

04177720 FISH CREEK AT HAMILTON, IN

LOCATION.--Lat 41°31'56", long 84°54'13", in SE $\frac{1}{4}$ SW $\frac{1}{4}$ sec.34, T.36 N., R.14 E., Steuben County, Hydrologic Unit 04100003, (HAMILTON, IN quadrangle), on left bank 6 ft upstream from bridge on County Road 775 South, 0.5 mi downstream from Hamilton Lake outlet, and 0.5 mi southeast of Hamilton.

DRAINAGE AREA.--37.5 mi².

PERIOD OF RECORD.--October 1969 to current year.

GAGE.--Water-stage recorder. Datum of gage is 876.00 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Records good except for estimated daily discharges, which are poor.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	36	20	41	63	e12	84	29	12	116	9.6	14	6.5
2	27	20	33	58	e12	140	26	26	74	8.8	12	5.4
3	23	19	27	56	e12	116	23	23	55	7.9	10	5.0
4	26	18	24	52	e11	90	21	16	40	18	13	5.6
5	22	20	27	53	e11	194	16	15	31	17	12	5.0
6	19	18	32	e41	e11	192	15	14	25	14	8.6	4.3
7	17	15	28	e32	e11	127	16	19	21	46	6.3	5.0
8	16	13	25	e27	e11	97	16	16	19	31	5.3	3.4
9	15	11	25	e24	e10	76	15	19	19	21	4.7	2.6
10	15	11	48	e22	e10	60	14	96	25	18	5.5	2.2
11	15	15	115	e20	e10	52	14	88	113	17	4.0	2.2
12	15	17	76	e19	e10	42	13	112	261	18	3.2	2.4
13	12	15	52	e18	e10	35	13	72	279	14	3.1	2.3
14	28	7.2	42	e17	e10	35	11	59	225	12	3.4	2.6
15	69	7.7	36	e17	e11	33	10	52	239	7.9	3.9	2.5
16	52	10	34	e16	e10	31	10	38	160	7.5	4.1	2.5
17	40	11	34	e16	e10	29	11	36	137	20	3.6	2.2
18	33	29	28	e15	10	28	11	41	110	21	3.5	2.0
19	29	114	24	e15	10	31	11	46	79	15	7.0	2.0
20	25	82	22	e15	13	34	8.8	36	55	12	9.6	2.0
21	24	58	20	e14	36	40	11	40	44	11	10	2.1
22	20	45	20	e14	35	31	12	56	36	67	7.5	2.1
23	18	38	86	e14	44	27	11	47	29	52	6.1	2.1
24	16	69	151	e14	43	27	10	79	25	30	5.3	2.5
25	19	60	106	e13	38	31	10	53	20	20	5.3	2.6
26	25	44	74	e13	45	39	11	38	17	16	6.3	2.5
27	23	40	57	e13	46	44	9.2	30	14	26	5.8	2.5
28	22	39	47	e13	56	41	6.6	25	13	20	6.8	4.1
29	21	39	65	e13	62	40	6.8	20	12	16	15	8.9
30	19	37	113	e12	---	36	6.3	47	10	15	12	4.6
31	19	---	83	e12	---	34	---	166	---	17	8.5	---
TOTAL	760	941.9	1,595	741	620	1,916	397.7	1,437	2,303	625.7	225.4	101.7
MEAN	24.5	31.4	51.5	23.9	21.4	61.8	13.3	46.4	76.8	20.2	7.27	3.39
MAX	69	114	151	63	62	194	29	166	279	67	15	8.9
MIN	12	7.2	20	12	10	27	6.3	12	10	7.5	3.1	2.0
CFSM	0.65	0.84	1.37	0.64	0.57	1.65	0.35	1.24	2.05	0.54	0.19	0.09
IN.	0.75	0.93	1.58	0.74	0.62	1.90	0.39	1.43	2.28	0.62	0.22	0.10

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1970 - 2004, BY WATER YEAR (WY)

MEAN	14.6	27.2	36.7	36.5	48.3	67.9	59.8	41.0	31.0	15.1	14.0	11.8
MAX	76.8	117	91.3	161	130	219	112	174	118	64.3	64.9	49.4
(WY)	(2002)	(1993)	(1991)	(1993)	(2001)	(1982)	(1978)	(1996)	(1981)	(1992)	(2003)	(2003)
MIN	2.14	2.46	4.69	5.96	7.84	21.6	13.3	8.24	2.05	2.02	1.89	1.88
(WY)	(1995)	(1972)	(2000)	(1977)	(1979)	(2000)	(2004)	(1985)	(1988)	(1988)	(1970)	(1988)

SUMMARY STATISTICS

FOR 2003 CALENDAR YEAR

FOR 2004 WATER YEAR

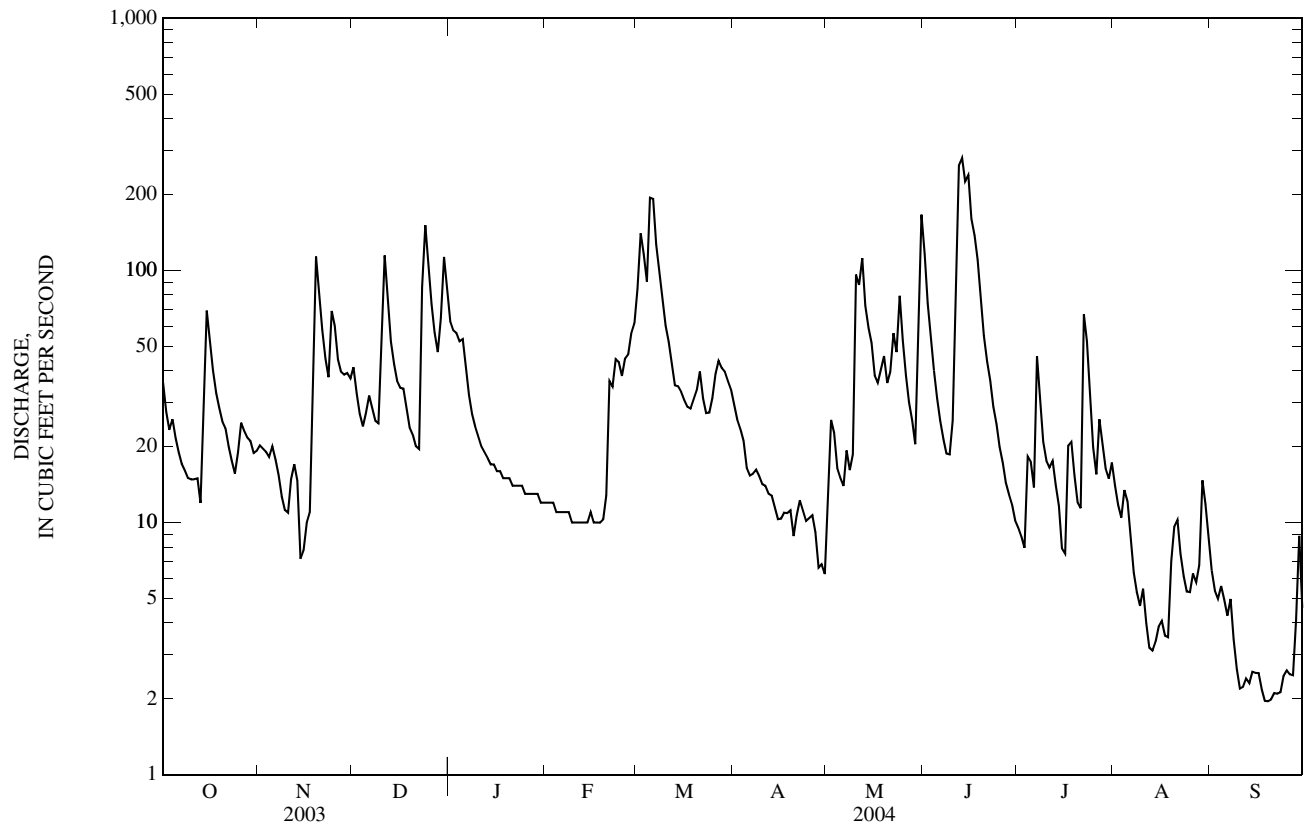
WATER YEARS 1970 - 2004

ANNUAL TOTAL	12,293.1	11,664.4	
ANNUAL MEAN	33.7	31.9	33.6
HIGHEST ANNUAL MEAN			54.7
LOWEST ANNUAL MEAN			17.8
HIGHEST DAILY MEAN	537	Aug 2	279
LOWEST DAILY MEAN	2.8	Jul 3	2.0
ANNUAL SEVEN-DAY MINIMUM	3.5	Jun 28	2.1
MAXIMUM PEAK FLOW			344
MAXIMUM PEAK STAGE			7.58
ANNUAL RUNOFF (CFSM)	0.898		0.850
ANNUAL RUNOFF (INCHES)	12.19		11.57
10 PERCENT EXCEEDS	75		70
50 PERCENT EXCEEDS	19		19
90 PERCENT EXCEEDS	5.9		5.3

e Estimated

STREAMS TRIBUTARY TO LAKE ERIE
04177720 FISH CREEK AT HAMILTON, IN—Continued

361



STREAMS TRIBUTARY TO LAKE ERIE

04177810 FISH CREEK NEAR ARTIC, IN

LOCATION.--Lat 41°27'54", long 84°48'53", in NE¼SE¼ sec. 29, T.35 N., R.15 E., DeKalb County, Hydrologic Unit 04100003, (BUTLER EAST, IN-OH quadrangle), on right bank 3 ft upstream from bridge on County Road 79, 0.6 mi south of Artic, 0.8 mi upstream from Indiana-Ohio state line and 3.8 mi north-northeast of Butler, IN.

DRAINAGE AREA.--98 mi² (approx.).

WATER DISCHARGE RECORDS

PERIOD OF RECORD.--April 1998 to current year.

GAGE.--Water-stage recorder. Datum of gage is 832.96 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Records good except for estimated daily discharges, which are poor.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	98	52	91	190	e32	245	96	26	365	32	32	23
2	76	53	80	144	e31	355	85	44	231	29	28	19
3	60	51	66	143	e31	397	77	59	143	27	e27	17
4	57	49	57	133	e31	297	71	48	105	32	e26	17
5	56	48	54	123	e30	418	63	40	82	46	26	16
6	50	52	68	96	e30	531	56	35	67	41	24	16
7	43	48	70	e90	e30	453	54	37	56	59	20	15
8	39	44	61	e78	e29	281	52	38	48	78	18	15
9	36	39	58	e68	e29	214	51	36	42	54	16	14
10	34	35	105	e60	e29	176	48	174	46	40	16	13
11	33	35	239	e54	e28	149	46	197	145	36	18	13
12	32	39	264	e50	e28	129	44	238	484	34	18	13
13	32	44	159	e47	e28	107	42	195	752	32	16	13
14	48	44	105	e45	e28	101	41	133	772	28	15	13
15	168	34	84	e43	e29	99	38	130	609	24	15	13
16	206	32	75	e41	e28	96	36	103	515	21	15	13
17	155	35	76	e40	e28	90	36	82	356	26	15	12
18	107	49	72	e39	e27	86	35	94	283	52	15	12
19	85	196	60	e38	e27	90	34	142	300	44	16	12
20	72	305	54	e37	e34	96	33	106	190	33	20	12
21	64	272	45	e36	e90	119	31	90	136	28	22	12
22	59	150	48	e35	e86	115	34	111	111	64	20	12
23	51	107	166	e35	e115	94	33	117	94	104	18	12
24	46	139	374	e34	e110	86	31	226	78	79	16	12
25	43	188	390	e34	e100	91	29	152	e64	51	15	12
26	54	160	238	e34	e110	121	30	103	e54	38	17	12
27	64	113	148	e33	e130	164	28	79	e48	39	16	12
28	67	97	112	e33	166	154	26	66	e42	46	17	13
29	67	94	122	e33	196	129	24	54	e38	38	33	17
30	60	91	258	e32	---	117	23	78	35	32	36	19
31	54	---	301	e32	---	107	---	350	---	31	30	---
TOTAL	2,116	2,695	4,100	1,930	1,690	5,707	1,327	3,383	6,291	1,318	636	424
MEAN	68.3	89.8	132	62.3	58.3	184	44.2	109	210	42.5	20.5	14.1
MAX	206	305	390	190	196	531	96	350	772	104	36	23
MIN	32	32	45	32	27	86	23	26	35	21	15	12
CFSM	0.70	0.92	1.35	0.64	0.59	1.88	0.45	1.11	2.14	0.43	0.21	0.14
IN.	0.80	1.02	1.56	0.73	0.64	2.17	0.50	1.28	2.39	0.50	0.24	0.16

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1998 - 2004, BY WATER YEAR (WY)

