

Weekly Weather & Crop Bulletin

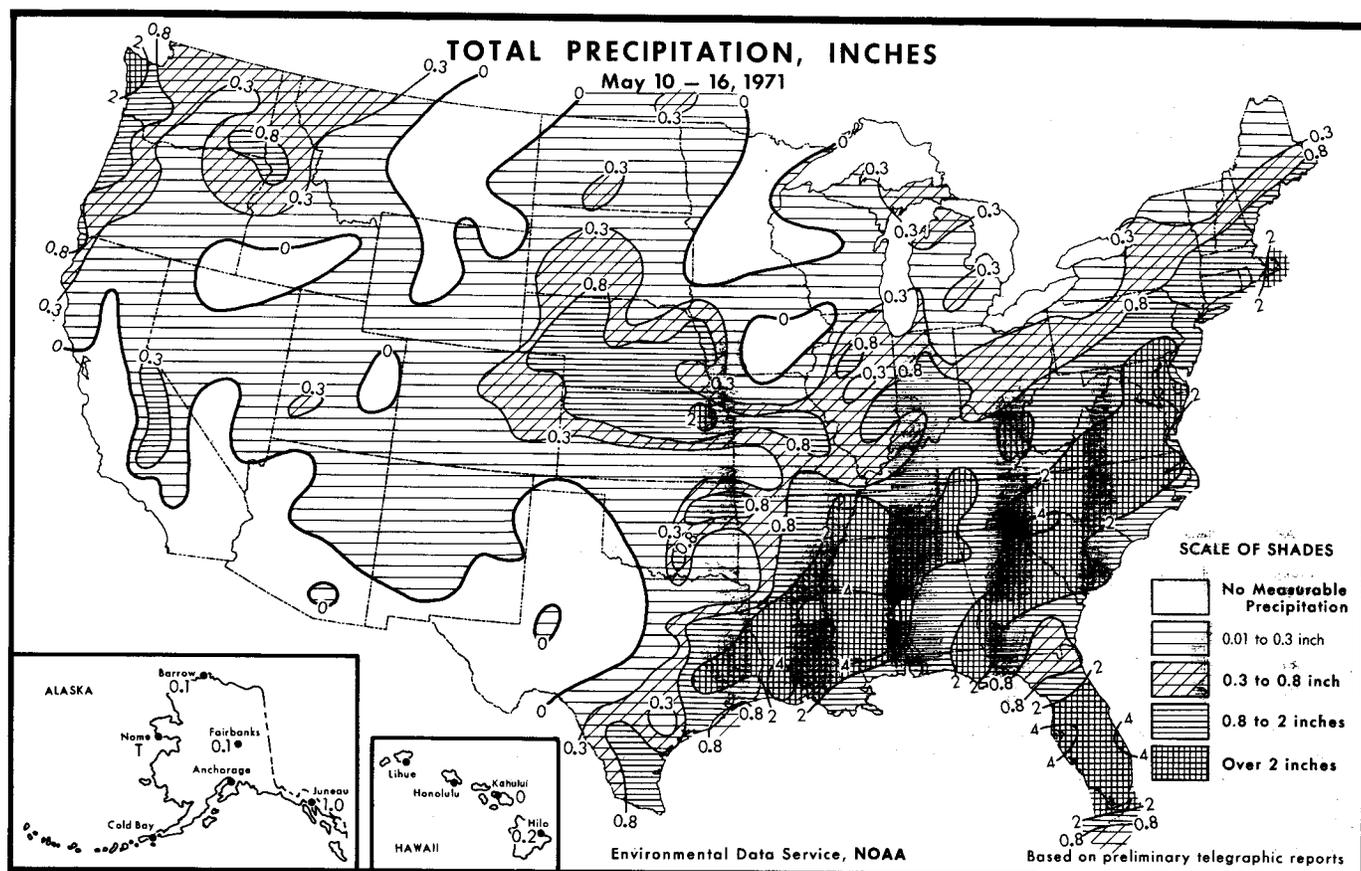
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Edited by Lucius W. Dye

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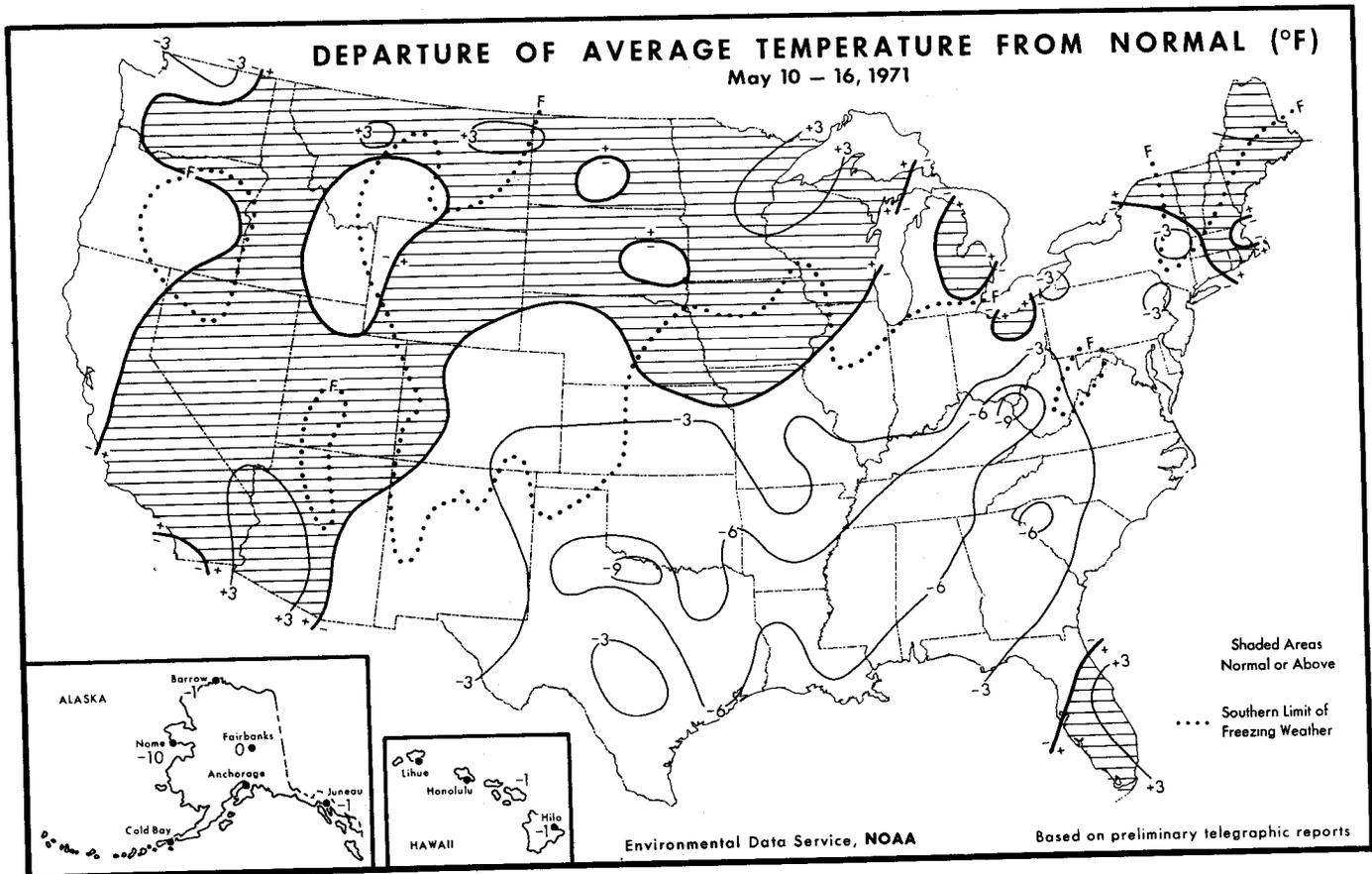


NATIONAL WEATHER SUMMARY

HIGHLIGHTS: Generous rains ended the drought in southern Florida. Parts of Texas received drought relieving showers.

PRECIPITATION: A wet weather pattern covered most of the eastern half of the Nation early in the week. Warm moist air flowing northward from the Gulf of Mexico released heavy rain as low pressure areas and their associated fronts moved eastward. Tornadoes occurred from Kansas to Texas and eastward to Mississippi. They caused a number of injuries and considerable damage to trees, power lines, mobile homes, and other property. Severe thunderstorms with hail, high winds, and heavy rains occurred over portions of the central and southern Great Plains and the Deep South. About 5.50 inches of rain swamped Greenwood, Nebr., in 5 hours late Monday, and more than 3.00 inches fell east of Lincoln, Nebr., between Elmwood and Murdock in 45 minutes.

The heavy downpours flooded fields and closed highways. Hail ranging in size from as small as marbles to as large as grapefruit fell in the Lower Rio Grande Valley Tuesday afternoon. One hailstone weighed 12 ounces. Heavy rains deluged many localities throughout the South in the 24-hour period ending at 7 a.m. Wednesday. A locality northwest of Little Rock, Ark., received 5.95 inches. By the weekend, the rains were tapering off in the Northeast but heavy showers fell along the middle and southern Atlantic coast and over the Florida Peninsula. Florida rainfall averaged over 2.00 inches and many areas received 3.00 to 4.00 inches. The generous rains relieved the intense drought which has persisted in southern Florida for several months. Parts of Texas received showers during the week. Soil moisture is now adequate in East Texas and the Blacklands. Drought continues over the remainder of the State.



TEMPERATURE: Mild weather prevailed over the South early in the week with afternoon temperatures mostly in the 80's from California to Florida. Spots in the southwestern deserts and in Florida warmed to the 90's. Thermal, Calif., registered 99° Wednesday afternoon when the mercury at Orlando, Fla., reached 95°. The northern Great Plains warmed to the 70's and 80's by mid-week. Glasgow and Miles City, both in Montana, registered 90° Thursday afternoon. Spots in the Rocky Mountains cooled to freezing on several mornings. Grants, N. Mex., recorded 28° Monday morning. Northerly breezes brought cooler weather to mid-America by Wednesday and Thursday. Dodge City, Kans., registered 32° Wednes-

day morning and Peoria, Ill., recorded 30° Thursday morning.

Pleasant temperatures prevailed over most of the Nation over the weekend. Grand Forks, N. Dak., registered 86° Sunday afternoon. A few spots in Texas and the Southwest warmed to 100°. Among the warmest spots were Blythe, Calif., and Wink, Tex., where the mercury reached 101°. Temperatures averaged above normal from southern California to Minnesota and Upper Michigan and below normal from the central and southern Rocky Mountains to the Atlantic Ocean.

