Water-Data Report 2013

05387440 Upper Iowa River at Bluffton, IA

Upper Mississippi-Maquoketa-Plum Basin
Upper Iowa Subbasin

LOCATION.--Lat 43°24′25″, long 91°53′56″ referenced to North American Datum of 1927, in NW ¼ NW ¼ SE ¼ sec.10, T.99 N., R.9 W., Winneshiek County, IA, Hydrologic Unit 07060002, on left bank 10 ft downstream from bridge on County Highway W20, 6.8 mi northwest of Decorah, 0.5 mi upstream from Silver Creek, and 73.9 mi upstream from mouth.

DRAINAGE AREA.--367 mi^2.

SURFACE-WATER RECORDS

PERIOD OF RECORD.--Partial-record low-flow measurement site from September 1957 to July 1977; stage-only records from October 1999 to September 2002; discharge records from October 2002 to current year.

GAGE.--Water-stage recorder. Datum of gage is 945.50 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Records good except for estimated daily discharges, which are poor. U.S. Geological Survey data collection platform with satellite and telephone modem telemetry at station.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of June 21, 1954, discharge 13,600 ft^3/s, on basis of peak flow at Decorah gage, 11.0 mi downstream. Flood of March 27, 1961, discharge 20,200 ft^3/s.

Suggested citation: U.S. Geological Survey, 2014, Water-resources data for the United States, Water Year 2013: U.S. Geological Survey Water-Data Report WDR-US-2013, site 05387440, accessed at http://wdr.water.usgs.gov/wy2013/pdfs/05387440.2013.pdf

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DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2012 TO SEPTEMBER 2013
DAILY MEAN VALUES
[e, estimated]

Day	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
1	47	63	56	e42	e23	e77	2,590	801	3,420	1,100	300	156
2	47	60	56	e46	e31	e76	1,440	801	5,160	1,000	290	152
3	48	58	56	e52	e35	e79	1,050	938	2,690	948	276	150
4	48	58	54	e52	e38	e83	1,080	1,630	2,080	886	263	150
5	48	57	52	e51	e38	e83	1,190	2,910	2,030	825	281	148
6	47	59	53	e50	e44	e81	981	3,350	1,950	768	291	147
7	48	60	53	e49	e54	e84	727	2,300	1,820	720	296	147
8	49	58	52	e49	e53	e88	691	1,600	1,680	689	275	144
9	56	58	55	e48	e57	e107	728	1,380	1,570	698	260	142
10	55	58	55	e53	e76	e898	6,090	1,690	1,510	660	245	140
11	53	67	45	e53	e199	1,480	4,670	1,550	1,450	609	244	138
12	51	74	56	e57	e114	1,020	2,230	1,320	1,590	569	249	135
13	58	70	57	e40	e104	749	1,590	1,140	2,280	541	240	132
14	71	68	52	e35	e110	553	1,820	1,030	2,290	524	233	131
15	67	66	62	e39	e104	476	5,780	930	1,790	495	224	150
16	59	62	67	e40	e94	424	3,500	843	1,620	470	216	148
17	55	60	64	e30	e100	338	1,730	846	1,480	445	210	144
18	54	61	65	e36	e105	310	1,580	1,030	1,350	438	204	148
19	54	61	65	e42	e75	e235	1,790	1,240	1,270	435	200	148
20	52	60	73	e30	e76	e146	1,630	2,690	1,190	414	199	147
21	50	59	51	e22	e79	e137	1,340	7,430	1,760	413	198	140
22	54	58	49	e24	e85	e139	1,280	3,160	3,970	397	200	137
23	58	56	62	e24	e77	152	1,400	2,660	8,260	385	200	134
24	60	55	56	e31	e81	145	1,500	2,380	4,670	364	195	129
25	83	55	46	e38	e92	141	1,330	1,950	3,620	361	189	128
26	125	52	49	e39	e94	162	1,160	1,800	2,680	434	184	127
27	103	43	49	e53	e90	266	1,050	2,130	1,970	384	175	125
28	91	57	53	e90	e80	441	958	2,470	1,550	362	170	127
29	78	61	e47	e131	---	1,100	900	2,660	1,390	344	166	127
30	71	57	e42	e93	---	3,010	850	4,530	1,230	326	164	126
31	66	---	e44	e38	---	3,490	---	6,510	---	313	160	---
Total	1,906	1,791	1,696	1,477	2,208	16,570	54,655	67,699	71,320	17,317	6,997	4,197
Mean	61.5	59.7	54.7	47.6	78.9	535	1,822	2,184	2,377	559	226	140
Max	125	74	73	131	199	3,490	6,090	7,430	8,260	1,100	300	156
Min	47	43	42	22	23	76	691	801	1,190	313	160	125
Ac-ft	3,780	3,550	3,360	2,930	4,380	32,870	108,400	134,300	141,500	34,350	13,880	8,320
Cfsm	0.17	0.16	0.15	0.13	0.21	1.46	4.96	5.95	6.48	1.52	0.62	0.38
In.	0.19	0.18	0.17	0.15	0.22	1.68	5.54	6.86	7.23	1.76	0.71	0.43

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 2003 - 2013, BY WATER YEAR (WY)

