12389500 THOMPSON RIVER NEAR THOMPSON FALLS, MT

Pend Oreille Basin
Lower Clark Fork Subbasin

LOCATION.--Lat 47°35′31″, long 115°13′43″ referenced to North American Datum of 1927, in NW ¼ NE ¼ SE ¼ sec.7, T.21 N., R.28 W., Sanders County, MT, Hydrologic Unit 17010213, Lolo National Forest, on right bank 1.2 mi upstream from mouth and 5.5 mi east of Thompson Falls.

DRAINAGE AREA.--642 mi^2.

SURFACE-WATER RECORDS

PERIOD OF RECORD.--March to September 1911, October 1911 to September 1916 (occasional gage heights, discharges, and discharge measurements), April 1956 to current year. Records for January and February 1911, published in Water Supply Paper (WSP) 916, have been found to be unreliable and should not be used.

REVISED RECORDS.-- WSP 1246: 1911. See also PERIOD OF RECORD.

GAGE.--Water-stage recorder. Elevation of gage is 2,429.97 ft, referenced to the National Geodetic Vertical Datum of 1929 (Bureau of Public Roads bench mark). October 1911 to September 1916, nonrecording gage at site 0.2 mi upstream at different elevation.

REMARKS.--Records are good. Minor diversions occur upstream from station for irrigation, acreage unknown. Diversion from headwaters of Alder Creek in SW¼ sec.16, T.23 N., R.25 W., supplement water supply for storage in Upper Dry Fork Reservoir in the Little Bitterroot River basin. U.S. Geological Survey satellite telemeter is located at the station. Several unpublished observations of water temperature and specific conductance were made during the year.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood in May to June 1948 reached a discharge of 6,190 ft^3/s, by slope-area measurement of peak flow at site 0.2 mi downstream.

12389500 THOMPSON RIVER NEAR THOMPSON FALLS, MT—Continued

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2005 TO SEPTEMBER 2006
DAILY MEAN VALUES
[e, estimated]

