

**City of Winnipeg  
Water and Waste Department**

**2008 RIVERS SURVEY MONITORING REPORT**

Survey Date <sup>1</sup> : September 18, 2008		Assiniboine River Sampling Locations				Red River Sampling Locations					
Parameter	Unit	ASSINIBOINE PARK FOOT BRIDGE	HEADINGLY BRIDGE	MAIN STREET BRIDGE	WEST PERIMETER BRIDGE	SOUTH FLOODWAY CONTROL <sup>4</sup>	FORT GARRY BRIDGE	NORWOOD BRIDGE	REDWOOD BRIDGE	NORTH PERIMETER BRIDGE	LOCKPORT BRIDGE
Temperature	° C	17.0	16.0	15.0	15.9	16.6	16.4	16.1	15.8	15.8	16.0
Dissolved Oxygen	mg/L	9.4	9.4	8.8	9.5	9.4	9.7	9.4	9.4	9.1	9.9
Oxygen Saturation <sup>2</sup>	%	98	96	88	97	97	100	96	95	92	101
pH	units	8.50	8.51	8.53	8.51	8.32	8.52	8.65	8.58	8.42	8.34
Total Solids	mg/L	660	700	620	672	640	520	540	552	544	524
Total Suspended Solids	mg/L	132	146	73	137	278	103	78	79	64	47
Turbidity	n.t.u.	79	90	64	83	190	72	71	61	49	35
Total Organic Carbon	mg/L	10	9	11	10	9	10	11	11	12	12
Chlorophyll a	ug/L	23	26	18	25	21	40	33	25	26	32
Ammonia Nitrogen	mg/L N	<0.003	<0.003	0.008	<0.003	<0.003	0.015	<0.003	0.004	0.166	0.222
Nitrate Nitrogen	mg/L N	0.048	0.028	0.065	0.026	0.439	0.414	0.044	0.037	0.138	0.326
Total Kjeldahl Nitrogen	mg/L N	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Total Nitrogen <sup>2</sup>	mg/L N	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Soluble Phosphorus	mg/L P	0.11	0.08	0.11	0.09	0.16	0.16	0.12	0.12	0.17	0.20
Total Phosphorus	mg/L P	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30
Escherichia Coliform <sup>3</sup>	colonies/100 mL	140	500	900	170	14	110	230	1100	130	30
Fecal Coliform <sup>3</sup>	colonies/100 mL	800	500	1400	300	130	110	230	1100	130	50

Weather Conditions during monitoring: Winds S at 27 km/hr with 10% cloud cover. Average air temperature during survey at 18°C

- Notes:
- 1) LIMS Reference No: 21166
  - 2) Calculated values
  - 3) Analyzed by contract laboratory.
  - 4) Red River elevation at South Floodway Control Gates: 734.4 ft

Report Compiled By: J. Jones  
Compliance Reporting Technician

Approved for Distribution By: S. Fletcher  
Supervisor of Analytical Services

Date Approved: 07-Oct-08

Distribution List (E-mail)

Bill Borlase, Manager of Wastewater Services Division  
Paul Lagasse, Wastewater Engineer, Wastewater Services Division  
Bill Watters, Field Service Operations Engineer, Wastewater Services Division  
Grant Mohr, Land Drainage Planning Engineer, Engineering Division  
Nick Szoke, Senior Wastewater Facilities Planning Engineer, Engineering Division  
Kathy Taylor, Business and Internal Communications Coordinator, Customer Services Division  
Scott Gaber, Internet Services Officer, Customer Services Division  
Kelly Kjartanson, Manager of Environmental Standards Division

File No: 040-14-09-03-00