

# Weekly Weather & Crop Bulletin

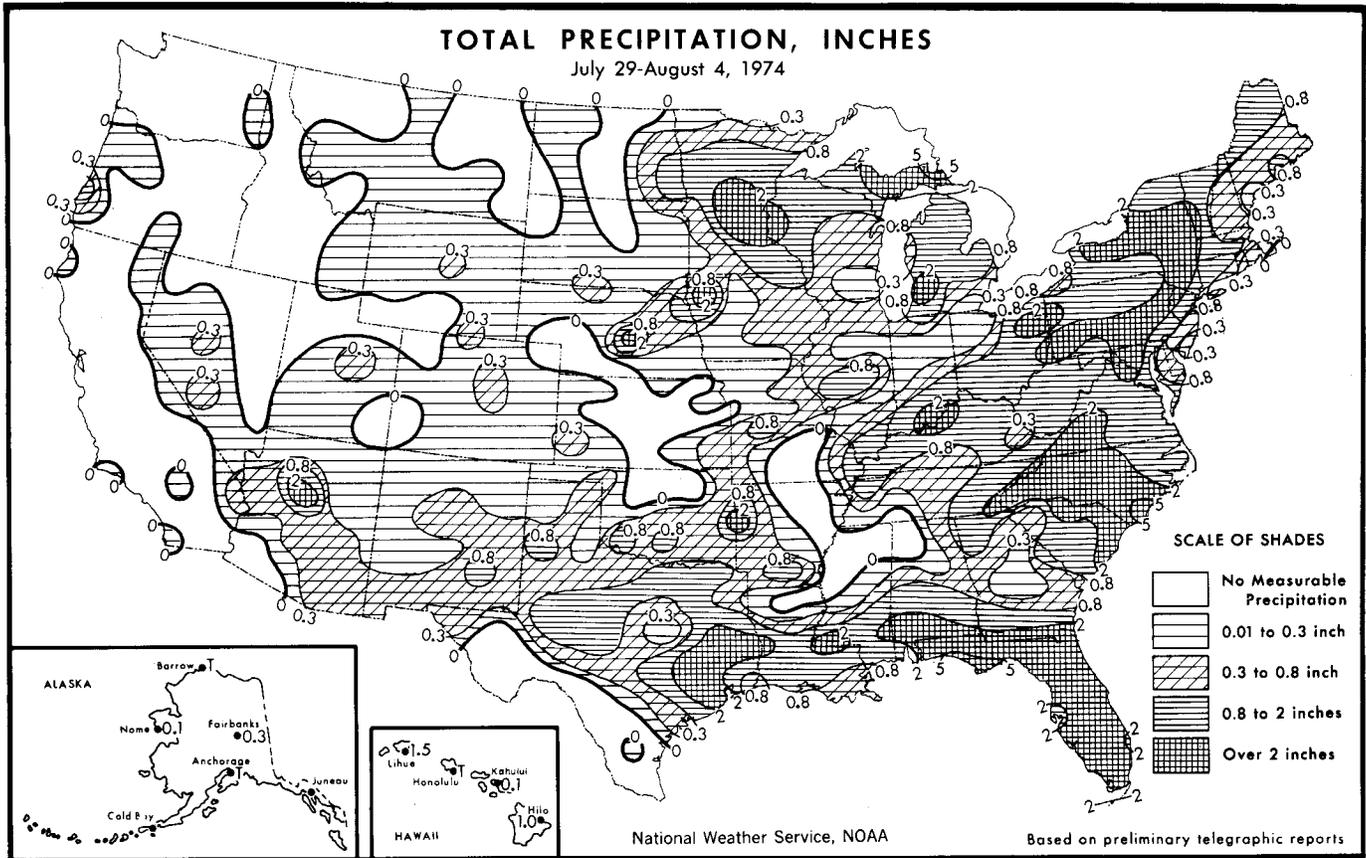
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## NATIONAL WEATHER SUMMARY

**HIGHLIGHTS:** Precipitation, in varying amounts, fell across most of the Nation east of the Rocky Mountains. Some much needed rain fell over critically dry areas of the Corn Belt. Nearly 2.00 in. was recorded at Sioux City, Iowa and Grand Island, Nebr. Further south, rainshowers were reported over the drought-stricken areas of west Texas with almost 1.80 in. at San Angelo.

Temperatures were below normal across much of the Nation. Only the Far West, portions of New England, and Mid-Atlantic Seaboard areas reported temperatures near normal or above.

Below normal temperatures were reported throughout the Corn Belt States, averaging as much as 9 to 10° below normal in Iowa and southeastern Nebraska. The cool temperatures greatly reduced moisture requirements in this very dry area.

**PRECIPITATION:** Good rains measuring over 3.00 in. soaked sections of New York, Ohio, Pennsylvania, and east Texas along with as much as 5.00 in. re-

ported in North Carolina, Michigan, and the Florida Peninsula. Isolated heavy showers were reported in sections of the Midwest, Northern and Mid-Atlantic States, and Gulf Coast States. In the Desert Southwest 2.00 in. was reported at Flagstaff, Ariz.

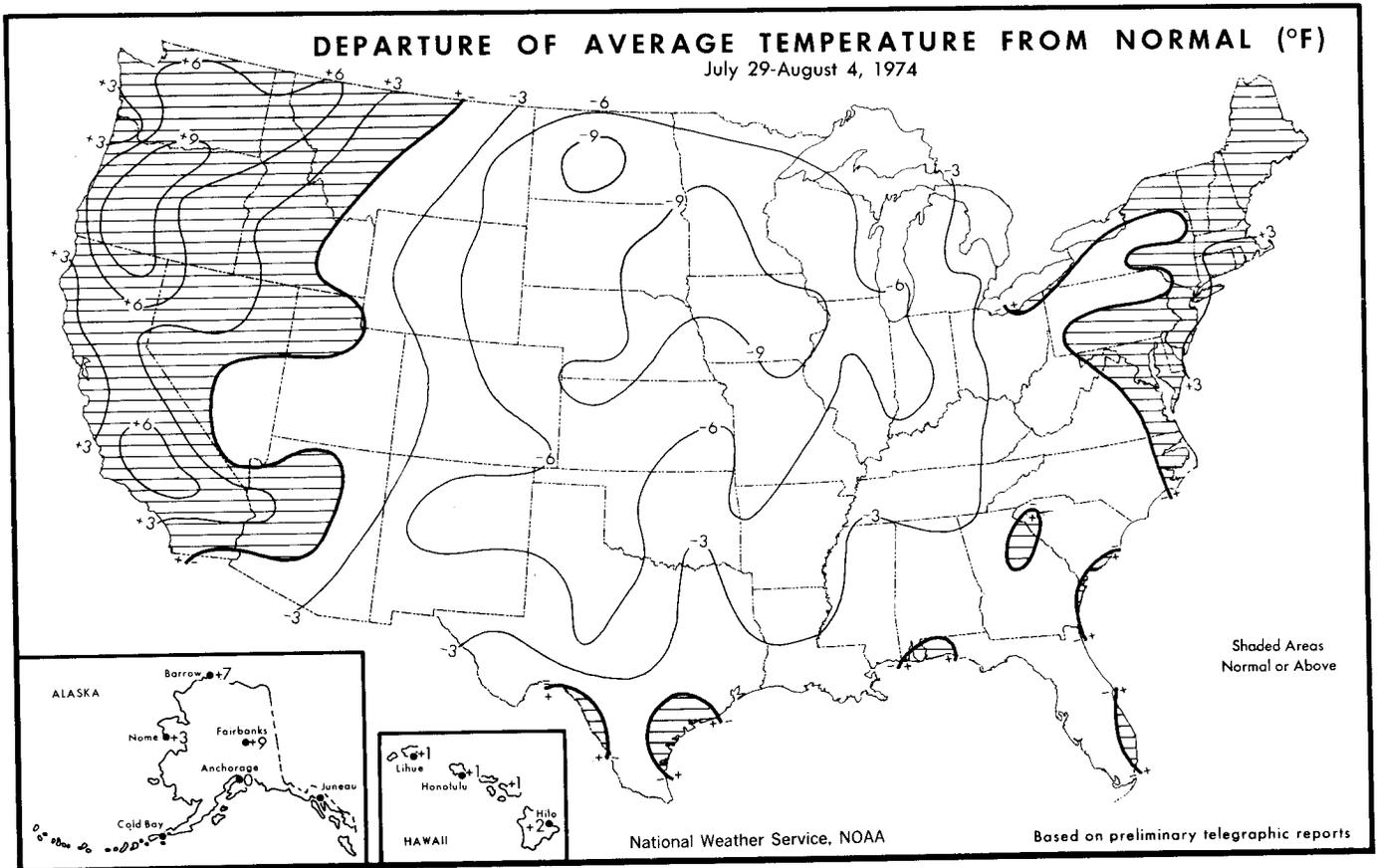
Some portions of the Far West received little or no precipitation during the week.

Monday, the 29th, a cold front trailing from the central Great Lakes into the Texas Panhandle triggered scattered thundershowers from northwest Texas into Kansas and western Missouri.

Tuesday, the 30th, a cold front stretching across the Atlantic and Gulf Coast States into southern Texas produced thundershowers from southwestern Texas into the central Gulf Coast States and rain along with fog in eastern New England.

Wednesday, the 31st, a Low in western Nebraska brought welcome showers to South Dakota, Nebraska, and Iowa, although the precipitation was not enough to affect the driest areas.

Thursday, scattered light to moderate rain



showers, drizzle, and an occasional thundershower continued to move eastward across portions of Iowa, Kansas, Missouri, and Illinois during the morning. During the evening heavy thunderstorms caused flash flooding in South Central, Miss. leaving 8.00 to 10.00 in. of water standing in parts of downtown Columbia, Miss.

On Friday, showers and thundershowers were again widely scattered over the Plateau region into the central and southern Rockies as well as over the mountains and deserts of California and generally eastward to the Atlantic.

A weather system centered in Wisconsin triggered thunderstorms ahead of a cold front that extended into southwestern Texas on Saturday. Late that evening, Sault Ste. Marie, Mich. had a record downpour that produced nearly 6.00 in. of rain in a little over 3 hours. The deluge broke the all-time 1-day rainfall record and brought the August total to over 6.00 in. above normal.

Thunderstorms soaked the Atlantic Coast States on Sunday. Strong gusty winds marked their passage. Elsewhere scattered thundershowers were active in parts of Texas, the Desert Southwest, and the Northern Plateau.

**TEMPERATURE:** Cool weather brought welcome relief from the hot temperatures that prevailed across the Central U.S. over the past several weeks. Temperatures averaging as much as 9 to 10° below normal were recorded in North Dakota, Minnesota, Nebraska, Iowa, and Kansas.

In contrast, the Pacific Northwest reported unusually hot temperatures, averaging as much as 10° above normal in Oregon. Elsewhere, the interior portions of California recorded temperatures

averaging as much as 6 to 7° above normal.

Monday, the 29th, a cold front stretching from the central Great Lakes into the Texas Panhandle cooled the hot temperatures that prevailed across the Plains over the past several weeks. Morning lows dipped into the mid-40's in parts of the Dakotas and northern Nebraska. In Omaha, Nebr., the mercury rose to only 87° which broke a string of 18 consecutive days of 90° or higher.

Tuesday, temperatures warmed into the 80's and 90's over most of the country with readings well above the 100° mark in the Southwest. The interior sections of the Northwest were unseasonably hot with numerous highs in the 90's.

