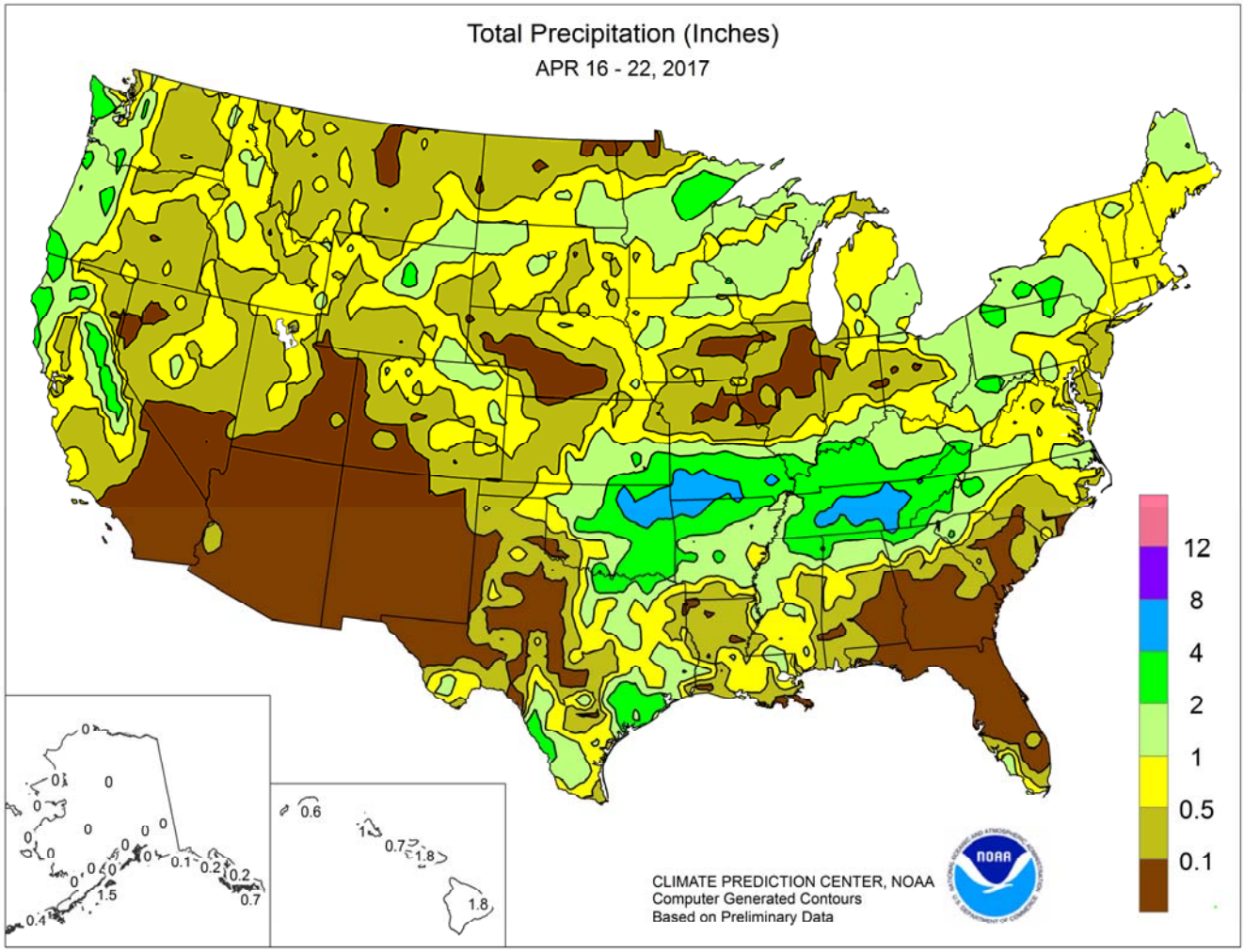
Volume 104, No. 17 http://www.usda.gov/oce/weather April 25, 2017

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

April 16 – 22, 2017

Highlights provided by USDA/WAOB

Active weather, featuring several individual disturbances, resulted in showery conditions across large sections of the country. For example, damp weather and wet fields maintained a slow pace of fieldwork and crop development in **northern California** and the **Northwest**. Periods of stormy weather extended eastward across the **northern and central Rockies**, as well as the **northern Plains** and **upper Midwest**. As a result, planting of crops such as corn, spring wheat, and sugarbeets, was restricted by soggy field conditions. Warm and notably drier weather

(Continued on page 5)

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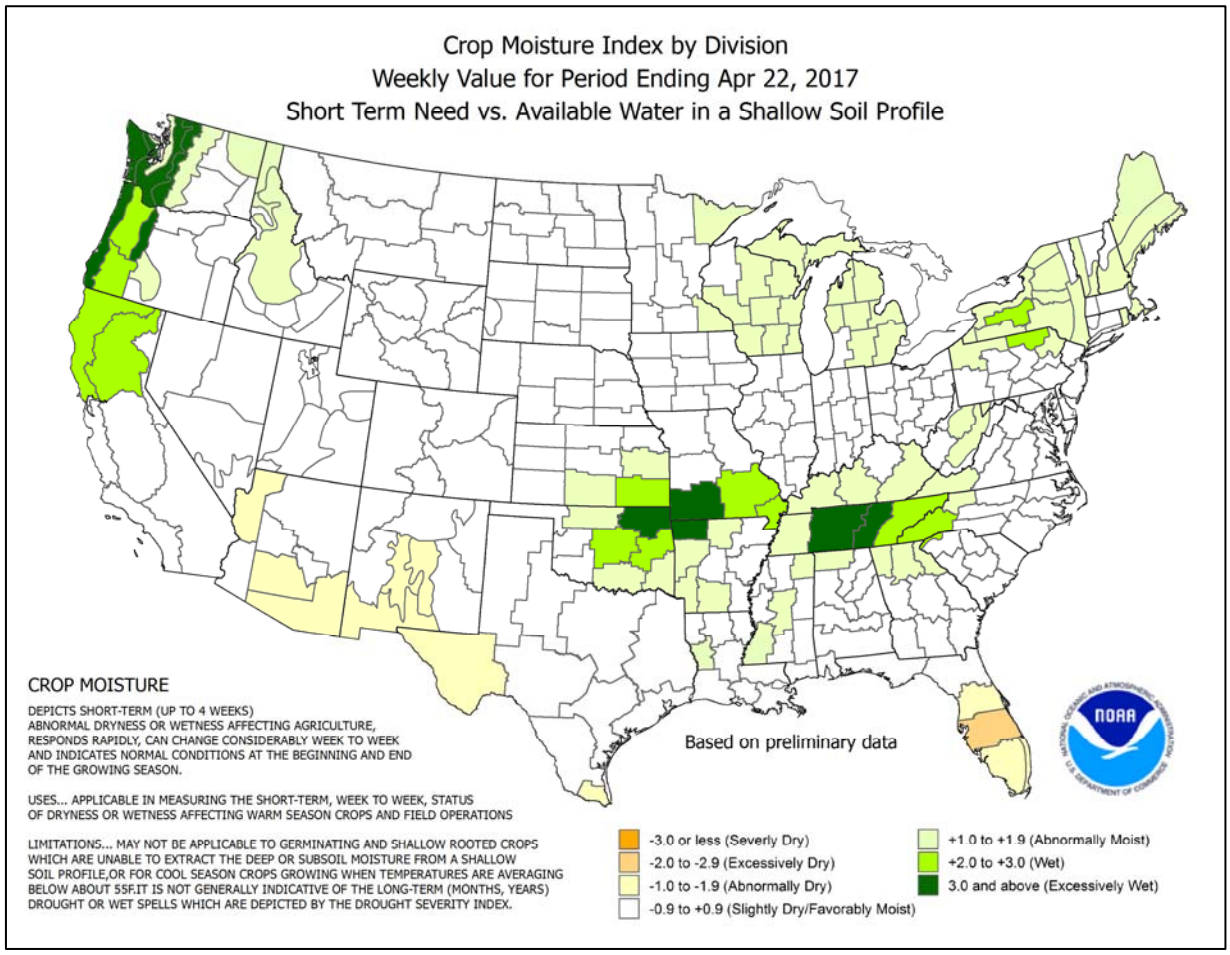
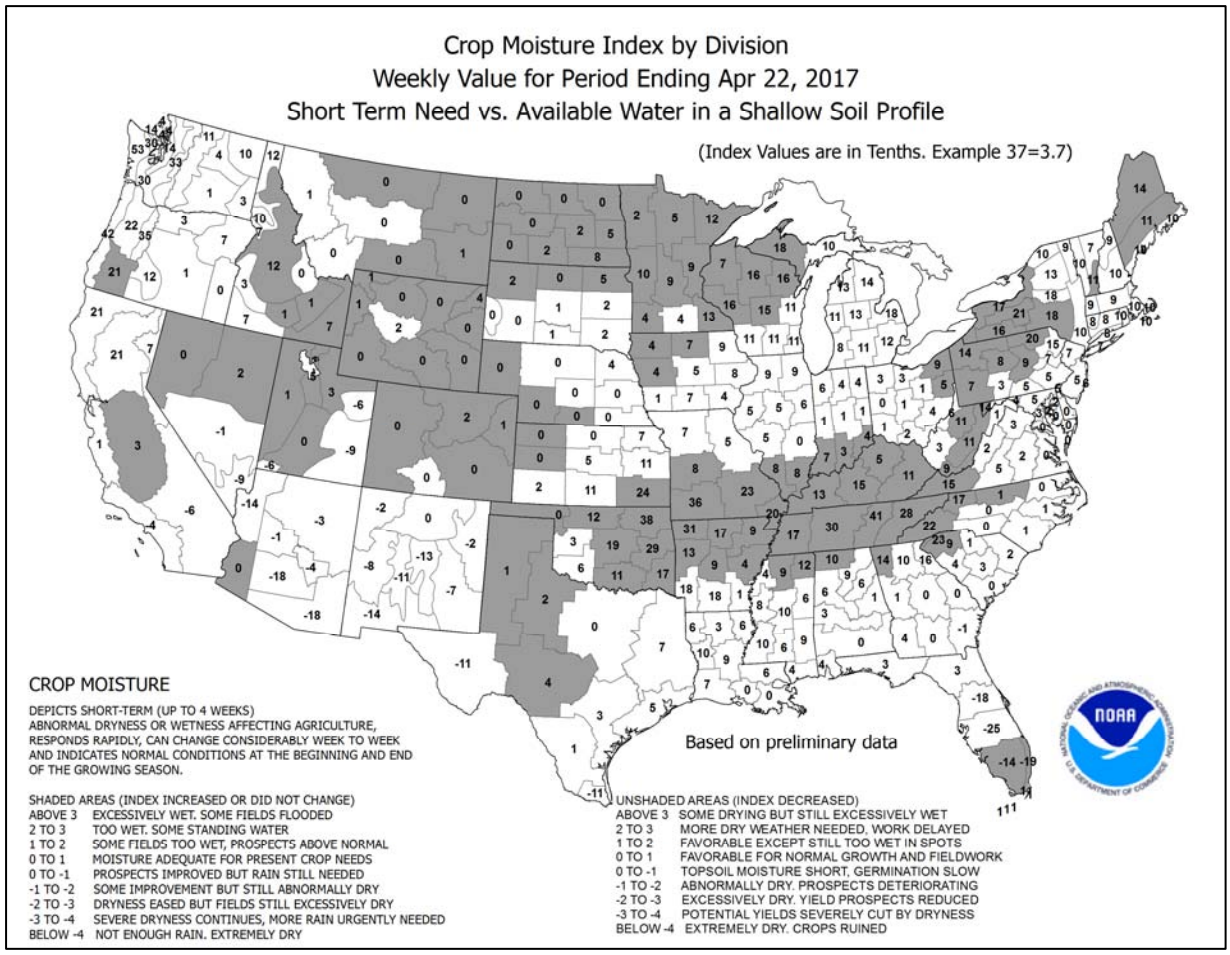
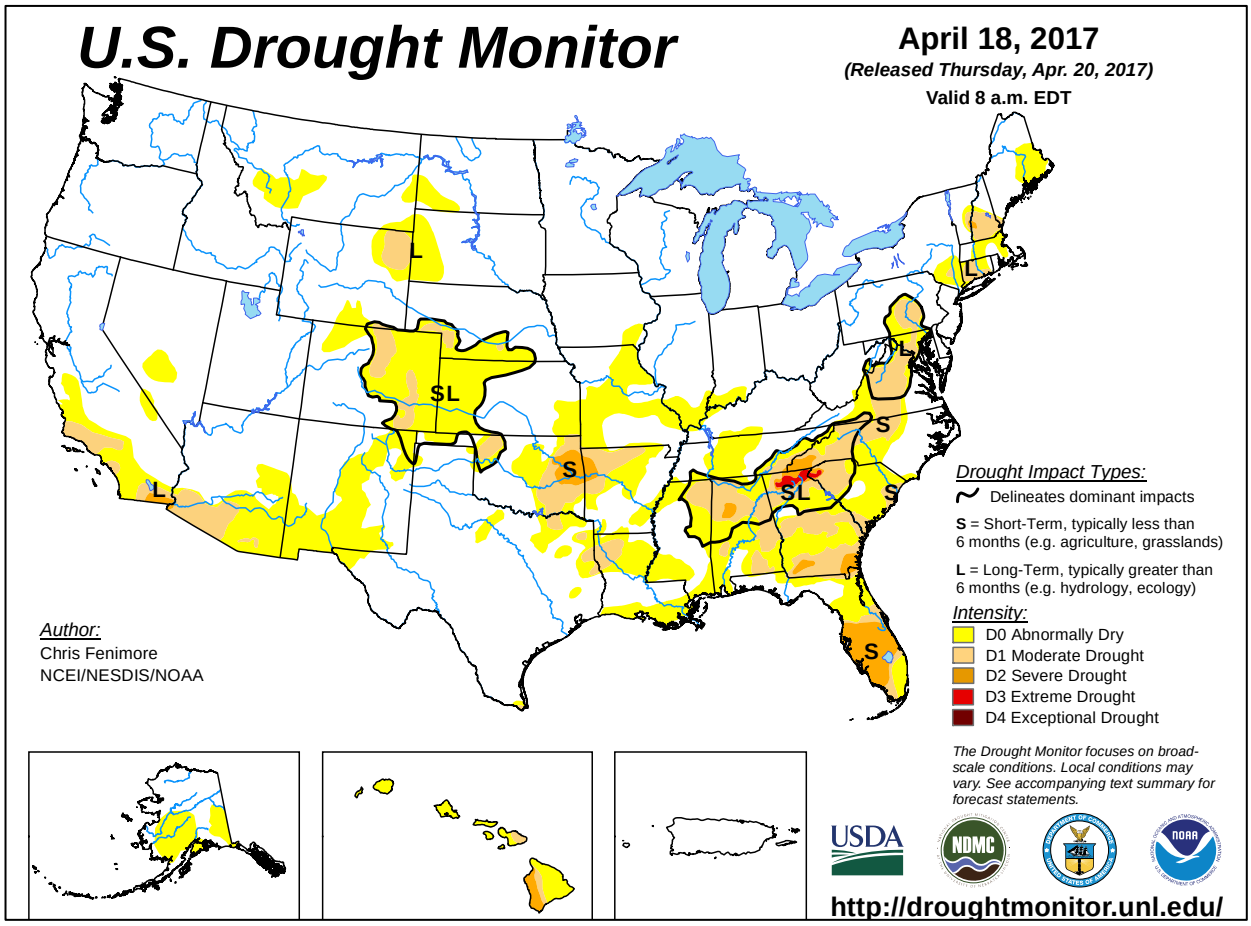
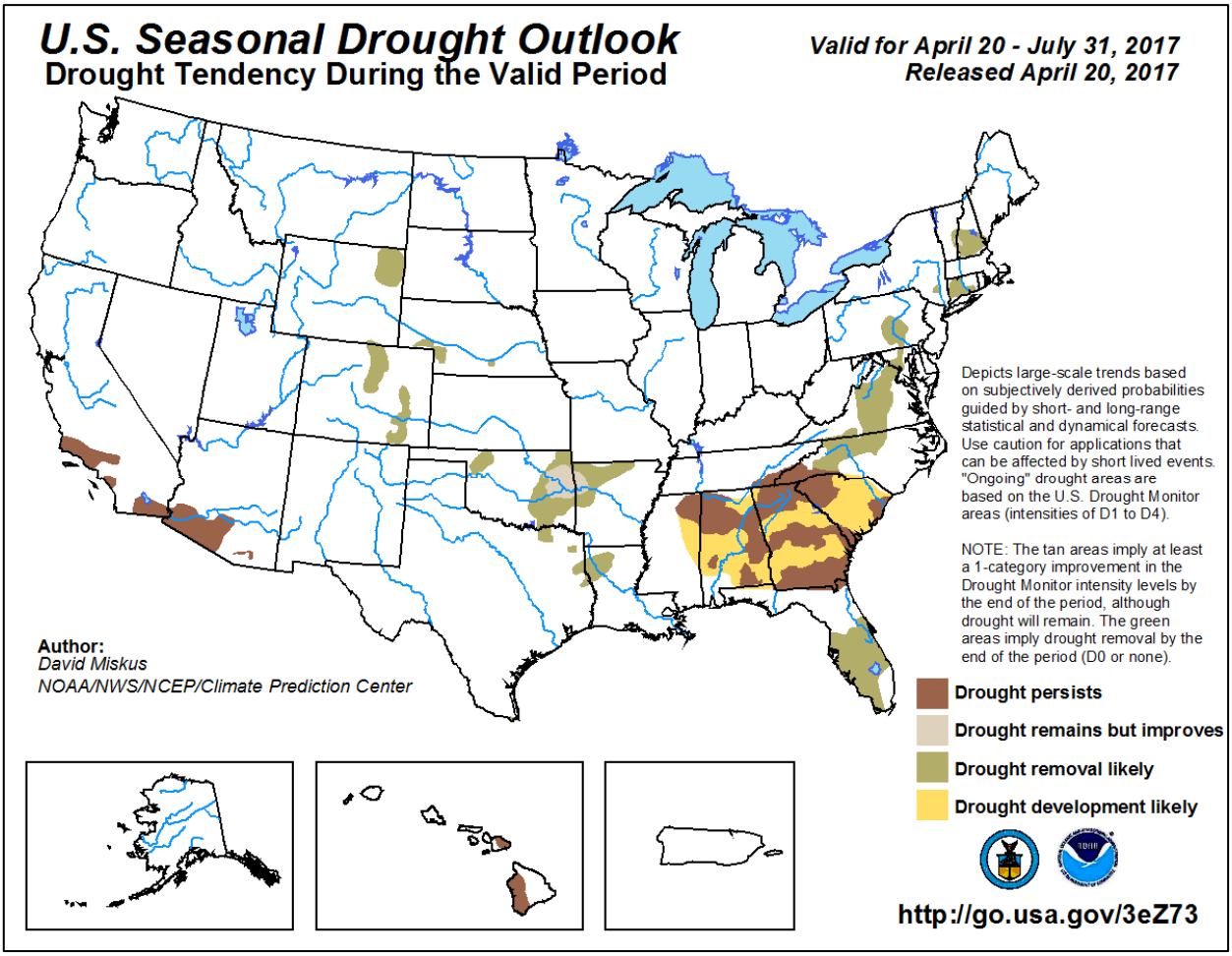
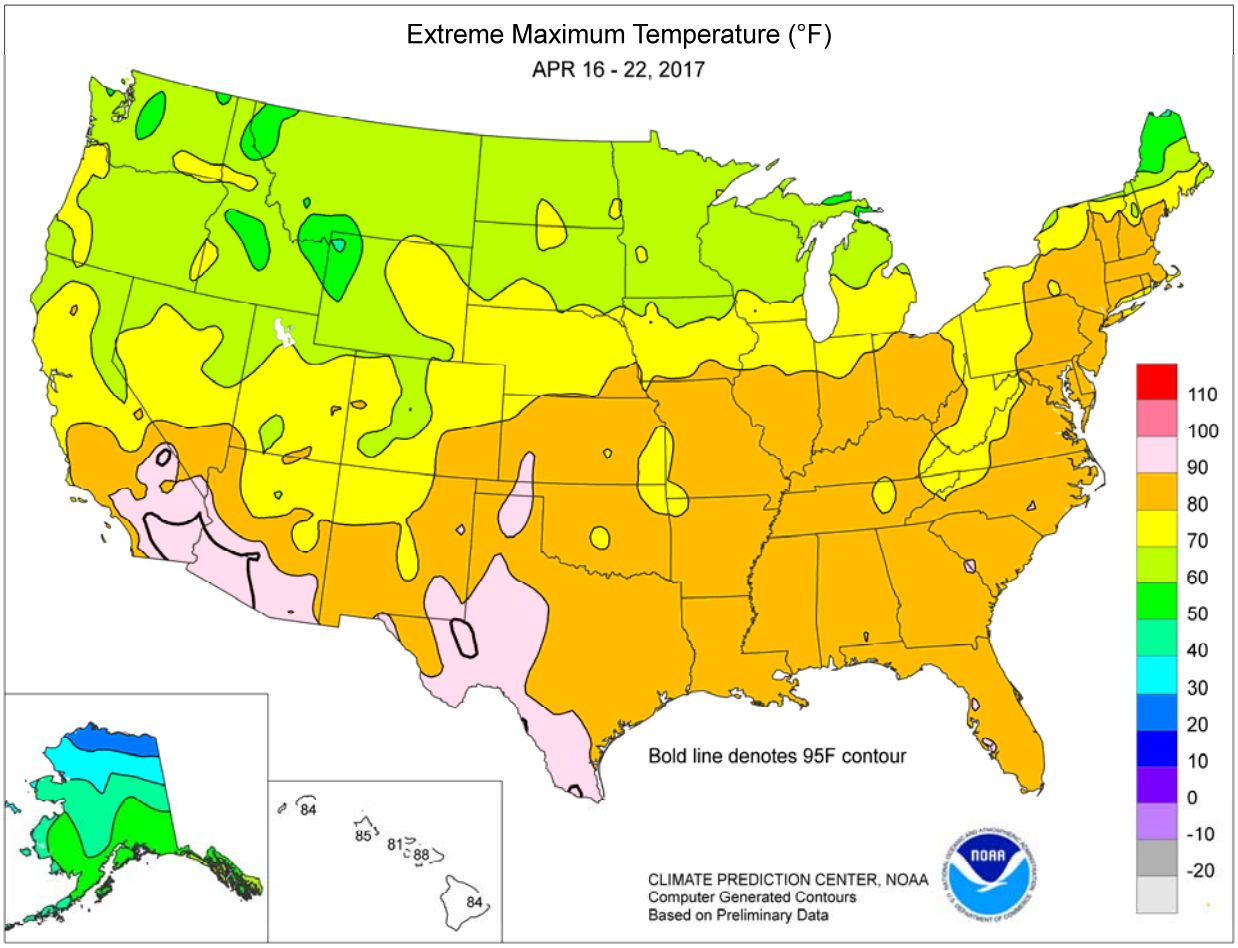
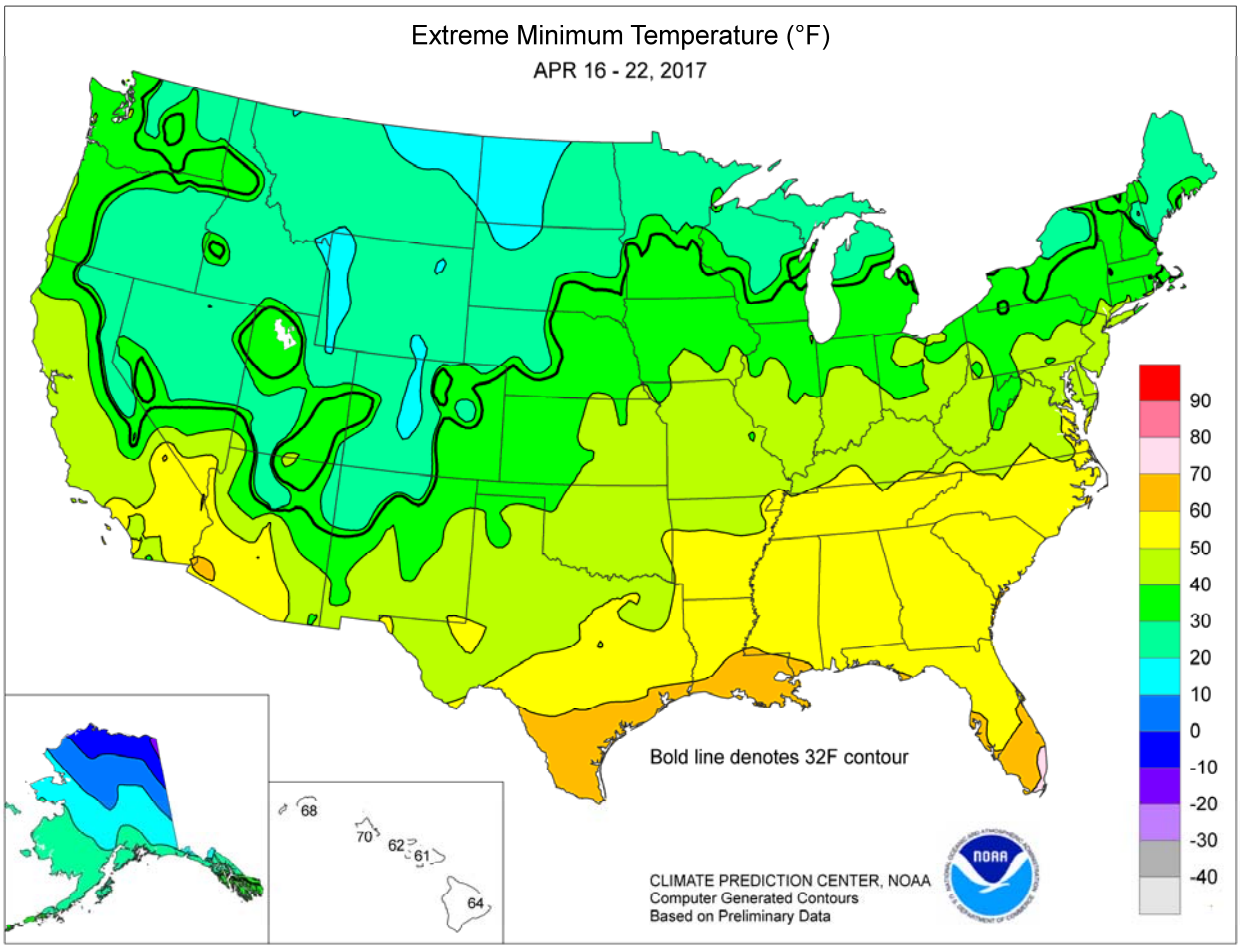

