



Water-Data Report 2007

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN

Upper Mississippi-Crow-Rum Basin
Rum Subbasin

LOCATION.--Lat 45°16'56", long 93°26'24" referenced to North American Datum of 1983, Anoka County, MN, Hydrologic Unit 07010207, about three miles North of Ramsey on County Road 5. Gage is located near the base of the culvert on the downstream right bank.

SURFACE-WATER RECORDS

PERIOD OF RECORD.--Water years 2007 to current year.

GAGE.--July 2007 to current year.

REMARKS.--Gage-height records considered good.

EXTREMES FOR PERIOD OF RECORD.--Maximum gage height, 4.23, September 30, 2007; minimum gage height, 3.37, August 10, 11, 2007.

EXTREMES FOR CURRENT YEAR.--Maximum gage height, 4.23, September 30; minimum gage height, 3.37, August 10, 11.

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued

GAGE HEIGHT, FEET
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Day	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean
	October			November			December			January		
1	---	---	---	---	---	---	---	---	---	---	---	---
2	---	---	---	---	---	---	---	---	---	---	---	---
3	---	---	---	---	---	---	---	---	---	---	---	---
4	---	---	---	---	---	---	---	---	---	---	---	---
5	---	---	---	---	---	---	---	---	---	---	---	---
6	---	---	---	---	---	---	---	---	---	---	---	---
7	---	---	---	---	---	---	---	---	---	---	---	---
8	---	---	---	---	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---	---	---	---	---
10	---	---	---	---	---	---	---	---	---	---	---	---
11	---	---	---	---	---	---	---	---	---	---	---	---
12	---	---	---	---	---	---	---	---	---	---	---	---
13	---	---	---	---	---	---	---	---	---	---	---	---
14	---	---	---	---	---	---	---	---	---	---	---	---
15	---	---	---	---	---	---	---	---	---	---	---	---
16	---	---	---	---	---	---	---	---	---	---	---	---
17	---	---	---	---	---	---	---	---	---	---	---	---
18	---	---	---	---	---	---	---	---	---	---	---	---
19	---	---	---	---	---	---	---	---	---	---	---	---
20	---	---	---	---	---	---	---	---	---	---	---	---
21	---	---	---	---	---	---	---	---	---	---	---	---
22	---	---	---	---	---	---	---	---	---	---	---	---
23	---	---	---	---	---	---	---	---	---	---	---	---
24	---	---	---	---	---	---	---	---	---	---	---	---
25	---	---	---	---	---	---	---	---	---	---	---	---
26	---	---	---	---	---	---	---	---	---	---	---	---
27	---	---	---	---	---	---	---	---	---	---	---	---
28	---	---	---	---	---	---	---	---	---	---	---	---
29	---	---	---	---	---	---	---	---	---	---	---	---
30	---	---	---	---	---	---	---	---	---	---	---	---
31	---	---	---	---	---	---	---	---	---	---	---	---
Month	---	---	---	---	---	---	---	---	---	---	---	---

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued

GAGE HEIGHT, FEET
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Day	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean
	February			March			April			May		
1	---	---	---	---	---	---	---	---	---	---	---	---
2	---	---	---	---	---	---	---	---	---	---	---	---
3	---	---	---	---	---	---	---	---	---	---	---	---
4	---	---	---	---	---	---	---	---	---	---	---	---
5	---	---	---	---	---	---	---	---	---	---	---	---
6	---	---	---	---	---	---	---	---	---	---	---	---
7	---	---	---	---	---	---	---	---	---	---	---	---
8	---	---	---	---	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---	---	---	---	---
10	---	---	---	---	---	---	---	---	---	---	---	---
11	---	---	---	---	---	---	---	---	---	---	---	---
12	---	---	---	---	---	---	---	---	---	---	---	---
13	---	---	---	---	---	---	---	---	---	---	---	---
14	---	---	---	---	---	---	---	---	---	---	---	---
15	---	---	---	---	---	---	---	---	---	---	---	---
16	---	---	---	---	---	---	---	---	---	---	---	---
17	---	---	---	---	---	---	---	---	---	---	---	---
18	---	---	---	---	---	---	---	---	---	---	---	---
19	---	---	---	---	---	---	---	---	---	---	---	---
20	---	---	---	---	---	---	---	---	---	---	---	---
21	---	---	---	---	---	---	---	---	---	---	---	---
22	---	---	---	---	---	---	---	---	---	---	---	---
23	---	---	---	---	---	---	---	---	---	---	---	---
24	---	---	---	---	---	---	---	---	---	---	---	---
25	---	---	---	---	---	---	---	---	---	---	---	---
26	---	---	---	---	---	---	---	---	---	---	---	---
27	---	---	---	---	---	---	---	---	---	---	---	---
28	---	---	---	---	---	---	---	---	---	---	---	---
29	---	---	---	---	---	---	---	---	---	---	---	---
30	---	---	---	---	---	---	---	---	---	---	---	---
31	---	---	---	---	---	---	---	---	---	---	---	---
Month	---	---	---	---	---	---	---	---	---	---	---	---

