

WEEKLY WEATHER AND CROP BULLETIN

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

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

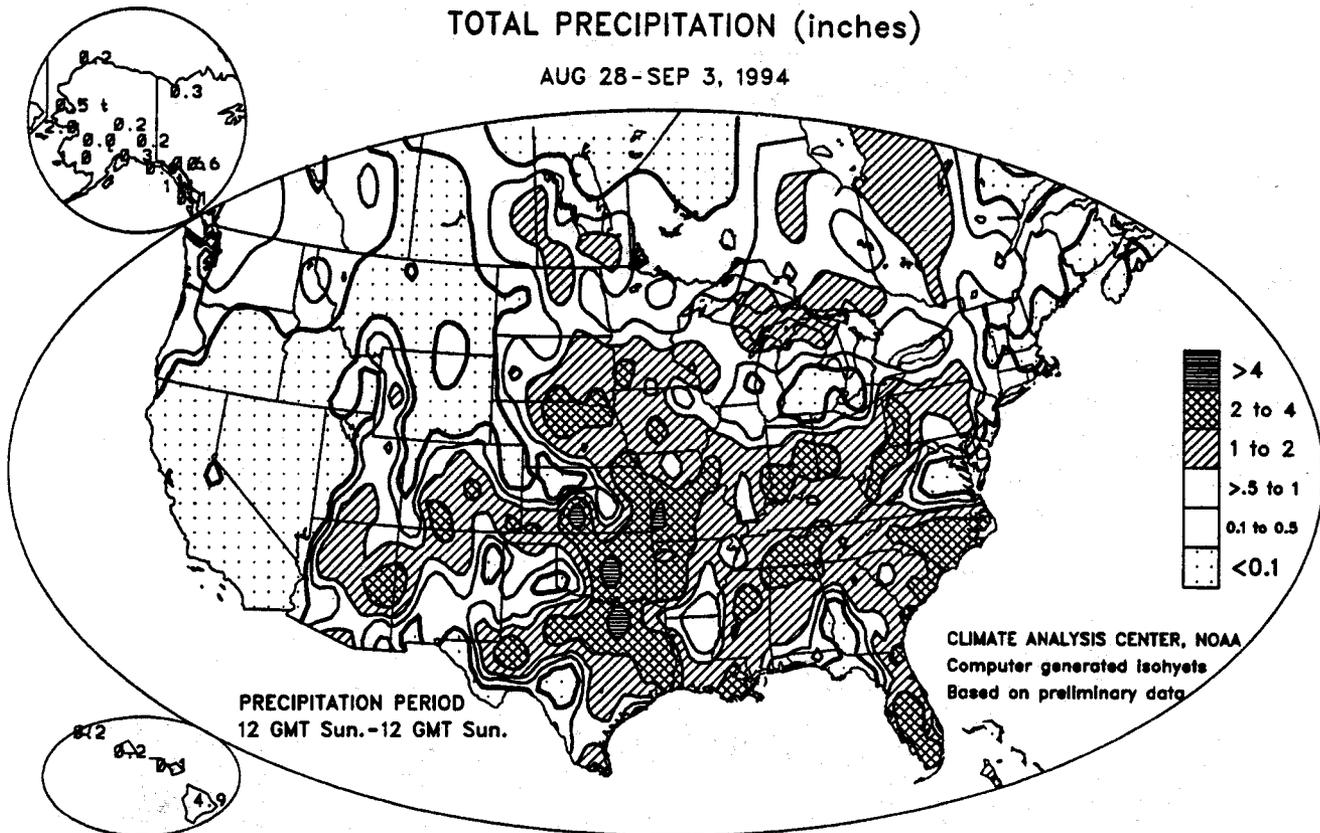
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Washington, D.C.

September 7, 1994

TOTAL PRECIPITATION (inches)

AUG 28 - SEP 3, 1994



HIGHLIGHTS

August 28 - September 3, 1994

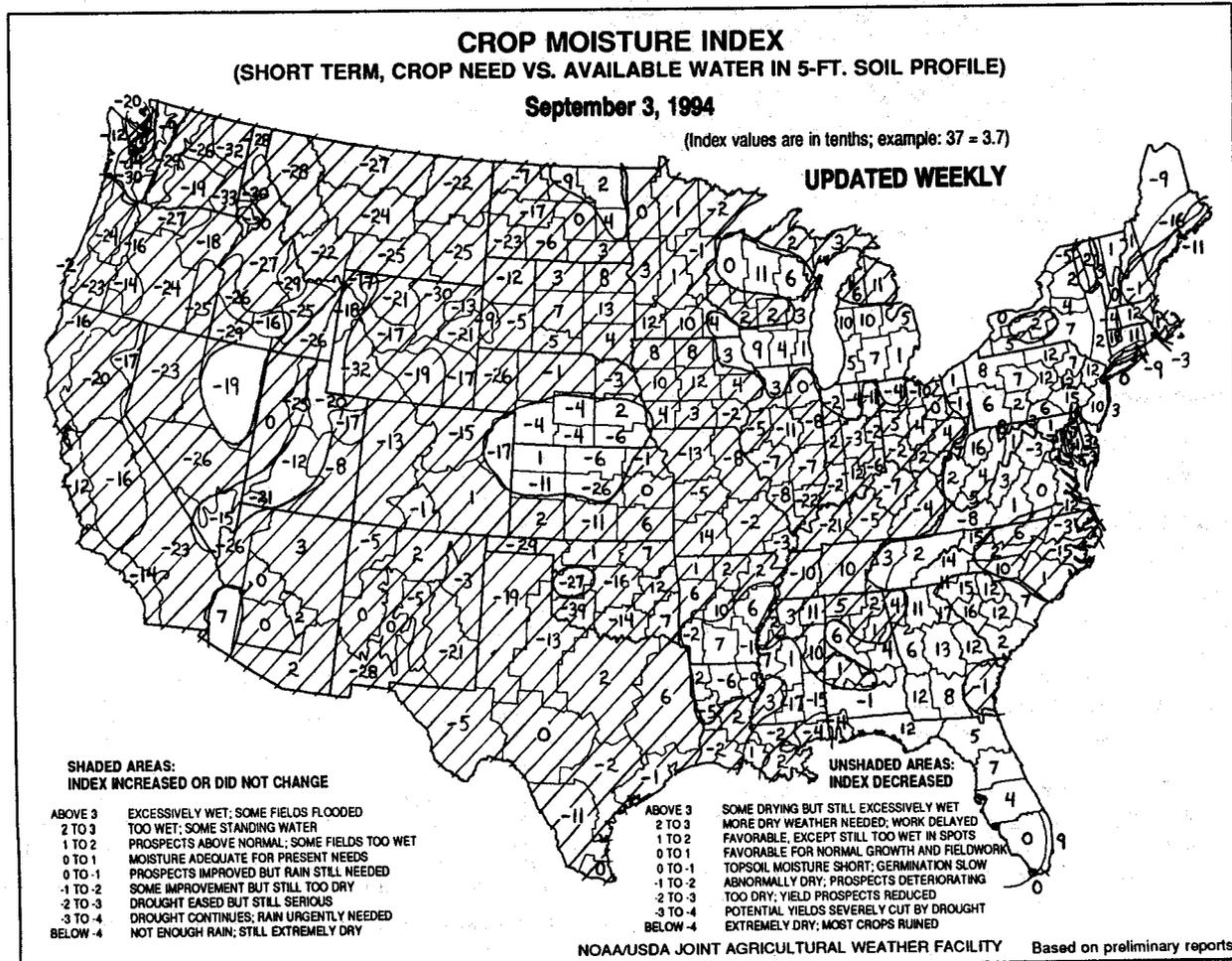
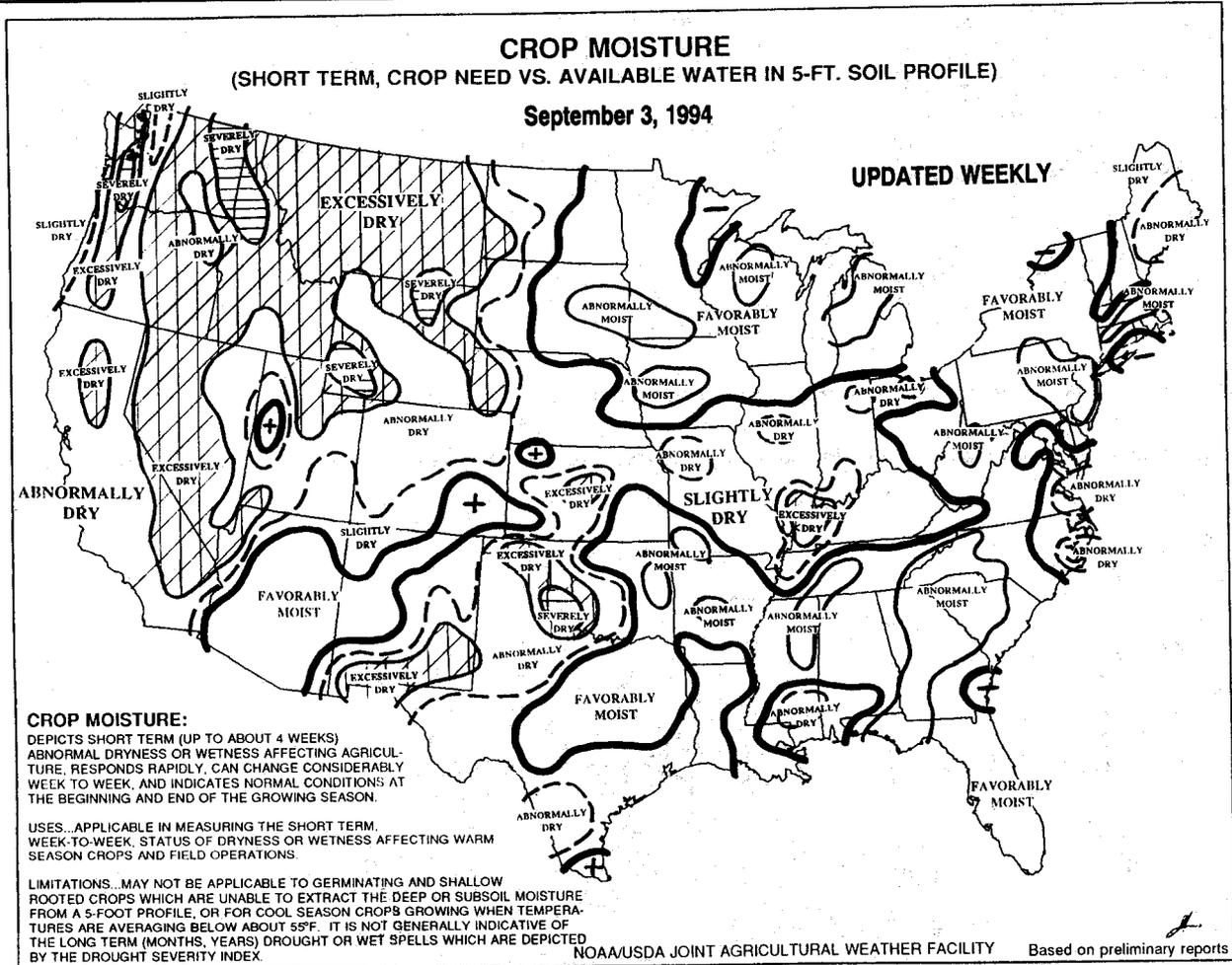
Timely rain aided maturing **Corn Belt** crops and provided planting moisture for winter wheat in the **central and southern Plains**. However, heavy rainfall caused local flash flooding in the **South Central States**. Very cool air trailed the precipitation, but scattered frost was confined to the Nation's **northern tier**. Late-week highlights included light rain across the parched **Northwest**, locally heavy rainfall in the **Southeast and Southwest**, and gusty northeasterly winds along the **Atlantic Seaboard**.

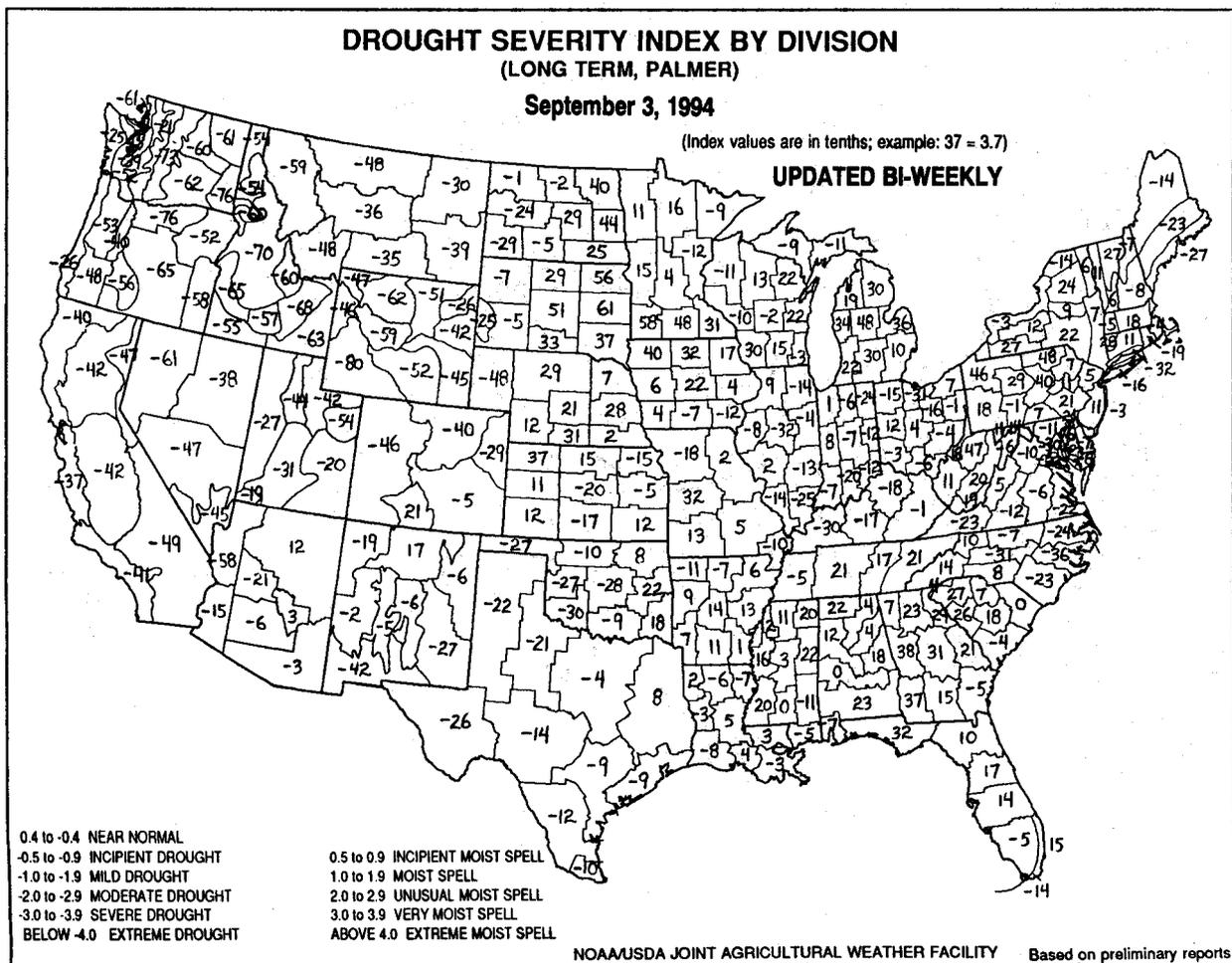
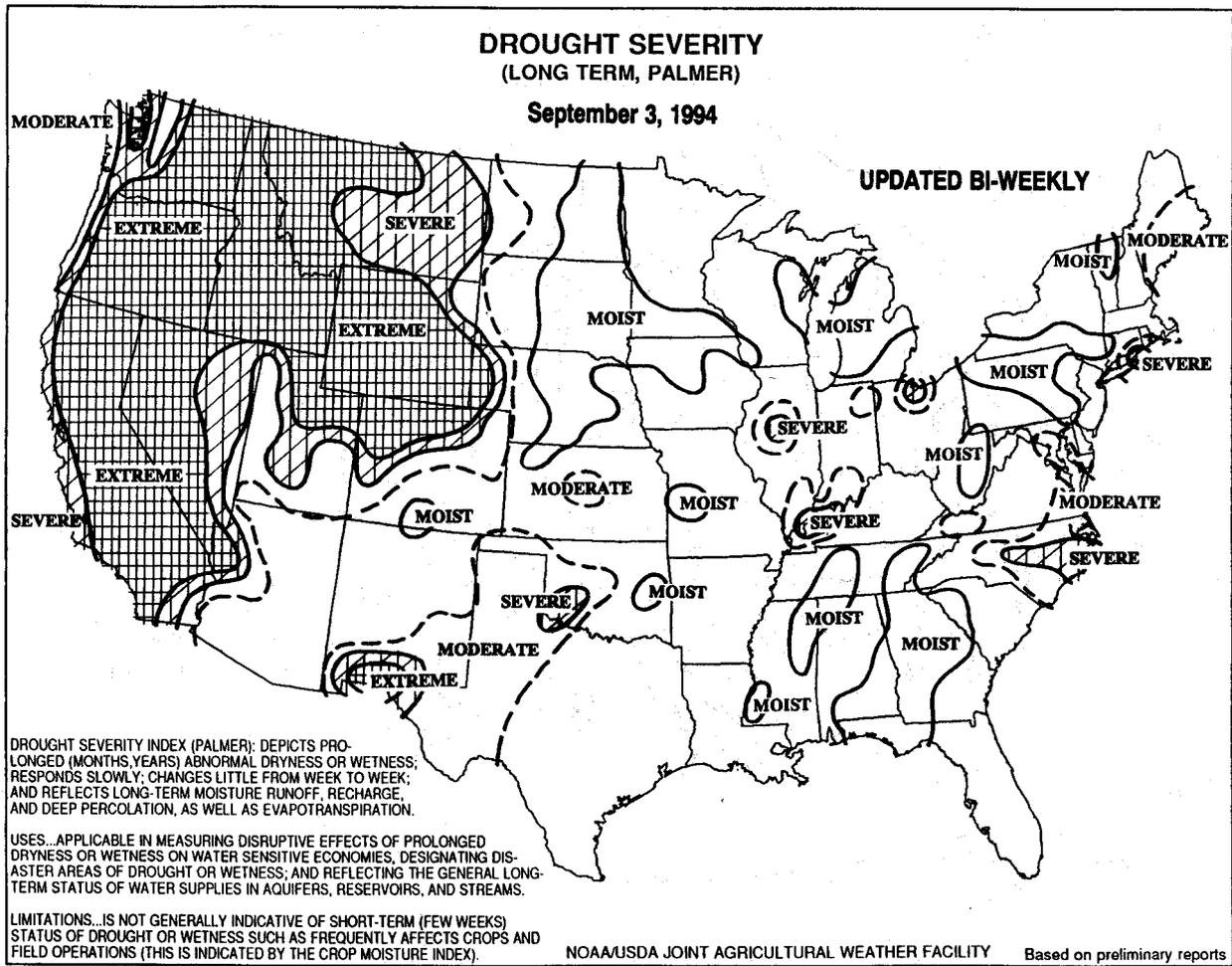
During the first half of the week, a pair of cold fronts dipped across the **Plains** and the **Midwest**, spreading rain and cooler air southward. On Sunday, rainfall locally topped 1 inch from the **east-central Plains** to the **southern Corn Belt**. Specific 24-hour totals included 4.26 inches in **Topeka**,
(Continued to p. 16)

Contents

Page

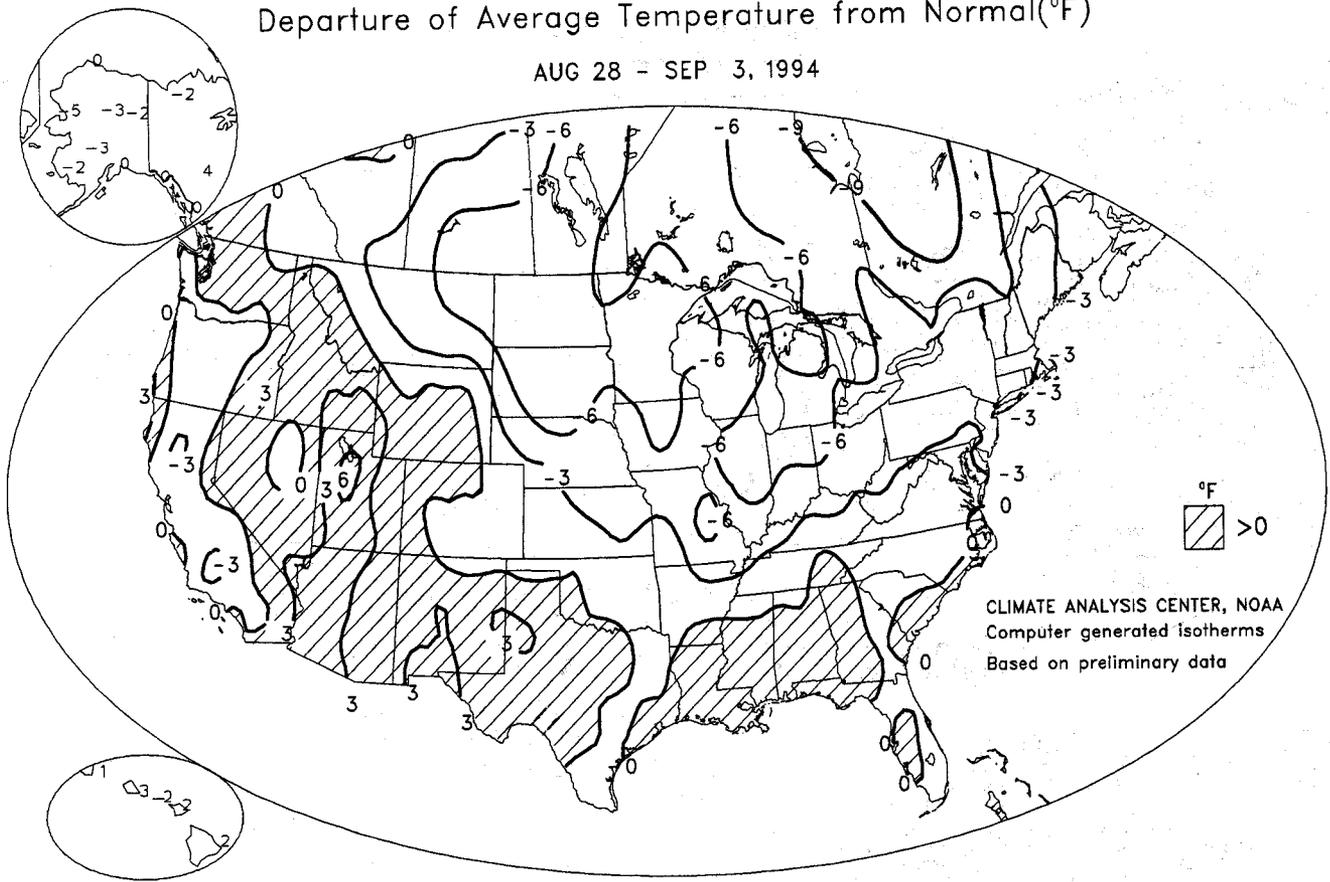
Highlights & Total Precipitation Map	1
Crop Moisture Maps	2
Drought Severity Maps	3
Temperature Departure & Extreme Maximum Temperature Maps	4
Average Date of First Fall Freeze	5
National Weather Data for Selected Cities	6
August Weather and Crop Summary	9
August Precipitation & Temperature Maps	10
August Weather for Selected Cities	11
Summer Weather Review	12
Summer Precipitation & Temperature Maps	13
National Agricultural Summary	14
Crop Progress and Condition Tables	15
State Summaries of Weather and Agriculture	17
International Weather and Crop Summary & August Temperature/Precipitation Table	22
1994 Southwest Monsoon Update	27
Subscription and Mailing Permit Information ..	28





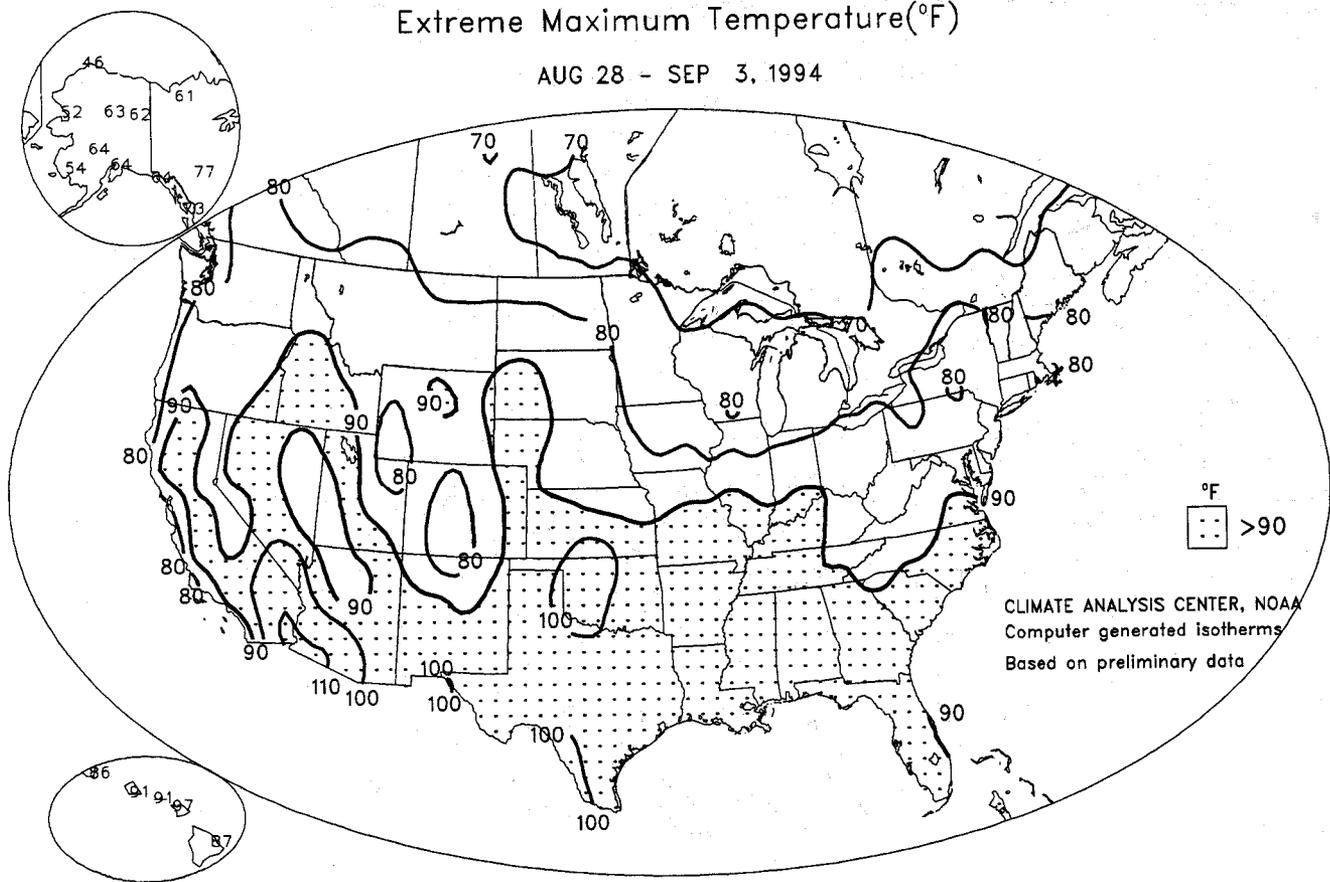
Departure of Average Temperature from Normal(°F)

