

LEHIGH RIVER BASIN

01447680 TUNKHANNOCK CREEK NEAR LONG POND, PA

LOCATION.--Lat 41°03'55", long 75°31'19", Monroe County, Hydrologic Unit 02040106, on left bank 0.6 mi downstream from unnamed tributary, 0.9 mi downstream from bridge on SR 4002, 3.0 mi west of Long Pond, and 5.0 mi upstream from mouth.

DRAINAGE AREA.--20.0 mi². At site used prior to July 7, 1966, 16.8 mi².

PERIOD OF RECORD.--March 1965 to current year.

REVISED RECORDS.--WDR PA-90-1: 1990 (monthly runoff); WDR PA-01-1: Drainage area.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 1,804.83 ft above National Geodetic Vertical Datum of 1929. Prior to July 7, 1966, nonrecording gage at site 0.8 mi upstream at different datum.

REMARKS.--Records fair except those for estimated daily discharges, which are poor. Diversion upstream to Wild Creek Basin since October 1969. Several measurements of water temperature were made during the year. Satellite telemetry at station.

COOPERATION.--Records of diversion provided by the city of Bethlehem.

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 2002 TO SEPTEMBER 2003
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	37	40	39	71	e28	34	153	41	185	64	29	36
2	24	40	36	102	29	36	129	38	226	60	32	46
3	18	38	e34	90	29	e44	123	38	191	56	35	57
4	17	35	e32	76	35	e33	111	36	144	52	47	68
5	18	33	30	86	e40	e36	100	35	107	48	61	67
6	21	38	e30	70	e36	e69	96	35	87	45	91	61
7	19	47	e30	58	e31	e55	93	35	86	44	99	52
8	15	44	30	55	e29	39	83	37	123	45	102	44
9	13	36	e29	55	e28	e37	78	37	118	45	90	39
10	13	33	e28	57	27	e34	79	36	95	43	138	35
11	47	32	30	e55	26	e30	92	34	75	45	107	31
12	142	36	47	e50	25	27	100	36	91	45	107	29
13	171	51	59	e46	e24	29	94	36	163	42	96	29
14	146	54	83	e44	e24	e29	80	34	174	39	83	34
15	107	44	104	e40	24	30	67	32	143	35	70	109
16	96	40	e94	e38	22	41	60	29	104	33	60	212
17	141	69	e79	e38	37	76	59	29	79	31	55	239
18	137	97	e65	e37	58	114	57	28	78	32	51	185
19	123	101	55	e36	51	140	58	26	85	35	48	153
20	93	86	89	e35	38	141	55	25	101	35	44	119
21	66	73	142	e34	27	252	51	27	262	35	41	101
22	51	66	140	e34	28	335	50	33	357	63	39	90
23	41	65	115	e34	e48	339	48	30	355	84	37	313
24	39	64	86	e33	e75	268	47	32	276	100	35	371
25	38	56	264	e32	e56	199	47	38	192	86	34	327
26	52	49	385	e30	e46	160	49	54	136	68	33	217
27	69	45	74	e30	e39	150	68	76	103	51	32	154
28	65	42	69	e32	36	135	60	57	88	42	31	125
29	52	40	62	e29	---	142	47	46	77	37	30	112
30	43	40	56	e28	---	195	44	39	69	33	31	103
31	40	---	55	e28	---	188	---	42	---	30	30	---
TOTAL	1954	1534	2471	1483	996	3437	2278	1151	4370	1503	1818	3558
MEAN	63.0	51.1	79.7	47.8	35.6	111	75.9	37.1	146	48.5	58.6	119
MAX	171	101	385	102	75	339	153	76	357	100	138	371
MIN	13	32	28	28	22	27	44	25	69	30	29	29
(†)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

† Diversion to Wild Creek Basin, equivalent in cubic feet per second.

e Estimated.

LEHIGH RIVER BASIN

01447680 TUNKHANNOCK CREEK NEAR LONG POND, PA--Continued

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1970 - 2003, BY WATER YEAR (WY) (SINCE REGULATION)

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	33.9	43.1	52.5	46.5	44.8	66.0	79.9	58.0	46.1	28.5	21.5	29.0
MAX (WY)	1978	1971	1997	1996	1996	1977	1993	1990	2003	1984	1990	1987
MIN (WY)	2001	1981	1981	1981	1980	1989	1985	1999	1999	1999	1999	1995

SUMMARY STATISTICS FOR 2002 CALENDAR YEAR FOR 2003 WATER YEAR WATER YEARS 1970 - 2003

ANNUAL TOTAL	15375.5	26553	
ANNUAL MEAN	42.1	72.7	45.8
HIGHEST ANNUAL MEAN			72.7 2003
LOWEST ANNUAL MEAN			22.2 2001
HIGHEST DAILY MEAN	385 Dec 26	385 Dec 26	643 Apr 6 1984
LOWEST DAILY MEAN	6.3 Sep 14	13 Oct 9,10	1.4 Aug 11,12 1999
ANNUAL SEVEN-DAY MINIMUM	7.5 Sep 9	17 Oct 4	1.7 Aug 7 1999
MAXIMUM PEAK FLOW		505 Dec 25	679 Apr 6 1984
MAXIMUM PEAK STAGE		4.02 Dec 25	4.76 Apr 6 1984
10 PERCENT EXCEEDS	85	142	92
50 PERCENT EXCEEDS	34	48	32
90 PERCENT EXCEEDS	12	29	10

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1965 - 1969, BY WATER YEAR (WY) (PRIOR TO REGULATION)

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	21.5	29.2	37.5	25.7	23.3	55.7	42.6	38.3	38.8	26.6	27.7	16.0
MAX (WY)	1966	1969	1969	1969	1968	1966	1967	1968	1969	1969	1969	1969
MIN (WY)	1969	1966	1966	1966	1967	1969	1966	1965	1965	1965	1966	1966

SUMMARY STATISTICS WATER YEARS 1965 - 1969

ANNUAL TOTAL ANNUAL MEAN	33.8	
HIGHEST ANNUAL MEAN	47.0	1969
LOWEST ANNUAL MEAN	24.7	1966
HIGHEST DAILY MEAN	448	Jul 30 1969
LOWEST DAILY MEAN	4.0	Sep 13 1966
ANNUAL SEVEN DAY MINIMUM	4.7	Sep 8 1966
MAXIMUM PEAK FLOW	480	Jul 30 1969
MAXIMUM PEAK STAGE	4.34	Jul 30 1969
INSTANTANEOUS LOW FLOW	3.0	Mar 11 1969
ANNUAL RUNOFF (CFSM)	1.88	
ANNUAL RUNOFF (INCHES)	25.53	
10 PERCENT EXCEEDS	60	
50 PERCENT EXCEEDS	24	
90 PERCENT EXCEEDS	8.6	

a Computed using estimated daily discharges.

