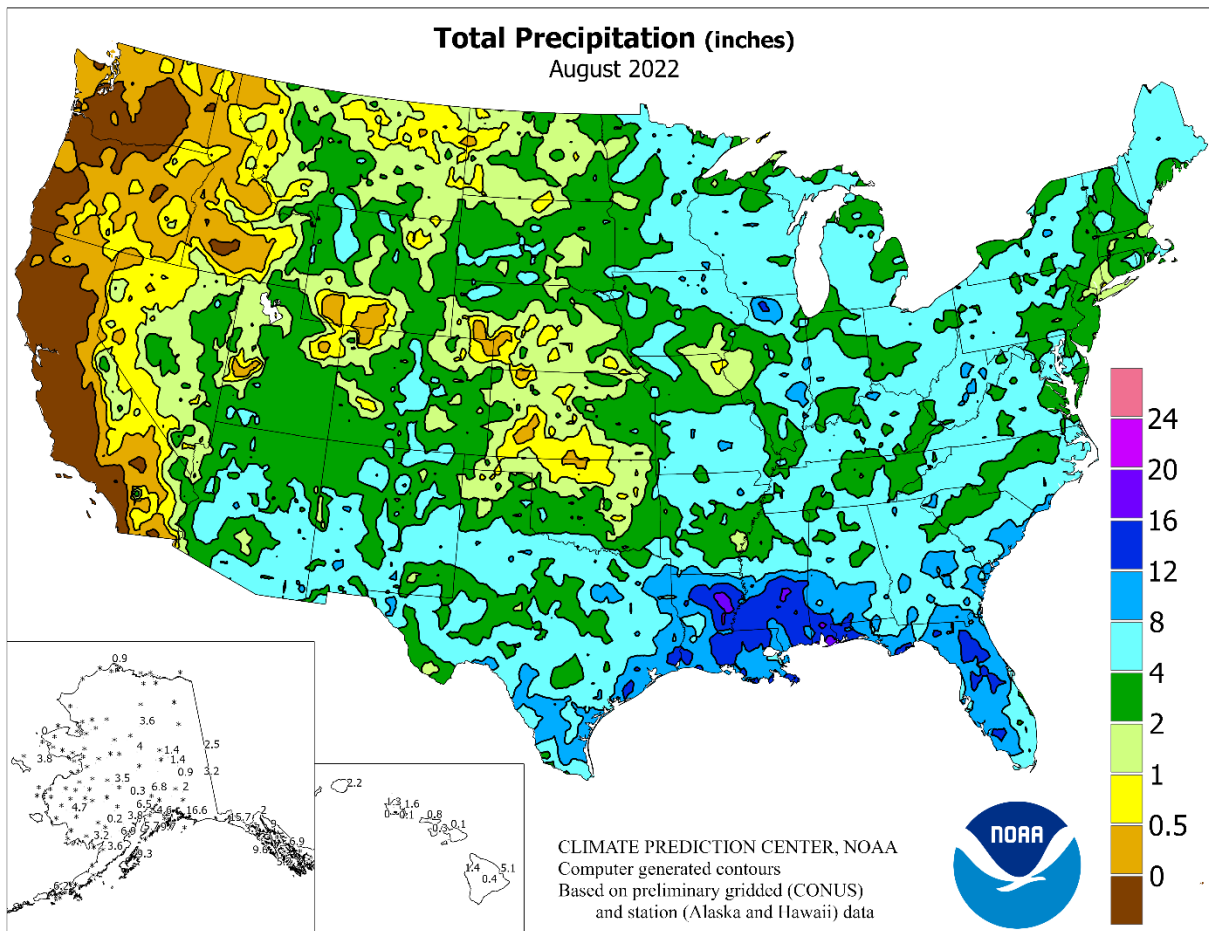
By August 7, sixty-nine percent of the nation's rice had reached the headed stage, 3 percentage points behind the previous year and 7 points behind the 5-year average. Nationally, 5 percent of the rice was harvested by August 7, one percentage point behind last year and 2 points behind average. By August 21, ninety-three percent of the rice had reached the headed stage, 1 percentage point above the previous year but equal to the average. Nationally, 15 percent of the rice was harvested by August 21, one percentage point above the previous year but equal to the average. Twenty-four percent of the rice was harvested by September 4, three percentage points behind the previous year and 4 points behind average. On September 4, seventy-two percent of the rice was rated in good to excellent condition, 3 percentage points below the same time last year.

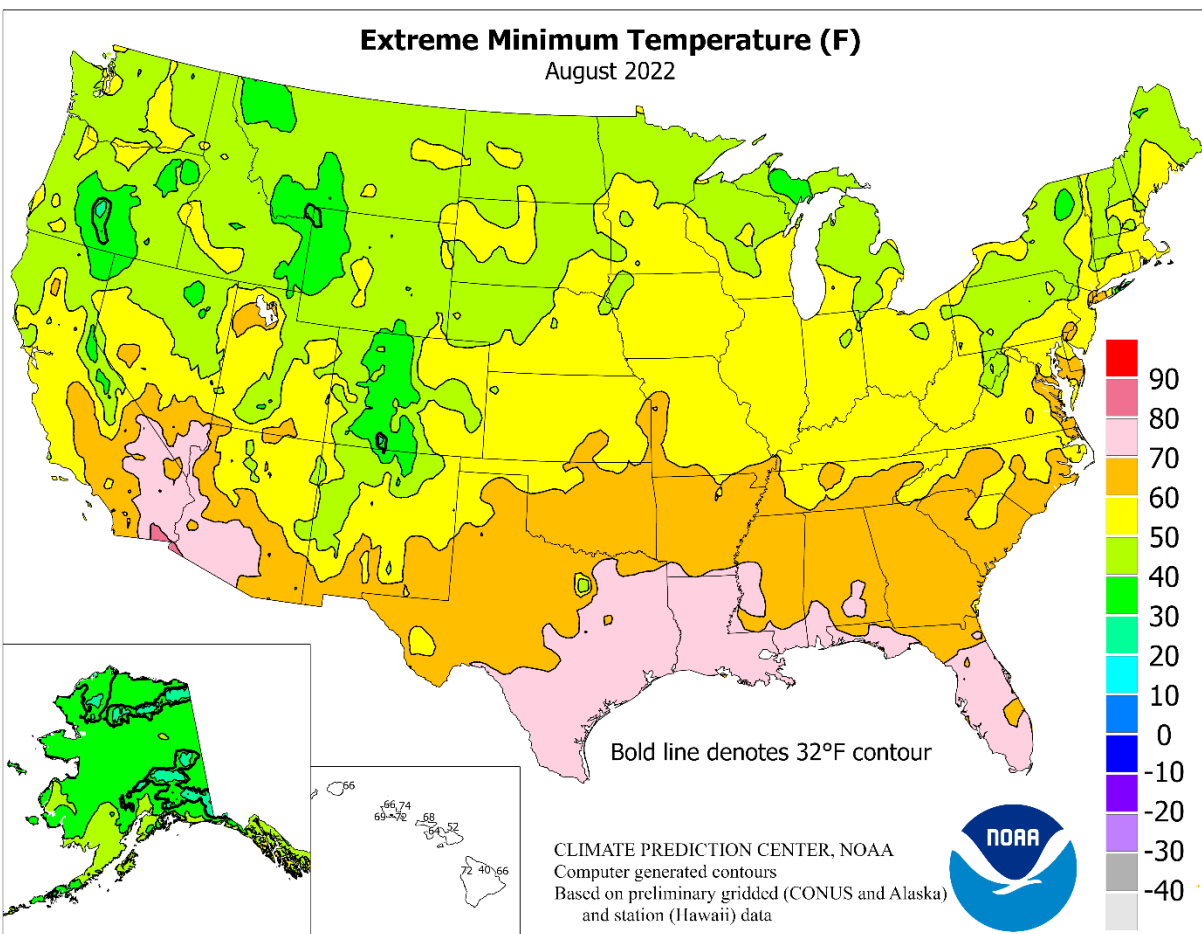
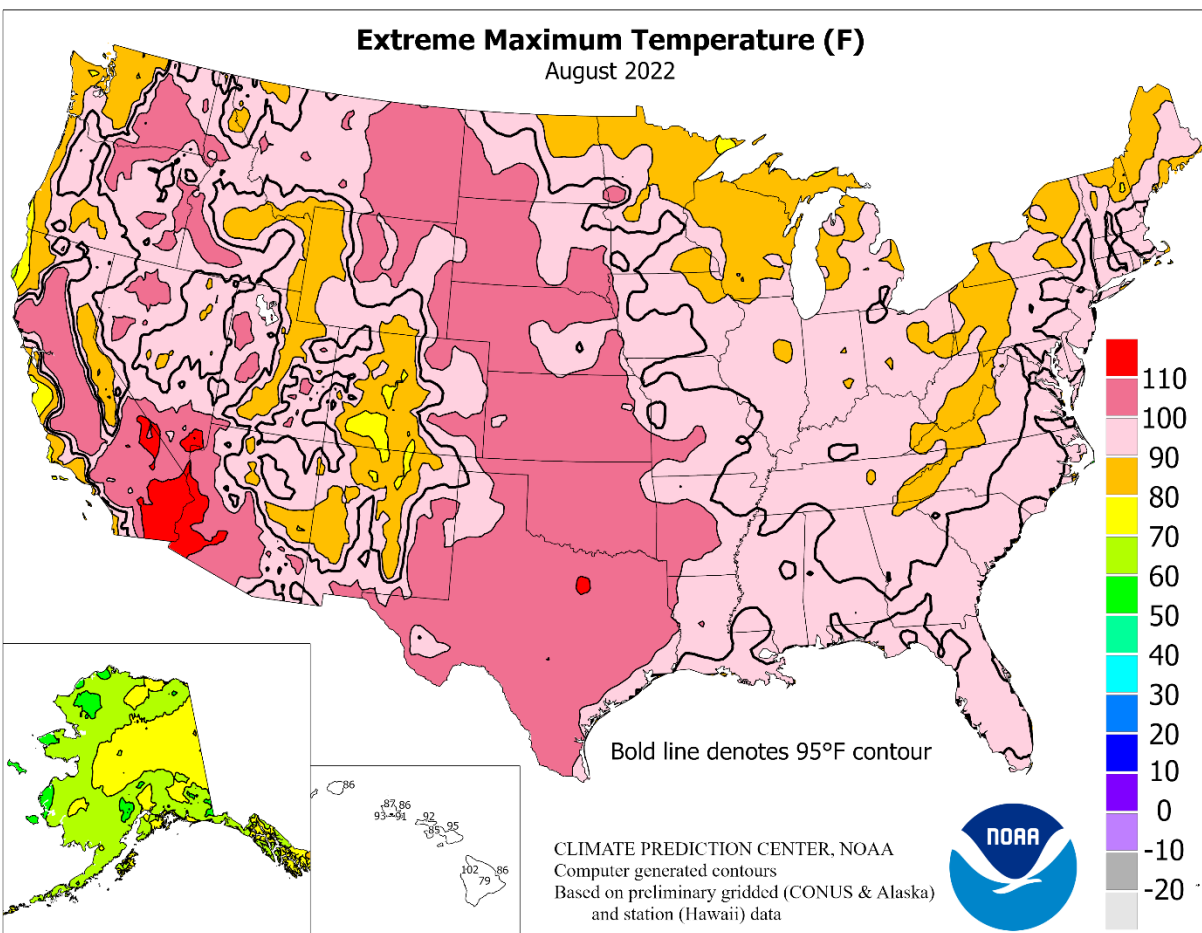
Forty-six percent of the nation's oats had been harvested by August 7, sixteen percentage points behind last year and 8 points behind the 5-year average. On August 7, fifty-three percent of the oats were rated in good to excellent condition, 17 percentage points above the same time last year. Seventy percent of the oats had been harvested by August 21, fifteen percentage points behind last year and 9 points behind average. Ninety percent of the oats had been harvested by September 4, six percentage points behind last year and 3 points behind average.

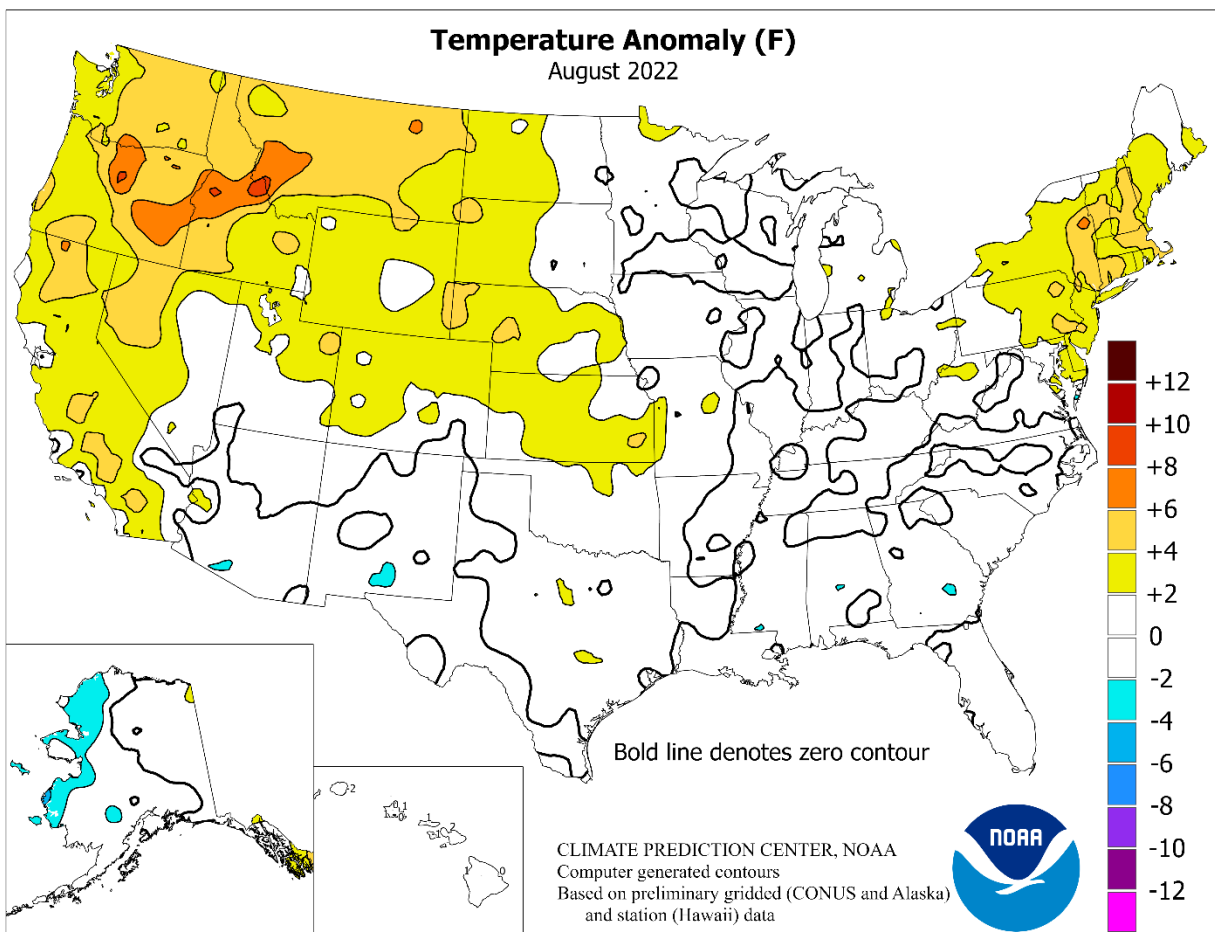
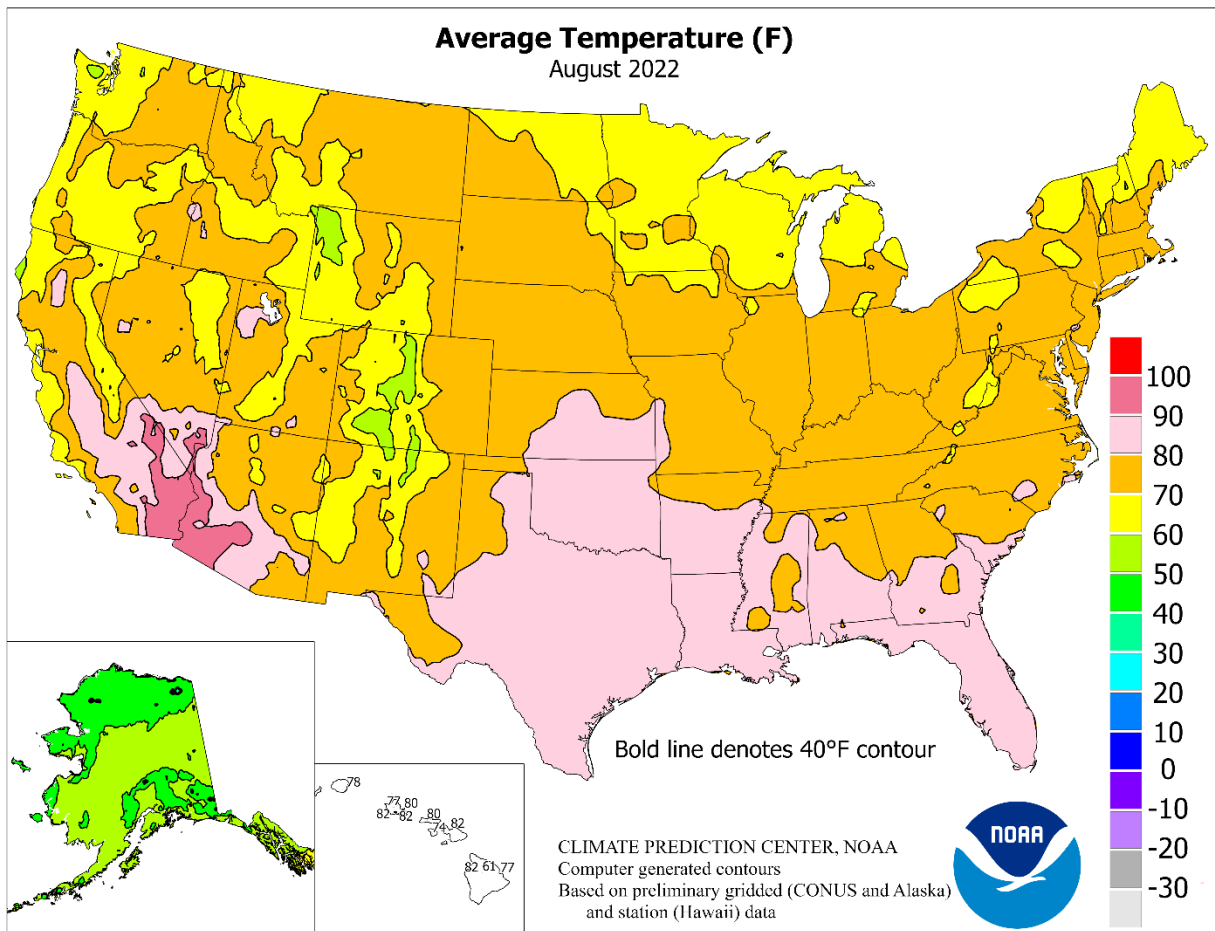
By August 7, producers had harvested 13 percent of the nation's barley, 19 percentage points behind last year and 8 points behind the 5-year average. By August 21, producers had harvested 44 percent of the barley, 25 percentage points behind last year and 16 points behind average. On August 28, fifty-six percent of the barley was rated in good to excellent condition, 33 percentage points above the same time last year. By September 4, producers had harvested 77 percent of the barley, 14 percentage points behind last year and 9 points behind average. Harvest progress was behind the 5-year average in all five estimating states.