AUG 28 - SEP 3, 1994

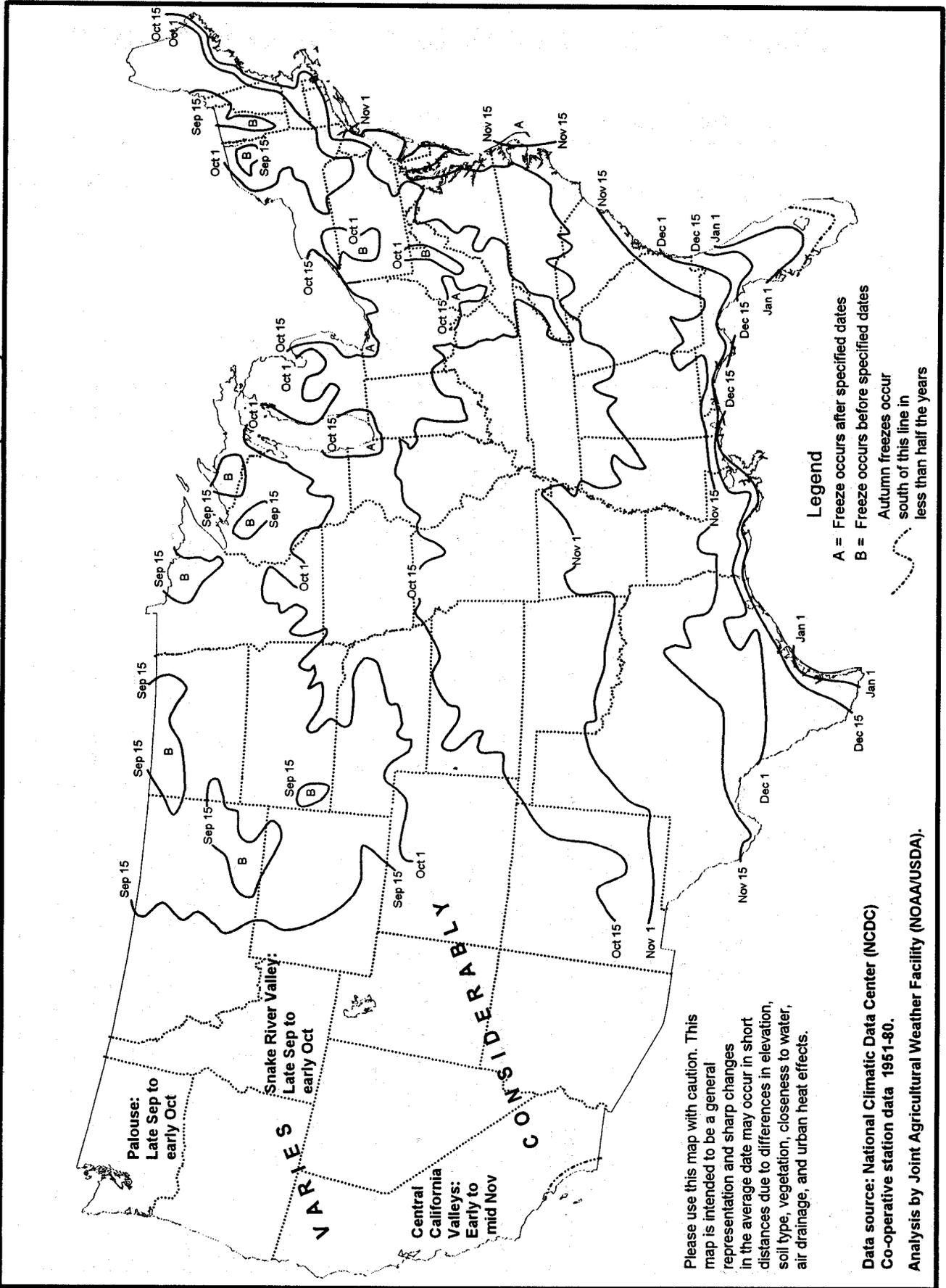


Extreme Maximum Temperature(°F)

AUG 28 - SEP 3, 1994



United States: Average dates of first autumn freeze (32° F)



Please use this map with caution. This map is intended to be a general representation and sharp changes in the average date may occur in short distances due to differences in elevation, soil type, vegetation, closeness to water, air drainage, and urban heat effects.

Data source: National Climatic Data Center (NCDC) Co-operative station data 1951-80.
 Analysis by Joint Agricultural Weather Facility (NOAA/USDA).

National Weather Data for Selected Cities

Weather Data for the Week Ending September 3, 1994

STATES AND STATIONS	TEMPERATURE °F						PRECIPITATION						RELATIVE HUMIDITY, PERCENT		NUMBER OF DAYS							
	AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE Sep 1	PCT. NORMAL SINCE Sep 1	TOTAL, IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	AVERAGE	MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE		.50 INCH OR MORE	
																			OR MORE	OR MORE		
AL BIRMINGHAM	87	69	93	66	78	1	1.4	.6	1.0			10	42.4	109	95	62	4	0	0	3	1	
MOBILE	91	71	93	68	81	0	1.4	-1.2	.4				40.2	87	99	49	6	0	0	1	0	
MONTGOMERY	91	72	96	69	81	3	1.6	.7	1.5	1.5	375	41.9	105	93	53	5	0	0	2	1		
AK ANCHORAGE	61	45	65	40	53	-1	.1	-.6	.1			0	6.2	67	93	56	0	0	0	0	0	
BARROW	41	30	47	27	36	0	.2	.0	.1			314	3.5	117	93	79	0	5	5	3	0	
FAIRBANKS	62	38	70	35	50	-2	.2	-.1	.2			169	6.4	84	96	50	0	0	2	2	0	
JUNEAU	61	47	71	46	54	1	.9	-.4	.5			40	26.7	86	98	66	0	0	3	3	0	
KODIAK	58	43	63	36	51	-3	.9	-1.4	.9			2	53.9	131	96	63	0	0	2	2	0	
NOME	49	42	54	26	45	-2	2.0	1.3	.7			252	12.4	130	94	77	0	1	6	6	2	
AZ PHOENIX	102	82	106	73	92	3	1.4	1.1	1.4	1.4	>1000	4.1	89	60	28	7	7	0	1	1	1	
FRESNOCO	86	63	89	60	75	7	.6	-.1	.6			211	9.4	69	80	30	0	0	1	1	1	
TUCSON	99	74	103	68	87	3	1.3	.9	1.2	1.2	647	5.1	66	71	29	6	6	0	3	3	1	
YUMA	106	85	110	83	95	5	.0	-.1	.0			0	.7	38	53	23	7	7	0	0	0	
AR FORT SMITH	87	68	95	64	78	-1	1.3	.6	1.2	-1	23	39.1	143	94	54	3	0	0	2	2	1	
LITTLE ROCK	86	68	94	60	77	-1	1.0	.1	.9	-1	21	40.7	128	90	55	3	0	0	2	2	1	
CA BAKERSFIELD	93	61	98	56	77	-3	.0	.0	.0			0	4.2	107	69	21	6	0	0	0	0	0
EUREKA	67	56	71	53	62	4	.9	-.1	.9			0	19.5	90	60	65	0	0	0	0	0	0
FRESNO	92	61	97	55	77	-2	.0	.0	.0			0	6.3	90	70	20	5	0	0	0	0	0
LOS ANGELES	77	65	82	63	71	1	.0	-.1	.0			0	6.2	79	85	55	0	0	0	0	0	0
REDDING	92	57	98	53	75	-3	.0	-.1	.0			0	15.0	77	67	18	5	0	0	0	0	0
SACRAMENTO	88	56	93	52	72	-2	.0	.0	.0			0	6.7	62	91	29	2	0	0	0	0	0
SAN DIEGO	76	67	82	66	72	-1	.0	.0	.0			0	8.2	130	87	58	0	0	0	0	0	0
SAN FRANCISCO	72	56	76	54	64	0	.0	.0	.0			0	10.7	87	93	57	0	0	0	0	0	0
CO DENVER	82	56	92	52	69	2	-1	-2	-1			7	7.5	63	83	33	1	0	0	3	0	0
GRAND JUNCTION	87	60	92	58	74	0	.1	-.1	.1			22	3.6	54	85	27	2	0	3	3	0	0
FUENLO	80	58	88	55	69	-2	.8	.5	.4			31	12.8	142	96	44	0	0	0	6	6	0
CT BRIDGEPORT	77	59	85	51	68	-2	.7	.0	.7			0	28.6	100	83	45	0	0	3	1	0	0
HARTFORD	77	52	87	44	64	-4	.1	-.8	.1			0	36.1	123	91	42	0	0	2	2	1	0
DC WASHINGTON	81	64	87	60	73	-3	.1	-.8	.1			0	29.7	112	86	50	0	0	1	1	0	0
FL PANAMA BEACH	87	74	89	72	81	1	.9	-1.6	.9			0	34.8	73	99	66	0	0	0	0	0	0
DAYTONA BEACH	89	71	91	69	80	-1	.8	-.7	.7			124	41.2	126	100	58	2	0	2	1	1	0
JACKSONVILLE	92	71	95	68	82	1	2.3	.8	2.3	2.3	324	42.1	123	98	51	6	0	0	1	1	1	0
KEY WEST	88	77	90	72	83	-1	1.2	-.2	1.2			0	21.7	87	86	63	1	0	1	1	0	0
MIAMI	89	76	92	71	83	0	2.5	.6	2.3	2	20	42.8	110	87	61	4	0	2	2	1	1	0
ORLANDO	92	72	93	70	82	0	.8	-.7	.7			14	44.6	124	96	56	6	0	3	1	1	0
TALLAHASSEE	93	68	95	67	81	0	.5	-1.1	.4			73	61.8	126	94	47	6	0	2	2	0	0
TAMPA	91	73	93	70	82	0	1.7	.0	1.7			0	34.0	104	97	56	5	0	2	1	1	0
WEST PALM BEACH	88	73	90	71	81	-2	.2	-1.4	.2			0	46.2	118	92	59	2	0	1	0	0	0
GA ATLANTA	89	70	95	64	80	3	.2	-.6	.2			49	45.0	123	92	52	5	0	2	0	0	0
AUGUSTA	89	66	94	61	77	-1	-1	-.8	.1			14	32.6	98	99	55	5	0	2	0	0	0
MACON	88	68	92	65	78	-1	.8	.1	.8			247	46.8	142	97	56	5	0	1	1	1	0
SAVANNAH	92	72	97	66	82	2	3.2	1.8	3.2	3.2	549	38.1	101	97	50	6	0	1	1	1	1	0
HI HILO	86	72	87	69	79	3	4.9	2.9	2.7	3.9	453	111.8	131	91	74	0	0	6	3	3	0	
HONOLULU	91	77	92	75	84	3	.2	-.1	.1			100	12.0	98	78	53	7	0	2	0	0	0
KAHULUI	90	73	97	69	82	3	.1	.0	.1			0	9.1	68	80	54	4	0	2	0	0	0
LIHUE	85	77	86	74	81	1	.2	-.3	.2			0	20.3	79	83	69	0	0	1	0	0	0
ID BOISE	85	54	92	45	70	1	.0	-.2	.0			0	5.0	64	58	17	1	0	0	0	0	0
LEWISTON	83	60	89	53	71	1	.1	-.1	.1			88	6.4	75	45	21	0	0	1	0	0	0
POCATELLO	85	49	91	40	67	2	.4	-.2	.4			0	5.1	63	82	16	2	0	1	0	0	0
IL CHICAGO	71	54	79	49	63	-6	.7	-.3	.7			16	20.3	83	92	52	0	0	2	1	1	0
MOLINE	74	53	80	47	63	-6	1.0	.0	.9			0	22.6	81	97	51	0	0	2	1	1	0
PEORIA	76	55	83	49	65	-5	.7	-.1	.6			0	15.0	60	93	53	0	0	2	1	1	0
QUINCY	76	55	82	51	66	-6	1.7	.8	1.7			0	14.2	53	84	48	0	0	1	1	1	0
ROCKFORD	71	53	79	45	62	-6	.4	-.6	.2			44	24.0	95	97	60	0	0	2	0	0	0
SPRINGFIELD	76	56	86	49	66	-5	1.3	.5	.8			0	26.7	110	93	55	0	0	2	1	1	0
IN EVANSVILLE	81	59	94	49	70	-5	1.2	.5	1.2			0	22.4	70	90	49	2	0	1	1	1	0
FORT WAYNE	76	50	81	46	63	-6	.1	-.6	.1			0	21.4	89	92	46	0	0	2	0	0	0
INDIANAPOLIS	76	56	91	49	66	-5	1.2	.5	1.0			0	23.5	83	88	50	1	0	3	1	1	0
SOUTH BEND	71	51	80	46	61	-7	.2	-.7	.2			0	22.7	87	94	54	0	0	3	1	1	0
IA DES MOINES	76	56	82	52	66	-2	1.0	.1	.9			2	20.0	81	88	49	0	0	3	1	1	0
SIOUX CITY	73	57	80	53	65	-4	.8	-.1	.4			190	16.9	87	94	50	0	0	5	0	0	0
WATERLOO	71	51	77	45	61	-6	.6	-.2	.5			157	26.7	107	96	59	0	0	3	1	1	0
KS CONCORDIA	75	58	84	52	67	-6	.2	-.5	.2			0	13.2	60	96	67	0	0	1	0	0	0
DODGE CITY	84	63	95	56	73	-1	1.4	.9	.9			50	13.8	81	89	51	4	0	3	1	1	0
GOODLAND	79	57	91	52	68	-1	.1	-.3	.1			17	11.3	77	93	47	1	0	2	0	0	0
TOPEKA	77	60	87	55	68	-4	4.4	3.5	3.0			0	19.4	77	97	67	0	0	3	2	2	0
WICHITA	83	67	100	60	75	0	.5	-.4	.2			62	16.0	64	87	53	2	0	3	0	0	0
KY BOWLING GREEN	83	60	92	52	71	-3	1.7	.9	1.7			21	42.1	120	94	58	2	0	2	1	1	0
LEXINGTON	78	59	87	51	69	-4	.6	-.2	.5			0	35.6	112	91	55	0	0	2	0	0	0
LOUISVILLE	81	61	94	54	71	-3	.4	-.3	.3			0	24.1	76	88	46	1	0	2	0	0	0
LA BATON ROUGE	89	73	91	70	81	0	.4	-.9	.2			4	46.2	107	100	65	3	0	2	0	0	0
LAKE CHARLES	92	75	94	73	83	3	1.8	.5	.8			1.2	205	30.2	83	99	60	7	0	4	2	2
NEW ORLEANS	91	72	93	71	81	1	3.4	2.0	1.3	2.0	319	40.0	91	98	59	5	0	4	4	4	4	
SHEREVEPORT	91	71	95	69	81	1	.3	-.4	.3			6	34.9	105	97	54	5	0	2	0	0	0

Based on 1961-90 normals.

Weather Data for the Week Ending September 3, 1994

STATES AND STATIONS	TEMPERATURE °F						PRECIPITATION						RELATIVE HUMIDITY, PERCENT	NUMBER OF DAYS					
	AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL IN, SINCE Sep 1	PCT. NORMAL SINCE Sep 1	TOTAL IN, SINCE Jan 1		PCT. NORMAL SINCE Jan 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	PRECIP.
													.01 INCH OR MORE						.50 INCH OR MORE
ME CARIBOU	65	44	75	36	55	-.4	.2	-.7	.2	.0	.0	27.6	117	81	44	0	0	2	0
PORTLAND	70	49	78	41	60	-.5	.7	-.7	.7	.0	.0	27.0	97	93	51	0	0	1	0
MD BALTIMORE	81	61	90	56	71	-.2	.1	-.7	.1	.0	.0	33.7	120	88	47	1	0	1	0
SALISBURY	83	57	88	51	70	-.3	.1	-1.0	.1	.1	.1	29.8	94	96	45	0	0	1	0
MA BOSTON	75	59	87	50	67	-.2	.7	-.7	.7	.0	.0	33.0	121	77	44	0	0	1	0
CHATHAM	72	59	78	54	65	.0	.6	-.2	.5	.0	.0	32.7	113	81	63	0	0	2	1
MI ALPENA	67	45	76	38	56	-.6	1.1	.3	.6	.0	.0	23.5	119	97	56	0	0	2	1
DETROIT	73	53	80	50	63	-.4	.2	-.6	.1	.0	.0	22.2	99	88	50	0	0	2	0
FLINT	71	47	78	39	59	-.7	.7	-.8	.7	.0	.0	22.9	113	96	49	0	0	1	0
GRAND RAPIDS	71	50	77	45	60	-.6	.6	-.4	.4	.0	.0	34.4	148	96	52	0	0	2	0
HOUGHTON LAKE	69	49	78	41	59	-.3	.3	-.5	.2	.0	.0	21.6	115	93	52	0	0	3	0
LANSING	70	46	76	40	58	-.7	.7	-.2	.7	.0	.0	24.4	118	99	52	0	0	2	1
MARQUETTE	62	42	71	37	52	-.7	1.6	.7	1.1	.1	.1	17.2	76	96	55	0	0	5	1
MUSKOGON	70	50	74	46	60	-.6	.9	.0	.5	.0	.0	23.1	115	94	51	0	0	2	1
SAULT ST. MARIE	62	43	71	35	53	-.7	1.0	.1	.5	.0	.0	20.8	97	97	53	0	0	2	1
MN ALEXANDRIA	65	50	77	47	57	-.7	.9	.2	.5	.5	180	12.6	66	97	59	0	0	3	0
DULUTH	63	44	67	38	53	-.6	.1	-.9	.1	.0	.0	19.8	94	90	46	0	0	2	0
INT'L FALLS	65	39	70	34	52	-.7	.2	-.5	.2	.0	.0	15.8	90	96	50	0	0	2	0
MINNEAPOLIS	68	52	74	47	60	-.6	.8	.0	.5	.3	106	18.7	89	91	57	0	0	3	0
ROCHESTER	68	51	73	45	59	-.5	.4	-.5	.3	.1	37	23.8	110	93	56	0	0	4	0
MS GREENWOOD	91	69	96	62	80	1	1.1	.5	1.1	.1	.0	32.8	89	96	50	5	0	1	1
JACKSON	90	70	95	64	80	1	.5	-.2	.5	.5	152	43.9	115	95	52	5	0	2	0
MERIDIAN	91	70	98	65	81	2	1.0	.2	.8	.8	233	49.5	124	95	52	5	0	2	1
MO CAPE GIRARDEAU	81	61	94	52	71	-.3	.5	-.3	.2	.1	27	29.2	92	93	54	2	0	4	0
COLUMBIA	77	58	95	50	68	-.4	3.7	2.9	1.7	.0	.0	26.8	103	97	62	1	0	4	2
KANSAS CITY	76	59	85	53	68	-.5	1.6	.6	1.3	.0	.0	19.5	74	91	58	0	0	3	1
SAINT LOUIS	78	61	96	55	70	-.5	1.4	.7	1.0	.0	.0	24.3	94	85	51	1	0	4	1
SPRINGFIELD	82	64	94	58	73	-.1	2.1	1.0	1.1	.9	185	34.7	120	86	50	2	0	3	2
MT BILLINGS	74	51	86	44	63	-.3	1.1	-.2	.1	.1	.0	8.9	80	75	35	0	0	1	0
GLASGOW	69	45	80	37	57	-.7	.1	-.2	.1	.0	.0	7.5	85	92	41	0	0	1	0
GREAT FALLS	73	45	87	40	59	-.3	.7	-.4	.7	.0	.0	7.8	66	87	34	0	0	0	0
HAVRE	74	44	84	38	59	-.4	.3	.0	.2	.0	.0	5.7	66	90	32	0	0	2	0
HELENA	75	48	85	40	62	-.1	.1	-.2	.1	.0	.0	5.7	64	89	36	0	0	2	0
KALISPELL	74	45	82	38	60	.0	.5	.2	.3	.5	343	7.5	66	91	37	0	0	2	0
MILES CITY	74	51	85	42	62	-.5	.7	-.3	.7	.0	.0	6.3	58	83	40	0	0	1	0
MISSOULA	79	47	89	44	63	1	.7	-.2	.7	.0	.0	8.8	90	86	26	0	0	3	0
NE GRAND ISLAND	76	56	85	50	66	-.4	.1	-.6	.1	.0	.0	16.2	84	94	48	0	0	1	0
LINCOLN	75	58	82	52	66	-.5	.7	-.8	.7	.0	.0	15.9	76	93	60	0	0	0	0
NORFOLK	73	56	81	53	65	-.4	1.0	.4	.7	.7	269	23.5	120	91	51	0	0	5	1
NORTH PLATTE	77	56	87	50	66	-.1	.5	.1	.3	.3	171	14.5	92	91	49	0	0	2	0
OMAHA	77	57	83	52	67	-.4	.5	-.3	.5	.0	.0	20.7	95	91	48	0	0	2	0
SCOTTSBLOFF	76	54	93	47	65	-.2	.1	-.2	.1	.0	.0	11.0	89	92	47	1	0	2	0
VALENTINE	71	53	90	47	62	-.3	.7	.5	.1	.3	7	13.4	76	85	53	1	0	3	0
NV SLY	84	45	87	39	64	3	.0	-.2	.7	.0	.0	6.0	86	82	12	0	0	0	0
LAS VEGAS	102	77	105	74	89	4	.0	.1	.0	.0	.0	.9	30	38	12	7	0	0	0
RENO	87	49	92	44	68	2	.0	-.1	.0	.0	.0	3.2	64	87	12	2	0	0	0
WINNEMUCCA	88	44	93	38	66	.0	.0	-.1	.0	.0	.0	4.8	87	89	10	2	0	0	0
NH CONCORD	73	45	86	36	59	-.5	.0	-.1	.7	.1	.0	24.8	104	95	46	0	0	1	0
NJ ATLANTIC CITY	79	53	87	47	66	-.5	.1	-.7	.1	.0	.0	32.6	117	95	52	0	0	1	0
NM ALBUQUERQUE	88	65	94	61	77	3	.4	.1	.4	.4	333	6.8	111	67	32	3	0	2	0
CLOVIS	87	64	94	62	75	3	.2	-.4	.1	.0	.0	8.6	66	80	34	3	0	2	0
ROSWELL	90	66	97	61	78	2	.2	-.4	.1	.0	.0	5.5	62	77	34	3	0	2	0
NY ALBANY	72	49	82	41	60	-.6	.1	-.6	.1	.0	.0	27.7	113	94	53	0	0	2	0
BINGHAMTON	67	50	76	38	59	-.6	1.0	.2	.9	.0	.0	33.1	133	94	58	0	0	3	1
BUFFALO	71	52	82	45	62	-.5	.5	-.5	.4	.0	.0	25.0	100	86	50	0	0	3	0
NEW YORK	79	64	91	59	71	-.2	.1	-.7	.1	.1	22	33.1	115	72	42	1	0	2	0
ROCHESTER	73	53	86	45	63	-.2	.5	-.2	.4	.0	.0	20.0	94	92	47	0	0	3	0
SYRACUSE	71	52	81	44	61	-.5	.6	-.2	.5	.0	.0	29.0	114	96	53	0	0	3	1
NC ASHEVILLE	78	62	85	55	70	.0	1.1	-.2	.8	1.0	206	42.7	110	99	64	0	0	4	1
CHARLOTTE	83	67	90	59	75	1	.5	-.3	.2	.5	143	28.3	95	93	62	1	0	3	0
GREENSBORO	80	63	87	57	71	-.3	2.0	1.2	1.1	.8	219	29.4	99	99	64	0	0	4	2
HATTERAS	83	72	88	69	78	.0	2.9	1.6	1.5	2.9	518	42.1	114	90	65	0	0	3	3
NEW BERN	84	69	94	63	76	-.1	2.3	.9	1.5	2.3	387	28.5	72	95	63	3	0	3	2
RALPHIGH	83	66	91	57	74	-.1	2.5	1.6	1.5	1.7	491	28.9	98	91	58	3	0	5	1
WILMINGTON	86	69	93	63	78	1	1.9	.2	.7	1.1	145	36.7	91	97	62	5	0	5	2
ND BISMARCK	69	44	87	36	57	-.7	.4	-.1	.3	.3	200	9.1	74	94	48	0	0	4	0
FARGO	69	47	80	42	58	-.6	.3	-.2	.3	.0	.0	16.9	115	91	53	0	0	3	0
GRAND FORKS	69	45	80	40	57	-.5	.7	-.5	.7	.0	.0	16.4	119	93	45	0	0	1	0
WILLISTON	68	42	80	34	55	-.9	.2	-.1	.1	.1	85	12.3	115	93	41	0	0	2	0
OH AKRON-CANTON	74	54	85	46	64	-.4	.4	-.3	.4	.0	.0	31.6	124	91	51	0	0	3	0
CINCINNATI	75	57	89	50	66	-.5	2.1	1.4	1.9	.0	.0	30.5	104	93	56	0	0	3	1
CLEVELAND	73	55	84	47	64	-.4	.2	-.6	.1	.0	.0	21.2	86	88	53	0	0	2	0
COLUMBUS	76	56	89	48	66	-.2	1.5	.7	.8	.0	.0	23.9	91	92	50	0	0	2	2
DAYTON	75	53	89	46	64	-.6	2.2	1.5	1.9	.0	.0	26.6	103	94	52	0	0	3	1

Based on 1961-90 normals.

