

06132000 MISSOURI RIVER BELOW FORT PECK DAM, MT

Missouri-Poplar Basin
Prarie Elk-Wolf Subbasin

LOCATION.--Lat 48°02'40", long 106°21'23" referenced to North American Datum of 1983, in NW ¼ sec.6, T.26 N., R.42 E., McCone County, MT, Hydrologic Unit 10060001, on right bank 2 mi upstream from Milk River, 6 mi south of Nashua, 8 mi downstream from Fort Peck Dam, and at river mile 1,763.5.

DRAINAGE AREA.--57,556 mi².

SURFACE-WATER RECORDS

PERIOD OF RECORD.--March 1934 to current year.

REVISED RECORDS.--Water Supply Paper 1729: Drainage area.

GAGE.--Water-stage recorder. Elevation of gage is 2,018 ft, referenced to the National Geodetic Vertical Datum of 1929 (U.S. Army Corps of Engineers bench mark). Prior to Apr. 14, 1938, at site 0.7 mi upstream at different elevation; Apr. 14, 1938, to Sept. 30, 1963, at present site at elevation 2.00 ft higher, all water-stage recorders. Since Oct. 1, 1969, published discharge is determined by flow meters and spillway discharge at Fort Peck Dam.

COOPERATION.--Beginning Oct. 1, 1969, records have been furnished by the U.S. Army Corps of Engineers; 2 to 4 discharge measurements are made each year and the records are reviewed by the U.S. Geological Survey. Records for March 1934 to September 1969 collected and computed by the U.S. Geological Survey.

REMARKS.--Flow is completely regulated by Fort Peck Dam. Diversions for irrigation of about 880,400 acres occur upstream from station. Operational level in Fort Peck Lake was reached beginning 1944 water year. Several unpublished observations of water temperature and specific conductance were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum daily discharge, 65,900 ft³/s, June 15, 2011, furnished by U.S. Army Corps of Engineers; maximum gage height, 15.53 ft, June 13, 2011, at U.S.G.S. gaging station; maximum daily reverse flow, 400 ft³/s, Mar. 29, 1943, backwater from Milk River.