By August 7, nine percent of the nation's spring wheat had been harvested, 26 percentage points behind the previous year and 10 points behind the 5-year average. By August 21, thirty-three percent of the spring wheat had been harvested, 41 percentage points behind the previous year and 21 points behind average. On August 28, sixty-eight percent of the spring wheat was rated in good to excellent condition, 57 percentage points above the same time last year. By September 4, seventy-one percent of the spring wheat had been harvested, 23 percentage points behind the previous year and 12 points behind average.

By August 14, ninety-six percent of the nation's peanuts had reached the pegging stage, 1 percentage point ahead of both the previous year and the 5-year average. On September 4, seventy percent of the peanuts were rated in good to excellent condition, 4 percentage points below the same time last year.







## National Weather Data for Selected Cities

August 2022

Data Provided by Climate Prediction Center

STATES AND STATIONS		TEMP, °F		PRECIP.		STATES AND STATIONS		TEMP, °F		PRECIP.		STATES AND STATIONS		TEMP, °F		PRECIP.	
		AVERAGE	DEPARTURE	TOTAL	DEPARTURE			AVERAGE	DEPARTURE	TOTAL	DEPARTURE			AVERAGE	DEPARTURE	TOTAL	DEPARTURE
AK	ANCHORAGE	56	0	6.53	3.30												
	BARROW	40	1	0.87	-0.20	KY	WICHITA	83	3	1.04	-2.65		TOLEDO	75	3	4.10	0.98
	FAIRBANKS	59	3	1.39	-0.48		LEXINGTON	76	1	4.24	1.00		YOUNGSTOWN	71	2	1.81	-1.41
	JUNEAU	58	2	8.95	3.22		LOUISVILLE	79	1	4.57	1.26	OK	OKLAHOMA CITY	83	0	2.03	-1.22
	KODIAK	58	2	9.29	4.71		PADUCAH	78	1	0.39	-2.36		TULSA	84	2	0.77	-2.12
	NOME	50	0	3.76	0.56	LA	BATON ROUGE	82	0	10.30	2.80	OR	ASTORIA	64	3	0.26	-0.92
AL	BIRMINGHAM	80	-1	3.03	-0.89		LAKE CHARLES	82	-1	7.07	2.20		BURNS	73	8	0.19	-0.22
	HUNTSVILLE	80	0	2.77	-0.81		NEW ORLEANS	83	-1	7.31	1.33		EUGENE	72	5	0.06	-0.58
	MOBILE	82	0	8.42	1.46		SHREVEPORT	85	2	9.87	7.17		MEDFORD	79	6	0.00	-0.44
	MONTGOMERY	82	0	9.60	5.66	MA	BOSTON	77	5	1.44	-1.87		PENDELTON	79	7	0.04	-0.38
AR	FORT SMITH	84	2	1.56	-1.02		WORCESTER	74	5	2.51	-1.19		PORTLAND	75	6	0.00	-0.69
	LITTLE ROCK	82	0	1.40	-1.18	MD	BALTIMORE	79	4	3.71	0.45		SALEM	73	5	0.15	-0.33
AZ	FLAGSTAFF	66	2	5.47	2.37	ME	CARIBOU	66	2	3.70	-0.04	PA	ALLENTOWN	76	4	2.81	-0.85
	PHOENIX	93	0	0.80	-0.22		PORTLAND	72	4	5.63	2.53		ERIE	72	2	3.45	-0.01
	PRESOTT	73	0	4.75	2.14	MI	ALPENA	68	2	2.84	-0.37		MIDDLETOWN	79	5	1.14	-2.03
	TUCSON	86	0	1.73	-0.85		GRAND RAPIDS	71	0	4.96	1.40		PHILADELPHIA	81	5	2.64	-0.83
CA	BAKERSFIELD	88	5	0.00	-0.05		HOUGHTON LAKE	66	1	3.65	0.28		PITTSBURGH	72	0	3.10	-0.36
	EUREKA	59	0	0.00	-0.35		LANSING	72	2	5.96	2.75		WILKES-BARRE	75	5	3.42	0.03
	FRESNO	87	5	0.04	0.03		MUSKEGON	72	2	3.70	0.33		WILLIAMSPORT	75	4	2.61	-1.22
	LOS ANGELES	72	2	0.00	-0.06		TRAVERSE CITY	70	2	3.65	0.27	RI	PROVIDENCE	77	4	1.69	-1.88
	REDDING	86	6	0.00	-0.21	MN	DULUTH	65	1	3.17	-0.50	SC	CHARLESTON	81	0	9.38	2.23
	SACRAMENTO	78	4	0.00	-0.06		INT'L FALLS	66	2	3.20	0.40		COLUMBIA	80	-1	4.45	-0.81
	SAN DIEGO	74	3	0.00	-0.02		MINNEAPOLIS	72	1	4.24	-0.07		FLORENCE	80	0	3.80	-1.44
	SAN FRANCISCO	67	2	0.01	-0.04		ROCHESTER	68	0	6.46	1.92		GREENVILLE	78	-1	3.72	-0.77
	STOCKTON	80	4	0.00	-0.01		ST. CLOUD	69	1	4.50	0.72	SD	ABERDEEN	71	2	1.57	-0.83
CO	ALAMOS	64	2	3.80	2.54	MO	COLUMBIA	79	3	2.67	-1.72		HURON	73	1	0.87	-1.55
	CO SPRINGS	72	3	1.81	-1.51		KANSAS CITY	79	2	2.06	-1.80		RAPID CITY	74	3	2.72	1.16
	DENVER INTL	76	4	1.39	-0.30		SAINT LOUIS	80	1	5.77	2.80		SIOUX FALLS	73	3	6.89	3.86
	GRAND JUNCTION	79	3	0.42	-0.57		SPRINGFIELD	79	1	4.30	0.77	TN	BRISTOL	76	2	2.55	-0.89
	PUEBLO	77	4	0.63	-1.68	MS	JACKSON	81	-1	12.62	8.37		CHATTANOOGA	80	0	5.44	1.98
CT	BRIDGEPORT	77	4	0.82	-3.15		MERIDIAN	81	0	11.39	7.40		KNOXVILLE	78	0	2.61	-0.64
	HARTFORD	77	5	4.31	0.39		TUPELO	82	2	5.85	2.43		MEMPHIS	83	1	5.89	3.02
DC	WASHINGTON	80	2	1.70	-1.23	MT	BILLINGS	76	4	0.47	-0.30		NASHVILLE	80	1	3.99	0.85
DE	WILMINGTON	79	4	2.13	-1.09		BUTTE	66	5	1.09	-0.28	TX	ABILENE	86	3	3.00	0.43
FL	DAYTONA BEACH	83	2	8.50	2.11		CUT BANK	69	5	0.36	-0.82		AMARILLO	78	1	1.51	-1.39
	JACKSONVILLE	81	0	8.33	1.53		GLASGOW	77	7	0.24	-1.00		AUSTIN	88	2	2.00	-0.33
	KEY WEST	85	0	2.24	-3.15		GREAT FALLS	72	6	0.41	-1.17		BEAUMONT	83	0	6.68	1.29
	MIAMI	86	1	4.90	-4.00		HAYRE	74	6	0.34	-0.78		BROWNSVILLE	87	2	2.81	0.38
	ORLANDO	85	2	7.81	0.69		MISSOULA	74	6	0.10	-1.09		CORPUS CHRISTI	86	1	10.56	7.65
	PENSACOLA	83	1	11.32	4.56	NC	ASHEVILLE	73	0	4.80	0.36		DEL RIO	87	1	1.32	-0.69
	TALLAHASSEE	82	0	5.83	-1.53		CHARLOTTE	78	1	2.59	-1.64		EL PASO	82	1	2.83	0.82
	TAMPA	86	2	6.45	-1.34		GREENSBORO	77	0	3.54	-0.33		FORT WORTH	87	1	10.64	8.73
	WEST PALM BEACH	86	3	3.06	-4.91		HATTERAS	79	1	2.73	-4.20		GALVESTON	87	2	7.15	0.00
GA	ATHENS	79	-1	3.17	-0.33		RALEIGH	80	1	0.91	-3.35		HOUSTON	85	0	8.53	4.78
	ATLANTA	79	0	6.18	2.30	ND	WILMINGTON	81	1	6.45	-0.95		LUBBOCK	81	2	5.67	3.77
	AUGUSTA	80	-1	5.62	1.30		BISMARCK	73	4	1.20	-1.08		MIDLAND	82	1	4.06	2.22
	COLUMBUS	81	-1	5.13	1.38		DICKINSON	72	4	1.99	0.42		SAN ANGELO	85	3	2.41	0.16
	MACON	81	0	6.33	2.22		FARGO	68	-1	2.41	-0.15		SAN ANTONIO	87	1	2.05	-0.05
	SAVANNAH	81	0	7.54	0.99		GRAND FORKS	69	2	1.42	-1.44		VICTORIA	85	1	3.69	0.85
HI	HILLO	77	0	5.09	-4.75		JAMESTOWN	70	1	1.12	-0.97		WACO	87	2	2.52	0.48
	HONOLULU	82	0	0.07	-0.50	NE	GRAND ISLAND	76	2	0.46	-2.66		WICHITA FALLS	86	2	1.83	-0.66
	KAHULUI	82	2	0.07	-0.44		LINCOLN	78	2	0.56	-2.91	UT	SALT LAKE CITY	82	5	1.12	0.42
	LIHUE	78	-2	2.20	0.08		NORFOLK	76	3	0.93	-2.30	VA	LYNCHBURG	77	3	2.31	-0.93
IA	BURLINGTON	74	-1	1.03	-3.26		NORTH PLATTE	77	5	0.95	-1.33		NORFOLK	79	2	0.72	-4.81
	CEDAR RAPIDS	70	-1	2.48	-2.04		OMAHA	77	2	2.64	-1.16		RICHMOND	78	1	4.03	-0.65
	DES MOINES	76	2	4.06	-0.08		SCOTTSBLUFF	77	5	0.04	-1.26		ROANOKE	76	1	4.30	0.78
	DUBUQUE	71	1	5.38	0.96	NH	VALENTINE	75	3	1.77	-0.41		WASH/DULLES	77	2	2.30	-1.20
	SIOUX CITY	74	2	2.78	-0.43		CONCORD	73	5	3.53	0.37	VT	BURLINGTON	73	4	3.38	-0.54
	WATERLOO	73	2	5.41	1.12	NJ	ATLANTIC CITY	78	3	4.46	0.34	WA	OLYMPIA	68	4	0.05	-0.91
ID	BOISE	82	7	0.09	-0.19		NEWARK	80	5	1.90	-1.78		QUILLAYUTE	63	4	0.48	-2.00
	LEWISTON	80	6	0.17	-0.54	NM	ALBUQUERQUE	77	1	2.48	0.90		SEATTLE-TACOMA	70	4	0.05	-0.85
	POCATELLO	73	4	0.77	0.16	NV	ELY	69	2	2.01	1.07		SPOKANE	76	7	0.00	-0.59
IL	CHICAGO/O'HARE	74	2	1.49	-3.42		LAS VEGAS	91	0	0.61	0.23		YAKIMA	76	7	0.00	-0.31
	MOLINE	73	0	4.17	-0.38		RENO	79	6	1.70	1.43	WI	EAU CLAIRE	70	0	5.38	0.91
	PEORIA	75	2	3.19	-0.02		WINNEMUCCA	76	6	0.42	0.21		GREEN BAY	70	3	4.36	1.02
	ROCKFORD	72	0	8.85	4.25	NY	BINGHAMTON	75	5	3.84	0.40		LA CROSSE	73	1	2.77	-1.54
	SPRINGFIELD	75	0	5.40	2.19		BUFFALO	71	3	3.20	-0.24		MADISON	70	1	5.73	1.45
IN	EVANSVILLE	77	1	2.43	-0.53		ROCHESTER	72	3	3.37	-0.07	WV	MILWAUKEE	73	2	2.98	-0.99
	FORT WAYNE	71	0	3.19	-0.42		SYRACUSE	74	4	4.46	0.92		BECKLEY	71	1	5.15	1.68
	INDIANAPOLIS	75	1	4.44	1.34	OH	AKRON-CANTON	74	3	1.62	-1.92		CHARLESTON	75	0	9.13	5.41
	SOUTH BEND	73	2	2.01	-1.72		CINCINNATI	75	0	7.86	4.47		ELKINS	71	2	8.06	4.24
KS	CONCORDIA	80	3	0.70	-2.42		CLEVELAND	73	1	5.60	2.11	WY	HUNTINGTON	75	0	3.63	-0.08
	DODGE CITY	81	3	0.33	-2.40		COLUMBUS	74	0	3.21	-0.09		CASPER	71	2	1.94	1.07
	GOODLAND	76	3	0.57	-2.12		DAYTON	75	2	1.37	-1.61		CHEYENNE	72	4	0.65	-1.30
	TOPEKA	79	2	3.39	-0.87		MANSFIELD	71	1	3.75	-0.65		LANDER	72	2	0.54	-0.09
													SHERIDAN	74	5	0.54	-0.19

## National Agricultural Summary

September 5 – 11, 2022

*Weekly National Agricultural Summary provided by USDA/NASS*

### HIGHLIGHTS

**Much of the western half of the nation remained drier than normal, while parts of California, the Great Basin, mid-Atlantic, Northeast, Rockies, and Southeast recorded at least twice the normal amount of weekly precipitation. Some areas along Florida's Gulf Coast and parts of the western Carolinas recorded 5 inches of rain or more during the week. Meanwhile, most of the U.S. recorded**

**above-normal weekly temperatures. Much of California and parts of Nevada and Utah noted temperatures 12°F or more above normal. In contrast, parts of the Mississippi Valley, northern Atlantic Coast, southern Plains, Southeast, and Southwest recorded below-normal weekly temperatures, which averaged 3°F or more below normal in parts of Texas.**

**Corn:** By September 11, ninety-five percent of the corn acreage was at or beyond the dough stage, equal to last year but 1 percentage point behind the 5-year average. By September 11, seventy-seven percent of this year's corn was denting, 8 percentage points behind last year and 2 points behind average. Twenty-five percent of the nation's corn was mature by September 11, ten percentage points behind last year and 5 points behind average. Five percent of the 2022 corn acreage was harvested by week's end, 2 percentage points ahead of last year and 1 point ahead of the average pace. Harvest was underway in eight of the 18 estimating states. On September 11, fifty-three percent of the nation's corn acreage was rated in good to excellent condition, 1 percentage point below the previous week and 5 points below the same time last year. In Iowa, 63 percent of the corn crop was rated in good to excellent condition.