Weather Data for the Week Ending September 3, 1994

STATES AND STATIONS	TEMPERATURE °F							PRECIPITATION							RELATIVE HUMIDITY, PERCENT		NUMBER OF DAYS					
	AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE Sep 1	PCT. NORMAL SINCE Sep 1	TOTAL, IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	AVERAGE	MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	TEMP. °F		PRECIP.	
																			.01 INCH OR MORE	.50 INCH OR MORE		
TOLEDO	73	50	81	45	61	-6	.1	-.6	.1	.0	0	21.5	95	95	48	0	0	0	0	0	0	
YOUNGSTOWN	73	51	85	43	62	-4	.4	-.4	.3	.0	0	27.3	107	94	53	0	0	0	2	0	0	
OK OKLAHOMA CITY	87	68	99	63	77	-1	1.0	.3	.8	.2	69	17.0	73	92	55	3	0	0	3	0	1	
TULSA	83	69	96	63	76	-2	1.0	.1	.5	.2	40	34.0	124	93	64	3	0	0	3	0	1	
OR ASTORIA	68	52	73	46	60	0	1.1	-.7	1.1	1.1	555	37.2	100	97	56	0	0	2	2	1	1	
BURNS	81	42	87	35	62	1	.0	-.2	.0	.0	0	2.9	46	62	14	0	0	0	0	0	0	
MEDFORD	85	54	93	48	69	-1	.0	-.2	.0	.0	0	5.1	51	86	29	1	0	0	0	0	0	
FENDLETON	81	57	87	51	69	0	.0	-.1	.0	.0	67	8.0	107	59	24	0	0	0	1	0	0	
PORTLAND	79	56	87	50	68	1	.3	-.1	.3	.3	147	14.8	72	80	36	0	0	0	2	0	0	
SALEM	79	50	85	43	64	-1	.1	-.1	.1	.1	100	16.1	74	91	33	0	0	0	2	0	0	
PA ALLENTOWN	78	56	87	47	67	-3	.3	-.8	.1	.1	2	37.5	126	93	50	0	0	0	4	0	0	
ERIE	72	56	81	48	64	-4	.5	-.5	.5	.0	0	28.4	109	86	54	0	0	0	3	0	0	
HARRISBURG	76	60	86	52	68	-3	.5	-.8	.0	.0	0	35.6	128	88	49	0	0	0	1	0	0	
PHILADELPHIA	81	62	89	56	71	1	1.1	-.8	.1	.0	0	37.3	119	81	41	0	0	0	1	0	0	
PITTSBURGH	74	57	85	49	65	-3	1.0	.3	.6	.0	0	31.3	120	86	50	0	0	0	3	0	1	
SCRANTON	72	53	81	44	63	-5	.6	-.2	.4	.0	0	29.3	118	95	52	0	0	0	2	0	0	
RI PROVIDENCE	76	55	85	48	65	-3	.4	-.4	.2	.2	46	30.5	102	88	47	0	0	0	2	0	0	
SC CHARLESTON	90	71	95	64	80	1	1.7	.2	1.1	1.7	281	42.6	110	93	52	6	0	0	2	2	2	
COLUMBIA	87	68	94	62	78	0	.3	-.9	.2	.2	35	35.3	95	94	53	5	0	0	2	0	0	
FLORENCE	87	70	94	63	78	0	.3	-.7	.1	.2	41	29.1	89	95	60	5	0	0	3	0	0	
GREENVILLE	82	65	89	56	73	-2	.6	-.3	.3	.5	136	39.2	109	96	55	0	0	0	4	0	0	
SD ABERDEEN	68	48	80	43	58	-7	.7	-.1	.5	.6	338	15.2	91	91	59	0	0	0	4	1	1	
HURON	70	52	83	43	61	-6	1.8	1.4	.7	1.7	944	17.4	110	93	60	0	0	0	4	2	2	
RAPID CITY	73	51	93	45	62	-4	.5	.2	.4	1.1	93	6.6	49	85	50	2	0	0	4	2	0	
SIOUX FALLS	72	54	82	50	63	-4	2.5	1.8	1.2	2.4	747	19.2	109	91	52	0	0	0	4	4	2	
TX CHATTANOOGA	85	67	92	65	76	0	.1	-.6	.3	.2	49	58.3	159	99	60	0	0	0	2	0	0	
KNOXVILLE	82	65	90	62	73	-1	.1	-.6	.3	.3	6	84.8	165	97	63	0	0	0	2	0	0	
MEMPHIS	87	68	94	60	78	-1	.4	-.4	.3	.3	86	35.2	100	91	53	0	0	0	2	0	0	
NASHVILLE	83	65	93	58	74	-2	2.8	2.0	2.6	2.2	43	46.1	140	89	55	0	0	0	4	1	1	
TX ABILENE	89	70	95	68	80	-1	3.7	2.9	1.9	2.0	612	19.1	116	95	46	0	0	0	3	2	2	
AMARILLO	86	62	96	59	74	0	.9	-.3	.6	.0	0	14.0	91	91	43	0	0	0	3	1	1	
AUSTIN	91	73	95	71	82	-2	1.2	.6	.7	.7	257	20.9	99	94	52	0	0	0	3	1	1	
BEAUMONT	92	74	94	72	83	1	3.4	2.0	2.8	3.3	519	48.2	128	100	60	6	0	0	4	1	1	
BROWNSVILLE	90	75	94	72	82	-2	.8	-.3	.5	.8	146	13.9	89	94	56	6	0	0	2	1	1	
CORPUS CHRISTI	92	75	94	72	83	0	.8	-.3	.5	.8	27	16.8	87	93	55	6	0	0	4	1	1	
DEL RIO	96	75	99	71	85	3	.1	-.6	.1	.0	0	15.3	91	91	44	7	0	0	1	0	0	
EL PASO	95	71	102	70	83	5	.5	-.4	.0	.0	0	3.0	53	62	25	7	0	0	0	0	0	
FORT WORTH	92	72	98	69	82	2	5.2	4.4	3.9	1.3	328	26.7	110	95	56	4	0	0	3	2	2	
GALVESTON	90	80	92	76	85	3	.8	-.5	.7	.8	123	17.2	63	86	65	6	0	0	2	1	1	
HOUSTON	93	74	95	73	83	2	.8	-.3	.6	.6	119	25.5	74	98	61	6	0	0	4	1	1	
LUBBOCK	90	67	97	64	79	4	.1	-.6	.0	.0	11	10.6	80	95	40	4	0	0	2	0	0	
MIDLAND	91	67	97	66	79	1	1.6	-.9	1.4	.1	42	7.7	80	95	38	4	0	0	2	1	1	
SAN ANGELO	93	71	98	69	82	2	1.0	.3	.8	.2	48	9.1	69	95	41	5	0	0	2	1	1	
SAN ANTONIO	95	75	99	72	85	2	.8	-.1	.5	.3	90	21.5	104	88	43	7	0	0	3	1	1	
VICTORIA	90	74	93	72	82	1	.9	-.2	.9	.9	149	25.9	90	96	58	5	0	0	4	1	1	
WACO	94	73	98	69	84	0	.5	-.1	.3	.2	62	19.9	95	92	44	7	0	0	3	0	0	
WICHITA FALLS	93	71	101	68	82	2	.1	-.7	.1	.1	33	6.7	31	85	44	4	0	0	1	0	0	
UT CEDAR CITY	87	57	90	53	72	4	.2	-.1	.2	.0	0	4.7	59	64	19	2	0	0	1	0	0	
SALT LAKE CITY	91	64	94	57	78	6	.2	.0	.2	.0	9	8.4	77	65	25	5	0	0	3	0	0	
VT BURLINGTON	69	51	80	44	60	-4	.1	-.7	.1	.0	5	27.8	120	84	49	0	0	0	2	0	0	
VA NORFOLK	85	68	93	62	77	1	.3	-.7	.2	.3	77	41.8	131	85	48	3	0	0	2	0	0	
RICHMOND	84	62	91	55	73	-1	.1	-.8	.1	.1	14	32.3	107	90	37	1	0	0	3	0	0	
ROANOKE	81	62	86	57	72	0	.0	-.9	.0	.0	0	36.1	129	86	42	0	0	0	0	0	0	
WA QUILLAYOTE	68	48	74	39	58	-1	.4	-.3	.3	.4	122	56.3	94	97	58	0	0	0	3	0	0	
SEATTLE-TACOMA	73	57	79	52	65	1	.6	-.2	.6	.6	373	16.3	79	80	43	0	0	0	2	1	1	
SPOKANE	78	53	86	50	65	1	.3	-.2	.3	.3	429	6.6	64	76	26	0	0	0	3	0	0	
YAKIMA	83	52	88	45	67	1	.1	-.1	.1	.1	100	4.3	91	78	32	0	0	0	1	0	0	
WV BECKLEY	73	56	78	49	65	-2	1.0	-.2	1.0	.0	0	41.2	142	96	58	0	0	0	2	1	1	
CHARLESTON	77	60	87	54	69	-3	1.3	.5	1.2	.0	0	41.8	140	94	59	0	0	0	2	1	1	
HUNTINGTON	78	59	86	53	69	-2	.3	-.5	.3	.0	0	37.2	123	91	54	0	0	0	2	0	0	
PARKERSBURG	76	56	85	48	66	-5	1.0	-.2	.7	.0	0	39.5	133	97	55	0	0	0	3	1	1	
WI GREEN BAY	70	50	77	42	60	-4	.5	-.4	.5	.0	0	22.8	115	90	49	0	0	0	1	0	0	
LACROSSE	70	54	78	48	62	-5	..	..	..	..	..	..	..	93	51	0	0	0	..	..	..
MADISON	71	51	83	43	61	-4	.7	-.2	.5	.2	40	23.0	102	91	54	0	0	0	..	..	..
MILWAUKEE	73	57	83	51	65	-1	.4	-.4	.4	.0	0	20.4	90	87	49	0	0	0	1	0	0	
WAUSAU	68	48	75	38	58	-5	.0	-.0	.0	.0	0	14.7	64	89	44	0	0	0	0	0	0	
WY CASPER	81	52	90	47	66	2	.1	-.1	.1	.1	75	6.7	73	91	30	1	0	0	3	0	0	
CHEYENNE	73	52	86	47	63	0	.3	-.1	.1	.1	33	10.7	93	94	40	0	0	0	4	0	0	
LANDER	79	50	88	44	64	0	.2	-.0	.2	.2	167	5.4	57	74	23	0	0	0	1	0	0	
SHERIDAN	74	48	88	41	61	-3	.1	-.2	.0	.0	0	9.9	94	85	40	0	0	0	2	0	0	

Based on 1961-90 normals.

August Weather and Crop Summary

Weather

The summer's dominant weather features--a western ridge and a Mississippi Valley trough--shifted subtly eastward during August. As a result, the Northwest and the Northeast cooled, while the Intermountain West remained hot and dry, with monthly temperatures up to 6°F above normal. Heat shifted into the High Plains, but cool weather continued in the upper Midwest, where temperatures averaged up to 4°F below normal.

The Eastern States remained in a favored channel for heavy rainfall, partly due to Tropical Storm Beryl, which made landfall in northwestern Florida on August 15. Farther west, variable conditions existed across the Midwest, with dryness primarily confined to the southern Corn Belt. A late-month shot of moisture not only improved crop conditions across the southern Corn Belt, but also provided pre-planting moisture for winter wheat in parts of the central and southern Plains. Conditions west of the Rocky Divide, however, remained exceedingly dry. Despite cooler weather in the Northwest, some areas went a second consecutive month without rain. Western wildfires continued to burn at a ferocious pace, with 3.1 million acres scorched through month's end, compared with the 1989-93 average of 2.2 million acres.

The hot, dry summer continued unabated in the Southwest. August average-temperature records were set in locations such as Las Vegas, NV (92.9°F), Salt Lake City, UT (80.8°F), and El Paso, TX (86.2°F). With a reading of 126°F on August 6, Death Valley, CA was within 1°F of the U.S. August record. Farther north, no precipitation fell in Reno, NV and Burns, OR. In contrast, as much as 8 inches of rain fell in the east-central Plains and southeastern Texas. More than 8 inches fell across most of Florida and along the Appalachian chain. In Miami, FL, 16.64 inches of rain was only 0.24 inches shy of an August record.

During the month, a sharp temperature gradient existed across the Plains, with hot weather remaining to the west. Late in the month, highs soared to 103°F in Rapid City, SD (August 26) and 107°F in St. Francis, KS (August 27). Farther east, cool periods were observed at regular intervals. Tulsa, OK, with 53°F on the 15th, came within 1°F of an August record low. Other notable lows included 41°F in Aberdeen, SD on the 6th, 38°F in Bismarck, ND on the 8th, and 49°F in Kansas City, MO (earliest sub-50°F reading) on the 15th. Williston, ND dipped to 34°F on August 31.

Fieldwork

Crop progress was ahead of the average for all crops despite below-normal temperatures in the Eastern States, and hot, dry weather in the Western States throughout the month. August started with cotton bolls opening and the winter wheat harvest finishing up. Early in August, beneficial rains fell in parts of the Corn Belt but did not eliminate all the dry pockets during the crucial grain and pod-filling stage of development. Cool weather lessened the amount of moisture demanded by the crops and slowed crop growth but did not pull the crop's progress below the average. The continued hot, dry weather in the Western States left soil moisture supplies at critically low levels and set the stage for range and forest fires. Field activities were hampered by the saturated soil in the Southeastern States from continued rains. By mid-August, dry pockets remained in parts of the Corn Belt and created concern for the field crops and lowered the crop condition ratings. Warmer weather in the Great Lakes region improved

crop growth and maturation. In the southern Great Plains, mid-month rains missed the major cotton growing region, and the continued dry weather caused the cotton condition to decline. Clear weather at mid-month allowed the small grains harvest to advance in the Great Plains. By the end of August, dry soil supplies lowered crop condition ratings across the Nation. The continued lack of rain delayed winter wheat planting in the West. In late August, rains fell along the Delta and Gulf Coast region and delayed the rice harvest. As August ended, soybeans finished setting pods and began dropping leaves.

In early August, the winter wheat harvest was finishing in the northern Great Plains where the crops maturity was pushed by the hot, dry weather. The winter wheat harvest ended slightly ahead of the average and nearly 10 points ahead of the previous year.

The spring wheat harvest started August slightly behind the average and remained there throughout the month. The condition for spring wheat at the end of August was virtually unchanged from the beginning of the month, with 57% of the spring wheat crop rated as good to excellent.

Corn condition started August with 85% of the corn crop rated in the good to excellent category, but declined during the month due to soil moisture shortages in the Corn Belt. Throughout the month, dry weather concerned corn producers during the grain filling stage, but rains late in the month lessened their concerns. Corn doughing was accelerated by the hot, dry weather in the Midwest at the start of August and finished the month ahead of the average. Corn denting began in August, 1 point ahead of the average and increased to 15 points ahead of the average by the end of the month.

The first bale of cotton harvested in Arizona was reported at the beginning of August. Cotton condition started the month below July's level and continued to decline until the end of August. The hot, dry weather in the Southwest caused most of the decline. This decline was partially offset by the improvement in the cotton crops condition in the Southeastern States. The cotton progress was slow in the Southeastern States because of the wet fields and cool weather. Cotton bolls opening started the month 1 point ahead of the average and by the end of August was 4 points ahead of the average.

Entering August, sorghum headed started 24 points ahead of the average and finished early. Sorghum condition began the month with 69% of the crop rated as good to excellent and by month's end was down 12 points. Most of the decline was caused by the hot, dry weather that stressed the plants and caused some fields to mature early. Sorghum turning color remained ahead of the average for the month and the early harvest was completed in south Texas by the end of August.

Rice headed began in August 19 points ahead of the average and was finished 1 week early. The rice harvest began the month 2 points ahead of the average and finished the month 2 points behind. Heavy rains in the Delta and Coastal Bend region caused delays and reduced some second cutting of rice fields.

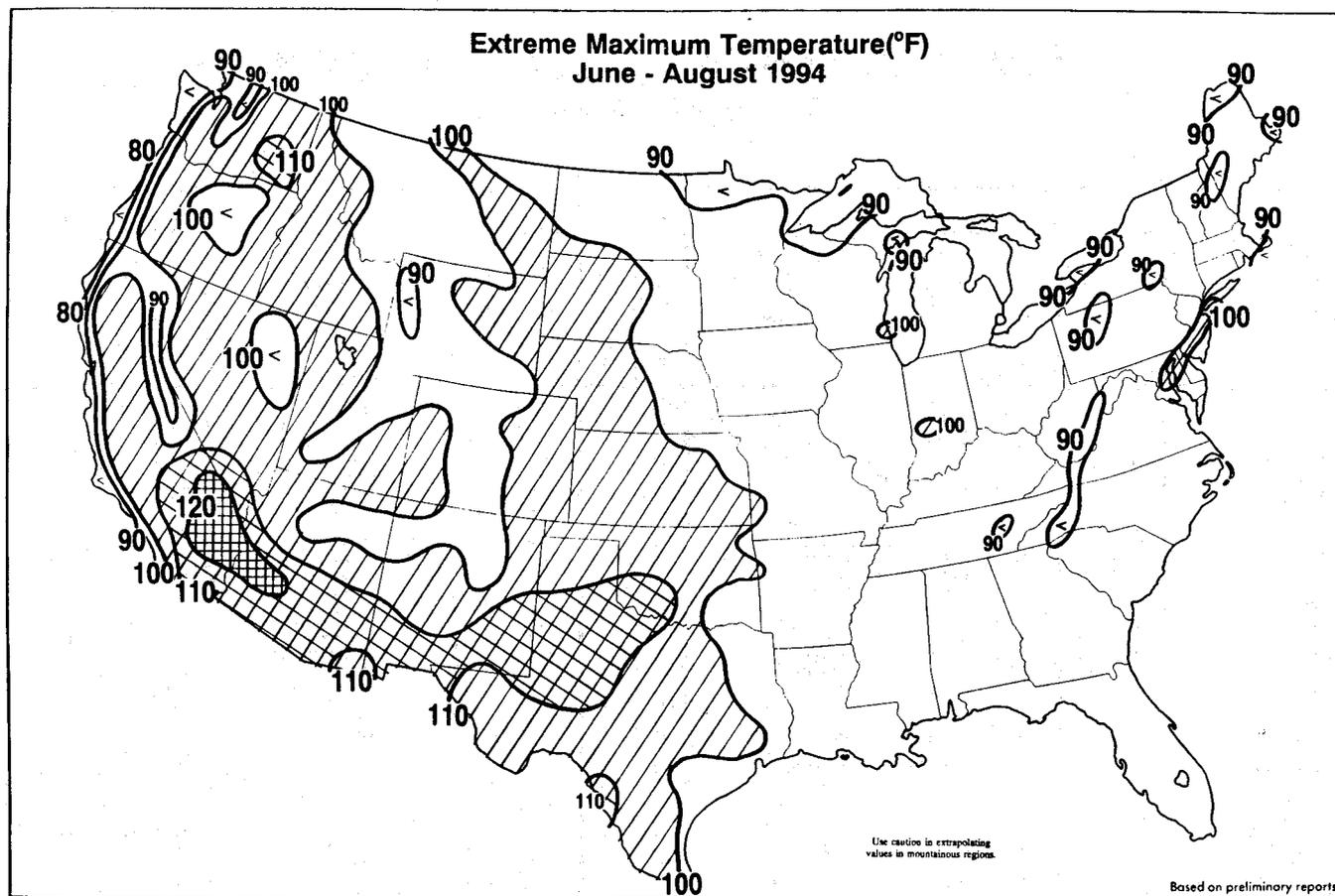
Soybeans began August with setting pods 21 points ahead of the average and finished the month 7 points ahead. Soybean condition started August with 79% of the crop rated as good to excellent and by the end of August fell to 66% rated good to excellent. The decline in the condition was caused by the short soil moisture supplies that limited the development of some fields. Some cases of aerial blight problems were reported in the Delta region.

TEMPERATURE AND PRECIPITATION SUMMARY

August 1994

STATES AND STATIONS	Temp. °F		Precip.		STATES AND STATIONS	Temp. °F		Precip.		STATES AND STATIONS	Temp. °F		Precip.	
	AVERAGE	DEPARTURE	TOTAL	DEPARTURE		AVERAGE	DEPARTURE	TOTAL	DEPARTURE		AVERAGE	DEPARTURE	TOTAL	DEPARTURE
AL BIRMINGHAM	78	-1	4.0	0.4	LA BATON ROUGE	80	-2	2.7	-3.3	OK YOUNGSTOWN	67	-2	6.6	3.3
AL HUNTSVILLE	76	-2	3.4	-0.1	LA LAKE CHARLES	82	1	5.0	-0.4	OK OKLAHOMA CITY	80	-1	1.8	-0.8
AL MOBILE	80	-1	2.0	-4.9	LA NEW ORLEANS	81	0	4.6	-1.6	OK TULSA	79	-3	5.2	2.0
AK ANCHORAGE	59	3	1.0	-1.4	ME BREVESPORT	81	0	3.7	0.9	OR ASTORIA	62	1	1.5	0.1
AK BARRON	44	6	2.0	1.1	ME CARIBOU	62	-1	2.8	-1.2	OR BURNS	66	3	0.0	-0.7
AK FAIRBANKS	60	3	1.4	-0.5	ME PORTLAND	66	-1	2.8	-0.1	OR MEDFORD	72	0	0.0	-0.5
AK JUNEAU	59	4	2.6	-2.7	MD BALTIMORE	74	-1	3.4	-0.5	OR PENDELTON	72	0	0	-0.5
AK KODIAK	58	2	0.6	-4.5	MD SALISBURY	73	-2	3.3	-2.0	OR PORTLAND	70	2	0.1	-1.0
AK NONE	49	-1	8.6	5.9	MA BOSTON	72	1	7.0	3.8	OR SALEM	67	0	0.1	-1.0
AZ FLAGSTAFF	66	2	3.6	0.9	MA CHATHAM	68	1	4.3	1.1	PA ALLENTOWN	71	-1	6.1	1.8
AZ PHOENIX	95	4	T	-1.0	MI ALPENA	63	-1	6.0	2.6	PA ERIE	69	-1	7.0	3.0
AZ PRESCOTT	77	7	3.0	-0.4	MI DETROIT	69	-1	3.3	-0.1	PA HARRISBURG	72	-2	4.9	1.6
AZ TUCSON	90	6	0.5	-1.7	MI FLINT	66	-3	3.6	0.1	PA PHILADELPHIA	75	-1	4.5	0.7
AZ WINSLOW	78	2	0.8	-0.6	MI GRAND RAPIDS	67	-3	7.4	3.8	PA PITTSBURGH	70	-1	7.6	4.4
AR YUMA	97	4	T	-0.6	MI HOUGHTON LAKE	65	0	5.5	2.1	PA SCRANTON	67	-3	6.6	3.3
AR FORT SMITH	78	-3	2.9	0.0	MI LANSING	65	-3	5.1	1.6	PA WILLIAMSPORT	69	-2	6.7	3.3
AR LITTLE ROCK	78	-2	3.6	0.6	MI MARGUETTE	61	-2	3.6	0.2	RI PROVIDENCE	70	-1	6.4	2.8
CA BAKERSFIELD	84	1	T	-0.1	MI MUSKEGON	65	-3	5.2	1.8	SC CHARLESTON	80	-1	5.4	-1.8
CA BISHOP	76	4	--	--	MI SAULT ST. MARIE	60	-3	4.1	0.4	SC COLUMBIA	78	-2	5.3	-0.8
CA EUREKA	61	3	--	--	MN ALEXANDRIA	66	-3	2.0	-1.4	SC FLORENCE	79	0	6.4	1.3
CA FRESNO	82	2	0.0	0.0	MN DULUTH	62	-1	3.5	-0.5	SC GREENVILLE	76	-1	5.8	1.8
CA LOS ANGELES	75	4	0.0	-0.2	MN INT'L FALLS	62	-2	2.7	-0.4	SD ABERDEEN	66	-4	3.9	1.0
CA REDDING	79	-1	0.0	-0.5	MN MINNEAPOLIS	67	-3	2.9	-0.7	SD HURON	68	-4	1.3	-0.7
CA SACRAMENTO	76	0	0.0	-0.1	MN ROCHESTER	65	-3	5.6	1.7	SD RAPID CITY	74	3	0.9	-0.8
CA SAN DIEGO	74	2	T	-0.1	MN ST. CLOUD	65	-2	3.2	-0.8	SD SIOUX FALLS	69	-2	2.7	-0.2
CA SAN FRANCISCO	65	1	T	0.0	MS GREENWOOD	80	0	1.3	-1.4	TN BRISTOL	73	-1	4.6	1.5
CA SANTA MARIA	64	1	T	0.0	MS JACKSON	79	-1	4.3	1.0	TN CHATTANOOGA	77	-1	5.1	1.5
CO ALAMOSA	64	2	1.2	0.1	MS MERIDIAN	81	0	1.7	-1.9	TN KNOXVILLE	76	0	4.1	1.0
CO CO. SPRINGS	70	2	3.9	0.9	MS PELO	78	-2	0.9	-2.1	TN MEMPHIS	79	-2	1.9	-1.5
CO DENVER	75	4	0.6	-0.9	MO CAPE GIRARDEAU	75	-2	5.9	2.4	TN NASHVILLE	77	-1	4.9	1.4
CO GRAND JUNCTION	79	3	0.5	-0.2	MO COLUMBIA	75	0	4.1	1.0	TX ABILENE	83	0	2.1	-0.7
CO PUEBLO	75	0	4.7	2.7	MO KANSAS CITY	75	-1	3.5	-0.5	TX AMARILLO	76	-1	2.9	-0.4
CT BRIDGEPORT	72	-1	5.1	1.8	MO SAINT LOUIS	77	-1	3.8	0.9	TX AUSTIN	84	-1	8.5	6.4
CT HARTFORD	70	-2	5.3	1.6	MO SPRINGFIELD	75	-1	4.8	0.6	TX BEAUMONT	82	-1	4.1	-1.2
DC WASHINGTON	75	-3	4.4	0.4	MT BILLINGS	74	3	0.1	-0.9	TX BROWNSVILLE	83	-1	3.4	0.6
FL PANAMA CITY	79	-1	6.6	-1.4	MT GLASGOW	71	1	0.9	-0.5	TX CORPUS CHRISTI	84	0	1.1	-2.2
FL DAYTONA BEACH	80	-1	7.0	0.9	MT GREAT FALLS	67	0	0.6	-1.0	TX DEL RIO	86	3	0.6	-2.1
FL FT. MYERS	83	0	7.8	-1.9	MT HAVRE	70	1	0.5	-0.8	TX EL PASO	86	6	T	-1.6
FL JACKSONVILLE	81	0	3.3	-2.2	MT HELENA	70	3	0.5	-0.8	TX FORT WORTH	84	2	4.9	2.6
FL KEY WEST	83	-1	9.0	3.9	MT KALISPELL	67	4	--	--	TX GALVESTON	84	1	2.3	-2.1
FL MIAMI	83	0	16.6	9.0	MT MILLS CITY	74	2	0.5	-0.7	TX HOUSTON	83	0	5.5	1.5
FL ORLANDO	81	-1	6.3	-0.5	MT MISSOULA	71	5	0.3	-0.9	TX LAREDO	--	--	--	--
FL TALLAHASSEE	80	-1	13.7	6.2	NE GRAND ISLAND	72	-2	1.2	-1.6	TX LUBBOCK	81	3	0.2	-2.3
FL TAMPA	82	0	8.4	0.8	NE LINCOLN	72	-3	3.1	-0.3	TX MIDLAND	82	2	1.8	-0.1
FL WEST PALM BEACH	81	-1	7.5	0.9	NE NORFOLK	71	-2	3.5	1.0	TX SAN ANGELO	84	2	1.3	-0.6
GA ATHENS	77	-1	7.4	3.7	NE NORTH PLATTE	73	1	1.2	-0.5	TX SAN ANTONIO	86	1	2.5	0.0
GA ATLANTA	79	1	4.2	0.5	NE OMAHA	73	-1	1.8	-1.5	TX VICTORIA	83	0	3.9	0.3
GA AUGUSTA	78	-2	6.7	2.2	NE SCOTTSBLUFF	73	2	0.4	-0.6	TX WACO	85	-1	1.1	-0.5
GA MACON	78	-3	4.6	1.0	NE VALENTINE	71	-2	1.0	-1.8	TX WICHITA FALLS	84	1	0.1	-2.5
GA SAVANNAH	81	0	2.7	-4.8	NV ELKO	68	-1	0.1	-0.5	UT BLANDING	78	--	0.4	-1.0
HI HILO	79	2	11.7	2.4	NV ELY	68	3	0.6	-0.3	UT CEDAR CITY	75	3	0.7	-0.8
HI HONOLULU	84	3	0.1	-0.3	NV LAS VEGAS	93	4	0.1	-0.4	UT SALT LAKE CITY	81	5	0.6	-0.2
HI KAHULUI	81	2	0.2	-0.3	NV RENO	74	4	0.0	-0.3	VT BURLINGTON	66	-1	4.6	0.5
HI LIHUE	81	2	0.3	-1.4	NV WINNEMUCCA	71	2	T	-0.4	VA LYNCHBURG	73	-1	3.2	-0.4
ID BOISE	76	4	T	-0.4	NH CONCORD	67	-1	2.8	-0.5	VA NORFOLK	78	0	3.6	-1.2
ID LEWISTON	75	2	T	-0.8	NJ ATLANTIC CITY	70	-3	5.5	1.4	VA RICHMOND	75	-2	2.6	-1.8
ID POCATELLO	72	3	0.8	0.1	NM ALBUQUERQUE	79	4	2.7	1.1	VA ROANOKE	74	-1	4.2	0.1
IL CAIRO	--	--	--	--	NM CLOVIS	78	3	0.6	-2.5	VA COLVILLE	72	--	0.2	-1.0
IL CHICAGO	69	-3	4.0	-0.2	NM ROSWELL	82	4	0.4	-2.2	VA QUILLAYOTE	61	2	1.0	-1.6
IL MOLINE	70	-2	3.4	-0.8	NY ALBANY	67	-3	4.1	0.7	VA SEATTLE-TACOMA	67	2	0.3	-0.8
IL PEORIA	72	-2	2.9	-0.2	NY BINGHAMTON	65	-3	5.9	2.5	VA SPOKANE	69	1	0.1	-0.6
IL QUINCY	73	-1	1.7	-2.0	NY BUFFALO	68	-1	4.1	-0.1	VA WALLA WALLA	76	2	--	--
IL ROCKFORD	68	-3	6.3	2.1	NY NEW YORK	75	0	5.4	1.6	VA YAKIMA	69	1	0.1	-0.3
IL SPRINGFIELD	73	-1	3.2	-0.1	NY ROCHESTER	69	1	4.2	0.8	WV BECKLEY	68	-1	4.7	1.4
IN EVANSVILLE	75	-2	2.6	-0.7	NY SYRACUSE	67	-1	5.1	1.6	WV CHARLESTON	72	-2	6.2	2.2
IN FORT WAYNE	68	-3	2.0	-1.4	NC ASHEVILLE	71	-1	6.0	0.0	WV ELKINS	68	0	5.7	1.5
IN INDIANAPOLIS	72	-2	2.6	-1.0	NC CHARLOTTE	77	-1	5.8	2.0	WV HUNTINGTON	72	0	5.5	1.4
IN SOUTH BEND	68	-3	4.3	0.6	NC GREENSBORO	74	-2	5.8	2.0	WV PARKERSBURG	70	-3	4.7	0.7
IA DES MOINES	71	-1	2.8	-1.0	NC HATTERAS	79	0	9.6	3.6	WI GREEN BAY	66	-1	1.6	-1.9
IA DUBUQUE	66	-4	6.7	2.0	NC NEW BERN	78	-1	4.9	-1.6	WI LACROSSE	67	-3	4.9	1.0
IA SIOUX CITY	70	-3	3.3	0.4	NC RALEIGH	76	-1	4.2	0.2	WI MADISON	67	-3	4.6	0.8
IA WATERLOO	68	-3	7.5	3.8	ND WILMINGTON	79	0	6.0	-1.1	WI MILWAUKEE	70	1	4.7	1.2
KS CONCORDIA	75	-2	0.7	-2.8	ND BISMARCK	68	-1	0.3	-1.4	WI WAUSAU	65	-2	1.0	-3.4
KS DODGE CITY	78	0	3.5	0.7	ND FARGO	67	-2	2.9	0.4	WI CASPER	73	5	0.8	0.2
KS GOODLAND	74	1	1.5	-0.3	ND GRAND FORKS	67	0	2.2	-0.3	WI CHEYENNE	70	4	1.5	-0.2
KS TOPEKA	76	0	7.7	3.8	ND WILLISTON	68	-1	1.8	0.5	WI LANDER	72	3	0.4	-0.1
KS WICHITA	79	1	2.3	-1.3	OH AKRON-CANTON	69	-2	7.6	4.2	WI SHERIDAN	72	4	0.2	-0.6
KY BOWLING GREEN	75	-1	5.0	1.4	OH CINCINNATI	72	-2	5.1	1.8	PR SAN JUAN	84	1	1.8	-3.5
KY JACKSON	73	-1	6.1	2.2	OH CLEVELAND	69	-1	4.5	1.1					
KY LEXINGTON	74	-1	3.7	-0.2	OH COLUMBUS	71	1	3.3	-0.2					
KY LOUISVILLE	76	0	1.3	-2.2	OH DAYTON	72	-1	2.9	-0.3					
KY PADUCAH	75	-2	1.7	-1.6	OH MANSFIELD	68	-3	5.0	1.8					
					OH TOLEDO	67	-3	3.0	-0.2					