Crop Moisture Index by Division
Weekly Value for Period Ending Apr 22, 2017
Short Term Need vs. Available Water in a Shallow Soil Profile
CROP MOISTURE
DEPICTS SHORT-TERM (UP TO 4 WEEKS) ABNORMAL DRYNESS OR WETNESS AFFECTING AGRICULTURE, RESPONDS RAPIDLY, CAN CHANGE CONSIDERABLY WEEK TO WEEK AND INDICATES NORMAL CONDITIONS AT THE BEGINNING AND END OF THE GROWING SEASON.
USES... APPLICABLE IN MEASURING THE SHORT-TERM, WEEK TO WEEK, STATUS OF DRYNESS OR WETNESS AFFECTING WARM SEASON CROPS AND FIELD OPERATIONS
LIMITATIONS... MAY NOT BE APPLICABLE TO GERMINATING AND SHALLOW ROOTED CROPS WHICH ARE UNABLE TO EXTRACT THE DEEP OR SUBSOIL MOISTURE FROM A SHALLOW SOIL PROFILE,OR FOR COOL SEASON CROPS GROWING WHEN TEMPERATURES ARE AVERAGING BELOW ABOUT 55F.IT IS NOT GENERALLY INDICATIVE OF THE LONG-TERM (MONTHS, YEARS) DROUGHT OR WET SPELLS WHICH ARE DEPICTED BY THE DROUGHT SEVERITY INDEX.
Based on preliminary data
-3.0 or less (Severly Dry)
-2.0 to -2.9 (Excessively Dry)
-1.0 to -1.9 (Abnormally Dry)
-0.9 to +0.9 (Slightly Dry/Favorably Moist)
+1.0 to +1.9 (Abnormally Moist)
+2.0 to +3.0 (Wet)
3.0 and above (Excessively Wet)


Crop Moisture Index by Division
Weekly Value for Period Ending Apr 22, 2017
Short Term Need vs. Available Water in a Shallow Soil Profile
(Index Values are in Tenths. Example 37=3.7)
CROP MOISTURE
DEPICTS SHORT-TERM (UP TO 4 WEEKS) ABNORMAL DRYNESS OR WETNESS AFFECTING AGRICULTURE, RESPONDS RAPIDLY, CAN CHANGE CONSIDERABLY WEEK TO WEEK AND INDICATES NORMAL CONDITIONS AT THE BEGINNING AND END OF THE GROWING SEASON.
SHADED AREAS (INDEX INCREASED OR DID NOT CHANGE)
ABOVE 3 EXCESSIVELY WET. SOME FIELDS FLOODED
2 TO 3 TOO WET. SOME STANDING WATER
1 TO 2 SOME FIELDS TOO WET, PROSPECTS ABOVE NORMAL
0 TO 1 MOISTURE ADEQUATE FOR PRESENT CROP NEEDS
0 TO -1 PROSPECTS IMPROVED BUT RAIN STILL NEEDED
-1 TO -2 SOME IMPROVEMENT BUT STILL ABNORMALLY DRY
-2 TO -3 DRYNESS EASED BUT FIELDS STILL EXCESSIVELY DRY
-3 TO -4 SEVERE DRYNESS CONTINUES, MORE RAIN URGENTLY NEEDED
BELOW -4 NOT ENOUGH RAIN. EXTREMELY DRY
UNSHADED AREAS (INDEX DECREASED)
ABOVE 3 SOME DRYING BUT STILL EXCESSIVELY WET
2 TO 3 MORE DRY WEATHER NEEDED. WORK DELAYED
1 TO 2 FAVORABLE EXCEPT STILL TOO WET IN SPOTS
0 TO 1 FAVORABLE FOR NORMAL GROWTH AND FIELDWORK
0 TO -1 TOPSOIL MOISTURE SHORT. GERMINATION SLOW
-1 TO -2 ABNORMALLY DRY. PROSPECTS DETERIORATING
-2 TO -3 EXCESSIVELY DRY. YIELD PROSPECTS REDUCED
-3 TO -4 POTENTIAL YIELDS SEVERELY CUT BY DRYNESS
BELOW -4 EXTREMELY DRY. CROPS RUINED
Based on preliminary data

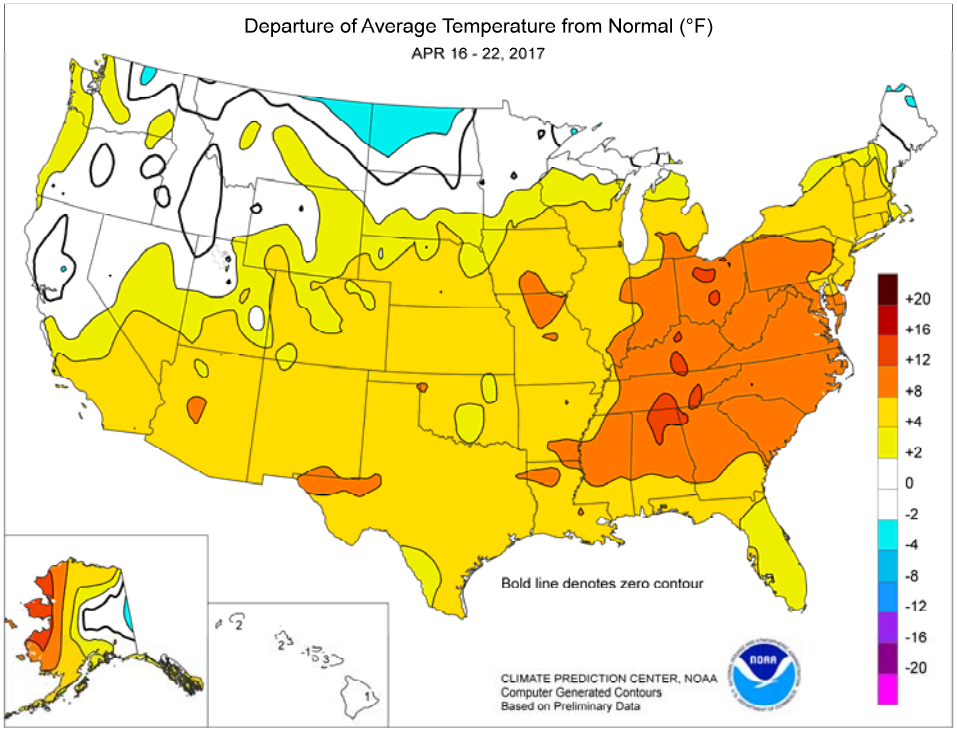

U.S. Drought Monitor
April 18, 2017
(Released Thursday, Apr. 20, 2017)
Valid 8 a.m. EDT
Author:
Chris Fenimore
NCEI/NESDIS/NOAA
Drought Impact Types:
Delineates dominant impacts
S = Short-Term, typically less than 6 months (e.g. agriculture, grasslands)
L = Long-Term, typically greater than 6 months (e.g. hydrology, ecology)
Intensity:
D0 Abnormally Dry
D1 Moderate Drought
D2 Severe Drought
D3 Extreme Drought
D4 Exceptional Drought
The Drought Monitor focuses on broad-scale conditions. Local conditions may vary. See accompanying text summary for forecast statements.
USDA
NDMC
NOAA
http://droughtmonitor.unl.edu/


U.S. Seasonal Drought Outlook
Drought Tendency During the Valid Period
Valid for April 20 - July 31, 2017
Released April 20, 2017
Author:
David Miskus
NOAA/NWS/NCEP/Climate Prediction Center
Depicts large-scale trends based on subjectively derived probabilities guided by short- and long-range statistical and dynamical forecasts. Use caution for applications that can be affected by short lived events. "Ongoing" drought areas are based on the U.S. Drought Monitor areas (intensities of D1 to D4).
NOTE: The tan areas imply at least a 1-category improvement in the Drought Monitor intensity levels by the end of the period, although drought will remain. The green areas imply drought removal by the end of the period (D0 or none).
Drought persists
Drought remains but improves
Drought removal likely
Drought development likely
http://go.usa.gov/3eZ73


Extreme Maximum Temperature (°F)
APR 16 - 22, 2017
110
100
90
80
70
60
50
40
30
20
10
0
-10
-20
Bold line denotes 95F contour
84
85
81
88
84
CLIMATE PREDICTION CENTER, NOAA
Computer Generated Contours
Based on Preliminary Data
NOAA


Extreme Minimum Temperature (°F)
APR 16 - 22, 2017
90
80
70
60
50
40
30
20
10
0
-10
-20
-30
-40
Bold line denotes 32F contour
68
70
62
61
64
CLIMATE PREDICTION CENTER, NOAA
Computer Generated Contours
Based on Preliminary Data
NOAA

(Continued from front cover)

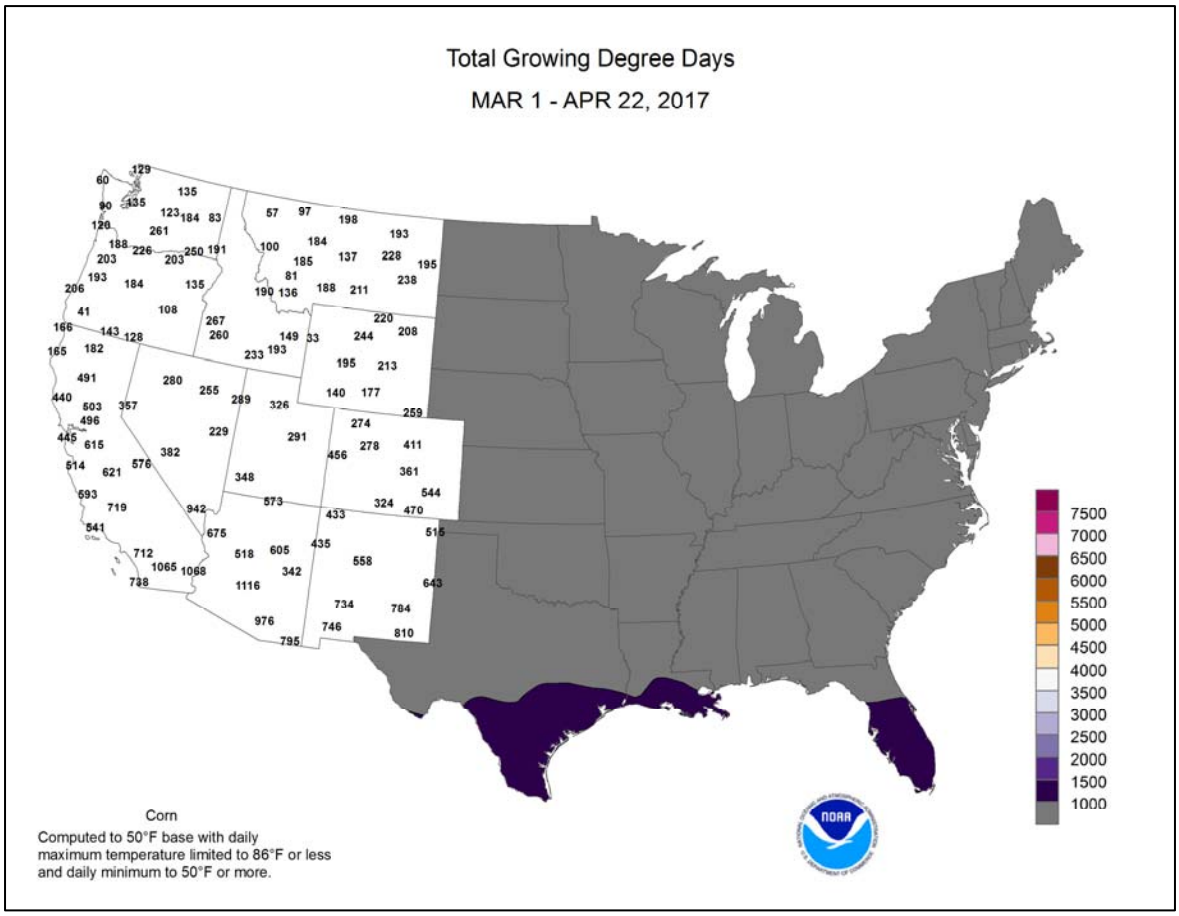


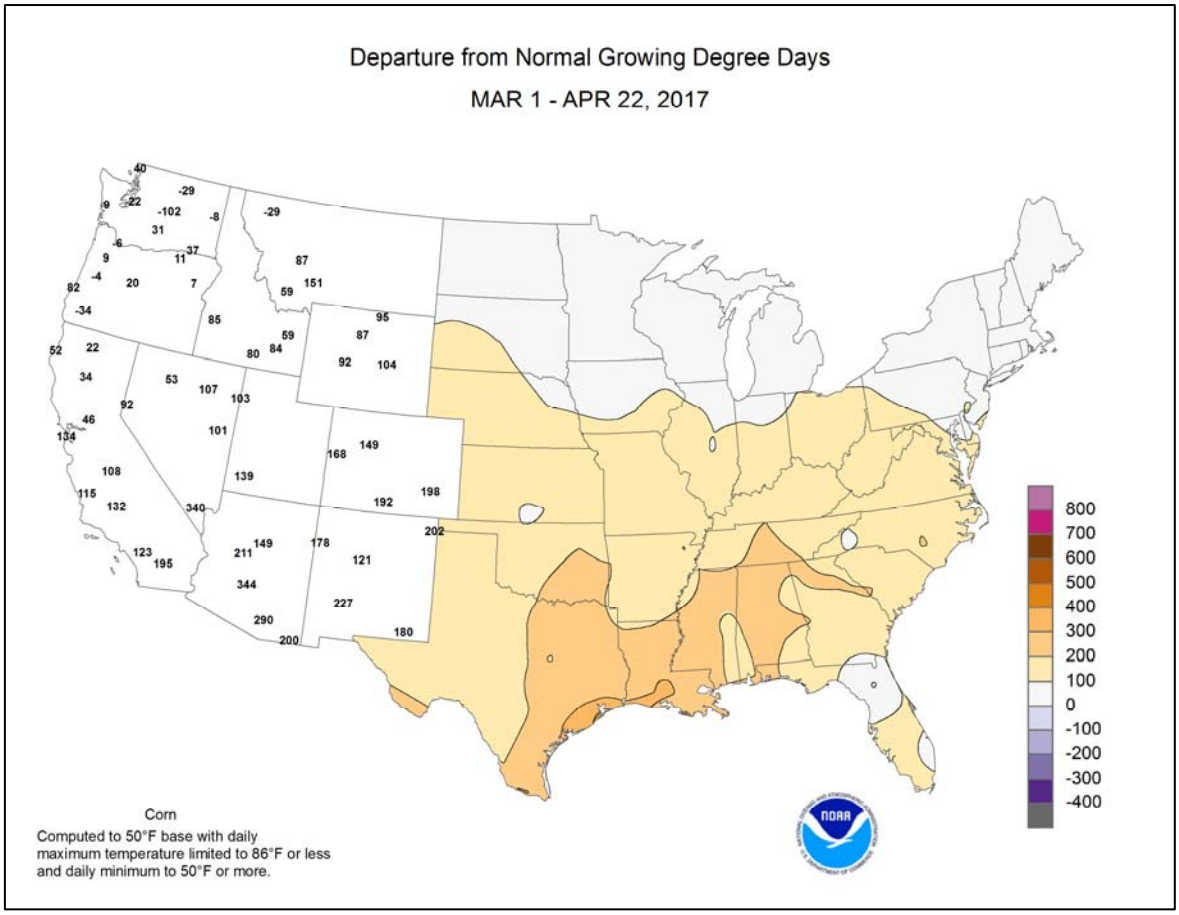
prevailed across the **lower Midwest**, allowing corn planting and other early-season fieldwork to proceed. Farther south, a late-week storm system brought heavy rain and cooler weather to a belt stretching eastward from the **southern Plains and mid-South**. The rain, while disruptive to fieldwork, benefited emerging summer crops and further eased pockets of long-term **Southeastern** drought. Elsewhere, much-needed rain developed on Sunday, April 23, across **southern Florida**, where several significant wildfires had previously flared. However, most of the remainder of the **lower Southeast** remained warm and unfavorably dry. Weekly temperatures averaged as much as 10°F above normal from portions of **Mississippi, Alabama, and Georgia northward into the Ohio Valley**.