Morning lows generally ranged from the 50's into the 70's on Wednesday. The coolest temperatures were reported in the northern Rockies, the upper Plains, the upper Mississippi Valley, and the Great Lakes.

Thursday, the 1st, afternoon temperatures in Iowa and eastern Nebraska were in the 60's while the states were surrounded by 70° and 80° readings.

Temperatures remained in the 70's through the Great Lakes, Iowa and into New Mexico on Friday. The 60's and 70's dominated the Northern Plains.

Saturday, the 3rd, a high centered in North Dakota brought cool air to the Northern and Central Plains, setting new record lows from North Dakota to Missouri.

New records were: 39° at Bismarck, N. Dak.; 44° at Casper, Wyo.; 44° at Rapid City, S. Dak.; 42° at North Platte, Nebr.; 50° at Concordia, Kans.; and 48° at St. Joseph, Mo.

Sunday, the large high pressure area stretched through the Plains and brought cool Canadian air into much of the central U.S., breaking many record low temperatures.

## NATIONAL AGRICULTURAL SUMMARY

**HIGHLIGHTS:** Small grain combining advanced rapidly. Subnormal temperatures in the Corn Belt States slowed moisture demand. Rains in the South benefitted cotton and other row crops.

**SMALL GRAINS:** Combining of small grain crops advanced rapidly throughout most of the northern Great Plains and Northwest. Winter wheat harvesting is generally complete in South Dakota, 85% done in Michigan, and 60% complete in Montana. Dry weather during the week permitted the wheat harvest to peak in Oregon and continue active in Washington, but behind normal.

Spring wheat combining is much ahead of 1973 in South Dakota with 82% harvested, 10 days ahead of normal. Harvest in Minnesota is 14% complete, 10% in Montana and gaining momentum in North Dakota.

Oat harvest is nearly complete in Iowa, 85% in South Dakota, and 31% combined in Minnesota. Harvest is underway in Wisconsin with 10% done, compared with 25% normal.

**CORN:** Rainfall was light in the moisture short Corn Belt, but subnormal temperatures tended to minimize moisture demands. Rains and cool weather temporarily helped conditions in Iowa except for the dry southwest and south central areas. Much needed rain also boosted growth in parts of Illinois, Indiana, Michigan, Minnesota, Ohio, and Wisconsin. Soil moisture supplies remain mostly short and development is behind normal throughout most of the Corn Belt. In Iowa, the leading corn producing State, 80% of the fields are 75% or more silked and 25% in the dough stage which is 5 points behind normal. In Illinois 62% of the crop is rated in fair condition and is 70% silked, compared with 92% normal. Nebraska's irrigated corn is in mostly fair condition while much of the dryland corn is in poor condition.

Corn in the South made good growth from recent rain and near normal temperatures. Harvest continues slow in Florida while progress more than doubled to 15% complete in Texas.

**COTTON:** The cotton crop made good progress in all areas as rains in the South benefitted the crop and made soil moisture more plentiful. Most of the crop is in fair to good condition and development is ahead of last year in many areas.

In south Texas cotton harvesting is 3% done. Elsewhere, setting of bolls ranges from virtually all set in Alabama to 51% in Oklahoma. In Mississippi 81% of the crop is setting bolls versus 95% normal.

Second generation boll weevils are present in Arkansas. Growers applying insecticides on regular schedules where insect counts are high.

California cotton fields continue to bloom and set bolls and in Arizona boll opening is at an accelerated rate in the Yuma area. Hot weather and insects are causing much concern to the crop in Texas.

**SOYBEANS:** Soybean growth in the North Central States was slowed last week by below normal

temperatures and short topsoil moisture. Some areas received badly needed rain, but more is needed to bring supplies back to normal and assure continued crop development.

Most of the Corn Belt acreage is blooming and is well along in setting pods. Soybean development is behind normal in all Corn Belt States except Minnesota and South Dakota. In Illinois the crop is rated fair to good, 52% is blooming versus an average of 82%, and 17% of the acreage has pods set compared with the normal 55%. Iowa soybeans are in better overall condition than corn with 77% blooming and 35% pods set or more advanced.

In the Southeast, most fields are in good condition from recent rains and near normal temperatures. Development is ahead of 1973 throughout most of the South Central Region.

**OTHER CROPS:** Second crop hay yields are down in most States due to dry weather, but quality remains high. Sorghum harvesting in southern Texas has nearly doubled last year's progress at 40% done. Kansas sorghum is 20% headed, equal to 1973 but is 5 points behind normal. In Nebraska 40% is headed, normally 59%.

Kentucky burley tobacco is 46% blooming, 16% topped. Much of the crop is blooming at short height. The Idaho and Maine potato crops continue to make good progress. Harvest preparation for early varieties are underway in southeast Idaho.

Sugarbeet harvest in California is almost complete in the Imperial Valley and starting in the San Joaquin Valley. Good rains were received over much of the dry bean area in Michigan while 46% of the crop has flowered in Colorado.

**FRUITS AND NUTS:** Peach harvest increasing in North Atlantic States. Lack of moisture is retarding grape size in New York while California grapes continue to develop well and harvest of table varieties is active. Pecans continue to drop in Texas as trees show stress from lack of moisture. The California almond crop continues toward harvest, hull splitting occurring many areas. Citrus trees and new crop fruit are doing well in Florida and Texas.

**VEGETABLES:** Vegetable supplies are increasing in the mid and North Atlantic States and the Great Lakes area. In New York green pepper and eggplant harvest are beginning while cutting green and red cabbage for processing is underway. Harvest of market tomatoes in California's south coast active and harvest of canning tomatoes is advancing rapidly in San Joaquin Valley and gaining in the Sacramento Valley.

**PASTURES AND LIVESTOCK:** Pastures are low in feed value in all North Central States. Supplemental feeding is required in many areas of the Great Plains and Western States as pastures and ranges continue to deteriorate. Livestock condition remains good in most areas but culling is necessary in some of the drier areas to help maintain adequate winter feed supplies.

Temperature and Precipitation Data for the Week Ending Midnight, l.s.t., Aug. 4, 1974