Based on 1961-90 normals.



Conditions in El Paso, TX epitomized the West's exceptional heat wave, which followed a sub-par 1993-94 wet season. El Paso hit 100°F or higher on 62 occasions, 23 of which occurred consecutively, and set monthly average temperature records in all 3 summer months. Records for prolonged heat were also eclipsed in locations such as Denver, CO (55 days at or above 90°F) and Boise, ID (44 consecutive days at or above 90°F). Salt Lake City, UT tallied a record-tying 21 days with highs of 100°F or higher. In late June, State records were demolished in Arizona (128°F), Nevada (125°F), and New Mexico (119°F). An all-time record was tied in Oklahoma (120°F). The reading of 128°F, also observed in Death Valley, CA, broke the Nation's June record. In contrast, below-normal temperatures prevailed from the Midwest into the Southeast. Heat stress on Corn Belt crops was largely non-existent after a mid-June heat wave that pushed temperatures into the middle to upper 90's.

Summer Weather Review

HIGHLIGHTS: Summer 1994 featured a remarkably consistent weather pattern that included a monstrous ridge over the West, and a significant trough across the east-central portion of the Nation. Slight deviations from the mean pattern occurred in mid-June, when heat made an appearance into the Midwest, and during August, when both the ridge and the trough shifted subtly eastward.

The western ridge suppressed the Southwest's monsoonal rains and permitted few, but lightning-laced, thunderstorms across the Northwest. Through August, western wildfires claimed 3.1 million acres (nearly 5,000 square miles) of forest and range land, 43 percent above the 1989-93 normal. Farther east, the Corn Belt and Southeast recuperated from the flood/drought combination that cut crop yields in 1993. Despite pockets of dryness in the Corn Belt, crops benefited from the absence of excessive heat during reproduction. Crop recovery in the Southeast occurred despite a spate of wet weather that included flooding wrought by the remnants of Tropical Storm Alberto in early July.

JUNE: The Nation's hottest June airmass on record gripped the Southwest late in the month (State records are listed in the caption above). Before finding a home over the Southwest, the ridge crept briefly into the Midwest and the East around mid-month. Across the Corn Belt, the summer's hottest weather fortuitously preceded crop reproduction by a few weeks. Before month's end, favorably cooler, wetter conditions arrived in the Midwest. Heavy rain across the Southeast erased the lingering effects of last summer's drought.

JULY: Tropical Storm Alberto caused record flooding in central and southwestern Georgia. The largest affected populations were in Macon, along the Ocmulgee River, and Albany, bisected by the Flint River. In those cities, river crests obliterated records from March 1990 and January 1925, respectively. Alberto was quickly downgraded after its landfall near Destin, FL on July 3, but continued to dump heavy rain for 5 days. Americus, GA netted a 24-hour total of 21.10 inches on July 5-6, producing the flash flooding responsible for many of the storm's 30 deaths.

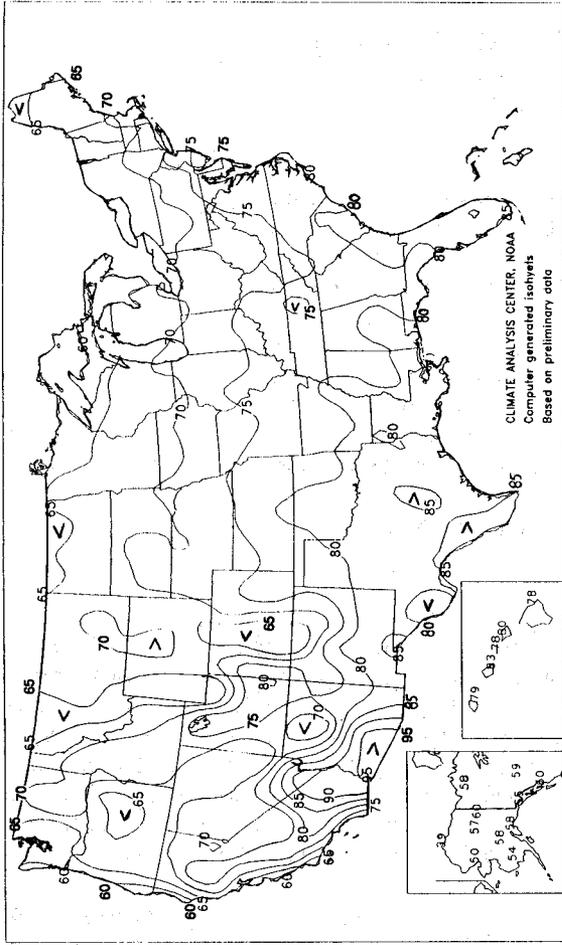
Meanwhile in the West, heat shifted northward, taking the risk of conflagrations with it. On July 6, a fickle fire near Glenwood Springs, CO took the lives of 14 firefighters. After mid-month, heat intensified in the Northwest, with highs topping 110°F as far north as eastern Washington. Relief across the Southwest was modest, but El Paso, TX saw an end to a 50-day string of above-normal temperatures on July 17. In contrast, a late-month cool wave dropped temperatures into the 40's throughout the Dakotas and Nebraska.

AUGUST: An eastward shift in weather features cooled the Northwest and prematurely ended summer along the east coast. Cool weather persisted in the Midwest for the second month in a row, but the hot summer wore on in the Southwest.

On August 15, Tropical Storm Beryl moved inland only 50 miles east of Alberto's landfall position. However, Beryl accelerated through the East, spreading its heavy rainfall across a large area.

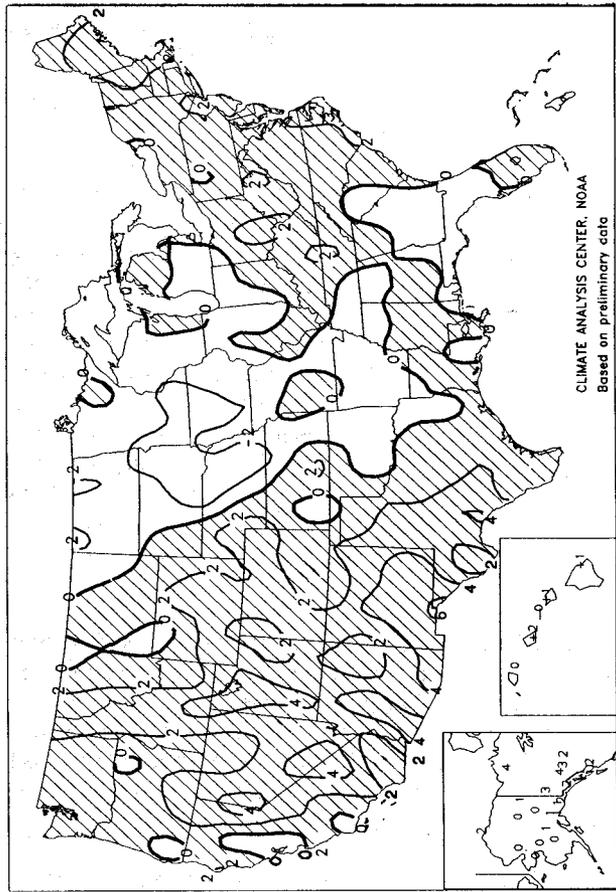
SUMMER Average Temperature(°F)

JUN-AUG 1994



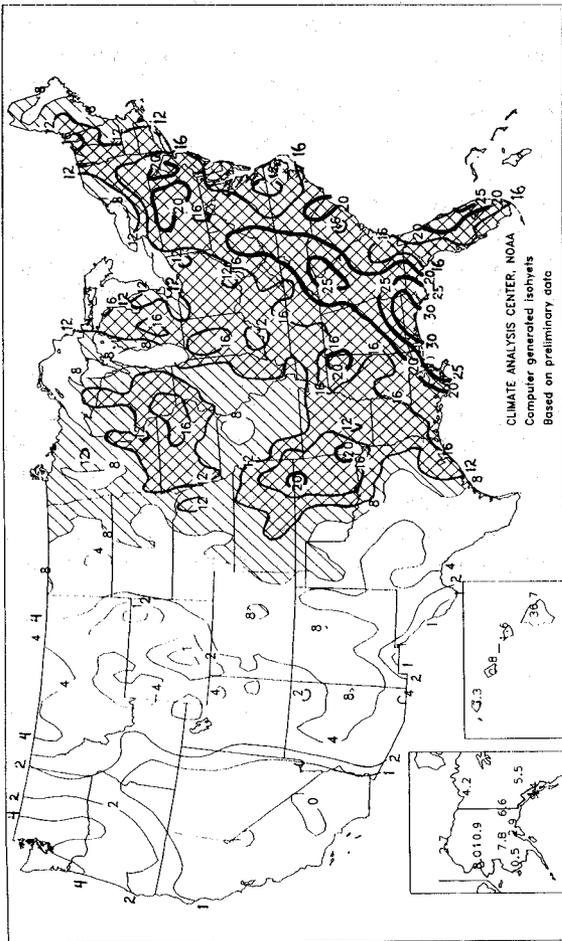
SUMMER Departure from Normal Average Temperature(°F)

JUN-AUG 1994



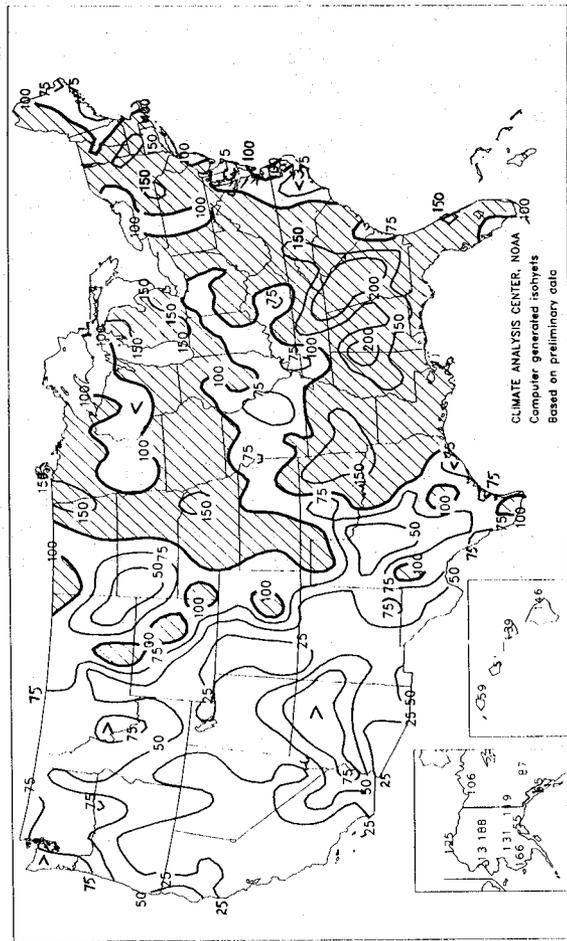
SUMMER TOTAL PRECIPITATION (inches)

JUN-AUG 1994



SUMMER PERCENT OF NORMAL PRECIPITATION

JUN-AUG 1994



National Agricultural Summary

August 29 - September 4, 1994

HIGHLIGHTS: Beneficial rains late in the week provided relief for row crops in the Corn Belt and the central Great Plains from dry soil conditions. The rain improved the corn and soybean conditions for the Nation, especially in Illinois and Missouri. Thunderstorms caused flash floods in some South Central States late in the week. Cool weather across the Northern States did not prolong crop development, since corn maturing started the year on schedule. The cool, fall-like weather in the Northern States reminded producers that potential frost damage to corn is less of a threat as corn matures. Short soil moisture supplies caused producers to delay small grain field preparation in the Western States, where the hot, dry weather continued. The small grain harvest in the southern Great Plains made good progress despite scattered rains.

SMALL GRAINS: Spring wheat harvested was 75 percent (%) complete, up 12 percentage points from last week and 2 points ahead of the 5-year average. The wheat harvested in Minnesota advanced 11 points from last week, but was 8 points behind the average. North Dakota's wheat harvest advanced 14 points from last week despite rain delays, but was 7 points behind the average.

FIELD CROPS: Corn condition was mostly good, down from last week with 80% of the corn rated as good to excellent. Corn condition improved in Missouri from last week, with 39% of the corn rated as good this week compared to 34% last week. Corn condition in Illinois improved from last week, with 72% of the corn rated as good to excellent this week compared to 65% last week. Corn in the dough stage for the 17 major producing States was 96%, up 6 points from last week and 11 points ahead of the average. Minnesota increased corn doughing by 10 points from last week, while Iowa was 23 points ahead of the average. Corn was 73% dented, up 19 points from last week and 18 points ahead of the average. Iowa corn dented was up 26 points from last week, 34 points ahead of the average. Nebraska and Illinois were both up 18 points from last week. Corn maturing started the year at 17%, up 9 points from last year and equal to the average.

Cotton condition was up slightly from last week for the 14 major producing States, with 54% of the cotton crop rated as good to excellent compared with 52% for last week. The cotton condition for Oklahoma improved from last week, but Texas cotton in the poor category increased to 20%, compared with 12% for last week. Bolls opening were 36% complete, up 10

points from last week and 4 points ahead of the average. Mississippi reported bolls opening was 63%, up 18 points from last week and 17 points ahead of the average. Southeastern producers were spraying late fields for insects and started defoliation on the early fields. Delays to the cotton harvest occurred in central and southern Texas from the midweek rain, but the precipitation did not help dry-land cotton in the Texas plains since some fields were past the point of recovery.

Sorghum condition in the 12 States was unchanged from last week, with 57% reported as good to excellent. Soil moisture shortages lowered the condition in Texas and New Mexico. Sorghum turning color at 77% was up 14 points from last week and 21 points ahead of the average. Sorghum maturing started the season 2 points ahead of the average. Scattered showers in the central and southern Great Plains provided some relief to sorghum fields and improved the outlook for the crop.

Rice condition was mostly good, up slightly from last week. Rice harvested was 26% complete, up 7 points from last week and 1 point ahead of the average for the five major producing States. Arkansas reported rice harvested at 12% for the week, up 6 points from last week and 4 points ahead of the average.

Soybean condition was up from last week, with 72% of the soybean crop rated as good to excellent compared with 66% last week. Soybean condition was rated good to excellent in Missouri at 37%, compared to 17% last week. Soybeans dropping leaves was 9%, up 6 points from last week and 1 point ahead of the average. Illinois soybeans dropping leaves was 3 points behind the average, while Iowa was 3 points ahead of the average.

Crop Condition

for the Week Ending September 4, 1994

SORGHUM

State	VP	P	F	G	EX
AR	0	0	16	69	15
CO	0	1	17	62	20
IL	0	9	38	51	2
KS	0	1	27	70	2
LA	0	1	46	53	0
MS	0	2	6	82	10
MO	1	7	49	41	2
NE	0	3	12	76	9
NM	0	60	20	20	0
OK	0	0	63	37	0
SD	0	3	15	74	8
TX	1	13	54	32	0
12 State	0	7	36	54	3
Prev Week	0	7	36	53	4
Prev Year	0	6	33	52	9

CORN

State	VP	P	F	G	EX
CO	0	5	16	57	22
GA	2	2	12	71	13
IL	0	2	26	56	16
IN	1	3	29	58	9
IA	0	1	7	65	27
KS	0	1	23	70	6
KY	0	1	26	54	19
MI	3	7	20	45	25
MN	1	1	15	64	19
MO	2	8	51	38	1
NE	0	2	13	68	17
NC	0	6	36	53	5
OH	1	6	22	55	16
PA	0	2	10	47	41
SD	0	1	9	68	22
TX	0	0	23	72	5
WI	0	0	2	56	42
17 State	0	2	18	61	19
Prev Week	1	2	20	58	19
Prev Year	3	12	34	44	7

COTTON

State	VP	P	F	G	EX
AL	0	6	29	65	0
AZ	0	0	10	80	10
AR	0	0	13	87	0
CA	0	0	0	80	20
GA	0	2	15	78	5
LA	0	0	33	55	12
MS	0	6	40	54	0
MO	0	0	56	44	0
NM	0	0	41	42	17
NC	0	0	3	89	8
OK	0	14	70	16	0
SC	0	0	24	76	0
TN	0	0	6	93	1
TX	0	20	53	24	3
14 State	0	10	36	49	5
Prev Week	0	6	42	47	5
Prev Year	2	6	42	47	3

RICE

State	VP	P	F	G	EX
AR	0	0	5	93	2
CA	0	0	0	85	15
LA	0	0	42	58	0
MS	0	0	0	69	31
TX	0	0	0	67	33
5 State	0	0	10	80	10
Prev Week	0	0	12	82	6
Prev Year	0	1	29	69	1

SOYBEANS

State	VP	P	F	G	EX
AL	0	0	19	74	7
AR	0	0	30	70	0
GA	0	0	11	78	11
IL	0	3	35	56	6
IN	1	2	30	63	4
IA	0	0	10	67	23
KS	0	2	41	51	6
KY	0	6	33	51	10
LA	0	7	25	64	4
MI	2	8	25	45	20
MN	1	3	20	67	9
MS	0	2	13	69	16
MO	2	10	51	35	2
NE	2	1	18	73	6
NC	0	0	17	76	7
OH	0	5	22	56	17
SC	0	0	16	84	0
SD	0	0	6	74	20
TN	0	4	9	79	8
19 State	0	3	25	62	10
Prev Week	1	3	30	55	11
Prev Year	3	11	40	40	6

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

Crop Progress

for the Week Ending Sept. 4, 1994

SPRING WHEAT HARVESTED

	Current	Last Wk	1993	Avg.
ID	92	84	20	66
MN	66	55	46	74
MT	86	71	5	51
ND	67	53	36	74
SD	100	98	90	95
5 States	75	63	39	73

These 5 States produced 97% of the 1993 spring wheat crop.

GRAIN SORGHUM COLORING

	Current	Last Wk	1993	Avg.
AR	94	88	83	79
CO	39	25	20	27
IL	63	56	39	50
KS	75	50	45	35
LA	98	95	93	92
MS	99	95	93	89
MO	82	72	54	62
NE	81	68	26	48
NM	41	19	19	25
OK	56	45	50	60
SD	62	35	10	39
TX	82	78	84	78
12 States	77	63	56	56

These 12 States produced 98% of the 1993 grain sorghum crop.

GRAIN SORGHUM MATURE

	Current	Last Wk	1993	Avg.
AR	67	NA	61	58
CO	1	NA	8	9
IL	5	NA	1	10
KS	10	NA	2	5
LA	78	NA	67	77
MS	83	NA	69	65
MO	29	NA	20	25
NE	5	NA	0	7
NM	6	NA	3	2
OK	8	NA	13	6
SD	15	NA	8	11
TX	69	NA	70	71
12 States	33	NA	29	31

These 12 States produced 98% of the 1993 grain sorghum crop.

RICE HARVESTED

	Current	Last Wk	1993	Avg.
AR	12	6	5	8
CA	0	0	0	0
LA	53	44	60	67
MS	23	9	5	11
TX	73	65	41	68
5 States	26	19	19	25

These 5 States produced 96% of the 1993 rice crop.

COTTON BOLLS OPENING

	Current	Last Wk	1993	Avg.
AL	18	9	40	29
AZ	86	74	90	84
AR	22	9	21	16
CA	50	30	45	49
GA	22	11	41	31
LA	65	53	47	57
MS	63	45	47	46
MO	20	12	27	20
NM	56	24	27	30
NC	30	17	41	32
OK	18	6	12	7
SC	17	7	39	33
TN	26	9	44	27
TX	29	24	34	25
14 States	36	26	38	32

These 14 States produced 99% of the 1993 cotton crop.

SOYBEANS DROPPING LEAVES

	Current	Last Wk	1993	Avg.
AL	5	1	4	6
AR	7	6	0	3
GA	8	7	23	9
IL	7	2	2	10
IN	4	1	3	8
IA	7	1	0	4
KS	20	10	5	15
KY	10	8	6	8
LA	9	6	7	7
MI	10	0	1	4
MN	7	1	1	10
MS	17	8	2	8
MO	6	1	0	3
NE	11	3	0	8
NC	0	0	0	0
OH	11	0	11	16
SC	0	0	0	0
SD	32	17	5	23
TN	7	3	6	5
19 States	9	3	3	8

These 19 States produced 95% of the 1993 soybean crop.

CORN DOUGHING

	Current	Last Wk	1993	Avg.
CO	91	81	75	71
GA	100	100	100	100
IL	97	92	90	92
IN	99	95	96	92
IA	100	93	49	77
KS	100	99	95	97
KY	99	97	99	99
MI	65	45	60	60
MN	98	88	32	78
MO	100	98	90	96
NE	100	99	83	95
NC	100	98	100	100
OH	98	94	99	91
PA	90	64	76	67
SD	96	86	62	81
TX	100	98	96	98
WI	73	65	55	64
17 States	96	90	73	85

These 17 States produced 91% of the 1993 corn crop.

CORN DENTING

	Current	Last Wk	1993	Avg.
CO	69	42	26	35
GA	100	100	100	100
IL	74	56	53	65
IN	60	44	59	62
IA	84	58	18	50
KS	96	85	65	70
KY	86	82	84	80
MI	25	15	15	20
MN	66	37	7	40
MO	95	91	69	80
NE	91	73	37	62
NC	88	84	90	89
OH	61	37	61	51
PA	38	12	28	25
SD	64	38	20	47
TX	94	85	94	94
WI	39	20	17	27
17 States	73	54	39	55

These 17 States produced 91% of the 1993 corn crop.