**Soybean:** Nationally, 97 percent of the nation's soybean acreage had begun setting pods, 1 percentage point ahead of last year but 1 point behind the 5-year average. Nationally, leaf drop was 22 percent complete by September 11, thirteen percentage points behind last year and 6 points behind average. On September 11, fifty-six percent of the nation's soybean acreage was rated in good to excellent condition, 1 percentage point below both the previous week and the previous year.

**Winter Wheat:** Nationwide, producers had sown 10 percent of the intended 2023 winter wheat acreage by September 11, one percentage point behind last year but 3 points ahead of the 5-year average. Planting progress was most advanced in Washington at 26 percent planted, 25 percentage points behind last year and 8 points behind average.

**Cotton:** By September 11, forty-nine percent of the nation's cotton had open bolls, 14 percentage points ahead of last year and 8 points ahead of the 5-year average. By September 11, eight percent of the cotton acreage was harvested, 4 percentage points ahead of last year but equal to the average. On September 11, thirty-three percent of the 2022 cotton acreage was rated in good to excellent condition, 2 percentage points below the previous week and 31 points below the same time last year.

**Sorghum:** By September 11, ninety-six percent of the nation's sorghum acreage had reached the headed stage, 3 percentage points behind both last year and the 5-year average.

Seventy-four percent of the sorghum was at or beyond the coloring stage by September 11, eight percentage points behind last year and 4 points behind average. By September 11, thirty-six percent of the sorghum was mature, 2 percentage points behind last year but 1 point ahead of average. Eighty-eight percent of Texas' sorghum acreage was mature by September 11, eight percentage points ahead of last year and 9 points ahead of average. Twenty-three percent of the 2022 sorghum acreage had been harvested by September 11, two percentage points ahead of last year but equal to the average. Twenty percent of the nation's sorghum was rated in good to excellent condition on September 11, one percentage point below the previous week and 37 points below the same time last year.

**Rice:** Nationally, 34 percent of the rice acreage was harvested by September 11, four percentage points behind the previous year and 5 points behind the 5-year average. On September 11, seventy-two percent of the rice acreage was rated in good to excellent condition, unchanged from the previous week but 2 percentage points below the same time last year.

**Small Grains:** Ninety-five percent of the nation's oat acreage had been harvested by September 11, two percentage points behind last year but equal to the 5-year average. Harvesting of oats was complete or nearing completion in all nine estimating states.

By September 11, producers had harvested 91 percent of the nation's barley crop, 5 percentage points behind last year and 1 point behind the 5-year average. Harvest progress advanced 11 percentage points or more during the week in all five estimating states.

By September 11, eighty-five percent of the nation's spring wheat had been harvested, 10 percentage points behind the previous year and 4 points behind the 5-year average. Harvest progress advanced 12 percentage points during the week or more in five of the six estimating states.

**Other Crops:** Two percent of the nation's peanut acreage was harvested as of September 11, equal to last year but 1 percentage point behind the 5-year average. On September 11, sixty-eight percent of the peanut acreage was rated in good to excellent condition, 2 percentage points below the previous week and 9 points below the same time last year.

**Crop Progress and Condition****Week Ending September 11, 2022**

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

Corn Percent Dough				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	95	75	85	94
IL	96	88	90	97
IN	99	94	97	96
IA	98	96	98	97
KS	97	92	95	97
KY	91	88	95	95
MI	96	92	97	88
MN	100	92	97	98
MO	96	96	96	99
NE	99	95	96	99
NC	100	98	100	100
ND	97	88	92	95
OH	98	92	96	93
PA	83	75	85	86
SD	100	92	96	97
TN	100	100	100	100
TX	100	98	100	99
WI	94	86	92	89
18 Sts	95	92	95	96
These 18 States planted 92% of last year's corn acreage.				

Corn Percent Dented				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	72	40	46	67
IL	92	64	70	84
IN	86	55	73	76
IA	86	71	84	81
KS	87	74	83	87
KY	81	75	81	88
MI	69	51	69	62
MN	84	47	73	77
MO	93	87	92	91
NE	88	74	86	86
NC	98	92	95	97
ND	75	45	60	63
OH	82	48	64	67
PA	50	40	58	62
SD	83	55	78	72
TN	94	87	94	95
TX	92	88	94	93
WI	80	44	63	63
18 Sts	85	63	77	79
These 18 States planted 92% of last year's corn acreage.				

Corn Percent Mature				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	18	1	1	13
IL	48	11	16	36
IN	31	9	15	29
IA	29	10	23	26
KS	42	38	50	44
KY	58	40	53	66
MI	21	8	13	12
MN	32	1	8	20
MO	47	31	44	44
NE	33	19	36	27
NC	91	78	86	90
ND	21	1	12	15
OH	25	5	16	18
PA	3	2	4	16
SD	31	11	18	23
TN	57	42	58	68
TX	74	75	81	71
WI	14	1	10	13
18 Sts	35	15	25	30
These 18 States planted 92% of last year's corn acreage.				

Corn Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	1	NA	0	0
IL	1	0	1	2
IN	2	NA	0	2
IA	0	NA	0	0
KS	10	16	21	9
KY	14	7	12	19
MI	0	NA	0	0
MN	3	NA	0	1
MO	6	1	5	9
NE	1	NA	1	2
NC	47	32	46	52
ND	0	NA	0	0
OH	0	NA	0	0
PA	0	NA	0	1
SD	1	NA	0	0
TN	14	9	14	21
TX	62	59	64	61
WI	0	NA	0	0
18 Sts	3	NA	5	4
These 18 States harvested 93% of last year's corn acreage.				

Corn Condition by Percent					
	VP	P	F	G	EX
CO	10	19	40	28	3
IL	4	5	19	48	24
IN	4	9	33	46	8
IA	2	7	28	50	13
KS	27	27	24	20	2
KY	10	17	35	32	6
MI	2	5	32	51	10
MN	3	6	29	48	14
MO	8	16	26	44	6
NE	18	16	24	31	11
NC	21	23	24	27	5
ND	2	6	34	50	8
OH	4	9	25	54	8
PA	6	13	26	40	15
SD	12	15	30	37	6
TN	16	24	32	26	2
TX	29	23	31	14	3
WI	1	4	17	55	23
18 Sts	9	11	27	41	12
Prev Wk	8	11	27	43	11
Prev Yr	5	10	27	44	14

Rice Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AR	31	11	24	33
CA	7	0	5	4
LA	88	75	83	88
MS	45	23	44	45
MO	15	0	2	11
TX	88	81	86	90
6 Sts	38	24	34	39
These 6 States harvested 100% of last year's rice acreage.				

Rice Condition by Percent					
	VP	P	F	G	EX
AR	2	5	21	55	17
CA	0	0	30	55	15
LA	0	3	10	80	7
MS	0	3	37	52	8
MO	3	5	34	47	11
TX	0	1	48	29	22
6 Sts	1	3	24	58	14
Prev Wk	1	3	24	56	16
Prev Yr	1	3	22	59	15

## Crop Progress and Condition

### Week Ending September 11, 2022

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

Soybeans Percent Setting Pods				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AR	100	98	100	100
IL	96	89	91	97
IN	100	95	99	97
IA	100	97	99	99
KS	91	85	91	94
KY	91	89	93	92
LA	100	100	100	100
MI	100	100	100	97
MN	100	98	99	100
MS	99	98	99	99
MO	93	84	91	93
NE	100	100	100	99
NC	96	96	98	95
ND	100	98	100	99
OH	95	94	98	97
SD	100	97	100	98
TN	99	95	98	98
WI	100	95	97	97
18 Sts	96	94	97	98
These 18 States planted 96% of last year's soybean acreage.				

Soybeans Percent Dropping Leaves				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AR	33	19	29	34
IL	30	4	15	20
IN	36	10	21	30
IA	27	2	9	20
KS	19	14	27	20
KY	25	10	16	21
LA	58	68	74	70
MI	47	20	38	27
MN	46	0	6	27
MS	51	35	51	52
MO	9	3	10	8
NE	43	25	43	37
NC	21	17	32	20
ND	64	18	37	51
OH	27	5	14	23
SD	55	12	30	39
TN	25	15	30	26
WI	20	0	3	14
18 Sts	35	10	22	28
These 18 States planted 96% of last year's soybean acreage.				

Soybean Condition by Percent					
	VP	P	F	G	EX
AR	3	9	26	49	13
IL	5	5	23	48	19
IN	4	8	32	48	8
IA	2	7	28	51	12
KS	23	26	26	23	2
KY	3	11	36	42	8
LA	19	25	27	29	0
MI	1	4	30	51	14
MN	2	5	28	52	13
MS	3	13	36	42	6
MO	4	12	35	41	8
NE	13	17	27	34	9
NC	2	6	29	55	8
ND	2	6	37	49	6
OH	4	9	26	51	10
SD	6	15	29	44	6
TN	4	12	30	43	11
WI	1	4	18	53	24
18 Sts	5	10	29	45	11
Prev Wk	5	9	29	47	10
Prev Yr	4	10	29	45	12

Cotton Percent Bolls Opening				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AL	26	34	45	46
AZ	92	70	72	86
AR	45	41	57	66
CA	47	10	32	21
GA	42	38	48	50
KS	36	28	37	25
LA	69	77	83	79
MS	58	44	61	56
MO	27	17	35	41
NC	35	32	48	41
OK	22	18	28	33
SC	33	33	40	38
TN	10	26	30	35
TX	32	41	50	35
VA	31	43	60	37
15 Sts	35	39	49	41
These 15 States planted 99% of last year's cotton acreage.				

Cotton Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AL	0	NA	0	0
AZ	7	0	0	7
AR	0	NA	0	0
CA	0	NA	0	0
GA	0	NA	0	0
KS	0	NA	0	0
LA	1	NA	2	4
MS	1	0	0	1
MO	0	NA	0	0
NC	0	NA	0	0
OK	0	NA	0	0
SC	0	NA	1	0
TN	0	0	0	0
TX	9	11	17	14
VA	1	NA	0	0
15 Sts	4	NA	8	8
These 15 States harvested 99% of last year's cotton acreage.				

Cotton Condition by Percent					
	VP	P	F	G	EX
AL	0	3	19	72	6
AZ	0	0	10	49	41
AR	5	10	18	41	26
CA	0	0	5	95	0
GA	1	7	30	53	9
KS	4	28	46	22	0
LA	4	18	44	34	0
MS	1	10	33	51	5
MO	9	9	30	52	0
NC	1	6	24	64	5
OK	40	16	32	12	0
SC	0	6	29	47	18
TN	7	17	26	43	7
TX	21	32	32	14	1
VA	1	5	12	74	8
15 Sts	15	22	30	29	4
Prev Wk	15	16	34	30	5
Prev Yr	1	5	30	50	14

**Crop Progress and Condition****Week Ending September 11, 2022**

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

Sorghum Percent Headed				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	98	99	100	97
KS	99	86	92	98
NE	100	95	100	100
OK	96	91	95	97
SD	100	99	100	99
TX	100	100	100	99
6 Sts	99	92	96	99
These 6 States planted 100% of last year's sorghum acreage.				

Sorghum Percent Coloring				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	84	58	81	68
KS	77	42	58	73
NE	92	57	75	83
OK	67	60	70	68
SD	90	73	89	74
TX	91	95	99	90
6 Sts	82	62	74	78
These 6 States planted 100% of last year's sorghum acreage.				

Sorghum Percent Mature				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	26	0	10	16
KS	19	4	11	12
NE	24	5	14	17
OK	24	15	26	29
SD	30	27	34	16
TX	80	80	88	79
6 Sts	38	28	36	35
These 6 States planted 100% of last year's sorghum acreage.				

Sorghum Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
CO	0	0	0	0
KS	1	1	2	1
NE	2	0	1	1
OK	0	1	1	5
SD	2	0	1	0
TX	69	68	74	70
6 Sts	21	20	23	23
These 6 States harvested 100% of last year's sorghum acreage.				

Sorghum Condition by Percent					
	VP	P	F	G	EX
CO	0	11	48	41	0
KS	21	32	30	16	1
NE	44	22	14	15	5
OK	13	32	33	22	0
SD	5	20	36	39	0
TX	13	29	41	16	1
6 Sts	17	29	34	19	1
Prev Wk	17	28	34	20	1
Prev Yr	4	10	29	47	10

Oats Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
IA	100	96	98	100
MN	100	82	90	98
NE	100	100	100	100
ND	96	76	90	90
OH	100	100	100	100
PA	95	95	97	92
SD	100	95	99	99
TX	100	100	100	100
WI	96	91	94	92
9 Sts	97	90	95	95
These 9 States harvested 69% of last year's oat acreage.				

Peanuts Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AL	1	NA	0	1
FL	13	5	9	12
GA	1	NA	1	2
NC	0	NA	0	0
OK	0	NA	0	0
SC	1	NA	1	1
TX	0	NA	0	0
VA	1	NA	0	1
8 Sts	2	NA	2	3
These 8 States harvested 96% of last year's peanut acreage.				

Peanut Condition by Percent					
	VP	P	F	G	EX
AL	0	0	17	71	12
FL	1	2	26	69	2
GA	1	5	25	55	14
NC	0	3	26	65	6
OK	0	0	41	59	0
SC	1	1	18	61	19
TX	0	17	47	36	0
VA	1	5	11	72	11
8 Sts	1	5	26	58	10
Prev Wk	1	4	25	59	11
Prev Yr	1	2	20	65	12

Spring Wheat Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
ID	94	74	86	92
MN	100	57	75	95
MT	98	87	99	88
ND	97	62	79	88
SD	100	97	100	98
WA	98	77	92	90
6 Sts	95	71	85	89
These 6 States harvested 100% of last year's spring wheat acreage.				

## Crop Progress and Condition

### Week Ending September 11, 2022

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

Barley Percent Harvested				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
ID	95	78	89	95
MN	100	59	78	99
MT	95	80	95	89
ND	99	74	89	94
WA	99	76	88	88
5 Sts	96	77	91	92
These 5 States harvested 85% of last year's barley acreage.				

