

CLARION RIVER BASIN

03029500 CLARION RIVER AT COOKSBURG, PA

LOCATION.--Lat 41°19'50", long 79°12'33", Jefferson County, Hydrologic Unit 05010005, on right bank at downstream side of bridge on State Highway 36 at Cooksburg, 300 ft downstream from Toms Run, and 2.7 mi upstream from Cathers Run.

DRAINAGE AREA.--807 mi².

PERIOD OF RECORD.--October 1938 to current year. Monthly discharge only for October, November 1938, published in WSP 1305.

REVISED RECORDS.--WSP 1305: 1939 (M). WDR PA-85-3: 1979 (M).

GAGE.--Water-stage recorder. Datum of gage is 1,147.00 ft above sea level. Prior to May 17, 1939, nonrecording gage at same site and datum.

REMARKS.--Records good except those for estimated daily discharges, which are poor. Flow regulated since June 1952 by East Branch Clarion River Lake (station 03027000) and at low flow by industrial plants above station. Several measurements of water temperature were made during the year. U.S. Army Corps of Engineers satellite telemetry at station.

EXTREMES OUTSIDE PERIOD OF RECORD.--Maximum stage since 1935, 19 ft, Mar. 17, 1936, from floodmarks, discharge, about 56,000 ft³/s.

PEAK DISCHARGES FOR CURRENT YEAR.--Peak discharges greater than a base discharge of 10,000 ft³/s and maximum (*):

Date	Time	Discharge ft ³ /s	Gage Height (ft)	Date	Time	Discharge ft ³ /s	Gage Height (ft)
Nov. 27	0300	10,500	9.05	Apr. 4	1600	*20,600	*12.09

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1999 TO SEPTEMBER 2000
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1390	231	1420	742	e480	3570	1010	1390	1010	749	553	373
2	574	263	1190	661	e470	3840	949	1470	930	659	576	371
3	403	2910	1060	734	e460	3060	1450	1440	942	600	491	362
4	357	2070	1010	2110	e450	2470	14100	1240	820	588	521	355
5	317	1200	1020	3600	e440	2110	9660	1130	715	587	510	346
6	294	903	1090	2290	e430	1810	6100	1010	892	525	477	339
7	284	738	1310	1890	e420	1580	4180	900	1240	499	1230	335
8	272	628	1060	1680	e420	1420	5830	840	877	469	1650	332
9	270	553	929	1480	e460	1320	7040	790	712	444	904	332
10	293	504	916	1410	e510	1250	4980	749	623	467	626	333
11	299	471	1220	1690	e560	1140	4110	900	563	508	528	361
12	291	428	1110	1660	e620	1210	3520	783	843	447	494	460
13	270	395	992	1420	e690	1350	2890	716	1190	415	482	566
14	424	383	1200	1280	e760	1150	2450	724	1730	392	448	639
15	682	368	3240	1100	e840	1060	2020	721	1380	397	424	479
16	460	349	2860	1100	e810	1010	1710	619	1330	478	406	543
17	352	334	2400	1020	e780	1830	1610	582	1220	614	704	547
18	309	323	1960	667	e760	2010	1700	561	1070	498	503	469
19	289	308	1690	e650	e740	1620	1510	2980	1410	431	455	415
20	274	310	1520	e640	e710	1540	1390	3780	1180	399	426	392
21	270	338	2010	e620	e680	1520	2160	2700	992	393	390	403
22	258	359	1740	e610	e800	2640	5750	2480	2050	414	369	459
23	265	330	1460	e590	1620	2130	5330	2220	1580	427	368	441
24	280	309	1350	e580	3040	1850	4160	4020	1150	378	405	586
25	308	305	1160	e570	4970	1690	3560	3790	944	358	424	910
26	297	1760	1040	e550	8490	1570	2980	2940	835	346	409	611
27	267	8130	1100	e540	6570	1420	2580	2470	1350	338	392	612
28	246	3700	996	e530	6460	1420	2110	2090	1650	342	389	561
29	236	2370	894	e520	4580	1340	1790	1830	1050	411	385	492
30	236	1790	850	e510	---	1280	1560	1580	872	459	381	448
31	235	---	823	e500	---	1140	---	1250	---	431	374	---
TOTAL	11002	33060	42620	33944	49020	54350	110189	50695	33150	14463	16694	13872
MEAN	355	1102	1375	1095	1690	1753	3673	1635	1105	467	539	462
MAX	1390	8130	3240	3600	8490	3840	14100	4020	2050	749	1650	910
MIN	235	231	823	500	420	1010	949	561	563	338	368	332
CFSM	.44	1.37	1.70	1.36	2.09	2.17	4.55	2.03	1.37	.58	.67	.57
IN.	.51	1.52	1.96	1.56	2.26	2.51	5.08	2.34	1.53	.67	.77	.64

e Estimated.