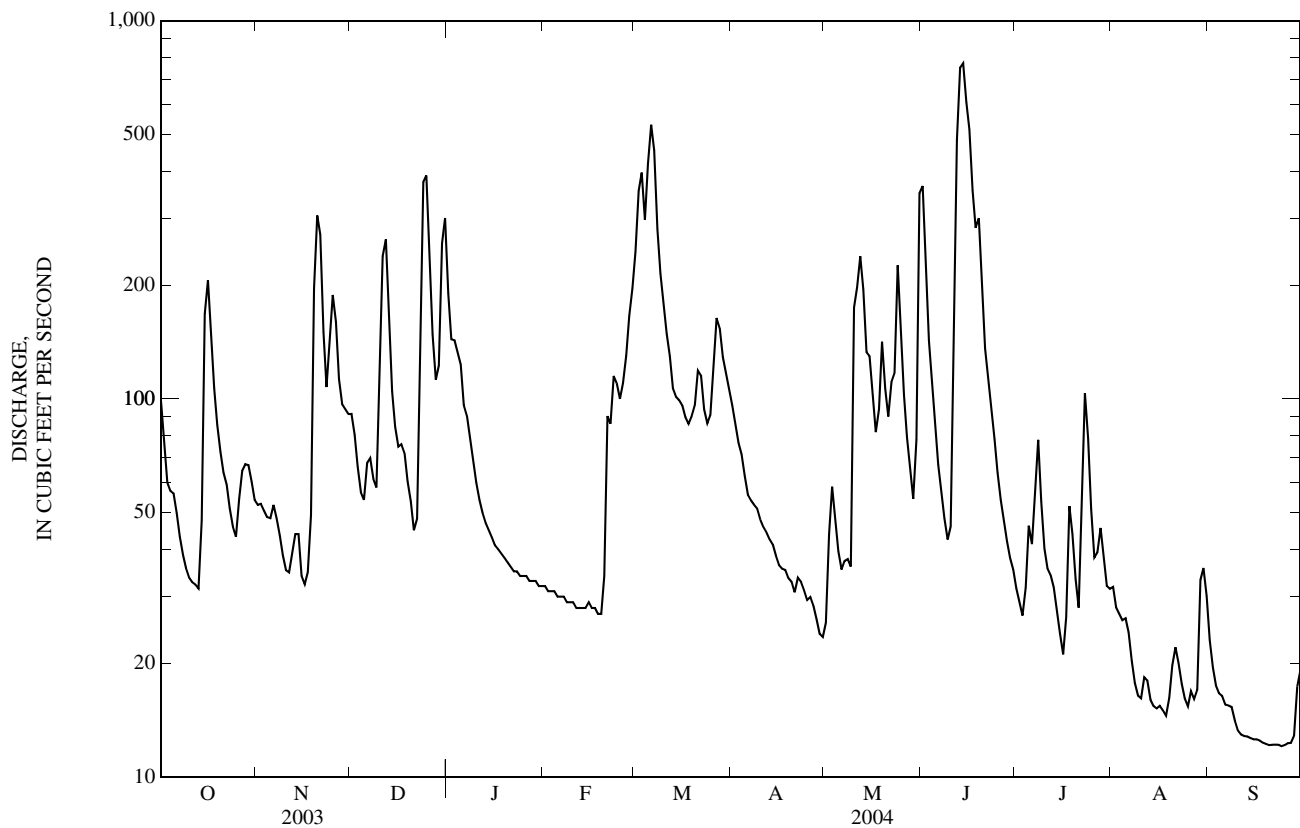
	MEAN	66.6	50.4	75.2	66.8	136	135	162	126	101	29.5	42.8	31.1
MAX	260	89.8	187	189	384	184	306	222	221	52.7	110	113	
(WY)	(2002)	(2004)	(2002)	(1999)	(2001)	(2004)	(1999)	(2002)	(2000)	(2003)	(1998)	(2003)	
MIN	5.73	7.33	11.9	9.41	14.6	66.8	44.2	61.2	25.6	14.2	7.82	4.32	
(WY)	(2000)	(2000)	(2003)	(2003)	(2003)	(2000)	(2004)	(1998)	(1998)	(1999)	(1999)	(1999)	

STREAMS TRIBUTARY TO LAKE ERIE
04177810 FISH CREEK NEAR ARTIC, IN—Continued

363

SUMMARY STATISTICS	FOR 2003 CALENDAR YEAR		FOR 2004 WATER YEAR		WATER YEARS 1998 - 2004	
ANNUAL TOTAL	31,432.4		31,617		86.0	
ANNUAL MEAN	86.1		86.4		129	
HIGHEST ANNUAL MEAN					62.9	
LOWEST ANNUAL MEAN					2000	
HIGHEST DAILY MEAN	813	Aug 3	772	Jun 14	1,360	May 13, 2002
LOWEST DAILY MEAN	6.8	Jan 25	12	Sep 17	3.6	Sep 12, 1999
ANNUAL SEVEN-DAY MINIMUM	7.0	Jan 24	12	Sep 17	3.8	Sep 10, 1999
MAXIMUM PEAK FLOW			796	Jun 14	1,690	May 13, 2002
MAXIMUM PEAK STAGE			9.55	Jun 14	11.60	May 13, 2002
ANNUAL RUNOFF (CFSM)	0.879		0.881		0.878	
ANNUAL RUNOFF (INCHES)	11.93		12.00		11.92	
10 PERCENT EXCEEDS	218		192		217	
50 PERCENT EXCEEDS	48		48		37	
90 PERCENT EXCEEDS	11		17		8.3	

e Estimated



STREAMS TRIBUTARY TO LAKE ERIE

04177810 FISH CREEK NEAR ARTIC, IN—Continued

SEDIMENT DISCHARGE, SUSPENDED (TONS/DAY)
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004

Day	Mean discharge (cfs)	Mean concen- tration (mg/l)	Load (tons/ day)	Mean discharge (cfs)	Mean concen- tration (mg/l)	Load (tons/ day)	Mean discharge (cfs)	Mean concen- tration (mg/l)	Load (tons/ day)
OCTOBER			NOVEMBER			DECEMBER			
1	98	10	2.6	52	14	2.0	91	7	1.8
2	76	7	1.4	53	8	1.1	80	8	1.8
3	60	6	1.0	51	4	0.6	66	5	0.9
4	57	7	1.1	49	7	.9	57	4	.6
5	56	7	1.1	48	19	2.5	54	8	1.1
6	50	8	1.0	52	12	1.6	68	7	1.3
7	43	8	0.9	48	9	1.2	70	4	.8
8	39	11	1.1	44	15	1.8	61	6	.9
9	36	12	1.1	39	17	1.7	58	12	1.9
10	34	18	1.6	35	16	1.5	105	25	7.7
11	33	17	1.5	35	10	1.0	239	41	26.0
12	32	10	.9	39	24	2.6	264	28	21.0
13	32	11	1.0	44	13	1.5	159	13	5.7
14	48	16	3.1	44	14	1.7	105	8	2.2
15	168	39	18.0	34	5	.5	84	7	1.6
16	206	24	13.0	32	7	.6	75	13	2.6
17	155	16	6.9	35	10	.9	76	13	2.6
18	107	8	2.2	49	27	4.0	72	8	1.6
19	85	6	1.4	196	44	23.0	60	19	3.1
20	72	13	2.6	305	34	28.0	54	19	2.8
21	64	15	2.6	272	22	17.0	45	13	1.6
22	59	10	1.6	150	12	5.1	48	7	.9
23	51	7	1.0	107	9	2.6	166	89	44.0
24	46	15	1.9	139	31	13.0	374	49	49.0
25	43	12	1.3	188	27	14.0	390	28	30.0
26	54	12	1.8	160	19	8.6	238	15	9.7
27	64	5	.8	113	10	3.0	148	10	4.1
28	67	5	1.0	97	12	3.2	112	9	2.8
29	67	9	1.6	94	10	2.6	122	12	4.4
30	60	4	.7	91	7	1.6	258	33	23.0
31	54	10	1.5	---	---	---	301	26	22.0
TOTAL	2,116	---	79.1	2,695	---	149.4	4,100	---	279.6
JANUARY			FEBRUARY			MARCH			
1	190	14	7.5	e32	6	0.5	245	28	19.0
2	144	11	4.1	e31	6	.5	355	40	38.0
3	143	12	4.5	e31	6	.5	397	28	30.0
4	133	10	3.6	e31	6	.5	297	19	16.0
5	123	6	2.1	e30	6	.5	418	57	65.0
6	96	6	1.6	e30	6	.5	531	39	55.0
7	e90	6	1.5	e30	6	.5	453	20	24.0
8	e78	6	1.3	e29	6	.5	281	14	11.0
9	e68	6	1.1	e29	6	.5	214	12	6.7
10	e60	6	1.0	e29	6	.5	176	10	4.8
11	e54	6	0.9	e28	6	.5	149	10	3.9
12	e50	6	.8	e28	6	.5	129	8	2.8
13	e47	6	.8	e28	6	.5	107	7	2.1
14	e45	6	.7	e28	6	.5	101	7	1.9
15	e43	6	.7	e29	6	.7	99	6	1.7
16	e41	6	.7	e28	6	.5	96	7	1.9
17	e40	6	.7	e28	6	.5	90	5	1.3
18	e39	6	.6	e27	6	.4	86	4	1.0
19	e38	6	.6	e27	6	.4	90	7	1.6
20	e37	6	.6	e34	6	.6	96	12	3.1
21	e36	6	.6	e90	7	1.7	119	18	5.7
22	e35	6	.6	e86	8	1.9	115	11	3.2
23	e35	6	.6	e115	9	2.9	94	22	5.6
24	e34	6	.6	e110	10	3.1	86	18	4.1
25	e34	6	.6	e100	11	3.1	91	13	3.2
26	e34	6	.6	e110	13	3.7	121	23	7.9
27	e33	6	.5	e130	14	4.8	164	28	12.0
28	e33	6	.5	166	15	6.7	154	30	12.0
29	e33	6	.5	196	20	11.0	129	28	9.7
30	e32	6	.5	---	---	---	117	22	7.1
31	e32	6	.5	---	---	---	107	18	5.2
TOTAL	1,930	---	41.3	1,690	---	48.4	5,707	---	366.5

04177810 FISH CREEK NEAR ARTIC, IN—Continued

SEDIMENT DISCHARGE, SUSPENDED (TONS/DAY)—CONTINUED
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004

Day	Mean discharge (cfs)	Mean concentration (mg/l)	Load (tons/ day)	Mean discharge (cfs)	Mean concentration (mg/l)	Load (tons/ day)	Mean discharge (cfs)	Mean concentration (mg/l)	Load (tons/ day)
		APRIL			MAY			JUNE	
1	96	14	3.8	26	55	3.8	365	69	68.0
2	85	11	2.5	44	51	5.9	231	58	36.0
3	77	17	3.5	59	27	4.3	143	57	22.0
4	71	12	2.4	48	20	2.6	105	56	16.0
5	63	8	1.3	40	13	1.3	82	53	12.0
6	56	7	1.0	35	37	3.5	67	57	10.0
7	54	11	1.5	37	32	3.2	56	62	9.5
8	52	15	2.1	38	46	4.7	48	53	6.9
9	51	15	2.0	36	55	5.5	42	54	6.2
10	48	12	1.5	174	207	93.0	46	55	6.8
11	46	12	1.5	197	95	51.0	145	108	49.0
12	44	29	3.5	238	117	77.0	484	114	142.0
13	42	28	3.3	195	68	36.0	752	43	87.0
14	41	32	3.5	133	53	19.0	772	22	47.0
15	38	41	4.2	130	54	19.0	609	20	33.0
16	36	38	3.7	103	43	12.0	515	20	28.0
17	36	46	4.4	82	36	8.0	356	24	23.0
18	35	60	5.7	94	49	13.0	283	37	28.0
19	34	51	4.6	142	91	35.0	300	35	29.0
20	33	73	6.5	106	55	16.0	190	36	19.0
21	31	58	4.8	90	49	12.0	136	38	14.0
22	34	65	5.9	111	68	20.0	111	36	11.0
23	33	55	4.9	117	93	34.0	94	43	11.0
24	31	51	4.3	226	166	100.0	78	65	14.0
25	29	56	4.4	152	72	30.0	e64	71	12.0
26	30	65	5.3	103	54	15.0	e54	42	6.1
27	28	56	4.3	79	52	11.0	e48	46	6.0
28	26	40	2.8	66	58	10.0	e42	57	6.5
29	24	62	4.0	54	62	9.1	e38	62	6.3
30	23	73	4.6	78	74	20.0	35	58	5.5
31	---	---	---	350	152	140.0	---	---	---
TOTAL	1,327	---	107.8	3,383	---	814.9	6,291	---	770.8

STREAMS TRIBUTARY TO LAKE ERIE

04177810 FISH CREEK NEAR ARTIC, IN—Continued

SEDIMENT DISCHARGE, SUSPENDED (TONS/DAY)—CONTINUED
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004

Day	Mean discharge (cfs)	Mean concentration (mg/l)	Load (tons/ day)	Mean discharge (cfs)	Mean concentration (mg/l)	Load (tons/ day)	Mean discharge (cfs)	Mean concentration (mg/l)	Load (tons/ day)
		JULY			AUGUST			SEPTEMBER	
1	32	66	5.6	32	47	4.0	23	20	1.2
2	29	75	5.9	28	62	4.7	19	24	1.3
3	27	60	4.3	e27	58	4.3	17	26	1.2
4	32	124	11.0	e26	61	4.3	17	27	1.2
5	46	118	15.0	26	28	2.0	16	21	0.9
6	41	50	5.6	24	29	1.9	16	23	2.0
7	59	76	13.0	20	38	2.1	15	29	1.2
8	78	59	12.0	18	39	1.9	15	29	1.2
9	54	43	6.3	16	39	1.7	14	18	.7
10	40	40	4.4	16	44	1.9	13	22	.8
11	36	45	4.4	18	41	2.0	13	42	1.5
12	34	54	5.0	18	41	2.0	13	39	1.3
13	32	80	6.9	16	60	2.6	13	57	2.0
14	28	70	5.2	15	50	2.1	13	64	2.2
15	24	89	5.8	15	42	1.7	13	51	1.7
16	21	38	2.2	15	47	1.9	13	46	1.6
17	26	70	5.3	15	51	2.0	12	46	1.5
18	52	60	8.3	15	64	2.5	12	33	1.1
19	44	41	4.9	16	46	2.0	12	53	1.8
20	33	31	2.8	20	38	2.0	12	51	1.7
21	28	26	2.0	22	41	2.4	12	53	1.7
22	64	89	17.0	20	31	1.7	12	54	1.8
23	104	62	17.0	18	27	1.3	12	52	1.7
24	79	44	9.5	16	35	1.5	12	63	2.0
25	51	35	4.8	15	40	1.7	12	62	2.0
26	38	31	3.1	17	28	1.3	12	44	1.5
27	39	37	3.9	16	24	1.1	12	46	1.5
28	46	41	5.1	17	40	2.1	13	50	1.7
29	38	52	5.3	33	107	9.8	17	39	1.8
30	32	51	4.4	36	61	5.9	19	36	1.8
31	31	50	4.2	30	28	2.3	---	---	---
TOTAL	1,318	---	210.2	636	---	80.7	424	---	44.6
YEAR	31,617	2,993.31							

e Estimated

04178000 ST. JOSEPH RIVER NEAR NEWVILLE, IN

LOCATION.--Lat 41°23'07", long 84°48'06", in SW $\frac{1}{4}$ SW $\frac{1}{4}$ sec.18, T.5 N., R.1 E., Defiance County, Ohio, Hydrologic Unit 04100003, (BUTLER EAST, IN-OH quadrangle), on left downstream side at bridge on Ohio State Highway 249, 3.5 mi northeast of Newville, 6.5 mi northwest of Hicksville, OH, and at mile 42.3.