States and Stations	Temperature °F		Precipitation Inches		States and Stations	Temperature °F		Precipitation Inches		States and Stations	Temperature °F		Precipitation Inches	
	Average	Departure	Total	Departure		Average	Departure	Total	Departure		Average	Departure	Total	Departure
ALA.Birmingham . . .	78	-2	T	-1.1	La.Baton Rouge . . .	80	-2	1.0	-.3	Youngstown . . .	69	-2	3.1	+2.3
Mobile . . . . .	82	0	1.6	-.2	Lake Charles . . .	80	-3	.9	-.4	OKLA.Okla. City . . .	78	-5	.6	+ .1
Montgomery . . . .	79	-2	1.6	+ .7	New Orleans . . .	80	-2	.7	-.6	Tulsa . . . . .	80	-3	0	-.6
ALASKA.Anchorage . .	58	0	T	-.5	Shreveport . . . .	80	-4	.1	-.5	OREG.Astoria . . . .	64	+3	T	-.2
Barrow . . . . .	46	+7	T	-.3	MAINE.Caribou . . .	67	+2	.9	0	Burns . . . . .	74	+5	T	-.1
Fairbanks . . . . .	68	+9	.3	-.2	Portland . . . . .	70	+2	T	-.6	Medford . . . . .	82	+10	0	-.1
Juneau . . . . .	---	---	---	---	MD.Baltimore . . .	78	+1	1.0	0	Pendleton . . . . .	83	+9	T	-.1
Kodiak . . . . .	---	---	---	---	MASS.Boston . . .	75	+2	.8	+ .1	Portland . . . . .	70	+2	T	-.1
Nome . . . . .	54	+3	.1	-.7	Chatham . . . . .	67	-1	T	---	Salem . . . . .	75	+8	T	-.1
ARIZ.Flagstaff . . .	67	+1	2.1	+1.4	MICH.Alpena . . . .	63	-3	.9	+ .3	PA.Allentown . . . .	74	0	3.8	+2.8
Phoenix . . . . .	93	+2	.4	+ .1	Detroit . . . . .	70	-3	.4	-.4	Erie . . . . .	69	0	.4	-.4
Tucson . . . . .	82	-3	.8	+ .2	Flint . . . . .	68	-2	1.2	+ .5	Harrisburg . . . . .	78	+2	4.1	+3.3
Winslow . . . . .	78	0	.1	-.3	Grand Rapids . . .	66	-6	2.2	+1.6	Philadelphia . . . .	78	+1	.8	-.2
Yuma . . . . .	93	-2	T	-.1	Houghton Lake . . .	64	-3	1.1	+ .5	Pittsburgh . . . . .	72	0	.3	-.5
ARK.Fort Smith . . .	77	-6	2.3	+1.6	Lansing . . . . .	67	-4	.6	0	Scranton . . . . .	71	-1	1.6	+ .8
Little Rock . . . .	77	-5	.2	-.5	Marquette . . . . .	62	-5	2.3	+1.7	R.I. Providence . . .	76	+4	T	-.8
CALIF.Bakersfield . .	91	+7	T	0	Muskegon . . . . .	67	-4	.6	+ .1	S.C. Charleston . . .	80	0	2.6	+ .9
Eureka . . . . .	59	+2	T	0	S. Ste. Marie . . .	62	-3	6.7	+6.1	Columbia . . . . .	80	-1	1.7	+ .4
Fresno . . . . .	85	+5	T	0	MINN.Duluth . . . .	59	-8	1.9	+1.1	Greenville . . . . .	79	0	.4	-.5
Los Angeles . . . . .	75	0	0	0	Internatl Falls . . .	62	-4	.2	-.6	S.D. Aberdeen . . . .	66	-7	.2	-.3
Red Bluff . . . . .	87	+5	0	0	Minneapolis . . . .	65	-8	2.1	+1.4	Huron . . . . .	65	-10	.1	-.3
San Diego . . . . .	72	+1	T	0	Rochester . . . . .	64	-7	1.0	+ .2	Rapid City . . . . .	67	-7	.1	-.3
San Francisco . . . .	63	+1	T	0	St. Cloud . . . . .	62	-9	2.3	+1.5	Sioux Falls . . . . .	64	-10	.2	-.4
Stockton . . . . .	80	+3	0	0	MISS.Jackson . . . .	79	-3	.2	-.7	TENN.Chattanooga . .	75	-4	1.9	+1.0
COLO.Denver . . . .	68	-6	.5	+ .1	Meridian . . . . .	82	0	.9	-.1	Knoxville . . . . .	77	-1	1.1	+ .2
Grand Junction . . .	77	-2	T	-.2	MO.Columbia . . . .	72	-6	.2	-.5	Memphis . . . . .	79	-3	.1	-.7
Pueblo . . . . .	72	-5	.3	-.2	Kansas City . . . .	73	-6	0	-.8	Nashville . . . . .	76	-4	.4	-.4
CONN.Bridgeport . . .	78	+4	.7	-.2	St. Louis . . . . .	73	-6	T	-.7	TEX.Abilene . . . . .	79	-6	1.7	+1.2
Hartford . . . . .	77	+4	1.0	+ .2	Springfield . . . .	72	-7	0	-.6	Amarillo . . . . .	72	-7	.3	-.4
D.C.Washington . . .	80	+1	2.6	+1.5	MONT.Billings . . . .	71	-2	.2	+ .1	Austin . . . . .	82	-3	1.6	+1.2
FLA.Apalachicola . .	81	-1	5.7	+3.9	Glasgow . . . . .	70	-2	T	-.3	Beaumont . . . . .	81	-2	.7	-.6
Daytona Beach . . . .	79	-3	3.0	+1.5	Great Falls . . . .	72	+2	T	-.2	Brownsville . . . . .	84	-1	0	-.3
Ft. Myers . . . . .	81	-2	4.7	+3.0	Havre . . . . .	72	+1	T	-.2	Corpus Christi . . . .	86	+1	T	-.5
Jacksonville . . . .	80	-1	2.6	+ .9	Helena . . . . .	70	+1	T	-.2	Del Rio . . . . .	88	+1	T	-.1
Key West . . . . .	83	-2	1.8	+1.0	Kalispell . . . . .	73	+8	T	-.2	El Paso . . . . .	77	-5	.5	+ .2
Lakeland . . . . .	79	-3	2.2	+ .5	Miles City . . . . .	69	-7	T	-.2	Fort Worth . . . . .	83	-3	.7	+ .3
Miami . . . . .	83	0	3.1	+1.7	Missoula . . . . .	73	-5	.1	-.1	Galveston . . . . .	82	-2	3.8	+2.9
Orlando . . . . .	81	-1	2.7	+1.0	NEBR.Grand Island . .	68	-11	.6	0	Houston . . . . .	82	-2	3.3	+2.4
Tallahassee . . . . .	81	-1	3.4	+1.6	Lincoln . . . . .	70	-8	.2	-.5	Lubbock . . . . .	74	-6	.5	+ .1
Tampa . . . . .	81	-1	1.7	-.2	Norfolk . . . . .	66	-10	.7	+ .1	Midland . . . . .	78	-5	1.0	+ .6
W.Palm Beach . . . .	84	+2	2.0	+ .7	N.Platte . . . . .	67	-8	T	-.5	San Angelo . . . . .	80	-6	1.8	+1.6
GA.Atlanta . . . . .	77	-1	.8	-.2	Omaha . . . . .	68	-8	.1	-.8	San Antonio . . . . .	83	-2	.2	-.2
Augusta . . . . .	79	-2	1.1	0	Valentine . . . . .	66	-9	.4	-.1	Victoria . . . . .	86	+1	.7	+ .1
Macon . . . . .	82	0	T	-.9	NEV.Ely . . . . .	68	0	T	-.1	Waco . . . . .	84	-3	.2	-.1
Savannah . . . . .	81	0	.6	-1.0	Las Vegas . . . . .	89	-1	.2	+ .1	Wichita Falls . . . .	80	-7	.4	0
HAWAII.Hilo . . . . .	77	+2	1.0	-1.6	Reno . . . . .	72	+2	.2	+ .1	UTAH.Blanding . . . .	71	-2	T	-.3
Honolulu . . . . .	81	+1	T	-.2	Winnemucca . . . . .	76	+5	T	0	Salt Lake City . . . .	79	+1	T	-.2
Kahului . . . . .	79	+1	.1	0	N.H.Concord . . . .	72	+2	.5	-.1	VT.Burlington . . . .	72	+2	1.3	+ .5
Lihue . . . . .	80	+1	1.5	+1.0	N.J.Atlantic City . .	78	+3	.2	-.9	VA.Lynchburg . . . .	74	-2	2.6	+1.6
IDAHO.Boise . . . . .	78	+3	T	0	Trenton . . . . .	77	+1	.7	-.4	Norfolk . . . . .	79	+1	1.7	+ .3
Lewiston . . . . .	81	+7	T	-.1	N.MEX.Albuquerque . .	71	-8	.8	+ .4	Richmond . . . . .	77	-1	1.5	+ .2
Pocatello . . . . .	72	-1	.1	0	Roswell . . . . .	74	-5	1.2	+ .8	Roanoke . . . . .	74	-1	2.2	+1.3
ILL.Cairo . . . . .	76	-5	.9	+ .2	N.Y.Albany . . . . .	72	0	2.5	+1.8	WASH.Colville . . . .	75	+6	0	-.2
Chicago . . . . .	68	-7	.6	-.2	Binghamton . . . . .	70	+1	.6	-.2	Omak . . . . .	76	+6	0	-.1
Moline . . . . .	67	-8	.7	-.1	Buffalo . . . . .	70	0	1.8	+1.0	Quillayute . . . . .	63	+4	0	-.5
Peoria . . . . .	67	-8	.2	-.5	New York . . . . .	79	+2	1.0	0	Seattle-Tacoma . . . .	71	+6	0	-.2
Rockford . . . . .	66	-7	.3	-.5	Rochester . . . . .	71	0	3.7	+3.0	Spokane . . . . .	77	+6	T	-.1
Springfield . . . . .	70	-6	1.1	+ .4	Syracuse . . . . .	71	-1	2.9	+2.1	Walla Walla . . . . .	83	+7	T	-.1
IND.Evansville . . . .	72	-6	1.6	+ .8	N.C.Asheville . . . .	72	-2	3.2	+2.1	Yakima . . . . .	78	+7	T	0
Ft. Wayne . . . . .	69	-4	.2	-.6	Charlotte . . . . .	77	-1	3.0	+2.0	W.Va.Beckley . . . . .	68	-2	.9	0
Indianapolis . . . . .	68	-7	.7	0	Greensboro . . . . .	75	-2	3.5	+2.5	Charleston . . . . .	73	-2	1.1	+ .1
South Bend . . . . .	68	-5	1.1	+ .3	Hatteras . . . . .	79	+1	1.3	-.2	Huntington . . . . .	74	-1	1.1	+ .2
IOWA.Burlington . . .	66	-10	.5	-.2	Raleigh . . . . .	77	-1	2.1	+ .9	Parkersburg . . . . .	73	-2	1.4	+ .5
Des Moines . . . . .	67	-9	.4	-.3	Wilmington . . . . .	80	-1	5.0	+3.2	WIS.Green Bay . . . .	64	-6	.3	-.3
Dubuque . . . . .	63	-9	.7	-.1	N.DAK.Bismarck . . .	63	-9	T	-.4	La Crosse . . . . .	66	-8	.9	+ .2
Sioux City . . . . .	67	-9	1.8	+1.2	Fargo . . . . .	64	-8	1.6	+ .9	Madison . . . . .	64	-7	.1	-.6
KANS.Concordia . . . .	72	-7	T	-.7	Williston . . . . .	65	-6	.2	-.2	Milwaukee . . . . .	66	-5	.1	-.5
Dodge City . . . . .	73	-6	.3	-.3	OHIO.Akron-Canton . .	71	-1	2.7	+2.0	WYO.Casper . . . . .	66	-6	.2	+ .1
Goodland . . . . .	68	-9	T	-.6	Cincinnati . . . . .	72	-4	1.2	+ .5	Cheyenne . . . . .	63	-7	.1	-.3
Topeka . . . . .	74	-5	T	-.9	Cleveland . . . . .	72	+1	1.1	+ .4	Lander . . . . .	67	-5	.2	+ .1
Wichita . . . . .	76	-6	T	-.8	Columbus . . . . .	73	0	.8	0	Sheridan . . . . .	67	-5	T	-.1
KY.Lexington . . . . .	71	-5	1.4	+ .5	Dayton . . . . .	72	-3	1.5	+ .8	P.R.San Juan . . . . .	83	+2	.8	-.7
Louisville . . . . .	73	-4	2.5	+1.8	Toledo . . . . .	69	-3	T	-.7					

Based on 1941 - 70 Normals

## CONDENSED STATE SUMMARIES

The Bulletin capsulizes nationally important weather and crop conditions. Every Monday SRS publishes more detailed data in State Weekly Weather and Crop Bulletins in cooperation with the National Weather Service, NOAA. Voluntary weather observers, crop reporters, and county extension agents contribute weekly observations for these reports.

**ALABAMA:** Fair and dry early week with scattered showers weekend. Weekly rainfall varied from zero over portions of the Tennessee Valley to 1.50 in. southern sections.

Crops generally made favorable development. Virtually all cotton setting bolls, well ahead of 1973. Growers applied insect sprays on regular schedules where insect counts were high. Corn continued to make satisfactory development, 70% in or beyond dough stage and 40% dented. Soybeans made good-excellent growth, 50% blooming, 40% 1973. Prospects favorable for peanuts, additional moisture needed. Showers slowed hay cutting, provided moisture for additional cuttings.

**ALASKA:** Temperatures averaged 5° above normal for the week. Little or no precipitation fell except for Kodiak which received 0.75 in.

Moisture supply short in much of the Railbelt. Hillside potato fields in Fairbanks area in poor condition from lack of rain. Barley is up to 80% turned color in the Delta Junction area. Second cutting of brome to begin mid-August.

**ARIZONA:** Typical summer weather prevailed. Temperatures near normal. Moist air produced scattered thundershowers daily. Rain fell all sections, locally heavy amounts.

Cotton made good progress, minimal insect problems, boll set good. Boll opening accelerated rate Yuma. Sorghum early planting, Yuma heading, later plantings good growth. Fall sugarbeets Cochise good condition. Rains slowed alfalfa hay harvest. Land preparations fall crop vegetables melons in progress. Cantaloupe harvest satisfactory, limited ruby grapefruit picked Salt River Valley, Valencia oranges moving. Groves generally good condition. Ranges improving, some stock tanks filled. Livestock improving, mostly fair condition. Supplemental feeding, water hauling greatly reduced because of rains.

**ARKANSAS:** Average temperatures 3 to 6° below normal. Extremes: 101° Ozark, 42° Gilbert. Spotty rainfall with many locations receiving little or none. Hot Springs wettest with 2.32 in. as most fell first of week.

Crop conditions variable, depending on rain and soil moisture. Soil moisture adequate some areas. Cotton fair to good condition, second generation boll weevils hatching. Early fields of rice being drained, late crop boot to joint stages. Early planted soybeans good condition, later planted beans fair to poor. Early varieties setting pods. Corn crop mostly fair. Sorghum making good growth. Seedbed preparation underway for 1975 wheat crop. Some alfalfa being harvested. Pastures improved except in northwest. Hay fed to supplement pastures in dry areas. Cattle in good condition except in the northwest. Watermelon, cantaloupes, and sweet corn harvest near completion southwest.

**CALIFORNIA:** Coastal areas had night and morning low cloudiness. Elsewhere fair weather except for scattered thundershowers most days. Heavy rainfall from thundershowers parts of

Sierra Nevada and northeast midweek. Temperatures above normal, highs in Central Valley near 100° and near 110° southeast.

Harvest small grains almost complete. Haying, full swing Central Valley. Safflower harvest beginning Sacramento Valley. Corn fields various stages, young plants to maturing ears. Rice fields developing, will soon head, some fields grassy. Cotton continues to bloom, set bolls, Imperial Valley maturing rapidly. Sugarbeet harvest starting southern San Joaquin Valley. Lima bean fields maturing. Almond hull splitting occurring many areas. Pear harvest increasing, peach harvest continues full swing. Plum, nectarine harvest continuing seasonal levels. Grape crop developing well, harvest table varieties active. Valencia orange and lemon harvest active. Summer grapefruit harvest at seasonal levels, broccoli, cauliflower supplies continue. Cantaloupe good supply westside. Celery active Salinas, Santa Maria, honeydews full swing Sacramento Valley. Lettuce seasonal, central coast, some blight. Market tomatoes in volume south coast. Canning tomatoes full swing San Joaquin Valley, gaining Sacramento Valley. Movement cattle feedlots increasing south. Supplemental feeding increased. Extreme fire hazards many areas. Extremely high temperatures adverse effects egg production. Water supplies fair to good. Honey production San Joaquin Valley heavy, quality good.