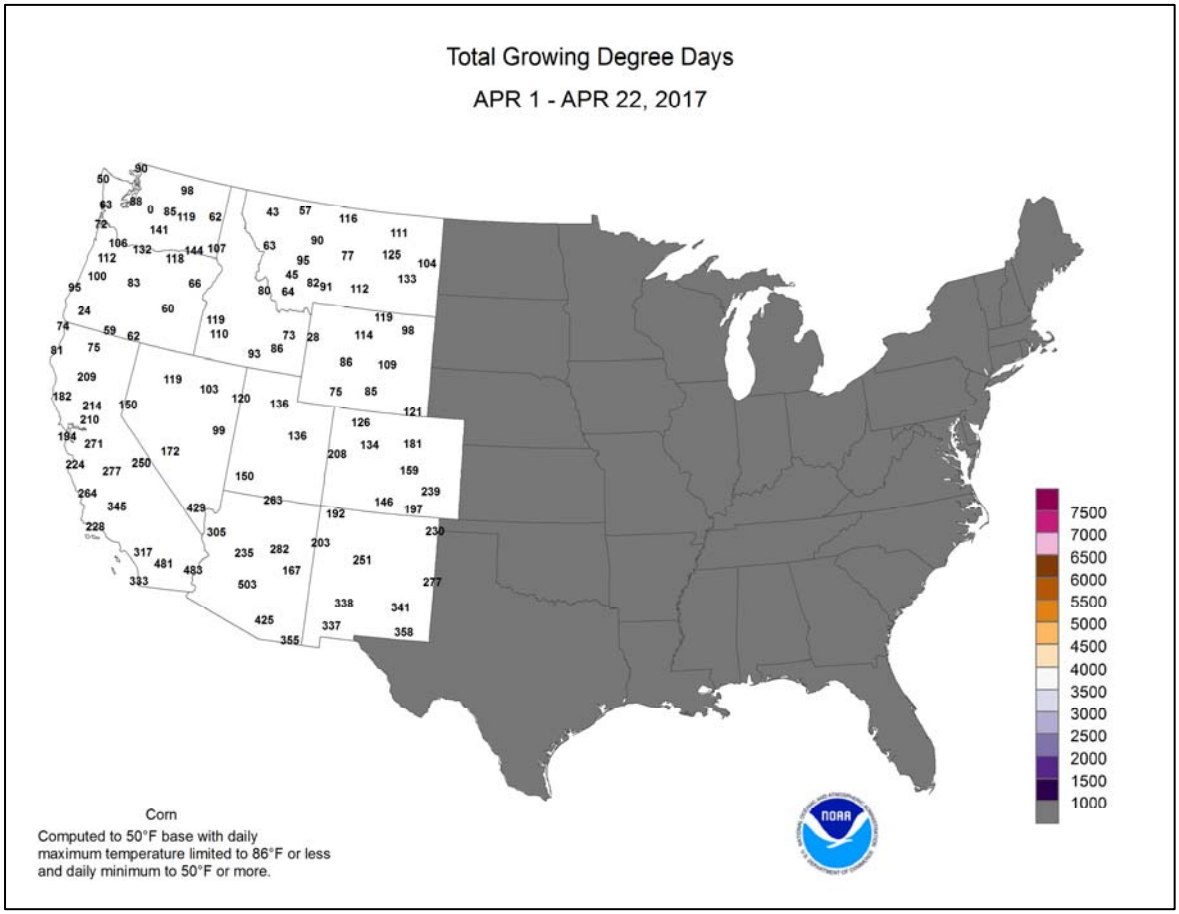
Ongoing showery weather in the **Northwest** led to record-setting October-April precipitation in **Seattle, WA**. Seattle's total from October 1 – April 23 reached 44.63 inches (147 percent of normal), edging the October-April standard of 44.52 inches, set just last year in 2015-16. **Seattle** also set a record of 143 days with measurable precipitation from October 1 – April 23, shattering the October-April standard of 137 days set in 1998-99 and 2010-11. Meanwhile, multiple rounds of heavy rain struck the **mid-South** and environs. On April 17, daily-record rainfall totals included 3.40 inches in **Jacksonville (Little Rock Air Force Base), AR**, and 2.36 inches in **McAlester, OK**. Meanwhile, daily-record totals across the **interior Northwest** reached 0.51 inch (on April 17) in **Spokane, WA**, and 0.54 inch (on April 18) in **Big Piney, WY**. On April 20, heavy showers in the **Northeast** resulted in the wettest April day on record in **Buffalo, NY**. **Buffalo's** total of 1.95 inches edged its April daily record of 1.77 inches, originally set on April 3, 1903. On April 21, showers and thunderstorms erupted across the **southern Plains** and **mid-South**, resulting in daily-record totals in locations such as **Tulsa, OK** (3.19 inches); **Fayetteville, AR** (2.74 inches); and **Cape Girardeau, MO** (2.40 inches). On the same date, snow blanketed **northern New England**, where **Caribou, ME**, received a daily-record sum of 4.1 inches. In fact, **Caribou** noted measurable snow each day from April 17-22, totaling 8.4 inches. Meanwhile in **southern Florida's Big Cypress National Preserve**, the Cowbell and Parliament fires each consumed more than 20,000 acres of vegetation. Significant rain spread across **southern Florida** on April 23, with **Southwest Florida International Airport** in **Fort Myers** receiving 3.76 inches between midnight and 10 a.m., compared to 4.16 inches during the 204-day period from October 1, 2016 – April 22, 2017.

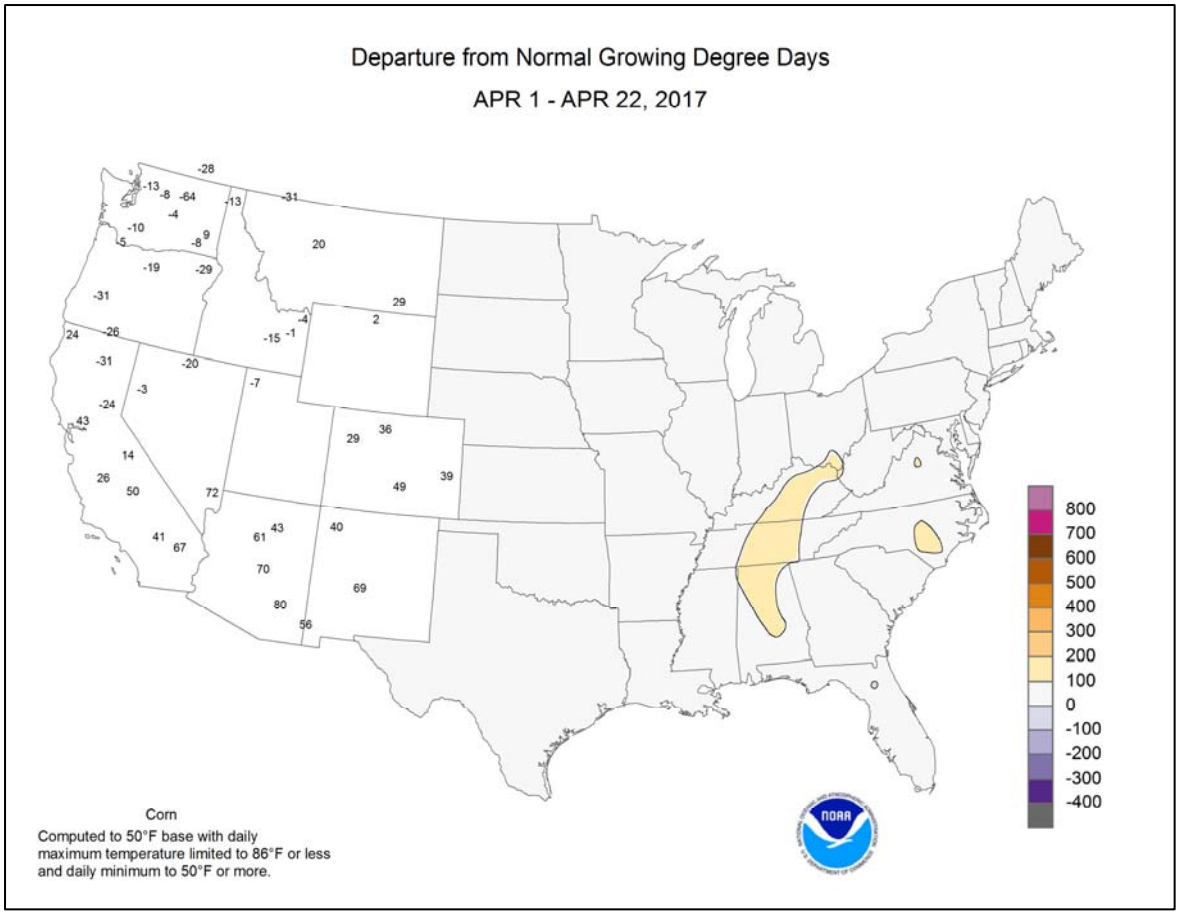
A brief, early-week surge of warmth pushed temperatures above the 80-degree mark as far north as **New England**. On April 16, **Portland, ME**, posted a daily-record high of 86°F. By mid-week, warmth in advance of a storm system produced daily-record highs for April 19 in locations such as **Borger, TX** (93°F), and **St. Louis, MO** (88°F). Subsequently, late-week heat in the **Southeast** led to several daily-record highs, including 88°F (on April 20) in **Birmingham, AL**; 88°F (on April 21) in **Athens, GA**; and 90°F (on April 22) in **Augusta, GA**. Meanwhile, hot weather also developed across **southern California**, where daily-record highs soared to 91°F in **Camarillo** (on April 21) and **Ramona** (on April 22). In stark contrast, cool air associated with a developing storm system resulted in maximum temperatures reaching just 50°F on April 22 in **Missouri** locations such as **Joplin** and **West Plains**.

Mostly dry weather and near- to above-normal temperatures covered **mainland Alaska**, while occasional showers fell across the state's southern tier. Weekly temperatures averaged at least 10°F above normal across much of **western Alaska**. Early-season warmth also prevailed in **southeastern Alaska**, where **Annette Island** posted daily-record highs (64 and 69°F, respectively) on April 17 and 22. Farther south, beneficial showers dotted **Hawaii**. In **Kahului, Maui**, April 1-19 rainfall totaled just 0.12 inch. However, **Kahului**, received 1.66 inches on April 20-21, aided by a daily-record sum of 1.34 inches on the 20th. On the **Big Island**, **Hilo** netted 2.03 inches from April 16-18. Through, April 22, **Hilo's** month-to-date rainfall totaled 4.15 inches (47 percent of normal).


Total Growing Degree Days
MAR 1 - APR 22, 2017
7500
7000
6500
6000
5500
5000
4500
4000
3500
3000
2500
2000
1500
1000
Corn
Computed to 50°F base with daily maximum temperature limited to 86°F or less and daily minimum to 50°F or more.


Departure from Normal Growing Degree Days
MAR 1 - APR 22, 2017
800
700
600
500
400
300
200
100
0
-100
-200
-300
-400
Corn
Computed to 50°F base with daily maximum temperature limited to 86°F or less and daily minimum to 50°F or more.


Total Growing Degree Days
APR 1 - APR 22, 2017
7500
7000
6500
6000
5500
5000
4500
4000
3500
3000
2500
2000
1500
1000
Corn
Computed to 50°F base with daily maximum temperature limited to 86°F or less and daily minimum to 50°F or more.


Departure from Normal Growing Degree Days
APR 1 - APR 22, 2017
800
700
600
500
400
300
200
100
0
-100
-200
-300
-400
Corn
Computed to 50°F base with daily maximum temperature limited to 86°F or less and daily minimum to 50°F or more.

National Weather Data for Selected Cities

Weather Data for the Week Ending April 22, 2017

Data Provided by Climate Prediction Center

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS TEMP. °F		NUMBER OF DAYS PRECIP	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE MAR 1	PCT. NORMAL SINCE MAR 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
AL	BIRMINGHAM	85	63	88	59	74	12	0.07	-0.95	0.07	9.73	101	19.39	101	87	36	0	0	1	0
	HUNTSVILLE	86	63	89	62	75	14	0.91	-0.06	0.87	6.78	67	15.66	76	92	57	0	0	4	1
	MOBILE	84	61	86	58	73	7	0.33	-0.75	0.33	6.41	58	18.62	85	94	47	0	0	1	0
	MONTGOMERY	87	61	88	58	74	10	0.00	-0.96	0.00	5.16	53	19.86	98	84	35	0	0	0	0
AK	ANCHORAGE	50	29	56	26	40	3	0.00	-0.11	0.00	0.69	69	3.39	140	74	49	0	6	0	0
	BARROW	17	-1	21	-10	8	8	0.00	-0.03	0.00	1.55	1292	2.39	664	84	69	0	7	0	0
	FAIRBANKS	41	21	52	19	31	-2	0.00	-0.03	0.00	0.26	70	2.46	191	54	42	0	7	0	0
	JUNEAU	52	35	62	27	43	2	0.15	-0.52	0.06	5.11	92	15.69	109	91	68	0	2	4	0
	KODIAK	46	33	52	27	40	3	1.54	0.27	1.35	7.16	79	12.71	55	90	72	0	4	3	1
	NOME	39	26	46	21	33	13	0.00	-0.14	0.00	0.13	13	1.58	59	72	56	0	7	0	0
AZ	FLAGSTAFF	68	32	70	27	50	7	0.00	-0.26	0.00	1.96	54	8.85	106	64	12	0	5	0	0
	PHOENIX	93	64	96	62	79	8	0.00	-0.03	0.00	0.06	5	2.40	83	27	14	7	0	0	0
	PRESCOTT	76	43	80	40	59	9	0.00	-0.14	0.00	0.79	32	4.25	72	53	12	0	0	0	0
	TUCSON	91	57	95	55	74	8	0.00	-0.04	0.00	0.21	21	1.58	55	23	13	7	0	0	0
AR	FORT SMITH	76	59	84	51	68	6	3.07	2.19	1.78	7.58	114	12.39	107	90	58	0	0	4	2
	LITTLE ROCK	76	60	83	50	68	6	1.36	0.09	0.77	7.14	81	12.14	77	100	64	0	0	4	1
CA	BAKERSFIELD	79	54	87	51	67	4	0.33	0.26	0.33	0.51	28	4.73	112	72	50	0	0	1	0
	FRESNO	74	52	80	49	63	2	0.34	0.21	0.22	4.50	155	12.52	174	89	61	0	0	3	0
	LOS ANGELES	74	56	83	53	65	4	0.00	-0.10	0.00	0.47	16	11.95	132	93	59	0	0	0	0
	REDDING	68	48	82	44	58	0	0.51	0.03	0.34	8.18	114	27.21	142	88	57	0	0	5	0
	SACRAMENTO	68	50	78	46	59	0	0.58	0.39	0.30	5.31	144	23.49	212	96	51	0	0	5	0
	SAN DIEGO	75	59	82	57	67	4	0.01	-0.11	0.01	0.09	3	6.81	93	80	53	0	0	1	0
	SAN FRANCISCO	66	52	74	49	59	3	0.40	0.18	0.13	5.24	121	22.00	172	82	69	0	0	4	0
	STOCKTON	71	49	79	44	60	0	0.73	0.55	0.35	4.04	130	15.52	188	97	63	0	0	4	0
CO	ALAMOSA	67	28	74	21	48	7	0.01	-0.10	0.01	1.09	135	2.74	216	72	20	0	6	1	0
	CO SPRINGS	64	42	75	35	53	7	0.90	0.53	0.51	2.29	108	2.68	97	86	32	0	0	4	1
	DENVER INTL	67	37	78	31	52	7	0.27	0.06	0.11	1.50	106	2.27	121	80	30	0	2	3	0
	GRAND JUNCTION	72	43	81	36	58	7	0.03	-0.14	0.02	0.57	36	2.12	79	49	23	0	0	2	0
	PUEBLO	71	44	84	39	58	8	0.64	0.36	0.35	3.29	181	4.21	175	80	42	0	0	4	0
CT	BRIDGEPORT	62	49	78	45	55	6	0.73	-0.18	0.33	8.17	115	13.36	97	83	57	0	0	4	0
	HARTFORD	65	44	88	39	55	6	0.60	-0.28	0.29	6.76	101	12.74	95	86	61	0	0	5	0
DC	WASHINGTON	75	58	89	51	66	9	0.63	0.04	0.31	4.15	75	7.58	66	85	56	0	0	4	0
DE	WILMINGTON	69	52	86	46	60	7	0.64	-0.11	0.40	6.74	105	10.76	85	96	53	0	0	4	0
FL	DAYTONA BEACH	82	60	83	57	71	2	0.02	-0.51	0.02	2.29	39	6.30	54	99	49	0	0	1	0
	JACKSONVILLE	84	57	86	54	71	4	0.00	-0.69	0.00	1.81	29	7.21	55	100	43	0	0	0	0
	KEY WEST	80	73	82	71	76	-1	1.86	1.39	1.15	4.67	140	7.72	109	86	72	0	0	4	1
	MIAMI	82	73	83	72	78	2	0.05	-0.72	0.03	4.03	81	8.74	98	73	53	0	0	2	0
	ORLANDO	88	62	90	58	75	4	0.00	-0.51	0.00	0.14	3	3.07	30	87	36	2	0	0	0
	PENSACOLA	81	68	82	64	74	7	0.00	-0.81	0.00	2.63	28	17.98	92	90	56	0	0	0	0
	TALLAHASSEE	86	58	88	54	72	6	0.01	-0.71	0.01	4.33	46	14.26	74	90	44	0	0	1	0
	TAMPA	88	69	89	66	78	7	0.00	-0.37	0.00	1.58	38	4.50	49	74	39	0	0	0	0
	WEST PALM BEACH	82	72	84	71	77	3	0.10	-0.68	0.10	1.63	26	5.17	41	70	50	0	0	1	0
GA	ATHENS	83	59	88	55	71	10	0.08	-0.64	0.06	8.62	114	16.32	98	92	63	0	0	2	0
	ATLANTA	82	63	85	61	72	10	0.02	-0.76	0.02	7.50	93	17.55	99	88	52	0	0	1	0
	AUGUSTA	87	58	91	53	73	10	0.00	-0.63	0.00	3.10	44	15.33	98	91	46	2	0	0	0
	COLUMBUS	86	62	88	60	74	10	0.39	-0.44	0.39	3.20	37	17.46	97	82	35	0	0	1	0
	MACON	86	57	89	55	72	9	0.00	-0.68	0.00	2.94	40	16.14	96	93	36	0	0	0	0
	SAVANNAH	86	62	89	58	74	9	0.00	-0.74	0.00	3.34	54	12.17	93	90	42	0	0	0	0
HI	HILO	80	66	84	64	73	1	1.83	-1.03	1.30	7.20	30	25.71	60	92	74	0	0	4	1
	HONOLULU	83	72	85	70	77	1	0.45	0.21	0.18	3.25	119	10.57	136	79	68	0	0	4	0
	KAHULUI	85	68	88	61	77	3	1.76	1.37	1.65	5.92	157	8.40	85	85	74	0	0	3	1
	LIHUE	81	70	84	68	76	2	0.56	-0.11	0.29	5.32	92	11.80	87	78	68	0	0	4	0
ID	BOISE	63	41	70	34	52	1	0.63	0.35	0.43	3.90	170	8.08	167	77	48	0	0	3	0
	LEWISTON	64	42	74	38	53	2	0.51	0.26	0.33	4.45	228	7.23	179	86	63	0	0	2	0
	POCATELLO	58	35	67	25	47	1	0.59	0.34	0.40	2.87	132	8.82	203	88	59	0	2	3	0
IL	CHICAGO/O'HARE	68	45	76	38	56	8	0.65	-0.22	0.64	7.32	138	11.71	135	77	47	0	0	2	1
	MOLINE	70	46	77	40	58	7	0.68	-0.20	0.46	6.69	119	9.10	104	84	49	0	0	2	0
	PEORIA	71	51	82	44	61	9	0.38	-0.45	0.35	7.28	138	9.94	118	84	40	0	0	2	0
	ROCKFORD	68	44	75	38	56	8	0.42	-0.43	0.30	6.90	139	10.93	142	79	46	0	0	2	0
	SPRINGFIELD	73	51	85	44	62	9	0.83	0.06	0.65	7.05	128	8.72	98	80	41	0	0	2	1
IN	EVANSVILLE	74	57	84	46	66	10	2.94	1.91	1.56	7.09	95	10.36	77	87	61	0	0	6	2
	FORT WAYNE	71	49	81	40	60	11	0.35	-0.48	0.29	6.27	117	12.74	136	80	45	0	0	3	0
	INDIANAPOLIS	71	54	81	45	62	10	0.28	-0.54	0.28	6.18	103	11.63	107	71	40	0	0	1	0
	SOUTH BEND	68	43	76	35	55	6	0.33	-0.52	0.20	5.93	107	12.92	132	88	61	0	0	3	0
IA	BURLINGTON	70	49	81	43	60	7	1.00	0.17	0.53	5.35	98	7.21	87	88	44	0	0	3	1
	CEDAR RAPIDS	69	44	75	37	56	6	0.06	-0.68	0.04	4.31	96	6.48	98	96	44	0	0	3	0
	DES MOINES	71	48	80	41	60	9	0.22	-0.63	0.17	5.61	120	8.12	118	78	48	0	0	2	0
	DUBUQUE	64	42	71	35	53	5	0.11	-0.70	0.10	5.89	118	9.70	126	85	52	0	0	2	0
	SIOUX CITY	64	40	74	32	52	2	0.42	-0.21	0.35	2.85	74	5.44	107	93	53	0	2	2	0
	WATERLOO	67	42	73	34	54	6	0.53	-0.23	0.53	4.50	103	8.43	135	85	50	0	0	1	1
KS	CONCORDIA	69	48	81	42	59	6	1.01	0.48	0.97	6.14	155	7.99	149	92	57	0	0	3	1
	DODGE CITY	71	50	88	37	60	6	0.77	0.26	0.46	8.38	247	10.95	234	91	48	0	0	2	0
	GOODLAND	66	42	78	34	54	5	0.83	0.51	0.71	2.83	137	3.76	128	92	62	0	0	3	1
	TOPEKA	71	51	82	44	61	6	0.60	-0.11	0.37	8.51	182	9.90	146	91	58	0	0	4	0