DRAINAGE AREA.--610 mi².

PERIOD OF RECORD.--October 1946 to current year. Monthly discharge only for some periods, published in WSP 1307.

REVISED RECORDS.--WSP 2112: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 795.40 ft above National Geodetic Vertical Datum of 1929. Prior to Oct. 22, 1947, nonrecording gage at same site and datum.

REMARKS.--Records fair except for estimated daily discharges, which are poor.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	967	284	649	1,140	e196	1,120	736	182	1,500	232	177	157
2	669	278	563	1,110	e193	1,360	632	325	1,380	211	156	123
3	479	277	489	1,120	e203	1,460	553	352	1,170	192	149	104
4	396	257	425	1,050	e199	1,490	490	337	943	191	142	95
5	352	246	388	960	e196	1,830	444	308	678	212	134	87
6	328	288	399	878	e194	2,060	399	268	504	225	133	82
7	301	340	420	693	e192	2,010	367	261	409	399	137	81
8	273	339	409	e609	e190	1,820	347	250	347	320	127	81
9	245	315	393	e545	e188	1,680	333	228	305	296	113	78
10	228	282	578	e507	e190	1,530	309	449	296	299	106	74
11	214	256	1,030	e473	e186	1,260	293	746	495	269	99	72
12	207	245	1,060	469	e182	956	286	894	1,390	241	99	69
13	195	254	997	407	e179	759	286	778	2,110	209	97	66
14	244	280	879	e369	e177	641	277	632	2,490	187	92	62
15	824	285	700	e345	e175	569	269	528	2,820	166	88	59
16	995	247	561	e320	e172	534	259	487	2,890	152	86	58
17	988	227	494	e300	e170	501	248	455	2,620	151	85	57
18	954	261	461	e283	e167	478	239	420	2,120	178	84	56
19	887	780	440	e268	e171	474	231	464	1,720	263	96	54
20	716	1,050	404	e252	e191	490	224	514	1,570	306	108	53
21	531	1,110	371	e238	e393	571	227	481	1,460	258	130	52
22	418	1,130	342	e227	581	599	234	542	1,330	344	108	52
23	357	1,110	692	e221	786	628	221	544	1,040	353	98	51
24	306	1,120	1,370	e216	855	592	216	1,220	715	342	90	51
25	274	1,100	1,450	e213	e702	547	206	1,330	537	295	84	51
26	264	982	1,410	e211	871	566	199	1,100	437	230	80	51
27	283	908	1,320	e208	919	768	193	851	366	208	79	51
28	306	830	1,210	e205	950	947	190	621	315	225	80	52
29	326	753	1,020	e203	1,010	1,000	178	480	277	225	109	65
30	325	688	1,110	e200	---	973	164	447	250	208	180	72
31	305	---	1,150	e197	---	866	---	1,290	---	209	210	---
TOTAL	14,157	16,522	23,184	14,437	10,778	31,079	9,250	17,784	34,484	7,596	3,556	2,116
MEAN	457	551	748	466	372	1,003	308	574	1,149	245	115	70.5
MAX	995	1,130	1,450	1,140	1,010	2,060	736	1,330	2,890	399	210	157
MIN	195	227	342	197	167	474	164	182	250	151	79	51
CFSM	0.75	0.90	1.23	0.76	0.61	1.64	0.51	0.94	1.88	0.40	0.19	0.12
IN.	0.86	1.01	1.41	0.88	0.66	1.90	0.56	1.08	2.10	0.46	0.22	0.13

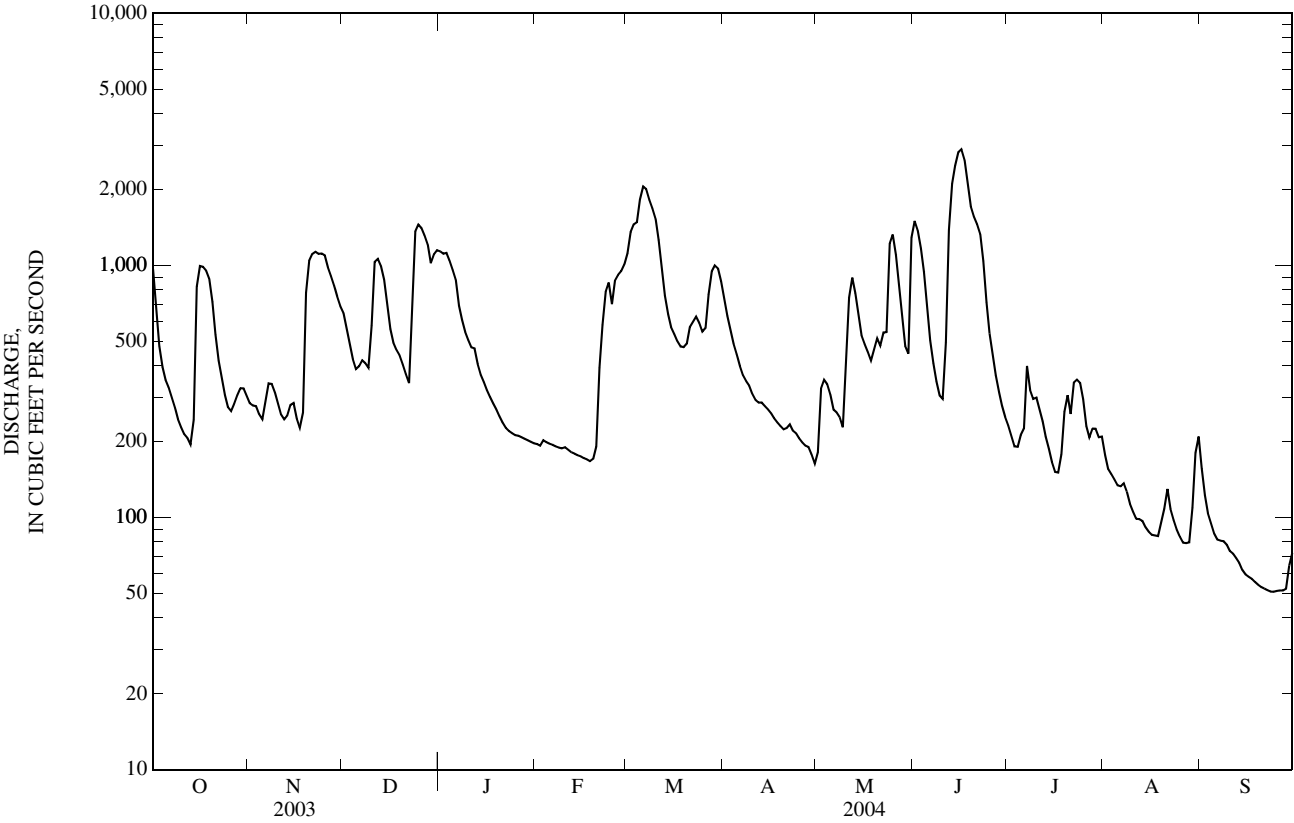
STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1947 - 2004, BY WATER YEAR (WY)

MEAN	204	373	582	646	850	1,177	1,055	655	430	237	156	144
MAX	1,537	1,756	2,085	2,545	2,302	3,512	3,102	2,499	1,864	1,045	921	671
(WY)	(2002)	(1993)	(1968)	(1950)	(1976)	(1982)	(1950)	(1956)	(1989)	(1951)	(1998)	(1997)
MIN	21.0	30.5	31.1	38.3	41.4	312	308	148	51.4	32.2	29.1	20.3
(WY)	(1964)	(1965)	(1964)	(1963)	(1963)	(1964)	(2004)	(1988)	(1988)	(1988)	(1967)	(1963)

STREAMS TRIBUTARY TO LAKE ERIE
04178000 ST. JOSEPH RIVER NEAR NEWVILLE, IN—Continued

SUMMARY STATISTICS	FOR 2003 CALENDAR YEAR		FOR 2004 WATER YEAR		WATER YEARS 1947 - 2004	
ANNUAL TOTAL	175,025		184,943		539	
ANNUAL MEAN	480		505		1,008	
HIGHEST ANNUAL MEAN					132	
LOWEST ANNUAL MEAN					1950	
HIGHEST DAILY MEAN	2,530	May 12	2,890	Jun 16	9,790	May 18, 1996
LOWEST DAILY MEAN	57	Jan 26	51	Sep 23	14	Sep 10, 1964
ANNUAL SEVEN-DAY MINIMUM	58	Jan 23	51	Sep 21	15	Sep 10, 1964
MAXIMUM PEAK FLOW			2,920	Jun 16	10,400	May 18, 1996
MAXIMUM PEAK STAGE			13.03	Jun 16	17.96	Mar 17, 1982
ANNUAL RUNOFF (CFSM)	0.786		0.828		0.884	
ANNUAL RUNOFF (INCHES)	10.67		11.28		12.01	
10 PERCENT EXCEEDS	1,250		1,120		1,470	
50 PERCENT EXCEEDS	279		315		240	
90 PERCENT EXCEEDS	71		94		50	

e Estimated



04179520 CEDAR CREEK AT 18TH STREET AT AUBURN, IN

LOCATION.--Lat 41°21'36", long 85°02'57", in NW¼SE¼ sec.32, T.34 N., R.13 E., Dekalb County, Hydrologic Unit 04100003, (AUBURN, IN quadrangle), on top of right upstream wingwall of the bridge on 18th Street, 0.3 mi east of downtown Auburn, 1.46 mi above John Diehl Ditch and at mile 20.94.

DRAINAGE AREA.--90.6 mi².

PERIOD OF RECORD.--September 2001 to current year.

GAGE.--Water-stage recorder. Datum of gage is 844.02 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Records fair except for estimated daily discharges, which are poor.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	87	43	e115	139	e22	267	64	36	334	32	e32	32
2	70	42	77	125	e22	353	60	64	209	29	e27	26
3	62	42	67	129	e22	244	55	55	140	30	e24	21
4	64	41	60	113	e22	225	52	44	103	36	38	20
5	56	42	62	110	e22	627	48	39	83	46	33	18
6	49	39	67	e88	e22	397	44	35	71	40	30	16
7	44	36	64	e77	e22	264	42	42	60	54	28	19
8	39	33	59	71	e22	205	41	35	52	41	24	15
9	36	32	65	65	e22	167	38	48	e46	35	23	14
10	35	32	220	e59	e21	135	36	157	e91	30	25	13
11	31	36	318	54	e21	116	35	159	e271	44	21	12
12	29	36	179	55	e21	99	35	247	917	51	19	12
13	28	36	117	52	e20	84	34	142	733	33	19	12
14	91	33	92	51	e20	81	33	110	529	29	18	12
15	223	34	77	e47	e19	78	31	108	428	26	18	12
16	139	e33	73	43	e18	76	31	75	289	61	20	12
17	98	e36	70	41	e19	72	30	70	246	149	18	11
18	78	e50	62	41	20	71	29	78	186	125	17	10
19	63	e306	57	e37	23	78	31	94	e137	83	38	9.9
20	57	e262	51	e35	48	91	32	65	106	62	44	11
21	53	e154	48	e32	178	108	33	180	90	e46	40	11
22	47	e110	49	e29	125	84	33	283	80	e349	28	11
23	43	e98	375	e26	183	75	33	223	68	e512	23	11
24	40	e151	422	e25	137	71	32	392	59	198	20	11
25	43	e185	255	e24	114	69	33	191	53	129	19	11
26	50	e159	173	e24	146	88	34	122	47	91	19	10
27	53	e113	130	e23	147	102	33	91	42	75	18	11
28	52	e98	103	e23	162	88	32	75	39	62	22	14
29	54	e129	188	e23	170	81	29	61	37	52	96	16
30	49	e100	294	e23	---	76	29	146	34	e41	66	13
31	46	---	191	e23	---	70	---	637	---	e37	43	---
TOTAL	1,909	2,541	4,180	1,707	1,810	4,642	1,122	4,104	5,580	2,628	910	426.9
MEAN	61.6	84.7	135	55.1	62.4	150	37.4	132	186	84.8	29.4	14.2
MAX	223	306	422	139	183	627	64	637	917	512	96	32
MIN	28	32	48	23	18	69	29	35	34	26	17	9.9
CFSM	0.68	0.94	1.49	0.61	0.69	1.66	0.41	1.47	2.06	0.94	0.33	0.16
IN.	0.79	1.05	1.72	0.70	0.75	1.91	0.46	1.69	2.30	1.08	0.38	0.18