**COLORADO:** Unseasonably cool, temperatures averaging 2° to 9° below normal. Freezing weather reported higher elevations midweek; Leadville with 31° had the State low. Precipitation spotty and generally light northern half, moderate southern portion. Weekly totals averaged 0.25 to 0.50 in. south, under 0.25 in. north.

Corn 10 days ahead normal, 87% tasseled, 63% silked, excellent condition. Spring barley 39% harvested, normal 48%. Summer potatoes 14% harvested. Dry beans, fall potatoes, sugarbeets excellent condition. Sorghum 19% headed, irrigated sorghum good condition, dryland fair. Second cutting alfalfa 50% complete. Early peach harvest active west slope. Lettuce harvest continues San Luis Valley. Range and pastures improved southwest, east central plains, still dry southeast. Livestock fair to excellent condition, supplemental feeding southeast.

**FLORIDA:** Warm days with scattered thundershowers. Temperatures averaged near normal. Rainfall totals were light to moderate, heavy precipitation fell west central.

Soil moisture excessive south, mostly adequate elsewhere. Corn harvest slow due to frequent showers. Soybeans and peanuts good condition. Sugarcane fair. Haying slow. Planting of tomatoes expected to start. Excessive moisture some areas hindering fieldwork. Eggplant, celery seedbeds growing well. Citrus tree and new crop fruit excellent condition.

**GEORGIA:** General scattered thundershowers with weekly averages of more than 2.00 in. parts of southeast. Temperatures near normal to about 3° below normal. Extremes: 98° at Macon, 60° at Rome.

Soil moisture supplies mostly adequate. Overall crop prospects improved. Cotton mostly good condition, 95% setting bolls. Insecticide application active. Corn mostly good condition, areas affected by drought still under stress. Tobacco harvest 80% complete. Peanut condition improved, mostly good, pesticide applications active. Soybeans mostly good condition. Pastures and hay crops condition improved. Cattle mostly good condition. Pecans mostly fair, spraying very active. Vegetable and melons mostly good condition.

**HAWAII:** Weather dry but favorable to crop progress. Irrigation continued in heavy use. Spraying active to curb insect infestations. Supply of vegetables adequate. Slight increase in banana production. Papaya production holding steady. Pastures and cattle in good condition. Pineapple harvesting about over peak. Sugar operation active.

**IDAHO:** Weather hot and dry. Maximum temperatures ranged mid-90's to 103°, minimum 43 to 62°. Light showers and thundershowers occurred.

Irrigated crop growth excellent. Small grains, dry peas, grass seed, mint, hay, and sweet corn harvest in progress. Southern non-irrigated areas dry, some low yield acreage abandoned. Winter wheat harvest 30% complete south, beginning north. Crop 40% turning, remainder ripe. Barley harvest 15% south. Spring wheat harvest started southeast, majority turning. Potato development good all middles closed except late fields southeast. Harvest preparations for early varieties underway southwest. Second cutting hay 70% southwest, 35% south central, 20% southeast.

**ILLINOIS:** Temperatures 5 to 8° below normal. Widespread precipitation light, locally heavy rainfall, thunderstorm activity central and south.

Corn 70% silked, 85% 1973, 3-year (1971-73) average 92%, conditions mostly fair. Soybeans blooming 52%, 71% 1973. Average 82%, 17% set pods, 36% 1973 average 55%, condition mostly fair. Oats 90% harvested, 84% 1973. Second cutting alfalfa hay 75% complete. Plowing winter wheat 20% complete. Average 18%, pastures mostly fair. Soil moisture 84% short, 16% adequate. Fieldwork averaged 6 day suitable.

**INDIANA:** Near normal temperatures. Weekend rainfall averaged 0.20 in. northwest and northeast; 0.50 in. central; west central and southeast 1.40 in. and southwest and south central. In last 4 weeks northeast and eastern areas only 0.20 in.

Fieldwork averaged 6 days. Soil moisture continues decline. Topsoil and subsoil moisture short. Corn 50% silked, 65% in 1973, 80% averaged. Height of tasseled corn 63 in., 20 in. below normal. Soybeans 15% setting pods, 30% in 1973. Soybeans 50% bloomed, 60% in 1973. Oats 60% combined, 65% in 1973. Alfalfa hay 70% cut second time. Pastures on decline, mostly poor to fair.

**IOWA:** Cool with light to moderate precipitation. Temperatures averaged 7-10° subnormal, reversing the 4-week or longer hot spell.

Rains and cool weather temporarily helped crop conditions. Southwest and southcentral remained dry receiving little rain. Fieldwork: suitable-average 5.2. Over 80% corn fields 75% or more silked, average 91%. Corn 25% dough stage, average 30%, condition ranges from good to very good northeast to poor with many burned up fields

in the southwest. Rootworm and beetle damage hurting pollination. Soybeans blooming 77% average 79%. Pod setting or more advanced 35%, average 47%, condition better than corn most areas, fair to excellent. Oats harvest nearly complete. Alfalfa a second cutting 80% complete, second cutting clover 50%. Pastures are of little feed value anywhere, Topsoil moisture 64% short, 36% adequate, subsoil moisture 43% short 57% adequate. Western one-third, and north and south central still very dry.

**KANSAS:** Below normal temperatures, well scattered rainfall. Significant rainfall in excess of 0.50 in. over a few west and north central counties. Light rainfall elsewhere.

Crop prospects continue decline. Many dry land corn fields being green-chopped or cut for silage. Feed grain, hay, forage and pasture supplies short. Sorghum 20% headed. Average 25%. Corn 40% in or past dough stage. Same average, dented 15% less than 5% 1973. Soybeans 25% podded, 35% 1973, 40% average. Second cutting alfalfa 95% harvested, third cutting 35% harvested. Cattle movement continues from dry pastures, some receiving supplemental feed. Stock pond water supplies very low.

**KENTUCKY:** Average temperatures a few degrees below normal. Precipitation averaged about 1.40 in. and was fairly evenly distributed.

Rain temporarily relieved dry conditions and boosted prospects, crops, and pastures. Soil moisture before rains at 35% very short, 48% short, 17% adequate. Nearly all days favorable for fieldwork. Corn developing faster than year earlier, 38% pre-milk, 38% milk, and 24% in dough or later stage. Rain will greatly benefit soybeans, 36% blooming or podding versus 28% in 1973. Tobacco declined but additional moisture favorable. Burley 46% blooming, 26% in 1973, 16% topped, 7% in 1973. Much burley blooming at short height.

**LOUISIANA:** Temperatures averaged 2°-4° below normal. Extremes: 97° several stations, 59° Alexandria. Precipitation totals highly variable ranging from less than 0.25 in. to more than 3.00 in. Greatest 1-day total 2.31 in., Baton Rouge.

Soil moisture short to adequate north, generally adequate to surplus south. Plowing, cultivation, insect control, hay and rice harvest main activities. Fieldwork possible 4.5 days. Cotton improved, mostly good, fruiting fairly well, 90% setting bolls. Insects increasing, damage still moderately light. Soybeans good, light stands late fields, early beans blooming and setting pods. Rice good, harvest 30% complete yields improving with medium grain varieties. Corn and sorghum good, corn maturing rapidly. Sugarcane good to excellent, growth good. Sweet potatoes good, light harvest. Pasture average, cattle fair to good.

**MARYLAND AND DELAWARE:** Temperatures normal. Extremes: Low 90's, mid-50's. Precipitation ranged from 0.10 to over 1.75 in.

Showers brought relief, but too late for some crops on sandy soil southern Delaware and southern Eastern Shore. Early corn still favorable, some late corn fired and limited prospects. Corn averages 84% silked, normal 77%. Early soybeans blooming and starting to set pods, late soybeans reviving but will need late fall to mature. Vegetable harvest continuing, cucumbers, lima beans, squash, tomatoes, cantaloupes and watermelons now available. Peach and summer apple picking continues, concern about sizing late varieties.

**MICHIGAN:** Temperatures averaged 3° to 7° below normal. Precipitation totals varied from under 0.50 in. southeast lower to 1.00 to 2.00 in. most other areas. Upper peninsula recorded nearly 6.00 in. Saturday evening.

Scattered showers helped crops in dry southern counties. Soils still critically dry, much of southeast. Fieldwork: 5.0 days favorable. Corn and soybean development limited by dry soils south, scattered showers furnished some relief. Corn 35% silked. Soybean 20% setting pods. Navy beans in blossom, favorable weather for good set. Sugarbeets making good growth, summer potato harvest active. Wheat 85% combined and 15% oats harvested. Second cutting hay 30% made. Pasture feed supplies below average. Tart cherry harvest active northwest. Carrot and pickle harvest underway.

**MINNESOTA:** Temperatures averaged 6° to 9° below normal. Extremes: Mid-80's southwest to low 40's north third. Precipitation moderate to heavy across three central districts with 0.75 to 1.50 in. above normal reading. Elsewhere precipitation normal to a little above normal except northern extremes and the parched southwest district where near 0.50 in. deficiencies were reported.

Rainfall and cool temperatures improved corn and soybean prospects all areas and benefitted late planted small grains northwest. The dry southwest still needs additional moisture. Small grains, corn and soybeans are fair to good condition. Soil moisture still in short supply south and west central. Small grain harvest moved rapidly ahead at normal progress. Oats combined 31%, average 26%; spring wheat 14%, average 9%; barley 22% harvested, average 24%. Corn 90% tasseled, 13% in milk stage and 43% of soybeans podding, or average development.

**MISSISSIPPI:** Average temperatures near or a few degrees cooler than usual. Extremes: 100° at Columbia, 62° Forest. Widely scattered thunder-showers most of week. Greatest 24-hour rainfall 3.37 in. northwest of Pascagoula on 27th.

Fieldwork: Average 5.0 days suitable. Soil moisture mostly adequate, some shortages central and east central. Soybeans 37% blooming, 16% podding. Cotton 81% setting bolls, normal 95%. Corn 87% tasseled, 83% silked, 57% corn in dough stage and 32% dented. Harvest of sweetpotatoes 1%, corn silage 30%, sorghum silage 20%, water-melons 65%, and hay 51% completed. Condition of all crops and pasture mostly fair.

**MISSOURI:** Dry most of State, though local rains relieved drought some areas. Afternoon temperatures mostly mid-80° to 100° range til Friday, then dropped to 70's and 80's. Morning lows end of week near or below record lows for early August.

Fieldwork: 6 days suitable. Soil moisture supplies short. Corn fair condition, 74% silked, 73% 1973, 68% average. Soybeans poor to fair condition, 40% blooming, 48% 1973. Grain sorghum 38% headed. Cotton fair condition, 79% setting bolls, 69% 1973. Third cutting alfalfa 24% complete. Pastures in poor condition.

**MONTANA:** Warm, mostly dry week. Above normal temperatures except south central and eastern divisions, where they fell 7° below normal. Highs mostly 90's. Scattered thundershowers gave below normal precipitation most areas.

Winter wheat harvest 60% complete, 35% 1973. Spring wheat 10%, oats and 15% barley combined. Spring grain 40% still green but turning. Top-

soil moisture short. Irrigation water supplies short, especially southwest and north central. Grazing prospects poor to good. Livestock condition mostly good except north central, where condition fair to good. Second cutting alfalfa 33% harvested.

