



City of Winnipeg  
Water and Waste Department

2023 RIVERS MONITORING

Survey Date: July 20, 2023		Assiniboine River Sampling Locations				Red River Sampling Locations						
Parameter	Unit	HEADINGLY BRIDGE (R1)	WEST PERIMETER BRIDGE (R2)	ASSINIBOINE PARK FOOT BRIDGE (R3)	MAIN STREET BRIDGE (R4)	SOUTH FLOODWAY CONTROL (R5)	SOUTH PERIMETER BRIDGE (R6)	FORT GARRY BRIDGE (R7)	NORWOOD BRIDGE (R8)	REDWOOD BRIDGE (R9)	NORTH PERIMETER BRIDGE (R10)	LOCKPORT BRIDGE (R11)
Sample Number		588434	588436	588433	588435	588437	588443	588438	588441	588442	588440	588439
Temperature	°C	21.0	21.3	20.2	20.0	21.6	21.3	21.5	20.7	20.7	20.0	20.3
pH	units	8.56	8.56	8.57	8.59	8.27	8.15	8.17	8.27	8.43	8.28	8.27
Dissolved Oxygen	mg/L	9.0	9.0	8.8	8.4	8.2	8.1	8.1	7.9	8.0	7.7	8.8
Oxygen Saturation	%	101	102	98	93	93	92	92	88	89	85	97
Biochemical Oxygen Demand	mg/L	6	5	8	6	3	7	<3	<3	3	<3	<3
Total Solids	mg/L	1,020	1,020	na	994	840	896	844	882	922	888	862
Total Suspended Solids	mg/L	106	96	112	96	28	37	17	15	25	29	6
Turbidity	n.t.u.	70	76	75	71	29	36	22	14	24	20	8
Chlorophyll a	ug/L	26.0	25.4	26.7	25.4	2.7	2.7	3.3	2.0	9.3	6.0	2.7
Total Organic Carbon	mg/L	14.7	15.2	14.9	14.2	12.9	13.3	13.0	13.2	13.8	14.0	13.4
Total Nitrogen	mg/L N	0.8	0.7	0.4	0.9	1.0	1.1	1.0	1.1	0.9	1.3	1.2
Ammonia Nitrogen	mg/L N	<0.003	<0.003	<0.003	<0.003	<0.003	<0.003	0.010	0.023	<0.003	0.553	0.419
Nitrate Nitrogen	mg/L N	na	na	na	na	na	na	na	na	na	na	na
Soluble Phosphorus	mg/L P	0.05	0.07	0.06	0.06	0.21	0.21	0.20	0.22	0.19	0.20	0.22
Total Phosphorus	mg/L P	nr	nr	nr	nr	0.27	nr	0.26	0.28	0.24	0.33	0.28
Escherichia coli	MPN/100 mL	30	20	30	170	<10	20	20	<10	80	390	100
Fecal Coliform	MPN/100 mL	10	<10	40	200	10	30	<10	<10	130	680	40

Notes: ns - no sample na - not analyzed nr - not recorded or no result

Weather conditions during monitoring:

Wind Direction: North (N)  
 Wind Speed: 11 km/h  
 Cloud Coverage: 10 %  
 Precipitation: <0.1 mm  
 Air Temperature: 19 °C

Report Date:

December 4, 2023