L. W. Dye

NATIONAL AGRICULTURAL SUMMARY

AGRICULTURAL HIGHLIGHTS: Soaking rains halted cotton and soybean planting in the South. * Seeding spring grains well ahead of last year in the North. * Heavy rains relieved Florida drought. * Corn planting made good progress northern Corn Belt.

SMALL GRAINS: Winter wheat conditions remain relatively unchanged. No moisture was received in dry areas of the Southern Great Plains. The crop is maturing rapidly in this area, with virtually all the acreage headed in Oklahoma. Combining started in south-central Texas.

About 1 inch of rain fell in northern Kansas and Nebraska to give the crop a boost. Prospects are excellent in this region with development ahead of last year. Greenbugs are causing some damage to fields in Kansas.

Grains made favorable growth from the Pacific northwest to Minnesota. Warm temperatures sparked plant growth and helped germination. Seeding spring wheat is well advanced in this area, with the Montana crop 85 percent in compared to 20 percent last year. Stands of spring grains are good. However, strong winds caused some erosion to spring seeded fields in Washington.

Oats and wheat are maturing rapidly in the South. But harvesting was halted by the widespread rains. Lodging was severe in Louisiana.

The wheat crop is starting to head in the North Central States, but growth was limited by the cold. Grain prospects showed considerable improvement along the eastern Seaboard as welcome rains were received.

CORN: Corn planting made excellent headway under warm sunny weather in Iowa, Minnesota, Wisconsin, Michigan and South Dakota. Cool, rainy conditions interrupted planting in the rest of the Corn Belt with growers only able to plant 3 to 4 days. Acreage planted remains well ahead of last year (over half planted) in all Corn Belt States except Nebraska, where wet fields halted corn planters until the weekend. Some replanting will be necessary in Nebraska areas hit by heavy rainfall.

Over 85 percent of the acreage is planted in Iowa and Missouri, with 80 percent or more of the crop planted in Illinois and Minnesota.

Cold temperatures continue to slow seed germination and retard growth of newly emerged plants. Hotter temperatures would aid the young corn plants.

Little progress was made in corn planting outside the Corn Belt. Heavy rains prohibited fieldwork throughout the South.

SOYBEANS: Soybean planting made practically no progress during the week in the Deep South and southern Corn Belt. Hard rains made fields inaccessible. Flooding will cause replanting in Louisiana.

Seeding moved ahead briskly in the northern Corn Belt under clear skies. Nearly 1/4 of the acreage is seeded in Minnesota with planting slowed in some dry areas of the State.

Planting will be extremely active over the Nation when fields dry. Missouri growers have the largest amount of their crop in the ground, 25 percent.

COTTON: Very little cotton was planted after midweek in the South as rains swept the area.

Over 3 inches of rain fell in the South, with many local areas receiving over 4 inches. Cool temperatures and flooding will make replanting necessary in Arkansas, Louisiana, and South Carolina. Cold weather continues to delay plant growth and development. Warm weather is needed.

In Texas, the Nation's number one cotton producing State, planting continues to lag behind last year. Nearly half the crop is in. Some fields were lost in the Coastal Bend area where severe drought exists.

Development is behind normal in Arizona with stands spotty in some fields. California cotton is being aided by the warm weather.

OTHER CROPS: Sorghum grain planting is behind last year's pace in Texas. Seeding accelerated in Oklahoma and is 20% complete. Kansas acreage is going in very fast, with some growers spraying for greenbugs. Rains restricted peanut planting in Georgia. Some fields are poor and replanting will be done. Cold weather retarded tobacco plant growth in Kentucky and Tennessee. Transplanting has been very limited. Georgia crop growth is behind normal, with some hail damage occurring. California farmers are weeding and thinning sugar beet fields. Cultivating started in Idaho. Flooding will cause some replanting in Wyoming.

Fruits and Nuts: Over 3 inches of rain in Florida improved citrus growing conditions and stopped heavy irrigation. New crop fruit is progressing well. Valencia orange harvest is active.

Fruit development continues slow in the East as cold weather persists. Hail damaged Georgia peaches. Fruit prospects remain good to excellent in the Northwest. Texas pecans continue to make favorable progress with citrus harvest about over.

Grapes are making good progress in California and New York.

Vegetables: Planting of vegetable crops for both fresh market and processing were active in growing areas from the Northwest to New England. Crop outlook is good in most regions, but warmer temperatures would speed growth, especially in the South where progress is later than usual.

Moderate supplies of vegetables are available from California, with Florida harvest moving northward. Limited supplies of lettuce, spinach, and greens are coming from New Jersey. Strawberry picking moved as far north as the Eastern Shore of Virginia, with blooming becoming widespread in northern States.

PASTURES AND LIVESTOCK: Pastures in central Florida showed immediate improvement after receiving soaking rains. However, grasses in southern Florida responded slower. Ranges continue in poor shape in the Southwest, with some water supplies in Arizona very low or dry. Supplemental feeding remains heavy, with some farmers being forced to reduce herd size.

Southern pastures improved rapidly during the week and are providing lush grazing. Warmer temperatures and good rains are needed to boost growth of drying pastures in the Minnesota to Michigan area. Many herds were moving to summer ranges in the northern States.