**NEBRASKA:** Temperatures 7 to 10° below normal. Scattered rainfall in central and northeast.

Fieldwork: 7 days suitable. Topsoil moisture supplies short 93%. Subsoil moisture conditions short 99%. Irrigated corn condition mostly fair, 95% silked. Dryland corn condition mostly poor, 65% silked. Silks shooting late not pollinating. Continue to cut corn, Sudan, for ensilage as supplemental livestock feed. Sorghum condition mostly fair, 40% headed, normal 59%. Soybean condition declining, 35% poor, 35% podded, normal 57%. Alfalfa third cutting 40% harvested. Wild hay in final stages. Sugarbeet and dry bean conditions good west. Dry beans blossoming and setting pods. Range and pasture feed supplies short 97%. Supplemental feeding started. Livestock good to fair. Cattlemen culling high numbers.

**NEVADA:** Average temperatures normal to 6° above. Extremes: 114° Logandale, 39° Mountain City. Precipitation averages from 0.02 in. northeast to 0.51 in. extreme south.

Alfalfa second cutting 40% completed. Fourth cutting well along southern valleys. Wild hay harvest 66% completed. Harvest small grains well along south, milk to dough stage elsewhere. Cotton setting fruit. Potatoes blossom stage or beyond. Alfalfa seed fair condition. Ranges continued dry. Livestock not making adequate gains as grass is short.

**NEW ENGLAND:** Only token rainfall. Some showers gave locally heavier amounts but general soaking rain needed to alleviate ongoing dry spell did not occur. Temperatures near normal.

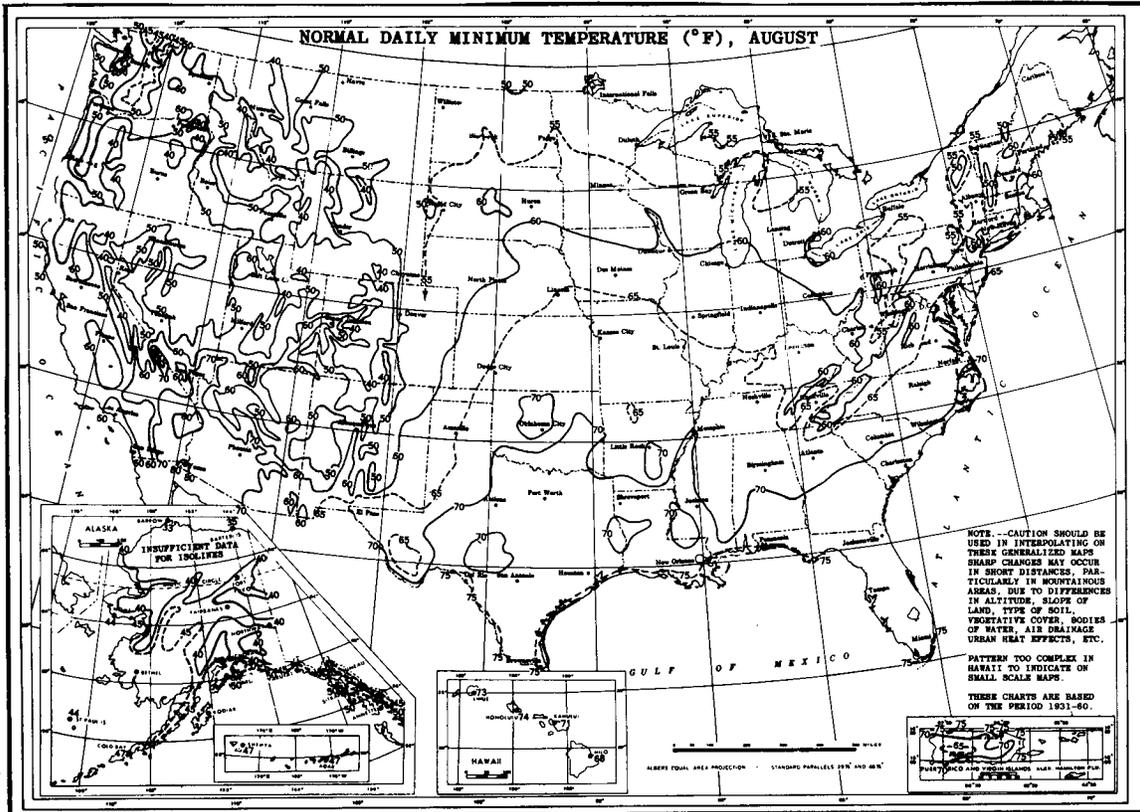
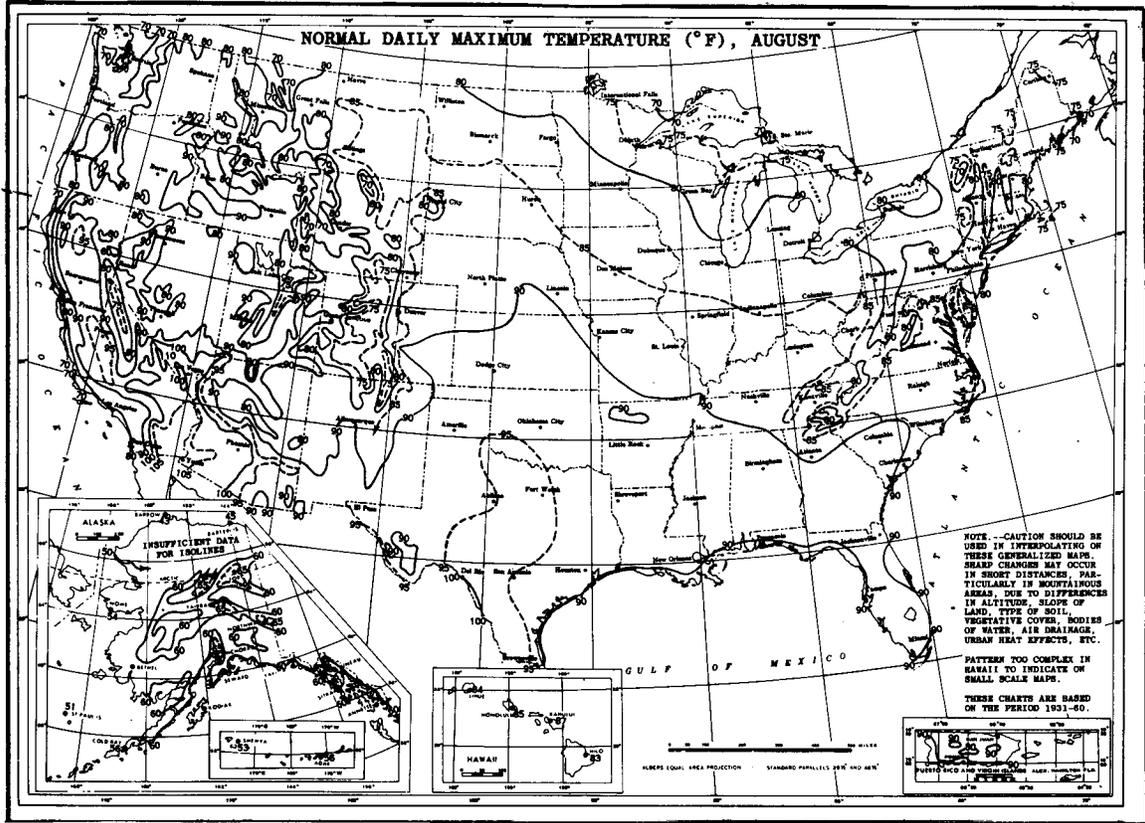
Drought conditions continue south, hurting crops, though some relief from widespread showers August 3rd and 4th. Frequent showers north hindering haying. Corn generally making good progress, though needs rain. Sweet corn, summer squash good supply, tomatoes slow ripening. Potatoes progressing well Aroostook County, Maine and other areas. Lowbush blueberry harvest to begin Washington, County, Maine end of week. Apples sizing well.

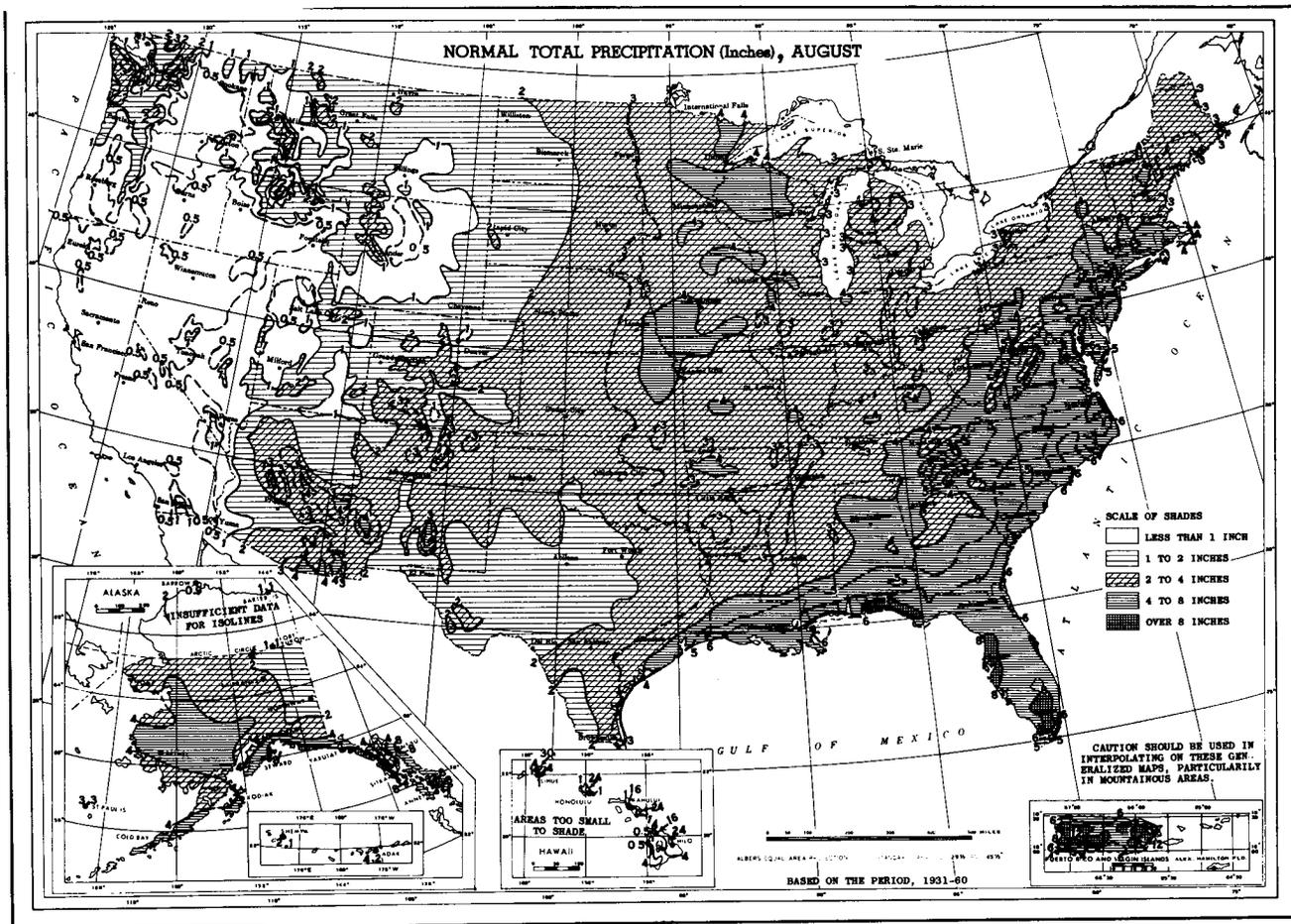
**NEW JERSEY:** A wet week averaging 2.74 in. northern, 1.27 in. central, and 1.40 in. southern counties. Temperatures averaged 72° north, 76° central, and 77° in southern counties. Extremes: 50° Charlottsburg, 92° Bridgeton and Hammonton.