CORN MATURE

	Current	Last Wk	1993	Avg.
CO	10	NA	0	6
GA	99	NA	100	98
IL	12	NA	5	20
IN	4	NA	6	13
IA	23	NA	0	14
KS	45	NA	30	40
KY	35	NA	33	30
MI	0	NA	0	2
MN	5	NA	3	5
MO	37	NA	0	28
NE	14	NA	0	10
NC	81	NA	77	76
OH	5	NA	7	5
PA	4	NA	1	3
SD	11	NA	1	15
TX	65	NA	66	69
WI	6	NA	2	6
17 States	17	NA	8	17

These 17 States produced 91% of the 1993 corn crop.

(Continued from front cover)

KS and 1.85 inches in Dayton, OH. A day later, heavy rain lingered across northern Missouri, while showers broke out across the northern Plains and upper Midwest. Columbia, MO reported 1.87 inches of rain en route to a 3-day total of nearly 4 inches. By midweek, the fronts consolidated and drove southward, ending the recent warm spell across the Central States. On August 31, highs struggled to only 54°F in Scottsbluff, NE and 63°F in Goodland, KS. Farther north, Williston, ND set a daily record low with 34°F. Cool weather spread southward and eastward by Thursday, with highs reaching 66°F in Indianapolis, IN and 69°F in Oklahoma City, OK. Farther south and west, however, hot weather persisted, with locally heavy rain near the decelerating cold front. Weekly temperatures averaged 6°F above normal in Salt Lake City, UT, and 5°F above normal in El Paso, TX. On Wednesday and Thursday, more than 4 inches of rain fell in 24 hours at Fort Worth, TX, while more than 2 inches pelted Hot Springs, AR and Abilene, TX.

Heavy rain also affected parts of Hawaii, associated with a trough of low pressure northwest of the islands. Hilo, HI collected nearly 5 inches of rain. Farther south, Tropical Storm (formerly Hurricane) Kristy passed about 300 miles south of the Big Island on Friday. Kristy became the eighth tropical system to prowl the anomalously warm central Pacific this

summer. July's storms were T.S. Daniel, Hurricane Emilia, T.S. Fabio, and Hurricane Gilma. August followed with Hurricane Li, T.D. 01-C, and Hurricane John.

Late in the week, Canadian high pressure slid eastward into southern Ontario, while a developing low-pressure system crossed the Southeast. Near the center of the high, lows included 30°F in Park Falls, WI on Friday, and 38°F in Binghamton, NY on Saturday. Between weather systems, strong northeasterly winds developed. By Saturday night, a gale warning was posted for the North Carolina coast. In addition, heavy rain developed over the coastal Southeast, where more than 3 inches of rain lashed Savannah, GA on Friday. Farther west, monsoonal rainfall intensified across the Southwest, while a cold front brought beneficial showers to agricultural areas of the Northwest. Heavy rain (1.49 inches) near Glenwood Springs, CO on Thursday induced a mudslide that crossed Interstate 70, trapping 30 vehicles. Phoenix, AZ recorded 1.36 inches of rain on September 2. A day later, more than 1 inch drenched Tucson, AZ and Douglas, AZ. In the Pacific Northwest, more than a quarter of an inch of rain dampened Spokane, WA. In Burns, OR, however, an 80-day spell of dry weather remained intact. By late Saturday, thunderstorms erupted across the North Central States, where rainfall topped 1 inch in locations such as Spencer, IA and Broken Bow, NE.

State Summaries of Weather and Agriculture

These summaries provide brief descriptions of crop and weather conditions important on a national scale. More detailed data are available in Weather and Crop Bulletins published each Monday by NASS State Statistical Offices in cooperation with the National Weather Service.

ALABAMA: Rainfall 0.03 to 3.10 in. north; none to 2.20 in. central; none to 1.44 in. south. Temperatures 2° below normal to 1° above normal statewide. Lows 54 to 63° north, central; 54 to 64° south. Highs 89 to 95° north; 90 to 97° central; 91 to 96° south.

Days suitable for fieldwork 6.1. Soil moisture 45% short, 55% adequate. Corn mature 90%, 87% 1993, 91% avg.; harvested 41%, 35% 1993, 45% avg.; 19% fair, 63% good, 18% excellent. Sorghum harvested 11%, 11% 1993, 24% avg.; 7% poor, 39% fair, 48% good, 6% excellent. Peanuts dug 17%, 7% 1993, 12% avg.; combined 9%, 5% 1993, 6% avg.; 24% poor, 62% fair, 14% good. Pasture feed 24% fair, 68% good, 8% excellent. Livestock 4% fair, 93% good, 3% excellent. Seasonal activities: Planting, harvesting vegetables, spraying fields for insects, weeds, ground preparation for fall planting.

ALASKA: Most of the State enjoyed seasonal temperatures, partly sunny skies throughout week.

Days suitable for hay harvest 5, 4 days for grain harvest, 7 days for potato harvest. Second crop hay harvest was 15% complete versus 25% complete in 1993. Barley harvest was nearly complete compared to 65% complete 1993. Oats 85% harvested. Commercial potato harvest was 15% complete, compared to 25% complete last year. Topsoil moisture 60% short, 40% adequate. Subsoil moisture 75% short, 25% adequate.

ARIZONA: Temperatures normal to 5° above normal. Extremes 46°; 95° higher elevations; 63°; 112° deserts. Precipitation all stations except Buckeye, Parker, Yuma; trace to 3.52 in.

Cotton farmers looking ahead to harvest. Condition remains mostly good; opening bolls 86%, 90% 1993, 84% avg. Weed infestations light to moderate; insect, disease infestations reported moderate. Field activities: Harvesting, defoliation, final irrigations, pesticide applications, pest monitoring. Alfalfa condition good. Harvest remained moderate to active. Weed, insect, disease infestations light to moderate. Vegetables harvested from central areas included cantaloupe, chili pepper. Raisin grapes harvested central, western vineyards. Crops available eastern areas were apples, watermelon, chili peppers. Range, pasture conditions improved from previous month. Conditions were rated at 68% of normal, 10 points higher than last month. Cattle, calves remained mostly fair condition. Stock water supplies improved; rated short to adequate. Feed supplies below average to average. Light insect damage reported in northern areas.

ARKANSAS: Temperatures were slightly below normal with scattered showers, thunderstorms, heaviest rainfall in north central region. Extremes 53°; 96°. Precipitation none to 2.63 in.

Days suitable for fieldwork 6. Soil moisture 43% short, 54% adequate, 3% surplus. Crop development ahead of schedule. Producers irrigating cotton, soybeans. Rice, grain sorghum, corn harvest in progress with good yields reported. Watermelons good condition with harvest ongoing. Corn 3% fair, 84% good, 13% excellent. Alfalfa 8% poor, 52% fair, 40% good. Other hay 10% poor, 34% fair, 52% good, 4% excellent. Pasture feed 2% very poor, 7% poor, 31% fair, 54% good, 6% excellent. Livestock good condition.

CALIFORNIA: Weak upper level trough brought normal to slightly cooler than normal temperatures. Light precipitation amounts at some southeast desert locations.

Open weather permitted good progress field activities. Rice matured rapidly; many fields drained, preparation harvest. Limited harvest early seeded fields. Cotton grew well. Fields treated mites, whitefly; defoliation began San Joaquin Valley. Few early desert area fields harvested. Grain corn, silage corn, dry beans, safflower, seed alfalfa, sugarbeets, sunflowers harvested. Corn, dry beans sprayed mites. Alfalfa cut hay, treated insects. Ground preparation fall-planted small grains ongoing. Raisin harvest gained momentum Fresno County. Wine grape harvest increased. Table grapes continued harvested. Casselman, Angeleno major plum varieties harvested. Prune harvest full swing Sacramento Valley. Nectarines continued harvested packed. Queen peaches harvested packed Fresno County. Harvest almonds, apples, figs continued. Late pear harvest continued Lake, Yuba Counties. Valencia oranges harvested Fresno, Tulare counties. Grapefruit, lemon harvest continued Riverside County. Fall broccoli, cauliflower planted, treated for insects central coast, Blythe area. Cabbage treated for worms Fresno County. Harvest carrots Kern county continued. Celery, sweet corn harvested San Joaquin Valley. Garlic harvest finished San Benito County. Head lettuce harvest slowed central coast, planting occurred San Joaquin Valley. Leaf, Romaine lettuce harvest continued. Melon harvest central valley slowed. Fall melons Riverside County incurred whitefly damage. Onion, Pepper harvest full swing central coast. Peppers continued harvested central valley. Small acreage Fall potatoes

Tulelake-Butte Valley harvested. Early Sweet Potatoes harvested Merced County. Processing, fresh market tomato harvest slowed. Pumpkins growing well Tulare County. Herbs, spices harvested Stanislaus County. Other crops harvested included: squash, cucumbers, green beans, green onions, okra, and eggplant. Pasture, range conditions dry lower elevations, supplemental feeding most ranches. Feed, water supplies below normal. Irrigated pastures good condition. Mountain areas dry. Livestock moved out higher elevations, declining feed and water supplies. Cattle, sheep good condition.

COLORADO: Rainfall over portions of the State with a cold front bringing moist breezes, cooler temperatures. Snow fell in elevations above 11,000 feet on the 31st thru the 2nd. Below normal temperatures were noted statewide; above normal temperatures returned on the weekend.

Days suitable for fieldwork 5.2. Soil moisture 18% very short, 25% short, 48% adequate, 9% surplus. Alfalfa third cutting 39% complete, 34% 1993, 32% avg.; 1% very poor, 7% poor, 32% fair, 52% good, 8% excellent. Spring barley 89% harvested, 86% 1993, 80% avg. Dry beans 58% cut, 27% 1993, 18% avg.; 34% harvested, 13% 1993, 8% avg.; 3% poor, 21% fair, 72% good, 4% excellent. Oats 83% harvested, 82% 1993, 74% avg. Dry onions 51% harvested, 35% 1993, 39% avg. Sugarbeets 4% poor, 24% fair, 66% good, 6% excellent. Spring wheat 86% harvested, 22% 1993, 45% avg. Summer potatoes 56% harvested, 57% 1993, 54% avg. Fall potatoes 5% harvested, 7% 1993, 3% avg.; 5% very poor, 14% poor, 24% fair, 53% good, 4% excellent. Corn silage 13% harvested, 5% 1993, 7% avg. Corn progress well ahead of normal. Winter wheat 5% seeded, 8% 1993, 11% avg. Vegetable harvests are underway. Rain over parts of the State slowed some harvest activities. Livestock fair to good. Pasture, range feed conditions are very poor over most of the State, except the southeast plains.

FLORIDA: Temperatures within 2° of normal. Highs; mid 90s. Lows; upper 50s northwest, to mostly upper 60s Peninsula. Rainfall varied under 0.50 in. to locally 4.00 in.

Soil moisture adequate to surplus, Panhandle. Peninsula adequate moisture. Tobacco harvesting virtually complete. Tobacco marketing active. Corn, peanut harvest active. Sugarcane good progress. Haying active weather permitting. Army worm problem in some areas. Groves near excellent condition. Moisture adequate, rains decreasing. Abundant new growth. Fruit testing continues. First grapefruit of season picked, packed last week of August, more picking underway. Caretakers cutting cover crops, spraying, fertilizing. Drier weather most vegetable areas, plantings proceeding on schedule. Sweet corn, bean, squash, watermelon condition mostly good, north. Tomato plant growth near Quincy at second tie with picking to begin late September. Cucumbers, squash, watermelons, eggplant, peppers, tomatoes in fair condition, most watermelons planted; cucumber, squash, pepper, tomato planting steady; squash picking continued, west central. Plastic laid for strawberries; transplanting to begin last week of September, Plant City. Eggplant, peppers, squash, tomatoes in good condition; planting mostly light, southwest. Sweet corn, celery planting underway, Everglades. Bean planting to gain momentum next week, fields prepared for U-Pic strawberry transplanting, Dade. Planting cucumbers, eggplant, peppers; eggplant condition very good; peppers, mostly good, East Coast. Planting of sweet corn, carrots, cabbage, specialty lettuce continued, Zellwood. Pasture feed 10% fair, 75% good, 15% excellent. Cattle herds good to excellent condition.

GEORGIA: Temperatures 1 to 3° below normal, except 1 to 2° above northwest. Warmest highs low to mid 90s, except upper 80s mountains. Coolest lows mid to upper 50s north, center, upper 50s to mid 60s south. Rained 1 to 3 days. Rain 0.25 to locally over 2.00 in. north, center. Many locations south less than 0.50 in., some isolated spots between 1.00 to 3.50 in. Greatest amount of rain 4.77 in. Homerville, Clinch County.

Days suitable for fieldwork 6.0. Soil moisture 33% short, 65% adequate, 2% surplus. Corn 68% harvested for grain, 61% 1993, 61% avg. Spraying late cotton for insects and defoliating early fields. Sorghum 13% fair, 86% good, 1% excellent; 30% harvested for grain, 13% 1993, 16% avg. Peanuts 19% fair, 80% good, 1% excellent; 14% dug, 4% 1993, 7% avg.; 6% threshed, 1% 1993, 3% avg.; Heavier soils dry, hard some areas causing digging problems. Soybeans 100% blooming, 99% 1993, 98% avg.; 94% setting pods, 84% 1993, 88% avg.; insect pressure increasing some southern areas. Tobacco 100% harvested, 86% 1993, 95% avg. Vegetables 6% poor, 34% fair, 60% good; volume continues short, late planting in progress for fall crop, preparing onion beds. Apples 8% very poor, 9% fair, 83% good; 27% harvested, 35% 1993, 39% avg. Pecans 9% poor, 49% fair, 42% good. Hay 1% poor, 19% fair, 72% good, 8% excellent; harvest active. Pasture 10% fair, 74% good, 16% excellent. Cattle, hogs good. Activities: Irrigating in drier areas, preparing for cotton harvest, harvesting silage, routine care of livestock, poultry.

HAWAII: Tropical storms passing by the State brought high temperatures, humid conditions for much of the week. Rains were heavy at times on nearly all islands. Temperatures high 60s to mid 90s. Rainfall none to 5.40 in.

Most crops made fair to good progress during the week. High temperatures slowed progress some vegetable crops. Spraying heavy to control insects, diseases. Papaya harvesting heavy but declining. Sugar, pineapple harvesting active.

IDAHO: Temperatures 3° above to 2° below normal. Precipitation none to 0.09 in. north, none to 0.07 in. southwest, none south central, none to 0.45 in. east. Extremes 35°; 97°.

Days suitable for fieldwork 7. Potato progress closing middles 3%, turning 36%, vines killed 51%, harvested 10%, 4% 1993, 6% avg. Potato 1% poor, 17% fair, 73% good, 9% excellent. Soil moisture 45% very short, 29% short, 26% adequate. Range, pasture feed 55%. Barley harvested 93%, 29% 1993, 69% avg. Alfalfa hay harvested (3rd cutting) 47%, 20% 1993, 32% avg. Apples harvested 10%, 1% 1993, 4% avg. Corn for silage acreage harvested 5%, 12% 1993, 6% avg. Peaches harvested 88%, 60% 1993, 83% avg. Plums, prunes harvested 50%, 35% 1993, 60% avg. Onions harvested 30%, 25% 1993, 29% avg. Hops harvested 30%, 53% 1993, 35% avg. Dry beans harvested 29%, 2% 1993, 13% avg. Irrigation water supplies 23% very poor, 20% poor, 34% fair, 22% good, 1% excellent. Activities: Harvesting potatoes, killing potato vines, hauling water to livestock, cutting hay, managing grain stubble.

ILLINOIS: It was a cool, sometimes wet week across State. Highs were in the upper 60s to upper 70s. Lows upper 40s to around 60° far south. Rainfall coverage was very extensive with much of the State seeing at least 1.00 in. of rain, few areas getting over 2.00 in. Some farms in northwest, southern areas, however, received just 0.30 to 0.80 in.

Days suitable for fieldwork 5.0. Soil moisture 55% short, 45% adequate. Corn harvested less than 1%, less than 1% 1993, 2% avg. Soybeans turning yellow 34%, 9% 1993, 28% avg.; harvested less than 1%, 0% 1993, 1% avg. Sorghum headed 98%, 93% 1993, 94% avg. Alfalfa hay third cutting 83%, 59% 1993, 70% avg. Pasture feed 77% of normal. Soil moisture supplies continued short in the east, south. Crop conditions improved with good rainfall except in the east, south. Condition of the crop varies from north to south. In the north crops are rated good to excellent while far southern areas crops are rated fair to good. Farm activities included chopping corn silage, harvesting seed corn, preparing storage facilities for harvest, cutting hay, harvesting vegetable, melon crops, mowing weeds.

INDIANA: Unseasonably cool conditions took hold of the Hoosier State during the week. A large dome of high pressure moved through the upper great lakes while a frontal system held near the southern part of the State much of the week. Moisture varied from limited north to near to above normal south. Mean temperatures the upper 50s to upper 60s, 6 to 9° below normal. High temperatures lower 70s to upper 70s. Lows in the mid to upper 40s to near 60° south. Rainfall 0.25 in. or less in the northern areas, 0.75 to over 2.00 in. other areas.

Days suitable for fieldwork 5.9. Cutting corn silage, harvesting tobacco continued. Other activities included cutting hay, machinery maintenance, preparing for fall harvest. Pastures mostly poor condition. Pasture feed are rated 73% of normal, 69% last week. Topsoil rated 35% short, 62% adequate, 3% surplus. Subsoil moisture 43% short, 56% adequate, 1% surplus. Corn Silage Chopped 17%, 17% 1993, 18% avg. Tobacco harvested 37%, 39% 1993, 37% avg. Alfalfa 3rd cutting 82%, 65% 1993, 59% avg.

IOWA: Temperatures 3 to 6° below normal. Extremes 43° (northeast, 1st); 86° (west central, 4th). Precipitation 0.57 in. northeast to as much as 4.26 in. south central; State average 1.85 in. (normal 0.96 in.).

Days suitable for fieldwork 5.4. Topsoil 34% short, 65% adequate, 1% surplus. Subsoil 27% short, 67% adequate, 6% surplus. Percent of soybean acreage with leaves turning color 44%, 4% 1993, 17% avg. Percent of corn acreage mature (safe from frost) 23%, 0% 1993, 14% avg. Percent of corn acreage harvested 2%, 0% 1993, 1% avg. Alfalfa hay 3rd crop harvested 74%, 17% 1993, 61% avg. Clover hay 2nd crop harvested 96%, 68% 1993, 91% avg. Pasture feed 1% very poor, 13% poor, 28% fair, 48% good, 10% excellent. Hay 1% very poor, 7% poor, 28% fair, 53% good, 11% excellent. Reports of the swine disease Porcine Reproductive Respiratory Syndrome (PRRS) are increasing. All other livestock were reported in good condition. Crops received much needed rain especially in the southern section of the State.

KANSAS: Temperatures near normal. Precipitation varied from 0.08 in. central to 1.91 in. southeast.

Days suitable for fieldwork 5.0. Surface soil moisture 57% short to very short, 37% adequate, 6% surplus. Subsurface moisture 50% short to very short, 49% adequate, 1% surplus. The 1994 corn harvest is underway in all areas of the State. Harvest has made good progress in central, south central, southeast districts. Corn harvested 5%, 4% 1993, 4% avg.

Sorghum stands completely headed. Producers harvesting sorghum eastern third of State. Sorghum harvested 2%, 0% 1993, 1% avg. Scattered showers provided some relief from moisture stress improving crop prospects southwest, central, southeast. All but a few fields of soybeans southeast podded. Soybeans podded 97%, 90% 1993, 95% avg. Precipitation relieved moisture stress in much of eastern third of State. Winter wheat seeding is well underway west central, southwest counties. Winter wheat seeded 2%, 2% 1993, 1% avg. Alfalfa 4th cutting just past half-way point. Pasture feed mostly fair to good condition. However, short supplies of stockwater, grass remain a concern in southern, western areas.

KENTUCKY: High temperatures low 90s few locations, low temperatures 50s, upper 40s north, east. Readings 67 to 70°, near normal. Most of week dry, rain fell weekend. Precipitation averaged around 0.50 to 0.75 in., several locations over 2.00 in.

Days suitable for fieldwork 4.9. Soil moisture 13% very short, 34% short, 49% adequate, 4% surplus. Burley tobacco 50% cut, 40% 1993, 51% avg. Housed tobacco curing well. Dark tobacco 65% cut, 55% 1993, 55% avg. Corn, soybeans rated fair to mostly good. Rainfall late in the week has helped to green up some pastures. Hay 3% very poor, 11% poor, 30% fair, 47% good, 9% excellent.

LOUISIANA: Temperatures 1° below to 2° above normal. Extremes 64°; 97°. Rainfall 0.03 in. north central to 1.97 in. southeast.

Days suitable for fieldwork 5.3. Soil moisture supplies 14% short, 70% adequate, 16% surplus. Corn 78% harvested, 68% 1993, 81% avg. Harvesting went smoothly throughout the State. Cotton 1% harvested, 0% 1993, 2% avg. Several fields were defoliated, some early fields were harvested. Hay 60% second cutting, 62% 1993, 61% avg. Made excellent progress with the dry weather. Rice 99% headed, 94% 1993, 97% avg.; 64% ripe, 76% 1993, 80% avg. Made excellent progress. Sorghum 30% harvested, 35% 1993, 52% avg. Soybeans 97% setting pods, 90% 1993, 91% avg.; 21% turning color, 19% 1993, 22% avg.; 1% harvested, 0% 1993, 0% avg. The crop was in good shape, control of the soybean looper was active throughout the southern parishes. Sugarcane 34% fair, 66% good; 45% planted, 38% 1993, 29% avg. Planting made excellent advances with good weather. Sweet potatoes 29% fair, 60% good, 11% excellent; 28% harvested, 24% 1993, 28% avg. Livestock 2% very poor, 22% poor, 52% fair, 19% good, 5% excellent. Pasture feed 1% poor, 5% fair, 83% good, 11% excellent. Vegetables 33% fair, 61% good, 6% excellent.

MARYLAND & DELAWARE: **MARYLAND:** Precipitation 0.24 in., normal 1.01 in. Temperature 72.6°, normal 73.2°. Extremes 44°; 91°.

Days suitable for fieldwork 5.9. Topsoil moisture 21% short, 79% adequate. Subsoil moisture 6% short, 94% adequate. Pasture feed excellent. Corn good; 75% dough, 86% 1993, 87% avg.; 68% dent, 64% 1993, 66% avg.; 13% mature, 17% 1993, 21% avg.; 5% silage harvested, 27% 1993, 26% avg. Soybeans good; 91% setting pods, 79% 1993, 80% avg. Sorghum good to excellent; 100% headed, 97% 1993, 99% avg.; 50% turned, 5% 1993, 45% turned. Tobacco good to excellent; 90% topped, 85% 1993, 83% avg.; 44% harvested, 45% 1993, 51% avg. Sweet corn 90% harvested, 95% 1993, 91% avg. Other hay 89% second cut, 94% 1993, 91% avg.; 56% third cut, 46% 1993, 33% avg. Alfalfa hay 96% third cut, 96% 1993, 90% avg.; 43% fourth cut, 41% 1993, 28% avg. Hay supplies adequate. Peaches 100% harvested, 89% 1993, 87% avg. Apples 31% picked, 24% 1993, 26% avg.

DELAWARE: Precipitation 0.08 in., normal 1.07 in. Temperature 71.2°, normal 73.4°. Extremes 49°; 87°.

Days suitable for fieldwork 6.8. Topsoil 25% short, 63% adequate, 12% surplus. Subsoil moisture 14% short, 72% adequate, 14% surplus. Corn fair to mostly good; 94% dough, 87% 1993, 92% avg.; 80% dent, 73% 1993, 77% avg.; 17% mature, 23% 1993, 23% avg. 5% grain harvested, 1% 1993, 2% avg.; 33% silage harvested, 47% 1993, 34% avg. Soybeans good; 80% setting pods, 72% 1993, 74% avg. Sorghum fair to mostly good; 99% heading, 90% 1993, 95% avg.; 6% turned, 11% 1993, 28% avg. Sweet corn 97% harvested, 96% 1993, 89% avg. Other hay 64% third cut, 47% 1993, 60% avg. Alfalfa hay 100% third cut, 98% 1993, 93% avg.; 29% fourth cut, 10% 1993, 19% avg. Hay supplies adequate; pasture feed good. Peaches 96% harvested, 92% 1993, 95% avg. Apples 39% harvested, 32% 1993, 30% avg.

MICHIGAN: Extremes 37°; 81°. Precipitation none to 2.07 in.

Days suitable for fieldwork 5.5. Soil moisture 10% short, 65% adequate, 25% surplus. Dry beans 95% setting pods, 100% 1993, 95% avg.; 30% shedding, 20% 1993, 30% avg.; 45% turning, 65% 1993, 60% avg.; 10% very poor, 15% poor, 25% fair, 35% good, 15% excellent. Oats 100% ripe, 100% 1993, 99% avg.; 90% harvested, 90% 1993, 90% avg. Potatoes 50% harvested, 50% 1993, 40% avg. Hay 90% second cutting, 95% 1993, 90% avg.; 40% third cutting, 30% 1993, 35% avg.; 5% very poor, 5% poor, 20% fair, 45% good, 25% excellent. Pasture feed 90% of normal. Major activities included: Cutting hay, seeding alfalfa, plowing, preparing machinery for fall harvest, harvesting potatoes, hauling manure.

MINNESOTA: Temperatures 5 to 7° below normal across the State. Extremes 26°; 81°. Precipitation near normal in the northern third of the

State to 1.53 in. above normal in the southwest. Greatest weekly total was 2.71 in.

Days suitable for fieldwork 4.3. Topsoil 1% very short, 5% short, 76% adequate, 18% surplus. Corn 98% dough, 32% 1993, 78% avg.; 66% dent, 7% 1993, 40% avg.; mature 5%, 0% 1993, 5% avg. Soybeans 39% yellowing, 5% 1993, 28% avg.; shedding leaves 7%, 1% 1993, 10% avg. Spring wheat 66% combined, 46% 1993, 74% avg. Barley 90% combined, 73% 1993, 85% avg. Potatoes 10% harvested, 15% 1993, 13% avg. Dry edible beans 14% harvested, 2% 1993, 21% avg. Sweet corn for processing 74% harvested, 41% 1993, 61% avg. Grain/hay stubble 36% worked, 14% 1993, 40% avg. Rye 35% seeded (Fall), 24% 1993, 33% avg. Winter wheat 31% seeded (Fall), 23% 1993, 34% avg. Corn 1% very poor, 1% poor, 15% fair, 64% good, 19% excellent. Soybeans 1% very poor, 3% poor, 20% fair, 67% good, 9% excellent. All sunflowers 1% very poor, 2% poor, 26% fair, 62% good, 9% excellent. Sugarbeets 4% poor, 20% fair, 69% good, 7% excellent. Dry edible beans 3% very poor, 6% poor, 36% fair, 49% good, 6% excellent.