Steve Pscodna
Agricultural Statistician

Temperature and Precipitation Data for the Week Ending Midnight, May 16, 1971

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 . . .	63	- 8	1.9	+1.1	New Orleans . . .	70	- 4	.9	- .1	OKLA.Okla. City . . .	64	- 4	.2	-1.0
Mobile . . .	72	- 3	1.0	- .1	Shreveport . . .	66	- 6	3.1	+2.0	Tulsa . . .	64	- 3	1.6	+ .4
Montgomery . . .	67	- 5	1.4	+ .6	MAINE,Caribou . . .	54	+ 5	.1	- .5	OREG.Astoria . . .	51	- 2	1.3	+ .6
ALASKA,Anchorage . . .	---	---	---	---	Portland . . .	53	+ 1	1.0	+ .2	Burns . . .	51	- 2	T	- .2
Barrow . . .	16	- 1	.1	+ .1	MD,Baltimore . . .	62	- 2	2.6	+1.7	Medford . . .	56	- 1	.1	- .2
Fairbanks . . .	46	0	.1	0	MASS,Boston . . .	57	- 1	2.0	+1.2	Pendleton . . .	60	+ 1	.6	+ .4
Juneau . . .	44	- 1	1.0	+ .2	Chatham . . .	54	---	4.1	---	Portland . . .	57	+ 0	.4	- .1
Nome . . .	24	-10	T	- .2	MICH,Alpena . . .	52	+ 2	.3	- .3	Salem . . .	54	- 2	.8	+ .3
ARIZ,Flagstaff . . .	52	+ 2	.1	0	Detroit . . .	57	+ 1	.1	- .7	PA,Allentown . . .	57	- 3	2.0	+1.1
Phoenix . . .	72	+ 4	0	0	Flint . . .	56	+ 2	.5	- .3	Erie . . .	53	- 3	.3	- .5
Tucson . . .	78	0	T	0	Grand Rapids . . .	54	- 2	.2	- .6	Harrisburg . . .	60	- 2	1.8	+ .9
Winslow . . .	64	0	T	- .1	Houghton Lake . . .	51	0	.2	- .4	Philadelphia . . .	61	- 1	2.2	+1.4
Yuma . . .	80	+ 3	0	0	Lansing . . .	56	0	.4	- .4	Pittsburgh . . .	57	- 2	1.7	- .2
ARK,Fort Smith . . .	63	- 6	.2	-1.0	Marquette . . .	51	+ 2	.5	- .1	Scranton . . .	56	+ 3	.9	+1.0
Little Rock . . .	67	- 3	1.6	+ .4	Muskegon . . .	54	- 1	.3	- .4	R.I.Providence . . .	58	+ 1	1.5	+ .7
CALIF,Bakersfield . . .	72	+ 2	.5	+ .5	S.Ste.Marie . . .	48	- 1	.7	+ .1	S.C.Charleston . . .	71	- 1	2.2	+1.4
Eureka . . .	51	- 2	.7	+ .2	MINN,Duluth . . .	52	+ 4	.1	- .6	Columbia . . .	69	- 3	2.1	+1.3
Fresno . . .	69	+ 1	T	- .1	Internatl Falls . . .	52	+ 2	T	- .6	Greenville . . .	64	- 6	4.3	+3.6
Los Angeles . . .	67	+ 2	0	0	Minneapolis . . .	59	+ 3	T	- .7	S.DAK,Aberdeen . . .	58	+ 2	.2	- .3
Red Bluff . . .	67	- 1	T	- .3	Rochester . . .	57	+ 1	T	- .8	Huron . . .	55	- 2	.3	- .2
San Diego . . .	62	- 2	T	- .3	St. Cloud . . .	57	+ 3	T	- .8	Rapid City . . .	56	+ 1	.3	- .3
San Francisco . . .	57	- 1	T	- .1	MISS,Jackson . . .	65	- 7	4.7	+3.8	Sioux Falls . . .	57	0	T	- .8
Stockton . . .	66	0	0	- .1	Meridian . . .	66	- 6	4.2	+3.3	TENN,Chattanooga . . .	63	- 6	1.3	- .5
COLO,Denver . . .	53	- 2	.5	- .1	MO,Columbia . . .	61	- 3	1.5	+ .5	Knoxville . . .	63	- 4	1.9	+1.1
Grand Junction . . .	64	+ 2	.1	- .2	Kansas City . . .	65	0	.9	- .1	Memphis . . .	64	- 6	2.4	+1.4
Pueblo . . .	57	- 3	.2	- .0	St. Louis . . .	62	- 1	.6	- .2	Nashville . . .	61	- 7	1.1	+ .3
CONN,Bridgeport . . .	57	- 1	2.0	+1.2	Springfield . . .	61	- 3	T	-1.2	TEX,Abilene . . .	68	- 3	0	-1.0
Hartford . . .	58	0	2.0	+1.3	MONT,Billings . . .	56	- 1	T	- .4	Amarillo . . .	61	- 5	T	- .7
D.C.Washington . . .	64	- 1	3.1	+2.1	Glasgow . . .	58	+ 3	T	- .3	Austin . . .	71	- 3	.4	- .5
FLA,Apalachicola . . .	73	- 1	.5	0	Great Falls . . .	56	+ 3	.1	- .3	Beaumont . . .	71	- 3	1.2	0
Ft. Myers . . .	79	+ 2	3.2	+2.5	Havre . . .	57	+ 2	T	- .4	Brownsville . . .	75	- 4	1.6	+1.0
Jacksonville . . .	74	- 1	.8	0	Helena . . .	53	0	T	- .3	Corpus Christi . . .	74	- 3	.9	+ .2
Key West . . .	81	+ 2	.6	0	Kalispell . . .	52	0	.6	+ .3	Dallas . . .	68	- 4	.1	-1.1
Lakeland . . .	77	0	2.4	+1.7	Miles City . . .	59	+ 2	.2	- .2	Del Rio . . .	73	- 5	.2	- .4
Miami . . .	80	+ 3	2.7	+1.3	Missoula . . .	54	+ 1	.1	- .3	El Paso . . .	69	- 2	T	- .1
Orlando . . .	81	+ 3	3.7	+3.0	NEBR,Grand Island . . .	61	+ 1	.8	- .1	Fort Worth . . .	65	- 7	.1	-1.0
Tallahassee . . .	71	- 3	1.4	+ .6	Lincoln . . .	63	- 1	1.2	+ .4	Galveston . . .	71	- 4	.5	- .2
Tampa . . .	77	0	4.0	+3.5	Norfolk . . .	60	0	.5	- .3	Houston . . .	68	- 7	1.9	+ .8
GA,Atlanta . . .	64	- 4	1.8	+1.1	North Platte . . .	56	- 2	.8	- .1	Lubbock . . .	59	- 8	T	- .7
Augusta . . .	66	- 5	3.4	+2.8	Omaha . . .	61	+ 1	1.8	+1.0	Midland . . .	69	- 4	T	- .5
Macon . . .	68	- 5	2.9	+2.1	Valentine . . .	56	0	.9	+ .3	San Angelo . . .	70	- 3	0	- .8
Savannah . . .	71	- 2	1.8	+1.0	NEV,Ely . . .	51	+ 1	T	- .1	San Antonio . . .	73	- 2	.4	- .4
HAWAII,Hilo . . .	72	- 1	.2	-2.0	Las Vegas . . .	76	+ 3	T	0	Victoria . . .	71	- 5	T	-1.0
Honolulu . . .	---	---	---	---	Reno . . .	55	+ 1	.1	0	Waco . . .	68	- 6	.2	- .9
Kahului . . .	74	- 1	0	- .6	Winnemucca . . .	55	+ 2	T	- .2	Wichita Falls . . .	61	-11	0	-1.1
Lihue . . .	---	---	---	---	N.H.Concord . . .	55	0	1.2	+ .5	UTAH,Blanding . . .	58	+ 2	T	- .2
IDAHO,Boise . . .	59	+ 1	.1	- .2	N.J.Atlantic City . . .	58	- 2	.9	+ .1	Salt Lake City . . .	58	0	.1	- .2
Lewiston . . .	61	+ 3	1.0	+ .6	Trenton . . .	60	- 2	1.8	+1.0	VT,Burlington . . .	55	+ 2	T	- .7
Pocatello . . .	53	- 2	T	- .3	N.MEX,Albuquerque . . .	62	- 2	.1	- .1	VA,Lynchburg . . .	64	- 1	4.0	+3.3
ILL,Cairo . . .	64	- 5	.4	- .6	Roswell . . .	66	- 1	T	- .3	Norfolk . . .	65	- 2	1.5	+ .7
Chicago . . .	57	- 2	.4	- .5	N.Y.Albany . . .	54	- 3	1.0	+ .2	Richmond . . .	64	- 2	2.9	+2.0
Moline . . .	61	+ 1	.2	- .7	Binghamton . . .	53	- 2	.5	- .3	Roanoke . . .	62	- 3	2.3	+1.5
Peoria . . .	59	- 2	.1	- .9	Buffalo . . .	54	0	.2	- .5	WASH,Colville . . .	55	0	.3	0
Rockford . . .	59	0	.1	- .8	New York . . .	59	- 2	1.7	+ .9	Omak . . .	55	- 3	.3	+ .1
Springfield . . .	61	- 2	.9	0	Rochester . . .	55	- 1	.2	- .4	Quillayute . . .	50	- 2	2.8	+1.8
IND,Evansville . . .	63	- 3	.6	- .3	Syracuse . . .	56	- 1	.4	- .3	Seattle-Tacoma . . .	55	0	.5	+ .1
Fort Wayne . . .	60	0	.1	- .7	N.C.Asheville . . .	60	- 4	2.2	+1.6	Spokane . . .	56	0	.3	0
Indianapolis . . .	60	- 1	1.8	+ .9	Charlotte . . .	64	- 4	3.9	+3.2	Walla Walla . . .	51	-10	1.0	+ .7
South Bend . . .	56	- 2	.2	- .6	Greensboro . . .	63	- 3	3.5	+2.7	Yakima . . .	58	0	.2	+ .1
IOWA,Burlington . . .	61	0	T	- .9	Hatteras . . .	65	- 2	1.8	+ .9	W.VA.Beckley . . .	57	- 3	1.3	+ .3
Des Moines . . .	62	+ 2	T	- .9	Raleigh . . .	65	- 2	2.7	+1.9	Charleston . . .	58	- 6	1.5	+ .7
Dubuque . . .	59	+ 2	T	- .9	Wilmington . . .	68	- 2	1.4	+ .6	Huntington . . .	54	-10	2.8	+2.0
Sioux City . . .	62	+ 1	.8	+ .1	N.DAK,Bismarck . . .	55	- 1	.4	0	Parkersburg . . .	59	- 5	1.2	+ .4
KANS,Concordia . . .	60	- 2	.9	+ .1	Fargo . . .	57	+ 2	.2	- .2	WIS.Green Bay . . .	55	+ 1	.3	+ .4
Dodge City . . .	59	- 4	.1	- .6	Williston . . .	57	+ 3	T	- .3	La Crosse . . .	58	0	T	- .8
Goodland . . .	56	- 2	.9	+ .4	OHIO,Akron-Canton . . .	59	0	.6	- .3	Madison . . .	57	+ 2	.2	- .5
Topeka . . .	61	- 3	2.0	+1.0	Cincinnati . . .	61	- 3	.5	- .3	Milwaukee . . .	53	0	.2	- .5
Wichita . . .	61	- 4	.1	- .8	Cleveland . . .	58	+ 1	.3	- .5	WYO,Casper . . .	53	+ 1	.1	- .4
KY,Lexington . . .	58	- 6	1.9	+1.0	Columbus . . .	59	- 2	.5	- .4	Cheyenne . . .	50	- 2	.1	- .5
Louisville . . .	61	- 2	1.0	+ .1	Dayton . . .	61	0	.9	+ .1	Lander . . .	53	+ 1	T	- .6
LA,Baton Rouge . . .	66	- 8	2.0	+1.2	Toledo . . .	57	- 1	.1	- .6	Sheridan . . .	54	+ 1	.2	- .4
Lake Charles . . .	70	- 5	4.6	+3.6	Youngstown . . .	56	- 1	.4	- .5	P.R. San Juan . . .	81	+ 2	.3	-1.3

* Departures are from 30-year means (1931-60). Based on preliminary reports

CONDENSED STATE SUMMARIES

These summaries provide brief descriptions of condition and activities important on a national scale. Detailed reports of crop and weather conditions during the growing season are contained in State issues of Weekly Weather and Crop Bulletins published by field offices of the Statistical Reporting Service, U.S.D.A. in cooperation with NOAA Climatologists.

ALABAMA: Mostly cloudy mild and humid with occasional periods of rain Tuesday and Wednesday. Considerable cloudiness and quite cool with rain in scattered areas Thursday through Saturday. Sunny and mild Sunday. Temperatures for week much cooler than usual. Rainfall heavy except moderate near coast. Cool temperatures and hard rains hindered plant growth and seed germination. Crops generally emerging to thin stands and considerable replanting appears likely. After first day or 2 in period fieldwork progressed little. Growers beginning to have weed and grass problems due lack cultivation. Planting made little progress and slightly behind year earlier. Cotton 84%, corn 78%, and peanuts 85% seeded. Small grains good, except southwest where dry weather prevented proper filling heads. Harvest to begin shortly. Baldwin County farmers moved 50 carlots Irish potatoes. Quality good, but poor sizing. Harvest in full swing by May 20. Peaches sizing favorably. Cool temperatures hard on vegetables. Pastures and livestock mostly good.

ALASKA: Cool daytime temperatures all stations averaging 2° to 7° below normal with a few freezing temperatures at night. Precipitation for week mostly below average. Fieldwork underway limited basis, Matanuska Valley. Some lettuce and few acres potatoes seeded. Fieldwork remainder rail-belt virtual standstill due wet fields, frozen ground. Growth grasses slow due cool temperatures and slow soil warming. Livestock good condition. Some livestock men out of feed Kenai Peninsula, caused by late wintry condition compared to previous years. Major farm activities included preparation machinery and seed, application fertilizer where possible.

ARIZONA: Skies were clear much of week and temperatures were near normal with no significant precipitation. Strong winds and blowing dust occurred in irrigated valleys in southern part of State on 12th. Cotton development behind normal. Spotty stands some fields. Early fields squaring Yuma area. Harvesting small grains underway limited scale Yuma. Fields maturing rapidly central and southwest. Sorghum good, some aphid damage. Safflower flowering continues southwest, just starting central area. Lettuce harvest continues central area. Cutting should start Cochise County next week. Harvesting potatoes active Salt River Valley. Yuma area, cantaloupes making good progress. Salt River Valley, Yuma limited picking valencia oranges, white grapefruit. Groves good condition both areas. Ranges supplying less than adequate amounts feed. Mainly dry grasses from last year. Many stock tanks very low or dry. Culling heavier than normal. Yearling cattle lighter than normal.

ARKANSAS: Cool week with weekly temperatures averaging 5° below normal ranging in low and mid-60's. Daily extremes: 35° to 89°. Rain early in week, heavy in south and east sections. Elsewhere below 1.00 inch. Arkansas City high with 4.39 inches except for localized 6-inch amount just west Little Rock midweek. Cold rainy weather delayed planting; retarded germination; hurt young plants. Improved soil moisture beneficial. Soil moisture mostly adequate to surplus. Cotton

planting halted wet soils. Cold damage to young seedlings. About 3/4 planted, 30% to 40% up to stand. Considerable replanting required. Need warm weather badly. Rice seeding nearly complete. Stands good. Weeds and grass troublesome. Soybeans 15% planted. Full swing when soil dry. Feed grains growing well. Wheat and oats maturing rapidly, condition fair to good. Some lodging. Hay making slowed. Hay crops improving. Strawberry picking hampered, peak next few days. Peach condition good. Thinning underway. Apple and grape condition favorable. Truck crops good. Pastures improving, grazing adequate.