Based on 1971-2000 normals

***** Not Available**

Weather Data for the Week Ending April 22, 2017

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS			
																	TEMP. °F		PRECIP	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE MAR 1	PCT. NORMAL SINCE MAR 1	TOTAL, IN., SINCE JAN01	PCT. NORMAL SINCE JAN01	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
	WICHITA	71	54	82	44	63	7	3.86	3.30	2.05	9.10	203	12.72	200	92	68	0	0	4	3
KY	JACKSON	73	57	84	46	65	8	2.11	1.26	1.26	7.64	109	15.21	107	89	58	0	0	6	1
	LEXINGTON	73	58	86	45	66	11	0.84	0.03	0.42	4.92	70	13.02	96	87	59	0	0	6	0
	LOUISVILLE	76	60	85	48	68	11	1.98	1.11	1.39	6.58	92	12.85	94	90	49	0	0	4	1
	PADUCAH	74	58	84	48	66	9	2.99	1.82	1.18	7.63	99	12.46	82	91	62	0	0	6	2
LA	BATON ROUGE	86	64	87	63	75	8	0.62	-0.68	0.33	8.28	91	19.71	97	96	51	0	0	4	0
	LAKE CHARLES	83	65	85	61	74	7	0.08	-0.73	0.05	6.12	102	13.07	88	94	60	0	0	2	0
	NEW ORLEANS	82	66	85	64	74	6	0.69	-0.47	0.27	5.43	60	13.07	64	95	66	0	0	4	0
	SHREVEPORT	84	64	88	53	74	9	0.41	-0.61	0.40	5.04	69	9.18	57	95	56	0	0	2	0
ME	CARIBOU	42	32	54	30	37	-2	1.52	0.92	0.37	5.83	132	11.45	121	92	72	0	6	7	0
	PORTLAND	56	38	86	30	47	3	0.68	-0.30	0.41	7.61	104	15.81	109	91	60	0	2	4	0
MD	BALTIMORE	71	53	87	47	62	8	0.91	0.26	0.43	6.67	110	10.82	86	91	74	0	0	3	0
MA	BOSTON	59	45	86	39	52	3	0.64	-0.18	0.52	8.33	127	15.80	115	90	60	0	0	3	1
	WORCESTER	58	41	82	35	50	5	0.72	-0.16	0.53	7.79	110	14.14	99	90	50	0	0	5	1
MI	ALPENA	53	34	63	25	44	3	1.37	0.85	0.80	6.85	181	12.70	184	93	64	0	3	2	2
	GRAND RAPIDS	66	44	72	36	55	8	0.79	-0.03	0.75	7.35	144	12.91	149	92	46	0	0	3	1
	HOUGHTON LAKE	56	37	67	31	46	4	1.35	0.83	0.82	7.20	194	12.68	193	88	69	0	2	2	2
	LANSING	66	44	74	36	55	9	1.06	0.33	0.95	7.34	159	13.62	177	79	57	0	0	2	1
	MUSKEGON	64	42	73	36	53	8	1.04	0.38	0.81	5.57	126	11.27	137	87	62	0	0	4	1
	TRAVERSE CITY	57	34	69	29	46	3	1.06	0.41	0.69	4.07	102	10.23	117	91	48	0	4	2	1
MN	DULUTH	52	33	68	30	42	2	1.58	1.11	0.83	3.06	97	6.02	118	94	68	0	2	4	2
	INT'L FALLS	53	30	64	24	41	1	0.34	0.04	0.16	1.30	69	4.05	121	90	55	0	5	3	0
	MINNEAPOLIS	61	43	69	37	52	5	1.11	0.59	0.75	3.57	102	5.19	97	78	53	0	0	3	1
	ROCHESTER	59	41	65	34	50	4	1.53	0.83	1.37	6.38	162	10.15	180	87	62	0	0	3	1
	ST. CLOUD	58	36	68	30	47	3	1.51	1.03	0.89	2.75	90	4.27	97	96	46	0	1	3	1
MS	JACKSON	84	62	87	57	73	10	1.45	0.06	1.28	13.27	131	23.48	116	93	54	0	0	2	1
	MERIDIAN	85	60	87	57	72	8	1.80	0.54	1.68	12.47	112	22.04	98	95	51	0	0	2	1
	TUPELO	83	61	85	56	72	11	2.44	1.34	1.64	7.37	74	15.84	80	89	60	0	0	3	2
MO	COLUMBIA	71	52	86	45	62	7	0.32	-0.65	0.17	4.96	82	6.48	65	85	51	0	0	3	0
	KANSAS CITY	70	51	81	45	61	6	0.55	-0.23	0.31	7.07	155	8.52	122	91	48	0	0	2	0
	SAINT LOUIS	74	55	88	47	65	8	0.38	-0.46	0.24	7.09	114	9.38	88	72	52	0	0	4	0
	SPRINGFIELD	69	54	81	43	62	6	4.17	3.18	1.97	9.99	144	14.45	127	91	78	0	0	5	3
MT	BILLINGS	60	38	66	34	49	2	0.58	0.18	0.49	4.50	202	6.26	173	78	36	0	0	4	0
	BUTTE	53	29	59	21	41	2	0.34	0.12	0.17	2.14	147	2.93	119	85	31	0	6	3	0
	CUT BANK	55	30	62	20	43	1	0.65	0.46	0.48	2.09	197	3.36	194	88	39	0	4	2	0
	GLASGOW	57	30	64	18	44	-1	0.17	0.01	0.17	0.84	94	1.86	124	86	61	0	4	1	0
	GREAT FALLS	58	32	64	23	45	2	0.63	0.32	0.57	3.26	173	4.68	152	87	32	0	2	3	1
	HAVRE	57	33	70	24	45	0	0.25	0.07	0.23	0.70	58	2.08	102	89	55	0	4	2	0
	MISSOULA	58	33	65	25	45	0	0.16	-0.08	0.08	2.85	175	6.15	178	89	53	0	3	3	0
NE	GRAND ISLAND	70	44	77	37	57	7	0.00	-0.59	0.00	0.94	25	2.26	45	94	45	0	0	0	0
	LINCOLN	71	46	83	39	58	6	1.04	0.38	0.94	3.24	78	4.89	89	87	49	0	0	3	1
	NORFOLK	64	40	74	34	52	2	0.41	-0.18	0.24	2.76	74	5.00	99	91	50	0	0	2	0
	NORTH PLATTE	69	39	76	27	54	5	0.00	-0.45	0.00	2.13	87	4.12	123	90	36	0	2	0	0
	OMAHA	70	46	80	39	58	6	0.45	-0.22	0.32	3.34	83	5.44	97	82	49	0	0	3	0
	SCOTTSBLUFF	67	36	75	30	51	4	0.05	-0.36	0.03	1.90	83	4.12	120	78	38	0	2	2	0
	VALENTINE	66	35	73	28	51	4	0.31	-0.14	0.30	1.91	83	4.32	140	81	35	0	3	2	0
NV	ELY	61	28	67	20	45	3	0.36	0.17	0.35	2.54	155	5.79	185	74	36	0	6	2	0
	LAS VEGAS	83	63	89	59	73	7	0.00	0.00	0.00	0.05	8	1.51	78	26	15	0	0	0	0
	RENO	67	41	75	33	54	5	0.05	-0.01	0.04	1.52	141	10.51	328	66	32	0	0	2	0
	WINNEMUCCA	62	35	72	21	49	2	0.05	-0.14	0.04	1.96	136	4.55	157	83	43	0	3	2	0
NH	CONCORD	61	40	87	36	50	5	0.79	0.10	0.64	7.22	138	12.45	118	87	50	0	0	2	1
NJ	NEWARK	66	51	87	46	58	5	0.28	-0.59	0.15	7.42	106	14.15	102	84	60	0	0	4	0
NM	ALBUQUERQUE	78	48	81	41	63	7	0.00	-0.11	0.00	0.41	43	1.80	95	36	13	0	0	0	0
NY	ALBANY	63	46	87	40	54	7	0.81	0.06	0.45	6.69	122	12.67	125	84	46	0	0	5	0
	BINGHAMTON	58	43	79	35	51	6	2.37	1.55	1.21	10.46	192	16.72	159	86	63	0	0	4	2
	BUFFALO	59	41	73	33	50	4	2.32	1.63	1.95	9.22	177	14.40	133	89	55	0	0	2	1
	ROCHESTER	59	44	80	36	51	5	1.40	0.77	1.15	8.77	191	13.85	154	80	61	0	0	2	1
	SYRACUSE	60	43	81	31	51	5	1.57	0.80	0.75	8.46	155	15.04	148	93	55	0	1	4	2
NC	ASHEVILLE	73	55	80	51	64	10	1.73	0.97	0.53	6.49	90	10.91	72	92	59	0	0	7	1
	CHARLOTTE	79	59	87	55	69	8	0.33	-0.30	0.32	4.90	74	11.81	83	85	43	0	0	2	0
	GREENSBORO	78	57	86	50	67	9	0.60	-0.17	0.46	4.05	64	9.66	75	94	53	0	0	3	0
	HATTERAS	77	67	79	64	72	12	0.06	-0.63	0.06	9.59	128	15.90	92	85	62	0	0	1	0
	RALEIGH	82	58	89	55	70	10	0.38	-0.21	0.21	4.32	72	8.75	65	92	54	0	0	4	0
	WILMINGTON	81	62	88	58	72	9	0.00	-0.62	0.00	5.54	88	11.08	76	96	51	0	0	0	0
ND	BISMARCK	58	32	71	20	45	1	0.18	-0.16	0.16	1.43	80	3.23	118	89	58	0	4	2	0
	DICKINSON	55	28	63	11	41	-3	0.32	-0.10	0.30	1.15	62	1.93	73	94	46	0	4	3	0
	FARGO	58	34	71	30	46	2	0.93	0.63	0.64	1.45	70	3.22	94	92	47	0	2	4	1
	GRAND FORKS	56	33	66	28	45	2	0.62	0.35	0.60	1.52	91	2.77	95	93	51	0	2	2	1
	JAMESTOWN	56	33	68	26	44	0	1.16	0.85	0.58	1.82	103	2.93	101	94	48	0	3	4	1
	WILLISTON	55	30	66	14	43	0	0.07	-0.16	0.05	1.23	88	2.37	102	87	60	0	3	2	0
OH	AKRON-CANTON	71	50	81	39	61	13	2.18	1.40	1.75	9.11	166	17.61	171	76	48	0	0	3	1
	CINCINNATI	73	55	82	46	64	10	1.53	0.62	0.79	7.33	108	14.55	117	88	51	0	0	4	2
	CLEVELAND	71	50	82	41	60	12	2.40	1.63	1.92	8.02	150	16.88	167	73	44	0	0	2	1
	COLUMBUS	73	54	84	41	64	12	0.16	-0.59	0.08	6.94	135	13.40	136	78	48	0	0	5	0
	DAYTON	72	52	82	38	62	11	0.50	-0.44	0.41	7.15	116	12.49	113	84	43	0	0	4	0
	MANSFIELD	70	49	81	40	60	12	0.36	-0.60	0.27	6.29	99	14.15	127	87	43	0	0	4	0

Based on 1971-2000 normals ***** Not Available**

Weather Data for the Week Ending April 22, 2017

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY PERCENT		NUMBER OF DAYS TEMP. °F		NUMBER OF DAYS PRECIP	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE MAR 1	PCT. NORMAL SINCE MAR 1	TOTAL, IN., SINCE JAN01	PCT. NORMAL SINCE JAN01	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
	TOLEDO	69	47	80	39	58	9	1.24	0.48	0.80	5.93	119	11.70	133	83	50	0	0	2	1
	YOUNGSTOWN	69	49	80	38	59	11	0.80	0.03	0.38	7.19	132	15.07	153	82	50	0	0	3	0
OK	OKLAHOMA CITY	71	55	79	46	63	3	1.46	0.79	1.43	6.09	126	10.78	141	95	66	0	0	2	1
	TULSA	72	57	81	47	65	4	4.91	4.02	3.19	7.93	128	12.52	129	95	76	0	0	4	3
OR	ASTORIA	60	45	70	38	53	4	1.25	0.15	0.32	20.38	180	38.26	133	83	60	0	0	5	0
	BURNS	58	30	66	22	44	1	0.14	-0.03	0.09	2.50	137	7.50	182	88	46	0	6	2	0
	EUGENE	62	43	68	35	53	3	1.35	0.54	0.65	8.09	93	21.47	95	95	72	0	0	6	1
	MEDFORD	66	43	76	39	54	2	0.32	0.04	0.12	2.73	98	11.74	159	91	46	0	0	3	0
	PENDLETON	63	41	68	33	52	1	0.55	0.30	0.37	3.61	177	7.53	160	85	60	0	0	4	0
	PORTLAND	62	45	69	39	54	3	0.92	0.33	0.37	9.94	174	24.43	163	88	62	0	0	6	0
	SALEM	63	44	69	36	53	3	1.17	0.56	0.32	10.31	164	29.12	169	89	65	0	0	6	0
PA	ALLENTOWN	68	48	85	42	58	9	0.54	-0.24	0.30	7.49	125	12.58	103	80	59	0	0	3	0
	ERIE	64	44	77	36	54	7	1.46	0.68	1.01	7.01	124	14.43	138	87	63	0	0	2	1
	MIDDLETOWN	70	50	83	44	60	8	0.80	0.06	0.65	7.39	134	11.77	104	92	49	0	0	4	1
	PHILADELPHIA	70	51	87	45	61	8	0.52	-0.26	0.31	6.71	107	10.92	87	84	59	0	0	4	0
	PITTSBURGH	70	52	77	43	61	11	1.62	0.95	0.74	7.26	136	13.56	131	88	45	0	0	5	2
	WILKES-BARRE	67	48	83	39	57	8	1.36	0.60	0.88	8.36	168	14.59	153	86	46	0	0	4	1
	WILLIAMSPORT	69	47	84	39	58	9	2.08	1.28	0.90	7.24	127	12.54	112	81	56	0	0	5	3
RI	PROVIDENCE	62	45	86	36	54	5	0.78	-0.16	0.64	8.36	110	15.54	101	83	57	0	0	5	1
SC	BEAUFORT	84	63	88	59	73	8	0.00	-0.65	0.00	4.80	79	10.71	81	99	51	0	0	0	0
	CHARLESTON	84	62	87	56	73	9	1.31	0.72	0.81	5.42	87	9.60	72	93	47	0	0	2	2
	COLUMBIA	85	63	90	59	74	11	0.01	-0.62	0.01	5.99	85	14.63	94	83	44	1	0	1	0
	GREENVILLE	78	58	86	54	68	9	1.54	0.80	0.85	10.93	138	16.65	101	93	51	0	0	3	1
SD	ABERDEEN	59	32	70	25	46	0	1.01	0.60	0.59	1.87	72	3.05	86	87	49	0	4	3	1
	HURON	62	35	69	30	48	1	0.37	-0.15	0.29	1.90	60	3.31	78	95	49	0	4	2	0
	RAPID CITY	62	32	67	26	47	2	0.22	-0.21	0.22	2.32	105	3.43	113	84	40	0	3	1	0
	SIOUX FALLS	61	39	69	32	50	4	0.55	-0.06	0.47	2.08	57	3.93	84	96	50	0	1	2	0
TN	BRISTOL	74	55	79	52	65	10	1.54	0.83	0.65	7.36	120	12.45	95	95	58	0	0	5	1
	CHATTANOOGA	80	61	82	59	71	11	3.61	2.70	1.48	10.08	107	18.50	94	89	59	0	0	4	3
	KNOXVILLE	78	62	82	59	70	12	2.66	1.78	0.81	10.68	132	17.22	103	88	56	0	0	5	2
	MEMPHIS	77	62	85	51	70	8	2.04	0.69	0.77	6.50	66	12.16	66	94	69	0	0	5	2
	NASHVILLE	78	61	85	52	69	10	5.43	4.57	2.67	9.89	129	14.79	96	94	57	0	0	6	3
TX	ABILENE	81	58	90	47	69	4	0.02	-0.36	0.02	1.74	69	5.12	111	95	58	1	0	1	0
	AMARILLO	77	49	90	37	63	6	0.03	-0.26	0.03	2.30	114	5.98	187	92	35	1	0	1	0
	AUSTIN	83	65	89	57	74	5	0.06	-0.51	0.05	4.35	120	11.66	155	89	63	0	0	2	0
	BEAUMONT	86	67	89	61	77	9	0.22	-0.64	0.21	9.75	151	11.80	76	93	57	0	0	2	0
	BROWNSVILLE	88	71	91	67	80	6	0.38	-0.09	0.30	2.33	105	3.87	81	91	62	1	0	2	0
	CORPUS CHRISTI	84	68	88	65	76	4	0.26	-0.21	0.25	6.89	227	9.73	150	98	65	0	0	2	0
	DEL RIO	***	***	***	***	***	***	***	***	***	***	***	7.13	216	***	***	***	***	***	***
	EL PASO	88	57	91	52	73	8	0.00	-0.04	0.00	0.00	0	1.20	100	22	7	3	0	0	0
	FORT WORTH	80	63	85	54	72	7	0.45	-0.28	0.45	4.37	86	11.09	119	89	59	0	0	1	0
	GALVESTON	83	72	85	65	78	8	0.68	0.12	0.51	2.59	57	6.86	61	89	69	0	0	2	1
	HOUSTON	84	66	88	60	75	6	0.52	-0.30	0.31	7.31	124	15.82	126	95	63	0	0	3	0
	LUBBOCK	82	54	91	45	68	8	0.00	-0.30	0.00	1.48	95	4.40	159	86	41	1	0	0	0
	MIDLAND	86	59	93	50	72	8	0.02	-0.14	0.02	2.98	403	4.82	261	80	44	2	0	1	0
	SAN ANGELO	85	58	94	49	72	7	0.11	-0.26	0.10	1.72	91	4.43	114	80	46	3	0	2	0
	SAN ANTONIO	81	65	86	59	73	4	1.64	1.04	1.64	4.86	138	11.19	161	88	56	0	0	1	1
	VICTORIA	84	67	87	63	76	6	1.68	1.00	1.10	7.76	187	16.36	190	93	68	0	0	2	2
	WACO	81	63	86	50	72	6	1.12	0.42	1.09	10.28	237	16.44	190	94	69	0	0	3	1
	WICHITA FALLS	78	56	83	44	67	4	0.19	-0.40	0.16	1.65	41	5.61	83	90	67	0	0	2	0
UT	SALT LAKE CITY	63	44	71	38	54	4	1.01	0.55	0.64	5.75	175	9.41	157	76	36	0	0	4	1
VT	BURLINGTON	56	42	82	37	49	5	1.02	0.36	0.43	6.86	158	11.53	140	88	55	0	0	5	0
VA	LYNCHBURG	75	53	84	49	64	8	1.03	0.25	0.86	4.52	72	8.90	69	91	59	0	0	4	1
	NORFOLK	81	61	90	55	71	13	0.89	0.15	0.47	6.19	95	11.26	81	83	48	1	0	3	0
	RICHMOND	78	56	87	50	67	10	0.71	0.02	0.40	5.00	78	10.00	77	87	63	0	0	5	0
	ROANOKE	74	56	83	49	65	8	0.91	0.10	0.56	5.03	79	9.67	76	89	67	0	0	5	1
	WASH/DULLES	75	54	86	48	64	10	0.96	0.24	0.50	5.26	90	8.70	75	81	59	0	0	4	1
WA	OLYMPIA	60	40	66	32	50	2	0.90	0.10	0.40	15.45	190	28.45	130	96	76	0	1	5	0
	QUILLAYUTE	58	44	66	35	51	4	2.56	0.88	0.85	33.21	198	53.26	124	95	77	0	0	5	3
	SEATTLE-TACOMA	61	46	66	42	54	4	0.98	0.41	0.49	10.69	184	23.75	157	90	64	0	0	5	0
	SPOKANE	59	38	64	30	48	1	0.62	0.34	0.51	5.52	230	11.76	205	88	46	0	1	3	1
	YAKIMA	66	39	68	32	52	3	0.41	0.30	0.17	2.34	215	6.90	225	83	49	0	1	4	0
WV	BECKLEY	69	53	77	45	61	9	1.42	0.65	0.43	6.90	115	13.27	109	88	62	0	0	6	0
	CHARLESTON	73	54	81	44	64	9	0.93	0.21	0.36	6.44	104	14.74	117	88	52	0	0	5	0
	ELKINS	70	48	76	39	59	10	2.09	1.30	0.65	8.45	132	15.70	121	91	46	0	0	6	1
	HUNTINGTON	74	58	83	45	66	10	0.61	-0.13	0.23	5.77	94	13.57	109	84	50	0	0	5	0
WI	EAU CLAIRE	60	38	67	30	49	3	1.22	0.54	0.79	4.62	119	8.69	152	93	43	0	2	3	1
	GREEN BAY	59	40	67	34	49	4	1.15	0.57	0.99	5.37	137	8.72	142	97	56	0	0	3	1
	LA CROSSE	65	44	69	36	54	5	1.09	0.29	1.03	5.72	131	9.57	146	87	39	0	0	2	1
	MADISON	64	41	70	33	53	7	0.47	-0.33	0.41	5.81	124	10.51	145	85	53	0	0	3	0
	MILWAUKEE	64	42	73	39	53	7	1.06	0.16	0.59	7.59	142	11.60	131	81	52	0	0	3	1
WY	CASPER	60	31	73	21	45	2	0.84	0.49	0.48	3.18	179	4.73	158	89	51	0	4	4	0
	CHEYENNE	59	33	67	28	46	4	1.56	1.21	0.92	2.40	119	3.84	132	78	44	0	4	3	2
	LANDER	59	34	66	29	46	2	0.79	0.31	0.42	6.36	247	8.84	244	85	33	0	2	3	0
	SHERIDAN	60	34	72	25	47	3	0.57	0.16	0.50	4.39	205	6.69	192	78	47	0	2	3	1

Based on 1971-2000 normals ***** Not Available**

National Agricultural Summary

April 17 – 23, 2017

Weekly National Agricultural Summary provided by USDA/NASS

HIGHLIGHTS

Precipitation was above normal across much of the U.S. Storm systems delivered heavy rainfall from the central Plains to the southern Appalachian Mountains, including at least 5 inches in some areas of Arkansas, Missouri, Oklahoma, and Tennessee. Above-average temperatures prevailed nearly nationwide. Several locations in the Ohio Valley and Southeast recorded average temperatures more than 8°F above normal.

Corn: By April 23, producers had planted 17 percent of the nation's corn crop, 11 percentage points behind last year and slightly behind the 5-year average. Favorable planting conditions in Illinois allowed producers to plant 28 percent of their intended corn acreage during the week and move ahead of the 5-year average. By week's end, 4 percent of the 2017 corn crop had emerged, equal to both last year and the 5-year average.

Soybeans: Nationwide, 6 percent of soybean crop was planted by April 23, three percentage points ahead of both last year and the 5-year average. Planting was most advanced in the Delta, including Mississippi with 60 percent planted by week's end, 34 percentage points ahead of the 5-year average.

Winter Wheat: Heading advanced 13 percentage points during the week, as favorable weather in the southern Plains promoted a rapid crop development pace. By April 23, thirty-two percent of the winter wheat was at or beyond the heading stage, 8 percentage points ahead of last year and 9 points ahead of the 5-year average. The percent of the crop headed or beyond advanced 25 and 16 percentage points, respectively, in Oklahoma and Texas. Overall, 54 percent of the winter wheat crop was reported in good to excellent condition, unchanged from last week but 5 percentage points lower than at the same time last year.

Cotton: By week's end, cotton producers had planted 11 percent of this year's crop, slightly ahead of last year but slightly behind the 5-year average. Planting was most active in California, where planting progress advanced 24 percentage points. Planting progress was at or behind the 5-year average in eight of the 15 estimating states.

Sorghum: Producers had planted 24 percent of the nation's sorghum crop by April 23, five percentage points ahead of last year and slightly ahead of the 5-year average. Planting remained largely limited to the Delta and the southern Great Plains. Planting was most active in Arkansas and Louisiana, where progress advanced 16 and 29 percentage points, respectively, during the week.

Rice: By April 23, producers had seeded 69 percent of this year's rice crop, 9 percentage points ahead of last year and 22 points ahead of the 5-year average. Conditions in Missouri allowed for 65 percent of the rice crop in that state to be planted by week's end, up 29 percentage points from last week. Nationally, emergence advanced to 45 percent, 10 percentage points ahead of last year and 15 points ahead of the 5-year average.

Small Grains: Nationwide, 57 percent of the oat crop was seeded by April 23, twelve percentage points behind last year and 5 points behind the 5-year average. Planting progress advanced at least 30 percentage points during the week in Ohio and Pennsylvania. National emergence advanced to 37 percent by week's end, 2 percentage points behind last year and 4 points behind the 5-year average.