Soil moisture averaged 87% of field capacity north, 73% central and 61% south. Eastern Atlantic area quite dry. Week-end showers very beneficial for developing crops. Summer vegetables moving as processing tomato harvest is underway. White potato movement light. Peach harvest increasing. Fruit size reduced by dry weather. Blueberry harvest declining farmers finishing up oat and rye harvest. Field corn and soybean conditions improved by the rain.

**NEW MEXICO:** Substantial rains except extreme southeast and northwest. Many totals over 1.00 in. and a few to 2.00 in. Temperatures ranged from near normal to as much as 8° below average.

Soil moisture short to very short. Beneficial





rains received most areas. Cotton good, 90% squaring, 70% bolls setting. Alfalfa, 3rd cut, 80% southeast, 30% north. Irrigated sorghum, good, 80% headed. Irrigated corn, good, 80% silked, greenbugs forcing early silage harvest some areas. Onions, good, mid-hybrid, late varieties, harvesting, Mesilla Valley. Chile squash, tomatoes, sweet corn, green beans, cucumbers and melon harvesting north for roadside market. Ranges, poor to fair. Livestock fair to good.

**NEW YORK:** Precipitation totals in excess of 1.50 in. along Lake Ontario and through west central New York, over 1.00 in. lower Hudson Valley temperatures 1° to 3° above normal most of state, slightly below normal parts of west along Lake. Extremes: 49° Saranac Lake, 91° New York City.

Fieldwork slowed by rain. Soil moisture short to adequate. Second cutting alfalfa 50% harvested. Corn mostly good condition, effects dry weather present. Wheat harvest 30% complete. Oats 10% cut. Long Island potato harvest beginning and Upstate potatoes available. Orange County harvesting onion sets and transplants. Home grown vegetable supplies increasing. Green peppers and egg plant beginning, sweet corn moving all areas, and heavy cutting green and red cabbage for processing. Peaches being picked, some hail damage to apples west.

**NORTH CAROLINA:** Thunderstorms produced heavy rains and some severe weather, mainly east. Soil moisture 45% adequate, 11% surplus, 30%

short, 14% very short. Upper Piedmont major area affected by shortages. Tobacco harvest 35% complete, heavy spraying program, condition mostly fair. Corn fair to good. Rain helped. Cotton mostly good. Nine percent boll damage. Soybeans improving mostly good condition. Peanuts improved after showers. Pastures fair to good. Sweet potatoes good, apples fair to good condition. Peaches, 75% harvested. Harvesting vegetables active.

**NORTH DAKOTA:** Temperatures 4 to 6° below normal. Extremes: 94° at Watford City, 41° at Breien and Watford City. Precipitation above normal east central and southeast, elsewhere below normal. Most precipitation for week 1.57 in. Fargo.

Cooler temperatures and scattered showers brought temporary relief east. Hail localized areas caused varied crop damage. Elsewhere mostly dry. Harvest of small grains continuing south. Row crops, pastures and late small grains need rain.

**OHIO:** Some scattered rains but dry conditions extended fifth week. Hail and nearly 3,00 in. rain Ashtabula on 29th. Near normal temperatures early week dropped to highs in 70's - low 80's over weekend. North central and northwest driest.

Corn condition mostly fair, and soybean. Soil moisture 86% short. Corn 70% silked, 10% dough stage, normals, 75 and 15%, soybeans 55% setting pods. Oats 80% harvested. Potato digging 10% complete. Fall plowing delayed by dryness, less than 10% complete.

**OKLAHOMA:** Temperatures averaged from near normal to 4° below 0.70 in. Precipitation averaged from about 0.10 in. north central to about 0.70 in. Panhandle.

Hot, dry weather continued. Few scattered showers amounts too light to be beneficial except small areas. Topsoil moisture short all areas, Sorghums mostly fair, 82% heading. Panhandle corn fair to good where irrigated. Cotton setting Bolls 51% acreage, most in poor to fair condition, Peanuts fair to good, 54% acreage spiking. Soybean crop 87% blooming, 10 days ahead of 1973. Haying continues slowly east short west. Ranges and pastures burning severely western third, all areas under stress. Cattle marketings increasing as stockers and feeder gains diminish. Cow culling active some localities due to feed prospects.

**OREGON:** Generally dry weather. Few thundershowers southwest, east of Cascades producing 0.10 to 0.20 in. Temperatures above normal mostly. Extremes: near 100°, low 40's.

Wheat harvest at peak. Early seed crop harvest nears completion: peppermint, hop condition good. Potato harvest continues Hermiston area, condition excellent. Broccoli, cucumbers, snap beans, fresh market corn, other summer vegetables being harvested. Summer canberries harvest near completion. Early peaches, apples being harvested, condition good. High ranges good, others hot-dry, dangerous fire conditions exist.

**PENNSYLVANIA:** Unsettled conditions prevailed most of week. Highs in 80's to 90's, lows mostly in 60's and 70's. Extremes: 90° and 45°. Much needed rainfall provided by numerous showers and thunderstorms. Weekly totals from less than 0.50 in. few western counties to 3.00 to 4.00 in. Allentown to Harrisburg area with most sections receiving 1.00 to 2.50 in. for wettest week since end of June.

Summer showers brought much-needed moisture to growing crops, lodged small grains. Soil moisture 70% adequate, 25% short. Oat harvest 30% completed. Corn 50% silk, developing rapidly following timely rains. Pastures near average. Second cutting alfalfa 67% harvested, third cutting 20%. Clover-timothy 20%. Summer vegetables and fruits reaching local markets in larger numbers.

**PUERTO RICO:** Average rainfall 1.44 in., slightly below normal. Temperatures averaged 81° coasts, 75° interior. Extremes: 96° and 58°.

Water rationing continued San Juan Metropolitan Area. More rains needed to normalize water storage levels. Rainshowers benefited new sugarcane plantings and ratoons most areas. Coffee zones benefited from rains. Harvest of crop started in few zones. Tobacco farms preparing soil for planting. Pastures scarce in south coastal areas due to prolonged drought but are starting to develop all areas from recent rains. Planting of food crops started. Plantains and bananas suffered some damage from wind.

**SOUTH CAROLINA:** Temperatures near or a little above normal. Rainfall near normal except areas where scattered heavy thundershowers dropped 1.00 to 3.00 in.

Soil moisture short central to north border, adequate elsewhere. Tobacco harvested 78%, 74% 1973, condition good. Cotton condition good, insect control most important this stage, all plants squaring, 94% setting bolls year ago 94% squaring, 70% setting bolls. Corn condition down, 93% dough stage, 31% mature, 1973 79% dough stage, 24% mature. Soybeans condition good insect control active. Peach harvest

nearing completion. Grapes, apples good condition, bunch grape harvest underway.

**SOUTH DAKOTA:** Temperatures averaged 6 to 13° below normal. Extremes: 98° at Winner, 37° Camp Crook. Except extreme southeast and portions of Black Hills rainfall was very light and did not alleviate general drought conditions. Precipitation for growing season generally 2.00 to 6.00 in. below normal.

Winter wheat and rye harvest generally complete. Spring grain harvest nearing completion; spring wheat 82%, oats 85% and barley 93% harvested, all ahead of 1973 and 10 days ahead of normal. Flax-seed 51% ripe and 15% harvested. Soybeans 90% in or past bloom stage, 45% podding, slightly ahead of 1973 and normal. Corn 73% silked, sorghum 30% headed both behind normal. Cooler temperatures helped pastures and row crops to hold on. Pasture feed and stock water short to critical, heavy marketing of livestock some areas.

**TENNESSEE:** Much needed scattered showers early week and weekend.

Dry weather hurt prospects for crops. Soil moisture, short 80%. Cotton late but progress normal, 55% of plants setting bolls, normal 60%. Tobacco needs more rain, plants short uneven. Topping of burley ahead of normal. Corn progress slightly ahead 1973. Almost 35% in dough stage and 8% dented. Soybeans developing ahead of 1973, 50% blooming, 60% normal, 15% setting pods. Pasture condition lowest of recent years.

**TEXAS:** Mostly mild, wet weather. Rain most areas, totals above normal central, east Texas: near normal west. Temperatures generally 4 to 6° below normal. South Texas exception, hot temperatures, little or no rainfall.

Current drought west and unfavorable moisture conditions elsewhere has reduced crop development. Irrigated crops progressing faster rate. Outlook cotton unstable. Hot weather and insects major role in instability. The Upper and Lower Plains and Cross-Timbers extremely poor dryland crop. Major crops percent harvested: Cotton 3, 1973 0; corn 15, 1973 1; sorghum 40, 1973 21; rice 47, 1973 21; peanuts 1, 1973 1.

High Plains: Potatoes continue. Carrots and cabbage supplies limited. Cucumber picking active. Trans-Pecos: Pecos cantaloupes continue. North: Watermelon and cantaloupe and tomato harvest continues. East: Melon harvest continues. Lower Rio Grande Valley: Planting of peppers, tomatoes, and lettuce was started. Peach supplies decline. Pecans continue to drop as trees show stress from the lack of moisture. Citrus fruit continues to size well. Dry, hot weather made irrigation a necessity.

Hot, dry weather conditions affecting grazing situation. Ranchers reducing herds, feeding at increased rate due poor grazing. Livestock situation generally good. Hay baling continues east Gulf Coast.

**UTAH:** Scattered showers and thunderstorms. Accumulated moisture totals generally light to moderate but locally heavy a few isolated areas. However, soil moisture continues short to very short most areas. Average temperatures ranged from near normal to 6° above.

Dryland winter wheat about 60% harvested and irrigated 50% combined. Spring grain harvesting underway; 45% spring wheat, 20% oats, and 45% barley harvested. Sour cherries 90% picked. Livestock condition generally good, range feed short in many areas.

**VIRGINIA:** Showers and thunderstorms activity. Temperatures averaged 1° below normal. Extremes 92° and 46°.

Moisture supplies improved central, eastern and southeast. More rainfall needed many localities for maturing and late planted crops. Fieldwork: average 4.9 days suitable. Corn condition declined southwest, southern Piedmont and north. Soybeans responded well in area where most crop grown. Early acreage blooming heavily and late plantings making rapid growth. Peanuts regained loss of a week earlier. Sun-cured and burley tobacco dropped sharply but fire-cured and flue-cured improved. Flue-cured harvest increasing 13% crop. Pastures improved slightly most areas. Some livestock being fed hay. Haying active, Plowing and soil preparation for fall seeding beginning. Harvest peaches and early apples. Tomato harvest full swing, planting of fall vegetables starting.

**WASHINGTON:** West: Average temperatures 4 to 6° above normal. Raspberry harvest winding down, blueberry harvest full swing, some blackberry picking. Green pea, early sweet corn harvest active. Bottom Rot disease showing up in lettuce. Corn, beans and other vegetable crops developing well. Non-irrigated fields need rain.

East: Temperatures 3 to 7° above average. Thunderstorms end of period brought from a trace to 0.55 in. Green pea harvest finished, seed pea harvest continues. Lentil swathing past midpoint. Wheat and barley harvest active but behind normal. Bluegrass seed combining peaked. Peach and apricot, sweet corn, potatoes, tomatoes, and cucumbers being harvested. Second cutting alfalfa hay nearly complete, third cutting started.

**WEST VIRGINIA:** Temperatures below to near normal. Precipitation slightly above normal northwest, central areas; below normal elsewhere.