CALIFORNIA: Warm days, mild nights. Average temperatures near normal. Scattered showers several days central valley and mountains; heavy thunderstorms Mt. Shasta. Precipitation amounts generally 0.10 to 0.25 inch except heavier extreme north and higher elevations Sierra Nevadas. Barley turning color Central Valley; harvesting Desert. Cutting wheat, oats, barley for hay and silage. Alfalfa growth slow; 3d cutting Desert, 2d cutting San Joaquin Valley, and 1st Sacramento Valley. Beet thinning and weeding active. Cotton stands fair to poor; warm weather helping. Corn planting continues. Rice mostly planted; some above water. Grapes continue good progress; sulfuring most vineyards. Rains caused splitting early cherries. Peaches, plums, nectarines development somewhat slow; behind previous years. Prunes good set. Good almond crop expected. Harvest valencia oranges increasing; navels virtually complete. Harvest lemons and grapefruit continues. Lower ranges continue dry. Mountain ranges good. Stock movement continues to higher ranges. Delta District asparagus continues local market; mostly to processors. Moderate volume broccoli-cauliflower Salinas Valley and Santa Maria. Carrot digging Imperial Valley continues peak levels; Coachella nearing end. Cutting celery slight increase Oxnard and Orange County. First harvest Coachella sweet corn this week. Lettuce cutting slight increase Salinas-Watsonville; good volume continues Santa Maria-Guadalupe. Onion grading Imperial Valley active. Kern district late spring potatoes increasing. Strawberry harvest steady South Coast; increasing Central Coast. Imperial Valley mature green tomatoes expected next week. Planting Sacramento Valley processing tomatoes nearly completed.

COLORADO: Cold through week, warming over weekend. General showers, snow in some mountain areas. Precipitation totals variable, mostly light to moderate but over 1.00 inch some local areas. Wet fields prevented planting all areas, except southeast and south-central. Cool soils slowed germination. Emergence hampered by soil crusting. Sorghum acreage 18% seeded, ideal seeding conditions. Small acreage dry beans seeded. Sugar beets 89% seeded, 51% emerged, condition good. Potatoes 69% seeded, 36% emerged, condition good. Corn 43% planted, 13% emerged. Condition excellent. Winter wheat excellent; 79% jointing, 8% headed. Winter barley 74% jointing, 7% headed. Winter rye and alfalfa excellent. Soil moisture supply adequate. Range and pastures improving. Livestock condition good.

FLORIDA: Much-needed rain fell throughout Florida. Heavy showers started on Thursday and lasted through Saturday northern portions of State and through Sunday southern sections. Rainfall amounts averaged over 2.00 inches throughout State with many stations reporting 3.00 to 4.00 inches. Temperatures averaged 2° to 5° above normal throughout State with most stations recording high temperatures well into the 90°. Small grain harvest starting shortly. Peanuts, tobacco, and corn good condition. Drought relieved in Everglades. Recent rains relieved pasture drought conditions. Grasses central Florida showing immediate improvement. South Florida improvement expected to be slower. Supplemental feeding will continue. Citrus growing conditions improved. Most irrigation ceases. New crop fruit progressing quite well. Valencia harvest active. Grapefruit nearly finished. Vegetable shipments increasing. Supply winter hardy crops declining. Harvest increasing northward, declining South Florida. All spring commodities available. Sweet corn harvest near peak Everglades. Potatoes full volume Hastings. Rainfall beneficial.

GEORGIA: Rainfall was moderate to heavy all areas. Totals ranged mostly from 1.00 to 3.00 inches but a few places had more than 5.00 inches. Measurable rain was reported on 3 to 5 days with heaviest amounts occurring at midweek and on Saturday. Temperatures were unusually mild most of week. Highs were in 70's and low 80's on most days but remained in 60's in north and central sections on Saturday under cloudy rainy skies. Lows were mostly in 50's and low 60's but dropped to 40's in extreme north Friday and Monday mornings. Averages ranged from 1° to 5° below normal. Soil moisture surplus many areas, and adequate remainder. Wet soils prevented fieldwork much of State after midweek. Seed germination and plant development hindered cool temperatures. Some hail damage to peaches and tobacco. Cotton 87% planted and 57% up to stand, much behind any recent year. Corn 93% planted, no blight reported. Peanut planting 94% complete. Stands not as good as usual and some replanting necessary. About 21% soybeans in. Small grains ripening southern counties, prospects good. Tobacco fair to good, but somewhat behind normal. Cattle and pastures mostly good. Truck crops later than usual. Some hail and wind damage.

HAWAII: Weather clear and dry, favorable for all crops. Soil moisture adequate. Steady harvesting sugarcane. Pineapple harvest increasing seasonally. Picking of papayas on increase, but banana supply light. Ample vegetables. Harvesting watermelons active. Cattle and pastures continued fair to good.

IDAHO: Temperatures averaged near to slightly above normal. Precipitation light except locally moderate to heavy north, between the Clearwater and Salmon Rivers and in the Twin Falls to Burley area of the south-central. Grangeville, Idaho County, recorded 1.25 inches on 13th. Warm weather very favorable farm crops. Moisture adequate all areas. Potato planting 85% complete southwest, 50% elsewhere. Spring grain stands very good. Cultivating sugar beets started southwest. Fruit crop prospects excellent. Planting activities making excellent headway. Progress now near normal.

ILLINOIS: Precipitation averaged near 0.25 inch north and 0.50 to 1.00 inch central and south. Temperatures averaged normal to 2° below normal north and 2° to 4° below normal central and south.

Illinois corn crop 80% planted, compared 40% year earlier. Emerged corn mostly good condition. Cool weather-frost slowed growth some areas. Northwest, west need more rain, southeast needs dry weather. Soybeans 20% in, last year 5%. Northwest, west about 30% complete. Wheat 35% headed, 5% filled. Wheat good. Oats, alfalfa hay, red clover good condition. Alfalfa weevil causing some damage. Pastures good, 80% roughage requirement met. Vegetable gardens, fruit trees good shape. Soil moisture 16% short, 64% adequate, 20% surplus. Average 3 suitable work days. Main activities preparing soil, planting corn and soybeans.

INDIANA: Sunny week with 1.00 inch rains early in period except 0.50 inch in northwest. Four-week totals below normal north by 1.70 inches, near normal south. Thundershowers on weekend. Lightning killed 2 youth near Muncie. Temperatures on 13th dropped to 31° as far south as Spencer in central Indiana. Some 80's in south late in period. Soil temperatures in 50's and low 60's but abnormally cool. Three days suitable fieldwork. Topsoil moisture mostly adequate to surplus. Subsoil moisture mostly adequate. Fieldwork 5 days ahead average. Corn 55% planted, 35% average. Corn 20% emerged, 15% last year. Soybeans 10% planted, same as average. Pastures fair to good.

IOWA: Warm, sunny, and dry. Rainfall negligible except over extreme western counties. Temperatures rose to 80's over weekend. Scattered frost 12th and 13th. Near ideal working conditions prevailed. Corn planting over 85% complete, last year 80%, 5-year average near 65%. About 15% corn emerged. Stand of corn average. Over 20% soybean acreage in, little ahead last year and 5-year average. Oats and hay mostly good. Pastures fairly good. Nearly 6 days suitable fieldwork. Topsoil moisture 44% short, 54% adequate and 2% surplus. Last year 40% adequate and 60% surplus for this week.

KANSAS: Significant rain early in week northern portion, generally 0.40 to 1.00 inch. Light to locally moderate precipitation south. Freezing weather much western Kansas 12th with most minima low 30's or high 20's, lowest 28°. Weekly mean temperatures averaged below seasonal, scattered hail east-central and northeast May 10. Stones up to 1 1/4 inches northeast. Wheat 49% headed, compared with 45% last year and 52% average. Insect activity light, but some greenbugs. Some streak mosaic evident west and central. Corn planting 70% complete, same as year earlier, but ahead 59% average. Sorghums 19% planted compared 13% last year and 11% average. Some spraying for sorghum greenbugs. Soybean planting 11% complete, 7% year earlier and 14% average. First cutting alfalfa 7% complete, 9% last year. Pastures furnishing 4/5 livestock roughage needs. Topsoil moisture short 1/3 State, compared with 2/3 week earlier.

KENTUCKY: Near seasonal temperatures beginning and end of period, cool midweek. Rain first 4 days, mostly sunny thereafter. Rainfall totals less than 0.50 inch several points along Ohio River from Paduca to Covington but generally heavy, 1.00 to 2.00 inches. In the southeast, Upper Cumberland River above flood stage at several locations 14th and 15th. Little field work accomplished, 2 days favorable due rains and surplus soil moisture. Wettest west and extreme east. Soil moisture 82% surplus and 18%

adequate. Corn planting 71% complete, very little progress from previous week. Stands variable from poor to good, replanting being done many areas. Soybean seeding making slow progress due rains. Row crops need warm and dry weather for germination and growth. Tobacco plant beds fair to good condition. Plant growth irregular, with some cold injury. Little tobacco set. Small grain condition very good, heading out short, but good yield prospects. Wheat nearly 60% headed. Alfalfa weevil activity increasing; heavy damage to first cutting some areas. Early cutting alfalfa underway. Tree fruit prospects good. Strawberry picking underway western areas. Pastures growing rapidly.

LOUISIANA: Generous rains all sections early in week. Totals ranged from a few near 1.00 inch extreme southeast to 2.00 to 5.00 inches other areas. Some locally heavier amounts. Greatest 1-day total, 4.46 inches measured at Carville at 5:00 p.m. Wednesday. Clear, cool, dry air dominated State from midweek through weekend. Afternoon temperatures 60's to low 80's with morning readings 40's to low 50's. Temperatures averaged 3° to 8° below seasonal normals. Extremes: 90° New Orleans Tuesday, 42° Winnfield Friday. Excessive moisture halted fieldwork throughout week. Some scattered planting and cultivation south. Cotton 70% planted, corn 95% to 100%, rice 95% to 100%, soybeans 15%, sweetpotatoes 20%. Heavy rain and flooding will cause considerable replanting recently-planted cotton and soybeans. Moisture very beneficial to growing crops most areas. Corn and sugarcane making good growth, some nearly ready to layby. Stands rice mostly good, weeds troublesome. Lodging wheat and oats severe. Pasture feed about average and improving rapidly. Livestock continued good.

