

Delaware River Flow and Storage Data -December 2015 Summary



DAY	Delaware at Montague		Lehigh River			Delaware at Trenton		Schuylkill River			Salt Front	New York City	
	Flow (cfs)		Flow (cfs)		Min DO (mg/l)	Flow (cfs)		Flow (cfs)		Max Temp (C)		Delaware River Basin Storage	
	8:00 AM	Mean	Lehighton	Bethlehem	Glendon	8:00 AM	Mean	Pottstown	Philadelphia	Vincent Dam	RM	(BG)	Capacity
12/1/2015	2,720	2,940	651	1,380		5,930	6,010	1,080	1,250		73	193.5	71.4%
12/2/2015	3,760	4,150	818	1,800		6,640	6,770	1,630	2,030		73	193.7	71.5%
12/3/2015	5,930	6,320	1,100	2,240		8,530	8,830	2,020	2,720		73	194.3	71.7%
12/4/2015	6,450	6,630	1,270	2,300		11,100	11,400	1,830	2,480		73	194.8	71.9%
12/5/2015	5,430	5,090	1,150	2,140		12,000	11,800	1,500	1,960		73	195.3	72.1%
12/6/2015	4,170	4,170	1,100	1,990		10,800	10,400	1,380	1,680		73	195.6	72.2%
12/7/2015	3,860	4,090	1,020	1,930		8,900	8,810	1,310	1,550		73	196.0	72.4%
12/8/2015	3,740	3,790	816	1,760		8,690	8,430	1,360	1,510		73	196.2	72.4%
12/9/2015	3,510	4,000	724	1,610		7,870	7,760	1,240	1,490		73	196.4	72.5%
12/10/2015	3,330	3,840	709	1,500		7,780	7,570	1,180	1,380		73	196.6	72.6%
12/11/2015	3,530	3,420	704	1,440		7,780	7,470	1,120	1,300		73	196.9	72.7%
12/12/2015	3,010	3,070	699	1,410		7,340	7,160	1,050	1,200		73	197.1	72.8%
12/13/2015	2,870	2,900	686	1,370		6,550	6,510	997	1,150		73	197.3	72.8%
12/14/2015	2,760	2,900	686	1,360		6,150	6,180	964	1,110		73	197.5	72.9%
12/15/2015	2,850	3,100	880	1,670		6,020	6,180	1,060	1,190		73	197.8	73.0%
12/16/2015	3,970	4,070	837	1,680		6,780	6,760	1,220	1,310		73	198.4	73.2%
12/17/2015	3,880	3,990	875	1,910		7,290	7,800	1,160	1,890		73	198.8	73.4%
12/18/2015	4,240	4,770	940	2,030		11,000	10,600	1,360	3,420		73	199.4	73.6%
12/19/2015	4,850	4,910	842	1,800		10,400	10,300	1,230	2,110		73	199.8	73.8%
12/20/2015	4,390	4,340	799	1,640		9,880	9,750	1,110	1,630		73	200.3	73.9%
12/21/2015	3,930	4,030	786	1,610		9,110	8,870	1,060	1,440		73	200.8	74.1%
12/22/2015	4,740	4,470	827	1,660		8,180	8,090	1,070	1,350		73	201.3	74.3%
12/23/2015	4,590	5,010	1,020	2,050		8,690	9,010	1,320	1,670		73	202.5	74.8%
12/24/2015	7,430	9,860	1,810	5,070		15,800	16,200	4,180	7,180		73	203.9	75.3%
12/25/2015	11,300	11,500	1,550	4,130		19,700	21,100	4,850	6,280		72	205.4	75.8%
12/26/2015	8,970	9,200	1,430	3,500		20,400	20,200	3,780	4,950		72	206.6	76.3%
12/27/2015	8,040	8,100	1,440	3,380		17,000	17,100	2,840	3,850		72	207.7	76.7%
12/28/2015	7,030	7,330	1,540	3,210		16,100	15,800	2,800	3,510		71	209.1	77.2%
12/29/2015	6,450	6,920	2,300	5,070		15,700	18,000	4,050	7,510		71	210.5	77.7%
12/30/2015	6,280	6,730	2,360	5,350		20,100	19,700	5,080	7,570		71	211.5	78.1%
12/31/2015	6,450	7,360	2,110	4,820		18,400	18,100	4,700	6,230		71	213.0	78.6%