Soil moisture short eastern panhandle and along Ohio River, short to adequate elsewhere. Fieldwork favorable 4.9 days. Major field activities: harvesting hay, clipping pasture and harvesting small grains. Small grain harvest: barley nearly complete, wheat 85% and oats 40%. Growing crops in good condition. Closely grazed pastures showing stress. Second cutting of hay 33% complete.

**WISCONSIN:** Temperatures 6 to 107° below normal. Heavy rains north, Ashland reported 5.00 in. Dry western area also received good rain, showers light and spotty southeast.

Harvesting oats underway, 10% combined, 1973 15%, normal 25%. Winter wheat yielding heavy with abundant straw. Barley and rye also good. Corn 33% in silk, 1973 45%, normal 60%. Second crop hay harvest 35% done. Pastures below normal. Soybeans doing well but behind normal. Tobacco progressing fast, pea harvest about done, sweet corn near harvest. Vegetable crops fair on unirrigated acreage. Cherry harvest digging of early potatoes continues. Soil moisture 65% short, 35% adequate.

**WYOMING:** Cool with temperatures averaging mostly below normal. Scattered light precipitation.

Winter wheat 95% matured, 85% harvested, 45% 1973. Spring wheat 85% turning color, 50% mature, 20% harvested. Barley 65% turning color, 50% mature, 20% harvested. Oats 45% turning color, 30% mature, 10% harvested. Dry beans 60% in bloom, corn 70% tassled. Second cutting alfalfa hay 30%, other hay 50% harvested. Topsoil moisture supplies remain short. Contracting livestock slow.

Heating Degree Days (Base 65° F.)

July 1974

ALA. Birmingham . . . . .	0	MAINE, Caribou . . . . .	40	OKLA. Okla. City . . . . .	0
Mobile . . . . .	0	Portland . . . . .	15	Tulsa . . . . .	0
Montgomery . . . . .	0	MD. Baltimore . . . . .	0	OREG. Astoria . . . . .	173
ALASKA, Anchorage . . . . .	235	MASS. Boston . . . . .	0	Burns U. . . . .	60
Barrow . . . . .	795	Chatham . . . . .	10	Medford . . . . .	20
Fairbanks . . . . .	---	MICH. Alpena . . . . .	46	Pendleton . . . . .	8
Juneau . . . . .	350	Detroit . . . . .	0	Portland . . . . .	32
Nome . . . . .	435	Flint . . . . .	4	Salem . . . . .	48
ARIZ. Flagstaff . . . . .	19	Grand Rapids . . . . .	5	PA. Allentown . . . . .	2
Phoenix . . . . .	0	Houghton Lake . . . . .	27	Erie . . . . .	32
Tucson . . . . .	0	Lansing . . . . .	6	Harrisburg . . . . .	0
Winslow . . . . .	0	Marquette U . . . . .	27	Philadelphia . . . . .	0
Yuma . . . . .	0	S. Ste. Marie . . . . .	57	Pittsburgh . . . . .	0
ARK. Fort Smith . . . . .	0	MINN. Duluth . . . . .	45	Scranton . . . . .	5
Little Rock . . . . .	0	Internatl Falls . . . . .	12	R. I. Providence . . . . .	0
CALIF. Bakersfield . . . . .	0	Minneapolis . . . . .	0	S. C. Charleston . . . . .	0
Eureka U. . . . .	222	Rochester . . . . .	0	Columbia . . . . .	0
Fresno . . . . .	0	St. Cloud . . . . .	0	Greenville . . . . .	0
Los Angeles U . . . . .	0	MISS. Jackson . . . . .	0	S. DAK. Aberdeen . . . . .	0
Red Bluff . . . . .	6	Meridian . . . . .	0	Huron . . . . .	1
Stockton . . . . .	0	Vicksburg U . . . . .	0	Rapid City . . . . .	1
San Diego . . . . .	0	MO. Columbia . . . . .	0	Sioux Falls . . . . .	2
San Francisco . . . . .	83	Kansas City . . . . .	0	TENN. Chattanooga . . . . .	0
COLO. Denver . . . . .	0	St. Louis . . . . .	0	Knoxville . . . . .	0
Grand Junction . . . . .	0	Springfield . . . . .	0	Memphis . . . . .	0
Pueblo . . . . .	0	MONT. Billings . . . . .	7	Nashville . . . . .	0
CONN. Bridgeport . . . . .	0	Glasgow . . . . .	3	TEX. Abilene . . . . .	0
Hartford . . . . .	2	Great Falls . . . . .	6	Amarillo . . . . .	0
D. C. Washington . . . . .	0	Havre . . . . .	1	Austin . . . . .	0
FLA. Apalachicola . . . . .	0	Helena . . . . .	16	Beaumont . . . . .	0
Ft. Myers . . . . .	0	Kalispell . . . . .	54	Brownsville . . . . .	0
Jacksonville . . . . .	0	Miles City . . . . .	4	Corpus Christi . . . . .	0
Key West . . . . .	0	Missoula . . . . .	27	Dallas . . . . .	---
Lakeland U. . . . .	0	NEBR. Grand Island . . . . .	0	Del Rio . . . . .	0
Miami . . . . .	0	Lincoln . . . . .	0	El Paso . . . . .	0
Orlando . . . . .	0	Norfolk . . . . .	0	Fort Worth . . . . .	0
W. Palm Beach . . . . .	0	North Platte . . . . .	0	Galveston U. . . . .	0
Tallahassee . . . . .	0	Omaha . . . . .	0	Houston . . . . .	0
Tampa . . . . .	0	Valentine . . . . .	0	Lubbock . . . . .	0
GA. Atlanta . . . . .	0	NEV. Ely . . . . .	12	Midland . . . . .	0
Augusta . . . . .	0	Las Vegas . . . . .	0	San Angelo . . . . .	0
Macon . . . . .	0	Reno . . . . .	52	San Antonio . . . . .	0
Savannah . . . . .	0	Winnemucca . . . . .	32	Victoria . . . . .	0
IDAHO, Boise . . . . .	10	N. H. Concord . . . . .	34	Waco . . . . .	0
Lewiston . . . . .	9	N. J. Atlantic City . . . . .	0	Wichita Falls . . . . .	0
Pocatello . . . . .	11	Trenton U . . . . .	1	UTAH, Blanding R . . . . .	---
ILL. Cairo U. . . . .	0	N. MEX. Albuquerque . . . . .	0	Salt Lake City . . . . .	0
Chicago . . . . .	0	Roswell . . . . .	0	VT. Burlington . . . . .	2
Moline . . . . .	0	N. Y. Albany . . . . .	17	VA. Lynchburg . . . . .	0
Peoria . . . . .	0	Binghamton . . . . .	14	Norfolk . . . . .	0
Rockford . . . . .	0	Buffalo . . . . .	2	Richmond . . . . .	0
Springfield . . . . .	0	New York . . . . .	0	Roanoke . . . . .	0
IND. Evansville . . . . .	0	Rochester . . . . .	1	WASH. Colville . . . . .	---
Fort Wayne . . . . .	0	Syracuse . . . . .	16	Omak . . . . .	---
Indianapolis . . . . .	0	N. C. Asheville . . . . .	0	Quillayute . . . . .	223
South Bend . . . . .	0	Charlotte . . . . .	0	Seattle-Tacoma . . . . .	60
IOWA, Burlington . . . . .	0	Greensboro . . . . .	0	Spokane . . . . .	41
Des Moines . . . . .	0	Hatteras R. . . . .	0	Walla Walla U. . . . .	8
Dubuque . . . . .	0	Raleigh . . . . .	0	Yakima . . . . .	44
Sioux City . . . . .	0	Wilmington . . . . .	0	W. VA. Beckley . . . . .	5
KANS. Concordia . . . . .	0	N. DAK. Bismarck . . . . .	6	Charleston . . . . .	0
Dodge City . . . . .	0	Fargo . . . . .	3	Huntington . . . . .	0
Goodland . . . . .	0	Williston U . . . . .	1	Parkersburg U. . . . .	0
Topeka . . . . .	0	OHIO. Akron-Canton . . . . .	0	WIS. Green Bay . . . . .	6
Wichita . . . . .	0	Cincinnati U. . . . .	0	Madison . . . . .	1
KY. Lexington . . . . .	0	Cleveland . . . . .	2	Milwaukee . . . . .	0
Louisville . . . . .	0	Columbus . . . . .	0	WYO. Casper . . . . .	3
LA. Baton Rouge . . . . .	0	Dayton . . . . .	0	Cheyenne . . . . .	4
Lake Charles . . . . .	0	Toledo . . . . .	2	Lander . . . . .	4
New Orleans . . . . .	0	Youngstown . . . . .	8	Sheridan . . . . .	3
Shreveport . . . . .	0				

Preliminary reports from airport locations, except those marked U for urban and R for rural.  
\*Estimated.

## WORLD WEATHER AND AGRICULTURE

### DIMMER CROP OUTLOOK TO KEEP PRESSURE ON WORLD GRAIN SUPPLIES

As of mid-July, prospects for the 1974 world grain crops were somewhat less favorable than a month earlier. The June 14 production estimate was 1,000.5 million metric tons, but as of mid-July, total outturn was estimated at only 983.8 million tons.

The less favorable outlook has reduced the likelihood of an early recovery of worldwide grain stock levels. Pressures upon available and prospective world grain supplies have once again tended to strengthen.

The most important changes in crop prospects occurred in the United States and the USSR. The latest U.S. crop estimate is approximately 22 million tons below mid-June, whereas the USSR estimate has been revised upward by about 11 million tons. In all other countries, which account for about 55 percent of world grain production, the estimated total outturn as of mid-July was off about 1 percent from the estimate of a month earlier.

Little information is yet available on the 1974 outturn for the People's Republic of China. For this reason, the 1974 grain crop estimate is placed at approximately the same level as 1973-28 million tons.

Based on the mid-July estimate, the 1974 world crop will be above the 1973 crop by 18.6 million tons or 1.9 percent. Of the total increase, the United States accounts for about 15 million tons. The USSR outturn for 1974 is presently forecast at about 3 percent below the record of 1973, while output in major competitor countries is down about 2 percent from 1973.

Estimates of world grain trade volumes, both for 1973-74 and for 1974-75, are little changed from those of mid-June. Total import demand for 1974-75 is estimated somewhat lower, mainly reflecting an expected impact of the somewhat higher-than-expected level of world prices emerging for 1974-75.

These reductions in total trade are of primary significance to the United States, where anti-

cipated export levels have been revised downward for both wheat and feedgrains for 1974-75. The U.S. wheat export estimate has been reduced from 1,050 million bushels to 1,000 million, and anticipated 1974-75 U.S. corn exports reduced from 1,200 million bushels to 1,150 million.