MARYLAND AND DELAWARE: Significant rainfall for 2d straight week. Rain on as many as 5 days, heaviest on 13th and 15th to 16th. Substantial totals in all areas, between 1.00 and 5.00 inches. Heaviest in east and south. Temperatures continued cool side, averaging slightly below normal. Extremes mid-70's to low 80's, upper 30's to upper 40's. Rapid progress until interrupted by welcome rains. Soil moisture adequate to surplus. Corn 3/4 planted, 47% year ago. Soybean planting started early. Small grain prospects much improved. First cutting alfalfa started. Vegetable and fruit crop prospects good. Asparagus cutting started. Strawberry harvest starting late this week.

MICHIGAN: Temperatures for week averaged from 2° below to 2° above normal. Unseasonal cold temperatures prevailed during midweek with minimum temperatures falling into mid- and upper 20's in many areas of State. On Wednesday, May 12, snow fell over much of northern Lower Michigan and Upper Peninsula, with some areas of Upper Peninsula reporting several inches. Precipitation occurred early in week and again late in week, but, in general, amounts were quite light, although a few isolated areas reported from 0.50 to 0.70 inch. Most areas of State need more moisture. Near normal temperatures helped fruit bud development, but dry soils slowed crop growth. Soil moisture short. Fieldwork progress rapid. State averaged 5.7 days suitable fieldwork. Over 85% acreage plowed for spring-planted crops. Sugar beet planting completed. Oats planted southern counties. For State; corn 70%, fall potatoes 55%, soybeans 20% planted. Growth alfalfa, oats, pasture, and wheat retarded dry soils.

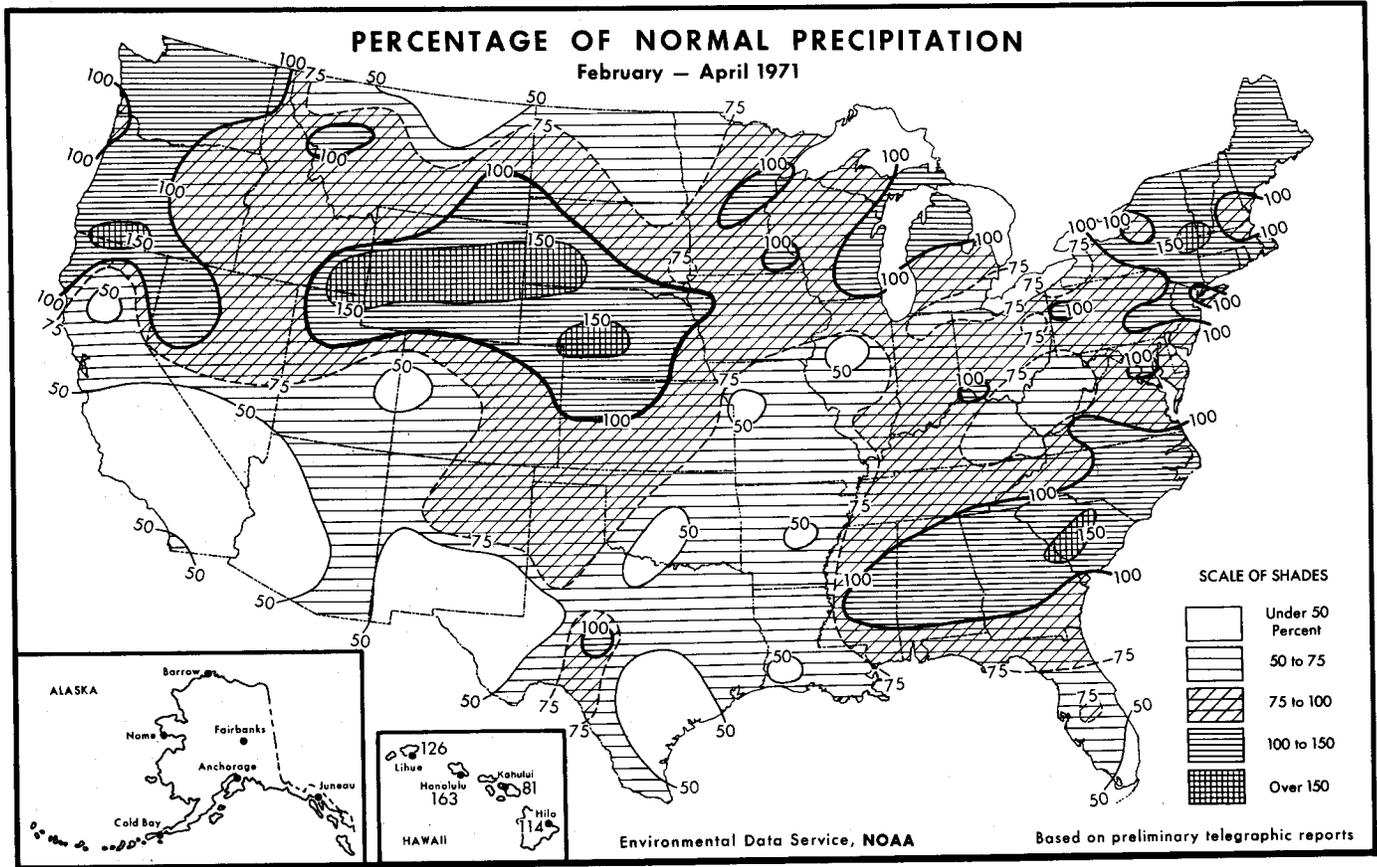
Pasture feed supplies less than average. Tart cherries, apples, and other tree fruits full bloom southwest. Sweet cherries pink, tart cherries and apples mostly delayed dormant north-west Lower Peninsula. Asparagus active.

MINNESOTA: Very pleasant week with temperatures averaging 3° above normal. Extremes: 89°, 22°. Almost no precipitation except a few scattered showers mostly along Iowa border. A forest fire started late last week about 20 miles north of Tower. This is within a narrow dry strip 15 to 20 miles wide from Orr and Cook and to east-northeast. This area has had little to no precipitation since March 1. Fieldwork progressed rapidly. Small grain seeding nearing completion. Percent emerged: Spring wheat 60; oats 74; barley 56; flax 36. All ahead of normal. Corn planted 82%; normal 50%. Early plantings emerging, but need rain. Soybeans 24% planted, normal 11%. Some plantings slowed due dry topsoil. Potatoes, sugar beets, peas, and sweet corn planting ahead of normal. Topsoil moisture short. Subsoil moisture adequate. Winter wheat, rye, hay fields, and pastures fair condition.

MISSISSIPPI: Two to 5 days with rain early in week. Weekly totals mostly over 3.00 inches and ranged from under 1.00 inch some stations near Gulf of Mexico to 8.23 inches at McComb. A 1-day amount of 6.40 inches was measured at Tylertown Thursday morning. Damaging winds several days and some small tornadoes. Three tornadoes on 8th, no casualties; tornado on 9th at Singleton, one death and two injured; on 11th tree blown over and house damaged at Stone-wall, no casualties. Weekly temperature averages continued below normal, mostly 2° to 6° below normal. Over weekend: Mostly sunny and slightly warmer. Soil moisture mostly surplus. Only 1 day suitable for fieldwork. Winter wheat 4%, oats 6% ripe. Harvesting just starting southern counties. Corn 64%, cotton 66%, soybeans 8%, sorghum 32%, sweetpotatoes 28% planted. Cotton 43%, corn 53%, soybeans 4% up to stand. Cotton, corn, soybeans, Irish potatoes, peaches and truck crops mostly fair to good condition. Pasture, livestock and hay crops fair to mostly good. Last week: Wheat and oat harvest just starting south, soybeans 6% planted, wheat 1% ripe.

MISSOURI: A very cool week. Frost many areas Thursday, May 13. Warm over weekend with high temperatures in mid-80's. Precipitation moderate to heavy most of State except in west Ozarks which received little or no rain. Missouri farmers averaged 4 days fieldwork. Corn 85%, soybeans 25%, cotton 85% planted. Planting grain sorghum almost 40% complete. Wheat 1/2 headed. First cutting alfalfa started, but weevil infestation damaged crop considerably. Pastures fair to good condition. Both subsoil and topsoil moisture adequate, except in west Ozarks where soil moisture short.

MONTANA: Warm all week until much cooler Sunday, averaging normal west to about 3° above normal east. Dry first 5 days, then scattered rains over weekend, locally heavy east slopes of Rockies. Some new snow above 5,000 feet western mountains. Topsoil moisture becoming short. Winter wheat 10% excellent, 80% good and 10% fair condition. Winter wheat stooled out fairly good. Spring wheat 85% seeded. Barley and oats 80% drilled. Sugar beets 95% planted. Potatoes 30% and dry beans 70% planted. Thirty percent range cattle and sheep receiving supplemental feed. Calving 95% complete. Lambing and shearing 85% finished.



PRECIPITATION - February to April 1971

Generous precipitation fell over much of the eastern half of the Nation in the first 3 weeks of February. Heavy snow whitened parts of New York and New England in the 2d week of the month. About midmonth, heavy snow fell from eastern Tennessee to New Jersey. Numerous tornadoes occurred across the South from Texas to Georgia.

Snowstorms and blizzards whitened the northern and central Great Plains and eastward to New England in March. Freezing rain and freezing drizzle fell south of the snow belt and violent thunderstorms, some accompanied by hail, and a few tornadoes occurred in the Deep South. More hail-

storms and tornadoes occurred over the Deep South in April.

Many agricultural areas received too little rain for the production of crops. Most of the Great Plains received less than 25% of normal rainfall in March and a large area from southern Nevada and Arizona to western Texas received only widely scattered light sprinkles. Southern Florida has been especially dry. The 3-month total at Miami, 1.30 inches, is only 16% of normal.

L. W. Dye

NEBRASKA: Cool and wet early in week followed by warm and dry weather Wednesday through Sunday. Field operations halted many areas until weekend as topsoils wet. Corn planting 45% complete, compared 62% normal. Some replanting will be necessary areas receiving heavy rainfall. Early-planted corn emerging to good stand, but cutworms found few areas. About 10% sorghums and soybeans planted. This compares normal planting 22% sorghum and 16% soybeans. Wheat making excellent progress with plants in early boot stage southern counties. Hay and pasture feed conditions improved result good precipitation. Cattle moving to summer pastures, but grass tetany caused some cow losses southwest.

NEVADA: Temperatures at all stations averaged 1° to 2° above normal with Fallon reporting 8° above normal. General precipitation light to moderate in north averaging about 0.10 inch.