Winter Wheat Percent Planted				
	Prev Year	Prev Week	Sep 11 2022	5-Yr Avg
AR	0	0	0	0
CA	0	0	0	1
CO	28	13	20	18
ID	15	1	12	10
IL	0	0	0	0
IN	3	0	0	1
KS	3	0	3	3
MI	3	0	0	2
MO	0	0	0	0
MT	12	4	19	8
NE	15	1	5	10
NC	0	0	0	0
OH	1	0	0	0
OK	7	5	11	4
OR	4	3	5	6
SD	12	2	10	10
TX	8	3	17	6
WA	51	7	26	34
18 Sts	11	3	10	7
These 18 States planted 89% of last year's winter wheat acreage.				

Pasture and Range Condition by Percent												
Week Ending Sep 11, 2022												
	VP	P	F	G	EX		VP	P	F	G	EX	
AL	0	4	20	72	4		NH	0	9	52	35	4
AZ	2	9	40	32	17		NJ	0	23	60	17	0
AR	6	26	38	26	4		NM	3	26	32	29	10
CA	20	30	35	15	0		NY	6	19	40	28	7
CO	15	23	20	32	10		NC	1	3	29	65	2
CT	0	100	0	0	0		ND	2	12	45	38	3
DE	4	40	43	9	4		OH	0	6	27	60	7
FL	1	4	14	52	29		OK	35	33	21	11	0
GA	3	8	31	52	6		OR	20	24	41	14	1
ID	6	25	32	24	13		PA	20	26	27	27	0
IL	7	6	35	48	4		RI	0	100	0	0	0
IN	5	12	37	42	4		SC	4	8	26	58	4
IA	15	24	29	26	6		SD	24	29	31	15	1
KS	42	30	20	8	0		TN	1	8	28	55	8
KY	2	12	31	46	9		TX	21	24	31	18	6
LA	1	8	32	49	10		UT	8	24	34	33	1
ME	0	0	10	90	0		VT	1	14	52	31	2
MD	10	17	30	34	9		VA	1	10	33	52	4
MA	20	80	0	0	0		WA	4	16	28	50	2
MI	3	20	34	37	6		WV	0	4	13	80	3
MN	3	10	26	50	11		WI	1	6	24	55	14
MS	3	11	37	46	3		WY	24	18	30	27	1
MO	10	17	42	30	1		48 Sts	19	22	30	24	5
MT	26	22	29	23	0							
NE	50	28	14	6	2		Prev Wk	19	23	30	23	5
NV	15	20	50	15	0		Prev Yr	20	22	33	21	4

VP - Very Poor;

P - Poor;

F - Fair;

G - Good;

EX - Excellent

NA - Not Available;

\*Revised

# Crop Progress and Condition

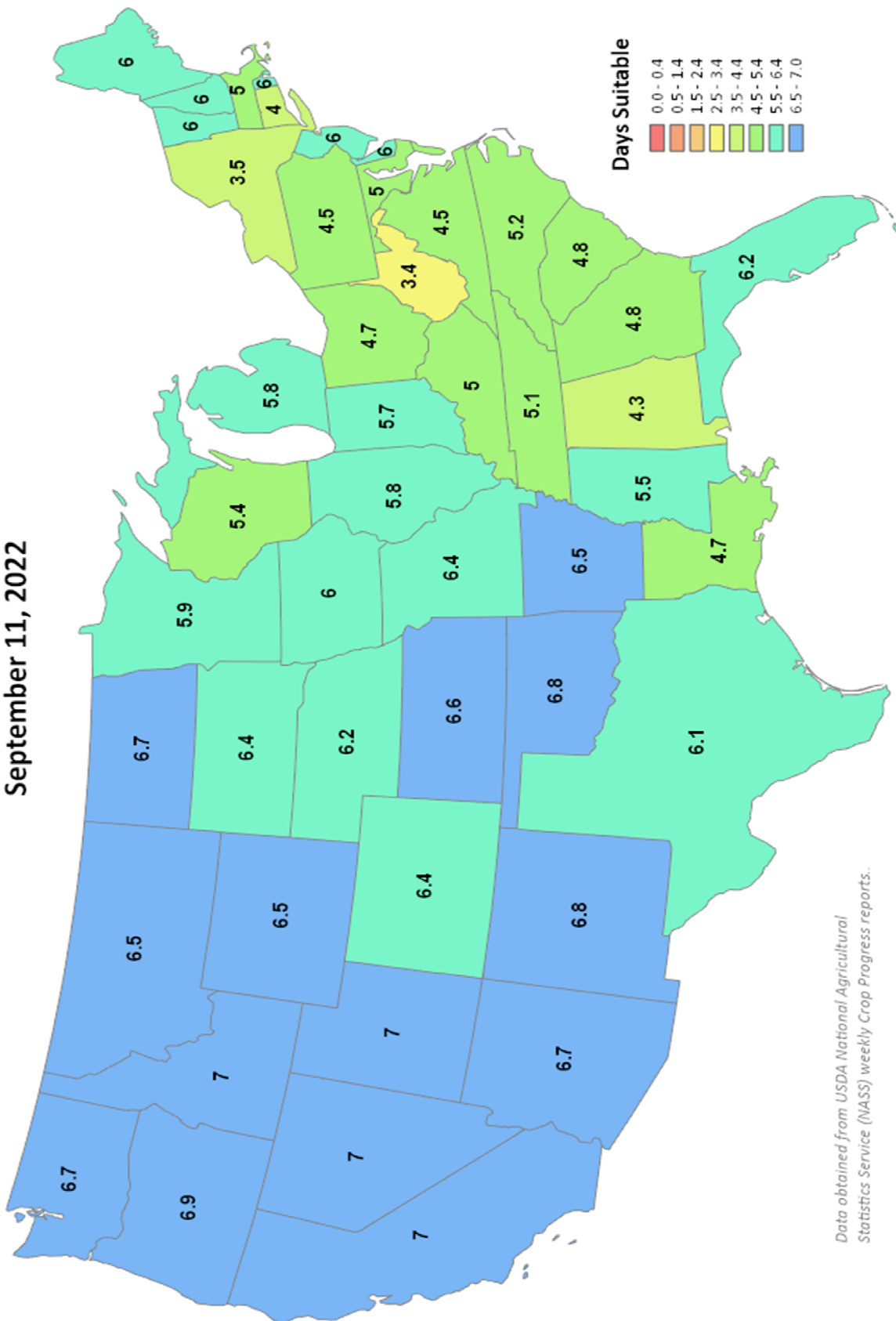
Week Ending September 11, 2022

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

## Days Suitable for Fieldwork

Week Ending

September 11, 2022



Data obtained from USDA National Agricultural Statistics Service (NASS) weekly Crop Progress reports.

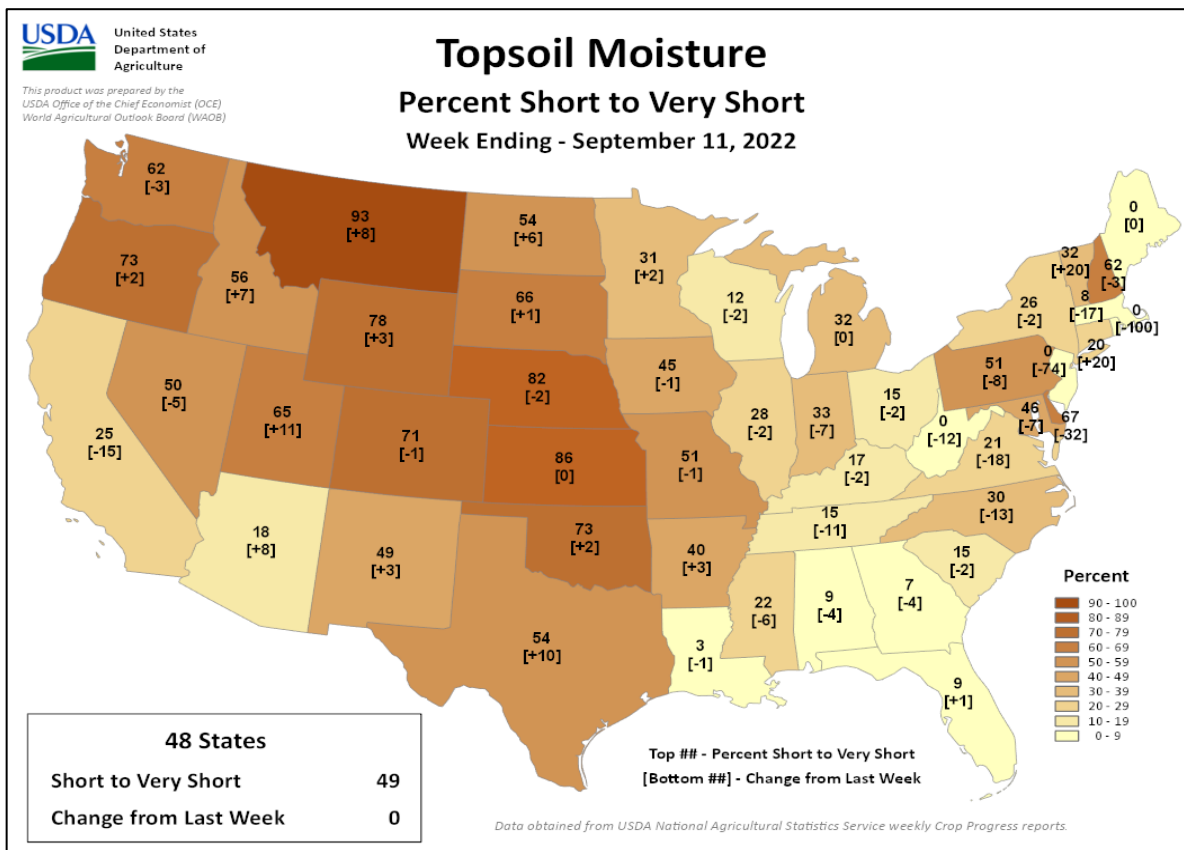
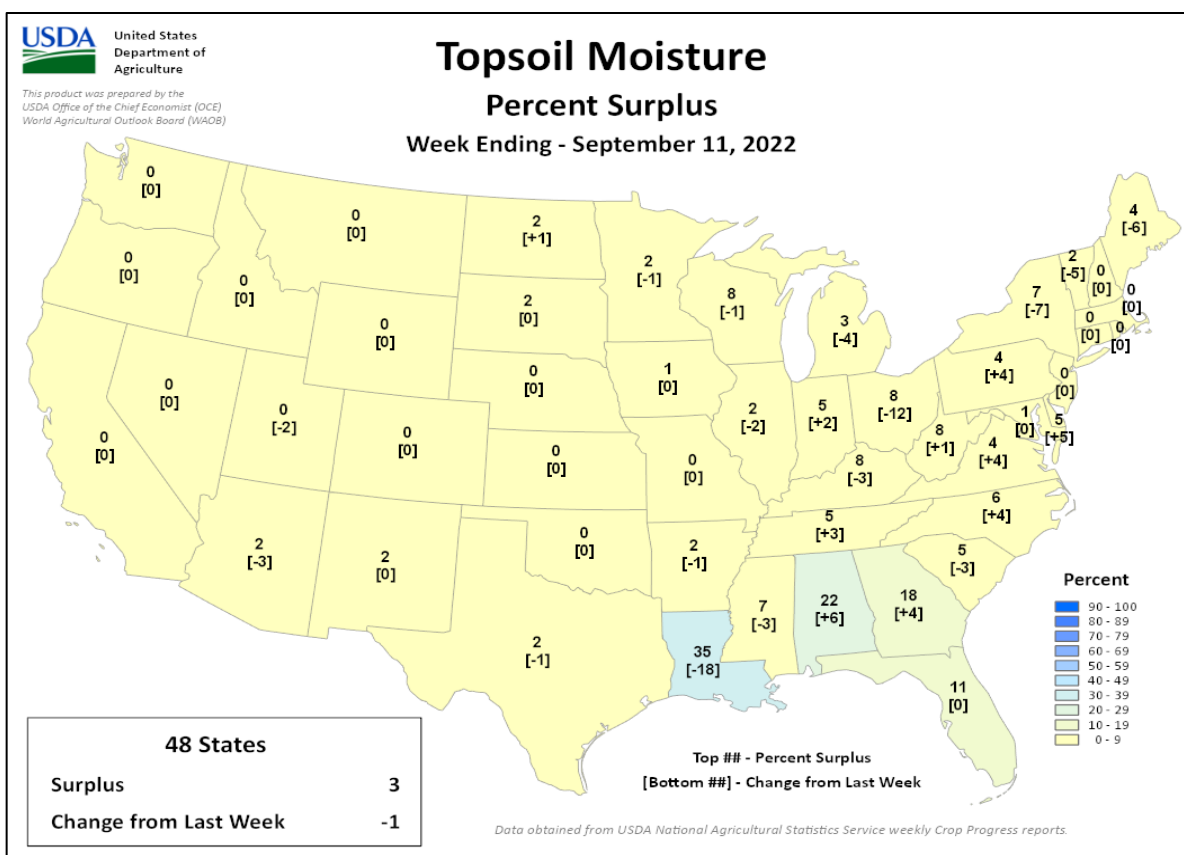


This product was prepared by the  
USDA Office of the Chief Economist (OCE)  
World Agricultural Outlook Board (WAOB)

