

## SCHUYLKILL RIVER BASIN

## 01470853 FURNACE CREEK AT ROBESONIA, PA

**LOCATION.**--Lat 40°20'24", long 76°08'37", Berks County, Hydrologic Unit 02040202, on left bank 500 ft upstream from Furnace Street in Robesonia.

**DRAINAGE AREA.**--4.18 mi<sup>2</sup>.

**PERIOD OF RECORD.**--October 1982 to current year.

**REVISED RECORDS.**--WDR PA-87-1: 1986 (P).

**GAGE.**--Water-stage recorder and crest-stage gage. Datum of gage is 527.20 ft above National Geodetic Vertical Datum of 1929. Prior to Mar. 27, 1986, 760 ft downstream at different datum.

**REMARKS.**--Records poor. Flow slightly regulated by Furnace Creek Reservoir 0.6 mi upstream, until drained in early 2002. Reservoir now acts as a retention basin and releases water through an unregulated 10 in. outlet pipe. Several measurements of water temperature were made during the year.

**PEAK DISCHARGES FOR CURRENT YEAR.**--Peak discharges greater than base discharge of 100 ft<sup>3</sup>/s and maximum (\*):

Date	Time	Discharge ft <sup>3</sup> /s	Gage Height (ft)	Date	Time	Discharge ft <sup>3</sup> /s	Gage Height (ft)
Apr. 28	2145	*41	*1.24	(No peaks above base discharge.)			

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.1	2.2	2.8	e1.4	3.3	1.1	5.7	5.5	3.8	3.0	1.3	1.4
2	2.0	2.5	1.9	e1.4	3.0	1.2	4.7	11	3.6	2.2	1.1	1.5
3	1.8	2.6	1.7	e1.5	2.5	1.7	4.5	7.9	3.2	2.3	1.2	1.3
4	1.7	2.7	1.6	e1.5	2.1	1.2	4.5	5.2	3.3	2.4	1.2	1.3
5	1.6	2.7	1.6	e1.6	e1.9	1.1	4.5	4.2	3.4	2.4	1.3	1.3
6	1.9	2.7	1.4	e1.6	1.8	0.56	4.3	3.6	6.7	2.3	1.2	1.2
7	1.7	2.6	1.2	e1.5	1.7	0.54	3.9	3.1	15	2.3	1.1	1.1
8	1.5	2.5	1.6	e1.6	1.7	1.1	3.5	2.8	4.0	2.2	1.1	1.1
9	1.4	2.1	3.4	e1.6	1.6	1.2	3.4	5.8	3.2	2.2	1.0	1.1
10	1.3	1.9	2.2	e1.7	1.5	1.3	3.4	3.5	3.2	2.2	0.96	0.96
11	1.3	1.8	1.9	e4.0	1.9	1.2	3.3	2.5	3.5	2.2	0.96	0.96
12	1.3	1.8	1.9	4.0	1.7	1.1	3.5	2.7	3.4	2.1	1.0	0.91
13	1.2	1.8	1.9	3.0	1.8	1.1	3.3	8.9	3.1	2.1	1.2	0.82
14	1.2	1.8	2.7	2.4	1.7	1.0	3.1	16	3.5	2.2	0.68	0.72
15	2.4	3.3	3.0	2.3	1.7	1.1	5.4	11	5.1	2.2	0.83	0.82
16	1.2	1.1	2.0	2.3	1.7	1.7	7.0	8.7	4.6	2.3	0.96	1.0
17	2.0	1.1	2.1	2.3	1.7	1.7	7.2	6.0	3.5	2.3	0.96	1.1
18	1.5	1.1	4.3	2.1	1.7	2.0	3.1	19	2.9	2.1	0.96	1.1
19	1.2	1.2	3.1	e2.0	1.7	1.9	4.4	10	3.7	2.0	0.96	1.1
20	0.87	1.3	2.2	e1.9	1.7	2.4	3.3	10	3.6	1.9	1.3	1.1
21	0.83	1.3	1.9	2.3	1.6	2.4	3.8	9.3	3.4	1.9	1.4	1.1
22	0.79	1.3	1.7	2.0	1.6	2.2	5.5	7.7	2.7	1.9	1.4	1.1
23	0.84	1.4	1.6	2.1	1.6	1.9	3.4	6.9	2.5	2.0	1.4	1.1
24	0.95	1.5	2.2	7.4	1.6	1.8	3.0	6.4	2.5	2.2	1.4	0.89
25	1.1	4.7	2.1	4.5	1.6	3.8	3.4	5.8	2.5	2.2	1.4	0.88
26	1.2	4.2	1.9	2.8	1.4	7.1	3.0	5.5	2.5	1.8	1.4	1.0
27	1.6	2.1	1.7	2.3	1.4	9.5	2.6	5.5	3.7	1.5	1.2	7.5
28	1.8	1.8	1.6	2.1	1.2	8.6	14	4.5	7.6	1.6	0.83	2.7
29	1.8	1.8	1.6	1.9	---	8.2	20	4.4	3.9	1.7	1.6	0.26
30	2.0	2.6	e1.7	2.0	---	6.6	8.1	4.6	3.5	1.8	1.6	0.35
31	1.9	---	e1.5	3.1	---	6.0	---	4.3	---	1.6	1.3	---
TOTAL	45.98	63.5	64.0	74.2	50.4	84.30	152.8	212.3	121.1	65.1	36.20	38.77
MEAN	1.48	2.12	2.06	2.39	1.80	2.72	5.09	6.85	4.04	2.10	1.17	1.29
MAX	2.4	4.7	4.3	7.4	3.3	9.5	20	19	15	3.0	1.6	7.5
MIN	0.79	1.1	1.2	1.4	1.2	0.54	2.6	2.5	2.5	1.5	0.68	0.26
CFSM	0.35	0.51	0.49	0.57	0.43	0.65	1.22	1.64	0.97	0.50	0.28	0.31
IN.	0.41	0.57	0.57	0.66	0.45	0.75	1.36	1.89	1.08	0.58	0.32	0.35

