

RED RIVER OF THE NORTH BASIN--Continued

05050000 BOIS DE SIOUX RIVER NEAR WHITE ROCK, SD

LOCATION.--Lat 45°51'45", long 96°34'25", in SW¹/₄SW¹/₄ sec. 27, T.128 N., R.47 W., Roberts County, Hydrologic Unit 09020101, on Sisseton Indian Reservation, on left bank at Big Slough Outlet, 300 ft downstream from White Rock Dam, 4 mi south of White Rock and 5 mi northwest of Wheaton, MN.

DRAINAGE AREA.--1,160 mi² (approximately).

PERIOD OF RECORD.--October 1941 to current year.

GAGE.--Water-stage recorder. Datum of gage is 960.00 ft. above sea level, (adjustment of 1912, levels by U.S. Army Corps of Engineers). Prior to Jan. 14, 1943, nonrecording gage at same site at datum 0.11 ft lower. Jan. 15, 1943 to Sept. 30, 1963, water-stage recorder at same site at datum 0.11 ft lower.

REMARKS.--Records fair except those for estimated daily discharges, which are poor. Flow regulated by Lake Traverse-Boise de Sioux Flood Control and Water Conservation project.

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 2000 TO SEPTEMBER 2001
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.43	10	e2.6	e1.2	e1.2	e240	e355	1920	1220	1160	570	4.7
2	.39	15	e2.8	e1.2	e1.2	e300	e370	1670	1220	1170	564	3.8
3	.35	10	e3.0	e1.2	e1.2	e340	390	1570	1220	1160	488	2.9
4	.44	6.7	e3.2	e1.2	e1.2	e350	389	1470	1220	1150	421	2.2
5	.63	4.8	e3.0	e1.2	e1.2	e360	389	1400	1220	1160	413	1.8
6	.63	5.5	e2.8	e1.3	e1.2	e370	385	1370	1210	1160	356	1.6
7	.74	12	e2.7	e1.3	e1.2	e375	281	1370	1210	1140	210	3.6
8	.81	20	e2.6	e1.3	e1.2	e390	237	1340	1210	1130	56	3.8
9	.73	14	e2.4	e1.3	e1.2	e400	209	1310	1210	1140	2.9	2.8
10	.73	11	e2.2	e1.3	e1.2	e410	200	1290	1240	1140	2.7	2.3
11	.80	9.5	e2.1	e1.3	e1.2	e400	629	1270	1130	1140	2.3	1.9
12	.82	7.3	e2.0	e1.3	e1.2	e390	3110	1260	776	1120	2.2	1.7
13	.88	12	e2.0	e1.3	e1.2	e380	3780	1260	578	1110	1.8	1.3
14	.88	8.9	e1.9	e1.3	e1.2	e375	3500	1250	706	1110	1.6	1.7
15	1.0	9.6	e1.9	e1.3	e1.2	e375	3620	1280	656	1080	1.7	4.2
16	1.1	e8.6	e1.8	e1.3	e1.2	e370	3760	1290	551	1070	1.6	4.7
17	1.2	e6.0	e1.8	e1.3	e1.2	e370	3650	1280	639	1070	1.5	4.7
18	1.2	e5.2	e1.7	e1.3	e1.2	e365	3540	1260	641	1000	1.5	4.3
19	1.3	e5.2	e1.7	e1.3	e1.2	e365	3530	1250	774	958	1.4	3.9
20	1.1	e5.1	e1.6	e1.3	e1.2	e365	3540	1250	937	958	1.4	4.1
21	1.2	e3.6	e1.5	e1.3	e1.2	e365	3660	1250	1130	923	1.3	7.3
22	1.5	e3.6	e1.5	e1.3	e1.2	e365	3630	1260	1200	895	1.2	6.4
23	1.3	e3.3	e1.5	e1.3	e1.2	e365	3770	1250	1200	728	1.0	6.3
24	1.2	e2.8	e1.4	e1.3	e1.2	e360	3700	1230	1190	579	.95	6.5
25	1.5	e2.5	e1.4	e1.3	e1.2	e360	3650	1240	1200	566	.96	6.0
26	1.8	e2.4	e1.3	e1.3	e1.3	e355	3590	1240	1190	455	2.1	5.6
27	1.4	e2.4	e1.3	e1.2	e1.5	e350	3480	1250	1190	364	4.1	5.2
28	1.4	e2.4	e1.3	e1.2	e31	e350	3070	1240	1180	425	2.4	4.9
29	2.2	e2.4	e1.2	e1.2	---	e355	2540	1230	1170	385	2.8	4.7
30	3.0	e2.4	e1.2	e1.2	---	e355	2230	1230	1160	472	18	4.6
31	2.2	---	e1.2	e1.2	---	e355	---	1220	---	569	9.9	---
TOTAL	34.86	214.2	60.6	39.3	63.8	11225	69184	41000	31378	28487	3145.31	119.5
MEAN	1.12	7.14	1.95	1.27	2.28	362	2306	1323	1046	919	101	3.98
MAX	3.0	20	3.2	1.3	31	410	3780	1920	1240	1170	570	7.3
MIN	.35	2.4	1.2	1.2	1.2	240	200	1220	551	364	.95	1.3
AC-FT	69	425	120	78	127	22260	137200	81320	62240	56500	6240	237
CFSM	.00	.01	.00	.00	.00	.31	1.99	1.14	.90	.79	.09	.00
IN.	.00	.01	.00	.00	.00	.36	2.22	1.31	1.01	.91	.10	.00

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STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1942 - 2001, BY WATER YEAR (WY)

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	28.9	16.3	8.65	3.39	7.56	69.1	335	318	258	175	71.5	35.7
MAX	535	307	207	42.4	148	628	3814	1445	1103	1035	1182	1062
(WY)	1994	1996	1999	1997	1997	1996	1997	1997	1986	1962	1993	1993
MIN	.000	.000	.000	.000	.000	.000	.000	.23	.010	.000	.000	.000
(WY)	1942	1942	1942	1942	1942	1942	1942	1977	1977	1961	1970	1960

SUMMARY STATISTICS	FOR 2000 CALENDAR YEAR	FOR 2001 WATER YEAR	WATER YEARS 1942 - 2001
ANNUAL TOTAL	21783.36	184951.57	
ANNUAL MEAN	59.5	507	111a
HIGHEST ANNUAL MEAN			536
LOWEST ANNUAL MEAN			.38
HIGHEST DAILY MEAN	550 Jul 13	3780 Apr 13	7710 Apr 16 1997
LOWEST DAILY MEAN	.00 Sep 10	.35b Oct 3	.00c Oct 1 1941
ANNUAL SEVEN-DAY MINIMUM	.00 Sep 10	.52 Oct 1	.00 Oct 1 1941
MAXIMUM PEAK FLOW		4020 Apr 13	8750d Apr 20 1997
MAXIMUM PEAK STAGE		15.37 Apr 13	16.90d Apr 20 1997
ANNUAL RUNOFF (AC-FT)	43210	366900	80260
ANNUAL RUNOFF (CFSM)	.051	.44	.096
ANNUAL RUNOFF (INCHES)	.70	5.93	1.30
10 PERCENT EXCEEDS	187	1260	364
50 PERCENT EXCEEDS	3.3	6.0	3.2
90 PERCENT EXCEEDS	.26	1.2	.00

- a Median of annual mean discharges is 62 ft³/s.
- b Due to regulation.
- c Many days, several years; result of regulation.
- d Estimated, from observed readings made under non-ideal conditions. Some evidence that peak occurred Apr. 16 at 7930 ft³/s.
- e Estimated.