## Crop Progress and Condition

### Week Ending September 11, 2022

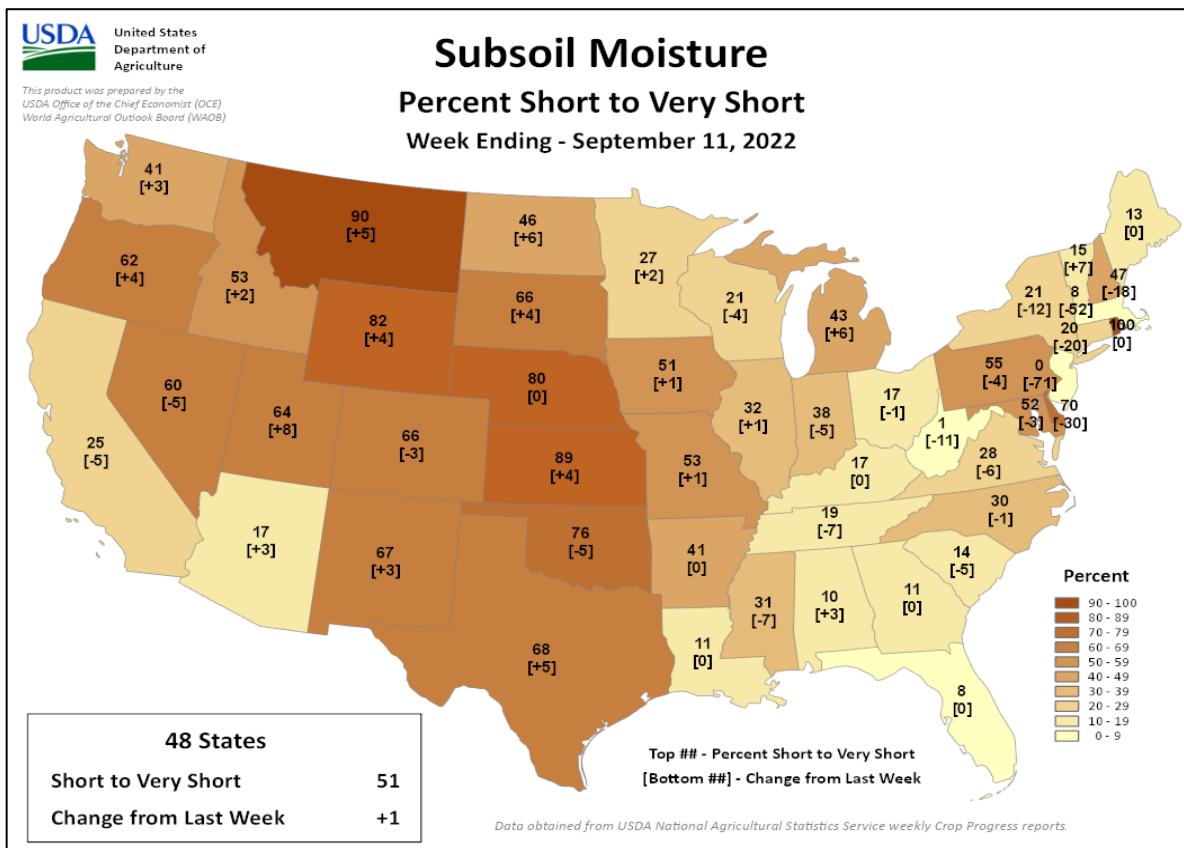
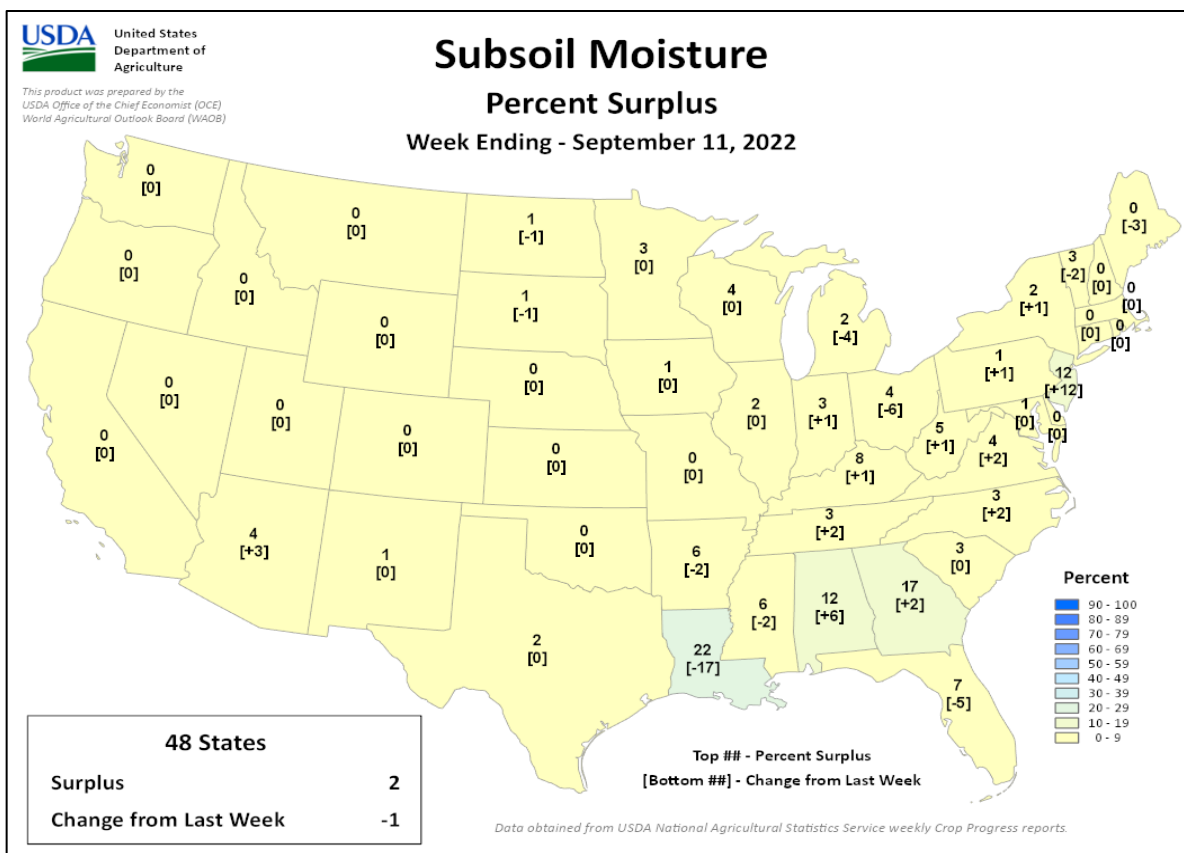
Weekly U.S. Progress and Condition Data provided by USDA/NASS



## Crop Progress and Condition

### Week Ending September 11, 2022

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



## September 8 ENSO Diagnostic Discussion

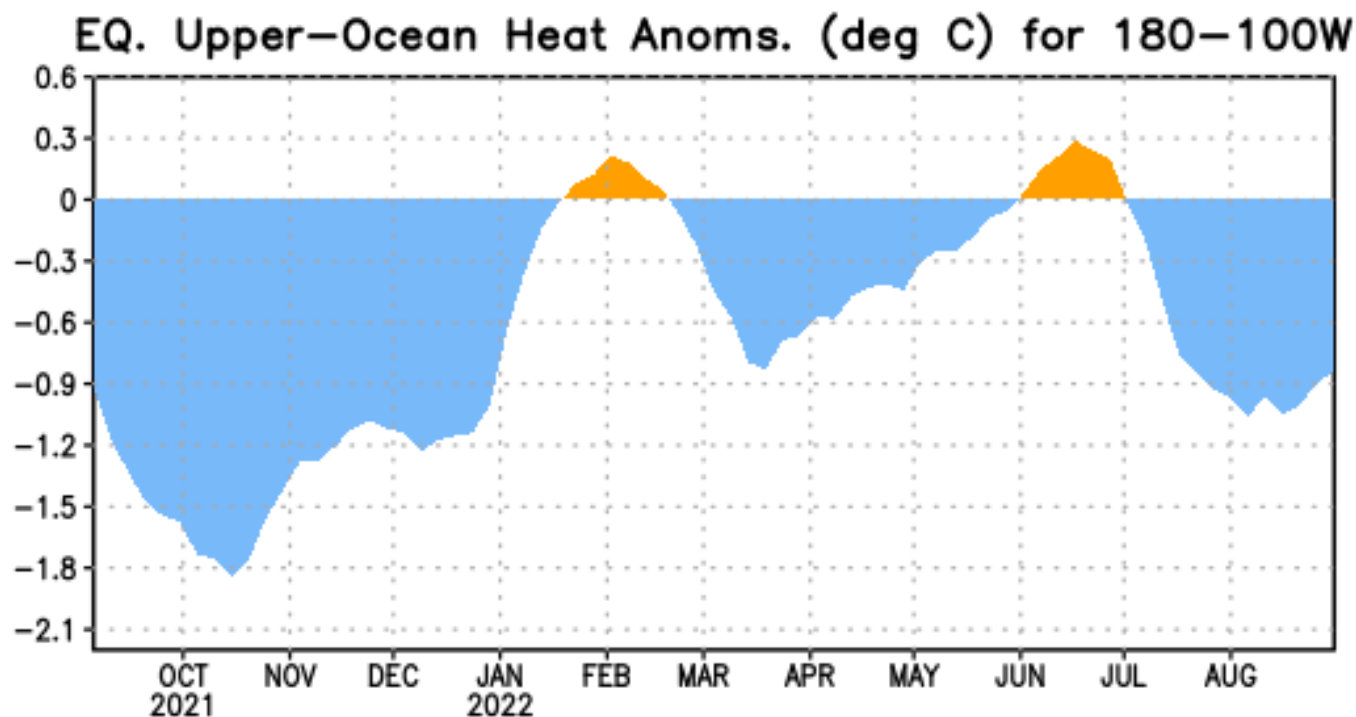


Figure 1: Area-averaged upper-ocean heat content anomaly (°C) in the equatorial Pacific (5°N-5°S, 180°-100°W). The heat content anomaly is computed as the departure from the 1991-2020 base period pentad means.

### ENSO Alert System Status: **La Niña Advisory**

**Synopsis:** La Niña is favored to continue through Northern Hemisphere winter 2022-23, with a 91% chance in September-November, decreasing to a 54% chance in January-March 2023.

During August, below-average sea surface temperatures (SSTs) persisted across the central and east-central equatorial Pacific Ocean. The largest SST anomalies were evident in the Niño-3.4 and Niño-4 regions, with the latest weekly values reaching  $-0.8^{\circ}\text{C}$  and  $-1.1^{\circ}\text{C}$ , respectively. Negative subsurface temperature anomalies were mostly unchanged during the month (Fig. 1), reflecting the dominance of below-average temperatures across the eastern Pacific Ocean. Low-level easterly wind anomalies and upper-level westerly wind anomalies continued across most of the equatorial Pacific. Convection and rainfall remained suppressed over the western and central tropical Pacific and enhanced over Indonesia. Overall, the coupled ocean-atmosphere system continued to reflect La Niña.

The most recent IRI plume forecast of the Niño-3.4 SST index indicates La Niña will persist into the Northern Hemisphere winter 2022-23. There is an interesting split in the dynamical versus statistical model forecasts, with the latter set suggesting La Niña will persist longer, through January-March 2023. At this time, the forecaster

consensus sides with the statistical models, although there is still large uncertainty over how long La Niña will last and when it will transition to ENSO-neutral (56% chance of a transition to ENSO-neutral during February-April 2023). In summary, La Niña is favored to continue through Northern Hemisphere winter 2022-23, with a 91% chance in September-November, decreasing to a 54% chance in January-March 2023.

This discussion is a consolidated effort of the National Oceanic and Atmospheric Administration (NOAA), NOAA's National Weather Service, and their funded institutions. Oceanic and atmospheric conditions are updated weekly on the Climate Prediction Center web site ([El Niño/La Niña Current Conditions and Expert Discussions](#)). Additional perspectives and analysis are also available in an [ENSO blog](#). A probabilistic strength forecast is [available here](#). The next ENSO Diagnostics Discussion is scheduled for **13 October 2022**. To receive an e-mail notification when the monthly ENSO Diagnostic Discussions are released, please send an e-mail message to: [ncep.list.enso-update@noaa.gov](mailto:ncep.list.enso-update@noaa.gov).

## International Weather and Crop Summary

September 4-10, 2022

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

### HIGHLIGHTS

**EUROPE:** Widespread soaking rainfall further eased dryness concerns in France, Germany, and Hungary, while extreme to exceptional drought persisted in Spain.

**WESTERN FSU:** Cool weather settled over much of the region, with western rain contrasting with dry conditions in southern growing areas.

**MIDDLE EAST:** Seasonably dry weather over much of Turkey promoted summer crop harvesting, though showers near the Black Sea caused localized fieldwork delays.

**SOUTH ASIA:** Beneficially drier weather continued in southern Pakistan, allowing flood waters to recede.

**EAST ASIA:** Hot, dry weather returned to southern China after a brief respite, further exacerbating late-season drought.

**SOUTHEAST ASIA:** Drenching rainfall caused localized flooding in northern Vietnam, with more seasonable amounts benefiting rice elsewhere in the region.

**AUSTRALIA:** A band of rain swept across the wheat belt, benefiting reproductive winter grains and oilseeds.

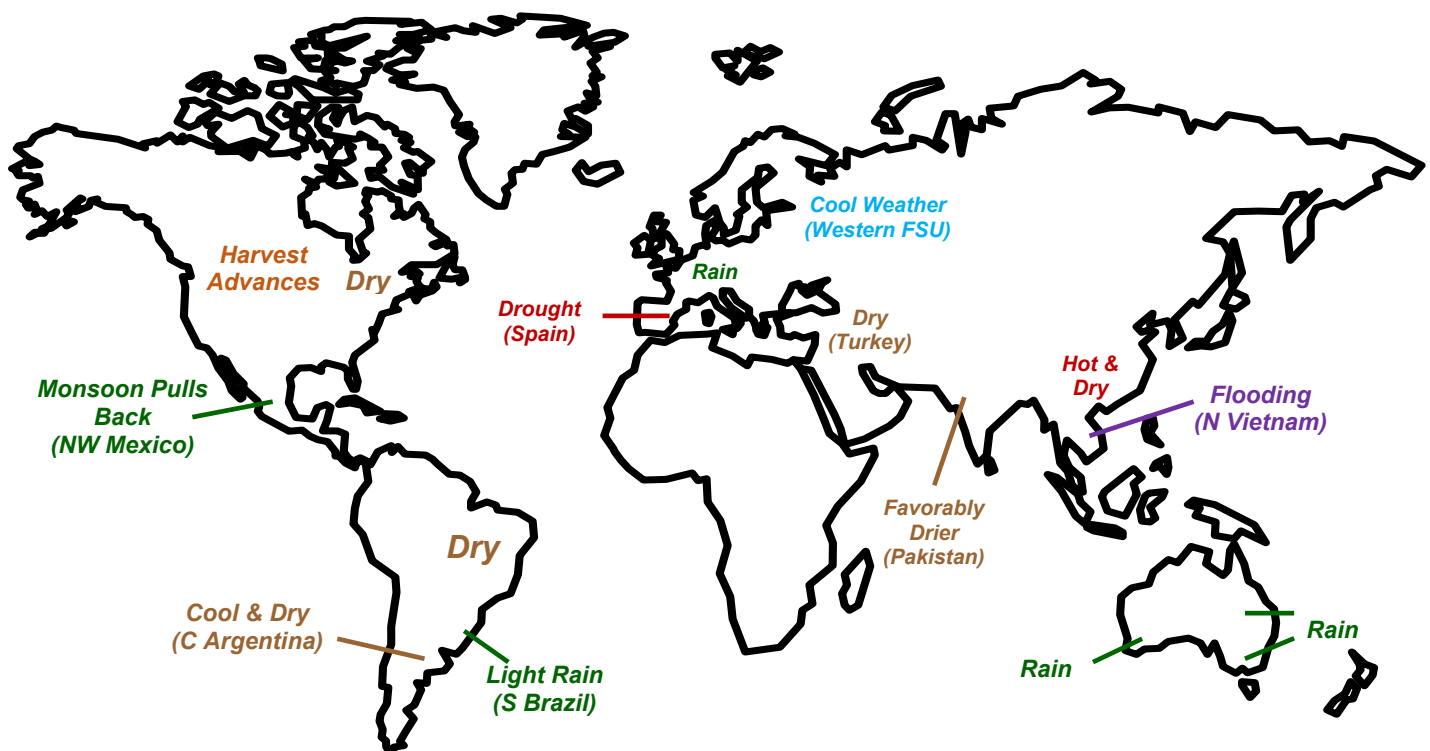
**ARGENTINA:** Cool weather slowed growth of winter grains.

**BRAZIL:** Lingering rain benefited immature wheat in the south.

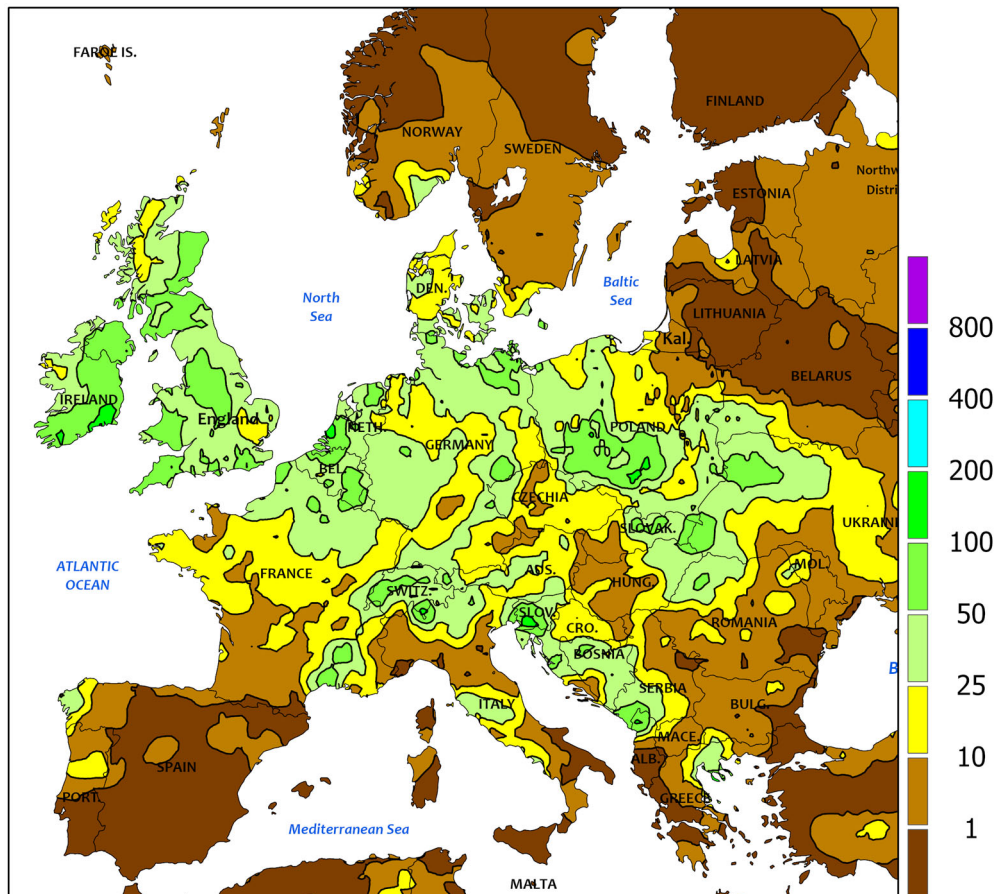
**MEXICO:** Showers tapered off in far northern watersheds.