USDA's Foreign Agriculture Magazine  
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### INDIAN MONSOON SITUATION

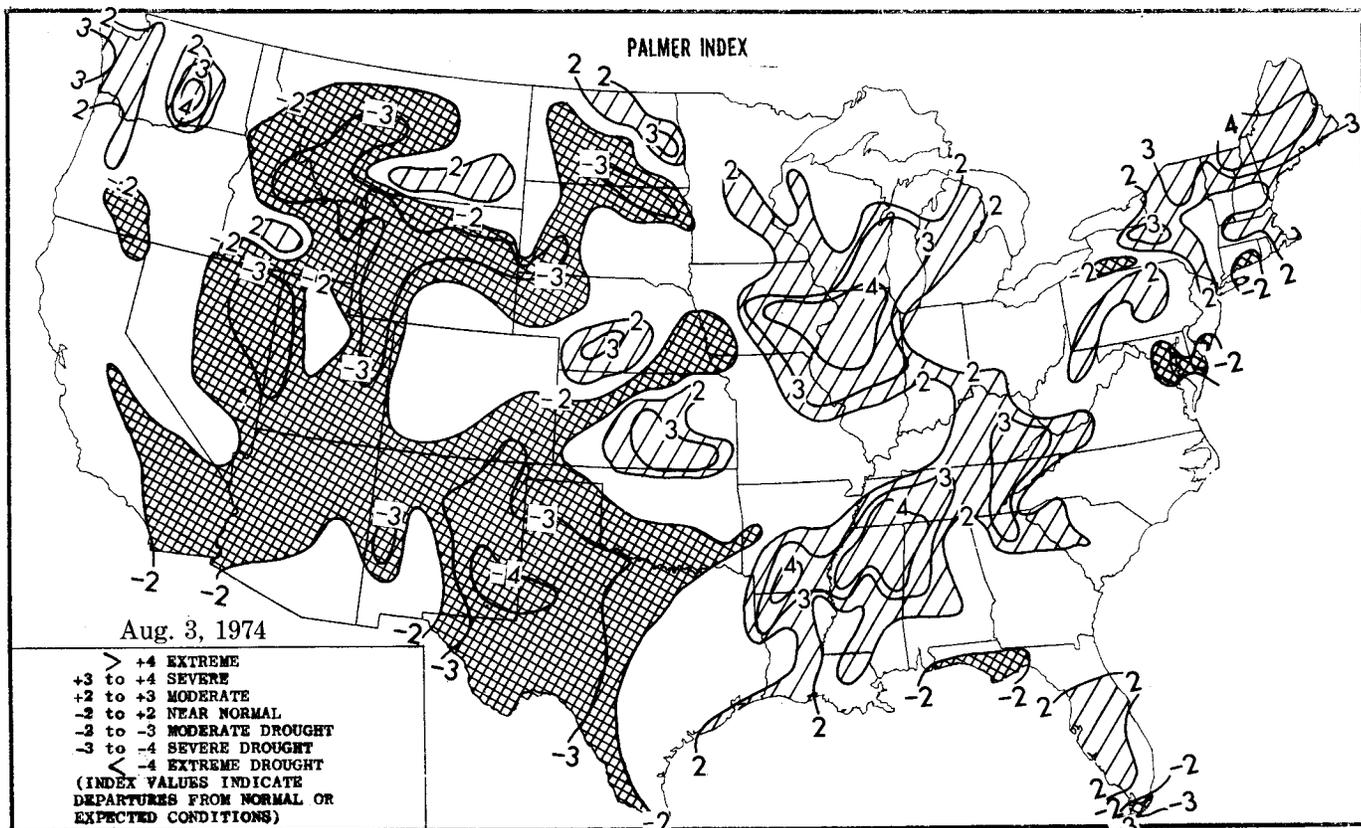
The monsoon has now advanced into the north and northwestern states as of the week ending July 17, with heavy rainfall occurring in Delhi, Haryana, Rajasthan, and the plains of western Uttar Pradesh. For the rest of the country, there was a slight lessening in general precipitation. The overall performance of the monsoon continues to be below average and compares unfavorably with its performance during the corresponding period last year.

According to the Indian Meteorological Department, rainfall during the week ending July 17, 1974, was normal or above normal in 14 of the 35 weather zones. These zones comprise the areas of Assam, Arunachal Pradesh, West Bengal, plains of western Uttar Pradesh, Haryana, Rajasthan, eastern region of Gujarat, west Madhya Pradesh, coastal and central parts of Maharashtra, coastal Andhra Pradesh, and Tamil Nadu. Rainfall was below normal ("deficient" to "scanty") over the rest of the country.

The cumulative rainfall from June 1 to July 17, 1974, was normal in 12 weather zones, above normal in 2, and deficient to scanty in 21 weather zones. The 14 weather zones, which received normal or above normal rainfall, account for approximately 29 percent of the total kharif cereal grain production, using as a base the distribution of the kharif production during 1970-71. This situation does not compare favorably with the performance of the monsoon during the same period in 1973 when 26 weather zones, accounting for 63 percent of the total kharif cereal grain production in 1970-71, were in the normal or above normal rainfall categories.

From The USDA's Foreign Agricultural Service

Standard copy for the weekly Weather and Crop Bulletin is prepared by: Richard E. Felch, Lyle M. Denny, Orus W. Byrd, National Weather Service, NOAA; DeLon A. Brown, Nancy J. Burt, Statistical Reporting Service, USDA.



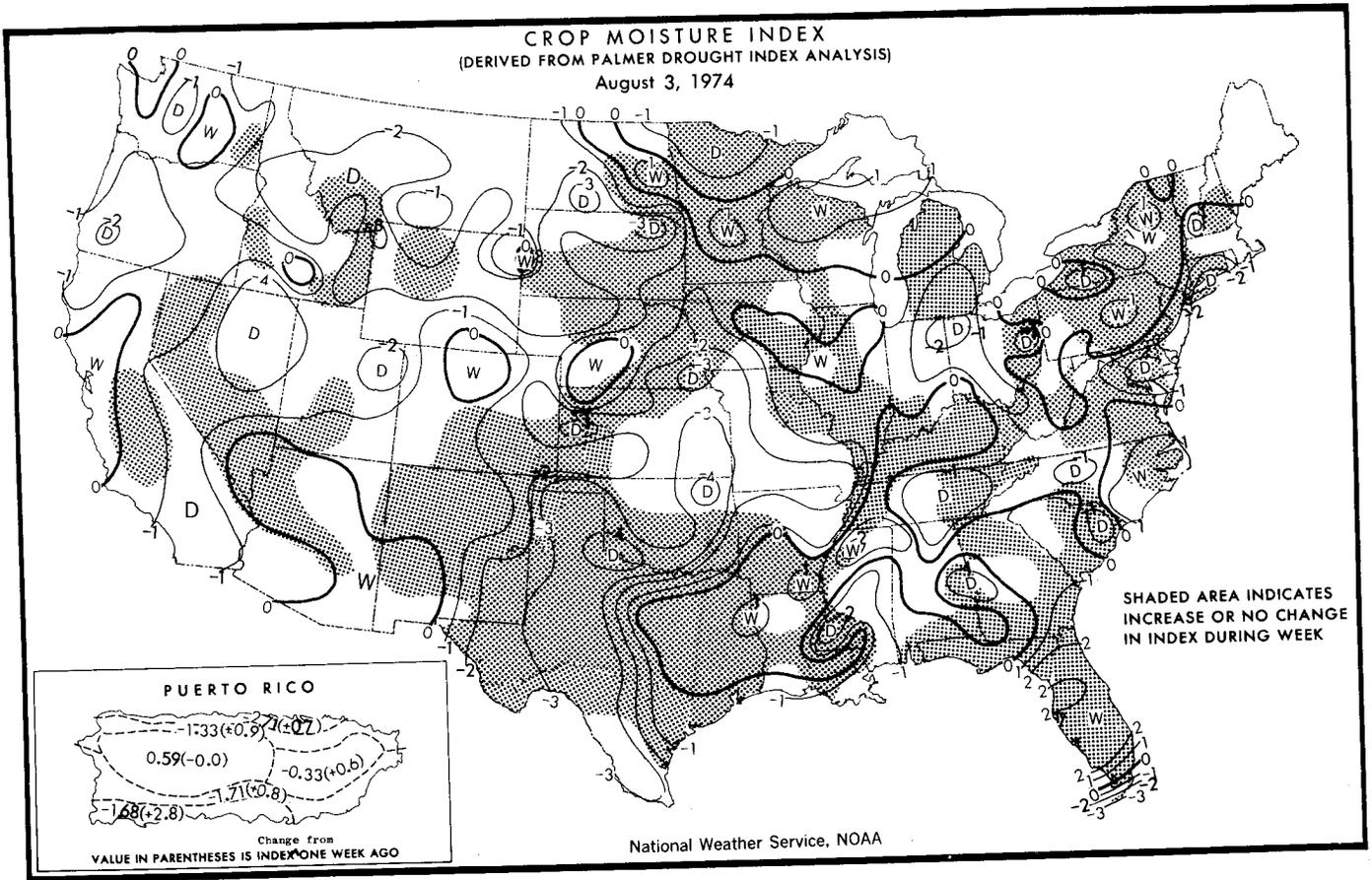
PALMER INDEX

The Palmer Index map is not to be used to interpret the current condition of the dry areas in the corn and soybean belt. For this purpose, refer to the Crop Moisture Index on the opposite page which depicts agricultural drought. The map on this page refers to the long term or climatological results of the past temperature and precipitation. The dry areas that coincide on the two maps are the most critical areas.

The map shows moderate drought in much of South Dakota, western Iowa, southeastern Nebraska and severe drought in northeastern and southwestern South Dakota. These are the areas that would indicate the poorest conditions in the corn and soybean area.

Elsewhere, the major drought in the southwest continues although some relief has been experienced in the last two weeks from numerous showers in Texas and Arizona and to a lesser extent in New Mexico. Extreme drought continues in west central Texas and southeastern New Mexico although the area is less than last week.

Not shown here is the drought stricken Puerto Rico where extreme drought continues although some very helpful relief was felt during the past week from widespread shower activity.



**SHADED AREAS:** Index increased or did not change last week

Index

Above	3.0 Excessively wet, some fields flooded
2.0 to	3.0 Too wet, some standing water
1.0 to	2.0 Prospects good, some fields too wet
0 to	1.0 Moisture adequate for present normal needs
0 to	-1.0 Prospects improved, but rain still needed
-1.0 to	-2.0 Some improvement, but still too dry
-2.0 to	-3.0 Drought eased, but still serious
Below	-4.0 Not enough rain, still extremely dry

**UNSHADED AREAS:** Index decreased last week

Index

Above	3.0 Some drying, but still excessively wet
2.0 to	3.0 More drying weather needed, work delayed
1.0 to	2.0 Favorable, except still too wet in spots
0 to	1.0 Normal growth and fieldwork
0 to	-1.0 Topsoil moisture short, germination slow
-1.0 to	-2.0 Abnormally dry, prospects deteriorating
-2.0 to	-3.0 Too dry, yield prospects reduced
-3.0 to	-4.0 Potential yields severely cut by drought
Below	-4.0 Extremely dry, most crops near ruin

The map gives a general picture of how wet or dry the Nation was last week. It shows areas where abnormal wetness or dryness have hindered crops and areas where moisture conditions have favored them.

The lines show the crop-moisture situation according to an index computed from values of temperature and precipitation by areas...350 climatological divisions, which correspond roughly to SRS's crop reporting districts. Previous weekly computations of soil moisture account for the effects of prior weather.

Shaded areas are those where precipitation increased the index last week or where soils did not dry. Unshaded areas dried last week.

The centers of wet or dry areas are marked: W=wet; D=dry. The map lines mark off crop situations. Use the legend to interpret.

Local variations caused by isolated rain or by soil differences are not shown. While shallow rooted crops in poor soils may suffer more than the map shows, conditions may be better where soils are good. Also, legends apply to growing rather than mature plants. Any map interpretation must consider both the growth stage and moisture status and trend. In irrigated regions, the index values reflect only departures from ordinary irrigation requirements.

Agricultural Climatology Service Office  
South Building Mail Unit  
U. S. Department of Agriculture  
Washington, D.C. 20250

## IMMEDIATE - U. S. Weather Report

This Report Will be Treated in All Respects as Letter Mail

# FIRST CLASS MAIL

POSTAGE AND FEES PAID  
U.S. DEPARTMENT OF COMMERCE

210



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