

BUSH KILL BASIN

01439500 BUSH KILL AT SHOEMAKERS, PA

LOCATION.--Lat 41°05'17", long 75°02'17", Monroe County, Hydrologic Unit 02040104, on right bank 30 ft downstream from bridge on township route 523, 0.1 mi downstream from Saw Creek, 0.7 mi northwest of Shoemakers, and 2.0 mi southwest of Bushkill.

DRAINAGE AREA.--117 mi².

PERIOD OF RECORD.--October 1908 to current year. Monthly discharge only for some periods, published in WSP 1302. Prior to October 1928, published as Bushkill Creek near Shoemakers; October 1928 to September 1952, published as Bushkill Creek at Shoemakers.

REVISED RECORDS.--WSP 756: Drainage area. WSP 1202: 1921, 1932(M), 1933, 1935-36, 1938(M), 1939-40, 1942, 1945, 1946(M), 1948(M). WSP 1302: 1909-15, 1920(M), 1922-29. WDR PA-89-1: 1988.

GAGE.--Water-stage recorder. Datum of gage is 421.13 ft above sea level. Sept. 19, 1908, to Aug. 12, 1938, nonrecording gage, and Aug. 13, 1938, to June 20, 1956, water-stage recorder at site 50 ft upstream at same datum.

REMARKS.--Records good except those for estimated daily discharges, which are poor. Several measurements of water temperature were made during the year. Satellite telemetry at station.

PEAK DISCHARGES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 1,100 ft³/s and maximum (*):

Date	Time	Discharge ft ³ /s	Gage Height (ft)	Date	Time	Discharge ft ³ /s	Gage Height (ft)
Dec. 17	2100	*1,930	*4.27	No other peak greater than base discharge.			

**DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 2000 TO SEPTEMBER 2001
DAILY MEAN VALUES**

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	47	51	121	e260	318	184	845	141	209	112	21	18
2	45	48	118	e250	248	181	730	133	365	110	20	20
3	45	44	112	e240	173	172	643	126	407	90	18	18
4	45	42	e120	e230	163	170	594	121	374	84	28	18
5	48	40	e120	e220	157	178	558	116	306	83	47	16
6	55	37	e110	e200	174	168	543	113	258	75	38	14
7	53	36	e110	e180	151	165	543	111	223	66	31	13
8	48	34	e100	e180	134	162	525	111	194	97	32	12
9	45	35	e90	e170	125	163	515	111	165	120	33	11
10	45	105	e86	e170	134	156	689	103	148	95	29	10
11	44	141	e84	e160	152	150	611	95	142	98	37	15
12	49	116	84	e150	167	147	552	89	227	86	41	14
13	61	98	87	e160	162	256	506	83	169	70	50	14
14	65	97	123	e160	130	318	443	75	138	63	51	19
15	63	106	122	e160	137	294	389	71	122	57	38	20
16	60	96	118	e150	142	290	369	67	118	54	30	18
17	59	91	1040	e150	160	336	351	65	440	52	28	15
18	109	86	1420	e140	148	362	359	69	357	50	27	14
19	150	80	971	e180	168	356	317	71	267	47	26	13
20	118	75	762	e200	140	373	284	64	216	43	23	24
21	101	70	e560	e170	142	423	263	64	203	39	21	282
22	87	65	e460	e180	132	625	281	155	181	36	20	139
23	78	63	e400	e140	142	689	254	238	250	32	20	95
24	67	e62	e380	e120	153	728	232	188	271	31	20	64
25	62	e62	e360	e130	154	665	208	150	204	29	21	301
26	58	88	e340	e130	222	596	191	178	167	32	20	248
27	57	143	e320	e130	218	528	180	410	142	35	17	178
28	62	126	e300	e120	203	481	167	444	125	30	16	138
29	66	119	e280	e120	---	457	156	360	118	27	17	126
30	61	120	e270	e200	---	846	148	299	114	24	16	114
31	55	---	e260	350	---	999	---	242	---	23	17	---
TOTAL	2008	2376	9828	5500	4649	11618	12446	4663	6620	1890	853	2001
MEAN	64.8	79.2	317	177	166	375	415	150	221	61.0	27.5	66.7
MAX	150	143	1420	350	318	999	845	444	440	120	51	301
MIN	44	34	84	120	125	147	148	64	114	23	16	10
CFSM	.55	.68	2.71	1.52	1.42	3.20	3.55	1.29	1.89	.52	.24	.57
IN.	.64	.76	3.12	1.75	1.48	3.69	3.96	1.48	2.10	.60	.27	.64

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1909 - 2001, BY WATER YEAR (WY)

MEAN	122	210	264	259	274	434	431	302	193	128	97.3	92.6
MAX	773	643	841	807	706	1119	1002	773	919	747	864	569
(WY)	1956	1933	1997	1979	1909	1936	1993	1989	1972	1945	1955	1933
MIN	7.74	13.6	21.7	44.2	39.7	156	141	90.7	32.8	13.4	8.33	4.39
(WY)	1965	1965	1999	1981	1934	1981	1985	1941	1962	1999	1964	1964

e Estimated.

BUSH KILL BASIN

01439500 BUSH KILL AT SHOEMAKERS, PA--Continued

SUMMARY STATISTICS	FOR 2000 CALENDAR YEAR		FOR 2001 WATER YEAR		WATER YEARS 1909 - 2001	
ANNUAL TOTAL	78518		64452			
ANNUAL MEAN	215		177		234	
HIGHEST ANNUAL MEAN					419	1928
LOWEST ANNUAL MEAN					95.4	1965
HIGHEST DAILY MEAN	1420	Dec 18	1420	Dec 18	11800	Aug 19 1955
LOWEST DAILY MEAN	34	Nov 8	10	Sep 10	2.6	Sep 25 1964
ANNUAL SEVEN-DAY MINIMUM	38	Nov 3	13	Sep 6	2.7	Sep 21 1964
MAXIMUM PEAK FLOW			1930	Dec 17	a 23400	Aug 19 1955
MAXIMUM PEAK STAGE			4.27	Dec 17	b 13.95	Aug 19 1955
INSTANTANEOUS LOW FLOW					2.6	Sep 25 1964
ANNUAL RUNOFF (CFSM)	1.83		1.51		2.00	
ANNUAL RUNOFF (INCHES)	24.96		20.49		27.13	
10 PERCENT EXCEEDS	434		393		520	
50 PERCENT EXCEEDS	160		123		160	
90 PERCENT EXCEEDS	62		24		27	

a From rating curve extended above 2,600 ft³/s on basis of slope-area measurement of peak flow.
b From floodmark.