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 2001 - 2004, BY WATER YEAR (WY)

MEAN	109	58.9	106	45.6	78.3	148	112	158	87.5	60.6	36.1	45.9
MAX	260	84.7	168	65.8	158	160	200	185	186	84.8	68.2	116
(WY)	(2002)	(2004)	(2002)	(2002)	(2002)	(2002)	(2002)	(2003)	(2004)	(2004)	(2003)	(2003)
MIN	5.75	11.9	16.1	15.9	15.1	135	37.4	132	37.2	18.6	10.9	7.36
(WY)	(2003)	(2003)	(2003)	(2003)	(2003)	(2003)	(2004)	(2004)	(2002)	(2002)	(2002)	(2002)

SUMMARY STATISTICS

FOR 2003 CALENDAR YEAR

FOR 2004 WATER YEAR

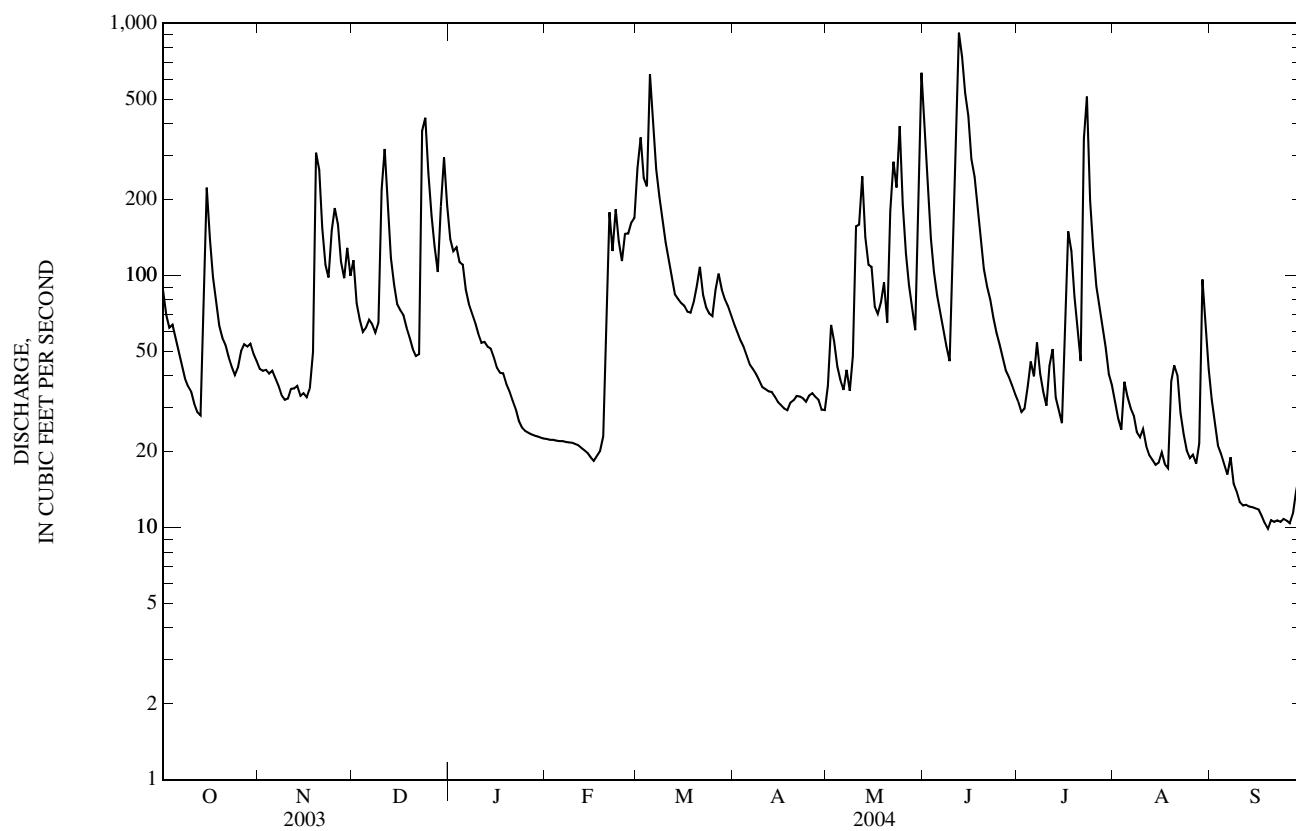
WATER YEARS 2001 - 2004

ANNUAL TOTAL	31,666.5	31,559.9	
ANNUAL MEAN	86.8	86.2	
HIGHEST ANNUAL MEAN			87.4
LOWEST ANNUAL MEAN			110
HIGHEST DAILY MEAN	841	May 10	65.9
LOWEST DAILY MEAN	6.6	Jan 25	934
ANNUAL SEVEN-DAY MINIMUM	7.0	Jan 23	9.9
MAXIMUM PEAK FLOW			11
MAXIMUM PEAK STAGE			1,250
ANNUAL RUNOFF (CFSM)	0.962		8.55
ANNUAL RUNOFF (INCHES)	13.06		0.956
10 PERCENT EXCEEDS	211		13.02
50 PERCENT EXCEEDS	48		211
90 PERCENT EXCEEDS	12		43
			8.9

e Estimated

STREAMS TRIBUTARY TO LAKE ERIE

04179520 CEDAR CREEK AT 18TH STREET AT AUBURN, IN—Continued



04180000 CEDAR CREEK NEAR CEDARVILLE, IN

LOCATION.--Lat 41°13'08", long 85°04'35", in NW $\frac{1}{4}$ NW $\frac{1}{4}$ sec.19, T.32 N., R.13 E., Allen County, Hydrologic Unit 04100003, (CEDARVILLE, IN quadrangle), on left bank at downstream side of bridge on Tonkle Road, 3 mi northwest of Cedarville, 5.8 mi upstream from mouth, and 10 mi south of Auburn.

DRAINAGE AREA.--270 mi².

PERIOD OF RECORD.--October 1946 to current year.

REVISED RECORDS.--WSP 1912: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 780.09 ft above National Geodetic Vertical Datum of 1929. Prior to Nov. 4, 1947, nonrecording gage at same site and datum.

REMARKS.--Records fair except for estimated daily discharges, which are poor.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	311	103	428	543	e109	970	213	87	1,870	121	103	85
2	242	100	316	479	e108	1,430	193	175	929	112	94	73
3	198	112	246	486	e108	1,020	178	170	586	104	88	66
4	192	94	207	487	e108	794	164	123	413	139	101	76
5	177	92	199	542	e107	1,940	150	102	313	144	109	68
6	151	94	241	e414	e106	1,880	142	85	253	127	91	60
7	132	87	236	e362	e106	1,060	140	136	212	177	81	71
8	116	79	208	e322	e104	751	135	263	183	155	73	63
9	103	74	214	291	e102	591	128	154	169	117	68	54
10	92	68	575	e255	e98	473	119	224	325	102	70	51
11	83	73	1,200	e228	e94	404	113	295	797	106	65	47
12	71	79	732	226	e91	345	109	463	2,190	141	60	45
13	65	70	437	222	e89	288	107	340	3,510	104	57	44
14	105	62	317	211	e86	268	103	237	2,510	87	55	44
15	680	65	256	e193	e85	258	97	247	1,950	79	53	43
16	473	67	227	e175	e83	241	108	187	1,250	70	58	42
17	306	64	232	169	e82	237	99	148	1,000	253	56	40
18	224	101	203	165	e84	230	89	172	759	262	58	38
19	182	1,130	181	e144	85	240	85	220	557	203	98	37
20	152	896	161	e131	118	250	82	171	429	151	154	37
21	133	518	142	e123	668	302	87	356	353	119	237	38
22	116	348	143	e117	519	261	88	1,400	306	751	134	37
23	105	264	869	e114	743	231	83	837	264	1,060	97	37
24	97	544	1,880	e112	621	218	78	1,730	229	585	82	37
25	97	624	1,120	e111	485	217	74	1,000	207	354	76	37
26	120	374	715	e110	666	249	73	598	187	247	75	35
27	128	298	524	e110	674	359	68	409	166	198	69	35
28	125	309	420	e110	748	319	64	307	153	164	85	37
29	126	451	491	e110	757	283	62	234	142	138	126	49
30	115	373	1,070	e110	---	263	59	316	131	119	149	42
31	105	---	754	e109	---	239	---	2,310	---	115	106	---
TOTAL	5,322	7,613	14,944	7,281	7,834	16,611	3,290	13,496	22,343	6,604	2,828	1,468
MEAN	172	254	482	235	270	536	110	435	745	213	91.2	48.9
MAX	680	1,130	1,880	543	757	1,940	213	2,310	3,510	1,060	237	85
MIN	65	62	142	109	82	217	59	85	131	70	53	35
CFSM	0.64	0.94	1.79	0.87	1.00	1.98	0.41	1.61	2.76	0.79	0.34	0.18
IN.	0.73	1.05	2.06	1.00	1.08	2.29	0.45	1.86	3.08	0.91	0.39	0.20

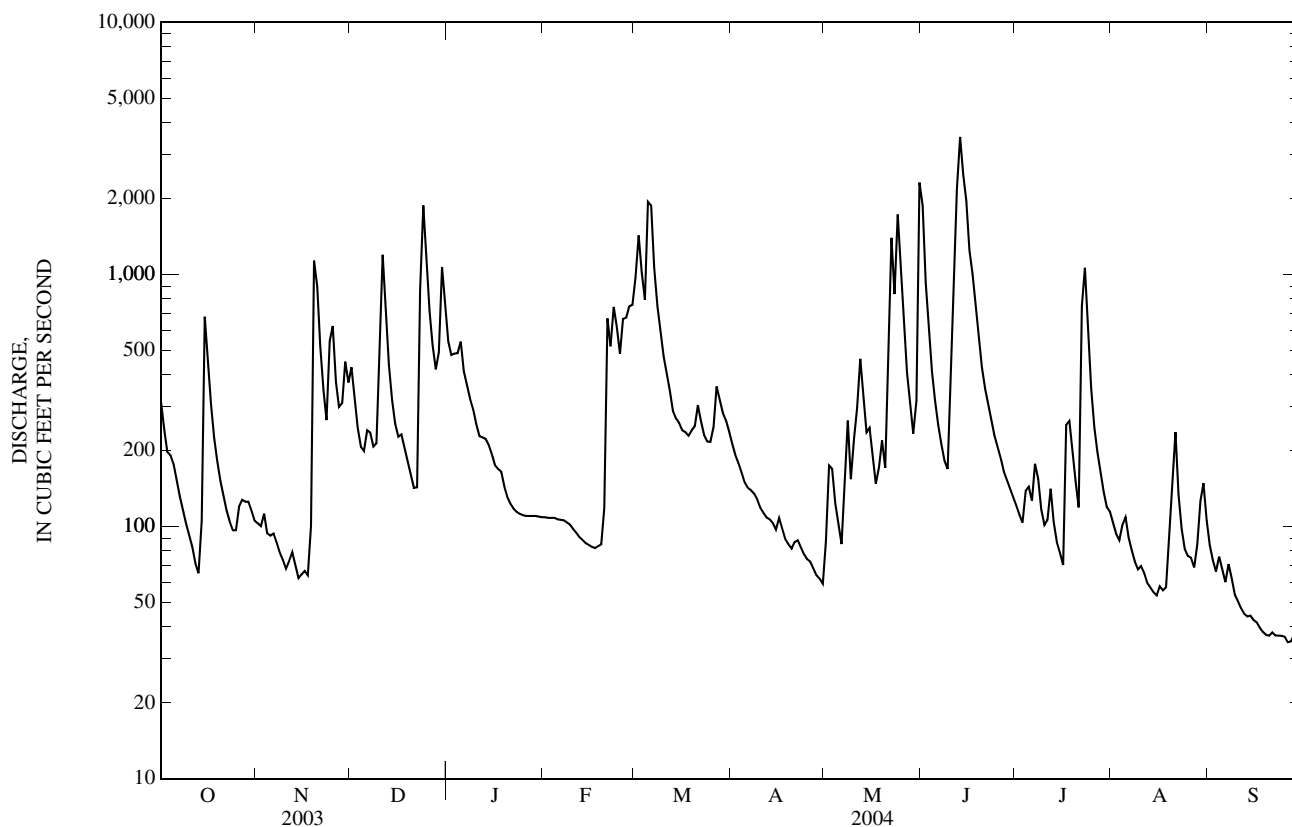
STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1947 - 2004, BY WATER YEAR (WY)