MISSISSIPPI: Temperatures 0.5° above normal. Extremes 56°; 99°. Soil temperature 85°. Precipitation 1.07 in., 0.18 in. above normal. East-central district received the greatest amount of rainfall with nearly 2 in. Crystal Springs received the greatest one day precipitation with 2.37 in.

Days suitable 5.3. Soil moisture 48% short, 38% adequate, 14% surplus. Corn 90% mature, 71% 1993, 78% avg.; 26% harvested, 22% 1993, 35% avg.; 83% silage harvested, 69% 1993, 78% avg.; 9% fair, 62% good, 29% excellent. Cotton 63% open bolls, 47% 1993, 46% avg.; 6% poor, 40% fair, 54% good. Rice 70% mature, 35% 1993, 51% avg.; 23% harvested, 5% 1993, 11% avg.; 69% good, 31% excellent. Sorghum 99% turning color, 93% 1993, 89% avg.; 83% mature, 69% 1993, 65% avg.; 42% harvested, 26% 1993, 29% avg.; 56% silage harvested, 64% 1993, 73% avg.; 2% poor, 6% fair, 82% good, 10% excellent. Soybeans 99% setting pods, 85% 1993, 84% avg.; 35% turning color, 17% 1993, 25% avg.; 17% shedding leaves, 2% 1993, 8% avg.; 2% poor, 13% fair, 69% good, 16% excellent. Hay 90% harvested, 85% 1993, 84% avg. Pecans 15% very poor, 11% poor, 58% fair, 16% good. Sweet potatoes 42% harvested, 22% 1993, 30% avg.; 85% fair, 15% good. Livestock 8% fair, 87% good, 5% excellent. Pasture feed 81% normal. Activities: Corn harvest, completing last cotton insect control applications, preparation for cotton defoliation.

MISSOURI: Temperatures below normal across most of State, 6° below normal in northeast to 1° above normal southwest. Rainfall 2.32 in., varying 1.14 in. southeast to 3.62 in. southwest. Rainfall resulted in improved row crop conditions.

Days suitable for fieldwork 4.6. Topsoil moisture 52% short, 42% adequate, 6% surplus. Subsoil moisture 55% short, 39% adequate, 6% surplus. Corn denting by district ranges from 86% northeast to 100% southeast. Soybeans 5 days ahead of average. Sorghum coloring ranges from 70% in northeast to 97% southeast. Sorghum mature ranges from 9% west-central to 55% southeast. Pasture feed 7% very poor, 26% poor, 50% fair, 17% good. Rainfall helped pasture growth in many areas.

MONTANA: Northern portion of State with slightly below normal temperatures, southern portion of state with slightly above normal temperatures. Light precipitation reported in all divisions.

Days suitable for fieldwork 6.6. Topsoil moisture 90% short, 10% adequate. Subsoil moisture 82% short, 18% adequate. Winter wheat 99% harvested, 44% 1993, 79% avg. Barley 85% harvested, 11% 1993, 52% avg. Oats 88% harvested, 14% 1993, 51% avg. Dry beans 18% harvested. Corn for silage 8% harvested. Second cutting alfalfa 94%, 46% 1993, 69% avg. Winter wheat 2% seeded, 0% 1993, 1% avg. Pasture, range feed 75% of normal. Cattle, calves moved from summer ranges, 16%. Sheep, lambs moved from summer ranges, 12%.

NEBRASKA: Temperatures near normal west to 6° below normal east. Precipitation 0.10 in. west to 2.00 in. east.

Days suitable for fieldwork 5.7. Topsoil moisture 72% short, 22% adequate, 6% surplus. Subsoil moisture 31% short, 68% adequate, 1% surplus. Corn 2% poor, 13% fair, 68% good, 17% excellent; 91% dented, 37% 1993, 62% avg.; 14% mature, 0% 1993, 10% avg. Soybean 2% very poor, 1% poor, 18% fair, 73% good, 6% excellent; 55% turning color, 6% 1993, 26% avg.; 11% dropping leaves, 0% 1993, 8% avg. Sorghum 3% poor, 12% fair, 76% good, 9% excellent; 81% turning color, 26% 1993, 48% avg.; 5% mature, 0% 1993, 7% avg. Dry bean 33% fair, 52% good, 15% excellent; 92% turning color, 75% 1993; 58% dropping leaves, 31% 1993, 15% harvested, 10% 1993. Pasture, range feed 83% of normal.

NEVADA: Dry, mostly clear weather prevailed statewide. No measurable precipitation recorded anywhere in the State. Temperatures near normal. Extremes 27°; 113°.

Winter wheat harvest complete. Spring wheat, barley, oats harvests well along. Alfalfa second cutting 95% complete, third cutting 35% complete--both matching average progress for the date. Aphids continue to require treatment in some alfalfa fields. Other hay harvest 90% complete, equalling 1993 and avg. Alfalfa seed harvest progressing, crop

condition mostly good. Garlic harvest complete. Onion digging in full swing. Irrigation water supplies 65% very short, 35% short. Stockwater supplies short. Deteriorating range condition, lack of stockwater forcing movement of some livestock from summer range. Forest Service closing some public allotments 1 to 2 months earlier than usual. Main farm, ranch activities; haying, grain harvest, moving livestock.

NEW ENGLAND: Precipitation none to 0.72 in. regionwide. Temperatures 54 to 62° north; 58 to 68° south. Temperatures 4° below normal regionwide. Maximum temperatures 75 to 87° north; 76 to 87° south. Minimum temperatures 28 to 45° north; 37 to 51° south.

Days suitable for fieldwork 6. Soil moisture 13% short, 74% adequate, 13% surplus. Available grazing, 10% short, 80% adequate, 10% surplus. Fieldwork 1 day behind schedule. Maine potatoes 15% harvested, 5% 1993 and avg. Rhode Island potatoes 40% harvested, 45% 1993, 40% avg. Connecticut River Valley potatoes 35% harvested. Potato good, however, more moisture needed for tuber sizing. Maine oats 70% harvested, 50% 1993, 50% avg.; good to fair. Field corn 5% harvested, <5% 1993, 5% avg.; good. Shade tobacco condition good, 95% harvested, 98% 1993. Outdoor tobacco condition good, 95% harvested, 97% 1993. Second crop hay 80% harvested, 75% 1993, 80% avg.; good. Third crop hay 45% harvested, 30% 1993, 35% avg.; good. Sweet corn 85% harvested, 75% 1993, 75% avg.; good. Apples 15% harvested, size medium, good, color good. Peaches size medium, 80% harvested, fair. Pears 40% harvested; size medium, good. Wild blueberries size medium, 95% harvested, good. Cranberries size medium/large, condition good to excellent. Major farm activities: Harvesting fruits, vegetables, applying insect, weed control, preparing equipment for harvest, haying between showers.

NEW JERSEY: Temperatures much below normal. Extremes 40°; 84°. Rainfall 0.08 in. north, 0.07 in. central, 0.30 in. south. Heaviest 24 hour total 0.59 in. on 29th, 30th. Estimated soil moisture, in percent field capacity, averaged 81% north, 64% central, 50% south. Four inch soil temperatures averaged 64° north, 66° central, 68° south.

Days suitable for fieldwork 6. Limited rainfall combined with cooler temperatures has allowed for active fieldwork. Major farming activities included: Spraying pesticides, harvesting vegetables, cutting hay. Good supply of green and yellow squash, eggplants, green beans, peppers. Moderate supply of cabbage, cucumbers, endive, escarole, sweet corn. Light volume of herbs, leeks, okra, tomatoes, cantaloupes, parsley. Ginger Gold, Paula Reds, Gala are the primary varieties of apples being harvested. Peach harvest is also active with Cresthaven, Blake, Jersey Queen.

NEW MEXICO: Temperatures about normal in the north, 2 to 3° above normal in the south. Extremes 39° at Chama on the 4th; 100° at Carlsbad on the 30th. Showers, thunderstorms were scattered to occasionally numerous across State, produced rainfall just about over the entire State. Claytons 3.88 in. was the highest total reported. Other high amounts included 1.96 in. at Las Vegas, 1.56 in. at Des Moines, 1.51 in. at Roswell.

Days suitable for fieldwork 6.2. Soil moisture 66% short, 31% adequate, 3% surplus. Cropland conditions: Alfalfa 3% poor, 22% fair, 72% good, 3% excellent. Chile was reported at 14% fair, 86% good. Corn 5% poor, 26% fair, 69% good. Irrigated sorghum was reported as 21% fair, 79% good. Dryland sorghum 80% poor, 20% fair. Cotton 41% fair, 42% good, 17% excellent. Pecan condition 29% fair, 71% good. Apple condition 8% poor, 33% fair 51% good, 8% excellent. Cattle, sheep conditions varied across the State poor to excellent. Range feed is 60% of normal.

NEW YORK: Dry week. Most locations received less than 0.50 in. of rain. Rain fell at middle of week. Temperatures 10° below normal each day except the 3rd which was a little warmer than normal. Extremes 34°; 91°.

Days suitable for fieldwork 4.2. Soil moisture mostly adequate to surplus. Drying conditions helped. Pasture feed 92% of normal. Hay condition fair to mostly good. Second cutting alfalfa 95% finished, 94% 1993, 91% avg. Oats 95% harvested, 83% 1993, 81% avg. Corn in mostly good to excellent condition. Potato digging more widespread. Early grape harvest underway. Bartlett pear harvest near completion. Apple picking gaining momentum. Vegetable harvesting very active. Cool temperatures slowed ripening. Onion harvesting continued, good quality.

NORTH CAROLINA: Mean temperatures from 2° below normal to 3° above normal. Rainfall 4.34 in. at Monroe to no precipitation at several locations.

Days suitable for fieldwork 5.5. Soil 3% short, 78% adequate, 19% surplus. Crop conditions: Pasture feed 1% very poor, 4% poor, 18% fair, 67% good, 10% excellent; tobacco 1% poor, 12% fair, 72% good, 15% excellent; corn 6% poor, 36% fair, 53% good, 5% excellent; cotton 3% fair, 89% good, 8% excellent; peanuts 7% fair, 86% good, 7% excellent; soybeans 17% fair, 76% good, 7% excellent; hay 1% very poor, 5% poor, 24% fair, 66% good, 4% excellent; sweet potatoes 14% fair, 71% good, 15% excellent; apples 1% fair, 82% good, 17% excellent; sorghum 13% fair, 79% good, 8% excellent; truck crops 1% very poor, 1% poor, 20% fair, 78% good; hay, roughage supplies 14% short, 74% adequate, 12% surplus; corn for grain harvested 19%, 18% 1993, 14% avg.; corn for silage

harvested 51%, 57% 1993, 53% avg.; burley tobacco harvested 35%, 14% 1993, 26% avg.; flue-cured tobacco harvested 63%, 55% 1993, 62% avg.; sorghum 21%, 12% 1993, 8% avg.; apples harvested 25%, 16% 1993, 24% avg.; cotton open bolls 30%, 41% 1993, 32% avg.; corn dent 88%, 90% 1993, 89% avg.; mature 81%, 77% 1993, 76% avg.; soybeans bloomed 90%, 91% 1993, 87% avg.; pods set 79%, 78% 1993, 74% avg.; second cutting of hay is 78% complete with the third cutting 42% complete. Activities included: Harvesting, marketing tobacco, applying pesticides, herbicides, fungicides. Other activities included: Harvesting hay, corn; tending livestock; equipment repair.

NORTH DAKOTA: Windy, cool weather throughout week with varying amounts of rain. Precipitation 0.07 in. northeast to 0.66 in. southeast. Temperatures 3 to 5° below normal. Extremes 27° west central, southwest; 89° southwest.

Days suitable for fieldwork 4.7. Topsoil 12% very short, 31% short, 54% adequate, 3% surplus. Subsoil 7% very short, 31% short, 59% adequate, 3% surplus. Small grain harvest made good progress despite some rain delays. Hard red spring wheat 67% combined, 36% 1993, 74% avg.; durum wheat 48% combined, 11% 1993, 61% avg.; barley 91% combined, 63% 1993, 87% avg.; oats 87% combined, 45% 1993, 82% avg. Late season crops ahead of last year and near or ahead of average. Flaxseed 21% cut or combined, 11% 1993, 40% avg.; corn for grain 66% denting to dented and beyond, 6% 1993, 46% avg.; corn for silage 4% cut, 1% 1993, 15% avg.; dry edible beans 24% cut or combined, 2% 1993, 26% avg.; soybeans 26% mature and beyond, 1% 1993, 22% avg.; sunflower 42% bracts turned yellow and beyond, 11% 1993, 38% avg.; potatoes 11% dug, 8% 1993, 7% avg. Condition: Flaxseed 2% poor, 23% fair, 64% good, 11% excellent; corn for grain 1% poor, 16% fair, 60% good, 23% excellent; corn for silage 3% very poor, 6% poor, 23% fair, 57% good, 11% excellent; dry edible beans 1% very poor, 7% poor, 21% fair, 58% good, 13% excellent; soybeans 5% poor, 18% fair, 62% good, 15% excellent; sunflower 2% poor, 12% fair, 65% good, 21% excellent; sugarbeets 3% poor, 5% fair, 76% good, 16% excellent; potatoes 1% poor, 5% fair, 72% good, 22% excellent. Range, pasture feed 79% of normal; hay condition 84% of normal. Second cutting alfalfa 97% complete, other hay 93%. Stockwater supplies 2% very short, 7% short, 89% adequate, 2% surplus.

OHIO: High pressure dominated early, late in the period. Low pressure pulled a cold front across the State midweek bringing widespread rain. Unseasonably cool air behind the front produced fall-like weather for the weekend. Week averaged 4 to 9° cooler than normal. Highs were 70° to mid 70°. Lows mid 40s to mid 50s. Warmest day 31st as temperatures reached the upper 70s, 80s ahead of the cold front. Nighttime temperatures dipped to lows of 40 to 50° under clear skies late in the week. Rainfall coverage was extensive. Amounts varied from less than 0.10 to 0.80 to 0.90 in. Northern area was generally the driest as heaviest rain stayed in the south.

Days suitable for fieldwork 5.0. Crop condition remained good. Maturation proceeded on schedule. Vegetable harvest continued. Soil moisture 9% short, 84% adequate, 7% surplus. Tomato harvest 39% complete. Potato harvest 45% complete. Corn for silage harvest 9% complete. Hay condition 4% poor, 23% fair, 60% good, 13% very good. Alfalfa hay third cutting 80% complete. Other hay third cutting 44% complete. Pasture feed 1% very poor, 5% poor, 27% fair, 57% good, 10% excellent.

OKLAHOMA: Temperatures near 3° below normal in the central to 1° above in the southwest. Precipitation 0.13 in. west central to 2.11 in. east central.

Days suitable for fieldwork 5.2. Topsoil 52% short, 44% adequate, 4% surplus. Subsoil 44% short, 56% adequate. Corn 3% poor, 9% fair, 88% good; 80% mature, 54% 1993, 74% avg.; 33% harvested, 24% 1993, 20% avg. Soybeans 94% setting pods, 67% 1993, 62% avg.; 32% maturing, 19% 1993, 6% avg.; 11% harvested, 2% 1993, none avg. Peanuts 20% fair, 80% good; 97% setting pods, 92% 1993, 92% avg.; 3% mature, 28% 1993, 10% avg. Cotton 14% poor, 70% fair, 16% good; 18% open bolls, 12% 1993, 7% avg. Pasture feed 87% normal. Feeder steers, heifers \$2.00 to \$3.00 per cwt. lower.

OREGON: Temperatures 2° above normal statewide. Precipitation: Coastal area 0.60 in., the Willamette Valley 0.20 in., northern Cascades, plateau areas 0.30 in., northeastern mountains 0.20 in. Elsewhere less than 0.10 in.

Soil moisture 81% short, 19% adequate. Winter wheat harvest essentially completed. Barley 76% harvested. Short soil moisture delayed fall grain field preparation. Hay harvest continued statewide. Alfalfa seed harvest continued, dry bean harvest underway; Malheur County. Columbia Basin of Oregon canola planting underway where soil moisture adequate. Western areas sugarbeet seed harvest continued, sugarbeet seed planting continued, mint harvest winding down, hop harvest full swing. Eastern potato, onion harvest continued. Willamette Valley vegetable harvest continued, late cauliflower planting continued, Bartlett pear, Gravenstein apple harvest completed, Evergreen blackberry

harvest continued; pruning, training caneberrries continued, plum, prune harvest continued, hazelnuts near full development with harvest activities to begin soon. Medford district: Bartlett pear harvest completed, red pear varieties completed, Comice, Anjou picking underway. Hood River Valley: Bartlett pear harvest winding down; winter pear harvest full swing. South coast: Cranberry color normal, berry sizes medium to large. Livestock good. Range, pasture feed 60% of normal. Rangeland, forest land extremely dry some major fires continued burning, eastern areas. Stockwater supplies low, eastern sections. Supplemental feeding continued statewide.

PENNSYLVANIA: Cool, fall-like week. Temperature 68°, same as normal. Extremes 36°; 89°. Precipitation 0.46 in., 0.38 in. below normal.

Days suitable for fieldwork 4. Soil moisture 64% adequate, 36% surplus. Ensilage corn harvested 3% complete, 10% 1993. Corn 2% poor, 10% fair, 47% good, 41% excellent. Soybean 3% poor, 9% fair, 54% good, 34% excellent. Wheat planted 7% complete, 11% 1993. Oat harvest 94% complete, 94% 1993. Barley planted 8% complete, 13% 1993. Tobacco harvest 60% complete, 50% 1993. Potato harvest 32% complete, 31% 1993. Second cutting alfalfa 95% complete, 100% 1993. Third cutting alfalfa 65% complete, 68% 1993. Fourth cutting alfalfa 28% complete, 29% 1993. Second cutting clover-timothy 81% complete, 92% 1993. Quality of hay made 28% poor, 43% fair, 29% good. Feed from pastures good to excellent. Apple harvest 28% complete, 31% 1993. Grapes harvest 18% complete, 24% 1993. Fall plowing 38% complete, 30% 1993. Activities: Making hay; harvesting oats, fruits, vegetables, tobacco, potatoes; plowing; getting ready for corn grain harvest; repairing equipment; fixing fences; hauling manure; caring for livestock.

SOUTH CAROLINA: Rainfall 1.10 in.; temperatures 2° above normal upstate to 4° below normal along coast.

Days suitable for fieldwork 5.9. Soil moisture 31% short, 67% adequate, 2% surplus. Tobacco good; 89% harvested, 58% 1993, 80% avg.; 40% stalks destroyed, 11% 1993, 21% avg. Corn good; 99% mature, 90% 1993, 95% avg.; 54% harvested, 49% 1993, 45% avg. Cotton 24% fair, 76% good; 17% open bolls, 39% 1993, 33% avg. Soybeans 16% fair, 84% good; 99% blooming, 93% 1993, 93% avg.; 79% setting pods, 68% 1993, 70% avg. 2% leaves turning, 3% 1993, 4% avg. Cantaloupes fair to good; 94% harvested, 97% 1993, 96% avg. Watermelons fair to good; 97% harvested, 100% 1993, 99% avg. Peaches fair to good; 99% harvested, 91% 1993, 96% avg. Apples good; 23% harvested, 31% 1993, 42% avg. Sorghum fair to good; 25% harvested, 31% 1993, 28% avg. Fall Hay good; 50% harvested, 47% 1993, 51% avg. Pasture feed 27% fair, 73% good.

SOUTH DAKOTA: Temperatures 1 to 11° below normal. Extremes 32°; 92°. Precipitation 0.20 in., northwest to 1.90 in., east central. Heaviest 2.47 in., northeast.

Days suitable for fieldwork 4.6. Topsoil 16% very short, 37% short, 42% adequate, 5% surplus. Subsoil 15% very short, 31% short, 47% adequate, 7% surplus. Flax 60% harvested, 53% 1993, 70% avg. Sunflower 9% fair, 74% good, 17% excellent; 72% bracts turned yellow, 51% 1993, 46% avg. Livestock 3% fair, 87% good, 10% excellent. Feed supply 8% short, 85% adequate, 7% surplus. Pasture feed 80% of normal. Water supply 6% short, 85% adequate, 9% surplus. Ranchers preconditioned calves, moved cattle to fall pastures, moved hay to winter headquarters.

TENNESSEE: A cold front moved south though the State early in the week, followed by cool air which pushed temperatures between 2 to 5° below normal. Rainfall below normal in the east, west, above normal across the Plateau, Middle areas.

Days suitable for fieldwork 4.6. Soil moisture 1% very short, 8% short, 76% adequate, 15% surplus. Corn 88% dent, 92% 1993, 86% avg.; 37% mature, 42% 1993, 40% avg.; 3% grain harvest, 5% 1993, 5% avg.; 43% silage harvest, 49% 1993, 40% avg.; 1% poor, 2% fair, 73% good, 24% excellent. Cotton 26% open bolls, 44% 1993, 27% avg.; 6% fair, 93% good, 1% excellent. Tobacco 9% fair, 79% good, 12% excellent. Burley 52% harvested, 42% 1993, 53% avg. Dark fire-cured 62% harvest, 50% 1993, 52% avg. Dark air-cured 58% harvest, 46% 1993, 50% avg. Sorghum 83% turning, 91% 1993, 80% avg.; 28% mature, 37% 1993, 28% avg.; 3% grain harvest, 5% 1993, 4% avg.; 11% fair, 88% good, 1% excellent. Soybeans 82% setting pods, 90% 1993, 82% avg.; 7% shedding, 6% 1993, 5% avg.; 4% poor, 9% fair, 79% good, 8% excellent. Other hay, 2% poor, 16% fair, 78% good, 4% excellent. Alfalfa, 1% poor, 12% fair, 80% good, 7% excellent. Cattle, 7% fair, 82% good, 11% excellent. Pasture feed 3% poor, 10% fair, 77% good, 10% excellent.

TEXAS: Stationary front acted as focusing mechanism for heavy thunderstorms in North Central Texas over past week. Three to five inches of rain fell in Dallas-Fort Worth metroplex. Besides North Central Texas, above normal rainfall was reported in every other climate district except for Southern Texas (-0.04 in.), South Central Texas (-0.13 in.). Most districts recorded departures between 0.10 to 0.90 in. Some of larger individual station totals were 5.19 in. at Dallas-Fort Worth national weather service office, 5.19 in. at Lake Livingston. Temperature was near to slightly above normal across much of West Texas last week. Below normal readings were

reported in northern and southern sections of State. Largest departures from normal were -4° in Low Rolling Plains and Lower Rio Grande Valley. Other departures were between -1°, +1°. Mean soil temperature mid 70s to lower 90s. Range of mean soil temperature 75° at Bushland, Longview to 91° at Beaumont, Dell City. Highest daily maximum temperature was 103° at Beaumont, while lowest daily minimum soil temperature was 63° at Bushland.

Crops: Corn harvest for grain was underway in Northern High Plains, some areas were delayed by wet conditions. Most irrigation has stopped. Harvest was almost completed in South Central Texas. Corn 84% normal, 84% 1993; 65% mature, 66% 1993; 59% harvested, 58% 1993. Cotton harvest activities continued throughout Central, South Texas, delays occurred in many areas due to rain. In Rio Grande Valley, some extensions for cotton stalk destruction may be needed due to wet conditions there. Dryland crop in many places in Low Plains did not receive much benefit from rains as most of crop there was past point of recovery. In High Plains, some dryland fields were being treated with harvest aid chemicals. Cotton 62% normal, 76% 1993; 20% harvested, 16% 1993. Rice harvest activities continued where conditions allowed. Some above average yields were being reported along Upper Coast. Rice 97% normal, 82% 1993. Sorghum recent moisture should improve crop in High Plains. Some low yields were being reported in Low Plains, where some fields were being cut for hay or grazed. Sorghum 65% normal, 78% 1993; 97% headed, 97% 1993; 69% mature, 70% 1993; 63% harvested for grain, 64% 1993. Small grains planting of winter wheat continued to be active across Plains, where conditions allowed. Cooler, wet conditions should aid emergence of early planted fields. Land preparation, fertilization was active where soil conditions permitted. Wheat 11% planted, 12% 1993; 3% oats planted, 3% 1993. Peanuts recent moisture should help dryland crop in Cross Timbers, more rain is needed. Irrigated crop continued to make good progress. Some dryland fields in South Texas were lost due to lack of moisture. Peanut 79% normal, 70% 1993; 2% harvested, 2% 1993. Soybeans some producers were applying weed, insect controls in High Plains. Yields appear to be fair to above average in Blacklands. Rains could help some late planted fields. Soybeans 19% harvested, 14% 1993.

Commercial Vegetables: Rio Grande Valley seeded peppers, celery transplants continued to make good progress. San Antonio-Winter Garden: land preparation for fall vegetables continued. Trans-Pecos: cantaloupe harvest was virtually complete. Clean-up operations were underway. Chili harvest continued. East Texas: harvest was active where conditions allowed. Rains helped fall vegetable crop get off to a good start. High Plains: carrot, cucumber and pepper harvest was delayed in some areas due to wet field conditions. Peaches: Harvest was rapidly coming to an end in many areas. Producers continued to apply controls for peach tree borers. Pecans: Trees continued to shed nuts in many areas of State due to earlier hot, dry conditions. In Trans-Pecos, early varieties were in shell hardening stage. Irrigation continued to be active in some areas of South Central Texas.

Range and Livestock: Livestock remained in fair to good condition across most of State. Hay harvest continued to be active in East Texas. Hay supply is short in many areas of the State. Supplemental feeding continued. In Plains, some producers were reducing herd numbers.

UTAH: Temperature maximums 4° above normal; minimums 6° above normal. Precipitation light to moderate with few stations reporting no moisture.

Days suitable for fieldwork 6.7. Soil moisture 98% short, 2% adequate. Irrigation water supply 50% very short, 50% short. Stockwater supply 37% very short, 60% short, 3% adequate. Oats harvested for grain 89%, 50% 1993. Winter wheat seeded for 1995 crop 3%, 24% 1993, 25% avg. Corn matured 25%, 5% 1993; harvested for silage 6% completed. Alfalfa 3rd cutting 69%, 47% 1993, 54% avg.; harvested for seed 19%, 41% 1993. Peaches harvested 90%, 76% 1993, 67% avg. Apples harvested 5%, 8% 1993. Pears harvested 92%, 62% 1993, 72% avg. Onions harvested 15%, 14% 1993. Potatoes harvested 11%, 15% 1993. Cattle moved from summer range 24%, 6% 1993. Sheep moved from summer range 16%, 5% 1993. Pasture, range feed poor to fair. Major farm activities: Harvesting alfalfa hay, oats, apples, peaches, pears, onions, corn silage; assessing forage shortages on summer, winter range.

VIRGINIA: Temperatures slightly above normal. Extremes 53°, 93°. Rainfall above normal in the south, west, below normal elsewhere.