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued

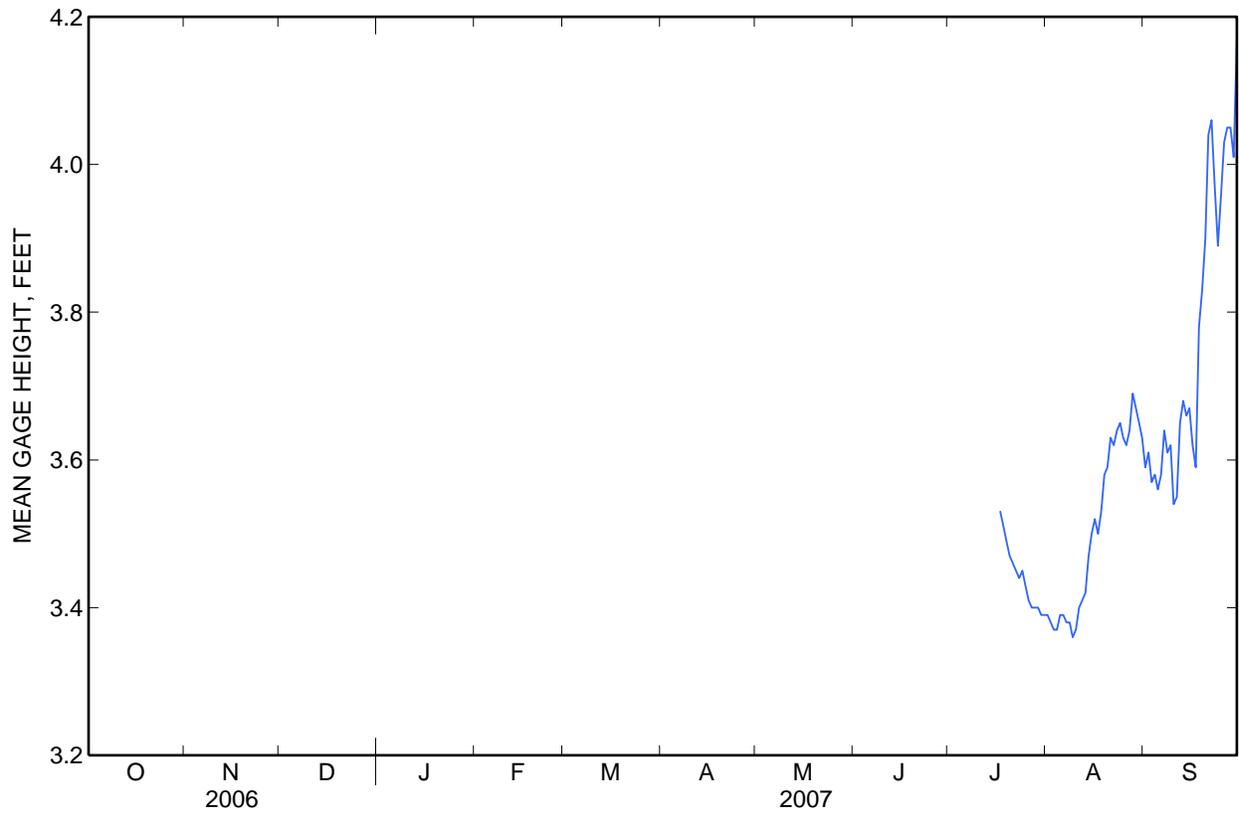
GAGE HEIGHT, FEET
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Day	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean	Max	Min	Mean
	June			July			August			September		
1	---	---	---	---	---	---	3.40	3.36	3.39	3.61	3.57	3.59
2	---	---	---	---	---	---	3.40	3.35	3.38	3.63	3.58	3.61
3	---	---	---	---	---	---	3.40	3.34	3.37	3.59	3.56	3.57
4	---	---	---	---	---	---	3.39	3.35	3.37	3.61	3.56	3.58
5	---	---	---	---	---	---	3.40	3.37	3.39	3.59	3.54	3.56
6	---	---	---	---	---	---	3.42	3.35	3.39	3.62	3.55	3.58
7	---	---	---	---	---	---	3.40	3.35	3.38	3.66	3.60	3.64
8	---	---	---	---	---	---	3.42	3.34	3.38	3.62	3.58	3.61
9	---	---	---	---	---	---	3.38	3.34	3.36	3.66	3.58	3.62
10	---	---	---	---	---	---	3.39	3.33	3.37	3.62	3.45	3.54
11	---	---	---	---	---	---	3.50	3.33	3.40	3.63	3.48	3.55
12	---	---	---	---	---	---	3.43	3.39	3.41	3.69	3.59	3.65
13	---	---	---	---	---	---	3.61	3.39	3.42	3.73	3.61	3.68
14	---	---	---	---	---	---	3.53	3.45	3.47	3.69	3.61	3.66