MEAN	122	182	281	312	398	504	464	296	222	125	87.8	93.1
MAX	814	936	908	1,393	1,290	1,724	1,130	947	1,046	515	331	532
(WY)	(2002)	(1993)	(1967)	(1950)	(1959)	(1982)	(1950)	(1956)	(1981)	(1986)	(1997)	(2003)
MIN	19.8	24.0	24.7	25.9	28.5	146	110	68.6	44.0	35.1	22.0	20.9
(WY)	(1965)	(1965)	(1964)	(1963)	(1963)	(1957)	(2004)	(1958)	(1988)	(1953)	(1964)	(1964)

04180000 CEDAR CREEK NEAR CEDARVILLE, IN—Continued

SUMMARY STATISTICS	FOR 2003 CALENDAR YEAR		FOR 2004 WATER YEAR		WATER YEARS 1947 - 2004	
ANNUAL TOTAL	113,814		109,634		257	
ANNUAL MEAN	312		300		485	
HIGHEST ANNUAL MEAN					85.3	
LOWEST ANNUAL MEAN					1950	
HIGHEST DAILY MEAN	2,870	May 10	3,510	Jun 13	5,220	Dec 31, 1990
LOWEST DAILY MEAN	25	Jul 3	35	Sep 26	13	Oct 3, 1949
ANNUAL SEVEN-DAY MINIMUM	33	Jun 28	36	Sep 22	18	Sep 27, 1949
MAXIMUM PEAK FLOW			3,720	Jun 13	5,580	Dec 30, 1990
MAXIMUM PEAK STAGE			9.80	Jun 13	13.38	Dec 30, 1990
ANNUAL RUNOFF (CFSM)	1.15		1.11		0.951	
ANNUAL RUNOFF (INCHES)	15.68		15.11		12.92	
10 PERCENT EXCEEDS	811		735		603	
50 PERCENT EXCEEDS	144		150		116	
90 PERCENT EXCEEDS	45		65		32	

e Estimated



04180500 ST. JOSEPH RIVER NEAR FORT WAYNE, IN

LOCATION.--Lat 41°10'38", long 85°03'21", in NW¼NE¼ sec.3, T.31 N., R.13 E., Allen County, Hydrologic Unit 04100003, (CEDARVILLE, IN quadrangle), on left bank 0.8 mi downstream from Ely Run, 1.3 mi upstream from Mayhew Road bridge, 8.0 mi northeast of the Fort Wayne Court House, and at mile 10.71.

DRAINAGE AREA.--1,060 mi².

PERIOD OF RECORD.--October 1983 to current year. July 1941 to September 1955 gage located 1.3 mi downstream at Ely Bridge.

GAGE.--Water-stage recorder. Datum of gage is 754.00 ft above National Geodetic Vertical Datum of 1929 (levels by State of Indiana).

REMARKS.--Records fair except for estimated daily discharges, which are poor. Flow regulated by Cedarville Reservoir and some flow diverted into storage of Hursttown Reservoir.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1,680	462	1,290	1,870	e327	2,510	1,160	297	5,050	461	303	370
2	1,250	452	1,020	1,720	e336	3,430	918	752	3,190	464	304	317
3	861	462	830	1,890	e352	2,940	809	745	2,460	356	297	274
4	856	404	844	1,860	e339	2,630	785	577	1,940	498	293	418
5	576	417	597	1,970	e327	4,690	669	454	1,370	398	259	270
6	633	374	670	1,640	e327	4,990	604	441	1,160	421	249	174
7	618	391	936	1,120	e317	3,730	547	477	654	1,030	252	241
8	442	458	678	e973	e315	3,240	523	607	731	974	223	243
9	680	438	683	e856	e321	2,900	482	483	554	429	204	220
10	364	419	1,300	e776	e310	2,460	508	463	677	520	181	203
11	246	407	2,840	e734	e312	2,200	488	1,020	1,550	539	139	180
12	413	392	2,240	794	e299	1,710	410	1,650	5,520	586	192	163
13	355	350	1,600	755	e290	1,240	389	1,540	7,180	413	184	190
14	364	334	1,500	e634	e283	1,060	403	1,220	6,820	358	218	181
15	1,520	367	1,220	e544	e281	943	418	840	5,100	464	167	161
16	1,610	386	901	e478	e277	917	409	691	4,560	170	203	170
17	1,400	377	924	e455	e275	824	399	706	4,220	597	139	126
18	1,370	405	799	e455	e271	745	385	673	3,680	554	150	148
19	1,170	2,030	737	e426	e303	795	335	710	3,110	373	250	193
20	1,010	2,180	682	e405	e339	851	353	745	2,390	520	367	133
21	814	1,800	657	e421	e913	893	511	1,220	2,250	609	537	151
22	704	1,650	589	e421	e1,390	892	367	2,860	1,990	1,370	395	161
23	519	1,540	2,050	e388	e1,720	909	365	1,830	1,790	2,310	252	111
24	516	1,890	4,100	e377	e1,880	903	329	4,700	1,310	1,100	215	177
25	509	2,220	3,070	e371	1,550	896	301	3,210	932	744	218	141
26	486	1,500	2,420	e366	1,850	880	307	2,380	812	639	292	159
27	452	1,350	2,110	e360	2,000	1,200	305	1,850	579	483	208	176
28	467	1,270	1,920	e358	2,070	1,510	292	1,340	533	474	244	143
29	498	1,690	1,820	e352	2,070	1,470	290	907	574	404	273	136
30	503	1,250	2,810	e343	---	1,430	263	898	457	386	308	149
31	512	---	1,690	e336	---	1,340	---	6,320	---	482	354	---
TOTAL	23,398	27,665	45,527	24,448	21,644	57,128	14,324	42,606	73,143	19,126	7,870	5,879
MEAN	755	922	1,469	789	746	1,843	477	1,374	2,438	617	254	196
MAX	1,680	2,220	4,100	1,970	2,070	4,990	1,160	6,320	7,180	2,310	537	418
MIN	246	334	589	336	271	745	263	297	457	170	139	111
CFSM	0.72	0.88	1.40	0.75	0.71	1.76	0.45	1.31	2.32	0.59	0.24	0.19
IN.	0.83	0.98	1.61	0.87	0.77	2.02	0.51	1.51	2.59	0.68	0.28	0.21

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1984 - 2004, BY WATER YEAR (WY)

	MEAN	595	904	1,150	1,289	1,600	1,847	1,762	1,205	1,034	472	386	402
MAX	2,797	3,330	2,421	4,615	3,728	3,612	3,071	3,675	2,915	1,413	1,157	1,517	
(WY)	(2002)	(1993)	(1991)	(1993)	(2001)	(1985)	(1999)	(1996)	(1989)	(1986)	(1998)	(2003)	
MIN	78.6	98.8	155	145	183	689	477	272	153	122	111	81.5	
(WY)	(1995)	(2000)	(2003)	(2000)	(2003)	(2000)	(2004)	(1988)	(1988)	(1988)	(2002)	(1994)	

SUMMARY STATISTICS

FOR 2003 CALENDAR YEAR

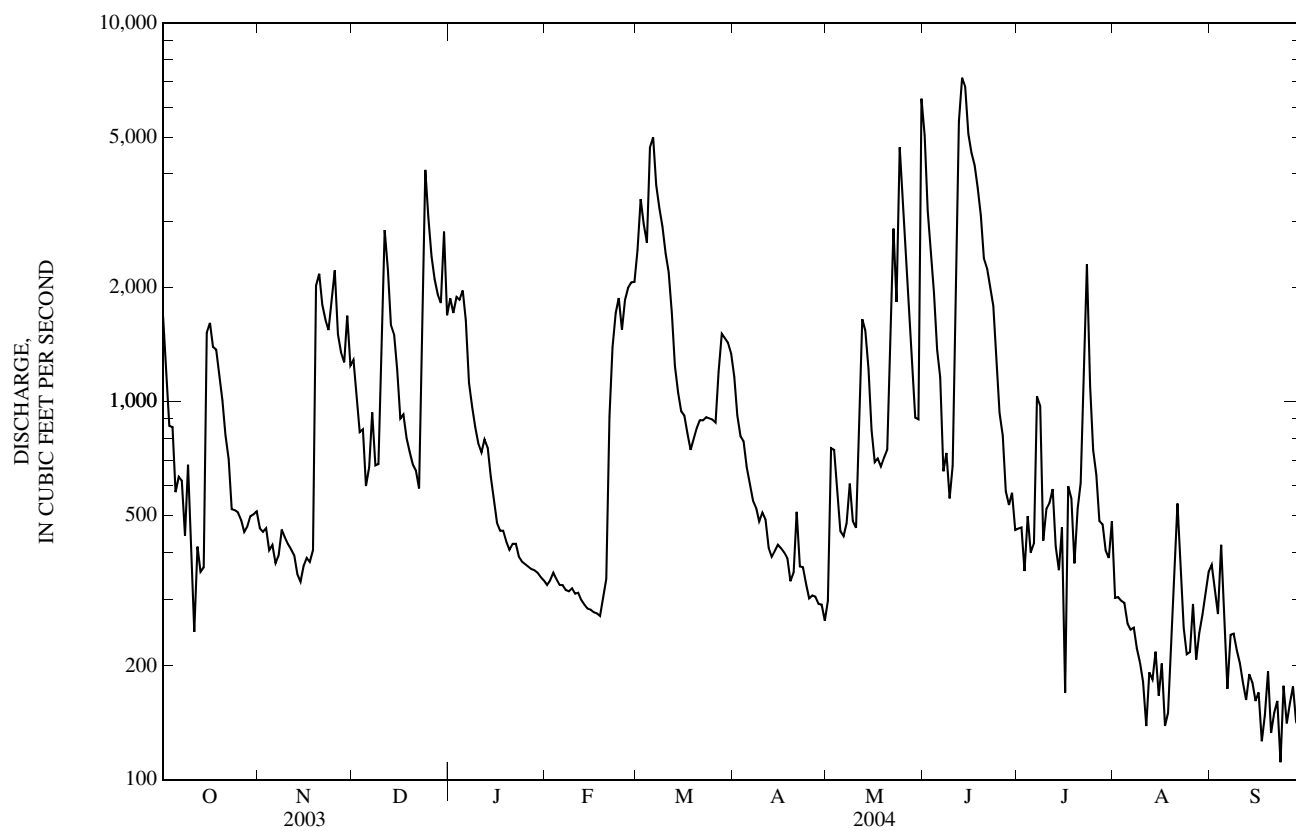
FOR 2004 WATER YEAR

WATER YEARS 1984 - 2004

ANNUAL TOTAL	364,409	362,758	
ANNUAL MEAN	998	991	1,050
HIGHEST ANNUAL MEAN			1,532
LOWEST ANNUAL MEAN			642
HIGHEST DAILY MEAN	6,230	May 10	13,100
LOWEST DAILY MEAN	115	Jan 26	35
ANNUAL SEVEN-DAY MINIMUM	116	Jan 23	45
MAXIMUM PEAK FLOW			13,400
MAXIMUM PEAK STAGE			18.40
ANNUAL RUNOFF (CFSM)	0.942	0.935	0.991
ANNUAL RUNOFF (INCHES)	12.79	12.73	13.46
10 PERCENT EXCEEDS	2,510	2,210	2,670
50 PERCENT EXCEEDS	519	550	504
90 PERCENT EXCEEDS	142	219	141

e Estimated

04180500 ST. JOSEPH RIVER NEAR FORT WAYNE, IN—Continued



04181500 ST. MARYS RIVER AT DECATUR, IN

LOCATION.--Lat 40°50'53", long 84°56'16", in SW $\frac{1}{4}$ SW $\frac{1}{4}$ sec.27, T.28 N., R.14 E., Adams County, Hydrologic Unit 04100004, (DECATUR, IN quadrangle), on left downstream side of bridge on U.S. Highway 27, 0.5 mi upstream from Holthouse Ditch, 1.3 mi north of Decatur, and at mile 29.1.

DRAINAGE AREA.--621 mi².

PERIOD OF RECORD.--October 1946 to current year. Monthly discharge only for some periods, published in WSP 1307. Gage-height records collected at site 0.5 mi upstream January 1932 to November 1954, and at present site thereafter are contained in reports of National Weather Service.

REVISED RECORDS.--WSP 1174: 1948. WSP 1337: 1947. WSP 1627: 1950. WSP 1912: 1955, drainage area.

GAGE.--Water-stage recorder. Datum of gage is 760.44 ft above National Geodetic Vertical Datum of 1929. Prior to July 27, 1948, nonrecording gage at same site and datum.