06132000 MISSOURI RIVER BELOW FORT PECK DAM, MT—Continued

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012
DAILY MEAN VALUES

Day	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
1	9,300	9,100	10,300	11,100	12,000	8,200	6,900	7,600	9,000	11,000	11,200	10,000
2	9,300	9,000	10,100	11,100	12,000	8,100	6,600	9,000	8,900	10,900	11,100	9,900
3	9,200	10,300	11,100	10,900	12,000	7,100	6,600	9,200	9,000	11,100	11,400	10,100
4	9,200	10,100	11,400	10,800	12,000	6,300	6,700	9,000	8,300	11,200	11,100	10,200
5	9,300	10,500	11,300	12,000	12,200	6,500	6,700	8,800	8,200	11,100	11,200	10,300
6	9,600	9,850	11,300	11,900	12,000	6,600	6,700	9,300	8,400	11,100	11,300	12,200
7	9,700	10,200	11,300	12,000	11,900	6,700	6,600	9,600	8,400	11,200	11,200	14,400
8	9,600	10,100	11,300	11,800	12,100	6,700	6,800	9,700	9,600	10,700	11,300	15,500
9	9,700	10,000	11,200	11,900	12,100	6,700	6,600	9,700	9,000	10,900	11,200	10,200
10	9,600	10,100	11,300	11,900	12,100	6,700	6,500	9,600	9,400	11,000	11,200	10,300
11	9,000	10,100	11,300	11,800	12,000	7,050	6,600	9,700	9,000	11,100	11,200	10,000
12	8,500	10,100	11,400	12,000	12,100	7,100	6,600	9,700	9,900	11,400	11,300	10,100
13	8,700	10,300	11,100	12,100	11,000	6,900	6,600	9,600	10,000	11,200	11,200	10,000
14	9,200	10,100	11,200	12,000	11,300	7,000	6,400	9,700	9,900	11,200	11,200	9,900
15	9,300	10,100	11,100	12,000	11,000	6,700	6,300	9,700	9,900	11,100	11,100	10,100
16	9,200	10,300	11,100	12,000	11,200	6,800	6,400	9,600	9,600	11,200	11,400	10,000
17	9,200	10,200	10,900	12,100	11,100	6,700	6,500	8,800	9,700	11,200	11,200	10,100
18	9,200	10,100	11,200	12,000	10,000	6,600	6,600	9,000	11,200	11,100	11,100	9,900
19	9,200	10,400	11,100	11,900	10,000	6,700	6,800	9,000	11,100	11,000	11,400	9,900
20	9,100	10,200	11,000	11,900	10,000	6,700	7,000	9,000	11,000	11,100	11,400	10,000
21	9,200	10,000	11,100	12,000	10,000	6,700	7,200	8,900	11,000	11,100	11,200	10,000
22	9,100	10,000	11,200	12,000	10,100	6,600	7,200	9,000	11,100	11,100	11,000	10,000
23	9,100	10,100	10,900	11,900	9,200	6,700	7,100	9,100	11,000	11,100	11,000	10,200
24	9,200	10,000	11,100	11,900	9,200	6,600	7,300	8,800	11,100	11,100	9,900	10,100
25	9,100	10,200	11,100	12,000	9,200	6,700	7,500	8,700	11,100	11,100	9,900	10,100
26	9,200	10,100	11,000	12,100	9,200	6,700	7,700	8,700	11,000	11,200	10,000	10,200
27	9,300	10,000	10,900	11,800	8,900	6,600	7,600	8,800	11,200	11,200	9,900	10,100
28	9,200	10,100	10,900	11,700	9,000	6,600	7,600	8,800	10,900	11,300	10,100	10,100
29	9,300	10,100	11,000	11,800	8,900	6,600	7,500	8,600	10,900	11,200	9,900	10,100
30	9,200	10,200	11,000	12,000	---	6,500	7,500	8,700	10,800	11,200	9,900	10,200
31	9,200	---	10,600	11,900	---	6,600	---	8,900	---	11,200	9,900	---
Total	286,200	301,950	342,800	366,300	313,800	210,750	206,700	282,300	299,600	344,600	337,400	314,200
Mean	9,232	10,060	11,060	11,820	10,820	6,798	6,890	9,106	9,987	11,120	10,880	10,470
Max	9,700	10,500	11,400	12,100	12,200	8,200	7,700	9,700	11,200	11,400	11,400	15,500
Min	8,500	9,000	10,100	10,800	8,900	6,300	6,300	7,600	8,200	10,700	9,900	9,900
Ac-ft	567,700	598,900	679,900	726,600	622,400	418,000	410,000	559,900	594,300	683,500	669,200	623,200

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1944 - 2012, BY WATER YEAR (WY)*

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
Mean	10,430	8,593	8,932	9,555	9,483	7,167	7,042	8,434	9,124	10,120	11,570	11,080
Max	28,800	21,150	13,330	14,010	15,240	13,390	17,230	18,830	52,670	41,510	26,640	27,120
(WY)	(1956)	(1998)	(1944)	(1971)	(1979)	(1982)	(1979)	(1979)	(2011)	(2011)	(2011)	(1948)
Min	3,016	2,085	1,490	1,390	1,180	1,050	856	950	832	1,163	3,449	2,997
(WY)	(1994)	(1947)	(1946)	(1946)	(1945)	(1944)	(1945)	(1944)	(1944)	(1945)	(1963)	(1992)

*Period of record after operational level in Fort Peck Lake was reached.

06132000 MISSOURI RIVER BELOW FORT PECK DAM, MT—Continued

SUMMARY STATISTICS

	Calendar Year 2011		Water Year 2012		Water Years 1944 – 2012*	
Annual total	6,763,380		3,606,600			
Annual mean	18,530		9,854		9,296	
Highest annual mean					17,670	2011
Lowest annual mean					5,004	2010
Highest daily mean	65,900	Jun 15	15,500	Sep 8	65,900	Jun 15, 2011
Lowest daily mean	6,500	Apr 3	6,300	Mar 4	16	Apr 6, 1978
Annual seven-day minimum	6,730	Apr 24	6,490	Apr 10	161	Mar 26, 1944
Annual runoff (ac-ft)	13,420,000		7,154,000		6,735,000	
10 percent exceeds	44,900		11,900		14,600	
50 percent exceeds	10,100		10,100		8,000	
90 percent exceeds	7,160		6,700		4,180	

*Period of record after operational level in Fort Peck Lake was reached.