Moderate in south-central with about 0.50 inch at Tonopah. Trace in extreme south. Planting of spring crops continues in northern, eastern, and central high valleys. Harvest tomato plants underway Moapa Valley. Ranges generally good condition northern areas, while moisture needed for dry southern ranges. Calving and lambing well along except some northeast areas. Livestock good condition with death losses about normal.

NEW ENGLAND: Warm early in week with many maxima in 80's on May 11. Subfreezing many inland areas on 15th. Week averaged near seasonal except up to 6° above normal in northern Maine. Rain general on 13th and 14th and over most of section on 16th and 17th. Totals variable from less than 0.10 inch in northern Maine to over 2.00 inches in eastern Massachusetts; mostly less than 1.00 inch in north and 1.00 to 2.00 inches in central and south. Apples blooming week late as

season retarded by continued cloudy, rainy weather. Potato planting Aroostook, Maine late, but now very active. Silage corn being planted as field conditions permit. Sweet corn, snap beans, and other vegetable planting continuing. Cattle being turned out. Asparagus harvest active.

NEW JERSEY: A cold wet week with rainfall averaging 2.10 inches over State except 1.80 inches along coast. Station totals varied from 0.90 inch at Atlantic City Airport to 3.40 inches at Toms River. Temperatures ranged from 1° to 6° below normal. Highest readings were in the mid-80's and the lowest near the freezing mark. Soil moisture adequate following 2 weeks plentiful rainfall. Warm weather will bring crops along nicely. Asparagus harvest increased. Limited supplies Boston and Romaine lettuce, spinach and greens available. Planting other vegetables continues. Early-planted potatoes up 3 to 4 inches. Most fruits and berries have finished blooming, except for northernmost areas. Preparations and planting soybeans and field corn will resume as fields dry off. Pasture growth improved in response to rain and slightly warmer temperatures.

NEW MEXICO: Light showers, more frequent first part of week, except continued dry in extreme south. Temperatures averaged below normal. Cooling midweek with freezing in high elevations. Warmest on weekend with valley high in 90's. Soil moisture conditions short to very short. Winter wheat outlook rather bleak. Most dryland wheat grazed out. Yields expected to be low on remaining wheat due adverse weather. Barley good. Harvesting alfalfa active. Cotton up to stand and fair condition. Lettuce cutting active. Ranges poor shape. Heavy supplemental feeding. Some herds have been cut.

NEW YORK: Cloudy and cool midweek, otherwise mostly sunny and seasonably warm. Maximums in 50's on 13th and 14th but mostly in 70's early week through 12th and on weekends, except near 60° coastal sections on 16th. Scattered frost interior on 15th with minimums 28° to 32°. Precipitation general on 12th and 13th with totals 1.00 to 1.50 inches southeast quarter decreasing to 0.20 inch or less in northeast and near Great Lakes. Rains continuing extreme southeast through weekend with up to 0.70 inch on Long Island. Wet weather restricted fieldwork. Slow progress made planting oats and corn. Slightly warmer weather and moisture pushed growth of pastures and hays. Long Island early potatoes coming up, while Upstate planting making slow progress. Onions emerging well Orange County, central and western areas. Lettuce over 1/2 planted Orange county. Seedbed preparation for cabbage continues western areas. Planting green peas for processing well along western New York, while planting snap beans, sweet corn, and tomatoes for processing getting started. Mid-season strawberries Long Island starting to bloom. All Hudson Valley tree fruits, except apples reached full bloom; suspect some winter injury to peaches as bloom appears. Western area sweet cherries reached full bloom May 15. About 1/3 tart cherries full bloom. Early apples (twenty ounce) nearly full bloom. Grapes continue excellent.

NORTH CAROLINA: Average temperatures up about 4° from previous week but still 2° to 3° below normal. Daytime temperatures little changed with highs in 70's and 80's. Nights warmer with lows 30's to 60's, mostly in 50's. Moderate to heavy

rain 13th and over weekend. Total amounts 1.00 to 6.00 inches, mostly 2.00 to 4.00 inches. Scattered thunderstorms with some hail and wind damage local areas. Soil moisture increased to surplus. Condition crops improved by rains. Some progress in plantings. Corn nearly 90% complete, cotton 85%, tobacco and peanuts 60% and soybeans 20%. Moisture helped heading small grains. Tobacco plant supplies mostly adequate. Harvest strawberries becoming active.

NORTH DAKOTA: Temperatures averaged 1° to 5° above normal. Precipitation mostly 0.10 to 0.20 inch but locally 0.50 to 0.60 inch central. Warm temperatures and little precipitation enabled farmers to make good progress seeding. Small grains making favorable growth. Moisture supplies getting short most areas especially southeast. Wild oats have become problem some fields. Pasture growth satisfactory. Cattle good and beginning to move to summer pastures. Calving and lambing virtually complete.

OHIO: Temperatures averaged 6° below normal 12th, 14th and near to slightly above normal remainder of week. Some locations in extreme northern Ohio and others in southeast reported light frost 13th or 14th. Weekly rainfall amounts from scattered showers through 14th, and on 16th increased southward across State and ranged from 0.05 inch at Toledo to 2.88 inches at Chesapeake. Four days favorable fieldwork. Soil moisture supplies 10% short, 75% adequate, 15% surplus. Corn planting 75% finished, last year 50%, usual 35%. Soybeans 12% planted, last year 16%, usual 15%. Potato planting over 80% completed, last year 65%, usual 60%. Livestock obtaining 60% forage requirements from pasture. Barley 20% headed, last year 30%, normal 25%.

OKLAHOMA: Temperatures averaged 2° to 6° below normal. Extremes: 97° and 30°. Rainfall averaged 0.58 inch northeast to trace Panhandle, north-central, west-central, and southwest. Wheat maturing rapidly; virtually all headed; 1/3 dough stage, 1/5 year ago. Harvest some southwestern localities expected start next week. Condition wheat oats barley unchanged. Oats 90% headed 25% dough, 20% year earlier. Field preparation and planting summer row crops continues slow pace. Corn 43% planted, 24% up; compared with 80% and 57% year ago. Cool weather retarding growth. Planting grain sorghum accelerating and nearly 1/5th complete, about same year ago. Cotton progress very limited as farmers waiting additional moisture, only 6% planted, year earlier 37%. Peanuts 5% in. Soybeans 9% seeded, 13% year ago. Surface soil moisture short to adequate south-central and eastern 1/3 Oklahoma. Mostly short elsewhere. Pastures and ranges mostly poor west, fair to good elsewhere. Alfalfa hay 1st cutting 44% complete, 71% year ago. Some supplemental feeding and hauling water continue western Oklahoma.

OREGON: Mild days at first of week with hot mid-period partially offset by 1 to 3 showery days and 2 cool days at close. Weekly temperatures near normal on coast and 2° to 5° above normal elsewhere. Minima 25° to 34° southeast 1/3 of State, up to 45° elsewhere. Maxima 63° to 77° along coast and southern half of State. 85° to 93° western valleys and north-central. Portland City Office 93° and Pendleton Airport 92° were 2d record warmest day for so early in season. Precipitation totaled 0.20 to 0.50 inch except locally near 1.00 inch along south border. Pro-

cessing vegetable planting active. Early plantings sweet corn and snap beans emerged. Potato planting beginning Klamath Basin, progressing central Oregon, and nearing completion Malheur County. Grain and seed crops good. Spring wheat up. Some hay cutting. Walnuts and crimson clover blooming. Strawberries full bloom.

PENNSYLVANIA: A cool rather wet week. Low pressure midweek spread 0.50 to 1.00 inch of rain over Commonwealth. Second low off east coast gave from 0.50 to 2.00 inches to extreme eastern portions. For the week, rainfall totals were from 0.50 to 1.00 inch over northwest half of State and 1.50 to 2.00 inches over southeast half. Mild at start of week, cold midweek, and mild over weekend. Temperatures averaged 2° below normal, the 5th straight week with subnormal readings. Extremes: 81° at Newport and Huntingdon 11th, 27° at Philipsburg and Bradford on 15th. Crops growing rapidly. Numerous showers provided much needed moisture for good plant growth and seed germination. Topsoil moisture 75% adequate, 25% short. Fieldwork delayed by rain. Corn planting 33% completed. Oat seeding practically completed. Cool weather continues to retard fruit crops. Apples approaching full bloom south-central. Strawberries blooming. Transplanting tomatoes and early cabbage. Tobacco plants are up but making slow growth.

PUERTO RICO: Average rainfall 1.70 inches or 0.30 inch above normal. Little or no rainfall south coast but good distribution on other divisions. Highest weekly total 7.57 at a western-interior station. Crop moisture conditions near normal all divisions except too dry some sections south coast and too wet some western-interior fields. Temperatures averaged 78° to 79° on coast and 73° interior. Highest maximum 91°, lowest minimum 53°. Sugarcane harvesting and grinding operations progressed well islandwide. Coffee plantations continued fieldwork, normally seeding and cultivating. Tobacco harvesting and curing operations progressed well all zones. Pastures good to excellent, except some dryness southwest. Minor crops active seeding and fertilizing. Good supplies plantains and bananas on market. Citrus tapering off.

SOUTH CAROLINA: Temperatures ranged from the 50's to the 80's. Weekly averages were 66° to 71°, which is 1° or 2° below normal. Rainfall was heavy on 12th and 13th. Weekly amounts ranged from 2.00 to 3.00 inches in the north to less than 1.00 inch along the outer coastal plain. Rain began again as week ended. Soil moisture surplus upper Piedmont, adequate other areas. Resetting tobacco, side dressing, cultivating, and applying insect control. Stands good to excellent, plants mostly good. Cool weather causing premature blooming. Cotton 93% planted. Replanting much acreage because of cool weather. Stands and plants fair condition. Corn planting 95% complete. Stands mostly good, plants fair to good. Soybeans 13%, peanuts 70% to 80%, sweet potatoes 45%, sorghum 15% planted. Peach condition mostly fair to good. Thinning virtually complete midlands, just beginning Greenville-Spartanburg area. Condition small grains, hay crops, pastures mostly good. About 95% small grains headed, 20% turning color. Vegetable crops mostly fair to good.