REMARKS.--Records good, except for estimated daily discharges, which are poor. Flow regulated by Grand Lake. Slight diversion from or into Wabash River Basin and into Miami and Erie Canal.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1,650	172	1,890	705	e91	792	580	136	1,460	128	1,300	2,670
2	864	165	1,960	737	e92	1,930	413	182	925	118	541	883
3	412	173	1,460	716	e93	1,360	320	407	992	115	348	343
4	274	200	916	2,490	e91	1,350	264	356	921	260	568	1,620
5	228	191	583	e5,000	e89	3,050	222	411	572	288	944	1,900
6	201	173	438	e5,100	e90	2,930	196	384	303	149	416	1,310
7	197	157	407	3,960	e87	2,020	183	315	207	120	264	885
8	190	145	480	3,020	e85	1,520	171	291	167	110	188	599
9	172	135	916	2,590	e87	1,100	161	235	145	100	136	281
10	155	127	2,680	1,950	e84	680	147	208	130	97	103	176
11	140	123	2,770	1,040	e85	425	138	198	1,120	92	85	132
12	125	160	1,750	602	e83	306	133	193	4,120	105	73	107
13	115	230	1,170	370	e83	232	127	177	5,600	106	67	92
14	183	250	996	257	e82	206	126	163	6,450	92	63	84
15	706	289	775	e214	e81	192	119	259	5,660	89	62	78
16	539	292	531	e184	e80	176	115	246	4,640	84	60	72
17	527	251	461	e171	e81	175	116	234	4,530	83	60	71
18	603	235	387	e161	e101	180	115	303	4,110	81	66	67
19	670	733	384	e153	e128	223	110	910	2,860	80	85	65
20	551	635	378	e144	764	301	107	568	1,800	81	254	63
21	351	475	313	e136	2,050	608	108	1,560	1,050	90	1,290	59
22	235	528	275	e130	1,390	539	147	1,460	578	590	836	57
23	185	574	1,760	e123	1,350	513	308	789	340	460	376	55
24	159	732	3,390	e119	1,480	500	382	920	239	359	230	54
25	143	713	2,870	e114	1,090	412	341	925	201	356	155	52
26	153	458	2,480	e108	731	502	309	783	176	257	113	52
27	170	552	2,180	e105	564	1,240	239	466	170	180	89	52
28	158	1,630	1,500	e101	419	881	191	280	182	179	309	53
29	179	2,040	961	e98	366	753	159	203	166	181	2,340	58
30	213	1,530	1,320	e95	---	833	140	273	143	176	3,800	72
31	191	---	873	e92	---	797	---	1,890	---	1,210	3,870	---
TOTAL	10,639	14,068	39,254	30,785	11,897	26,726	6,187	15,725	49,957	6,416	19,091	12,062
MEAN	343	469	1,266	993	410	862	206	507	1,665	207	616	402
MAX	1,650	2,040	3,390	5,100	2,050	3,050	580	1,890	6,450	1,210	3,870	2,670
MIN	115	123	275	92	80	175	107	136	130	80	60	52
CFSM	0.55	0.76	2.04	1.60	0.66	1.39	0.33	0.82	2.68	0.33	0.99	0.65
IN.	0.64	0.84	2.35	1.84	0.71	1.60	0.37	0.94	2.99	0.38	1.14	0.72

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1947 - 2004, BY WATER YEAR (WY)

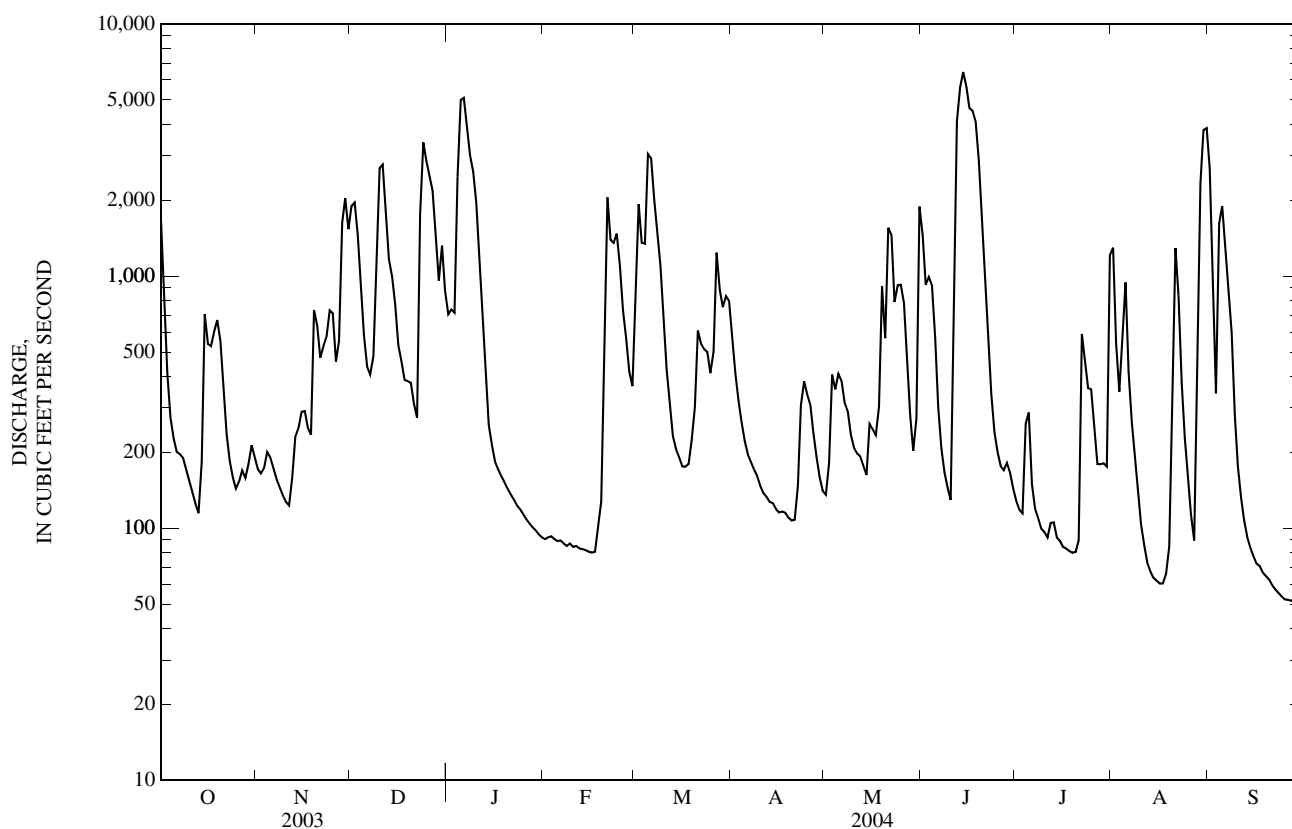
	143	302	571	721	864	1,083	940	527	484	376	166	131
MEAN	143	302	571	721	864	1,083	940	527	484	376	166	131
MAX	1,250	1,988	2,079	3,834	2,546	3,263	3,409	2,140	2,075	3,760	1,263	1,301
(WY)	(2002)	(1993)	(1991)	(1950)	(1950)	(1978)	(1957)	(2003)	(1981)	(2003)	(2003)	(2003)
MIN	7.52	13.7	12.8	21.0	30.5	125	79.3	55.6	28.1	20.6	15.5	12.6
(WY)	(1964)	(1965)	(1964)	(1961)	(1964)	(1981)	(1966)	(1988)	(1988)	(1965)	(1963)	(1963)

STREAMS TRIBUTARY TO LAKE ERIE

04181500 ST. MARYS RIVER AT DECATUR, IN—Continued

SUMMARY STATISTICS	FOR 2003 CALENDAR YEAR		FOR 2004 WATER YEAR		WATER YEARS 1947 - 2004	
ANNUAL TOTAL	468,745		242,807		520	
ANNUAL MEAN	1,284		663		1,151	
HIGHEST ANNUAL MEAN					140	
LOWEST ANNUAL MEAN					14,800	
HIGHEST DAILY MEAN	14,800	Jul 9	6,450	Jun 14	14,800	Jul 9, 2003
LOWEST DAILY MEAN	58	Feb 1	52	Sep 25	5.4	Oct 18, 1960
ANNUAL SEVEN-DAY MINIMUM	60	Jan 27	54	Sep 22	6.2	Oct 12, 1963
MAXIMUM PEAK FLOW			6,590	Jun 14	15,000	Jul 9, 2003
MAXIMUM PEAK STAGE			20.63	Jun 14	26.92	Jul 9, 2003
ANNUAL RUNOFF (CFSM)	2.07		1.07		0.838	
ANNUAL RUNOFF (INCHES)	28.08		14.54		11.39	
10 PERCENT EXCEEDS	3,710		1,770		1,510	
50 PERCENT EXCEEDS	463		252		133	
90 PERCENT EXCEEDS	87		85		23	

e Estimated



04182000 ST. MARYS RIVER NEAR FORT WAYNE, IN

LOCATION.--Lat 40°59'16", long 85°06'43", in NE¼NE¼ sec.12, T.29 N., R.12 E., Allen County, Hydrologic Unit 04100004, (POE, IN quadrangle), on left bank 130 ft downstream from Anthony Boulevard Extension, 0.8 mi downstream from Houk Ditch, 5 mi south of Fort Wayne, and 10.8 mi upstream from mouth.

DRAINAGE AREA.--762 mi².

PERIOD OF RECORD.--October 1930 to current year. Monthly discharge only for some periods, published in WSP 1307. Fragmentary gage-height records for period November 1924 to October 1927 are available from the District Office. Period of record computations do not include 1934 water year.

REVISED RECORDS.--WSP 974: 1942. WSP 1337: 1933, 1947. WSP 1912: 1954, 1955, 1960, drainage area. WDR IN- 82-1: 1973, 1974, 1978, 1979.

GAGE.--Water-stage recorder. Datum of gage is 748.97 ft above National Geodetic Vertical Datum of 1929 (levels by State of Indiana, Department of Natural Resources). Prior to Apr. 13, 1939, nonrecording gage on upstream highway bridge at same datum.

REMARKS.--Records good except for estimated daily discharges, which are poor. The flow is sometimes regulated by Grand Lake. Slight diversion from or into Wabash River Basin and into Miami and Erie Canal. During extreme floods, some water bypasses gage and flows through Houk Ditch and Paul Trier Ditch into the Maumee River.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2,070	202	2,060	910	e143	1,020	857	163	2,450	142	1,670	3,750
2	1,200	178	2,300	887	e146	2,460	628	303	1,310	120	897	1,730
3	663	171	1,940	900	e149	2,020	485	490	1,140	109	521	644
4	418	194	1,290	2,370	e146	1,650	395	507	1,110	148	648	1,210
5	315	218	843	5,310	e142	3,510	329	508	832	363	1,220	2,240
6	257	196	612	5,910	e147	3,840	275	531	490	237	748	1,690
7	222	171	508	5,160	e144	2,840	245	545	308	163	414	1,560
8	217	150	536	4,120	e141	1,970	224	520	222	e117	301	964
9	200	134	849	3,290	e143	1,500	205	398	175	e107	216	540
10	176	122	3,280	2,730	e140	1,020	186	311	149	e102	155	312
11	152	114	3,830	1,720	e142	663	168	279	900	e99	117	218
12	131	143	2,680	981	e139	478	157	249	4,640	e99	94	168
13	112	220	1,560	634	e137	361	151	262	6,540	e116	78	136
14	177	263	1,260	445	e136	294	144	216	8,140	e107	69	115
15	800	291	1,040	e345	e135	265	136	237	7,380	e99	63	101
16	853	328	760	e267	e134	240	126	359	5,880	e95	60	92
17	672	309	620	e223	e134	228	121	300	4,830	e94	57	82
18	687	323	533	e200	e152	232	120	299	4,870	e91	69	78
19	778	751	470	e185	e176	262	114	847	3,940	e89	128	72
20	747	940	475	e175	676	362	110	890	2,480	e91	558	66
21	542	609	423	e169	3,260	589	113	1,450	1,430	e102	1,490	64
22	350	579	366	e163	2,800	734	121	2,140	850	939	1,340	59
23	241	639	1,810	e158	2,410	638	244	1,160	503	814	646	56
24	187	890	4,040	e154	2,610	640	475	1,330	331	483	391	55
25	159	1,010	3,870	e151	2,230	579	455	1,110	259	440	261	53
26	162	654	3,090	e149	1,570	594	423	989	234	382	192	52
27	182	543	2,720	e147	1,090	1,530	356	698	195	268	138	51
28	191	1,460	2,060	e146	692	1,320	275	430	194	210	118	51
29	173	2,590	1,350	e146	582	980	218	285	197	200	1,620	53
30	218	1,970	1,650	e145	---	1,010	178	587	171	205	3,530	61
31	231	---	1,330	e145	---	1,130	---	4,140	---	669	4,040	---
TOTAL	13,483	16,362	50,155	38,435	20,646	34,959	8,034	22,533	62,150	7,300	21,849	16,323
MEAN	435	545	1,618	1,240	712	1,128	268	727	2,072	235	705	544
MAX	2,070	2,590	4,040	5,910	3,260	3,840	857	4,140	8,140	939	4,040	3,750
MIN	112	114	366	145	134	228	110	163	149	89	57	51
CFSM	0.57	0.72	2.12	1.63	0.93	1.48	0.35	0.95	2.72	0.31	0.92	0.71
IN.	0.66	0.80	2.45	1.88	1.01	1.71	0.39	1.10	3.03	0.36	1.07	0.80

