

MAY 1991: May 1991 goes down in history as the month with 8 significant all-time heat records in Washington (see front cover). A mid-summer jet stream with a subtropical high pressure system located over the Southeast pumped unseasonable heat and humidity over the mid-Atlantic for extended periods during the month. Most of the 90°F and higher readings occurred during a seven day period from the 25th to the end of May. When cool air intrusions did occur, they arrived from the northeast (back-door variety). As a result, they were weaker in intensity and lasted only a few days. Thus, cool weather was the result of either cloudy and/or rainy days. With the jet stream well to the north, rainfall was scattered and infrequent with the majority (0.5" – 2.5") falling on May 6th, with early morning tropical downpours and late afternoon thunderstorms. Except for thunderstorms that intensified east of Washington on the 14th, [which gave as much as 3" of rain to one observer in Calvert County (MBH)], the majority of the Washington/Baltimore area received under two inches of rain, well below the normal 3.5". With the extreme heat at the end of the month, the topsoil became hard and dry throughout most of the region.

MAY 1991 WEATHER STATISTICS FOR THE WASHINGTON/BALTIMORE AREA:

Station Location	Temperatures (°F)					Extreme/Day		Precipitation (In)		
	AvMx	AvMn	AvgT	NmlT	DepNm	MaxT	MinT	Total	Norm	DepNm
National (DCA)	83.1	62.8	73.0	66.0	+7.0	99/31	51/4*	1.57	3.48	-1.91
Baltimore (BWI)	82.5	58.5	70.5	63.4	+7.1	98/30	45/3#	1.16	3.44	-2.28
Dulles (IAD)	81.5	57.1	69.3	62.4	+6.9	95/29@	42/3	1.51	3.62	-2.11
Ft. Belvoir (DAA)	82.6	58.4	70.5	64	+7	97/31	45/2&	2.03	3.8	-1.8
Andrews AFB (ADW)	80.1	57.4	68.7	64	+5	96/30	44/8%	2.87	4.0	-1.1

Other dates of occurrence: * May 8th; @ May 30th; & May 3rd; % May 20th.

SPRING (MARCH-MAY) 1991: May's extreme heat lifted temperatures to the second warmest Spring ever recorded at Washington/National and BWI, and the warmest at IAD. Only the Spring of 1977 (Avg. Temp: 60.7°F) topped 1991 at DCA. Temperatures were above normal all three months with few cold Canadian air masses, producing seasonal departures of more than +4°F at three of the five airports. Precipitation was below normal for the season despite a wet March. April and May precipitation totals were under two inches in most areas, making this the driest Spring since 1986.

SPRING 1991 WEATHER STATISTICS FOR THE WASHINGTON/BALTIMORE AREA:

Station Location	Temperatures (°F)					Extreme/Day		Precipitation (In)			
	AvMx	AvMn	AvgT	NmlT	DepNm	MaxT	MinT	Total	Norm	DepNm	Snow
National (DCA)	69.4	50.6	60.0	56.2	+3.8	99/5-31	28/3-12	7.38	9.87	-2.49	T
Baltimore (BWI)	68.2	47.2	57.7	53.6	+4.1	98/5-30	24/3-9	8.49	10.51	-2.02	0.3
Dulles (IAD)	68.6	45.6	57.1	52.7	+4.4	95/5-29*	23/3-10#	8.47	10.19	-1.72	3.5
Ft. Belvoir (DAA)	70.0	47.5	58.7	54.3	+4.4	97/5-31	25/3-9	8.2	10.7	-2.5	T
Andrews AFB (ADW)	67.5	46.8	57.1	54.7	+2.4	96/5-30	23/3-9	9.3	10.6	-1.3	T

Other dates of occurrence: * May 30th; # March 17th and April 3rd.

LOOKING AHEAD TO JUNE: Warm Springs = Cool Summers?

Three of the four warmest spring seasons on record at DCA have been followed by cooler than normal summer seasons. How will 1991 rank? (Normal Summer Season Avg. Temp. = 77.0°F)

Spring Ranking	Year	Avg. Spring T	Dep Nml	Avg Summer T	Dep Nml
1 (Warmest)	1977	60.7°F	+4.5	78.0°F	+1.0
2	1991	60.0°F	+3.8	?	?
3	1945	59.3°F	+3.1	75.2°F	-1.8
4	1985	59.1°F	+2.9	76.0°F	-1.0
5	1921	59.0°F	+2.8	75.4°F	-1.6