CLARION RIVER BASIN

03029500 CLARION RIVER AT COOKSBURG, PA--Continued

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1952 - 2000, BY WATER YEAR (WY) (SINCE REGULATION)

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	785	1338	1785	1625	1759	2746	2602	1850	1196	780	628	633
MAX	2357	3906	3821	5654	4138	6185	4721	4086	5307	2565	2732	1995
(WY)	1991	1986	1978	1952	1976	1979	1994	1984	1972	1992	1994	1992
MIN	86.6	204	150	211	369	764	1217	566	325	139	117	109
(WY)	1952	1961	1961	1961	1987	1969	1976	1985	1999	1952	1952	1952

SUMMARY STATISTICS FOR 1999 CALENDAR YEAR FOR 2000 WATER YEAR WATER YEARS 1952 - 2000

ANNUAL TOTAL		455672		463059								
ANNUAL MEAN		1248		1265						1476		
HIGHEST ANNUAL MEAN										2066		1994
LOWEST ANNUAL MEAN										1077		1963
HIGHEST DAILY MEAN				19900	Jan 24		14100	Apr 4		43200		Jun 23 1972
LOWEST DAILY MEAN				227	Jun 27		231	Nov 1		59		Sep 14 1952
ANNUAL SEVEN-DAY MINIMUM				238	Sep 23		245	Oct 27		67		Sep 8 1952
INSTANTANEOUS PEAK FLOW							20600	Apr 4		a53300		Jun 23 1972
INSTANTANEOUS PEAK STAGE							12.09	Apr 4		b18.84		Jun 23 1972
INSTANTANEOUS LOW FLOW							229	Nov 1,2		57		Sep 14 1952
ANNUAL RUNOFF (CFSM)				1.55			1.57			1.83		
ANNUAL RUNOFF (INCHES)				21.00			21.35			24.84		
10 PERCENT EXCEEDS				3040			2660			3220		
50 PERCENT EXCEEDS				590			754			900		
90 PERCENT EXCEEDS				255			337			296		

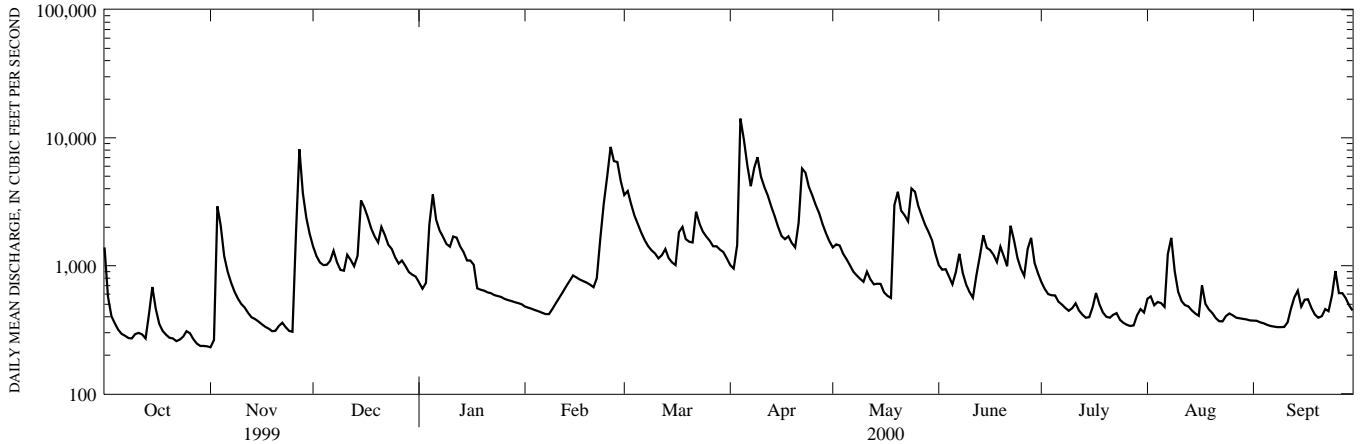
STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1939 - 1951, BY WATER YEAR (WY) (PRIOR TO REGULATION)

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	590	1085	1475	1891	1961	3055	2969	1971	1154	579	288	348
MAX	2134	4241	3050	3962	3881	6815	6288	3965	2789	1765	580	1078
(WY)	1946	1951	1941	1950	1951	1945	1940	1943	1946	1942	1950	1945
MIN	113	170	337	417	764	1610	725	606	261	158	94.2	82.8
(WY)	1950	1950	1944	1944	1941	1949	1946	1941	1939	1949	1944	1943

SUMMARY STATISTICS WATER YEARS 1939 - 1951

ANNUAL MEAN	1444	
HIGHEST ANNUAL MEAN	2023	1951
LOWEST ANNUAL MEAN	953	1944
HIGHEST DAILY MEAN	24600	Dec 30 1942
LOWEST DAILY MEAN	43	Aug 30 1939
ANNUAL SEVEN-DAY MINIMUM	50	Aug 29 1939
INSTANTANEOUS PEAK FLOW	32700	Jul 19 1942
INSTANTANEOUS PEAK STAGE	14.96	Jul 19 1942
INSTANTANEOUS LOW FLOW	41	Aug 30 1939
ANNUAL RUNOFF (CFSM)	1.79	
ANNUAL RUNOFF (INCHES)	24.31	
10 PERCENT EXCEEDS	3350	
50 PERCENT EXCEEDS	793	
90 PERCENT EXCEEDS	140	

- a From rating curve extended above 40,000 ft³/s.
- b From peak-stage indicator.



1-YEAR HYDROGRAPH
OCTOBER 1, 1999 TO SEPTEMBER 30, 2000