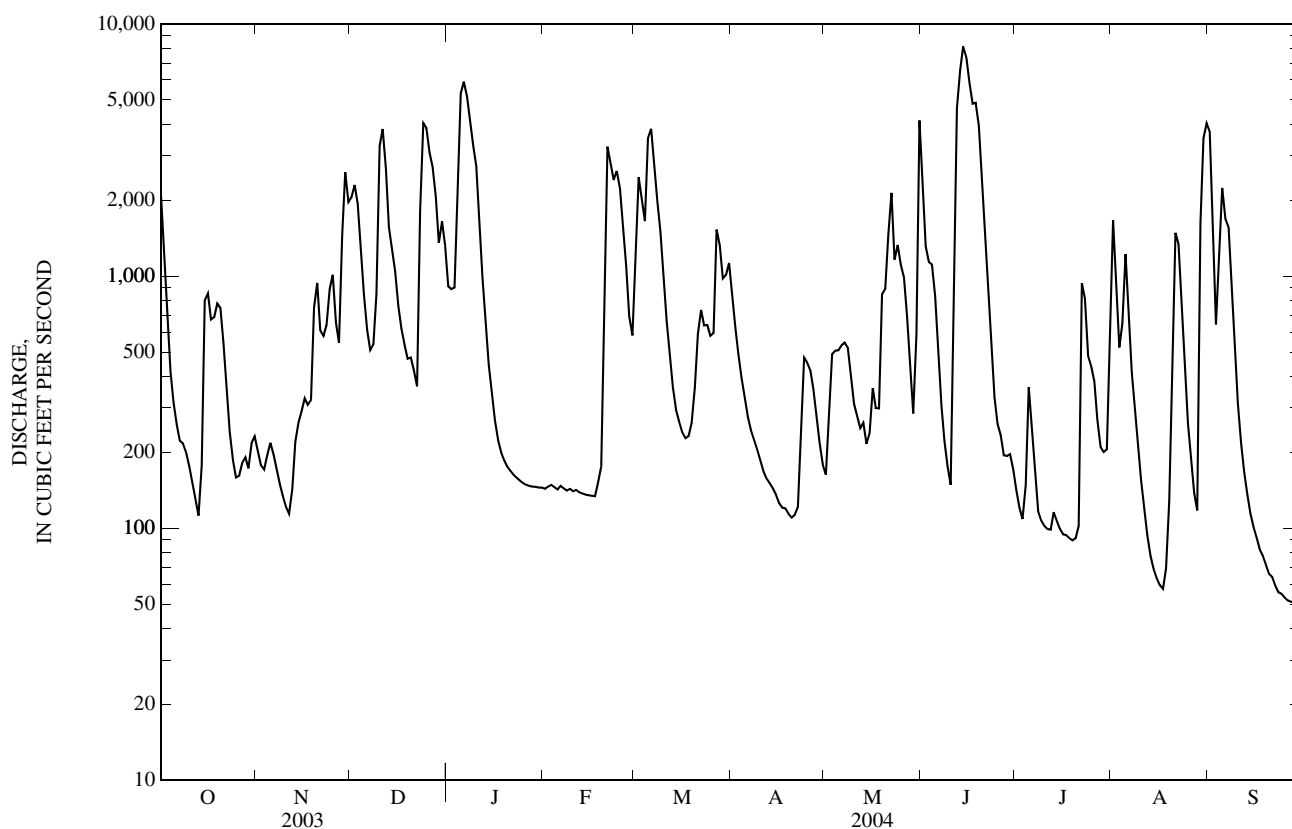
STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1931 - 2004, BY WATER YEAR (WY)

MEAN	168	325	637	860	1,025	1,313	1,135	676	559	396	184	138
MAX	1,595	2,612	2,349	4,897	3,404	4,070	4,119	3,866	2,545	4,174	1,440	1,453
(WY)	(2002)	(1973)	(1978)	(1950)	(1959)	(1978)	(1957)	(1943)	(1981)	(2003)	(2003)	(1992)
MIN	8.28	16.9	16.7	21.3	45.4	87.0	90.7	59.9	34.3	11.9	13.9	11.6
(WY)	(1964)	(1965)	(1964)	(1977)	(1964)	(1941)	(1946)	(1931)	(1988)	(1936)	(1932)	(1944)

04182000 ST. MARYS RIVER NEAR FORT WAYNE, IN—Continued

SUMMARY STATISTICS	FOR 2003 CALENDAR YEAR		FOR 2004 WATER YEAR		WATER YEARS 1931 - 2004	
ANNUAL TOTAL	536,997		312,229		627	
ANNUAL MEAN	1,471		853		1,295	
HIGHEST ANNUAL MEAN					174	
LOWEST ANNUAL MEAN					14,800	
HIGHEST DAILY MEAN	14,800	Jul 9	8,140	Jun 14	14,800	Jul 9, 2003
LOWEST DAILY MEAN	69	Sep 21	51	Sep 27	3.4	Oct 19, 1934
ANNUAL SEVEN-DAY MINIMUM	75	Jan 27	53	Sep 23	4.9	Oct 15, 1934
MAXIMUM PEAK FLOW			8,310	Jun 14	16,000	Jul 9, 2003
MAXIMUM PEAK STAGE			15.48	Jun 14	21.20	Jul 9, 2003
ANNUAL RUNOFF (CFSM)	1.93		1.12		0.822	
ANNUAL RUNOFF (INCHES)	26.22		15.24		11.17	
10 PERCENT EXCEEDS	4,050		2,380		1,800	
50 PERCENT EXCEEDS	536		338		154	
90 PERCENT EXCEEDS	113		110		25	

e Estimated



04182900 MAUMEE RIVER AT FORT WAYNE, IN

LOCATION.--Lat 41°04'57", long 85°06'55", in SE $\frac{1}{4}$ NE $\frac{1}{4}$ sec. 1, T.30 N., R.12 E., Allen County, Hydrologic Unit 04100005, (FORT WAYNE EAST, IN quadrangle), on left bank at downstream side of Hosey Dam, 250 ft upstream of Anthony Boulevard, 1.2 mi below confluence of St. Joseph and St. Mary's Rivers and 1.5 mi upstream of Highway 930.

DRAINAGE AREA.--1,926 mi².

PERIOD OF RECORD.--October 1997 to current year.

GAGE.--Water-stage recorder. Datum of gage 730.07 ft above National Geodetic Vertical Datum of 1929. Prior to December 12, 1962, nonrecording gage on downstream side of bridge at same datum. Dec. 12, 1962 to Aug. 13, 1997 water-stage recorder at site 310 ft downstream at same datum.

EXTREMES FOR PERIOD OF RECORD.--Maximum gage height, 21.24 ft, July 10, 2003; minimum gage height, 0.75 ft, Sept. 29, 1999.

EXTREMES FOR CURRENT YEAR.--Maximum gage height, 20.87 ft, June 14; minimum gage height, 1.12 ft, Sept. 24.

GAGE HEIGHT, FEET
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY OBSERVATION AT 2400 HOURS

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	7.20	2.49	7.40	6.10	1.68	9.70	4.86	2.74	11.44	1.96	4.83	8.15
2	5.03	2.39	6.91	6.22	1.70	10.79	4.23	3.70	8.33	2.64	3.31	4.39
3	4.30	2.41	5.96	6.27	1.71	8.94	3.73	3.97	7.14	1.78	2.93	6.40
4	3.79	2.37	5.09	---	1.70	10.18	3.51	3.18	6.28	2.71	4.89	5.90
5	2.29	2.38	4.00	---	1.72	14.48	3.19	3.18	5.05	1.99	4.32	5.98
6	2.82	2.19	4.26	12.32	1.69	13.52	2.91	3.12	3.98	3.77	2.90	4.74
7	3.02	2.25	4.16	10.24	1.59	10.65	2.73	5.08	3.01	5.58	2.52	4.92
8	2.27	2.30	3.57	9.14	1.69	9.41	2.58	3.54	3.05	2.91	2.26	3.48
9	3.49	2.24	5.30	7.95	1.63	8.33	2.47	3.00	2.56	1.59	2.19	2.38
10	2.17	2.15	10.96	6.95	1.74	7.28	2.48	2.82	3.00	2.71	1.69	2.11
11	2.63	2.17	11.52	4.97	1.79	6.17	2.39	4.17	8.39	2.75	1.33	1.87
12	2.18	2.19	8.54	3.98	1.78	5.09	2.20	4.82	18.36	2.70	1.98	1.57
13	1.85	2.24	6.67	2.97	1.70	4.16	2.17	4.36	20.63	2.32	1.27	1.66
14	3.11	2.31	6.32	2.75	1.60	3.84	2.18	3.89	19.58	1.98	1.76	1.63
15	6.90	2.52	5.18	2.45	1.63	3.57	2.17	3.26	17.52	1.94	1.17	1.65
16	5.49	2.59	4.72	2.04	1.64	3.57	2.16	3.30	15.64	1.18	1.78	1.57
17	5.12	2.46	4.31	2.08	1.61	3.33	2.13	3.23	14.50	2.83	1.96	1.29
18	5.15	4.36	3.94	2.19	1.59	3.29	2.09	3.16	13.52	2.07	1.55	1.20
19	4.89	7.60	3.68	1.97	1.67	3.36	1.93	4.88	11.31	2.18	2.33	1.48
20	4.35	6.51	3.62	1.83	2.71	3.77	3.26	4.31	8.64	1.74	6.26	1.30
21	3.83	5.54	3.44	1.84	8.07	4.49	2.52	8.27	7.30	4.49	5.82	1.20
22	3.08	5.36	3.22	1.81	7.18	4.40	2.17	8.48	5.85	7.41	4.13	1.50
23	2.63	5.36	12.95	1.80	7.91	4.27	2.46	---	4.91	6.49	2.67	1.21
24	2.51	7.03	13.46	1.71	7.42	4.34	2.79	---	3.99	4.03	2.20	1.28
25	2.63	6.67	11.38	1.89	6.69	4.15	2.61	---	3.59	3.73	1.97	1.14
26	2.46	4.74	9.73	1.83	6.63	5.05	2.53	6.66	3.82	3.32	2.41	1.24
27	2.43	4.84	8.95	1.89	6.65	6.90	2.35	5.39	2.53	2.27	1.72	1.41
28	2.50	7.59	7.60	1.82	6.29	6.23	2.20	4.10	2.06	2.55	5.80	1.21
29	2.42	8.34	7.28	1.76	6.18	5.77	2.08	3.32	2.82	1.94	6.58	1.49
30	2.62	6.89	9.82	1.78	---	6.15	1.96	9.99	2.18	2.89	8.33	1.13
31	2.73	---	7.06	1.73	---	5.90	---	16.31	---	4.58	8.78	---
TOTAL	107.89	120.48	211.00	---	97.59	201.08	79.04	---	240.98	93.03	103.64	76.48
MEAN	3.48	4.02	6.81	---	3.37	6.49	2.63	---	8.03	3.00	3.34	2.55
MAX	7.20	8.34	13.46	---	8.07	14.48	4.86	---	20.63	7.41	8.78	8.15
MIN	1.85	2.15	3.22	---	1.59	3.29	1.93	---	2.06	1.18	1.17	1.13

04182950 MAUMEE RIVER AT COLISEUM BLVD AT FORT WAYNE, IN

LOCATION.--Lat 41°04'47", long 85°05'15", in NW¼SW¼SE¼ sec. 5, T.30 N., R.13 E., Allen County, Hydrologic Unit 04100003, (FORT WAYNE EAST, IN quadrangle), on left bank and downstream side of Coliseum Blvd bridge, 0.4 mi north of intersection of State Road 14 and Coliseum Blvd, 1.5 mi downstream of Anthony Blvd, 2.7 mi below confluence of St. Joseph and St. Marys Rivers, and at mile 133.4.

DRAINAGE AREA.--1,930 mi².

PERIOD OF RECORD.--November 28, 2003 to September 30, 2004.

GAGE.--Water-stage recorder. Datum of gage is 728.50 ft. (Provided by Indiana Department of Transportation).

REMARKS.--Records good except those for September 18-30 and estimated daily discharges, which are poor.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	---	---	---	e2,830	e468	e3,240	e2,050	e680	e10,100	e539	e2,020	e4,500
2	---	---	---	e2,470	e461	e5,870	e1,590	e1,280	e5,090	e586	e1,370	e2,520
3	---	---	---	e2,660	e467	e5,300	e1,320	e1,250	e3,560	e570	e971	e1,370
4	---	---	e2,030	e4,090	e458	e4,270	e1,180	e1,220	e2,950	e809	e1,660	e2,310
5	---	---	e1,720	e7,210	e451	e8,220	e1,040	e1,000	e2,230	e754	e1,740	e2,650
6	---	---	e1,320	e7,820	e447	e9,630	e914	e1,020	e1,690	e700	e1,220	e2,010
7	---	---	e1,510	e6,300	e441	e7,440	e840	e1,950	e1,090	e1,380	e816	e2,220
8	---	---	e1,380	e5,310	e438	e5,330	e794	e1,470	e940	e1,220	e702	e1,380
9	---	---	e1,390	e4,120	e434	e4,440	e725	e1,060	e839	e656	e605	e720
10	---	---	e4,200	e3,390	e428	e3,560	e723	e869	e756	e634	e527	e503
11	---	---	e7,170	e2,540	e438	e2,840	e697	e1,250	e2,620	e696	e373	e348
12	---	---	e5,620	e1,810	e435	e2,130	e645	e1,630	e10,400	e818	e309	e345
13	---	---	e3,410	e1,430	e433	e1,590	e590	e1,710	e15,200	e573	e448	e245
14	---	---	e2,790	e1,180	e427	e1,360	e589	e1,430	e17,600	e614	e315	e277
15	---	---	e2,400	e995	e421	e1,140	e601	e1,160	e15,000	e583	e356	e477
16	---	---	e1,810	e807	e418	e1,160	e576	e1,060	e12,600	e304	e340	e281
17	---	---	e1,600	e717	e412	e1,110	e567	e1,030	e10,400	e501	e400	e252
18	---	---	e1,420	e668	e409	e1,020	e554	e1,000	e9,420	e654	e476	e172
19	---	---	e1,290	e622	e417	e1,100	e517	e1,340	e7,830	e595	e675	e191
20	---	---	e1,220	e588	e628	e1,150	e555	e1,670	e5,350	e454	e1,170	e231
21	---	---	e1,150	e572	e2,990	e1,320	e895	e2,090	e3,800	e795	e2,280	e191
22	---	---	e1,070	e551	e3,450	e1,570	e640	e4,940	e2,840	e2,540	e2,030	e180
23	---	---	e3,660	e539	e3,250	e1,480	e630	e3,330	e2,170	e3,260	e1,140	e220
24	---	---	e8,670	e524	e3,790	e1,510	e807	e6,330	e1,640	e2,010	e709	e206
25	---	---	e7,720	e519	e3,010	e1,480	e796	e4,600	e1,310	e1,160	e569	e150
26	---	---	e5,810	e505	e2,860	e1,530	e764	e3,450	e1,170	e1,190	e646	e152
27	---	---	e4,820	e501	e2,780	e2,450	e713	e2,490	e1,040	e786	e497	e169
28	---	---	e4,110	e496	e2,680	e2,780	e642	e1,830	e735	e748	e634	e168
29	---	---	e3,230	e488	e2,520	e2,420	e582	e1,270	e675	e655	e2,140	e197
30	---	---	e4,090	e481	---	e2,310	e544	e1,630	e862	e662	e3,780	e158
31	---	---	e3,390	e472	---	e2,480	---	e11,300	---	e1,020	e4,360	---
TOTAL	---	---	90,000	63,205	36,261	93,230	24,080	68,339	151,907	28,466	35,278	24,793
MEAN	---	---	3,214	2,039	1,250	3,007	803	2,204	5,064	918	1,138	826
MAX	---	---	8,670	7,820	3,790	9,630	2,050	11,300	17,600	3,260	4,360	4,500
MIN	---	---	1,070	472	409	1,020	517	680	675	304	309	150