Twenty-seven percent of the barley crop was seeded by week's end, 16 percentage points behind last year and 13 points behind the 5-year average. All estimating states remained behind their respective 5-year averages. Nationwide, 7 percent of the 2017 barley crop was emerged, 7 percentage points behind last year and 3 points behind the 5-year average. Emergence progress was most rapid in Idaho, advancing 17 percentage points during the week.

Spring wheat producers had seeded 22 percent of this year's crop by April 23, eighteen percentage points behind last year and 12 points behind the 5-year average. Favorable conditions promoted a rapid planting pace in several states, with double-digit planting progress reported in Idaho, Montana, South Dakota, and Washington. Nationally, emergence advanced to 5 percent, 2 percentage points behind last year and 3 points behind the 5-year average.

Other Crops: Nationally, peanut producers had planted 4 percent of this year's crop by week's end, equal to both last year and the 5-year average. Planting was most advanced in Florida, at 12 percent complete. This is slightly ahead of last year and 5 percentage points ahead of the 5-year average.

Thirty-six percent of the nation's sugarbeet crop was planted by week's end, 22 percentage points behind last year and 8 points behind the 5-year average. With a late start in Michigan, producers have only planted 7 percent of the sugarbeet crop, 28 percentage points behind the 5-year average. Conditions in the other three estimating states last week promoted double-digit planting progress, but all states except Idaho remained behind their respective 5-year averages.

Crop Progress and Condition

Week Ending April 23, 2017

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

Corn Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
CO	6	1	8	7
IL	38	6	34	28
IN	10	4	15	13
IA	36	2	8	14
KS	42	9	21	28
KY	46	19	29	33
MI	3	0	1	4
MN	40	1	6	17
MO	78	17	46	39
NE	15	3	17	11
NC	69	32	63	64
ND	5	0	1	4
OH	7	0	9	10
PA	13	2	6	7
SD	5	0	3	7
TN	61	24	45	46
TX	52	60	68	59
WI	9	0	1	4
18 Sts	28	6	17	18

These 18 States planted 92% of last year's corn acreage.

Corn Percent Emerged

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
CO	0	NA	0	0
IL	4	0	5	6
IN	0	NA	2	2
IA	0	NA	0	0
KS	20	NA	4	10
KY	7	NA	10	11
MI	0	NA	0	0
MN	1	NA	0	0
MO	23	1	13	12
NE	1	NA	2	1
NC	31	NA	12	31
ND	0	0	0	0
OH	0	NA	0	1
PA	0	NA	0	0
SD	0	NA	0	0
TN	13	NA	21	18
TX	43	56	60	49
WI	0	NA	0	0
18 Sts	4	NA	4	4

These 18 States planted 92% of last year's corn acreage.

Soybeans Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AR	16	24	39	15
IL	2	0	4	2
IN	2	NA	3	3
IA	3	NA	0	1
KS	0	NA	0	1
KY	3	NA	2	2
LA	18	36	59	28
MI	0	NA	0	1
MN	2	NA	0	1
MS	24	43	60	26
MO	4	0	2	2
NE	0	NA	4	1
NC	1	NA	1	1
ND	0	NA	0	0
OH	0	NA	1	2
SD	0	NA	1	0
TN	2	NA	4	1
WI	1	NA	0	0
18 Sts	3	NA	6	3

These 18 States planted 95% of last year's soybean acreage.

Winter Wheat Percent Headed

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AR	54	89	96	44
CA	83	59	90	80
CO	0	0	0	0
ID	3	0	0	1
IL	2	3	28	12
IN	3	3	18	5
KS	20	9	25	17
MI	0	0	0	0
MO	20	23	56	19
MT	0	0	0	0
NE	0	0	0	0
NC	37	21	59	37
OH	0	0	1	0
OK	52	40	65	47
OR	0	0	0	1
SD	0	0	0	0
TX	48	51	67	50
WA	4	0	0	1
18 Sts	24	19	32	23

These 18 States planted 90% of last year's winter wheat acreage.

Winter Wheat Condition by Percent

	VP	P	F	G	EX
AR	2	5	20	60	13
CA	0	0	0	55	45
CO	6	16	36	35	7
ID	1	4	27	49	19
IL	2	4	20	58	16
IN	1	3	24	57	15
KS	4	12	32	45	7
MI	2	9	24	55	10
MO	0	2	28	62	8
MT	1	5	28	53	13
NE	1	8	37	47	7
NC	1	9	26	58	6
OH	0	2	18	61	19
OK	4	11	41	40	4
OR	1	4	10	65	20
SD	0	9	35	55	1
TX	2	13	43	35	7
WA	1	2	14	67	16
18 Sts	3	10	33	45	9
Prev Wk	3	10	33	46	8
Prev Yr	1	7	33	50	9

Cotton Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AL	12	0	4	9
AZ	54	40	53	57
AR	3	3	7	7
CA	74	26	50	62
GA	2	2	7	5
KS	0	0	0	0
LA	3	18	37	8
MS	6	6	11	6
MO	12	5	13	5
NC	1	0	1	3
OK	2	0	6	1
SC	7	0	2	6
TN	1	0	3	1
TX	11	11	12	14
VA	4	0	7	2
15 Sts	10	8	11	12

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

Crop Progress and Condition

Week Ending April 23, 2017

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

Oats Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
IA	90	42	69	70
MN	65	17	29	43
NE	83	70	81	81
ND	26	2	10	18
OH	54	21	51	46
PA	77	29	60	53
SD	71	48	68	60
TX	100	100	100	100
WI	34	12	19	28
9 Sts	69	45	57	62

These 9 States planted 66% of last year's oat acreage.

Oats Percent Emerged

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
IA	36	10	26	30
MN	23	0	9	16
NE	50	26	39	43
ND	1	0	0	2
OH	15	11	17	16
PA	28	2	19	21
SD	26	10	30	23
TX	100	100	100	100
WI	4	2	5	6
9 Sts	39	29	37	41

These 9 States planted 66% of last year's oat acreage.

Sorghum Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AR	28	30	46	40
CO	0	0	0	0
IL	1	0	1	2
KS	0	0	0	0
LA	62	50	79	69
MO	12	8	10	5
NE	1	0	0	1
NM	5	0	0	3
OK	9	9	16	8
SD	0	0	0	0
TX	49	58	65	57
11 Sts	19	21	24	23

These 11 States planted 99% of last year's sorghum acreage.

Spring Wheat Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
ID	62	28	48	71
MN	43	9	14	41
MT	50	8	24	31
ND	24	6	9	22
SD	70	52	75	56
WA	71	20	38	71
6 Sts	40	13	22	34

These 6 States planted 99% of last year's spring wheat acreage.

Spring Wheat Percent Emerged

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
ID	13	NA	12	26
MN	8	NA	2	9
MT	2	NA	0	2
ND	4	1	2	4
SD	23	11	32	19
WA	40	NA	1	34
6 Sts	7	NA	5	8

These 6 States planted 99% of last year's spring wheat acreage.

Peanuts Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AL	3	0	1	4
FL	11	8	12	7
GA	3	NA	5	4
NC	0	0	0	1
OK	0	NA	3	2
SC	0	NA	1	1
TX	2	NA	0	1
VA	0	NA	0	0
8 Sts	4	NA	4	4

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

Rice Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AR	72	67	84	51
CA	3	0	0	5
LA	78	81	89	82
MS	51	49	77	41
MO	81	36	65	45
TX	76	65	70	77
6 Sts	60	55	69	47

These 6 States planted 100% of last year's rice acreage.

Rice Percent Emerged

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
AR	36	23	51	27
CA	0	0	0	1
LA	65	67	80	67
MS	28	19	43	27
MO	30	0	17	20
TX	67	48	60	63
6 Sts	35	25	45	30

These 6 States planted 100% of last year's rice acreage.

Sugarbeets Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
ID	64	46	78	78
MI	32	1	7	35
MN	70	18	32	40
ND	48	12	30	33
4 Sts	58	19	36	44

These 4 States planted 84% of last year's sugarbeet acreage.

Crop Progress and Condition

Week Ending April 23, 2017

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

Barley Percent Planted

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
ID	69	40	57	69
MN	29	4	8	28
MT	50	9	30	42
ND	18	2	6	15
WA	49	6	12	51
5 Sts	43	13	27	40

These 5 States planted 83% of last year's barley acreage.

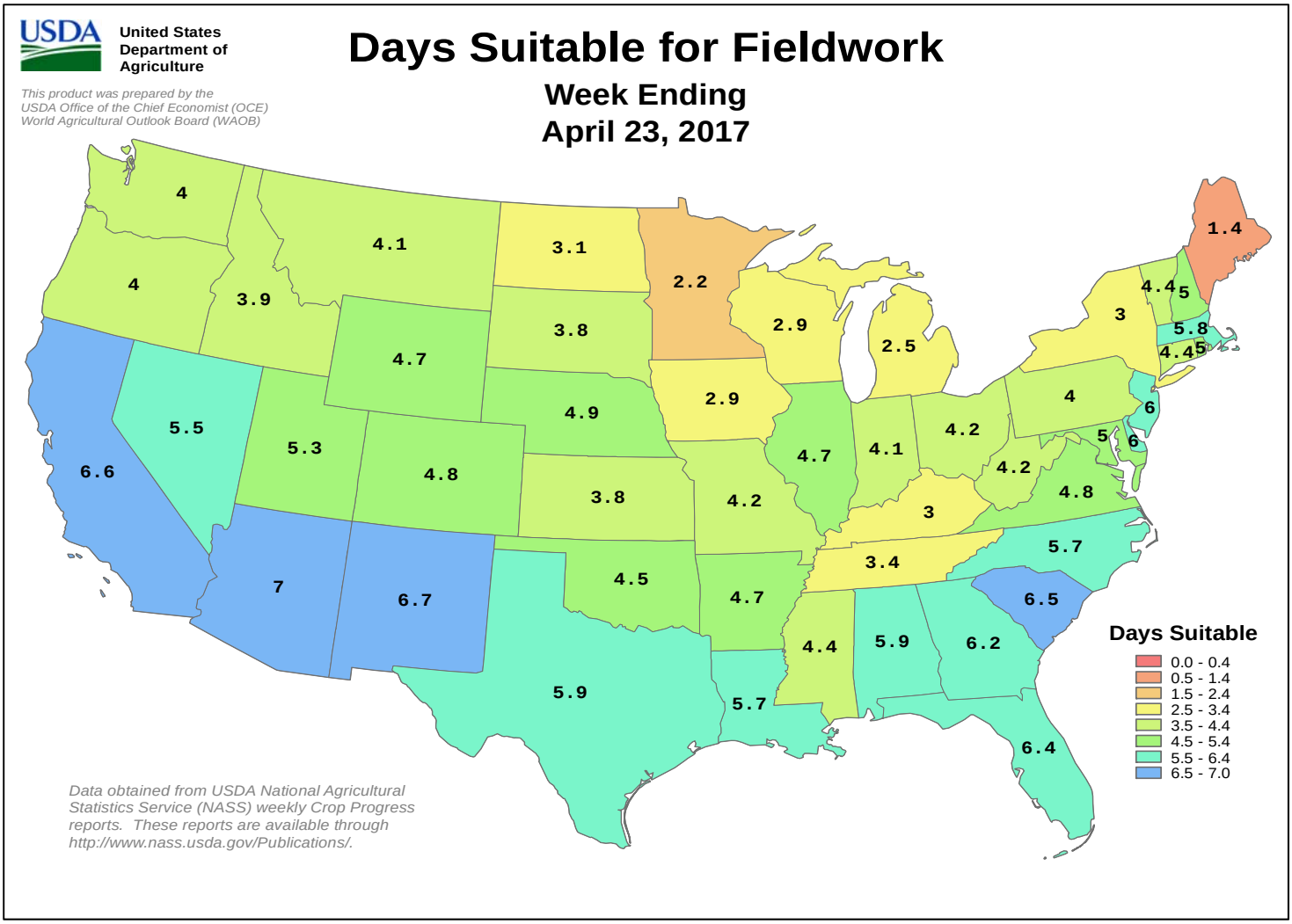
Barley Percent Emerged

	Prev Year	Prev Week	Apr 23 2017	5-Yr Avg
ID	32	9	26	29
MN	6	NA	1	5
MT	10	NA	2	5
ND	3	0	0	2
WA	24	NA	1	18
5 Sts	14	NA	7	10

These 5 States planted 83% of last year's barley acreage.

VP - Very Poor; P - Poor;
F - Fair;
G - Good; EX - Excellent

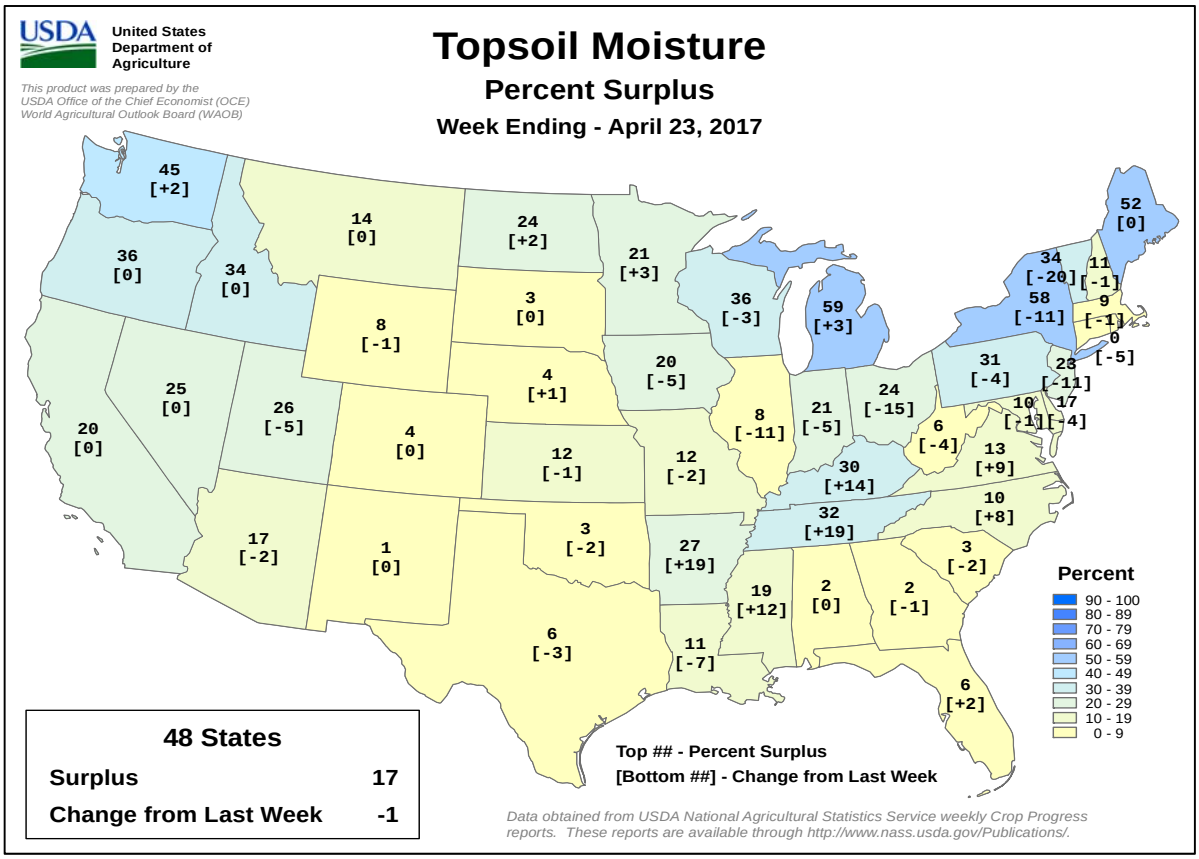
NA - Not Available
* Revised

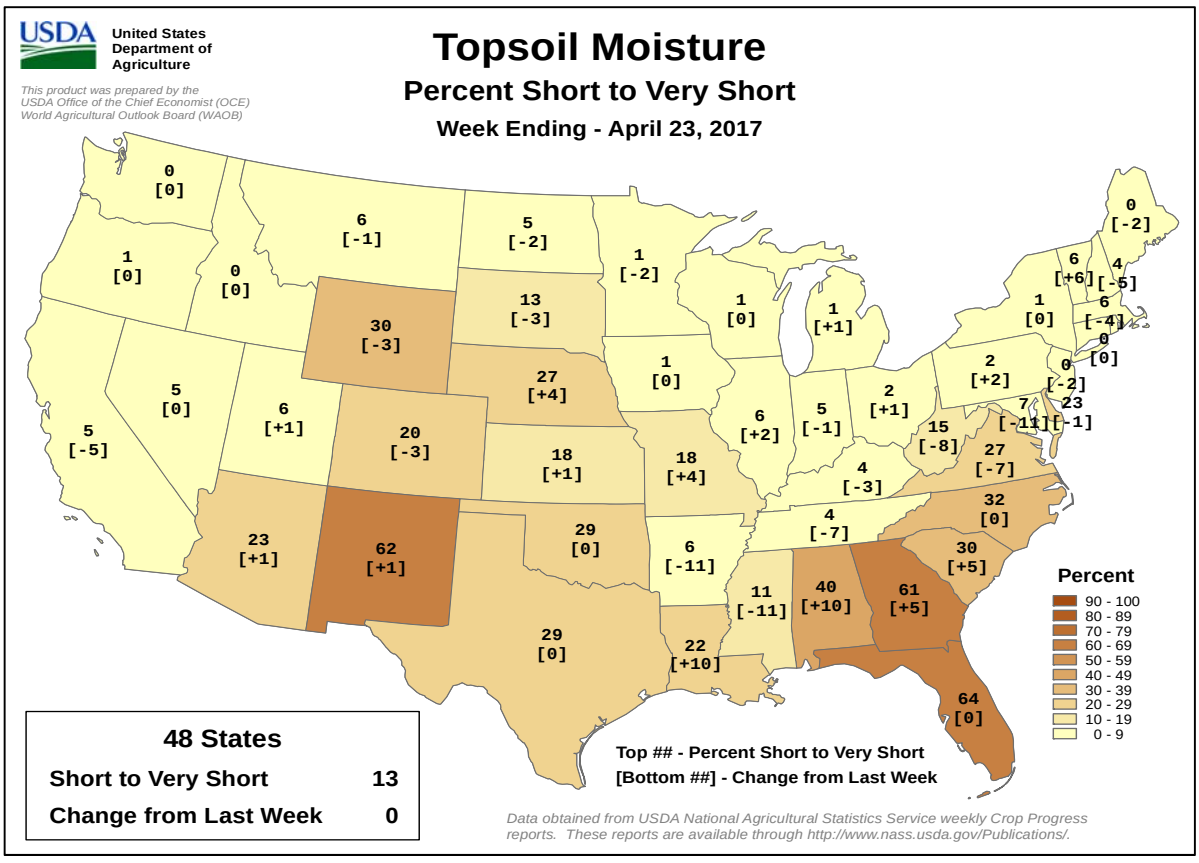


Crop Progress and Condition

Week Ending April 23, 2017

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

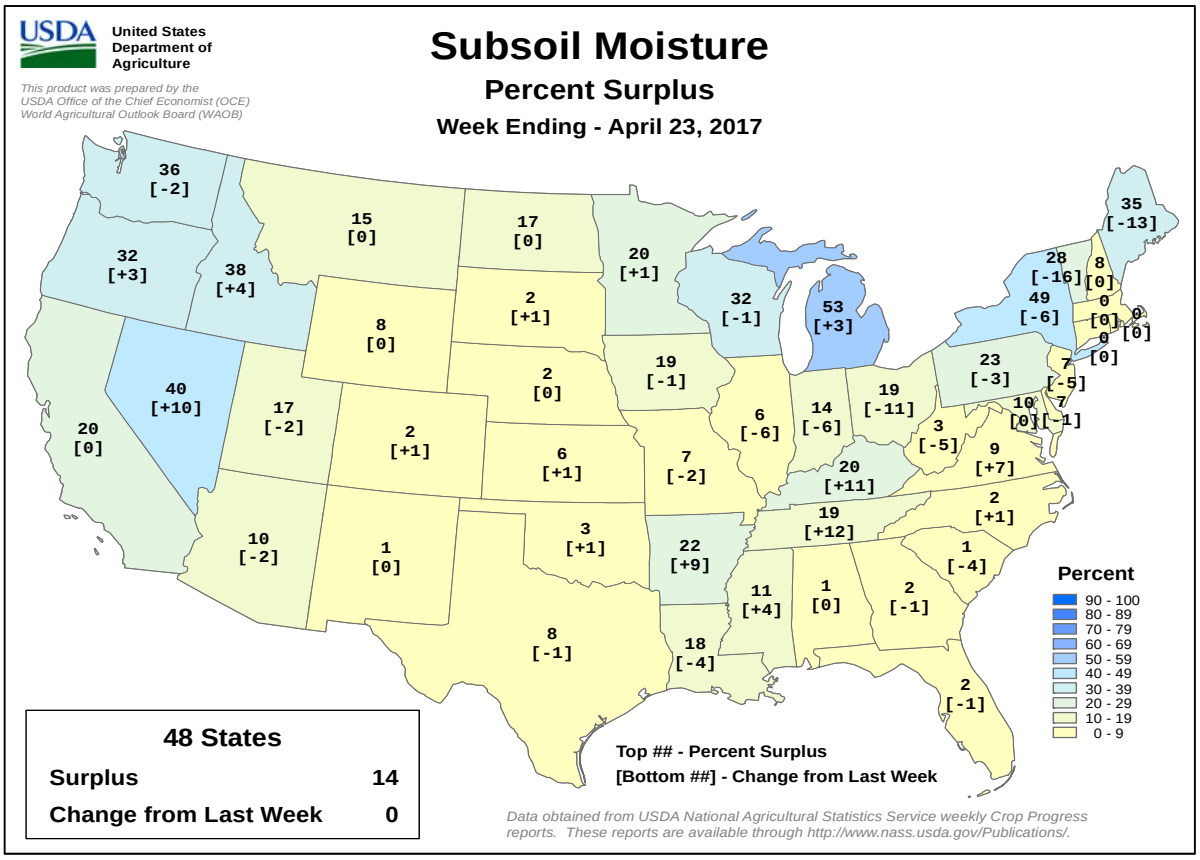


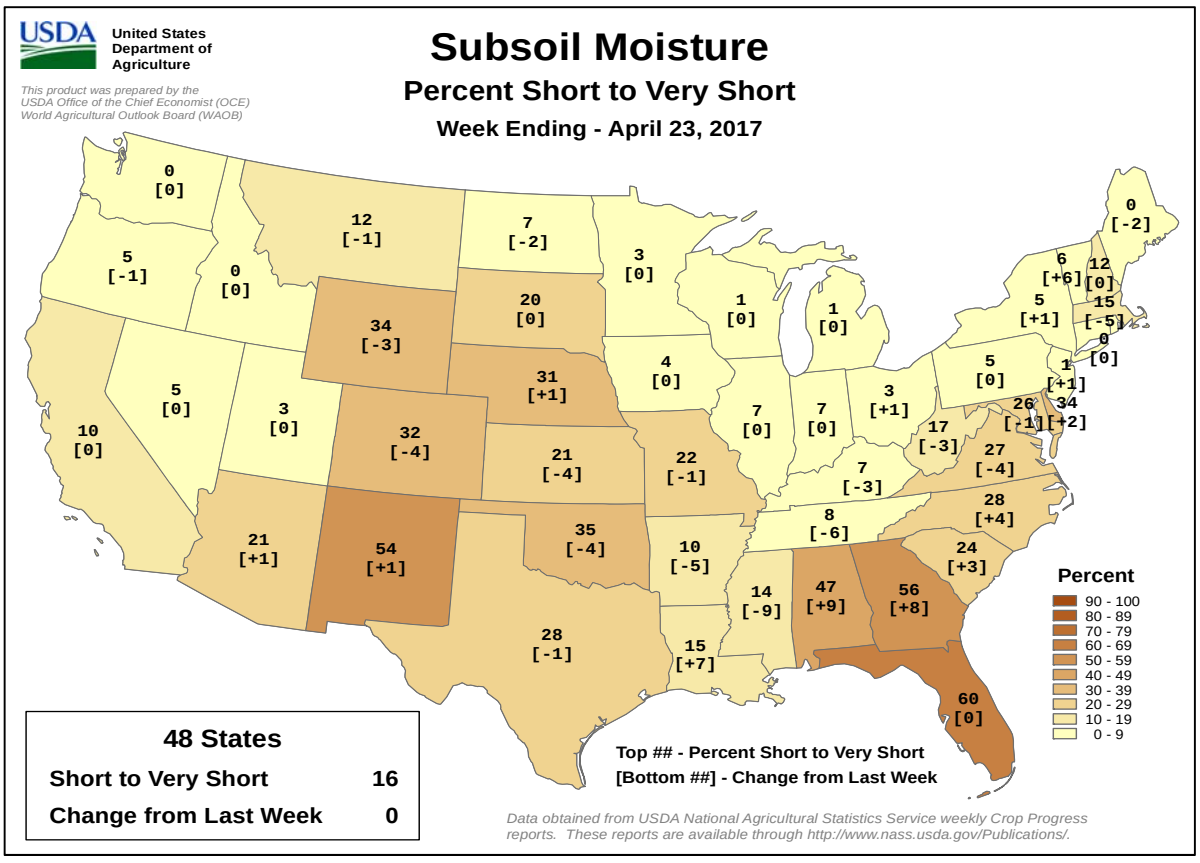


Crop Progress and Condition

Week Ending April 23, 2017

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





International Weather and Crop Summary

April 16-22, 2017

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

HIGHLIGHTS

EUROPE: Increasingly dry conditions in western Europe reduced soil moisture supplies for vegetative (north) to reproductive (south) winter grains and oilseeds.