Days suitable for fieldwork 5.7. Topsoil 14% short, 86% adequate. Corn 4% very poor, 9% poor, 11% fair, 71% good, 5% excellent; grain harvest 10%, 15% 1993, 14% avg.; silage harvested 28%, 34% 1993, 35% avg.; silked 100%, 100% 1993, 100% avg.; dough stage 85%, 95% 1993, 96% avg.; dented 65%, 74% 1993, 75% avg.; mature 50%, 55% 1993, 57% avg. Soybean 15% fair, 76% good, 9% excellent; bloom 94%, 95% 1993, 94% avg.; setting pods 77%, 80% 1993, 85% avg. Peanut 100% good. Cotton 100% good. Flue tobacco condition was 27% fair, 46% good, 27% excellent. Flue tobacco harvested 47%, 51% 1993, 58% avg. Burley tobacco 18% fair, 82% good. Burley tobacco harvested 23%, 10% 1993, 40% avg. Fire tobacco 31% fair, 33% good, 36% excellent. Fire tobacco harvested 67%, 51% 1993, 75% avg. Sun

tobacco 75% good, 25% excellent. Sun tobacco harvested 45%, 55% 1993, 59% avg. Apple 42% fair, 58% good. Summer apple harvest 90%, 83% 1993, NA avg. Peaches harvested 95%, 90% 1993, 90% avg. Sweet potatoes harvested 1%. Pasture feed 7% fair, 79% good, 14% excellent. Alfalfa hay 7% fair, 63% good, 30% excellent. Other hay 12% fair, 70% good, 18% excellent. Chopping corn, cutting alfalfa, other hay, harvesting, marketing tobacco, irrigating snapbeans peppers, tomatoes, scouting peanuts for sclerotinia.

WASHINGTON: Temperatures 2° below normal to 4° above normal west; 2° below normal to 3° above normal east. Precipitation none to 0.59 in. west; none to 0.05 in. east.

Days suitable for fieldwork 7.0. Soil moisture 95% short, 5% adequate. Hay, other roughage supplies 1% very short, 6% short, 85% adequate, 8% surplus. Range, pasture feed 42% very poor, 48% poor, 6% fair, 4% good. Potatoes 15% fair, 85% good. Dry edible beans 10% fair, 90% good. Corn 10% fair, 90% good. Winter wheat 100% harvested, 90% 1993, 97% avg.; 19% planted, 17% 1993, 18% avg. Spring wheat 100% harvested, 75% 1993, 92% avg. Barley 100% harvested, 72% 1993, 86% avg. Potatoes 15% harvested, 30% 1993, 25% avg. Corn silage 25% harvested, 26% 1993, 18% avg. Dry beans 15% harvested, 0% 1993, 12% avg. Alfalfa, third cutting, 82% completed, 47% 1993, 68% avg. Winter grain seeding underway in most areas, however, many producers were opting to delay planting until some precipitation is received. Soil moisture still short, deep. Hop harvest underway in Yakima County. Mint harvest underway in the Columbia Basin. D'Anjou pear harvest in full swing in the Wenatchee Valley. Early Red, Golden Delicious apples were being picked in the Yakima Valley, Columbia Basin. Early Delicious apple harvest was a week or so away in the Wenatchee Valley. Vegetable harvest continues. Range, pastures continue to be very dry, short of feed. Fall calving began.

WEST VIRGINIA: Temperature 65°. Extremes 45°, 88°. Precipitation 0.92 in.

Days suitable for fieldwork 5.2. Soil moisture 83% adequate, 17% surplus. Hay 9% fair, 91% good; second cutting 70%, 77% 1993, 65% avg.; third cutting 51%, 60% 1993, 47% avg. Apples 50% poor, 50% fair. Corn 13% fair, 83% good, 4% excellent; silked 100%, 100% 1993, 98% avg.; dough stage, 66%, 93% 1993, 73% avg. Oats 100% good; harvested 100%, 100% 1993, 98% avg. Tobacco 38% fair, 62% good; topped 100%, 97% 1993, 91% avg.; 38% harvested, 17% 1993, 32% avg. Gardens 17% fair, 83% good. Soybeans 9% fair, 91% good; podding 96%, 99% 1993. Pasture feed 14% fair, 71% good, 15% excellent; 93% of normal. Cattle 13% fair, 79% good, 8% excellent. Sheep 5% fair, 87% good, 8% excellent. Farm activities: Cutting hay, harvesting tobacco, apples, clipping pastures, equipment maintenance.

WISCONSIN: Temperature 57°, 8° below normal. Extremes 28°, 82°. Precipitation 0.40 to 1.00 in.

Days suitable for fieldwork 3.6. Soil moisture: 17% short, 71% adequate, 12% surplus. Pasture feed 82%, 86% 1993, 77% avg. General condition of crops: 6% fair, 80% good, 14% excellent. Corn in dough or beyond 73%, 55% 1993, 64% avg.; dent or beyond 39%, 17% 1993, 27% avg.; mature 6%, 2% 1993, 6% avg.; 2% fair, 56% good, 42% excellent. Oats harvested 94%, 84% 1993, N/A avg. Soybean 6% fair, 68% good, 26% excellent; leaves turned 18%, 11% 1993, 18% avg. Third cutting hay harvested 43%, 33% 1993, 42% avg. Crop progress continued to slow, move closer to the averages with the return of fall-like weather. The percentages of corn mature, third crop hay harvested, soybean leaves turned were rated very near or at their averages as of last week. Farmers were hoping for at least two more weeks of sun-filled, frost free weather. Harvest of corn for silage will begin in some areas this week. A number of reporters stated third crop hay is excellent but difficult to harvest; others were working on fourth crop. More soybean fields were developing mold or stem rot problems due to excess moisture; however, the crop 94% good to excellent condition.

WYOMING: Temperatures at or slightly below normal across the north, southeast portions of the State. Southwest quarter had normal to above normal temperatures. Colony was coolest for the week, averaging 6° below normal. Casper, Thermopolis were the warm spots averaging 3° above normal. Precipitation was still below normal for most of the State. Exceptions were scattered areas in the north, southeast that received above normal rainfall. Colony, Torrington, Wheatland received the most precipitation at about 5 tenths of an inch.

Days suitable for fieldwork 6.5. Topsoil 92% short, 8% adequate. Spring wheat 96% harvested, 34% 1993, 76% avg. Oats 78% harvested, 40% 1993, 72% avg. Barley 89% harvested, 69% 1993, 80% avg. Corn 19% in dough, 37% 1993, 44% avg.; 50% dented, 6% 1993, 23% avg.; 30% mature, 0% 1993, 2% avg. Dry beans 32% leaves turning color, 51% 1993, 69% avg.; 41% windrowed, 21% 1993, 20% avg.; 27% combined, 0% 1993, 6% avg. Sugarbeets 17% fair, 54% good, 29% excellent. Corn 1% poor, 3% fair, 40% good, 56% excellent. Dry bean 2% fair, 98% good. Alfalfa 93% second cutting harvested, 71% 1993, 80% avg.; 19% third cutting, 4% 1993, 10% avg. Winter wheat seedings for 1995 28% planted, 24% 1993, 24% avg.; 6% emerged, 0% 1993, 3% avg. Irrigation water supplies 67% short, 33% adequate.

August 1994

MONTHLY DATA FROM SELECTED FOREIGN CITIES CLIMATE ANALYSIS CENTER-NMC-NWS-NOAA *** = DATA NOT AVAILABLE

International Weather and Crop Summary HIGHLIGHTS

August 28 - September 3, 1994

FSU-WESTERN: Several days of dry weather over northern Russia favored spring grain harvesting, delayed by earlier wetness.

FSU-NEW LANDS: Mostly dry weather in western areas of Russia and Kazakhstan favored grain maturation and early harvesting.

EUROPE: Wetness slowed harvesting.

SOUTH ASIA: Conditions were unfavorably wet for central India's soybeans and rainfed rice and southern Pakistan's cotton.

SOUTHEAST ASIA: Heavy rain benefited grains and sugarcane in Thailand but flooded some Vietnamese rice.

EASTERN ASIA: Rain helped immature crops in the North China Plain, while tropical storm activity continued in the south.

AUSTRALIA: Dry, warm weather persisted in the east, but showers swept through western crop areas.

SOUTH AMERICA: Showers benefited wheat in southern Brazil and Buenos Aires, Argentina.

MEXICO: Rain soaked the Southern Plateau corn belt.

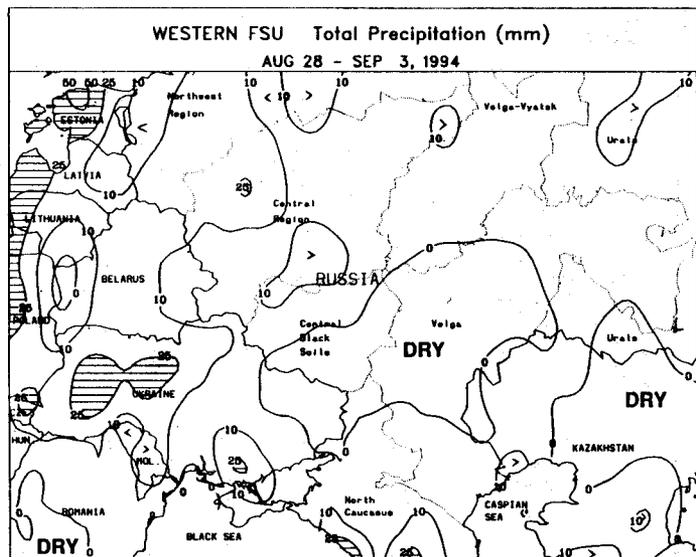
CANADA: Widespread light frost had little, if any, impact on maturing grains and oilseeds.

COUNTRY	CITY	TEMPERATURE (C)					PRECIPITATION (MM)		
		AVG MAX	AVG MIN	HI	LO	DPART AVG	F/NRM	TOTAL	F/NRM
NORWAY	OSLO	20	10	29	3	15	1.2	179	90
SWEDEN	STOCKHOLM	22	13	31	6	17	1.1	75	10
FINLAND	HELSINKI	20	11	28	4	16	0.7	68	-12
U KING	GLASGOW	18	10	22	4	14	-1.3	135	45
	EDINBURGH	19	10	24	4	14	0.0	50	-15
	BIRMINGHAM	20	11	26	6	16	0.2	39	-28
	LONDON	22	13	29	5	17	0.9	33	-23
IRELAND	DUBLIN	18	10	22	5	14	-1.0	60	-12
ICELAND	REYKJAVIK	14	9	26	5	11	0.7	33	-29
DENMRK	COPENHAGEN	22	14	30	7	18	0.8	49	-17
LUXEMB	LUXEMBOURG	23	14	34	7	18	1.3	73	1
SWITZL	ZURICH	25	15	33	10	20	3.0	124	-12
	GENEVA	28	16	34	11	22	3.4	46	-35
FRANCE	PARIS/ORLY	25	15	36	9	20	***	50	**
	STRASBOURG	25	15	35	8	20	1.7	72	4
	BOURGES	26	15	35	11	21	2.1	56	-3
	BORDEAUX	28	18	35	14	23	3.2	43	-12
	TOULOUSE	29	18	35	15	24	3.2	14	-34
	MARSEILLE	32	21	36	18	27	3.6	25	-3
SPAIN	VALLADOLID	31	15	36	12	23	2.2	9	-3
	MADRID	34	18	38	13	26	2.3	0	-10
	SEVILLE	37	21	42	18	29	1.0	0	-4
PORTUG	LISBON	28	18	34	16	23	0.1	1	-6
GERMNY	HAMBURG	23	14	35	10	18	1.7	168	98
	BERLIN	24	15	37	11	19	1.1	97	37
	DUSSELDORF	24	14	36	6	19	0.8	70	-8
	LEIPZIG	24	14	35	7	19	1.4	148	88
	DRESDEN	24	15	37	10	19	1.3	130	58
	STUTTGART	25	14	33	7	19	2.6	46	-53
	NURNBERG	25	14	36	5	20	2.2	52	-14
AUSTRI	VIENNA	28	16	34	9	22	2.6	25	-37
	INNSBRUCK	26	14	33	9	20	2.6	136	16
CZECH	PRAGUE	24	13	36	6	19	1.5	71	2
POLAND	WARSAW	24	13	36	8	18	1.1	73	13
	LODZ	24	14	38	7	19	2.2	63	-5
	KATOWICE	24	13	35	8	19	2.2	97	6
	PRZEMYSL	24	14	32	9	19	1.5	101	24
HUNGAR	BUDAPEST	28	17	36	11	23	2.4	45	-7
F YUGO	BELGRADE	31	19	39	12	25	3.5	91	37
ROMANI	BUCHAREST	30	15	36	10	23	0.4	19	-34
BULGAR	SOFIA	30	16	39	10	23	4.5	14	-24
ITALY	MILAN	32	19	36	14	25	3.4	84	-9
	VERONA	32	19	35	14	25	2.5	115	23
	VENICE	30	20	34	16	25	2.7	22	-60
	GENOA	29	23	33	19	26	1.8	47	-7
	ROME	31	21	34	17	26	2.4	0	-31
	NAPLES	33	22	36	20	28	3.7	6	-39
GREECE	THESSALONIKA	33	20	40	16	26	0.7	9	-12
	LARISSA	34	19	43	15	26	0.5	7	-9
	ATHENS	34	24	38	21	29	1.5	0	-4
TURKEY	ISTANBUL	30	21	34	18	26	2.2	21	0
	ANKARA	30	13	36	9	22	-1.6	1	-36
CYPRUS	LARNACA	33	22	36	19	27	-0.1	0	-1
ESTONI	TALLINN	20	12	29	5	16	0.7	177	100
FSU	ST. PETERSBERG	20	13	28	7	17	0.4	56	-22
LITHUA	KALINAS	24	13	34	6	18	1.9	34	-32
FSU	MINSK	23	13	33	7	18	1.2	81	7
	KAZAN	20	11	27	4	16	-1.6	78	10
	MOSCOW	20	12	29	5	16	-0.4	74	1
	YEKATERINEBURG	19	11	25	1	15	-0.6	131	66
	OMSK	21	12	27	4	16	0.3	62	7
	KUSTANAY	22	13	29	5	18	-0.4	32	-1
	KRASNOYARSK	**	**	28	7	**	***	**	**
	NOVOSIBIRSK	21	12	26	6	17	0.3	82	29
	BARNAUL	22	11	29	7	17	0.1	73	22
	KHABAROVSK	26	16	30	11	21	1.7	146	-2
	VLADIVOSTOK	25	20	30	15	22	3.0	144	-12
	KIEV	24	15	34	10	20	1.0	72	2
	LVOV	24	13	33	8	19	1.7	94	19
	KIROVOGRAD	26	14	36	9	20	-0.2	62	18

Based on Preliminary Reports

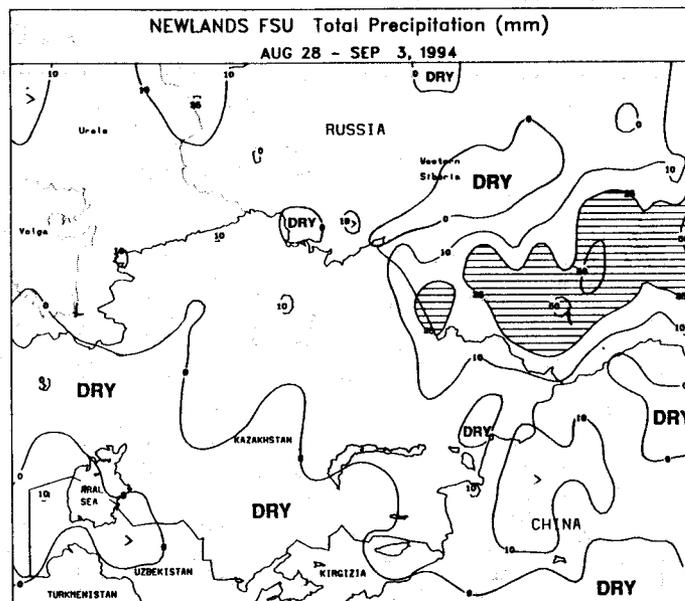
August 1994

COUNTRY	CITY	TEMPERATURE (C)					PRECIPITATION (MM)			COUNTRY	CITY	TEMPERATURE (C)					PRECIPITATION (MM)		
		AVG	AVG	HI	LO	DPART	DPART	TOTAL	F/NRM			AVG	AVG	HI	LO	DPART	DPART	TOTAL	F/NRM
		MAX	MIN	MAX	MIN	AVG	F/NRM	TOTAL	F/NRM			MAX	MIN	MAX	MIN	AVG	F/NRM	TOTAL	F/NRM
FSU	ODESSA	26	18	33	14	22	1.1	72	38	KENYA	NAIROBI	23	12	27	9	18	0.5	24	11
	YALTA	29	20	36	10	25	0.9	16	-10	TANZAN	DAR ES SALAAM	30	19	37	16	24	0.5	14	-13
	VORONEZH	**	**	26	14	**	***	**	**	GABON	LIBREVILLE	27	22	29	20	24	-0.1	0	-7
	SARATOV	23	14	31	6	18	-0.2	48	7	TOGO	LOME	28	23	30	22	26	0.6	8	-19
	KHARKOV	25	14	33	8	19	0.1	67	-11	B FASO	OUAGADOUGOU	30	23	33	21	27	0.1	287	67
	VOLGOGRAD	26	15	36	8	21	-1.8	18	-12	IVRY C	ABIDJAN	27	22	30	22	25	0.7	10	-30
	ROSTOV	28	17	34	10	22	0.0	6	-29	MOZAMB	MAPUTO	26	14	35	10	20	0.0	8	-5
	ASTIRAKHAN	30	17	36	12	23	-0.1	32	13	ZAMBIA	LUSAKA	25	10	30	6	17	-1.0	0	0
	KRASNODAR	30	16	37	10	23	-0.4	38	-18	ZIMBAB	HARARE	23	10	28	6	16	1.1	4	2
	ORENBURG	25	12	31	5	18	-1.3	20	-13	S AFRI	PRETORIA	22	7	28	2	15	0.2	5	0
	TSELINOGRAD	23	12	32	6	18	0.0	62	28	JOHANNESBURG		19	4	24	-3	12	-0.9	0	-6
	KARAGANDA	25	13	36	6	19	1.0	11	-21	BETHAL		21	2	26	-4	12	0.2	0	-9
	TBILISI	29	19	37	16	24	0.0	78	32	DURBAN		22	13	29	8	17	-0.4	139	77
	TASHKENT	35	18	40	9	26	1.0	0	-2	CAPE TOWN		18	7	26	1	13	0.2	30	-48
	ASHKHABAD	37	23	40	18	30	1.3	0	-1	CANADA	TORONTO	24	13	29	8	19	-0.8	60	-25
SYRIA	DAMASCUS	36	27	42	14	27	0.6	0	0	MONTRREAL		24	13	29	7	18	-1.1	84	-16
ISRAEL	JERUSALEM	30	18	37	16	24	0.7	0	0	WINNIPEG		23	10	31	4	17	-1.7	122	46
PAKIST	KARACHI	31	26	35	23	**	***	128	64	REGINA		24	11	34	2	18	-0.5	69	29
INDIA	AMRITSAR	33	26	37	23	29	-0.3	137	-42	SASKATOON		24	9	31	3	17	-0.9	71	35
	NEW DELHI	33	26	36	17	30	-0.2	260	6	LEATHERIDGE		26	9	38	0	18	-0.3	8	-35
	AHMEDABAD	30	25	33	23	27	-0.9	363	113	CALGARY		23	10	33	3	16	0.5	85	36
	INDORE	27	22	32	21	25	-0.4	415	102	EDMONTON		22	10	29	0	16	-0.9	**	**
	CALCUTTA	32	26	34	24	29	0.2	410	122	VANCOUVER		23	14	28	11	19	1.2	19	-19
	VERAVAL	29	26	31	24	28	0.2	100	-78	MEXICO	GUADALAJARA	25	17	29	15	21	-0.1	186	-25
	BOMBAY	30	25	31	24	28	0.7	503	-157	MEXICO CITY		24	12	28	10	18	1.2	87	-16
	POONA	27	22	36	21	25	0.0	90	-34	ACAPULCO		34	25	36	22	29	0.7	105	-139
	BEGAMPET	30	22	33	20	26	-0.3	205	45	BERMUD	ST. GEORGES	32	27	33	22	29	2.0	189	43
	VISHAKHAPATNAM	30	26	35	23	28	***	113	**	BAHAMA	NASSAU	32	24	33	20	28	0.0	87	-140
	MADRAS	34	25	38	22	30	-0.1	156	0	CUBA	HAVANA	31	24	37	20	28	0.3	190	91
	MANGALORE	29	23	30	20	26	-0.3	896	319	JAMAIC	KINGSTON	33	26	35	22	29	0.7	26	-61
H KONG	KINGS PEAK	30	26	33	24	28	***	641	**	P RICO	SAN JUAN	32	25	34	21	29	0.6	47	-88
N KREA	PYONGYANG	28	21	33	13	24	0.0	392	160	GADEL	RATZET	33	24	34	22	28	1.2	28	-103
S KREA	SEOUL	32	25	37	19	28	2.8	234	10	MARINQ	LAMENTIN	31	25	32	22	28	1.2	103	-139
JAPAN	SAPPORO	29	22	36	18	25	3.7	105	-41	BARBAD	BRIDGETOWN	31	25	31	22	28	0.4	83	-63
	NAGOYA	35	26	40	22	30	3.1	45	-101	TRINID	PORT OF SPAIN	32	24	33	22	28	1.1	94	-140
	TOKYO	33	26	39	20	30	2.5	98	-50	COLOMB	BOGOTA	18	7	21	1	**	***	30	-10
	YOKOHAMA	33	25	36	20	29	2.8	54	-78	VENEZU	CARACAS	31	23	33	21	27	-0.2	22	-30
	KYOTO	36	26	40	22	31	3.1	42	-135	F GUIA	CAYENNE	31	22	32	21	26	0.4	119	-47
	OSAKA	35	27	39	24	31	2.6	59	-36	BRAZIL	FORTALEZA	**	**	31	22	**	***	6	-22
THAILN	PHETCHABUN	31	24	35	23	28	0.3	394	195	RECIFE		**	**	28	19	**	***	79	-124
	BANGKOK	32	25	36	24	29	0.1	141	-56	BELO HORIZONTE		**	15	30	10	**	***	**	**
MALAYS	KUALA LUMPUR	32	24	34	23	28	1.4	109	-27	CAMPO GRANDE		31	17	37	7	24	2.3	9	-36
VIEITNM	HANOI	32	26	38	24	29	1.0	601	258	FRANCA		28	15	32	8	22	3.7	**	**
CHINA	HARBIN	27	17	31	11	22	0.6	111	7	LONDRINA		**	13	34	5	**	***	**	**
	HAMI	33	15	38	12	24	-0.9	2	-3	SANTA MARIA		20	**	30	3	**	***	155	17
	LANCHOW	29	17	36	13	23	1.6	95	21	PORTO ALEGRE		21	11	32	5	16	0.4	75	-39
	BEIJING	31	23	35	19	27	2.2	217	35	PERU	LIMA	19	15	21	14	17	0.2	0	-1
	TIENTSIN	31	23	33	20	27	1.0	369	211	BOLIVI	LA PAZ	15	-3	17	-8	6	-1.1	0	-16
	LHASA	23	11	25	8	17	1.1	74	-58	CHILE	SANTAGO	16	2	22	-2	9	-0.4	6	-42
	KUNMING	25	17	28	15	21	1.5	139	-66	ARGENTN	IGUAZU	26	12	35	3	19	***	33	**
	CHENGCHOW	32	23	37	19	27	2.0	55	-58	FORMOSA		24	13	33	5	19	1.3	52	-9
	YEHCHANG	33	25	38	22	29	1.4	196	12	CERES		20	8	27	0	14	0.4	23	0
	HANKOW	34	27	38	24	30	1.5	37	-90	CORDOBA		19	7	29	-1	13	0.5	50	39
	CHUNGKING	36	26	41	23	31	***	96	**	RIO CUARTO		17	6	27	1	11	0.5	39	24
	CHIHKIANG	32	23	37	21	28	0.6	67	-51	ROSARIO		18	7	23	-2	12	1.0	3	-34
	WU HU	35	25	39	22	30	***	25	**	BUENOS AIRES		16	6	21	1	11	0.6	43	-15
	SHANGHAI	32	26	35	19	29	***	151	**	SANTA ROSA		17	3	22	-2	10	0.6	47	24
	NANCHANG	33	26	37	21	30	0.8	145	46	TRES ARROYOS		15	**	20	-2	**	***	48	5
	TAIPEI	32	26	37	24	29	1.3	486	201	N CALD	NOUMEA	22	17	24	15	19	-0.4	104	34
	CANTON	32	26	36	23	29	0.5	278	70	FLJI	NAUSORI	25	20	28	14	22	-0.3	47	-93
	NANNING	33	25	36	23	29	0.6	246	28	SAMOA	PAGO PAGO	28	24	30	22	26	0.0	308	137
CNRY I	LAS PALMAS	27	22	33	21	25	0.4	0	0	TAHITI	PAPEETE	29	22	31	17	26	1.2	170	122
MOROCC	CASABLANCA	25	20	30	18	23	0.2	0	-1	PA N G	PORT MORESBY	28	23	30	21	25	-0.8	67	40
	MARRAKECH	37	21	43	17	29	1.4	0	-2	AUSTRL	DARWIN	30	19	34	16	25	-1.4	0	-8
ALGERI	ALGER	35	23	42	20	29	4.2	0	-3	MOREE		20	4	25	-2	12	-0.2	18	-20
	BATNA	37	19	41	11	28	3.9	17	-3	BRISBANE		21	9	25	2	15	-1.2	5	-41
TUNISI	TUNIS	37	24	47	20	31	4.0	8	1	PERIH		19	9	25	5	14	0.9	144	32
NIGER	NIAMEY	31	24	35	21	28	-0.3	289	123	CEUDUNA		18	5	29	1	12	-0.4	5	-30
MALI	TIMBUKTU	**	**	37	**	**	***	22	-41	ADELAIDE		15	7	22	2	11	-0.9	12	-39
	BAMAKO	30	22	33	20	26	0.4	251	-29	MELBOURNE		14	4	22	-1	9	-1.9	9	-41
MAURIT	NOUAKHOTT	33	25	40	20	29	0.9	5	-24	WAGGA		14	1	23	-3	8	-1.5	5	-54
SENEG	DAKAR	30	25	33	23	27	0.2	13											

