

**City of Winnipeg
Water and Waste Department**

2016 RIVERS SURVEY MONITORING REPORT

Survey Date ¹ : September 15, 2016		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 ³ (R5)	SOUTH PERIMETER BRIDGE (R6)	FORT GARRY BRIDGE (R7)	NORWOOD BRIDGE (R8)	REDWOOD BRIDGE (R9)	NORTH PERIMETER BRIDGE (R10)	LOCKPORT BRIDGE (R11)
Temperature	° C	16.9	17.0	15.7	15.5	17.9	17.9	18.1	17.5	16.8	16.9	17.9
Dissolved Oxygen	mg/L	11.6	11.6	11.4	10.6	9.1	9.1	9.0	8.9	9.8	9.6	10.6
Oxygen Saturation	%	120	119	116	107	97	95	95	93	101	98	108
Biochemical Oxygen Demand	mg/L	<3	<3	<3	3	<3	nr ⁴	<3	<3	3	<3	<3
pH	units	8.67	8.65	8.59	8.64	7.96	7.91	7.94	7.87	7.98	8.00	7.72
Total Solids	mg/L	820	814	808	794	864	802	858	840	860	752	896
Total Suspended Solids	mg/L	124	110	116	104	208	210	196	206	230	152	298
Turbidity	n.t.u.	56	68	73	67	117	120	119	117	122	89	141
Total Organic Carbon	mg/L	19	23	21	21	26	24	25	26	23	22	25
Chlorophyll a	ug/L	68	75	63	58	5	5	7	5	12	14	11
Ammonia Nitrogen	mg/L N	<0.003	<0.003	<0.003	<0.003	<0.003	<0.003	0.062	0.026	0.027	0.030	0.077
Nitrate Nitrogen	mg/L N	0.010	<0.003	<0.003	<0.003	0.395	0.385	0.413	0.409	0.345	0.332	0.389
Total Nitrogen	mg/L N	0.4	0.4	0.5	0.4	1.3	1.5	1.5	1.7	1.3	1.2	1.5
Soluble Phosphorus	mg/L P	0.07	0.07	0.07	0.07	0.19	0.19	0.20	0.20	0.18	0.19	0.29
Total Phosphorus	mg/L P	0.34	0.34	0.34	0.37	0.51	0.56	0.54	0.50	0.49	0.47	0.55
Escherichia Coliform ²	MPN/100 mL	93	74	93	150	93	43	93	93	93	43	240
Fecal Coliform ²	MPN/100 mL	93	74	93	150	93	43	93	93	240	43	430

Weather Conditions during monitoring Winds S at 8 km/hr with 70% cloud cover and <0.1 mm of precipitation. Average air temperature during survey at 16.5°C

- Notes:
- 1) LIMS Reference No: **47441**
 - 2) Analysed by contract laboratory
 - 3) Red River Floodway at South Floodway Control Gates **735.7** ft.
 - 4) No result due to technician error

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