SOUTH DAKOTA: Weekly temperatures averaged from near normal to 5° above normal. Extremes ranged from 21° at La Delle on 12th to 87° at Milbank on 14th. Precipitation fell as showers and thunder-showers beginning and end of week with totals from

less than 0.10 inch to over 1.25 inches. Fieldwork progressed under favorable weather. Seeding small grains complete, except for localized areas. Rapid progress made corn planting which is now 61% planted. Few early fields emerged. Over 3/4 State's flaxseed sown. Planting sorghum and soybeans underway and expected to advance rapidly with favorable weather. Spring-sown crops show good stands, but cool nights and occasional light frost have slowed growth. Spring plowing near completion. Most livestock on summer pastures. Pasture growth slow to moderate. Livestock good. Branding and vaccinating underway.

TENNESSEE: A cool wet week. Temperatures averaged 3° to 6° below normal, coolest in southeast and west. Frequent showers at midweek; heaviest amounts on 12th and 13th with totals ranging from 1.00 to 3.00 inches. The greatest amounts fell in northern part Cumberland Plateau. Cold, wet weather delayed planting progress, plowing and hay harvesting and also caused poor stands some corn and cotton fields. Growth plants tobacco beds retarded. Cotton 85%, corn 80%, soybeans 15% planted. Wheat 90%, oats 70% and barley 95% headed. Tobacco 5% set. Alfalfa hay 20% finished. Pastures improved considerably. Fieldwork days 1.8. Soil moisture: adequate 37%, surplus 63%.

TEXAS: Showers fell Tuesday from the hill country eastward to Louisiana and southward to the Lower Valley. Amounts of 1.00 inch or more were numerous except in area south and southwest of San Antonio. Unfortunately areas suffering the most from the drought were again missed. Temperatures were sharply cooler on 13th and 14th with a light freeze throughout the Panhandle on the 13th. East Texas and Blacklands reported adequate moisture conditions many counties. Drought conditions over remainder of State restricting planting and retarding growth rates. Farmers in southern part planting less acres than earlier intentions indicated as dry planting conditions prohibited planting within allowable planting time. Loss of stands in cotton, corn, and sorghum fields in Coastal Bend area where severe drought conditions continue. Wheat harvest began as farmers in south-central area initiated limited cutting. Dryland wheat prospects poor, while irrigated wheat prospects good. Reduction livestock herds continuing. Percent planted to date, cotton 48, 55 year ago; corn 93, 96 year ago; sorghum 57, 67 year ago; peanuts 16, 24 year ago; rice 97, 94 year ago. Lower valley spring vegetable harvest active. Onion, cabbage, carrot supplies declining. Coastal Bend watermelon harvest gaining momentum with light supplies cucumbers. Winter garden onion harvest increasing. Irrigated watermelons, cantaloups good progress. Central and east Texas watermelon and tomato prospects reduced by drought, frost, cool temperatures. Trans-pecos onion harvest underway. High Plains onions, potatoes good prospects. Citrus harvest nearing completion. Pecans generally good prospects at present.

UTAH: Scattered areas of precipitation early in period and over weekend. Accumulated amounts of moisture generally light to moderate. Temperatures averaged near to a little below normal for period. Soil temperatures at 4-inch depth ranged from low 50's extreme north to mid-50's Salt Lake Valley, mid-60's Richfield, and near 70° St. George. Accumulated growing degree days continue well above last year. Minimum temperatures few colder areas dropped to near freezing Monday morning. Weather favorable for farming activi-

ties most sections. Planting nearly complete for small grains, 50% field and sweet corn, 33% for tomatoes and snap beans, just starting for potatoes. Percent crops emerged 88 spring wheat, 72 oats, 88 barley, 70 sugar beets, and 13 corn. Completion now 90% for calving, 80% shearing, 53% lambing. Movement to spring ranges about 3/4 complete for cattle and sheep.

VIRGINIA: Temperatures mainly normal to below. Showers and thundershowers on several days with heavy amounts. Rain improved crop and pasture outlook; wet soil limited fieldwork. Some local flooding. Corn planting mostly done Tidewater, 3/4 Piedmont, over 1/2 north and west, and 40% southwest. Some replanting expected. Peanuts over 1/2 planted, soybean planting limited. Cotton 90% complete, tobacco setting more general, but acreage still limited. Cutting rye for hay and silage. Haying underway, tonnage light. Strawberries being harvested on Eastern Shore. Pastures improved, feeding hay dropping off.

WASHINGTON: West of Cascades: Sunny, warm, dry first of week, cooler with showers latter half. Crops growing rapidly. Planting sweet corn, potatoes, green peas, and other vegetables continues. Radishes and onions being harvested. Strawberries and raspberries making good growth. Most dairy cattle on pasture or chopped green feed. East of Cascades: Sunny, warm, dry, through Wednesday. Cooler with showers last of week. Rather windy with some wind erosion spring-seeded fields. Winter and spring wheat look good. Sugar beet thinning, hop training and asparagus harvest continues. Seeding spring grain and grass about completed. Pea leaf weevil causing some trouble.

WEST VIRGINIA: Another cool week with heavy rainfall which extended from May 11 to 13 and totaled over 2.00 inches many locations. Light short-duration thunderstorms evening May 16. Mostly sunny May 9, 10, and 14 with highest temperatures mid-70's May 10. Soil moisture adequate most regions. Most farmwork about 2 weeks behind schedule due cool weather. Main farm activities were repairing fences, caring for livestock and planting corn. Spring oats 92% planted, 75% emerged. Corn 39% planted. Tobacco 62% emerged. Pastures still below normal, but supplying grazing most areas.

WISCONSIN: Good week for fieldwork. Warm by weekend with temperatures in low 80's throughout State Saturday. Precipitation continuing on light side. Light rain east Tuesday. A little snow in extreme north. Corn planting about 1/2 done. Some southern areas completed. Oats planting finishing up in north. Potatoes and vegetable crops going in. Pastures and hay fields slow. Need good soaking rain and warmer weather. Fruit trees in bloom south. Soil moisture adequate 60%, short, 40%.

WYOMING: Showers Statewide. Horse Creek, the most moisture with 1.35 inches. Temperatures averaged near normal. Maxima were mostly 65° to 75° west of Divide and Upper Platte Drainage, 70° to 85° elsewhere. Minima were mostly 22° to 32° west of Divide and Upper Platte Drainage, 26° to 40° elsewhere. Temperature extremes: 85° at Basin and Sheridan Field Station and 17° at Foxpark. Some lowland flooding as heavy mountain snowpack melts. Sugar beet planting about 75% complete, behind normal. Some replanting sugar beets due flooding. About 60% oats, 75% barley and 75% spring wheat sown. Calving around 90% complete. Range lambing slightly above 50% complete. Sheep 65% shorn. Soil moisture adequate to surplus.

WATER SUPPLY OUTLOOK FOR THE WESTERN UNITED STATES
 Issued as of May 1, 1971

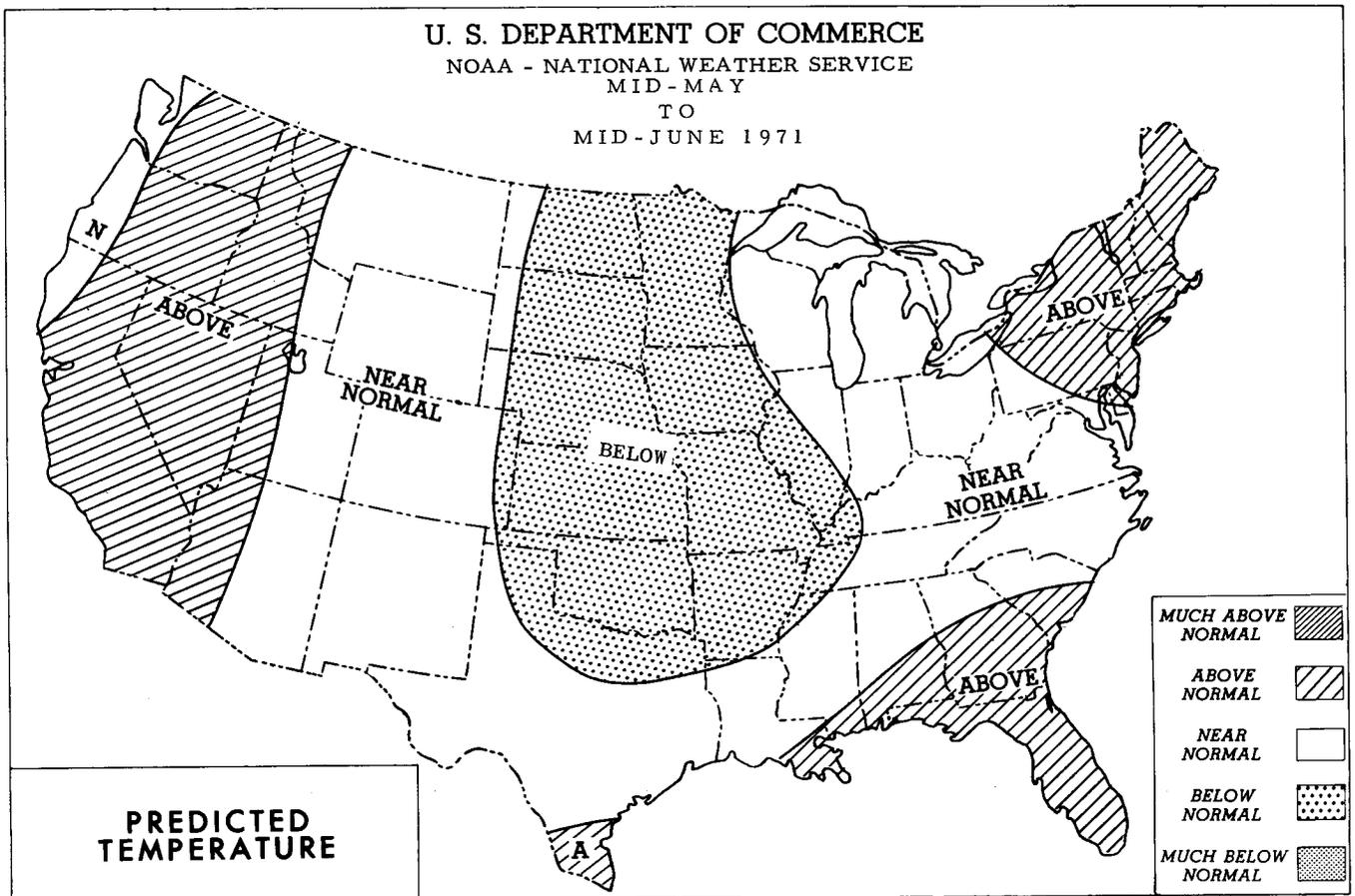
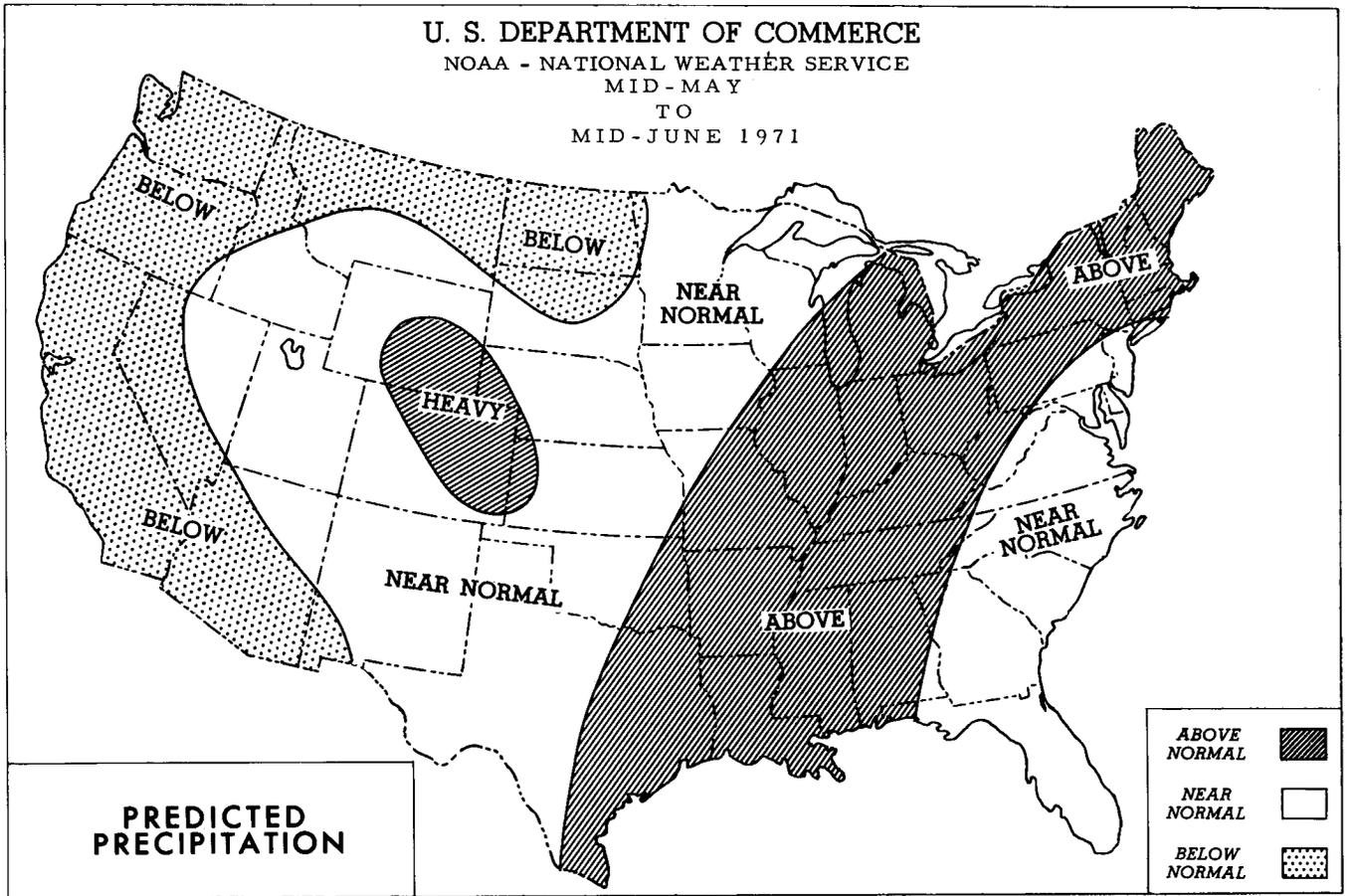
The table below shows the most probable forecasts for the residual period (May 1 to September 30, 1971) at selected locations in the west. The publication "Water Supply Outlook for the Western United States", issued as of May 1, 1971 contains supplementary information and forecasts for these and many other locations in the west.