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 2004 - 2004, BY WATER YEAR (WY)

MEAN	---	---	3,214	2,039	1,250	3,007	803	2,204	5,064	918	1,138	826
MAX	---	---	3,214	2,039	1,250	3,007	803	2,204	5,064	918	1,138	826
(WY)	---	---	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)
MIN	---	---	3,214	2,039	1,250	3,007	803	2,204	5,064	918	1,138	826
(WY)	---	---	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)	(2004)

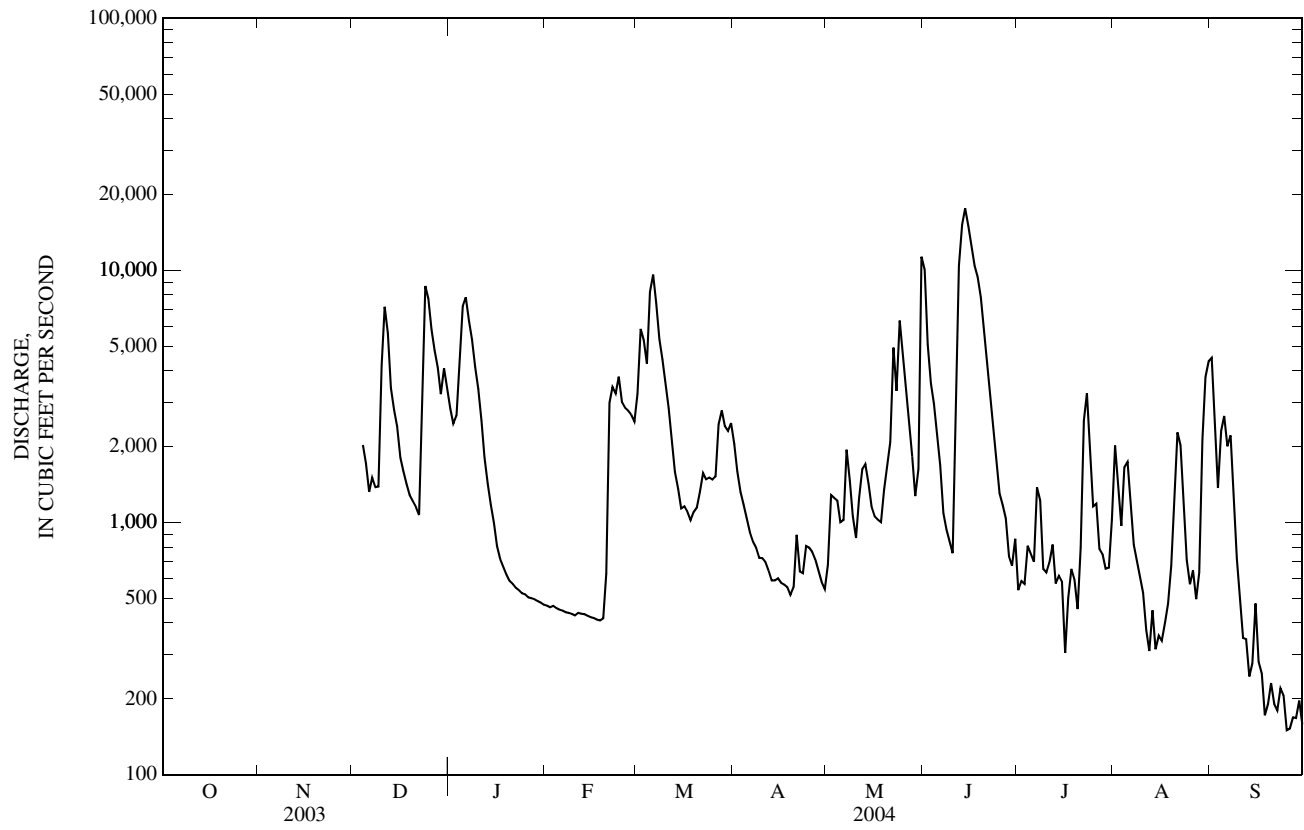
SUMMARY STATISTICS

FOR 2004 WATER YEAR

ANNUAL TOTAL	615,559	
ANNUAL MEAN	2,038	
HIGHEST DAILY MEAN	17,600	Jun 14
LOWEST DAILY MEAN	150	Sep 25
ANNUAL SEVEN-DAY MINIMUM	171	Sep 24
MAXIMUM PEAK FLOW	18,100	Jun 14
MAXIMUM PEAK STAGE	21.33	Jun 14
10 PERCENT EXCEEDS	4,750	
50 PERCENT EXCEEDS	1,150	
90 PERCENT EXCEEDS	419	

e Estimated

04182950 MAUMEE RIVER AT COLISEUM BLVD AT FORT WAYNE, IN—Continued



STREAMS TRIBUTARY TO LAKE ERIE

04183000 MAUMEE RIVER AT NEW HAVEN, IN

LOCATION.--Lat 41°05'06", long 85°01'20", in SE $\frac{1}{4}$ NE $\frac{1}{4}$ sec. 2, T.30 N., R.13 E., Allen County, Hydrologic Unit 04100005, (FORT WAYNE EAST, IN quadrangle), on left bank 600 ft upstream from bridge on Landin Road, 1,400 ft upstream from the Norfolk and Western Railroad bridge, 1.1 mi northwest of New Haven, 2.8 mi upstream from Sixmile Creek and at mile 129.0.

DRAINAGE AREA.--1,967 mi².

PERIOD OF RECORD.--December 1946 to September 1956 (high-water records only), October 1956 to current year.

REVISED RECORDS.--WSP 2112: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 724.51 ft above National Geodetic Vertical Datum of 1929. Prior to Sept. 7, 1956, nonrecording gage, Sept. 7, 1956 to Sept. 14, 1965, water-stage recorder at site 500 ft downstream at same datum.

REMARKS.--Records good except for estimated daily discharges, which are poor. Flow regulated by hydro-powerplant on the St. Joseph River 10.3 mi upstream from station. Flow slightly regulated by upstream reservoirs.

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2003 TO SEPTEMBER 2004
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4,110	764	3,270	3,250	e509	3,700	2,230	625	10,700	536	e2,540	4,590
2	e2,450	690	3,480	2,830	e497	6,380	1,710	1,330	5,650	538	e1,560	2,800
3	e1,560	669	2,930	3,030	e501	5,960	1,410	1,290	3,850	571	950	1,580
4	e1,300	638	2,320	e4,650	e488	4,810	1,240	1,280	3,210	753	1,840	2,940
5	e988	674	1,790	e7,550	e477	8,440	1,060	969	2,450	756	1,930	2,840
6	e912	644	1,330	8,280	e478	9,930	898	992	1,860	634	1,330	2,290
7	e851	578	1,520	6,920	e476	8,110	814	2,490	1,190	1,480	804	2,760
8	e776	633	1,400	5,870	e473	5,920	770	1,790	939	1,360	688	1,730
9	e1,060	621	1,440	4,650	e469	4,930	703	1,130	849	683	590	946
10	e669	594	4,550	3,990	e466	3,970	693	856	746	553	522	647
11	e485	585	7,510	2,990	e476	3,180	672	1,220	2,860	675	337	473
12	e590	594	6,210	2,160	e471	2,380	625	1,680	10,200	792	218	453
13	e590	615	3,900	1,740	e466	1,760	569	1,800	15,300	583	430	299
14	e661	621	3,150	1,450	e461	1,470	565	1,500	18,700	579	227	345
15	1,720	661	2,770	1,250	e456	1,200	575	1,220	16,100	561	323	555
16	2,690	737	2,130	1,000	e449	1,210	553	1,060	13,000	281	250	373
17	2,050	738	1,890	843	e443	1,160	544	1,010	10,800	374	369	336
18	1,970	876	1,690	e759	e445	1,050	530	981	9,740	660	469	190
19	1,910	2,570	1,540	e709	445	1,110	499	1,290	8,310	562	640	175
20	1,820	3,420	1,450	e671	711	1,190	486	1,760	5,910	446	1,240	260
21	1,380	2,480	1,390	e649	3,320	1,370	896	2,090	4,180	672	2,610	185
22	1,180	2,170	1,310	e630	4,020	1,660	638	5,160	3,120	2,700	2,260	175
23	e891	2,100	3,900	e617	3,780	1,570	595	3,640	2,380	3,560	1,250	240
24	746	2,700	8,900	e604	4,330	1,590	758	6,620	1,780	2,240	710	166
25	e665	3,320	8,230	e586	3,500	1,570	769	5,060	1,410	1,210	562	158
26	e647	2,530	6,380	e579	3,310	1,650	733	3,700	1,230	1,250	603	130
27	e641	1,940	5,340	e569	3,230	2,610	683	2,680	1,090	828	515	157
28	e709	2,380	4,610	e555	3,120	3,020	610	1,990	726	701	559	208
29	729	4,270	3,680	e546	2,940	2,600	550	1,360	623	e612	2,220	230
30	713	3,660	4,470	e537	---	2,440	507	1,710	847	e612	3,880	192
31	780	---	3,960	e523	---	2,680	---	11,100	---	e1,140	4,440	---
TOTAL	38,243	45,472	108,440	70,987	41,207	100,620	23,885	71,383	159,750	28,902	36,866	28,423
MEAN	1,234	1,516	3,498	2,290	1,421	3,246	796	2,303	5,325	932	1,189	947
MAX	4,110	4,270	8,900	8,280	4,330	9,930	2,230	11,100	18,700	3,560	4,440	4,590
MIN	485	578	1,310	523	443	1,050	486	625	623	281	218	130
CFSM	0.63	0.77	1.78	1.16	0.72	1.65	0.40	1.17	2.71	0.47	0.60	0.48
IN.	0.72	0.86	2.05	1.34	0.78	1.90	0.45	1.35	3.02	0.55	0.70	0.54

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1957 - 2004, BY WATER YEAR (WY)

	643	1,217	2,086	1,938	2,674	3,673	3,384	2,025	1,732	1,100	627	585
MEAN												
MAX	5,219	6,523	6,292	7,203	7,649	11,460	7,955	6,914	6,480	5,989	2,687	3,264
(WY)	(2002)	(1993)	(1968)	(1993)	(1976)	(1982)	(1957)	(1996)	(1981)	(2003)	(2003)	(2003)
MIN	62.3	102	96.4	119	161	1,181	789	382	122	197	99.1	91.2
(WY)	(1964)	(1965)	(1964)	(1963)	(1964)	(1981)	(1971)	(1988)	(1988)	(1964)	(1962)	(1963)

04183000 MAUMEE RIVER AT NEW HAVEN, IN—Continued

SUMMARY STATISTICS	FOR 2003 CALENDAR YEAR		FOR 2004 WATER YEAR		WATER YEARS 1957 - 2004	
ANNUAL TOTAL	1,021,496		754,178		1,801	
ANNUAL MEAN	2,799		2,061		2,975	1993
HIGHEST ANNUAL MEAN					669	1963
LOWEST ANNUAL MEAN					26,300	Mar 17, 1982
HIGHEST DAILY MEAN	19,300	Jul 10	18,700	Jun 14	48	Oct 6, 1963
LOWEST DAILY MEAN	155	Sep 21	130	Sep 26	55	Oct 4, 1963
ANNUAL SEVEN-DAY MINIMUM	176	Jan 27	173	Sep 21	26,600	Mar 17, 1982
MAXIMUM PEAK FLOW			19,000	Jun 14	25.49	Mar 17, 1982
MAXIMUM PEAK STAGE			21.33	Jun 14	0.916	
ANNUAL RUNOFF (CFSM)	1.42		1.05		12.44	
ANNUAL RUNOFF (INCHES)	19.32		14.26		4,860	
10 PERCENT EXCEEDS	7,730		4,600		782	
50 PERCENT EXCEEDS	1,370		1,180		158	
90 PERCENT EXCEEDS	352		468			

e Estimated