**CANADIAN PRAIRIES:** Warm, sunny weather aided drydown and harvesting of spring crops.

**SOUTHEASTERN CANADA:** Dry weather supported fieldwork across the region, while late-season warmth sped maturation of summer crops.



EUROPE  
Total Precipitation(mm)  
September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



EUROPE

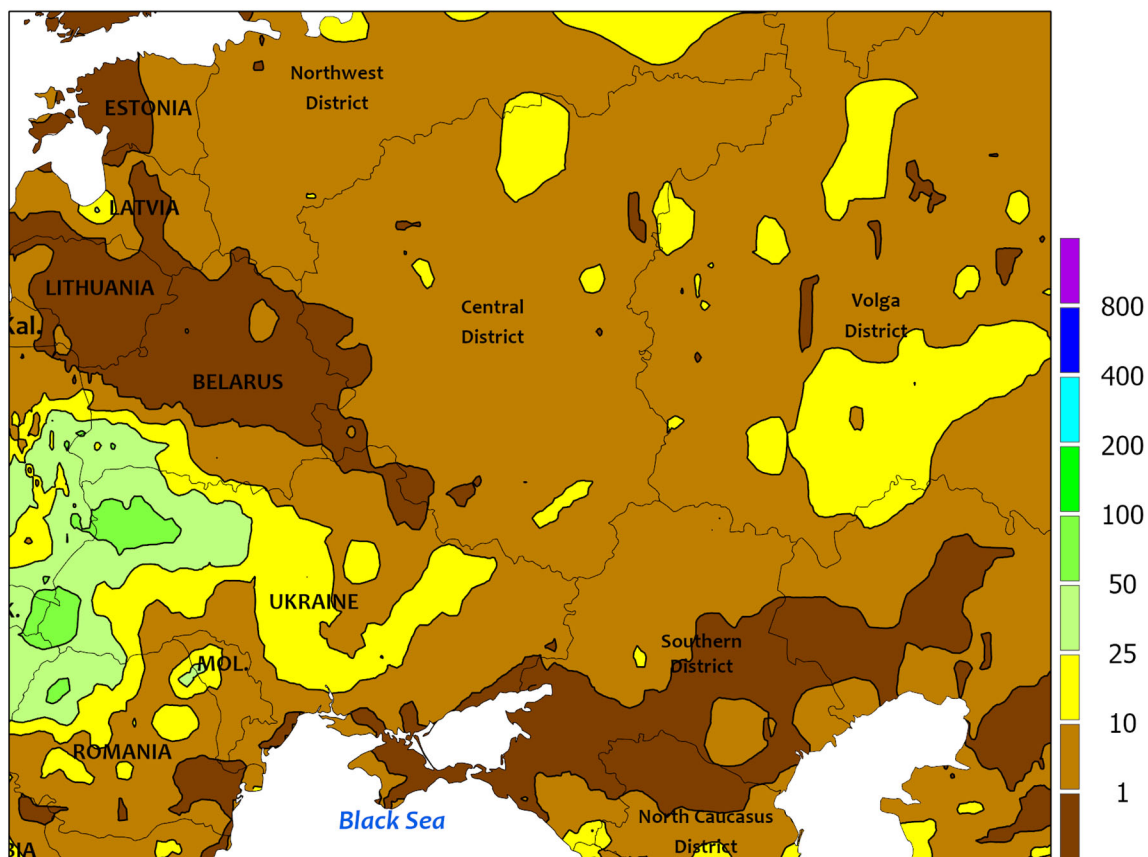
Soaking rainfall alleviated dryness concerns and boosted moisture supplies for winter crops over much of Europe, though drought lingered on the Iberian Peninsula. Widespread moderate to heavy showers and thunderstorms (10-55 mm) eased drought in France, Germany, Italy, and Hungary while improving winter crop establishment prospects. Similar rainfall amounts sustained good moisture supplies for winter crop sowing and emergence over England, Denmark, Poland, and southern Scandinavia. In southeastern Europe, drier

weather in the Danube River Valley (10 mm or less) allowed fieldwork to resume following recent excessive wetness, while locally heavy showers in northern Greece (up to 25 mm) were detrimental to open-boll cotton. Conversely, mostly dry weather sustained extreme to exceptional drought in Spain and Portugal, although late-week showers (10-30 mm, locally more) in northwestern portions of the Iberian Peninsula signaled the arrival of much-needed rain from a slow-moving Atlantic storm system.

## WESTERN FSU

Total Precipitation(mm)

September 4 - 10, 2022



Data availability may be affected by the current geopolitical situation in Ukraine

CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



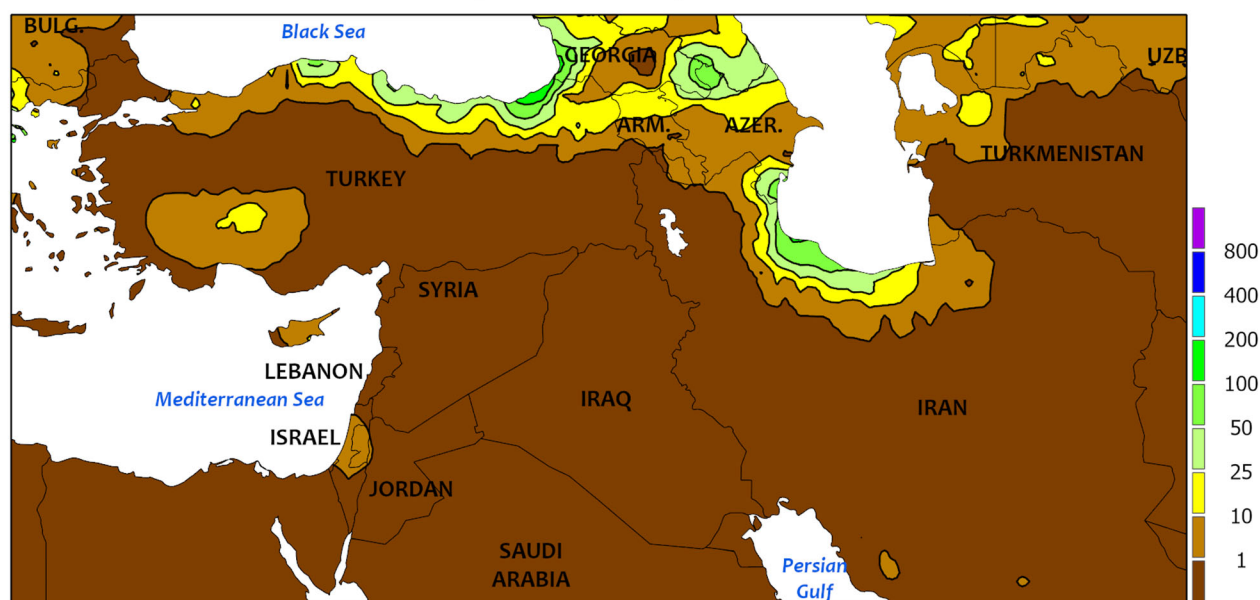
## WESTERN FSU

Cooler weather settled over the region, with western rain contrasting with dry conditions in southern growing areas. Moderate to heavy rainfall (10-60 mm) over western and central Ukraine slowed or halted summer crop drydown and harvesting but boosted moisture reserves for winter crop establishment. Lighter showers (5-20 mm) moistened soils locally in west-central Russia, while dry weather in southwestern Russia facilitated summer crop harvesting and winter wheat sowing. After a recent spell of late-

summer heat, cooler weather (4-8°C below normal) across much of the region eased evaporative losses — particularly in Russia and eastern Ukraine — brought on by a recent drying trend (30-day rainfall locally less than 25 percent of normal).

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

MIDDLE EAST  
Total Precipitation(mm)  
September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



MIDDLE EAST

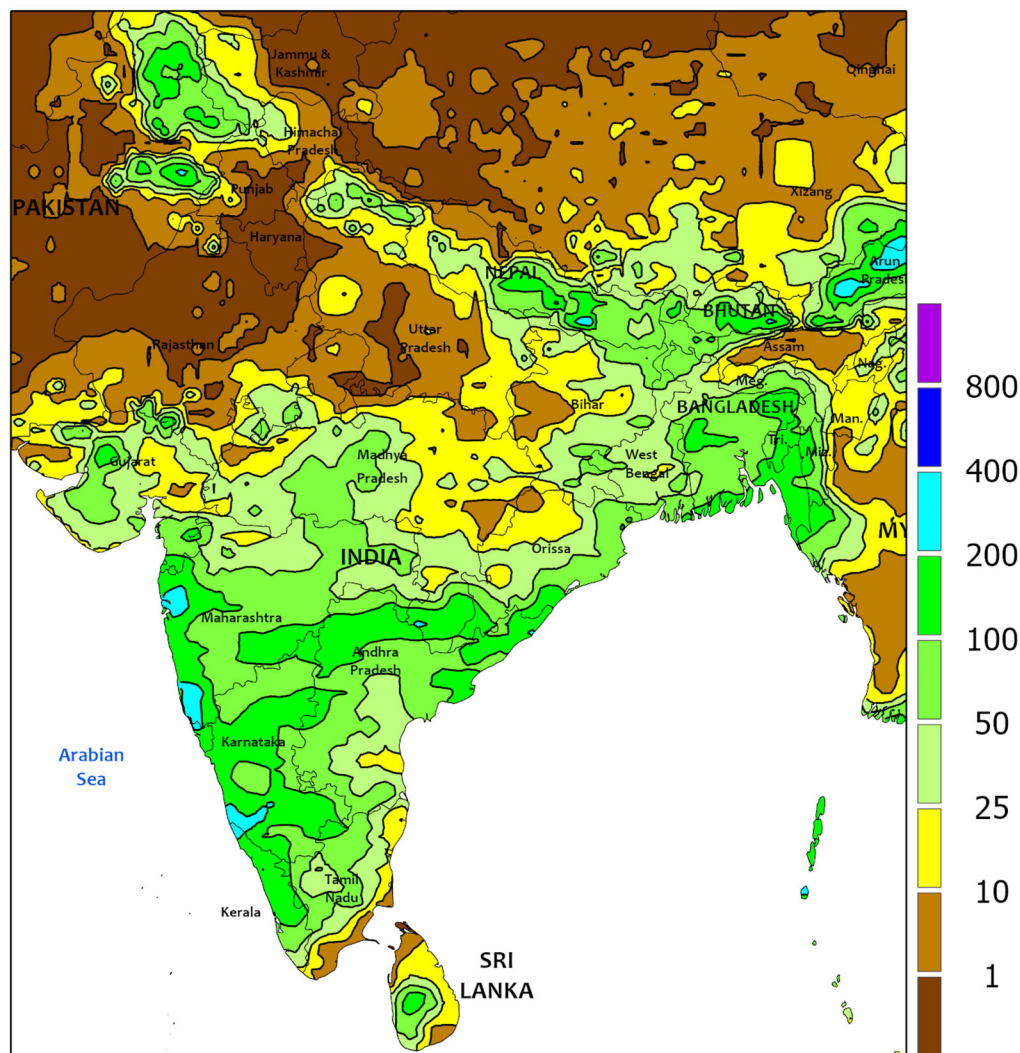
Dry weather over much of Turkey contrasted with lingering showers in northern-most summer crop areas. Sunny skies returned to Marmara (northwestern Turkey), promoting sunflower drydown and harvesting after recent wet weather. However, moderate to heavy showers and thunderstorms (10-100 mm, locally more) slowed or halted

fieldwork near the Black Sea Coast. Elsewhere in the country, mostly dry conditions favored maturation, drydown, and harvesting of cotton, corn, and other summer row crops. Across the rest of the region, agricultural activity remained in a lull before the onset of winter grain sowing in October and November.

## SOUTH ASIA

Total Precipitation(mm)

September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



## SOUTH ASIA

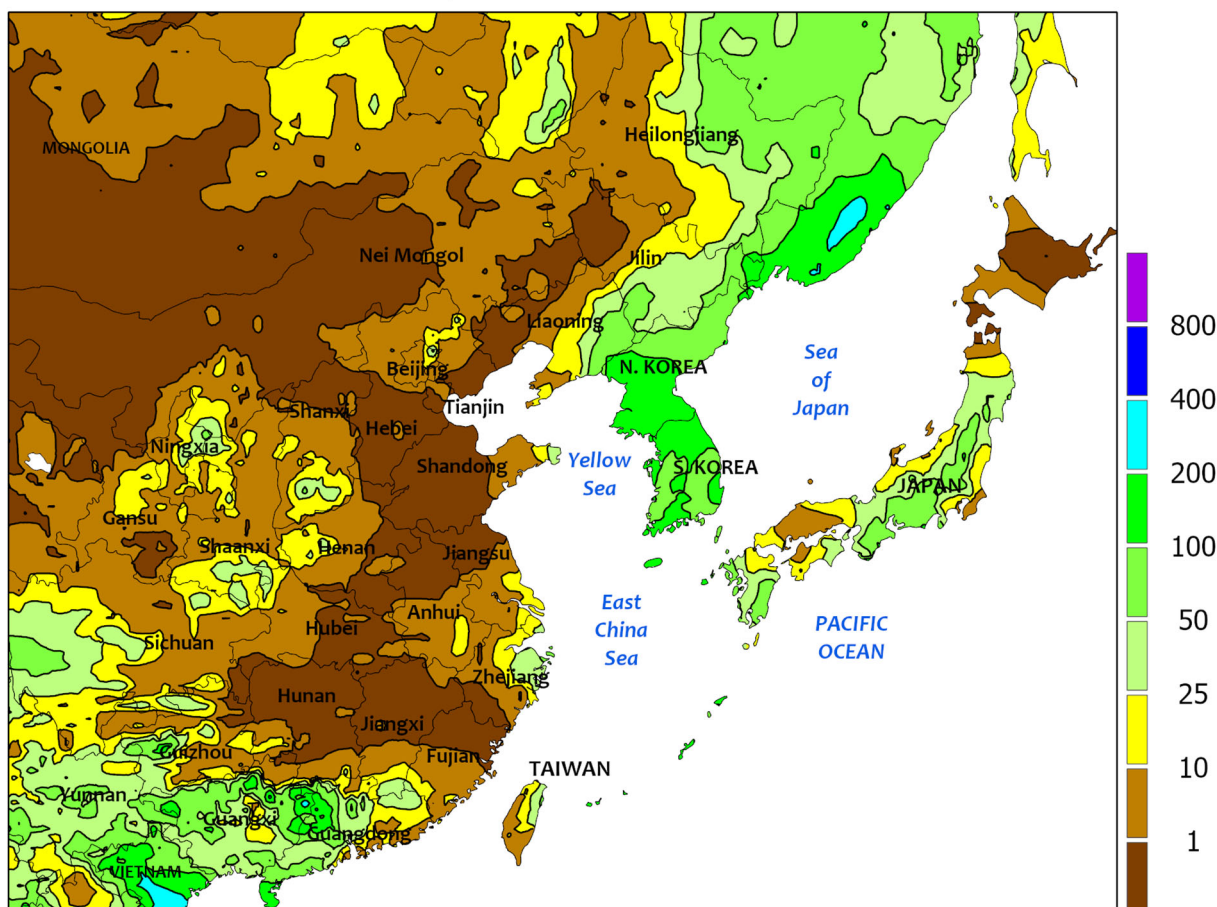
Seasonably dry weather continued across much of Pakistan, and along with warmer conditions toward the end of the period, helped ease the severe flooding and excessive wetness that has plagued southern growing areas. Although, the current conditions favored maturing cotton not impacted by flooding, damage to cotton in the flood zones was likely irreversible. Meanwhile, showers (25-100 mm, locally more)

across the southern half of India maintained ample soil moisture for vegetative to reproductive kharif crops. Despite some excessive wetness for cotton and oilseeds early in the season, moisture conditions have been more favorable in the second half of the kharif campaign. In contrast, continued sub-par rainfall in northern rice areas (Uttar Pradesh into Bihar) further limited moisture supplies as well as irrigation recharge.