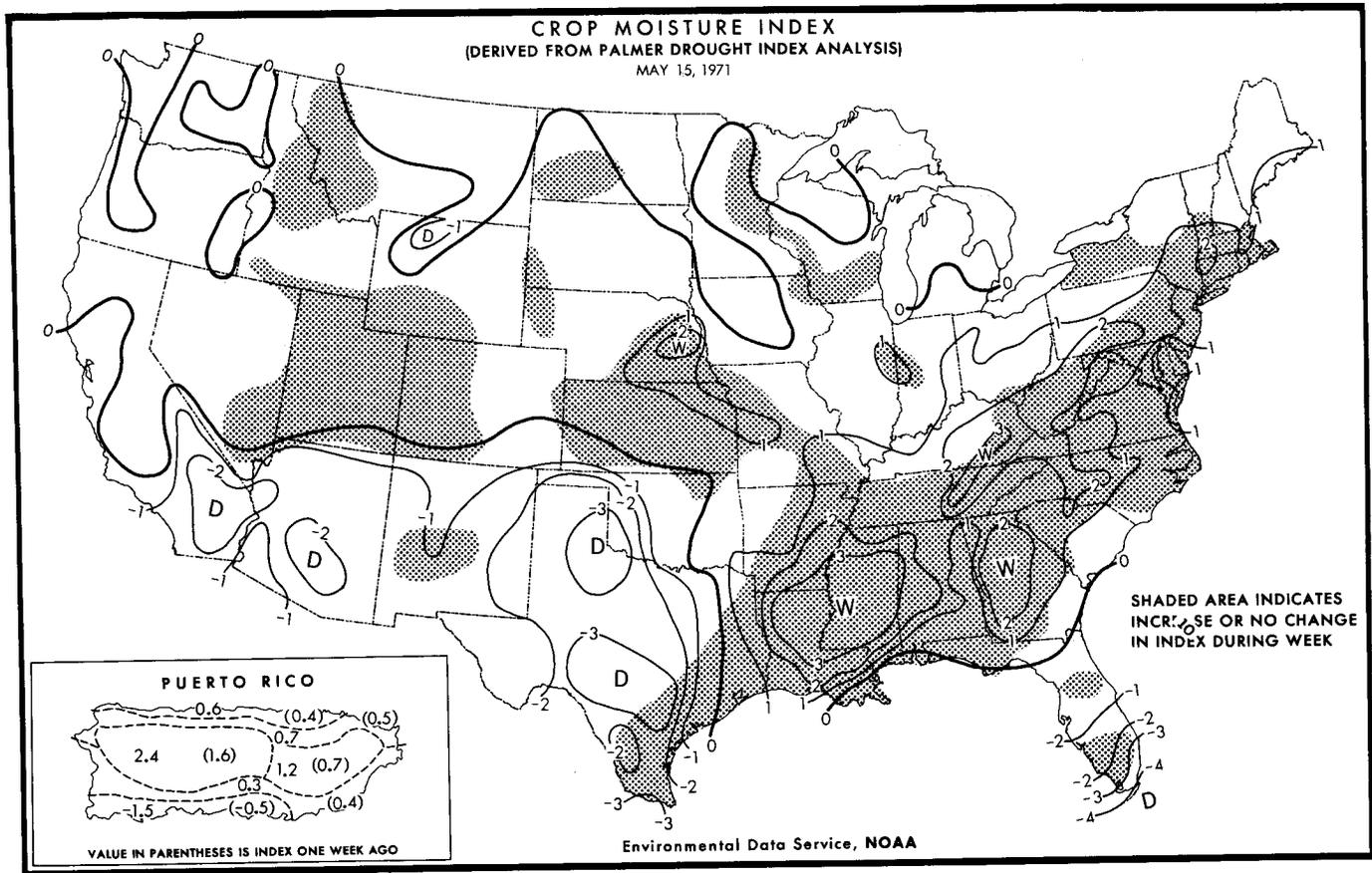
River	Station	Forecast in 1,000 acre-feet	Forecast % of 15- yr. Avg.+
Columbia	Grand Coulee, Wash.	71,200	113
Columbia	The Dalles, Oreg.	112,000	121
Snake	Clarkston, Wash.	27,500	135
*Sacramento	Red Bluff, Calif.	10,900	124
*San Joaquin	Big Creek, Calif.	1,100	86
Weber	Gateway, Utah	304	153
Jordan	Utah Lake, Utah	236	129
Truckee	Lake Tahoe to Farad	220	105
Colorado	Lake Powell inflow	7,900	121
Green	Green River, Utah	4,000	159
San Juan	Bluff, Utah	510	59
Rio Grande	San Marcial, N. Mex.	60	24
Arkansas	Pueblo, Colo.	265	80
Missouri	Ft. Peck, Mont.	6,455	170
Yellowstone	Sidney, Mont.	9,154	156
North Platte	Glendo, Wyo.	1,031	181

+ Period, 1953-67

* Period, Oct. 1, 1970 to Sept. 30, 1971

Hydrologic Services Div.
 Office of Hydrology





INDEX DECREASED DURING WEEK
(Unshaded Areas)

INDEX INCREASED OR DID NOT CHANGE DURING WEEK
(Shaded areas)

INDEX

ABOVE 3.0 SOME DRYING, BUT STILL EXCESSIVELY WET.
 2.0 to 3.0 MORE DRY WEATHER NEEDED, WORK DELAYED.
 1.0 to 2.0 FAVORABLE, EXCEPT STILL TOO WET IN SPOTS.
 0 to 1.0 FAVORABLE FOR 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 EXCEPTIONALLY DRY, MOST CROPS ABOUT RUINED

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 ABOVE NORMAL, 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.
 -3.0 to -4.0 DROUGHT CONTINUES, RAIN URGENTLY NEEDED.
 BELOW -4.0 NOT ENOUGH RAIN, STILL EXCEPTIONALLY DRY.

FLORIDA DROUGHT EASED

Heavy rains covered most of Florida over the past weekend, bringing welcome relief to the drought-stricken areas of the State. Rainfall amounts of 2 to 4 inches were reported throughout much of southern Florida, and immediate improvement was noted in many pastures and grasslands. Since much of the precipitation occurred after data collection time, the above CMI map does not reflect this improvement. The weekly precipitation map on page 1, which has a later data cut-off time, shows the full extent of the weekend rains.

Parts of southern and eastern Texas received moderate rainfall during the past week, with very slight improvement noted in the serious drought condition in extreme southern sections of the State. The drought in northwest Texas and southwest Oklahoma intensified and expanded, as little or no rain fell there during the past week.

J. J. Rahn

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Washington, D.C. 20250

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