WESTERN FSU: Moderate to heavy rain and wet snow improved conditions for Ukraine winter grains and maintained favorable prospects for Russian winter wheat.

EASTERN FSU: Mild, showery weather kept soils favorably moist for early spring grain planting.

MIDDLE EAST: Late-week showers maintained or improved yield prospects for vegetative to reproductive winter grains in Turkey, Iraq, and northwestern Iran.

NORTHWESTERN AFRICA: Hot, dry weather reduced yield expectations for winter wheat and barley in the west.

EAST ASIA: Showers across southern China maintained good soil moisture for rice but the weather was likely too wet for maturing rapeseed.

SOUTHEAST ASIA: Tropical showers remained in southern portions of the region, benefiting oil palm and rice in Indonesia and Malaysia, while northern countries prepared for the onset of the wet season next month.

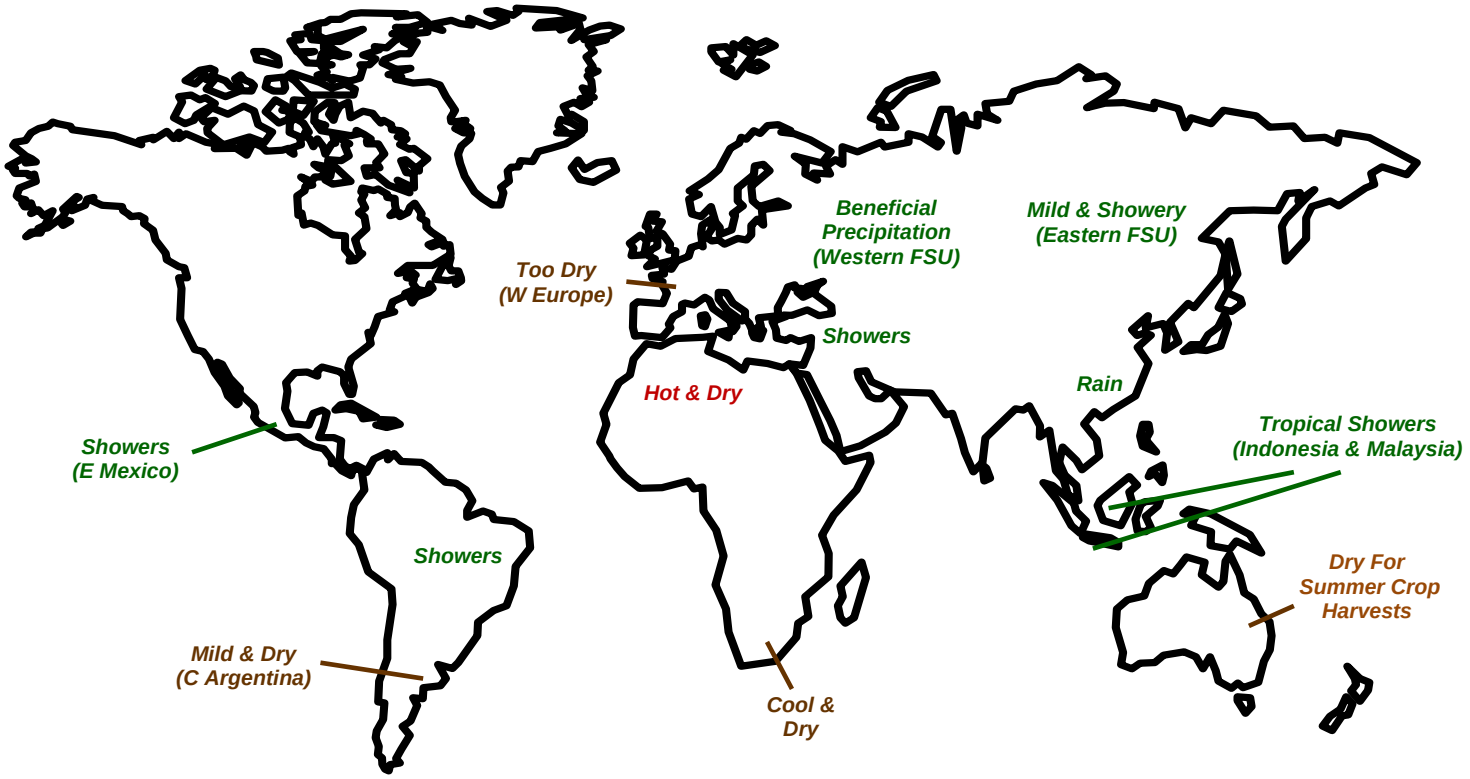
AUSTRALIA: Dry weather aided summer crop harvesting in the northeast, while elsewhere in the wheat belt rain boosted soil moisture prior to winter crop planting.

SOUTH AFRICA: Cool, dry weather favored maturing corn.

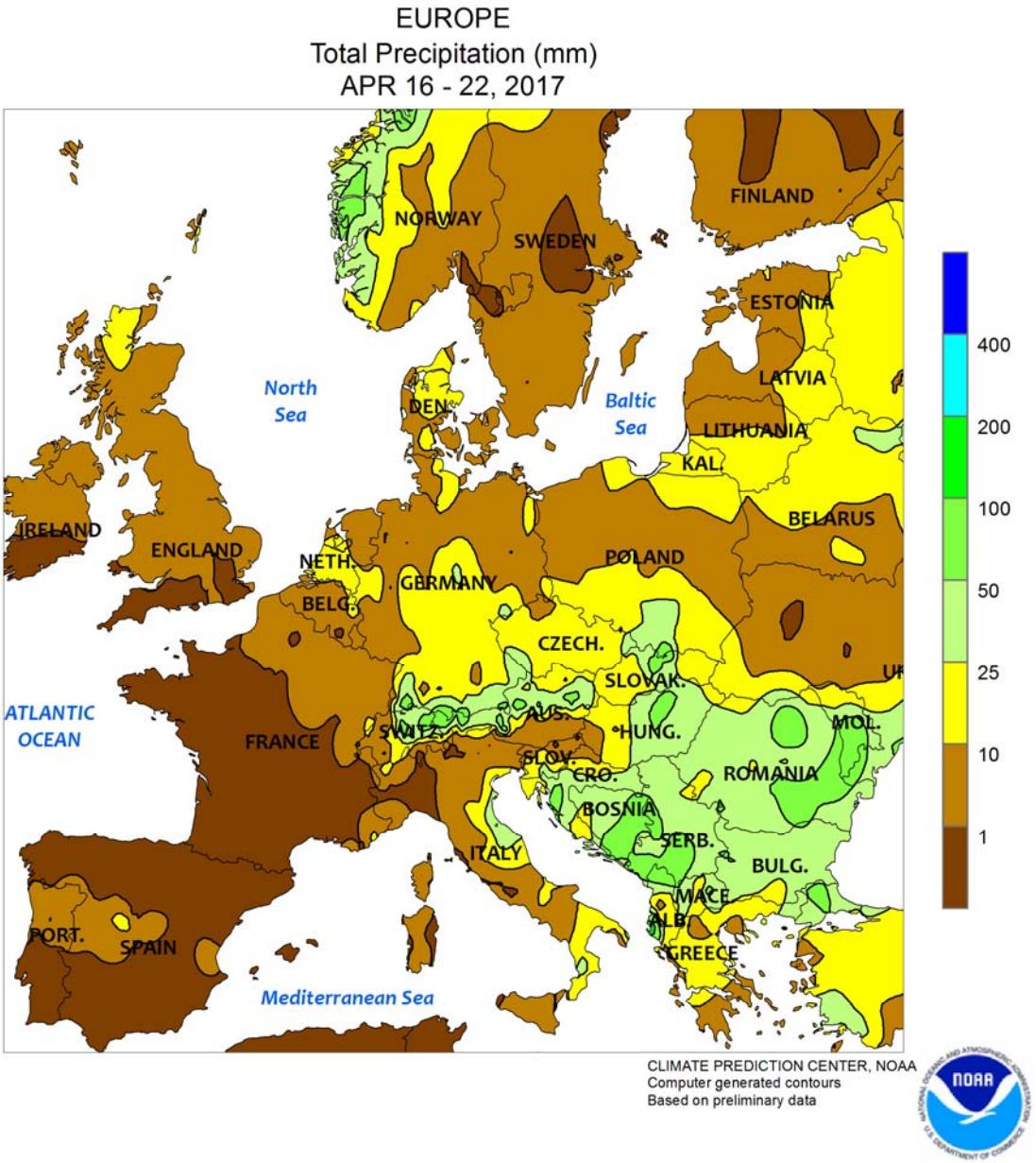
ARGENTINA: Mild, dry weather improved conditions for grain and oilseed harvesting in central Argentina.

BRAZIL: Late-season rain maintained favorable conditions for second-crop corn.

MEXICO: Scattered showers helped to condition fields for planting in eastern sections of the corn belt.



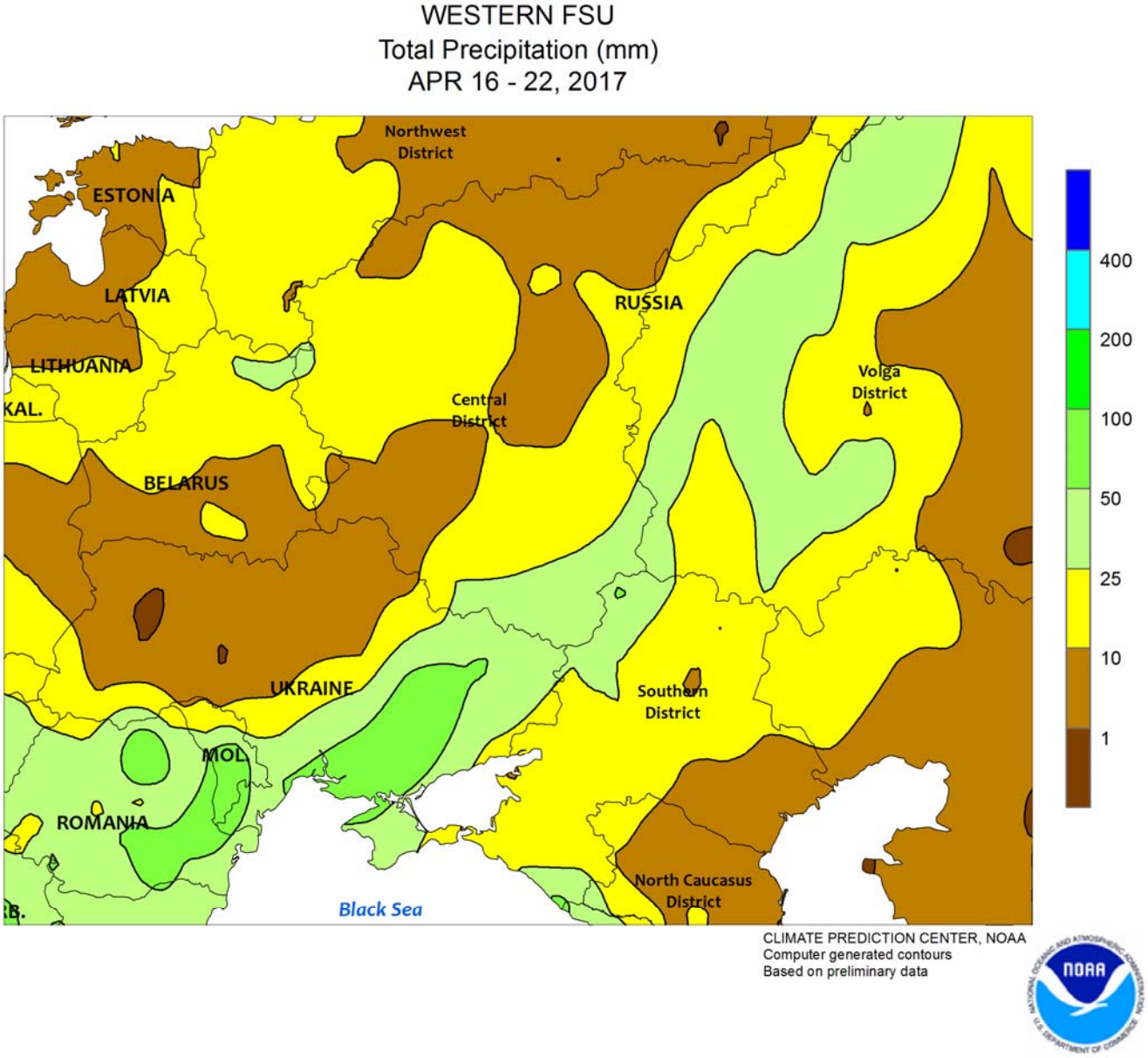
For additional information contact: mbrusberg@oce.usda.gov



EUROPE

Increasingly dry conditions in western Europe contrasted with beneficial rain in central and eastern areas. A persistent ridge of high pressure maintained mostly dry weather from southeastern England and France onto the Iberian Peninsula. Short-term dryness has become a concern in southeastern England, France, and — to a lesser extent — western Germany, with rainfall over the past 30 days totaling 10 to 50 percent of normal. However, winter wheat and rapeseed were still in the vegetative stages of development and yield potential had not yet been adversely impacted. In Spain, longer-term dryness (10-50 percent of normal over the past 60 days) and warmer-than-normal temperatures (up to 7°C above normal) have adversely impacted wheat and barley in the reproductive (north) to filling (south) stages of development; as a result, yield expectations have likely been reduced. Meanwhile, a series of slow-moving storms brought widespread soaking rainfall (10-75 mm, locally more) from central and southern portions of Germany and Poland into the Balkans and eastern Italy. The wet weather slowed the planting of summer crops (corn, soybeans, sunflowers, and cotton) but maintained excellent moisture supplies for vegetative winter grains and oilseeds.

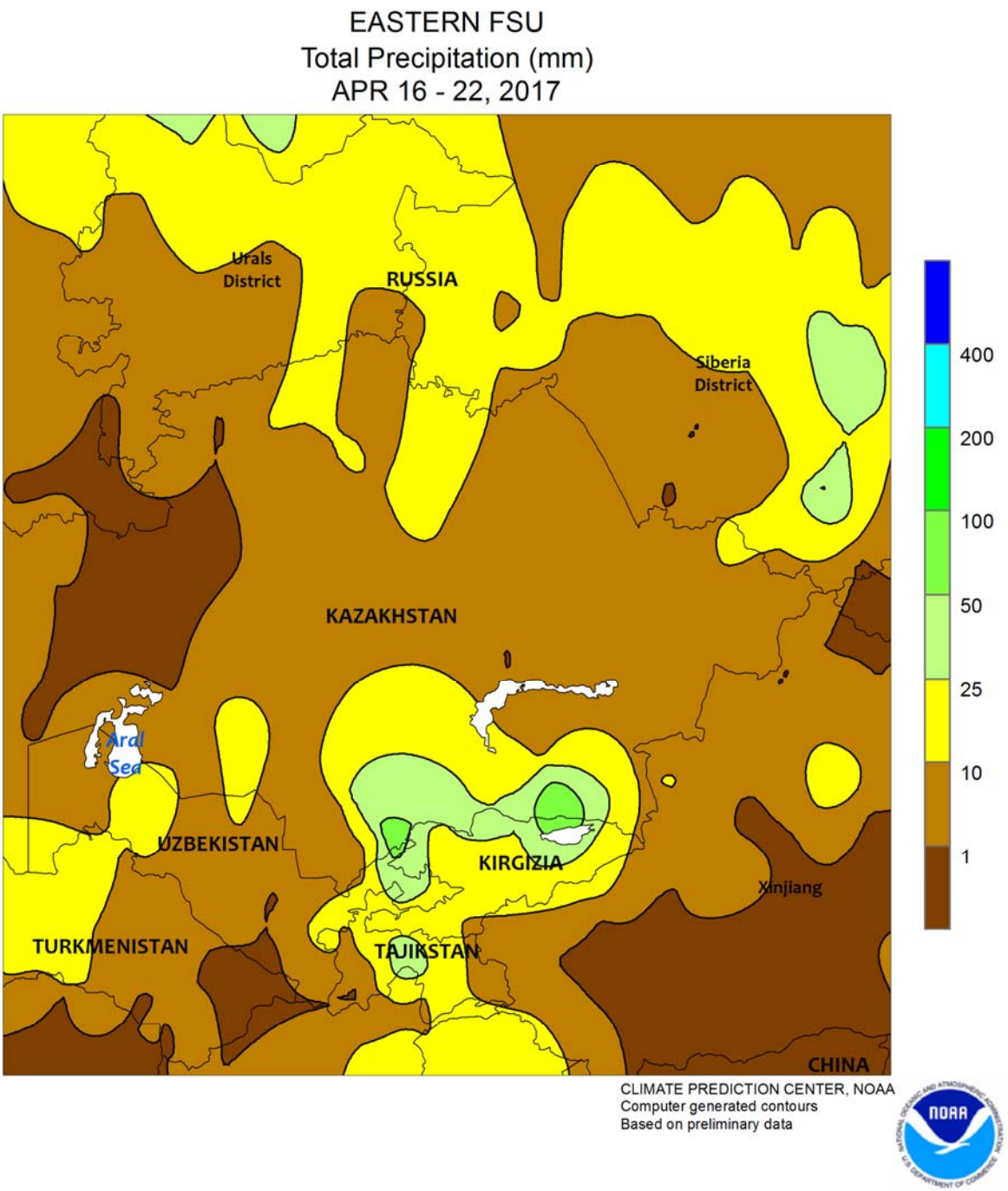
For additional information contact: mbrusberg@oce.usda.gov



WESTERN FSU

Moderate to heavy precipitation alleviated lingering dryness concerns in Ukraine and sustained favorable crop prospects in Russia. A slow-moving storm system produced 10 to 80 mm of rain and wet snow from Moldova and south-central Ukraine into central Russia, while a trailing cold front triggered light to moderate showers (5-25 mm) in southern Russia. The precipitation in Ukraine continued to improve wheat prospects following a protracted dry spell during late winter and early spring. In southern Russia, soil moisture supplies for vegetative winter wheat remained good to excellent. However, the wet weather hampered summer crop planting across Moldova, southern Ukraine, and much of Russia, while corn and soybean planting in northern and western Ukraine was able to proceed without significant delay where rain was lighter (less than 5 mm). In the storm's wake, chilly weather (3-6°C below normal) settled over much of the region, though the accompanying hard freezes (-10 to -2°C) likely had little widespread impact on agriculture.

For additional information contact: mbrusberg@oce.usda.gov



EASTERN FSU

Mild, showery weather kept soils favorably moist for early spring grain planting. Across central Russia and neighboring portions of northern Kazakhstan, this season's snowpack melted during the early to middle part of April, allowing producers to begin preparing fields for spring grain sowing. During the past week, light to moderate showers (2-15 mm) maintained good soil moisture for early wheat and barley planting, while temperatures up to 5°C above normal ensured there was no late-season snow to impede early fieldwork. Farther south, 10 to 30 mm of rain maintained adequate to abundant moisture reserves for vegetative winter wheat in Uzbekistan, while late-season mountain snow boosted irrigation reserves for early cotton planting and establishment.