## EASTERN ASIA

Total Precipitation(mm)

September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data

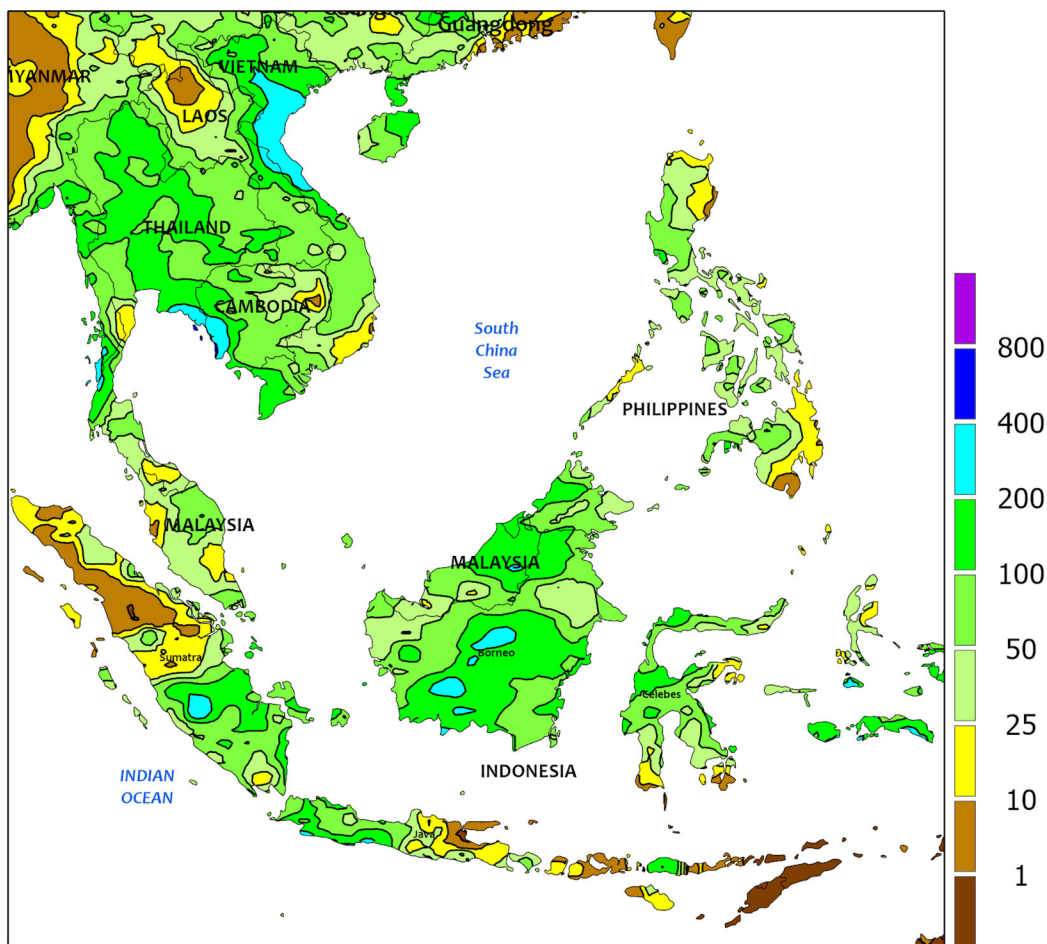


## EASTERN ASIA

Widespread heat and dryness returned to southern China, with temperatures soaring to near 40°C once again (6°C above normal). While the conditions promoted summer crop maturation, they exacerbated late-season drought and continued to reduce yield prospects for late-crop rice in the reproductive stages of development. Meanwhile, sunny, warmer-than-normal weather (in the absence of excessive heat) supported summer grain and oilseed maturation on the North China Plain and sections of the northeast. In contrast,

the remnants of Super Typhoon Hinnamnor produced downpours (up to 260 mm locally) across the Korean Peninsula that also reached into nearby sections of northeastern China (showers largely missed Japan). Although much of the rainfall helped boost irrigation supplies, it was largely unfavorable for maturing summer crops. In other parts of the region, dry, warmer-than-normal weather in western China (Xinjiang) supported cotton maturation and early harvesting.

SOUTHEAST ASIA  
Total Precipitation(mm)  
September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



#### SOUTHEAST ASIA

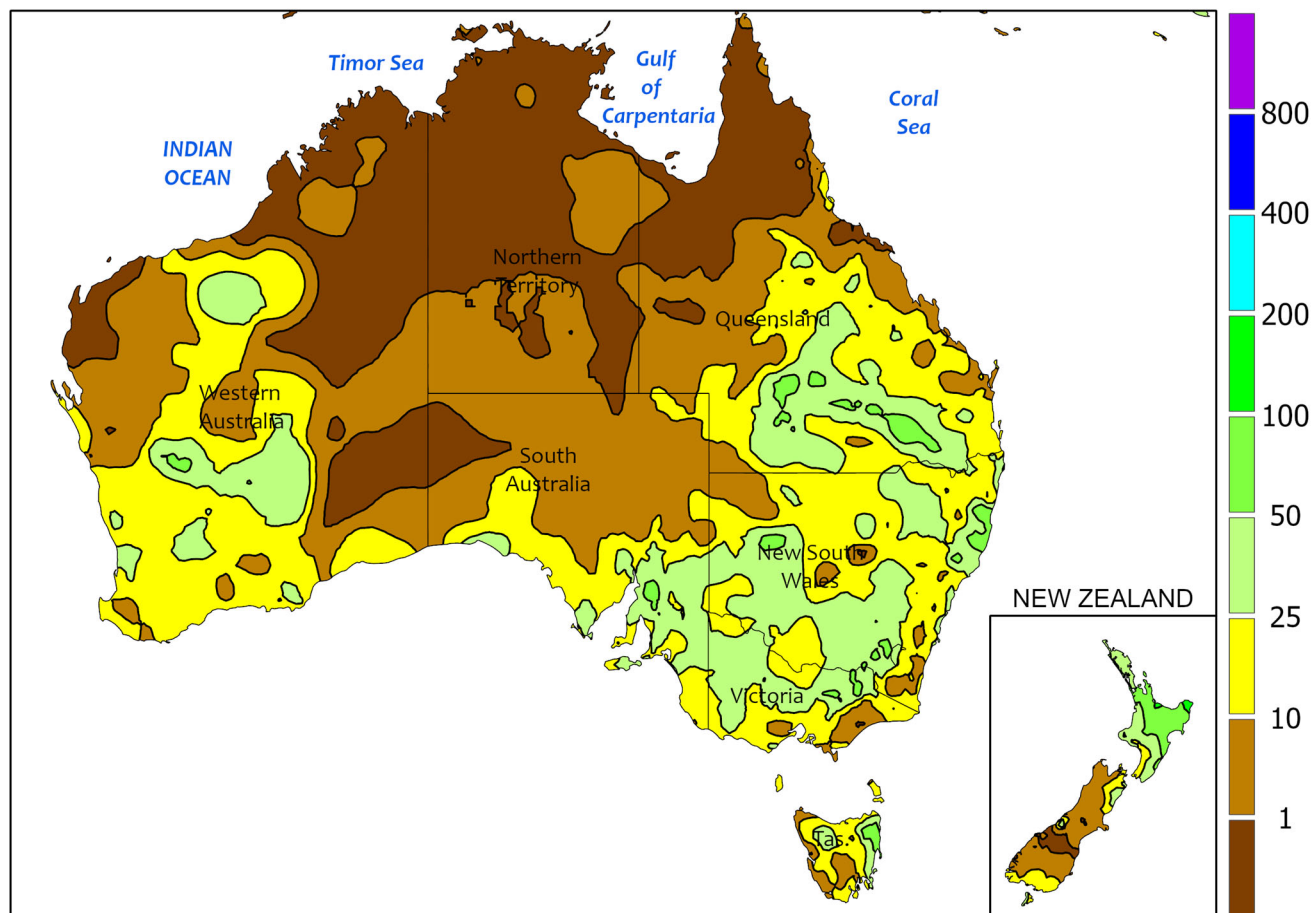
Waves of tropical moisture moved across Indochina and Thailand, producing over 150 mm of rain and flooding in some locales. One area in particular with flooding rainfall was northern Vietnam where some newly sown winter paddy may have been damaged. However, the rainfall in most other areas benefited seasonal rice in the reproductive

stages of development. Meanwhile, showers (25-100 mm) across the Philippines continued to favor seasonal rice, with few areas experiencing any significant moisture deficits. Elsewhere, downpours (50-150 mm) in eastern portions of Malaysia and Indonesia slowed the start of the main harvest period for oil palm.

## AUSTRALIA

Total Precipitation(mm)

September 4 - 10, 2022



Gridded data from the Australian Bureau of Meteorology: [www.bom.gov.au/](http://www.bom.gov.au/)  
 Creative Commons License found at:  
<https://creativecommons.org/licenses/by/3.0/au/legalcode>

CLIMATE PREDICTION CENTER, NOAA  
 Computer generated contours  
 Based on preliminary data



## AUSTRALIA

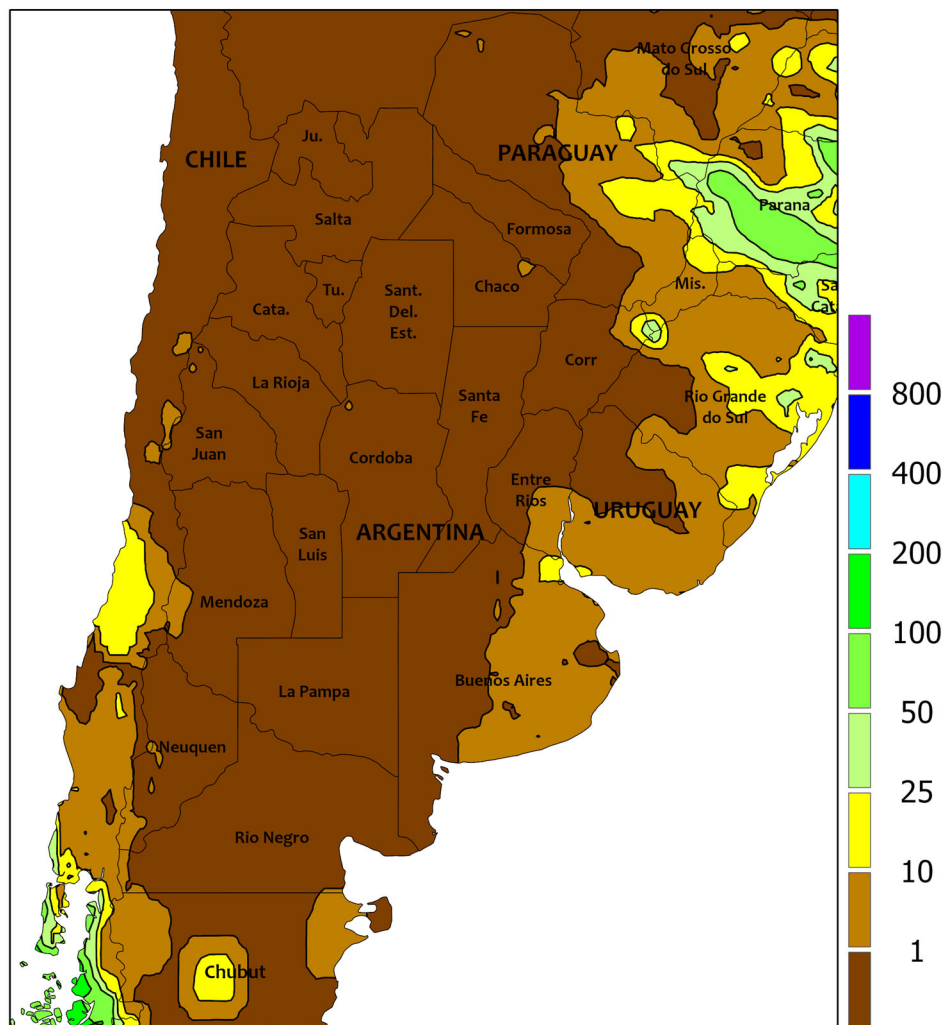
A band of rain swept across the wheat belt during the week, maintaining adequate to abundant moisture supplies for reproductive winter grains and oilseeds. Most major winter crop areas received between 10 and 25 mm of rainfall, helping to sustain good to excellent crop conditions and yield prospects. Although the rain may have temporarily delayed local fieldwork, early summer crop planting has

likely begun in parts of southern Queensland and New South Wales. Seasonably warm weather prevailed throughout much of the wheat belt, favoring winter grain and oilseed development. Maximum temperatures were generally in the upper 10s and lower 20s (degrees C), while minimum temperatures remained above freezing in all but a few very isolated locations.

## ARGENTINA

Total Precipitation(mm)

September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



## ARGENTINA

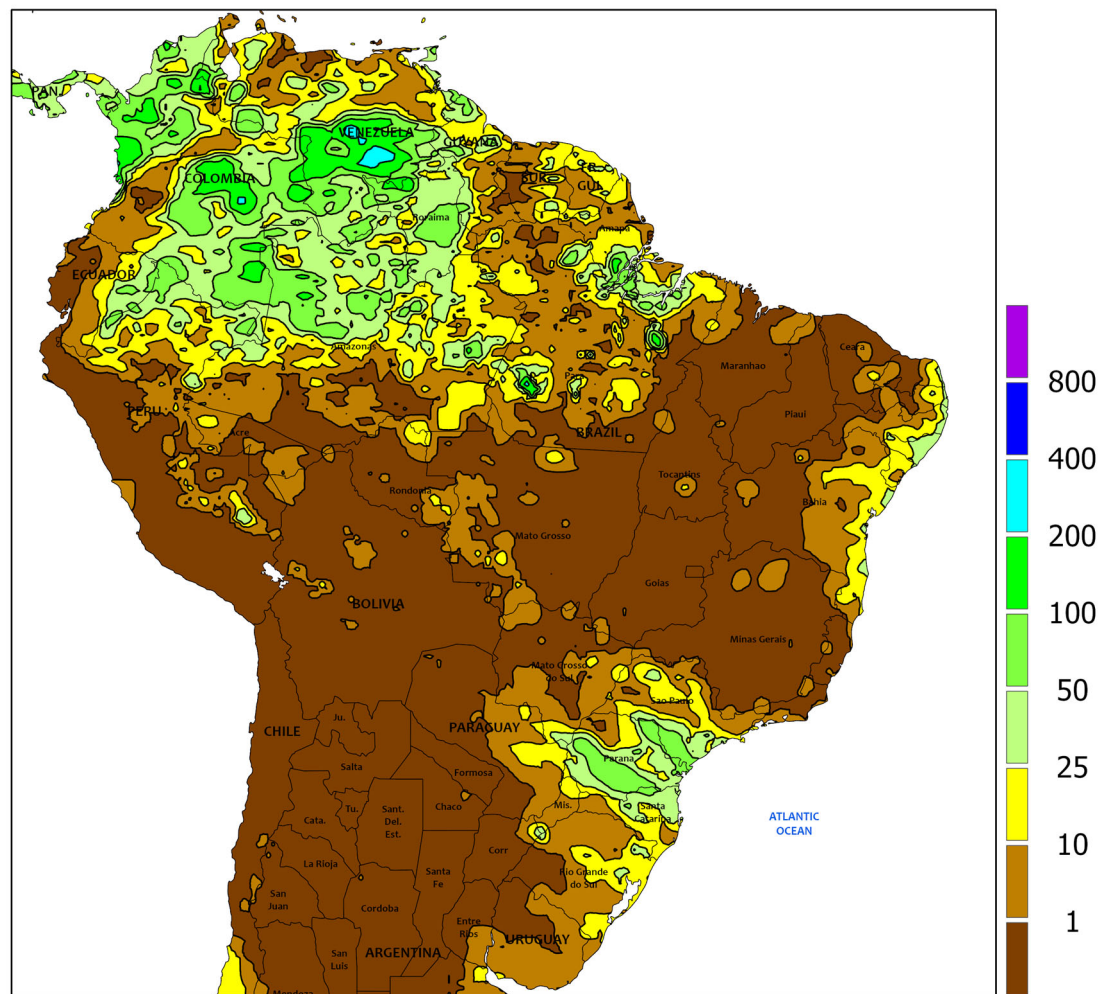
Complete dryness dominated nearly all major farming areas. No rain fell from western Buenos Aires northward to Paraguay, with light showers (rainfall totaling below 5 mm in most locations) confined to eastern-most agricultural areas. Weekly average temperatures ranged from 2°C above normal in parts of Buenos Aires to as much as 4°C below normal in the northeast, with freezes common as far

north as Chaco. The cooler weather slowed growth of winter grains, but the persistence of unseasonable dryness remained a concern for those crops in or nearing reproduction, as well as for germination of early-planted summer crops. According to the government of Argentina, sunflowers were 17 percent planted as of September 8, 7 points ahead of last year's pace.

