

SCHUYLKILL RIVER BASIN

01471510 SCHUYLKILL RIVER AT READING, PA

LOCATION.--Lat 40°20'05", long 75°56'12", Berks County, Hydrologic Unit 02040203, on left bank 200 ft downstream from bridge on Penn Street at Reading, and 1.0 mi downstream from Tulpehocken Creek.

DRAINAGE AREA.--880 mi².

PERIOD OF RECORD.--May 1914 to September 1915, October 1919 to September 1930, and July 1977 to current year. Prior to October 1914 monthly discharge only, published in WSP 1302. Diversion by Schuylkill Navigation Canal included during the navigation seasons of 1914-15.

REVISED RECORD.--WDR PA-78-1: 1977.

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is 185.50 ft above sea level (Pennsylvania Railroad datum). May 7, 1914, to Sept. 30, 1930, and July 6, 1979, to Dec. 5, 1980, nonrecording gage. June 30, 1977, to July 5, 1979, water-stage recorder at site 1,500 ft downstream on right bank at same datum.

REMARKS.--Records fair except those for estimated daily discharges, which are poor. Flow regulated by Still Creek Reservoir (station 01469200) since February 1933, Blue Marsh Lake (station 01470870) since April 1979, and to some extent by Lake Ontelaunee. Several measurements of water temperature were made during the year. Satellite and landline telemetry at station.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of June 23, 1972, reached a stage of about 31.3 ft at site 1,500 ft downstream, from floodmarks, discharge, about 90,000 ft³/s.

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1998 TO SEPTEMBER 1999
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	398	436	373	e390	2040	1860	1500	921	485	352	219	269
2	455	415	366	e380	3010	1800	1390	876	473	319	215	268
3	448	379	365	e800	4100	1690	1130	845	518	352	219	272
4	463	387	366	e1400	3780	2050	1100	920	464	351	249	283
5	477	434	365	e800	3200	2100	1210	1140	436	344	247	463
6	417	489	360	e600	2560	2000	1300	979	420	347	249	622
7	450	526	357	e550	2370	2050	1280	730	413	367	247	1650
8	867	520	364	e540	2410	1820	1220	869	410	345	278	1240
9	1240	468	368	e1800	2390	1750	1190	828	410	305	263	729
10	2250	382	362	e3000	2160	1730	1410	735	388	308	267	673
11	2000	434	349	e2000	1940	1670	1210	800	364	320	262	467
12	1490	451	349	e1500	1860	1590	1580	967	362	346	259	404
13	1310	389	345	e1300	2120	1420	1550	851	367	444	278	361
14	1450	378	342	e1400	1970	1250	1480	618	401	528	970	344
15	1470	368	338	e1300	1860	1410	1440	604	467	452	774	459
16	1080	379	352	e1300	1940	1640	1460	580	435	376	413	6000
17	653	448	407	e1250	2050	1620	1390	576	394	372	314	17700
18	612	440	378	e4000	2100	1650	1080	564	619	362	292	5940
19	667	436	345	e6000	1910	1590	1020	588	605	350	277	4200
20	711	446	345	e5800	1730	1540	1160	590	490	328	263	3320
21	483	450	355	4290	1630	1630	1340	550	437	334	253	3090
22	464	448	396	4280	1540	e5000	1370	524	365	327	258	3040
23	447	420	393	4480	1460	4190	1430	585	348	261	259	2400
24	431	339	346	9430	e1300	3440	1400	710	340	257	257	1750
25	419	338	331	9640	e1200	2860	1100	917	323	249	262	1470
26	453	553	314	6260	1110	2470	1170	721	314	243	297	1340
27	618	667	306	4500	1080	2210	1320	635	312	246	290	1180
28	423	443	e300	3510	1280	2100	1290	587	316	275	288	1070
29	433	396	e350	3060	---	1880	1160	561	366	274	262	1100
30	459	382	e390	2630	---	1630	1040	549	400	264	266	3640
31	442	---	e350	2350	---	1530	---	511	---	231	275	---
TOTAL	23980	13041	11027	90540	58100	63170	38720	22431	12442	10229	9522	65744
MEAN	774	435	356	2921	2075	2038	1291	724	415	330	307	2191
MAX	2250	667	407	9640	4100	5000	1580	1140	619	528	970	17700
MIN	398	338	300	380	1080	1250	1020	511	312	231	215	268

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1977 - 1999, BY WATER YEAR (WY)

