

SUMMARY OF HYDROLOGIC CONDITIONS FOR THE UPPER DELAWARE RIVER BASIN NOVEMBER 1999

**Prepared by
the Office of the Delaware River Master,
Milford, Pennsylvania**

Adjusted streamflow in the upper Delaware River basin during November was within the normal range. The maximum daily discharge of 12,900 cfs occurred on November 28. The minimum daily discharge was 1,740 cfs on November 24.

On the basis of a 5-station average, precipitation during November was 2.98 inches, which was 77 percent of the 58-year average. The maximum daily-average precipitation during November was 1.30 inches on November 27. Precipitation in the upper Delaware River Basin during the past 12 months was 2.56 inches less than the long-term average. Precipitation during November was 0.89 inches less than the long-term average for the month.

The monthly mean streamflow of the Delaware River at Montague, N.J. during November was 3,381 cfs (observed), which was 71 percent of the median. The flow at Montague, adjusted for diversions from the basin and change in storage in the major reservoirs was 5,248 cfs, or 98 percent of median (water years 1961-90).

Storage December 1, 1999 in Pepacton, Cannonsville and Neversink Reservoirs was 65.4 percent of capacity above the point of maximum depletion. The combined storage of 177 billion gallons was 12 billion gallons greater than that of one month ago and was 57 billion gallons more than that of one year ago. Median storage on the first day of December in 32 years of record is 164 billion gallons.

As part of a statewide network, the USGS operates 14 observation wells in the Pennsylvania part of the Delaware River Basin. Mean water levels during November were below average in 7 of the wells. Most observation well levels were trending downward in comparison to October levels.

HYDROLOGIC CONDITIONS IN THE UPPER DELAWARE RIVER BASIN Compiled by the Office of the Delaware River Master, Milford, Pa. (Preliminary data - subject to revision) PRECIPITATION, IN INCHES

	Dec. 1940 to Nov. 1998		December 1998 to November 1999					
	Average		Actual		Percent of average		Excess (+) or deficit (-)	
	Amount	Cumulative	Amount	Cumulative	By month	Cumulative	By month	Cumulative
Dec.	3.40	43.24	1.53	40.68	45	94	-1.87	-2.56
Jan.	2.97	39.84	5.65	39.15	190	98	+2.68	-.69
Feb.	2.66	36.87	1.67	33.50	63	91	-.99	-3.37
Mar.	3.30	34.21	4.40	31.83	133	93	+1.10	-2.38
Apr.	3.78	30.91	2.29	27.43	61	89	-1.49	-3.48
May	4.19	27.13	3.32	25.14	79	93	-.87	-1.99
June	3.94	22.94	2.28	21.82	58	95	-1.66	-1.12
July	4.12	19.00	1.71	19.54	42	103	-2.41	+.54

Note: Amount shown in cumulative columns is total from month shown to present.

Aug.	3.87	14.88	3.05	17.83	79	120	-.82	+2.95
Sept.	3.74	11.01	9.08	14.78	243	134	+5.34	+3.77
Oct.	3.40	7.27	2.72	5.70	80	78	-.68	-1.57
Nov.	3.87	3.87	2.98	2.98	77	77	-.89	-.89

Note: Amount shown in cumulative columns is total from month shown to present.

STREAMFLOW, IN CFS						
DELAWARE RIVER AT MONTAGUE, N.J.						
Month	1940-98				1999	Percent of
	Maximum	Median	Minimum		Monthly mean	median
November (observed)	11,760 (1951)	4,730	995	(1964)	3,381	71
November (adjusted)	16,160 (1972)	6,262	390	(1964)	5,248	84
December (observed)	18,830 (1996)	4,943	1,968	(1964)		
December (adjusted)	20,880 (1973)	6,735	2,051	(1946)		