



Water-Data Report 2011

**01595800 NORTH BRANCH POTOMAC RIVER AT BARNUM, WV**

Potomac Basin  
North Branch Potomac Subbasin

LOCATION.--Lat 39°26'42.4", long 79°06'38.9" referenced to North American Datum of 1983, Mineral County, WV, Hydrologic Unit 02070002, on right bank at highway bridge at Barnum, W. Va., 0.4 mi upstream from Folly Run, and 4.0 mi southwest of Piedmont, W. Va., and at mile 59.4.

DRAINAGE AREA.--266 mi<sup>2</sup>.

**SURFACE-WATER RECORDS**

PERIOD OF RECORD.--July 1966 to September 1985, October 1985 to September 2003 (operated as a partial-record station only), October 2003 to current year.

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is 1,151.82 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--No estimated daily discharges. Records good below 5,000 ft<sup>3</sup>/s and fair above. Prior to July 1981 regulation at low flow by Stony River Reservoir, 39 mi upstream from station (see station 01595200). Since July 1981 complete regulation by Jennings Randolph Lake, 1.5 mi upstream from station, capacity 96,600 acre-ft. U.S. Army Corps of Engineers satellite collection platform at station. Several measurements of water temperature were made during the year. Water-quality records for some prior periods have been collected at this location.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 6,920 ft<sup>3</sup>/s, May 17, gage height, 8.20 ft; minimum discharge, 39 ft<sup>3</sup>/s, Aug. 31.

## 01595800 NORTH BRANCH POTOMAC RIVER AT BARNUM, WV—Continued

**DISCHARGE, CUBIC FEET PER SECOND**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**  
**DAILY MEAN VALUES**

<b>Day</b>	<b>Oct</b>	<b>Nov</b>	<b>Dec</b>	<b>Jan</b>	<b>Feb</b>	<b>Mar</b>	<b>Apr</b>	<b>May</b>	<b>Jun</b>	<b>Jul</b>	<b>Aug</b>	<b>Sep</b>
<b>1</b>	132	118	119	118	120	2,440	293	1,030	453	289	194	194
<b>2</b>	132	117	163	119	121	1,910	295	890	366	273	194	194
<b>3</b>	131	117	217	119	121	1,540	498	692	329	274	194	193
<b>4</b>	131	119	219	119	168	1,230	755	554	307	274	194	194
<b>5</b>	131	118	220	119	202	1,040	1,300	493	307	273	197	200
<b>6</b>	131	118	219	119	349	1,050	1,570	492	307	254	198	231
<b>7</b>	121	117	218	119	495	1,050	1,250	492	306	248	197	431
<b>8</b>	130	100	218	120	494	1,040	996	492	306	249	204	2,420
<b>9</b>	225	89	219	119	494	1,050	1,010	433	306	248	199	2,440
<b>10</b>	263	97	218	119	494	1,100	1,040	392	306	248	199	1,060
<b>11</b>	263	102	218	119	492	1,520	1,040	392	306	248	198	1,050
<b>12</b>	262	100	217	119	491	2,020	1,050	326	305	248	198	645
<b>13</b>	262	100	218	119	490	2,020	1,760	471	305	248	198	324
<b>14</b>	261	99	217	118	492	2,010	1,830	1,010	286	247	198	298
<b>15</b>	260	99	216	119	427	2,000	1,330	1,300	271	247	198	303
<b>16</b>	260	101	190	119	374	1,760	1,840	1,370	262	247	198	300
<b>17</b>	259	99	170	119	377	1,320	2,370	2,820	255	246	197	300
<b>18</b>	177	99	170	120	381	1,040	2,790	3,090	256	246	197	300
<b>19</b>	127	98	171	118	387	1,030	3,080	3,350	256	246	199	311
<b>20</b>	127	98	170	118	391	1,030	4,350	4,940	1,700	246	197	300
<b>21</b>	127	98	155	118	401	894	3,630	2,890	1,540	245	197	299
<b>22</b>	127	98	142	118	954	788	1,840	1,200	542	245	197	299
<b>23</b>	127	98	142	118	1,570	799	1,530	970	543	245	196	299
<b>24</b>	127	98	128	118	1,560	1,420	2,130	731	416	245	196	298
<b>25</b>	125	99	118	118	2,040	1,590	1,870	490	343	215	197	298
<b>26</b>	124	99	118	120	2,450	1,310	1,230	414	342	196	196	298
<b>27</b>	122	98	118	119	2,430	1,070	1,610	1,030	342	195	197	303
<b>28</b>	119	98	117	119	2,430	967	2,010	1,480	318	195	197	295
<b>29</b>	118	98	118	119	---	667	2,000	954	301	195	196	278
<b>30</b>	118	103	118	119	---	385	1,310	610	301	195	196	306
<b>31</b>	118	---	118	119	---	294	---	493	---	195	200	---
<b>Total</b>	5,137	3,092	5,379	3,683	21,195	39,384	49,607	36,291	12,483	7,465	6,113	14,661
<b>Mean</b>	166	103	174	119	757	1,270	1,654	1,171	416	241	197	489
<b>Max</b>	263	119	220	120	2,450	2,440	4,350	4,940	1,700	289	204	2,440
<b>Min</b>	118	89	117	118	120	294	293	326	255	195	194	193
<b>Cfsm</b>	0.62	0.39	0.65	0.45	2.85	4.78	6.22	4.40	1.56	0.91	0.74	1.84
<b>In.</b>	0.72	0.43	0.75	0.52	2.96	5.51	6.94	5.08	1.75	1.04	0.85	2.05
<b>Monthend contents, in acre-feet, in Jennings Randolph Lake (contents on Sept. 30, 2010, 68,900 acre-feet). Records furnished by U.S. Army Corp of Engineers.</b>												
	61,600	60,800	64,000	68,900	86,200	92,500	94,100	95,200	94,000	86,400	79,800	83,800

**STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1966 – 1985, 2004 – 2011, BY WATER YEAR (WY)**

	<b>Oct</b>	<b>Nov</b>	<b>Dec</b>	<b>Jan</b>	<b>Feb</b>	<b>Mar</b>	<b>Apr</b>	<b>May</b>	<b>Jun</b>	<b>Jul</b>	<b>Aug</b>	<b>Sep</b>
<b>Mean</b>	286	375	656	609	693	1,037	833	661	440	251	220	220
<b>Max</b>	1,035	1,070	1,746	1,219	1,246	2,001	1,654	1,290	1,149	985	551	546
(WY)	(1977)	(1973)	(1973)	(1974)	(1979)	(1967)	(2011)	(2008)	(1981)	(1978)	(1980)	(1971)
<b>Min</b>	28.8	103	174	108	216	259	357	105	69.1	41.3	66.5	29.1
(WY)	(1969)	(2011)	(2011)	(1981)	(1978)	(2009)	(1968)	(1982)	(1969)	(1968)	(1968)	(1968)

**01595800 NORTH BRANCH POTOMAC RIVER AT BARNUM, WV—Continued****SUMMARY STATISTICS**

	<b>Calendar Year 2010</b>	<b>Water Year 2011</b>		<b>Water Years 1966 – 1985, 2004 – 2011</b>	
<b>Annual total</b>	160,056		204,490		
<b>Annual mean</b>	439		560		524
<b>Annual mean‡</b>	428		581		526
<b>Highest annual mean</b>				690	1973
<b>Lowest annual mean</b>				318	1969
<b>Highest daily mean</b>	4,880	Mar 17	4,940	May 20	10,900 Jul 3, 1978
<b>Lowest daily mean</b>	89	Nov 9	89	Nov 9	10 Oct 1, 1968
<b>Annual seven-day minimum</b>	98	Nov 9	98	Nov 9	11 Sep 27, 1968
<b>Maximum peak flow</b>			6,920	May 17	<sup>a</sup> 27,100 Jul 3, 1978
<b>Maximum peak stage</b>			8.20	May 17	13.37 Jul 3, 1978
<b>Instantaneous low flow</b>			39	Aug 31	0.91 Aug 12, 1981
<b>Annual runoff (cfsm)</b>	1.65		2.11		1.97
<b>Annual runoff (cfsm)‡</b>	1.61		2.18		1.98
<b>Annual runoff (inches)</b>	22.38		28.60		26.76
<b>Annual runoff (inches)‡</b>	21.81		29.65		26.85
<b>10 percent exceeds</b>	951		1,560		1,170
<b>50 percent exceeds</b>	289		254		306
<b>90 percent exceeds</b>	118		118		90

‡ Adjusted for change in reservoir contents since October 1981.

<sup>a</sup> From rating curve extended above 8,000 ft<sup>3</sup>/s on basis of slope-area measurement of peak flow.

