

UPPER MISSISSIPPI RIVER MAIN STEM--Continued

05288705 SHINGLE CREEK AT QUEEN AVE. IN MINNEAPOLIS, MN

LOCATION.-- Lat 45°03'00", long 93°18'36", in NE $\frac{1}{4}$ NW $\frac{1}{4}$ sec. 11, T.118 N., R.21 W., Hennepin County, Hydrologic Unit 07010206, at bridge over Shingle Creek at intersection of Queen Avenue North and 52nd Avenue North in Minneapolis.

DRAINAGE AREA.-- 28.2 mi².

PERIOD OF RECORD.-- May 1996 to September 1999, May 2001 to current year.

GAGE.-- Water-stage recorder. Elevation of gage is 850 ft above sea level (from topographic map).

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

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	13	15	7.2	4.8	e2.0	e16	12	13	17	102	8.8	e6.5
2	11	14	6.9	4.9	e2.1	e9.0	11	11	16	89	8.4	e6.8
3	10	13	6.3	4.8	e2.1	e5.0	11	10	14	102	11	e7.0
4	76	13	6.0	4.9	e2.0	e4.0	11	12	13	82	9.1	e7.6
5	72	12	5.9	4.8	e1.9	e3.6	9.4	26	14	65	9.1	7.7
6	80	12	5.8	4.6	e1.8	e3.4	8.5	23	27	51	8.5	7.7
7	70	12	5.9	4.9	e1.8	e3.5	9.0	16	38	40	5.4	7.5
8	64	11	5.4	5.2	e1.9	e3.7	10	14	32	33	5.4	7.1
9	53	11	5.3	4.7	e2.0	e3.6	9.5	51	25	35	5.5	7.3
10	58	10	5.7	4.1	e2.1	e4.0	7.7	48	e36	36	5.5	9.8
11	50	9.3	6.4	4.1	e2.2	e5.0	6.8	95	e33	38	7.2	14
12	52	8.8	7.7	4.2	e2.2	6.9	5.4	80	e35	38	4.4	61
13	45	8.7	8.9	4.0	e2.2	18	4.1	71	e29	33	3.6	38
14	40	8.4	8.6	4.1	e2.1	43	4.2	76	21	35	4.3	26
15	34	7.8	7.8	4.1	e2.1	60	7.2	64	14	49	4.6	18
16	29	7.5	6.7	4.1	e2.1	65	73	56	11	40	4.7	12
17	26	7.6	6.4	e4.1	e3.0	55	74	48	9.2	32	4.2	11
18	26	8.0	13	e4.2	e5.2	42	63	42	9.9	27	4.0	15
19	23	8.1	10	e4.1	e11	31	60	77	8.1	22	4.1	12
20	21	7.5	8.6	e3.5	e30	28	57	80	7.0	21	12	9.6
21	21	7.4	6.3	e2.8	e25	27	50	72	6.2	18	8.7	9.3
22	19	7.2	7.1	e2.2	e21	21	41	65	5.9	16	5.0	8.5
23	17	7.4	6.0	e1.6	e18	14	36	55	13	14	4.3	6.8
24	15	5.7	5.5	e1.6	e15	14	28	47	13	12	5.1	16
25	15	6.9	5.3	e1.7	e13	12	24	40	e230	12	5.1	13
26	14	7.0	5.1	e1.7	e13	10	22	35	171	11	5.0	10
27	12	6.8	5.2	e1.7	e14	14	21	31	155	9.8	4.9	5.8
28	13	6.8	5.4	e1.7	e15	23	18	27	140	8.7	e8.5	4.2
29	14	7.4	5.2	e1.8	---	21	17	23	125	7.6	e8.1	3.7
30	16	6.0	5.4	e1.8	---	20	14	24	112	6.8	e7.7	3.2
31	18	---	4.8	e1.9	---	15	---	20	---	9.0	e7.2	---
TOTAL	1,027	273.3	205.8	108.7	215.8	600.7	724.8	1,352	1,380.3	1,094.9	199.4	372.1
MEAN	33.1	9.11	6.64	3.51	7.71	19.4	24.2	43.6	46.0	35.3	6.43	12.4
MAX	80	15	13	5.2	30	65	74	95	230	102	12	61
MIN	10	5.7	4.8	1.6	1.8	3.4	4.1	10	5.9	6.8	3.6	3.2
AC-FT	2,040	542	408	216	428	1,190	1,440	2,680	2,740	2,170	396	738
CFSM	1.17	0.32	0.24	0.12	0.27	0.69	0.86	1.55	1.63	1.25	0.23	0.44
IN.	1.35	0.36	0.27	0.14	0.28	0.79	0.96	1.78	1.82	1.44	0.26	0.49

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1996 - 2003, BY WATER YEAR (WY)

MEAN	13.9	13.1	7.25	4.08	6.36	16.7	28.8	34.2	32.3	30.0	21.7	13.0
(WY)	(2003)	(1997)	(1997)	(1997)	(1998)	(1997)	(1998)	(2002)	(2002)	(2002)	(2002)	(2002)
MAX	33.1	28.2	9.21	7.25	8.03	24.3	32.1	56.6	55.4	58.5	56.2	32.4
MIN	4.46	5.22	3.99	2.49	3.97	12.4	24.2	13.3	7.47	7.92	5.04	2.92
(WY)	(2002)	(1998)	(1998)	(2002)	(2002)	(2002)	(2003)	(1997)	(1997)	(1996)	(1996)	(1996)

05288705 SHINGLE CREEK AT QUEEN AVE. IN MINNEAPOLIS, MN—Continued

SUMMARY STATISTICS	FOR 2002 CALENDAR YEAR	FOR 2003 WATER YEAR	WATER YEARS 1996 - 2003
ANNUAL TOTAL	10,925.0	7,554.8	
ANNUAL MEAN	29.9	20.7	20.1
HIGHEST ANNUAL MEAN			27.9
LOWEST ANNUAL MEAN			12.1
HIGHEST DAILY MEAN	135	May 9	230
LOWEST DAILY MEAN	1.7	Jan 29	a1.6
ANNUAL SEVEN-DAY MINIMUM	1.8	Jan 29	1.7
MAXIMUM PEAK FLOW		c230	Jun 25
MAXIMUM PEAK STAGE		14.21	Jun 25
INSTANTANEOUS LOW FLOW		a1.6	Jan 23
ANNUAL RUNOFF (AC-FT)	21,670	14,980	14,550
ANNUAL RUNOFF (CFSM)	1.06	0.73	0.71
ANNUAL RUNOFF (INCHES)	14.41	9.97	9.68
10 PERCENT EXCEEDS	75	55	53
50 PERCENT EXCEEDS	21	10	9.9
90 PERCENT EXCEEDS	2.6	3.7	2.8

a Daily mean, backwater from ice.

b Minimum observed.

c Maximum daily.

e Estimated.

