

**City of Winnipeg
Water and Waste Department
South End Water Pollution Control Centre Monitoring Data
November 2014**

Licence 2716RR	Raw Sewage	Final Effluent 24 Hour Composite										Final Effluent Grab Sample		
		TSS		BOD5		cBOD5		Ammonia	Ortho Phosphorus	Total Phosphorus	Total Nitrogen	Temp.	pH	E.Coli
		(mg/L)	(mg/L)*	(mg/L)	(mg/L)*	(mg/L)	(mg/L)*	(kg NH3-N/day)	(mg/L-P)	(mg/L-P)*	(mg/L-N)*	(°C)	(units)	MPN/100 mL
1-Nov-14	49.1	18	13	28	19	14	11	2,082	4.98	4.6	43	17	6.70	43
2-Nov-14	52.4	27	14	26	19	14	11	2,091	4.71	4.7	43	17	6.53	23
3-Nov-14	48.8	21	15	27	19	18	12	1,726	4.02	4.7	43	18	6.60	230
4-Nov-14	47.2	13	14	21	20	15	12	1,769	4.32	4.7	44	18	6.59	9
5-Nov-14	47.3	10	14	26	20	12	12	1,728	4.53	4.7	44	18	6.66	21
6-Nov-14	47.7	17	15	19	20	12	12	1,828	4.48	4.8	44	17	6.66	93
7-Nov-14	49.5	10	15	23	20	11	12	1,954	4.71	4.8	44	17	6.64	20
8-Nov-14	49.0	8	14	nr	20	nr	12	1,828	4.46	4.8	44	16	6.66	9
9-Nov-14	49.1	12	14	26	20	9	12	1,882	4.24	4.8	44	17	6.73	9
10-Nov-14	48.0	10	14	21	20	9	12	1,808	4.21	4.7	44	17	6.64	23
11-Nov-14	48.6	11	14	20	20	9	11	1,846	4.45	4.8	44	17	6.74	9
12-Nov-14	50.7	9	13	18	20	8	11	1,835	4.11	4.8	44	17	6.59	23
13-Nov-14	47.2	7	13	15	20	7	11	1,801	4.26	4.8	44	17	6.48	15
14-Nov-14	47.5	8	13	18	20	10	11	1,864	4.44	4.8	44	17	6.73	9
15-Nov-14	48.0	11	13	19	20	9	11	1,907	4.67	4.8	44	16	6.61	4
16-Nov-14	49.1	13	13	29	21	14	11	1,916	4.39	4.8	44	16	6.64	<3
17-Nov-14	47.4	12	13	26	21	17	12	1,795	4.02	4.8	44	16	6.62	4
18-Nov-14	47.3	9	13	21	21	13	12	1,753	4.44	4.8	44	16	6.73	43
19-Nov-14	46.8	3	13	19	21	11	12	1,714	4.37	4.8	44	16	6.66	230
20-Nov-14	46.8	11	12	19	21	nr	11	1,796	4.36	4.8	44	16	6.58	430
21-Nov-14	47.0	8	12	16	21	10	11	1,758	4.30	4.8	44	16	6.64	93
22-Nov-14	48.0	10	12	13	20	8	11	1,832	4.38	4.8	44	16	6.59	43
23-Nov-14	48.5	8	12	15	20	8	11	1,925	4.44	4.8	44	16	6.57	9
24-Nov-14	48.1	5	12	13	20	9	11	1,800	4.18	4.8	44	16	6.61	75
25-Nov-14	46.6	8	12	14	20	8	11	1,762	4.19	4.8	44	16	6.64	4
26-Nov-14	49.6	7	12	13	20	7	11	1,845	4.20	4.8	44	16	6.68	43
27-Nov-14	50.4	9	11	12	19	7	10	1,869	4.36	4.8	44	16	6.60	23
28-Nov-14	46.5	6	11	14	19	10	10	1,790	4.65	4.8	44	16	6.74	9
29-Nov-14	47.6	6	11	12	19	6	10	1,864	4.50	4.8	44	16	6.68	9
30-Nov-14	48.5	4	10	14	19	7	10	1,936	4.33	4.8	44	15	6.77	9
Max:	52.4													
Min:	46.5													
Average:	48.3	10		19		10		1,843	4.39			16	6.64	
Total Flow:	1448.2													
Geo.Mean:														21

Notes:

- (1) Effluent ammonia load based upon Raw Sewage flows and Final NH3-N concentrations
- (2) nr - not recorded or no result; na - not analyzed; ns - no sample
- (3) Where value is expressed as less than (<), the value is halved and used in the calculations
- (4) * = 30 day rolling average

- (5)** Flow, highlighted in bold, in excess of 98.6 ML/D per clause 27 of Licence 2716RR
- (6) Bracketed Coliform results not used in the Geometric Mean calculation
- (7) Raw wastewater flows in excess of 100 ML/D will by-pass the secondary process
- (8) Total Nitrogen results are calculated from TKN and nitrate values