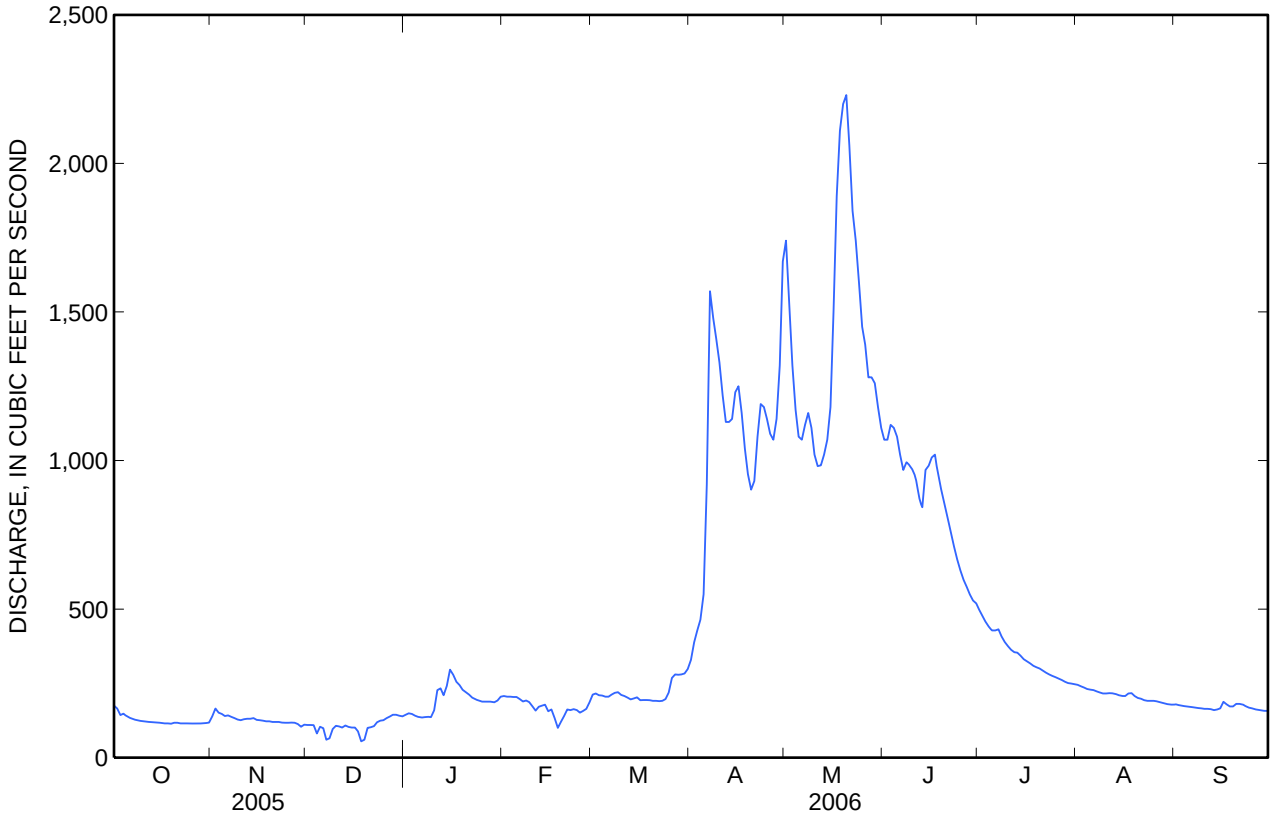
Day	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
1	175	139	110	144	207	212	329	1,740	1,070	496	245	179
2	165	165	110	149	205	216	388	1,530	1,070	475	240	177
3	143	151	109	147	205	210	427	1,320	1,120	457	236	174
4	148	147	81	141	204	209	464	1,170	1,110	440	231	172
5	140	140	104	137	204	205	550	1,080	1,080	428	229	172
6	133	142	99	135	197	205	920	1,070	1,020	428	227	170
7	129	137	e60	136	189	212	1,570	1,120	968	432	223	168
8	127	133	e65	137	192	218	1,480	1,160	994	408	219	167
9	125	128	96	136	187	220	1,410	1,110	983	389	216	166
10	123	126	107	159	173	211	1,330	1,020	966	375	216	164
11	121	129	105	227	158	207	1,220	981	936	363	217	164
12	120	131	101	233	171	202	1,130	984	877	355	216	163
13	120	131	108	210	175	196	1,130	1,020	843	353	214	160
14	118	133	103	241	178	199	1,140	1,070	968	343	210	162
15	117	127	101	296	156	203	1,230	1,180	983	331	208	166
16	116	126	101	279	162	193	1,250	1,500	1,010	324	207	188
17	115	124	88	255	133	194	1,160	1,890	1,020	317	216	179
18	115	122	e55	244	e100	194	1,040	2,110	953	309	217	172
19	114	122	e60	228	e120	193	954	2,200	901	304	207	172
20	117	120	100	220	e140	191	902	2,230	851	300	201	181
21	117	120	102	212	162	191	931	2,060	804	293	198	180
22	115	120	106	202	160	190	1,080	1,840	760	286	193	180
23	115	118	119	197	163	191	1,190	1,740	711	280	191	172
24	115	117	124	192	160	197	1,180	1,600	667	275	191	169
25	115	117	126	189	151	219	1,140	1,450	630	271	191	166
26	114	118	133	188	157	268	1,090	1,390	598	266	190	163
27	115	117	138	189	164	280	1,070	1,280	574	261	187	160
28	115	113	144	188	186	279	1,140	1,280	549	255	183	159
29	115	104	144	186	---	280	1,320	1,260	529	251	180	157
30	116	111	141	192	---	283	1,670	1,180	519	249	179	157
31	118	---	139	205	---	298	---	1,110	---	247	179	---
Total	3,851	3,828	3,279	5,994	4,759	6,766	31,835	43,675	26,064	10,561	6,457	5,079
Mean	124	128	106	193	170	218	1,061	1,409	869	341	208	169
Max	175	165	144	296	207	298	1,670	2,230	1,120	496	245	188
Min	114	104	55	135	100	190	329	981	519	247	179	157
Ac-ft	7,640	7,590	6,500	11,890	9,440	13,420	63,140	86,630	51,700	20,950	12,810	10,070
Cfsm	0.19	0.20	0.16	0.30	0.26	0.34	1.65	2.19	1.35	0.53	0.32	0.26
In.	0.22	0.22	0.19	0.35	0.28	0.39	1.84	2.53	1.51	0.61	0.37	0.29

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1957 - 2006, BY WATER YEAR (WY)

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
Mean	179	195	203	204	247	344	759	1,282	996	396	233	190
Max	343	501	880	719	1,226	1,344	1,674	3,154	2,369	724	382	288
(WY)	(1960)	(1996)	(1996)	(1974)	(1996)	(1972)	(1996)	(1997)	(1974)	(1974)	(1997)	(1997)
Min	112	115	101	109	103	120	238	374	244	140	113	105
(WY)	(1995)	(1988)	(1993)	(2004)	(1994)	(1964)	(1977)	(1977)	(1977)	(1977)	(1977)	(1994)

12389500 THOMPSON RIVER NEAR THOMPSON FALLS, MT—Continued

SUMMARY STATISTICS

	Calendar Year 2005		Water Year 2006		Water Years 1957 - 2006	
Annual total	79,732		152,148			
Annual mean	218		417		436	
Highest annual mean					804	1997
Lowest annual mean					176	1977
Highest daily mean	767	Apr 27	2,230	May 20	5,360	Jun 9, 1964
Lowest daily mean	55	Dec 18	55	Dec 18	55	Dec 18, 2005
Annual seven-day minimum	87	Dec 15	87	Dec 15	73	Dec 31, 1994
Maximum peak flow			2,270	May 20	6,080	Jun 9, 1964
Maximum peak stage			5.40	May 20	8.53	Jun 9, 1964
Instantaneous low flow					[a]48	Dec 4, 1992
Annual runoff (ac-ft)	158,100		301,800		315,900	
Annual runoff (cfsm)	0.340		0.649		0.679	
Annual runoff (inches)	4.62		8.82		9.23	
10 percent exceeds	472		1,130		1,060	
50 percent exceeds	152		197		233	
90 percent exceeds	111		115		130	

[a] Gage height, 2.02 ft, result of freezeup.