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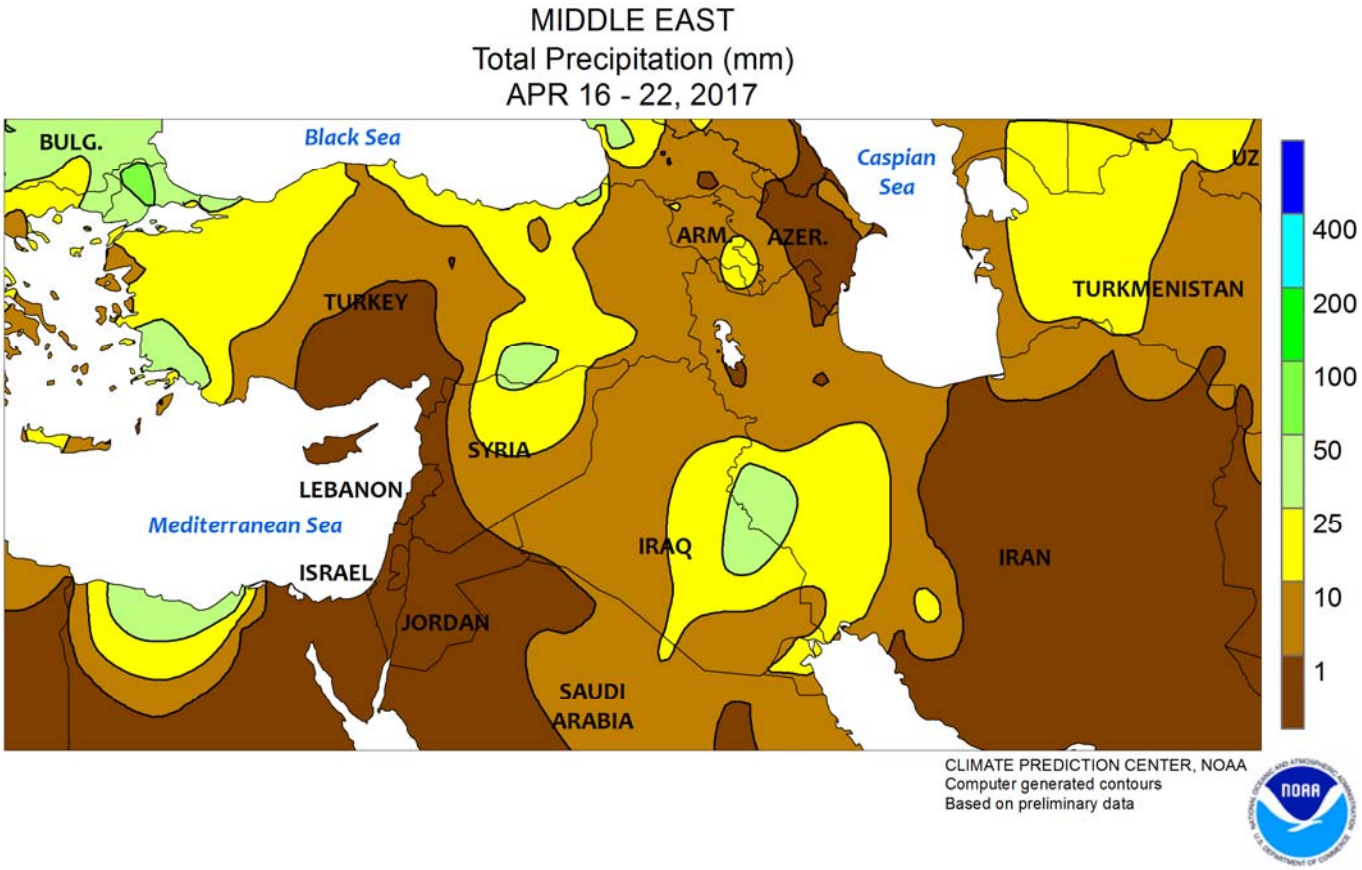

MIDDLE EAST

Unsettled weather continued over much of the region, maintaining favorable moisture supplies for winter grains. A late-week storm triggered scattered showers (10-40 mm) over western and southeastern Turkey, sustaining good moisture supplies for winter grains and recently-sown summer crops. However, rain bypassed southern and eastern portions of Turkey's Anatolian Plateau, where crops continued to exhibit varying levels of stress in satellite-derived vegetation health data due to autumn dryness and resultant poor establishment. Widespread, variable showers (1-25 mm, locally more) fell from northern Syria into Iraq and northern Iran, sustaining mostly favorable prospects for vegetative (north) to filling (south) winter grains.

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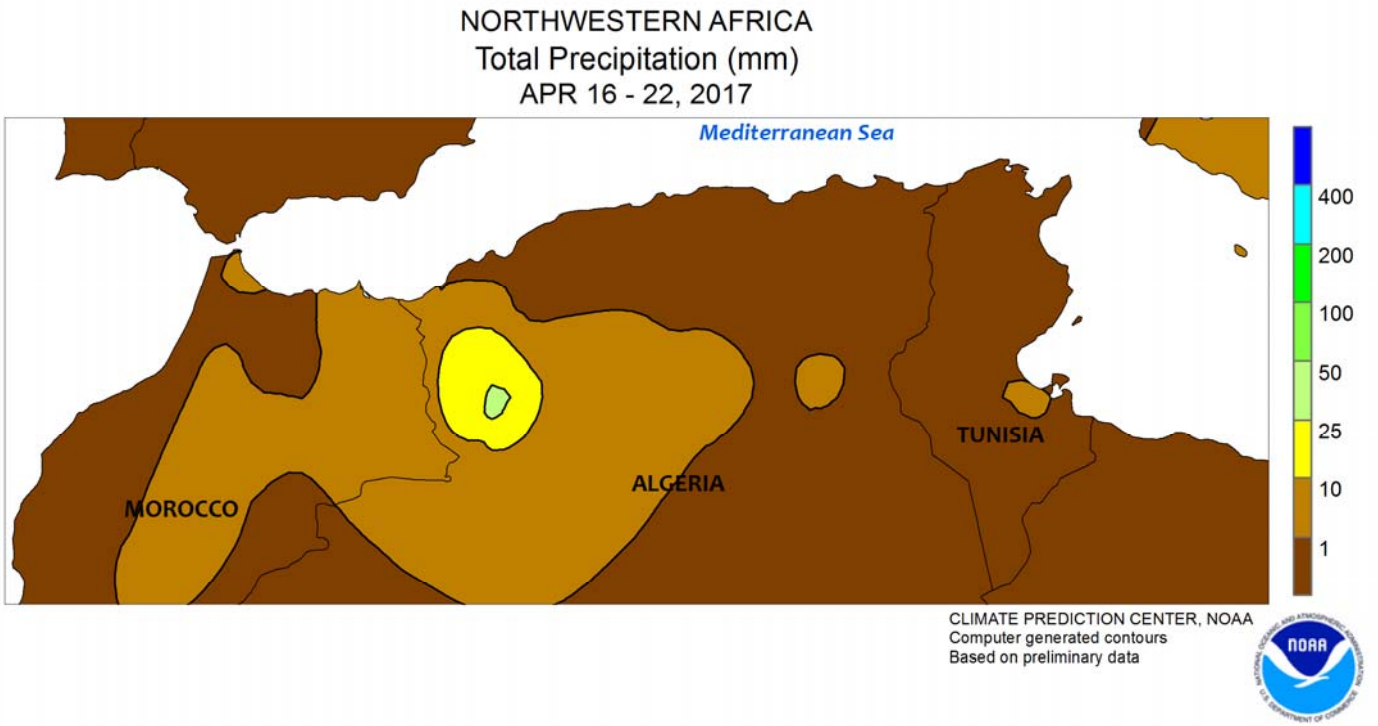

NORTHWESTERN AFRICA

Dry, increasingly hot weather prevailed across the region, accelerating crop development but reducing winter grain yield prospects. In Morocco, sunny skies and above-normal temperatures (4-8°C above normal) hastened winter grain development, with maximum temperatures as high as 39°C adversely impacting flowering to filling winter wheat and barley. As a result, while Moroccan crop prospects are still vastly improved over last year, winter crop yield potential has been reduced over the past month due to dryness and increasing heat. In Algeria, dry weather continued, with building heat (30-32°C) in the west contrasting with favorably cooler daytime highs (lower to middle 20s) in the east; Algeria's crop prospects remained mixed due to recent dryness in the west as well as dry autumn weather for planting and establishment in the northeast. In northern Tunisia, dry weather accelerated winter grains through the reproductive stages of development, with prospects still overall favorable due to a lack of recent heat (daytime highs 21-27°C) as well as timely, consistent winter and spring rainfall.

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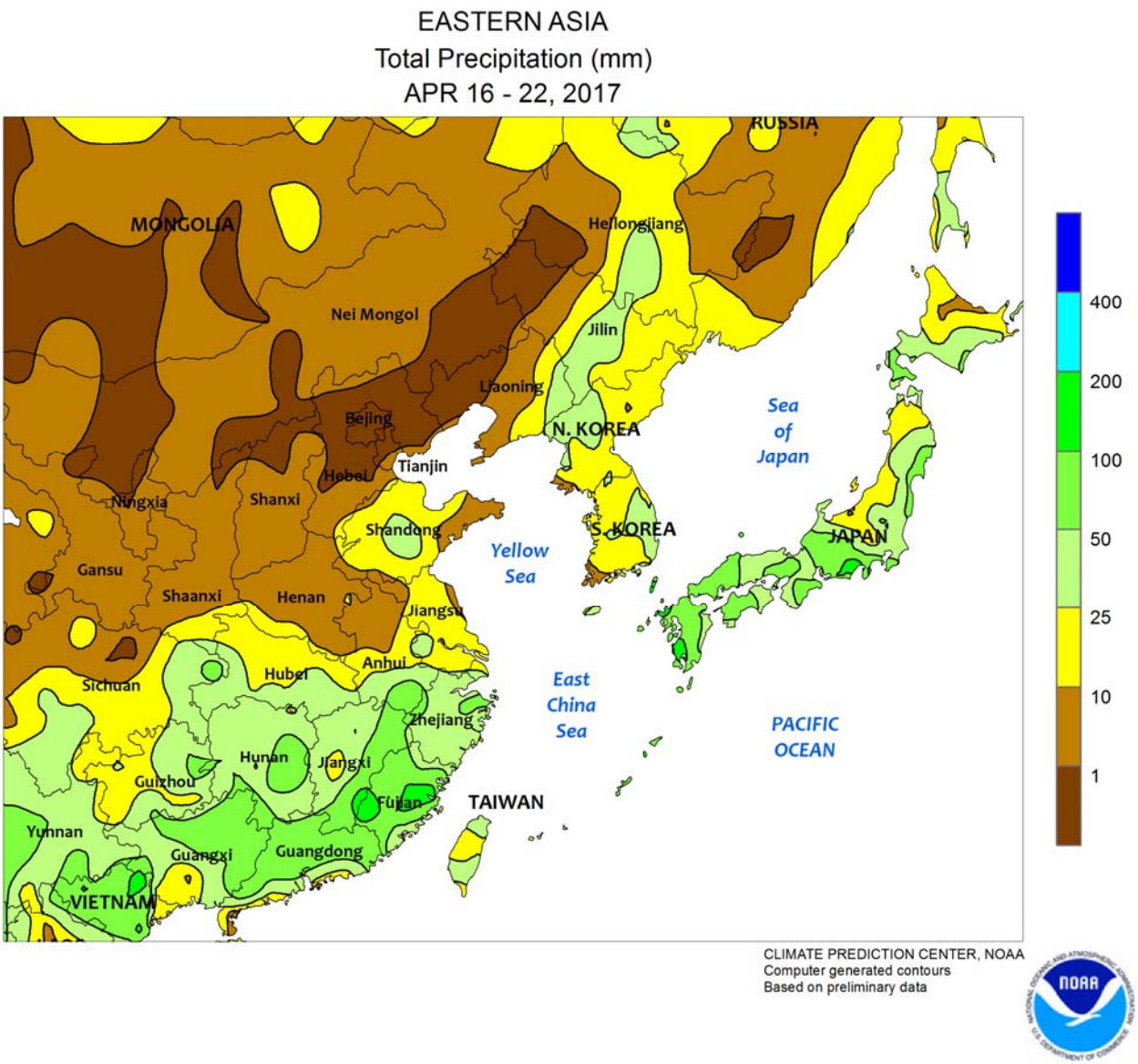

EASTERN ASIA

Widespread showers in southern China boosted soil moisture for reproductive early-crop rice. Rainfall totals surpassed 25 mm south of the Yangtze River and locations in the far south received over 50 mm. The wet weather maintained above-normal spring rainfall totals in nearly all southern provinces and nearly erased lingering spring deficits in Guangdong and Guizhou. Showers were lighter (10-25 mm) in northern sections of the Yangtze Valley, as rapeseed continued to mature. Meanwhile, similar amounts were reported in eastern portions of the North China Plain, easing spring dryness and providing beneficial moisture to reproductive wheat. Temperatures throughout eastern China were up to 5°C above normal, promoting development of winter and spring crops.

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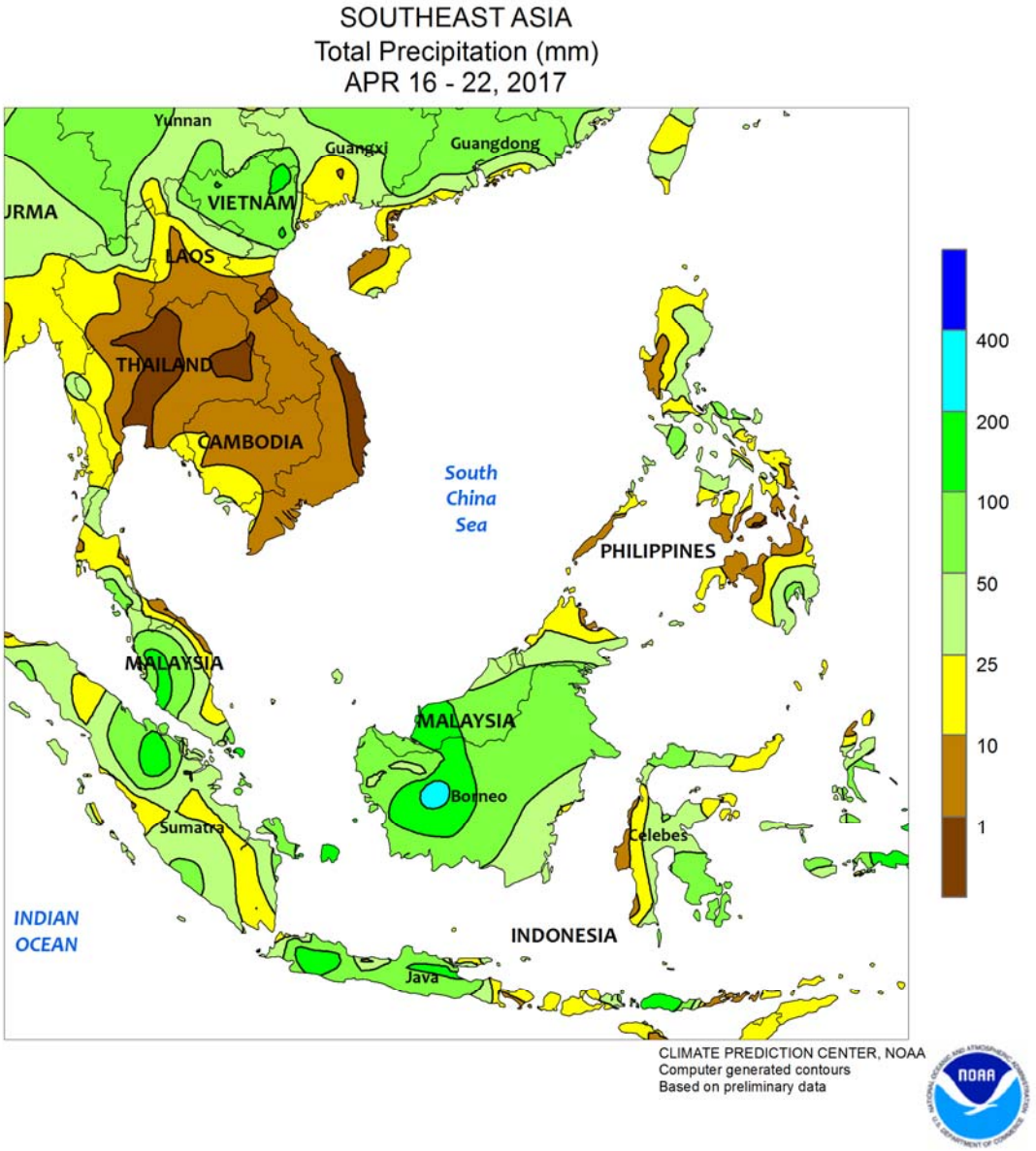

SOUTHEAST ASIA

Transient showers remained confined to southern locales of the region. Most of Indonesia received over 50 mm of rain, maintaining favorable soil moisture for oil palm and irrigation reserves for rice. Similarly, oil palm in Malaysia benefited from rainfall totals over 50 mm. Lighter showers (10-50 mm) were observed in parts of the Philippines where fieldwork was underway in advance of the summer wet season. Seasonally dry weather returned to Thailand and environs as growers prepare for the onset of the wet season. Tropical showers typically begin migrating northward at this time of year, ushering in the wet season across Thailand and the rest of Indochina as well as western portions of the Philippines.

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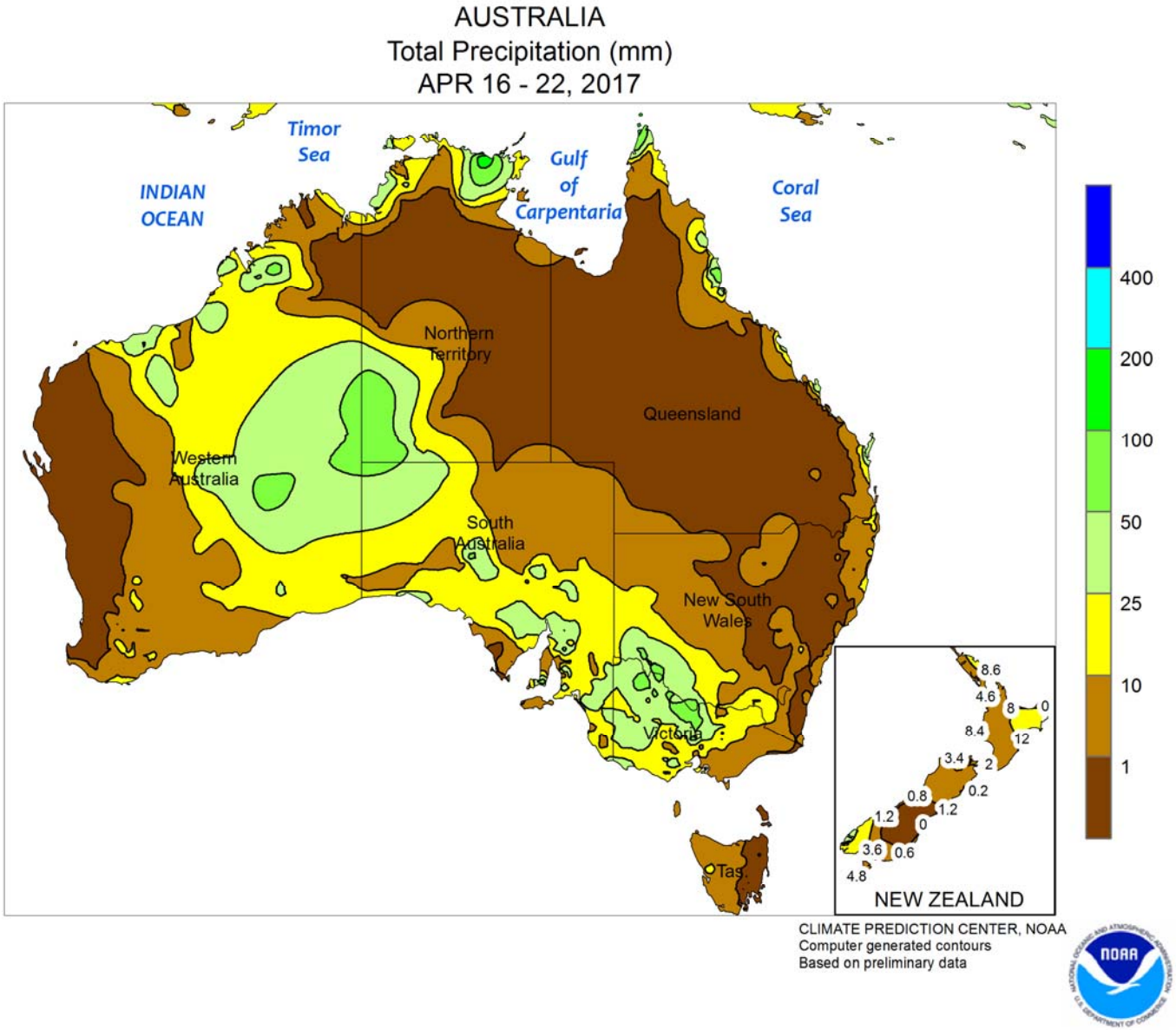

AUSTRALIA

Warm, dry weather persisted in southern Queensland and northern New South Wales, aiding summer crop dry down and harvesting. In addition, the tranquil weather likely served as a catalyst for wheat and other winter crop planting, with sunny skies and adequate to locally abundant soil moisture favoring early sowing. Farther south, soaking rains (10-50 mm, locally near 75 mm) overspread most of southeastern Australia, providing a welcome boost in topsoil moisture in advance of winter grain and oilseed planting. Elsewhere, scattered showers (5-25 mm) in Western Australia helped condition topsoils prior to upcoming wheat, barley, and canola planting. In Australia, most winter grains and oilseeds are sown in May and June each year. However, widespread sowing can begin as early as late April when soil moisture is adequate to abundant. In contrast, sowing can extend into early July when rainfall is scarce throughout the planting window. Temperatures during the week averaged 2 to 4°C above normal in southeastern Australia and near normal in western and northeastern Australia.

