

**City of Winnipeg  
Water and Waste Department**

**2018 RIVERS SURVEY MONITORING REPORT**

Survey Date: <b>September 13, 2018</b>		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 <sup>1</sup> (R5)	SOUTH PERIMETER BRIDGE (R6)	FORT GARRY BRIDGE (R7)	NORWOOD BRIDGE (R8)	REDWOOD BRIDGE (R9)	NORTH PERIMETER BRIDGE (R10)	LOCKPORT BRIDGE (R11)
Sample Number		<b>137494</b>	<b>137496</b>	<b>137493</b>	<b>137495</b>	<b>137497</b>	<b>137503</b>	<b>137498</b>	<b>137501</b>	<b>137502</b>	<b>137500</b>	<b>137499</b>
Temperature	° C	17.2	17.0	17.6	16.4	17.8	18.5	18.0	18.4	17.7	18.3	18.0
Dissolved Oxygen	mg/L	9.22	9.41	9.33	8.27	9.35	9.57	9.78	8.47	8.20	7.37	9.02
Oxygen Saturation	%	94.9	97.6	96.0	83.0	98.3	101	102	89.0	86.1	77.8	95.4
Biochemical Oxygen Demand	mg/L	<4	<4	<4	4	<4	<4	<4	<4	<4	7	4
pH	units	8.73	8.75	8.75	8.73	8.64	8.68	8.66	8.71	8.62	8.13	8.34
Total Solids	mg/L	734	744	702	510	854	840	716	772	780	716	818
Total Suspended Solids	mg/L	99	90	92	63	28	34	34	32	30	33	38
Turbidity	n.t.u.	69.6	65.4	68.1	51.0	33.4	38.7	43.0	34.4	35.6	28.4	34.8
Total Organic Carbon	mg/L	10.3	10.0	9.5	9.1	11.4	11.5	11.2	12.6	11.0	12.1	10.8
Chlorophyll a	ug/L	61.0	58.7	53.4	33.6	21.4	39.7	36.0	27.5	27.5	28.2	18.3
Ammonia Nitrogen	mg/L N	0.056	0.035	0.063	0.307	0.036	0.035	0.423	0.470	0.426	>2.000	0.664
Nitrate Nitrogen	mg/L N	0.132	0.091	0.121	0.195	0.111	0.113	0.083	0.206	0.168	0.272	0.359
Total Nitrogen	mg/L N	0.8	0.8	0.7	1.1	1.0	0.9	1.3	1.5	1.5	4.9	1.9
Soluble Phosphorus	mg/L P	0.103	0.102	0.090	0.080	0.068	0.052	0.060	0.116	0.110	0.499	0.170
Total Phosphorus	mg/L P	0.2400	0.2489	0.2374	0.2546	0.1453	0.1430	0.1653	0.2071	0.2061	0.6754	0.2441
Escherichia Coliform	MPN/100 mL	280	560	2600	24200	40	2910	990	12000	17300	>24200	440
Fecal Coliform	MPN/100 mL	270	610	4350	24200	80	3650	990	12000	17300	>24200	320

Weather Conditions during monitoring Winds W at 6.4 km/hr with 100% cloud cover and 30.7 mm of precipitation. Average air temperature during survey at 15°C

Notes: 1) Red River Floodway at South Floodway Control Gates **735.0** ft. Compiled By: H.Demchenko  
Compliance Reporting Technician

Approved By: C.Diduck  
Analytical Services Branch Head

Date Compiled: 9-May-19

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