15	---	---	---	---	---	---	3.52	3.47	3.50	3.72	3.63	3.67
16	---	---	---	---	---	---	3.53	3.50	3.52	3.68	3.53	3.62
17	---	---	---	3.55	3.51	3.53	3.52	3.49	3.50	3.64	3.55	3.59
18	---	---	---	3.53	3.50	3.51	3.56	3.50	3.53	3.85	3.55	3.78
19	---	---	---	3.51	3.48	3.49	3.60	3.56	3.58	3.87	3.79	3.83
20	---	---	---	3.49	3.45	3.47	3.60	3.59	3.59	4.08	3.81	3.90
21	---	---	---	3.47	3.44	3.46	3.66	3.59	3.63	4.06	4.02	4.04
22	---	---	---	3.46	3.45	3.45	3.63	3.60	3.62	4.12	4.00	4.06
23	---	---	---	3.45	3.43	3.44	3.66	3.62	3.64	4.03	3.89	3.97
24	---	---	---	3.45	3.44	3.45	3.66	3.63	3.65	3.95	3.85	3.89
25	---	---	---	3.45	3.41	3.43	3.64	3.61	3.63	3.98	3.92	3.96
26	---	---	---	3.42	3.40	3.41	3.65	3.61	3.62	4.06	3.98	4.03
27	---	---	---	3.42	3.39	3.40	3.68	3.62	3.64	4.09	4.01	4.05
28	---	---	---	3.41	3.38	3.40	3.69	3.68	3.69	4.08	3.99	4.05
29	---	---	---	3.42	3.38	3.40	3.70	3.62	3.67	4.03	3.97	4.01
30	---	---	---	3.41	3.37	3.39	3.67	3.62	3.65	4.23	4.03	4.17
31	---	---	---	3.40	3.36	3.39	3.64	3.60	3.63	---	---	---
Month	---	---	---	---	---	---	3.70	3.33	3.51	4.23	3.45	3.77