	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	
MEAN	1043	1504	2057	2028	2001	2650	2457	2039	1324	948	702	792												
MAX	3390	2791	5763	5682	3358	6484	6472	5493	3411	2907	1531	2705												
(WY)	1980	1997	1997	1979	1984	1994	1983	1989	1982	1984	1994	1987												
MIN	322	360	278	265	681	824	606	724	415	330	307	273												
(WY)	1981	1981	1981	1981	1980	1985	1985	1999	1999	1999	1999	1983												

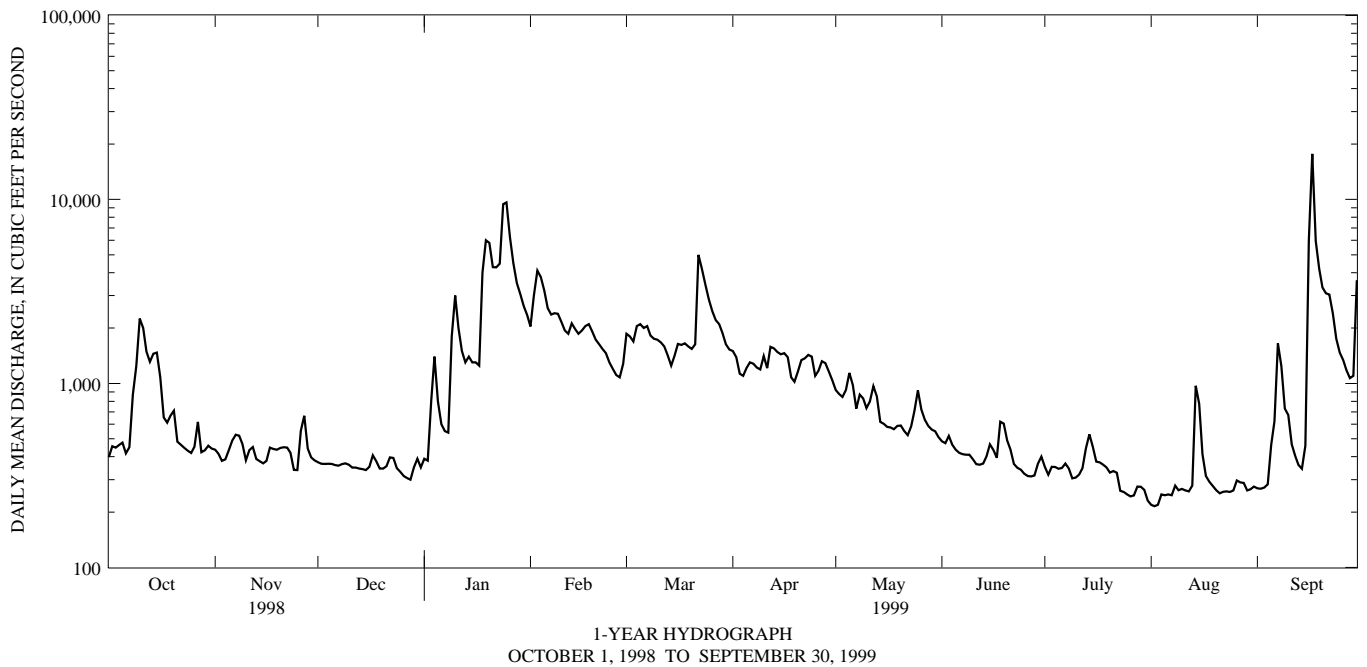
e Estimated.

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SUMMARY STATISTICS	FOR 1998 CALENDAR YEAR		FOR 1999 WATER YEAR		WATER YEARS 1977 - 1999	
ANNUAL TOTAL	625050		418946			
ANNUAL MEAN	1712		1148		1630	
HIGHEST ANNUAL MEAN					2559	1984
LOWEST ANNUAL MEAN					805	1985
HIGHEST DAILY MEAN	8950	May 12	17700	Sep 17	24700	Jan 25 1979
LOWEST DAILY MEAN	e 300	Dec 28	215	Aug 2	180	Oct 1 1980
ANNUAL SEVEN-DAY MINIMUM	a 334	Dec 24	233	Jul 31	224	Dec 24 1980
INSTANTANEOUS PEAK FLOW			26100	Sep 17	b 37500	Jan 25 1979
INSTANTANEOUS PEAK STAGE			14.95	Sep 17	c 17.36	Jan 25 1979
10 PERCENT EXCEEDS	3730		2360		3330	
50 PERCENT EXCEEDS	1140		553		1070	
90 PERCENT EXCEEDS	382		286		400	

- a** Computed using estimated daily discharges.
- b** From rating curve extended above 31,000 ft³/s.
- c** At site 1,500 ft downstream.
- e** Estimated.



1-YEAR HYDROGRAPH
OCTOBER 1, 1998 TO SEPTEMBER 30, 1999