

**City of Winnipeg
Water and Waste Department**

2011 RIVERS SURVEY MONITORING REPORT

Survey Date ¹ : November 15, 2011		Red River Sampling Locations							
Parameter	Unit	ST.ADOLPHE PIERRE DELORME BRIDGE	SOUTH PERIMETER BRIDGE	FORT GARRY BRIDGE	COCKBURN AT BRIDGE DRIVE INN	NORWOOD BRIDGE	REDWOOD BRIDGE	NORTH PERIMETER BRIDGE	LOCKPORT BRIDGE
Temperature	°C	2.7	2.8	2.9	3.2	3.1	2.4	2.3	2.6
Dissolved Oxygen	mg/L	15.8	15.6	15.5	15.2	15.1	15.0	15.1	15.9
Oxygen Saturation ²	%	116	115	115	113	112	109	110	117
pH	units	8.47	8.46	8.43	8.39	8.41	8.36	8.33	8.28
Total Solids	mg/L	548	556	624	572	564	708	700	664
Total Suspended Solids	mg/L	32	31	29	28	26	63	51	60
Turbidity	n.t.u.	19.4	21.8	19.4	20.0	18.2	38.8	31.8	38.9
Total Organic Carbon	mg/L	14	15	15	15	18	15	15	13
Chlorophyll a	ug/L	25	38	32	36	34	36	11	38
Ammonia Nitrogen	mg/L N	0.011	<0.003	0.189	0.188	0.190	0.050	0.336	0.364
Nitrate Nitrogen	mg/L N	0.109	0.107	0.101	0.095	0.126	0.244	0.238	0.268
Total Kjeldahl Nitrogen	mg/L N	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Total Nitrogen ²	mg/L N	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Soluble Phosphorus	mg/L P	0.06	0.07	0.08	0.09	0.09	0.10	0.13	0.13
Total Phosphorus	mg/L P	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30
Escherichia Coliform ³	colonies/100 mL	<3	7	43	15	23	43	150	150
Fecal Coliform ³	colonies/100 mL	<3	7	43	43	23	43	430	150

Weather Conditions during monitoring: Winds WNW at 18 km/hr with 88 % cloud cover. Average air temperature during survey at -2 C

- Notes:
- 1) LIMS Reference No: 31270
 - 2) Calculated values
 - 3) Analyzed by contract laboratory.
 - 4) Red River elevation at South Floodway Control Gates: 730.4ft.

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