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued

THE RETRIEVED PLOT DATA CONSIST ENTIRELY OF MISSING
VALUES OR, IN THE CASE OF A LOG PLOT, OF NEGATIVE AND
ZERO VALUES

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued



05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued

WATER-QUALITY RECORDS

REMARKS.--Upper Mississippi River Basin nutrient enrichment (NEET) study sampling site. The objectives of this study are to determine the transport, chemical transformation, and retention of nutrients in the water column and surrounding sediments, and resulting effects on biological communities in stream reaches. Such cycling differs in different geologic and hydrologic settings, and is controlled, in large part, by ground-water and surface-water interactions. The study will be conducted from 2006 to 2009.

WATER-QUALITY DATA
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Part 1 of 4

[Remark codes: <, less than; E, estimated.]

Date	Time	Sample type	Altitude of land surface feet (72000)	Gage height, feet (00065)	Instantaneous discharge, cfs (00061)	Stream velocity, ft/s (00055)	Velocity at point in stream, ft/s (81904)	Turbidity, water, unfltrd field, NTU (61028)	Barometric pressure, mm Hg (00025)	Dissolved oxygen, mg/L (00300)	Dissolved oxygen, percent of saturation (00301)	pH, water, unfltrd std units (00400)
Jun												
22...	1100	Environmental	871	3.85	3.1	--	.94	--	742	8.9	100	7.5
Aug												
06...	1210	Environmental	871	3.40	1.4	--	--	--	740	5.9	68	7.4
06...	1210	Plant tissue	871	--	--	--	--	--	--	6.0	--	7.3
06...	1211	Plant tissue	871	--	--	--	--	--	--	6.0	--	7.3
17...	1020	Environmental	871	3.50	3.7	.40	--	5.2	740	4.6	50	7.5

WATER-QUALITY DATA
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Part 2 of 4

[Remark codes: <, less than; E, estimated.]

Date	Specific conductance, wat unfltrd μ S/cm 25 degC (00095)	Temperature, air, deg C (00020)	Temperature, water, deg C (00010)	Alkalinity, wat fltr inc tit field, mg/L as CaCO3 (39086)	Bicarbonate, wat fltr incrm. titr., field, mg/L (00453)	Carbonate, wat fltr incrm. titr., field, mg/L (00452)	Ammonia, water, fltrd, mg/L as N (00608)	Nitrate + nitrite, water, fltrd, mg/L as N (00631)	Nitrite, water, fltrd, mg/L as N (00613)	Particulate nitrogen, susp, water, mg/L (49570)	Total nitrogen, wat unfltrd by analysis, mg/L (62855)	Orthophosphate, water, fltrd, mg/L as P (00671)	Phosphorus, water, unfltrd, mg/L (00665)
Jun													
22...	502	25.0	19.5	--	--	--	E.017	.149	.009	--	.66	.054	.102
Aug													
06...	524	28.0	20.5	227	277	--	.204	.132	.011	.06	.76	.065	.117
06...	525	--	20.5	--	--	--	--	--	--	--	--	--	--
06...	525	--	20.5	--	--	--	--	--	--	--	--	--	--
17...	484	16.0	18.8	201	243	.0	.145	.064	.006	.10	.78	.080	.167

05286790 TROTT BROOK AT CO. RD. 5 IN RAMSEY, MN—Continued

WATER-QUALITY DATA
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Part 3 of 4

[Remark codes: <, less than; E, estimated.]

Date	Total carbon, suspnd sedimnt total, mg/L (00694)	Inorganic carbon, suspnd sedimnt total, mg/L (00688)	Organic carbon, suspnd sedimnt total, mg/L (00689)	Organic carbon, water, fltrd, mg/L (00681)	Biomass periphyton, ashfree drymass g/m2 (49954)	Biomass periphyton, ashfree DTH, g/m2 (63766)	Biomass periphyton, ash weight, g/m2 (63765)	Periphyton biomass ash weight, g/m2 (00572)	Biomass periphyton, dry weight, g/m2 (63767)	Periphyton biomass dry weight, g/m2 (00573)	Chlorophyll a periphyton, chromo-fluoro, mg/m2 (70957)	Chlorophyll a periphyton, DTH, CF meth mg/m2 (63763)	Chlorophyll a phytoplankton, fluoro, µg/L (70953)
Jun 22...	--	--	--	--	--	--	--	--	--	--	--	--	--
Aug 06...	.5	<.1	.5	4.6	--	--	--	--	--	--	--	--	4.2
06...	--	--	--	--	268.9	--	--	1,500	--	1,725	178	--	--
06...	--	--	--	--	--	65.6	871	--	937	--	--	30.8	--
17...	.8	<.1	.8	7.2	--	--	--	--	--	--	--	--	--

WATER-QUALITY DATA
WATER YEAR OCTOBER 2006 TO SEPTEMBER 2007

Part 4 of 4

[Remark codes: <, less than; E, estimated.]

Date	Float-ing algae mats severity, code (01325)	Pheo-phytn a periphyton, DTH, CF meth mg/m2 (63764)	Pheo-phytin a, periphyton, mg/m2 (62359)	Pheo-phytin a, phytoplankton, µg/L (62360)	Number of sampling points, count (00063)
Jun 22...	.0	--	--	--	5
Aug 06...	--	--	--	2.5	10
06...	--	--	259	--	--
06...	--	62.9	--	--	--
17...	--	--	--	--	10