## BRAZIL

Total Precipitation(mm)

September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data

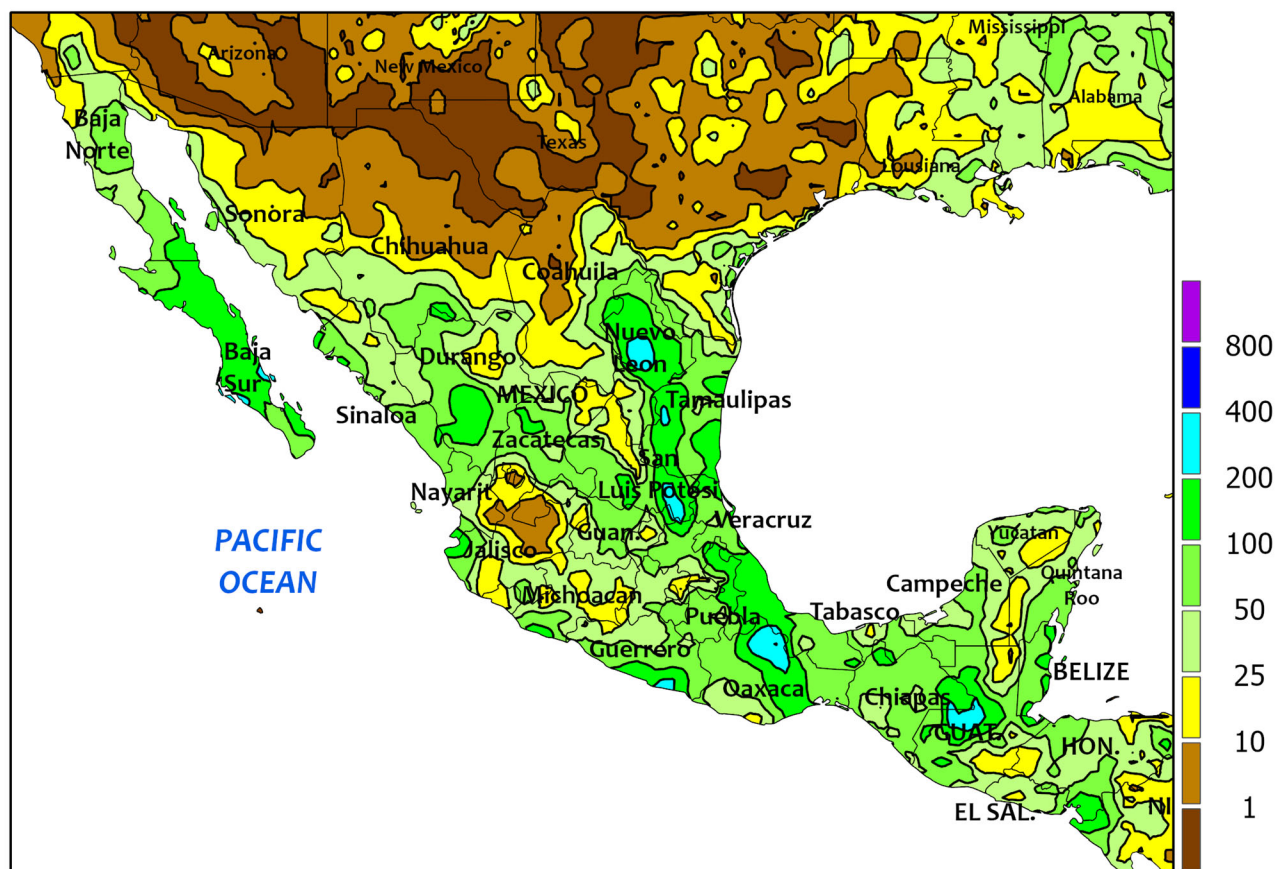


## BRAZIL

Light showers lingered over southern Brazil, maintaining overall favorable levels of moisture for wheat. Rainfall totaling more than 10 mm stretched from São Paulo southward through Paraná, with lighter rain falling elsewhere in the region. However, while favoring immature crops, the moisture was untimely for wheat later in development. According to the

government of Paraná, wheat was 12 percent harvested as of September 5, with 33 percent of the remaining crop mature; meanwhile, second-crop corn was 95 percent harvested. Warm, seasonably dry weather continued farther north, where moisture will be needed soon to condition fields for planting soybeans and prevent delays in fieldwork.

MEXICO  
Total Precipitation(mm)  
September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data

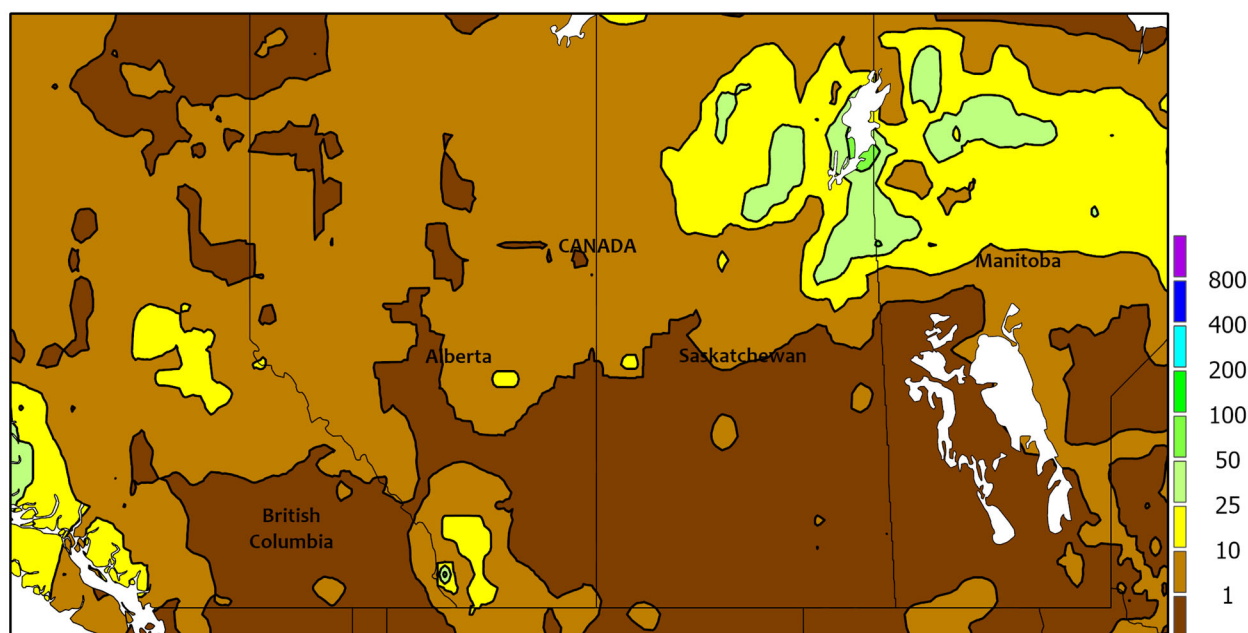


### MEXICO

Rainfall tapered off in northwestern watersheds as the monsoon showed signs of retreating. As a result, little to no rain fell in northern sections of Sonora and Chihuahua, even as a Hurricane (Karen) generated heavy showers over Baja California. However, beneficial rain (greater than 50 mm) fell in Sinaloa and southern Chihuahua southward through Durango. Farther east, heavy rain (50-100 mm, locally exceeding 200 mm) stretched from Nuevo León southward to Oaxaca, providing a welcomed late-season

boost in moisture for summer crops, including sugarcane in key production areas of Veracruz. The rain in the northeast also helped to lower temperatures to more seasonable levels (highest readings in the middle 30s degrees C), following an extended period of unseasonable warmth (temperatures in excess of 40°). Scattered showers (10-50 mm, locally higher) benefited immature corn across the southern plateau (Jalisco to Puebla) and in the remainder of the east (Chiapas to Yucatán).

CANADIAN PRAIRIES  
Total Precipitation(mm)  
September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



#### CANADIAN PRAIRIES

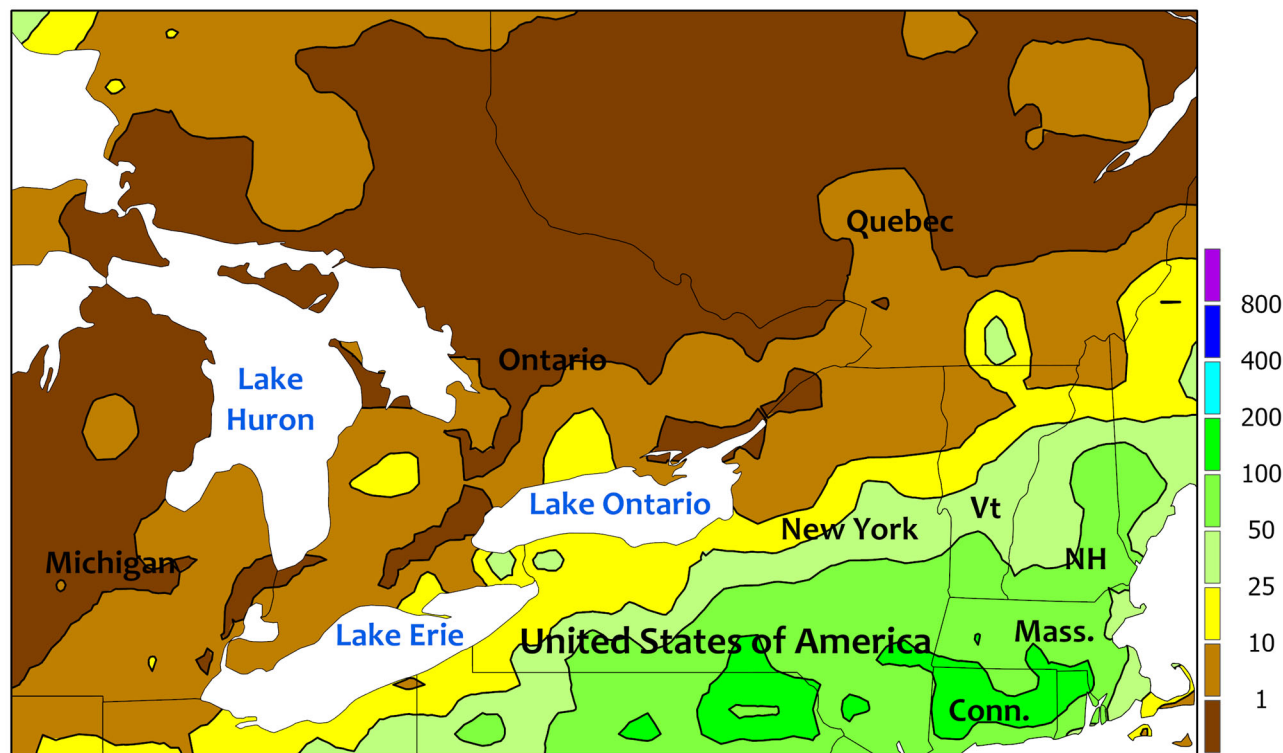
Mostly dry, unseasonably warm weather aided maturation and harvesting of spring crops. Large sections of the Prairies were completely dry, and few other agricultural districts recorded more than 5 mm of rainfall. In addition, the trend of warmer-than-normal weather continued, as weekly temperatures averaged from 1 to 4°C above normal. Despite the general pattern of warmth, temperatures varied considerably; daytime highs again reached the middle 30s (degrees C) in the southwestern Prairies, where nighttime

lows dropped below freezing for the first time this year. However, given the advanced point in the growing season, the frost likely had minimal if any impact on standing crops. According to the government of Alberta, harvesting was 37 percent complete as of September 6, lagging last year's pace (45 percent) but exceeding the 5-year average (27 percent). In contrast, crops were just 15 percent harvested in Manitoba, compared with 51 percent last year, as a result of season-long delays in development.

## SOUTHEASTERN CANADA

Total Precipitation(mm)

September 4 - 10, 2022



CLIMATE PREDICTION CENTER, NOAA  
Computer generated contours  
Based on preliminary data



## SOUTHEASTERN CANADA

Mild, sunny weather helped to advance summer crops toward maturity, while also supporting seasonal fieldwork. Following last week's rainfall, dry weather dominated the region, with few locations reporting more than 5 mm and large areas recording complete dryness. Weekly average temperatures were near to slightly above normal, with highest daytime

temperatures reaching the upper 20s (degrees C) regionwide and nighttime lows staying well above freezing. While favoring maturing crops – and allowing field activities to progress unimpeded – additional moisture will be needed soon to ensure uniform germination of winter wheat, which typically takes place in September and early October.

## U.S. Crop Production Highlights

The following information was released by USDA's Agricultural Statistics Board on September 12, 2022. Forecasts refer to September 1.

**Corn** production for grain is forecast at 13.9 billion bushels, down 3 percent from the previous forecast and down 8 percent from 2021. U.S. yields are expected to average 172.5 bushels per harvested acre, down 2.9 bushels from the previous forecast and down 4.5 bushels from last year. Acreage updates were made in several states based on a thorough review of all available data. Total planted area, at 88.6 million acres, is down 1 percent from the previous estimate and down 5 percent from the previous year. Area harvested for grain is forecast at 80.8 million acres, down 1 percent from the previous forecast and down 5 percent from the previous year.

**Soybean** production for beans is forecast at 4.38 billion bushels, down 3 percent from the previous forecast and down 1 percent from 2021. U.S. yields are expected to average 50.5 bushels per acre, down 1.4 bushels from the previous forecast and down 0.9 bushel from 2021. Total planted area, at 87.5 million acres, is down 1 percent from the previous estimate but up less than 1 percent from the previous year. Area harvested for beans in the U.S. is forecast at 86.6 million acres, down 1 percent from the previous forecast but up less than 1 percent from 2021. Acreage updates were made in several states based on a thorough review of all available data.

**All cotton** production is forecast at 13.8 million 480-pound bales, up 10 percent from the previous forecast but down 21 percent from 2021. U.S. yields are expected to average 843 pounds per harvested acre, down 3 pounds from the previous forecast but up 24 pounds from 2021. Upland cotton production is forecast at 13.4 million 480-pound bales, up 10 percent from the previous forecast but down 22 percent from 2021. Pima cotton production is forecast at 460,000 bales, up 13 percent from the previous forecast and up 39 percent from 2021. All cotton area harvested is forecast at 7.88 million acres, up 10 percent from the previous forecast but down 23 percent from 2021. All cotton planted area totaled 13.8 million acres, up 11 percent from the previous forecast and up 23 percent from 2021.

**California Navel orange** production for the 2022-2023 season is forecast at 1.52 million tons (38.0 million boxes), up 19 percent from last season. The initial forecast is based on an objective measurement survey conducted in California's Central Valley from mid-June to the beginning of September. The objective measurement survey indicated that fruit set was up 47 percent from last year, but the average fruit size was down 2 percent from last year. Harvest is expected to begin in October.

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