Observed Average	5,258	1,112	2,413			10,925	1,985	2,771		69		
Mean Monthly	5,050	1,878	3,228			12,925	2,427	3,612				
% of Normal	104.1%	59.2%	74.8%			84.5%	81.8%	76.7%				

TODAY'S RESERVOIR OBSERVATIONS: 12/31/2015														
*Lower Delaware Basin:			New York City 24-hr, as of 8 am:						NYC Daily Storage (BG)=				213.0	78.6%
	Vol. (BG)	Capacity		Precip	Usable	Storage	Draft	Directed Rel	NYC Daily Storage Median (BG)=			224.7	83.0%	
Blue Marsh	4.49	101.3%		(inches)	(BG)	(%)	(MG)	(MG)	BG Below Daily Storage Median =			11.8	-5.23%	
Beltzville	13.54	100.4%		Neversink	0.00	32.8	93.9%	198	0	BG Above Drought Watch =			87.1	
				Pepacton	0.01	107.2	76.6%	0	0	BG Above Drought Warning =			107.1	
Blue Marsh	0	Merrill Creek	0	Cannonsville	0.00	73.0	76.2%	0	0	BG Above Drought =			127.1	
Beltzville	0	Wallenpaupack	0	Rondout	0.00	47.4	95.5%	408	0	BG Above One Year Ago =			30.2	

*Percent capacity in Blue Marsh Reservoir is based upon the normal winter pool storage of 4.43 BG. Percent capacity for Beltzville Reservoir is based upon the year-round, normal pool storage of 13.49 BG. Directed Release from NYC Reservoirs is the amount of water needed to meet the Montague Flow Objective.

DATA SOURCES:
 Storage data provided by New York City Department of Environmental Protection, Bureau of Water Supply. http://www.nyc.gov/html/dep/html/drinking_water/maplevels_wide.shtml
 Flow data provided by U.S. Geological Survey <http://waterdata.usgs.gov/nwis/r1>
 Chloride data for the salt front calculation provided by U.S. Geological Survey and Kimberly Clark Corporation.
 Lower Basin reservoir storage data provided by Philadelphia District Corps of Engineers. See basin summaries at <http://www.nap-wc.usace.army.mil/nap/>
 ALL DATA ARE PROVISIONAL

NOTES:
 The Salt Front is the estimated location of the 7-day average chloride concentration of 250 milligrams/liter (mg/L).
 Releases from F.E. Walter are requested from the U.S. Army Corps of Engineers and are made from the reservoir's temporary drought storage.
 Directed releases from Lake Wallenpaupack are estimated values supplied by PPL.
 Lower Basin reservoir percentages are a percent of allocated storage, not total storage. More than 19.3 billion gallons of flood control is available in Beltzville and Blue Marsh reservoirs.
 cfs=Cubic Feet per Second; DO= Dissolved Oxygen; MG= Million Gallons; BG=Billion Gallons

1. During cold weather, ice effects on stage and discharge determinations at some stream-gaging stations are likely. Flow values reported on this report may be significantly higher or lower than actual streamflow. Revisions will be made as needed when adjusted data becomes available.
2. The location of the salt front is estimated. The salt front river mile location will be updated as chloride data is received. DRBC does not track the salt front below river mile 54. The normal location of the salt front represents the median monthly calculated value based upon values from 1/1998 through 2/28/2013.
3. Normal flow values represent the median of monthly means for the period of record after construction completion of major reservoirs regulating their flow (NYC Reservoirs: Montague 1956-2011; FE Walter and Beltzville: Bethlehem and Trenton 1971-2011, Lehighton 1983-2011; Blue Marsh: Pottstown and Philadelphia 1980-2011).
4. Minimum dissolved oxygen for the Lehigh River at Glendon and the maximum temperature at the Schuylkill River at Vincent Dam will be reported for the period June through September.
5. NYC Storage Median based on beginning of month values reported to the Delaware River Master from June 1967 - May 2013.
6. Drought Watch, Warning and Drought are defined by Figure 1 of Article 2 in the Delaware River Basin Water Code 18 CFR Part 410.