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1983 - 2002, BY WATER YEAR (WY)

MEAN	3.13	5.30	7.40	6.78	8.17	11.6	11.7	9.28	5.55	4.17	2.83	2.82
MAX	7.31	10.3	22.0	14.3	15.2	26.7	31.8	24.7	14.8	11.7	8.98	9.05
(WY)	1997	1987	1997	1996	1996	1994	1993	1989	1989	1983	1986	1999
MIN	0.94	1.68	2.06	2.34	1.80	2.72	3.32	4.29	2.10	1.36	0.85	0.63
(WY)	1989	2001	2002	1983	2002	2002	1985	1997	1985	1983	1983	1983

e Estimated.

## SCHUYLKILL RIVER BASIN

## 01470853 FURNACE CREEK AT ROBESONIA, PA--Continued

SUMMARY STATISTICS	FOR 2001 CALENDAR YEAR		FOR 2002 WATER YEAR		WATER YEARS 1983 - 2002	
ANNUAL TOTAL	1601.78		1008.65			
ANNUAL MEAN	4.39		2.76		6.55	
HIGHEST ANNUAL MEAN					10.5	1994
LOWEST ANNUAL MEAN					2.76	2002
HIGHEST DAILY MEAN	28	Mar 30	20	Apr 29	139	Dec 5 1993
LOWEST DAILY MEAN	0.79	Oct 22	0.26	Sep 29	0.11	Sep 11 1983
ANNUAL SEVEN-DAY MINIMUM	0.94	Oct 19	0.88	Sep 10	0.19	Sep 16 1985
MAXIMUM PEAK FLOW			41	Apr 28	a718	Dec 17 2000
MAXIMUM PEAK STAGE			1.24	Apr 28	b4.72	Jan 19 1996
ANNUAL RUNOFF (CFSM)	1.05		0.66		1.57	
ANNUAL RUNOFF (INCHES)	14.26		8.98		21.30	
10 PERCENT EXCEEDS	9.8		5.5		13	
50 PERCENT EXCEEDS	2.9		1.9		4.4	
90 PERCENT EXCEEDS	1.5		1.1		1.4	

a From rating curve extended above 308 ft<sup>3</sup>/s on basis of slope-area measurement of peak flow at gage height 3.11 ft.

b From peak indicator; ice jam.