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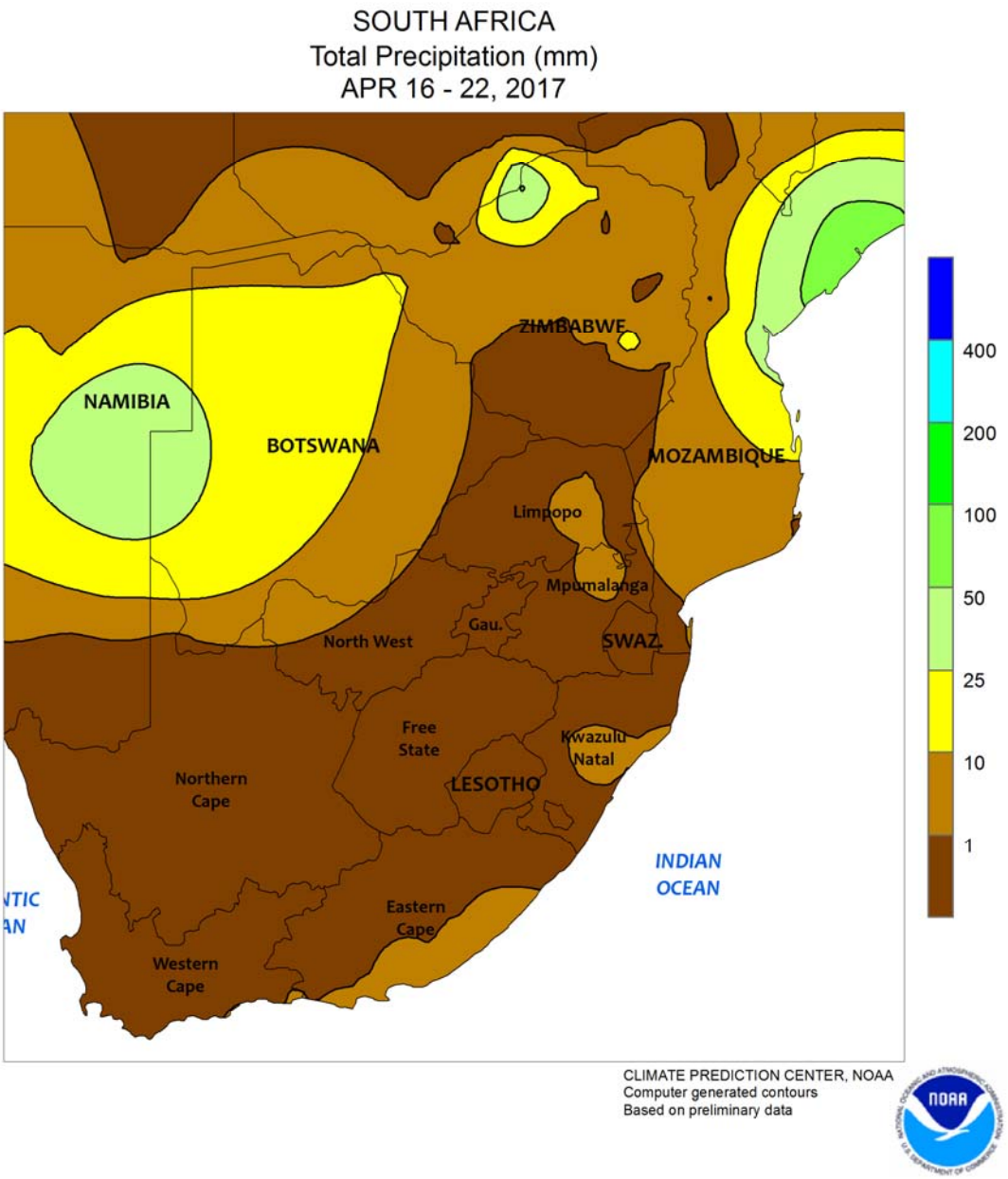

SOUTH AFRICA

Dry, unseasonably cool weather dominated the region, favoring drydown of corn and other maturing summer crops. Weekly temperatures averaged 1 to 2°C below normal across a broad section of the east that included the corn belt (North West and Free State to Mpumalanga), sugarcane areas of KwaZulu-Natal, and irrigated farmlands in the Orange River Valley. Nighttime lows briefly fell below 5°C in the corn belt but no widespread season-ending freeze was recorded. The dryness aided seasonal fieldwork – including early sugarcane harvests and preparations for wheat planting — but additional moisture would be welcome in Western Cape for wheat establishment.

This is the final weekly summary of the season; coverage will resume in October upon the start of the summer growing season.

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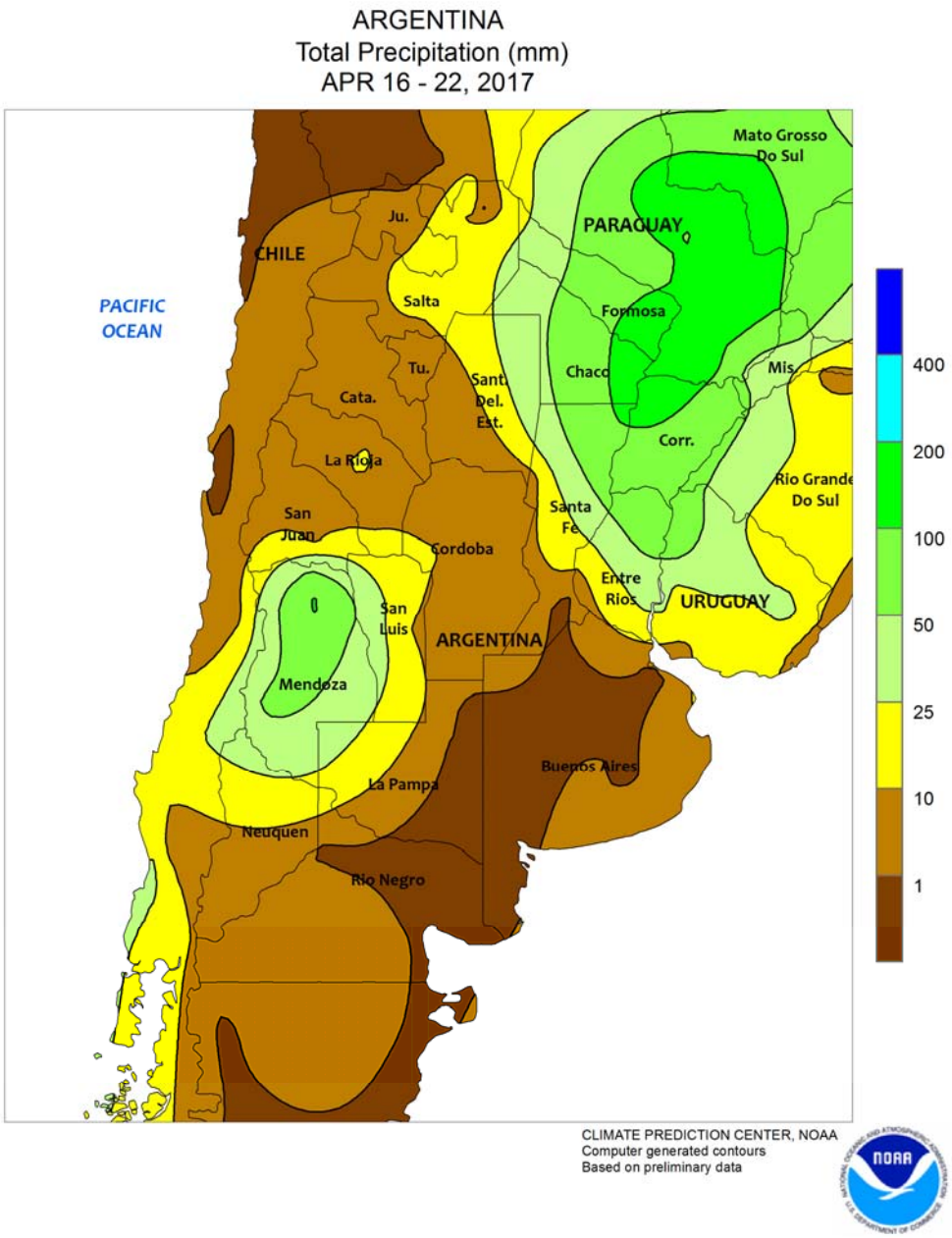

ARGENTINA

Favorably dry weather helped to alleviate excessive field moisture in important agricultural areas of central Argentina. Following several weeks of unusually heavy rain, little to no rain fell in Buenos Aires and neighboring farming areas of La Pampa, Cordoba, and Santa Fe. Weekly average temperatures were near to slightly below normal, with nighttime lows falling below 5°C in southernmost production areas of la Pampa and Buenos Aires. Farther north, moderate to heavy rain (25-100 mm, locally higher) continued in northeastern agricultural areas, extending as far south as central Entre Rios. Northern temperatures were also cooler than normal, although daytime highs reached the upper 20s and nighttime lows stayed above 10°C in most areas. According to the government of Argentina, corn and soybeans were 25 and 21 percent harvested, respectively, as of April 20, at least 5 points ahead of last year's pace for both crops. Sunflower harvesting was virtually complete at 98 percent.

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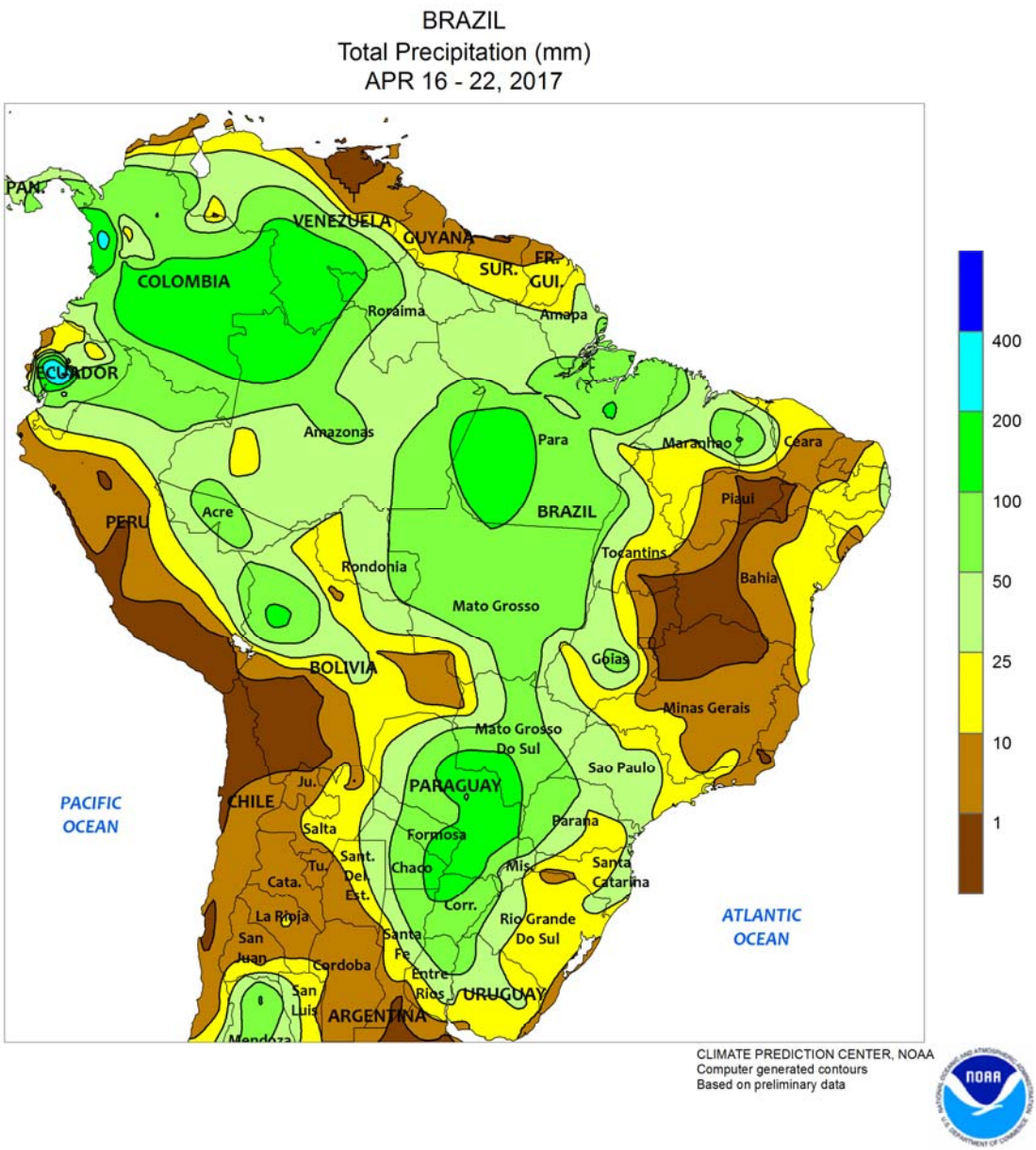

BRAZIL

Late-season showers increased moisture for second-crop corn in primary production areas of central Brazil. Unseasonably heavy rainfall (25-100 mm) covered most of the Center-West Region (Mato Grosso, Goias, and Mato Grosso do Sul) and extended eastward into Tocantins. However, drier conditions continued for a second week in western Bahia, limiting moisture for later-planted corn and cotton while favoring the final stages of the soybean harvest. Above-normal temperatures (daytime highs reaching the middle 30s degrees C) maintained high crop moisture demands in the aforementioned areas. Elsewhere, light to moderate rain (10-50 mm) fell from southern Minas Gerais to Rio Grande do Sul, favoring immature corn, sugarcane, and other late-developing crops. According to the government of Parana, second-crop corn was about 45 percent flowering to filling as of April 17, with most of the remaining crop vegetative. Meanwhile, first-crop corn and soybeans were almost completely harvested at 94 and 97 percent, respectively, and wheat was 2 percent planted.

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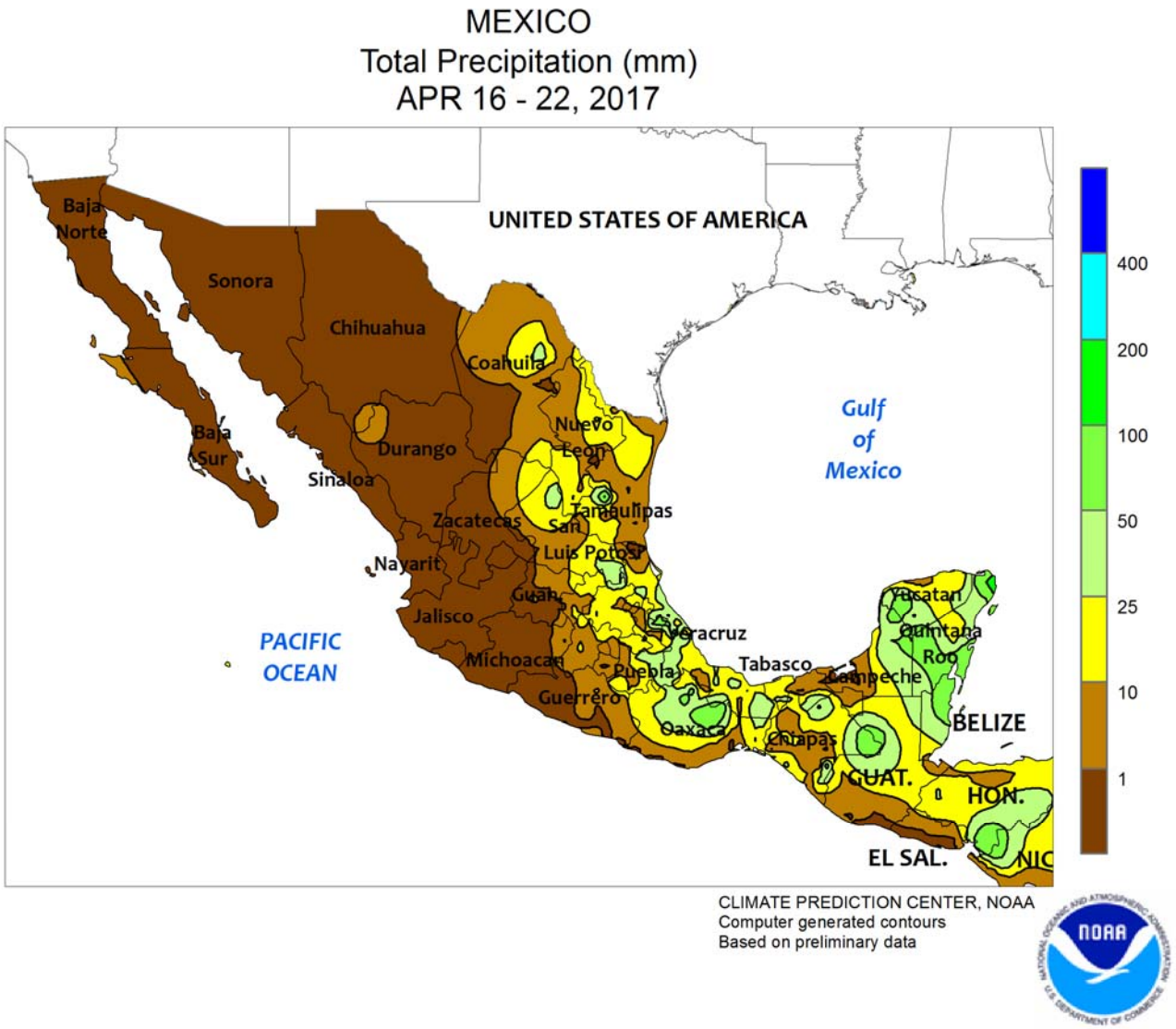

MEXICO

Scattered showers helped to condition fields for corn planting in eastern sections of the southern plateau. Rainfall totaling 5 to 25 mm extended from Puebla westward to eastern-most Michoacan. Somewhat heavier amounts also boosted early-season moisture reserves in sections of Veracruz and Oaxaca, as well as on the Yucatan Peninsula. In the northeast, scattered showers (locally greater than 10 mm) lingered over winter sorghum areas of Tamaulipas and Nuevo Leon. In contrast to the eastern wetness, seasonable dryness dominated the western half of the country. Above-normal temperatures accompanied the dry weather in the northwest, spurring rapid maturation and harvesting of winter grains — including corn. In western sections of the southern plateau, farmers await the onset of seasonal rainfall, which typically occurs in May, before corn planting can become widespread.

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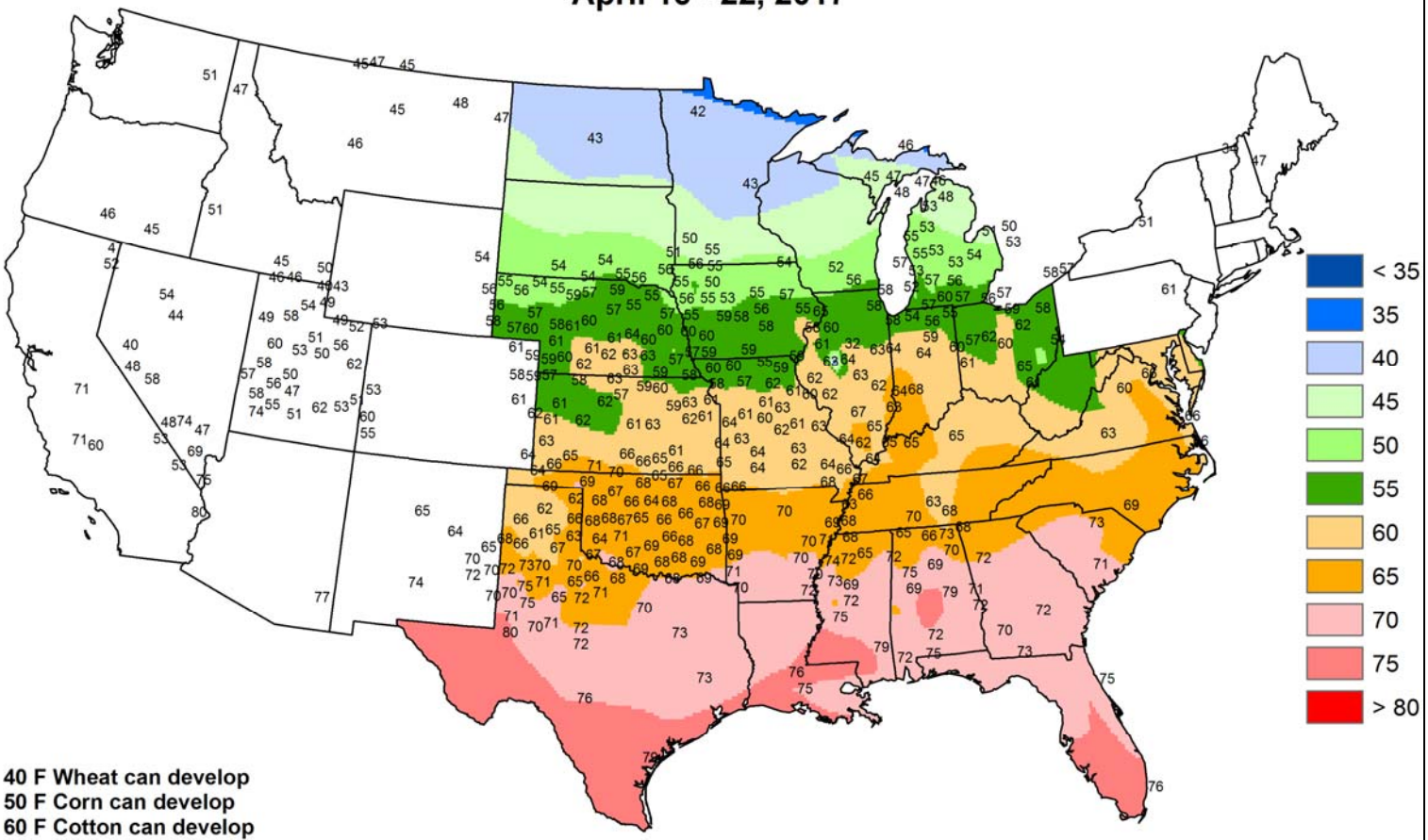
Average Soil Temperature (Deg. F, 4" Bare)

April 16 - 22, 2017



40 F Wheat can develop
50 F Corn can develop
60 F Cotton can develop

Based on preliminary data.

Supplemental data provided by Alabama A&M University, Bureau of Reclamation - Pacific Northwest Region AgriMet Program, High Plains Regional Climate Center, Illinois State Water Survey, Iowa State University, Louisiana Agriclimatic Information System, Mississippi State Univeristy, Oklahoma Mesonet, Purdue University, University of Missouri and USDA/NRCS Soil Climate Analysis Network.

USDA United States Department of Agriculture

The *Weekly Weather and Crop Bulletin* (ISSN 0043-1974) is jointly prepared by the U.S. Department of Commerce, National Oceanic and Atmospheric Administration (NOAA) and the U.S. Department of Agriculture (USDA). Publication began in 1872 as the *Weekly Weather Chronicle*. It is issued under general authority of the Act of January 12, 1895 (44-USC 213), 53rd Congress, 3rd Session. The contents may be redistributed freely with proper credit.

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