

# 2014 Annual Report - Waste Water

# 2014 ANNUAL REPORT IROQUOIS WASTE WATER TREATMENT PLANT

Reporting period - JAN 1st - DEC 31st 2014

# **IROQUOIS WASTE WATER TREATMENT PLANT**

**GOLF CLUB ROAD - IROQUOIS** 

Waste Water Treatment System Number: 9689-8MQHNK

Waste Water Treatment System Owner: Municipality of South Dundas

Waste Water Treatment System Category: Large Municipal Residential





#### South Dundas Waste Water Treatment Plant Golf Club Road, Iroquois

Supervisor of Water & Wastewater lan Kemp

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# Availability

Public Access via the web <a href="http://www.southdundas.com">http://www.southdundas.com</a>

Public Access via Public Request Municipal Offices, 34 Ottawa Street,

Morrisburg

Public Notice via Local Newspaper

Free copies of this report and the Summary report prepared as per requirements as per C of A number 9689-8MQHNK have been listed below. As per Condition 10, ss 6 of the C of A, a performance report shall be prepared and submitted 90 days following the end of the period being reported upon. The following is a list of the information to be included in this annual report as per C of A number 9689-8MQHNK

Author: Ian Kemp February 26th 2014



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# 1. Summary and comments outlining the monitoring data and effluent limits' (Condition 7 of C of A # 9689-8MQHNK), including an overview of the success and adequacy of the Works

IROQUOIS	Total m <sup>3</sup>	Average Daily m <sup>3</sup>	Maximum Daily m <sup>3</sup>			
Jan	102,764.00	3,314.97	6,774.00			
Feb	77,342.00	2,494.90	6,324.00			
March	102,692.00	3,312.65	6,583.00			
April	214,302.00	6,912.97	12,933.00			
May	107,642.00	3,472.32	5,975.00			
June	73,168.00	2,360.26	4,758.00			
July	55,525.00	1,791.13	2,729.00			
August	66,947.00	2,159.58	4,154.00			
September	45,252.00	1,459.74	2,088.00			
October	48,121.00	1,552.29	2,353.00			
November	51,810.00	1,727.00	3,011.00			
December	62,564.00	2,018.19	3,023.00			
Total Flow	1,008,129.00					
Ave Daily Flow		2,714.67				
Max Day			12,933.00			



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Raw Influent Final Effluent

IROQUOIS	BOD₅ mg/L	TSS mg/L	TKN mg/l	TP mg/L	Nitrite (NO2) mg/L	Nitrate (NO3)mg/L	BOD₅ mg/L	TSS mg/L	Ammonia + Ammonium	TKN mg/l	TP mg/L	Nitrite (NO2) mg/L	Nitrate (NO3)mg/L
Jan	15.00	16.00	11.50	1.44	0.10	1.20	40.00	52.00	3.33	7.67	0.90	0.10	1.10
Feb	51.00	40.00	18.30	2.04	0.10	0.70	12.00	9.00	1.99	4.34	0.52	0.10	0.70
March	34.00	28.00	13.00	1.38	0.10	1.00	5.00	7.00	1.30	2.29	0.29	0.10	1.10
April	12.00	22.00	4.15	0.37	0.10	2.90	10.00	12.00	3.50	4.91	0.56	0.20	2.03
May	26.00	24.00	16.90	1.81	0.60	0.60	12.40	12.40	3.91	5.27	0.42	0.20	1.70
June	32.00	28.00	5.89	0.69			3.50	4.00	0.18	0.82	0.18	0.10	2.85
July	51.00	72.00	17.90	2.22	0.10	0.10	3.00	3.00	0.02	0.52	0.37	0.10	3.77
August	24.00	4.00	2.79	0.31	0.10	1.10	3.00	3.20	0.02	0.54	0.30	0.10	3.44
September	9.00	11.00	10.60	1.04	0.10	0.60	3.00	3.00	0.01	0.55	0.32	0.10	3.70
October	29.00	25.00	20.30	2.04			3.00	3.00	0.01	0.65	0.32		
November	12.00	12.00	2.61	0.31			3.00	3.25	0.01	0.40	0.24		
December	40.00	29.00	7.42	0.69			3.00	3.80	0.01		0.20		
Average	27.92	25.92	10.95	1.20	0.16	1.03	8.41	9.64	1.19	2.54	0.38	0.12	2.26
Limits			- <u>-</u>				25.0	25.0	10.0/15.0 <sup>ii</sup>		1.0		
Objectives			·				15.0	15.0	5.0/7.0 <sup>i</sup>	·	0.6		

<sup>(</sup>i) 5 mg/L June 1 to September 30 / 7 mg/L October1 to May 31

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<sup>(</sup>ii) 10 mg/L June 1 to September 30 / 15 mg/L October1 to May 31

Supervisor of Water & Wastewater Ian Kemp

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# 2. Description of any operating problems/corrective actions taken

The Iroquois wastewater treatment plant undertook a major modernisation project which was completed during this reporting period. Officially opened in July 2014.

3. Summary of all maintenance carried out on any major structure, equipment, apparatus, mechanism or thing forming part of the Works

All maintenance work throughout this reporting period has been completed to the Manufacturers' specifications as detailed in the maintenance manuals.

4. Summary of any effluent quality assurance or control measures undertaken in the reporting period

The Iroquois plant has undergone a major infrastructure upgrade during this reporting period. Alterations to the treatment process and the effluent outflow have been completed, the results can be seen on page 5 of this report. The Iroquois plant is producing effluent well within the objectives set by the MOE.

5. Summary of the calibration and maintenance carried out on all effluent monitoring equipment

Calibration of all monitoring equipment was successfully carried out by V.Nowik Instrumentation and Control on June 25<sup>th</sup> 2013.

6. Description of efforts made and results achieved in meeting the Effluent Objectives of Condition 6 of C of A number 9689-8MQHNK

After extensive modernisation at the Iroquois Wastewater Treatment Plant, it can be seen from the table on page 5 all effluent objectives were met and exceeded.



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7. Tabulation of the quantity of septage added to the works for co-treatment during the reporting period

There is no septage receiving station at this facility.

8. Tabulation of the volume of sludge generated in the reporting period, an outline of anticipated volumes to be generated in the next reporting period and a summary of the locations to where the sludge was disposed

2014 reporting period – a total of 572m<sup>3</sup> of treated sludge was removed and disposed of at a licenced disposal site.

9. Summary of any complaints received during the reporting period and any steps taken to address the complaints

None to report during this period.

10. Summary of all By-pass, spill or abnormal discharge events

None to report during this period.