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
Mean	236	184	121	121	166	571	669	674	827	361	237	241
Max	922	431	237	255	404	1,445	1,822	2,184	2,377	685	726	726
(WY)	(2008)	(2010)	(2011)	(2011)	(2005)	(2011)	(2013)	(2013)	(2013)	(2004)	(2007)	(2010)
Min	47.4	52.0	46.0	42.4	47.8	86.5	92.8	287	168	93.3	66.5	44.5
(WY)	(2004)	(2004)	(2004)	(2003)	(2004)	(2003)	(2004)	(2007)	(2012)	(2012)	(2003)	(2003)

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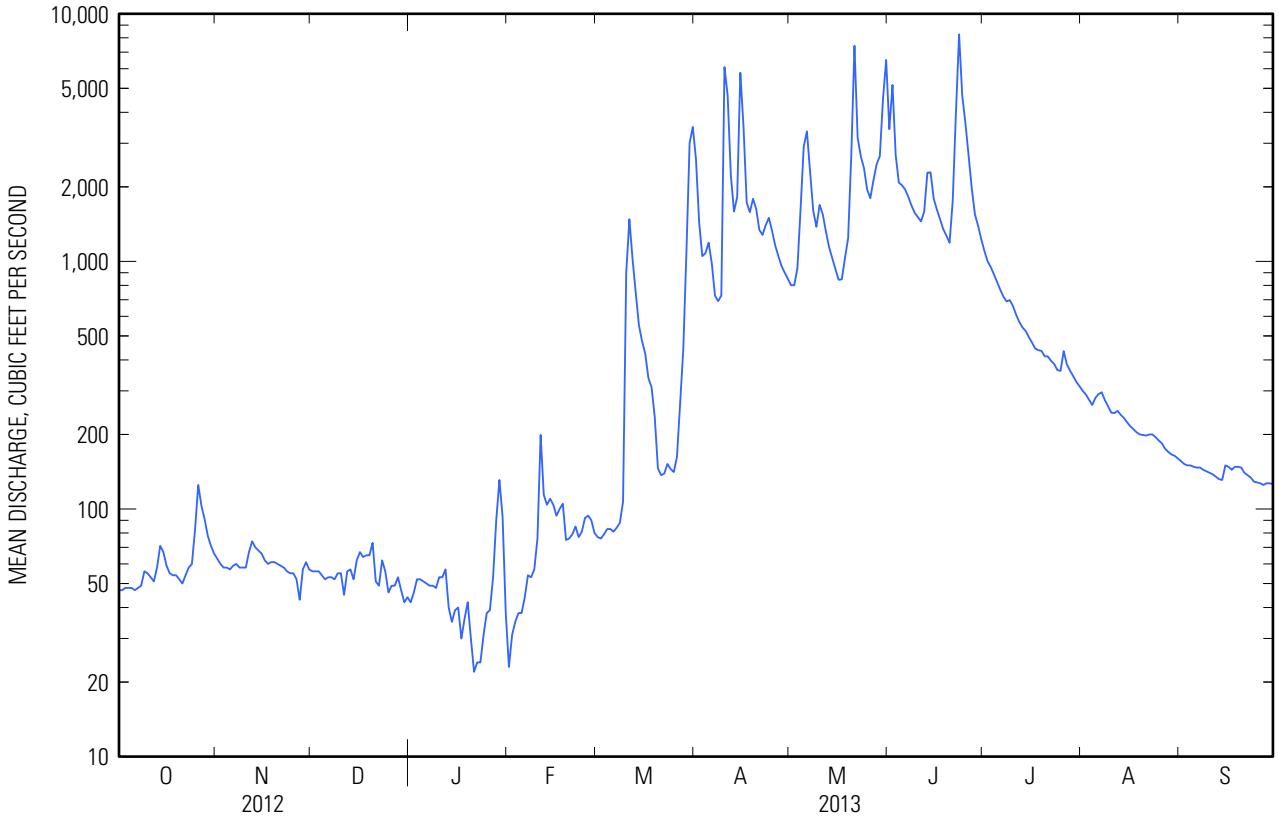
SUMMARY STATISTICS

	Calendar Year 2012		Water Year 2013		Water Years 2003 - 2013	
Annual total	45,198		247,833			
Annual mean	123		679		368	
Highest annual mean					679	2013
Lowest annual mean					118	2003
Highest daily mean	970	May 7	8,260	Jun 23	13,800	Jun 9, 2008
Lowest daily mean	29	Jan 13	22	Jan 21	22	Jan 21, 2013
Annual seven-day minimum	39	Jan 12	30	Jan 17	30	Jan 17, 2013
Maximum peak flow			12,000	Jun 23	16,600	Jun 9, 2008
Maximum peak stage			13.56	Jun 23	15.49	Jun 9, 2008
Instantaneous low flow			[a]13	Nov 27[b]		
Annual runoff (ac-ft)	89,650		491,600		266,300	
Annual runoff (cfsm)	0.336		1.85		1.00	
Annual runoff (inches)	4.58		25.12		13.61	
10 percent exceeds	235		1,870		809	
50 percent exceeds	80		147		179	
90 percent exceeds	49		48		57	

[a] Result of freeze-up.
[b] Also Dec 21, result of freeze-up.