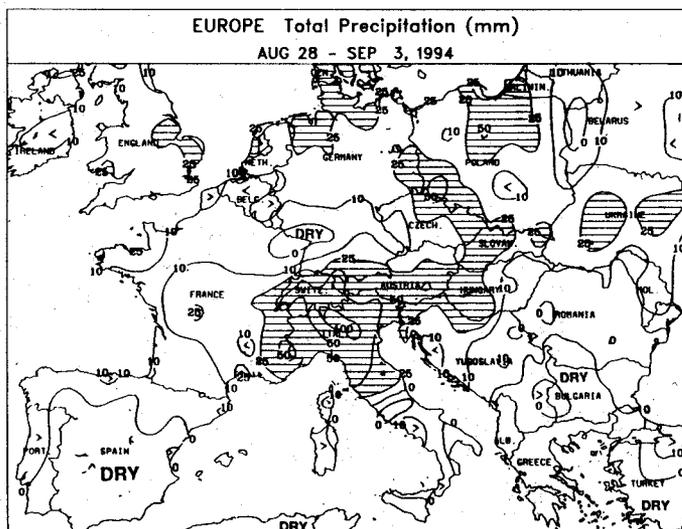


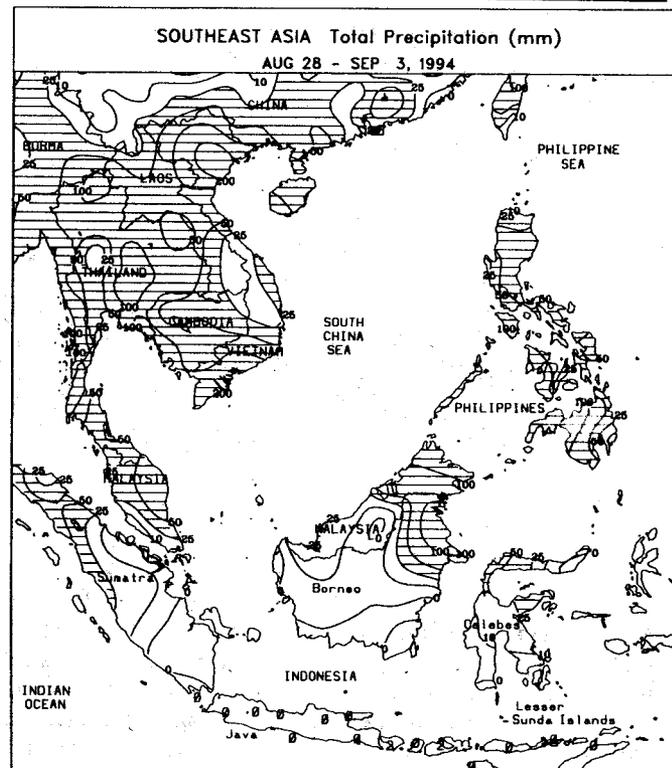
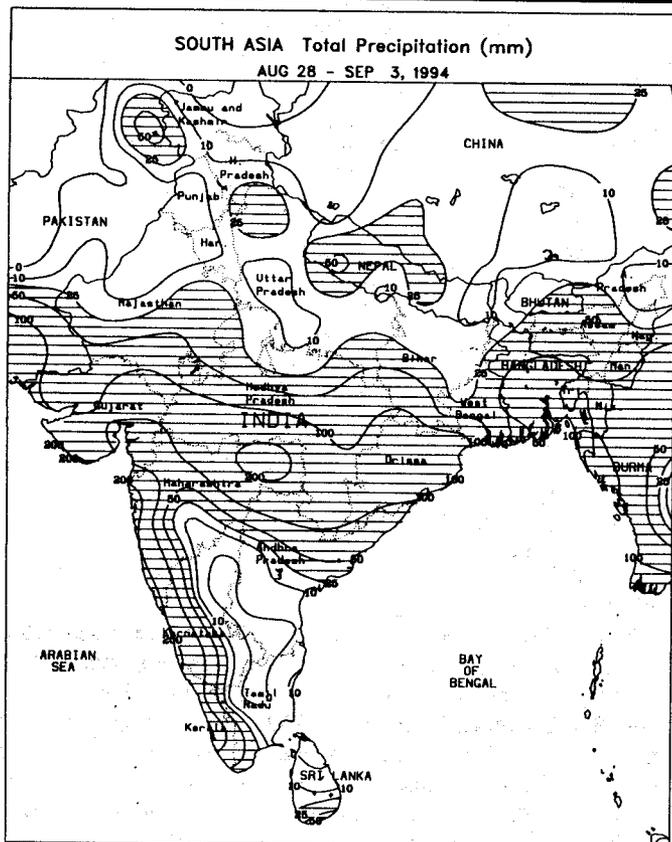
FSU-WESTERN: Several days of dry weather over northern Russia (Northwest Region, Central Region, Central Black Soils, upper Volga Valley, and Volga Vyatsk) favored spring grain harvesting and winter grain planting, delayed by previous wetness. Further south, drought conditions continued over southern Russia (lower Volga Valley and North Caucasus) and eastern Ukraine. The dryness favored early harvesting of corn and sunflowers. However, September is the optimum month for planting winter grains in Ukraine and southern Russia, and widespread rain is needed to replenish topsoil moisture. Light to moderate showers (10-29 mm) continued over western Ukraine and Moldova, recharging soil moisture. Weekly average temperatures were 1-3 degrees Celsius (C) above normal over the western portion of the region and 1-3 degree C below normal in the east.

EUROPE: Locally heavy rain (50-100 mm) soaked Italy's Po Valley, disrupting summer crop harvesting while replenishing soil moisture for winter grain planting. Showers covered much of Europe, including most Scandinavian crop areas. Grain and oilseed harvesting was slowed by wetness (25-50 mm) in extreme northern Germany, Denmark, southern Sweden, and Finland. The rain also slowed corn harvesting in east-central Europe. However, warm, dry weather in Romania and Bulgaria, and light showers in southwestern France allowed early corn harvesting to make some progress. Variable rainfall in the United Kingdom and northern France hampered final spring grain and oilseed harvesting.



FSU-NEW LANDS: Spring grains were still maturing over most of Russia, with harvesting normally underway in Kazakhstan. Mostly dry weather over the western portion of Russia (Urals and western half of West Siberia) and Kazakhstan favored grain maturation and early harvesting. Cold, wet weather over the eastern portion of West Siberia (Altay Kray region) delayed crop maturation and early harvesting. Scattered frost over the northern fringe of the Urals had minimal effect on mature spring grains. In the Russian Federation, reports as of August 29 indicated spring grain harvesting, excluding corn, was only about 35 percent complete, compared with 50 percent in 1993, 59 percent in 1992, and 65 percent in 1991.

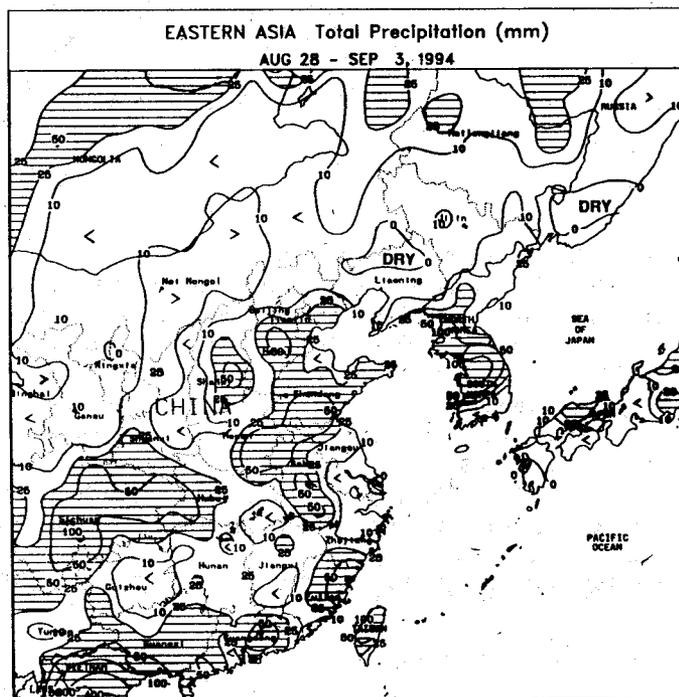


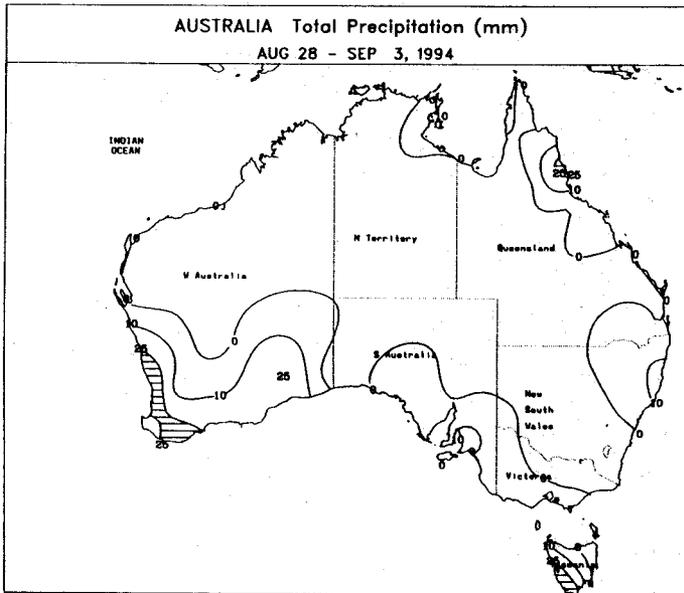


SOUTHEAST ASIA: Heavy rain (100 mm or more) soaked a large section of central Thailand, increasing moisture for sugarcane and secondary grains. Moisture elsewhere in Indochina was generally beneficial except for rice areas of northern Vietnam and the Mekong Delta, where inundating tropical showers (100-300 mm or more) caused some flooding. The rain in the north, mainly from Tropical Storm Harry, came at the usual start of the 10th month rice harvest. In the Philippines, widespread showers (25-50 mm or more) were evenly distributed over primary crop areas for the second week, benefiting immature grains and sugarcane.

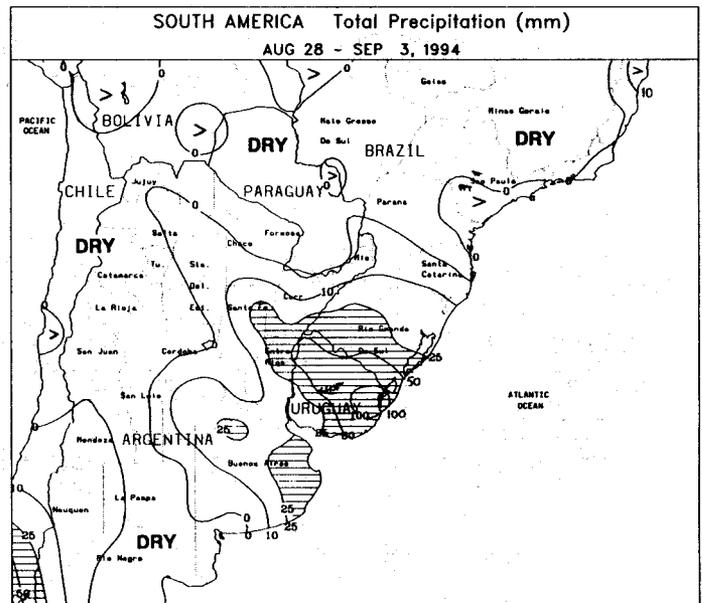
SOUTH ASIA: Wet weather (rainfall totaling 100-230 mm) persisted across central India, further inundating primary soybean and rainfed rice areas that needed drier weather. The rains extended westward, benefiting important groundnut areas (Gujarat) that had been trending dry. In southern Pakistan, however, unseasonably heavy rain (72-97 mm) raised concern for cotton in or nearing the open boll stage. Further north, only scattered, light rain (15 mm or less) covered most crop areas of northern Pakistan and north-central India. The monsoon will be withdrawing from northwestern crop areas over the next few weeks. In southern India, beneficial rain (50-100 or more) covered most of Maharashtra, an important sorghum producer, but rain was light (1-5 mm) elsewhere in the interior.

EASTERN ASIA: On September 1, Typhoon Gladys crossed Taiwan, producing 90-110 mm of rain in the north, and then hit northern Fujian with 50-100 mm of rainfall and 70 knot (80 mph) winds. The storm rapidly weakened with little impact elsewhere. The lingering impact of Tropical Storm Harry early in the week produced 25-65 mm over Guangdong and Guangxi. Almost daily showers produced 50-100 mm of rain in Sichuan, while a broad area of 25-75 mm amounts extended from Anhui to eastern portions of Hebei. The rain benefited immature summer crops in the North China Plain. Light showers and warm weather favored harvesting in Manchuria. Wet weather (50-100 mm or more) prevailed over the central Korean Peninsula. Scattered showers and warm weather covered Japan.

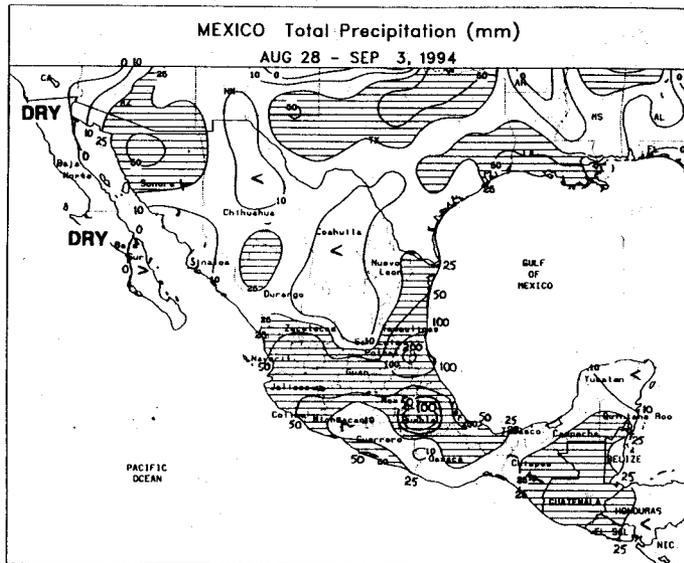




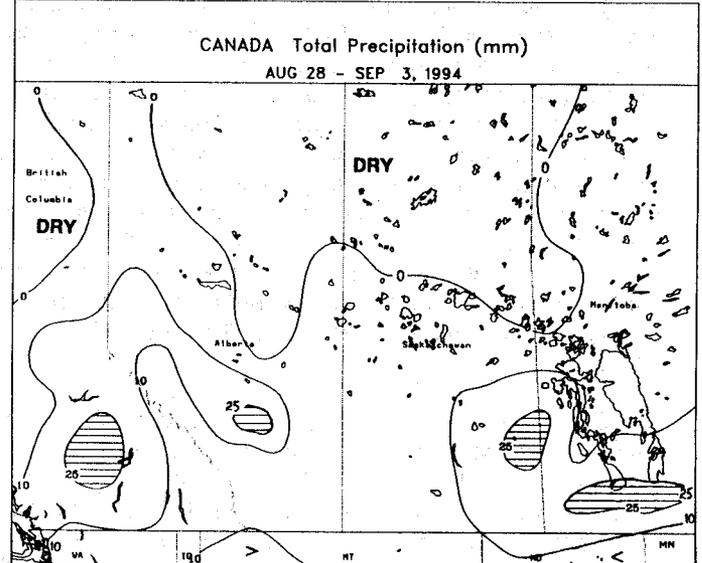
AUSTRALIA: Dry, warm weather dominated eastern Australia's winter grain belt, further stressing crops in or nearing the heading stage. Most areas reported no rain at all, with only isolated locations reporting more than 5 mm. Average temperatures 2-5 degrees C above normal increased evapotranspiration rates, exacerbating stress on the already drought-stricken crop. In contrast, light to moderate showers (5-15 mm) benefited western crops. In Queensland, mostly dry weather favored sugarcane harvests.



SOUTH AMERICA: Showers (10-25 mm) benefited wheat, ranging from vegetative growth stages in northern Buenos Aires, Argentina to reproductive and early filling stages in Rio Grande do Sul, Brazil. Locally heavier rain (50-100 mm) soaked much of Uruguay. Elsewhere, mostly dry weather prevailed. Soil moisture is low in Santa Fe, Argentina, but 10-20 mm of rain moistened topsoils in extreme southern Santa Fe. The dry weather in Brazil favored citrus, coffee, and sugarcane harvesting.



MEXICO: Widespread rain covered the Southern Plateau corn belt, providing additional moisture for immature corn, sorghum, and other summer crops, but slowing early harvesting. Rainfall generally averaged 25-75 mm. A tropical depression produced excessive rains (100-217 mm) in northern Veracruz, as the storm moved inland on August 31 just north of Tampico. Winds were about 30 knots (35 mph), but the main threat was flash flooding. Beneficial showers (10-17 mm) helped emerging corn in the Yucatan Peninsula. Beneficial rain (10-25 mm) fell in extreme northwestern Mexico for the upcoming winter wheat planting season as well as for rangeland conditions.



CANADA: Patches of light frost were scattered throughout the Prairies early in the week as nearly all crop areas reported lows of 0 to 2 degrees C. This week's frost was somewhat ahead of schedule, with most Prairie crop areas receiving their first autumn freeze (0 degrees C) by September 20. However, most grains and oilseeds were maturing, resulting in little, if any, negative impact. Moderate rain (10-15 mm) slowed harvests in the eastern Prairies. In Ontario and Quebec, rainfall was generally light (6-16 mm). Cool weather (temperatures 1-3 degrees C below normal, minimum temperatures as low as 3 C) slowed crop development.

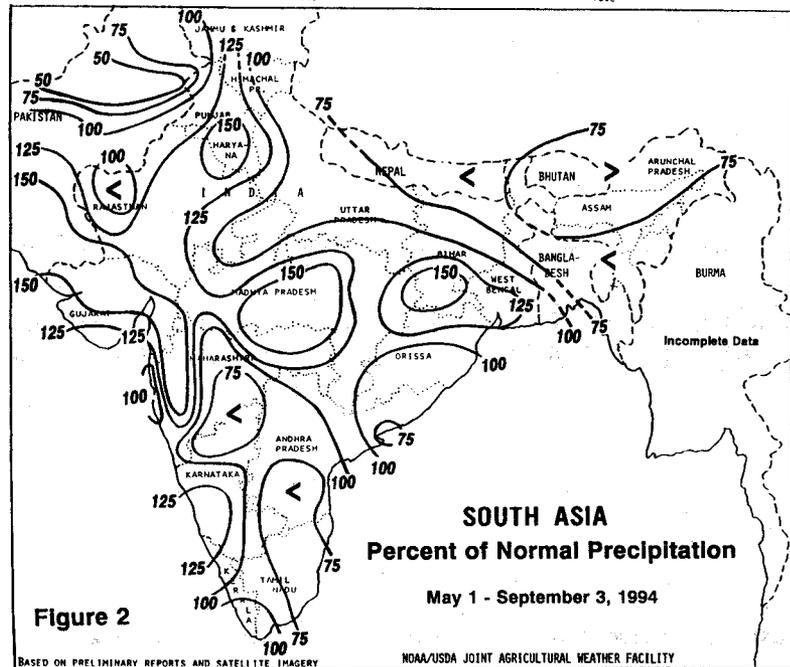
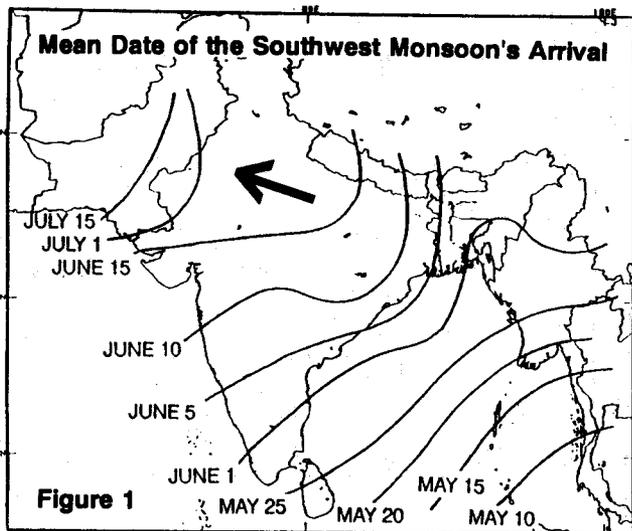
1994 Southwest Monsoon Update

The 1994 Southwest Monsoon season (May 1 - September 3) has been highlighted by average to surplus rainfall across much of South (India, Bangladesh, and Pakistan) and Southeast (Indochina, Philippines, and Indonesia) Asia, with only a few areas recording subnormal precipitation. Unlike the past few monsoons when rainfall has been uneven and sporadic, this year's Southwest Monsoon was generally on-time and rather active across the Indian subcontinent, Indochina, and the Philippines. A notable exception has been very dry conditions throughout southern sections of Indonesia, especially Java, the Lesser Sunda Islands, and the southern halves of Sumatra and Borneo, although May-September is typically their driest time of the year. The following is a summary of conditions to date in both regions and their likely agricultural impacts.

Southeast Asia: Following an extremely dry cool season (November-March), the southwest monsoon progressed northward into Southeast Asia during April, bringing widespread rains to much of the region. The unseasonably heavy rains eased long-term drought conditions in northern and central Thailand, but aggravated flooding in portions of western Indonesia, especially Java. The Philippines observed near to above normal April rainfall, benefitting main-season rice and corn plantings. Since then, rainfall has generally been timely and frequent, with occasional localized flooding, across Indochina and the Philippines, with most locations reporting near to above normal precipitation during May 1-September 3. Although subnormal rains covered parts of south-central Thailand's corn region during June and July, ample rains during May and August brought seasonal totals close to normal. In sharp contrast, rainfall abruptly stopped across southern sections of Indonesia in mid-May after a generous rainy season (November-April). Similar to 1991, many locations in southern Sumatra, Java, and the Lesser Sundas have received little or no rain during the past four months.

South Asia (Prior to Onset of Monsoon): Heavy showers also fell on Bangladesh and northeastern India during April, causing some localized flooding. On May 2, Tropical Cyclone 02B, with sustained winds of 135 knots (150 mph) and gusts to 165 knots (180 mph), made landfall south of Cox's Bazar. Although this cyclone was strikingly similar to a devastating cyclone in 1991, its differences in placement of landfall (farther south) and timing relative to local tides (during low tide) kept fatalities and damage much lower than the 1991 storm (see *WWCB*, Vol. 81, No. 19, May 10, 1994). Near to above normal rains fell on northeastern India and Bangladesh during May, exacerbating earlier flood problems, and by mid-June, the monsoon had progressed northwestward into central India on schedule (Figure 1). In northern India and Pakistan, however, extremely hot weather enveloped the area during late May and early June. Highs approached 50°C (122°F) and weekly temperatures averaged 5°C (9°F) above normal until light showers from the monsoon reached the area by mid-June and significantly lowered readings. By late June, moderate to heavy monsoonal showers reached India's northernmost crop areas, pushed into western oilseed portions (Gujarat and Rajasthan), and spread into northern rice regions (Uttar Pradesh and Bihar).

South Asia (Monsoon Season): By mid-July, nearly all rain-fed grain, oilseed, and cotton areas had received timely rains for planting. Torrential rains during July and August caused some flooding of rain-fed rice areas of east-central India (eastern Madhya Pradesh, Orissa, and southern Bihar) and kept soybean areas of central India (Madhya Pradesh) too wet, but an active monsoon was favorable elsewhere for crop progress and development. During July and early August, however, the southern interior (southern Maharashtra and northern Karnataka) missed much of the monsoonal rains, but moderate showers during late August eased dryness. This region includes primary sorghum and sugarcane areas, among other crops. Farther west, much of Pakistan recorded adequate monsoonal rains, aiding irrigation reserves in the north. In the south, seasonal totals climbed above 150% of normal as heavy rains fell on Sind province the past few weeks. In Bangladesh, although reliable data is lacking, it appears as though the season-to-date monsoon rainfall has been somewhat below normal, similar to conditions in northeastern India. Not surprisingly, there have been few reports concerning flooding along Bangladesh's rivers.



Through September 3, most of India and Pakistan have observed near to above normal monsoonal rains (Figure 2), with only parts of northern, northeastern, and southeastern India, Bangladesh, and west-central Pakistan receiving subnormal rains. According to the latest report, 29 of 35 Indian weather districts had normal or better rainfall during June 1-August 23. Largest seasonal amounts (over 1000 mm [40 inches]) were along the southwestern Indian coast and in east-central, northwestern, and northeastern India (Figure 3).

By September 1, the monsoon normally begins to retreat southeastward into India, and by the end of September, it is typically into southern India (Figure 4). A timely withdrawal of the monsoon will also be important this year, especially in irrigated cotton areas of northwest India and Pakistan. In years past, untimely rains and flooding during September damaged open bolls and disrupted spraying for pests and diseases.

- David Miskus and Mark Brusberg

(Figures 3 and 4 on back page)

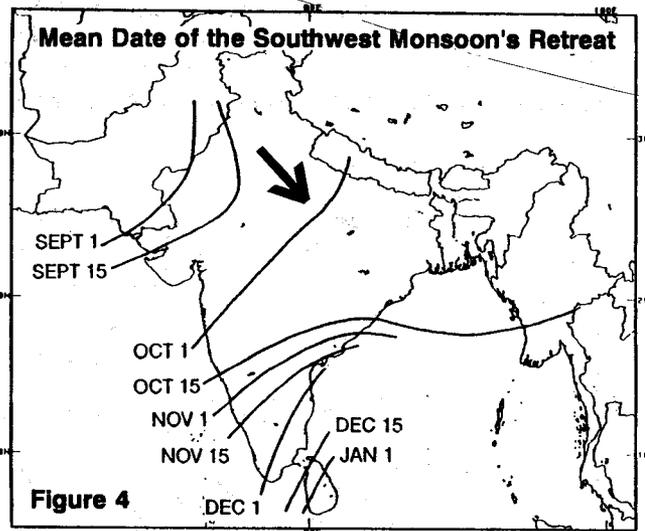
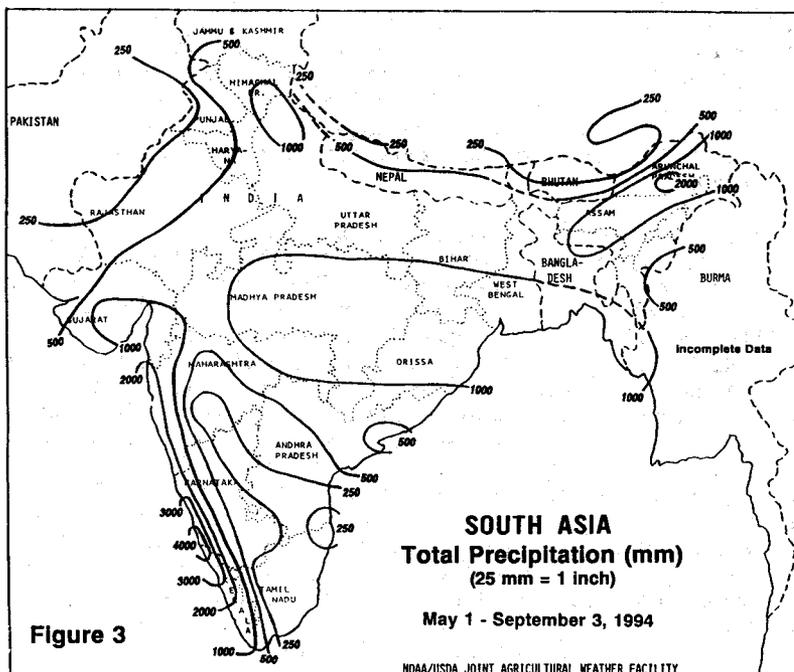
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(Continued from p. 27)



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