

**SUMMARY OF HYDROLOGIC CONDITIONS
IN THE
UPPER DELAWARE RIVER BASIN
April 2009**

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

Adjusted streamflow in the upper Delaware River Basin during April was deficient. The maximum daily mean discharge of 10,900 cfs was recorded on April 5. The minimum daily mean discharge was 2,490 cfs on April 30.

The observed monthly mean streamflow of the Delaware River at Montague, N.J. during April was 5,407 cfs, which is 47 percent of median. The flow at Montague, adjusted for diversions from the basin and change in storage in the major reservoirs, was 6,711 cfs, or 52 percent of median (water years 1971-2000).

On the basis of a 5-station average, precipitation during April was 2.22 inches, which is 59 percent of the 68-year average. The maximum daily-average precipitation during the month was 0.70 inches on April 4. Precipitation in the upper Delaware River Basin during the past 12 months was 3.08 inches less than the long-term average. Precipitation during April was 1.56 inches less than the long-term average for the month.

Combined storage May 1, 2009 in Pepacton, Cannonsville, and Neversink Reservoirs was 98 percent of capacity above the point of maximum depletion. The combined storage of 266 billion gallons was 2 billion gallons more than that of one month ago and slightly more than that of one year ago. Median storage on the first day of May in 41 years of record is 271 billion gallons. Cannonsville Reservoir spilled 0.6 billion gallons during the month.

As part of statewide networks, the USGS operates ground-water observation wells in the Pennsylvania and New Jersey parts of the Delaware River Basin. Mean water levels during April were below average in 17 of 20 observation wells. Water levels in 14 of the wells were above March 2009 levels, and water levels in 17 of the wells were below April 2008 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 Apr. 2008		May 2008 to April 2009					
	Average		Actual		Percent of average		Excess (+) or deficit (-)	
	Amount	Cumulative	Amount	Cumulative	By month	Cumulative	By month	Cumulative
May	4.15	43.97	2.80	40.89	67	93	-1.35	-3.08
June	4.10	39.82	3.43	38.09	84	96	-.67	-1.73
July	4.07	35.72	6.00	34.66	147	97	+1.93	-1.06
Aug.	3.91	31.65	2.49	28.66	64	91	-1.42	-2.99
Sept.	4.04	27.74	5.04	26.17	125	94	+1.00	-1.57
Oct.	3.61	23.70	4.33	21.13	120	89	+.72	-2.57
Nov.	3.82	20.09	*2.18	16.80	57	84	-1.64	-3.29
Dec.	3.41	16.27	6.26	14.62	184	90	+2.85	-1.65
Jan.	3.05	12.86	2.52	8.36	83	65	-.53	-4.50
Feb.	2.65	9.81	1.30	5.84	49	60	-1.35	-3.97
Mar.	3.38	7.16	2.32	4.54	69	63	-1.06	-2.62
Apr.	3.78	3.78	2.22	2.22	59	59	-1.56	-1.56

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

* Revised since last month.

STREAMFLOW, IN CFS

DELAWARE RIVER AT MONTAGUE, N.J.

Month	1940-2007			2009 Monthly mean	Percent of median
	Maximum	Median	Minimum		
April (observed)	31,560 (1940)	11,385	3,322 (1985)	5,407	47
April (adjusted)	33,010 (1940)	13,810	3,847 (1946)	6,711	49
May (observed)	16,090 (1943)	6,792	2,215 (1965)		
May (adjusted)	18,970 (1989)	8,026	2,944 (1941)		