

**City of Winnipeg
Water and Waste Department**

2018 RIVERS SURVEY MONITORING REPORT

Survey Date: August 30, 2018		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 ¹ (R5)	SOUTH PERIMETER BRIDGE (R6)	FORT GARRY BRIDGE (R7)	NORWOOD BRIDGE (R8)	REDWOOD BRIDGE (R9)	NORTH PERIMETER BRIDGE (R10)	LOCKPORT BRIDGE (R11)
Sample Number		135589	135591	135588	135590	135592	135598	135593	135596	135597	135595	135594
Temperature	° C	18.9	18.6	18.2	19.8	20.0	20.9	20.8	19.9	19.5	19.3	19.7
Dissolved Oxygen	mg/L	8.76	9.01	9.00	8.45	8.72	8.47	8.15	7.87	7.72	7.36	8.93
Oxygen Saturation	%	94.4	96.6	95.2	92.6	96.2	94.7	90.8	86.0	83.7	79.7	97.2
Biochemical Oxygen Demand	mg/L	<4	6	<4	<4	<4	5	<4	<4	>9	<4	>8
pH	units	8.70	8.68	8.68	8.61	8.72	8.68	8.61	8.53	8.55	8.37	8.35
Total Solids	mg/L	796	800	790	798	924	904	940	944	872	860	904
Total Suspended Solids	mg/L	50	42	57	53	28	22	30	36	30	34	30
Turbidity	n.t.u.	35.9	35.3	41.6	40.6	21.2	20.5	26.3	30.2	25.9	23.1	24.0
Total Organic Carbon	mg/L	nr ³	nr ³	nr ³	nr ³	nr ³	nr ³	nr ³	nr ³	nr ³	nr ³	nr ³
Chlorophyll a	ug/L	19.6	16.7	14.2	21.4	14.7	11.7	10.7	11.7	14.4	21.9	44.9
Ammonia Nitrogen	mg/L N	0.029	0.019	0.015	0.049	0.016	0.032	0.464	0.601	0.252	0.879	0.752
Nitrate Nitrogen	mg/L N	0.012	<0.003	0.026	<0.003	<0.003	0.023	0.005	0.119	0.098	0.218	0.385
Total Nitrogen	mg/L N	0.6	0.6	0.7	0.7	0.7	0.7	1.1	1.4	1.1	1.8	2.0
Soluble Phosphorus	mg/L P	0.149	0.158	0.094	0.097	0.128	0.178	nr ⁴	nr ⁴	0.173	0.225	nr ²
Total Phosphorus	mg/L P	0.1684	0.1530	0.1955	0.1950	0.1394	0.1561	0.1844	0.2330	0.1882	0.2854	0.3109
Escherichia Coliform	MPN/100 mL	260	130	170	1010	<10	<10	30	170	360	430	120
Fecal Coliform	MPN/100 mL	240	70	220	1220	20	10	40	200	590	610	190

Weather Conditions during monitoring Winds S at 20.1 km/hr with 5% cloud cover and 0 mm of precipitation. Average air temperature during survey at 25°C

Notes:

<ol style="list-style-type: none"> 1) Red River Floodway at South Floodway Control Gates 744.3 ft. 2) No result due to sample contamination. 3) No result due to instrument error. 4) No result due to lab error. 	Compiled By: <u>H. Demchenko</u> Compliance Reporting Technician Approved By: <u>C. Diduck</u> Analytical Services Branch Head
--	---

File: N:\Environmental Standards\Analytical Services\WQ Data\Rivers & Small Streams\Rivers

Date Compiled: 6-Jun-19