South Dundas Waste Water Treatment Plant 5 Allison Street, Morrisburg



Supervisor of Water & Wastewater Ian Kemp

2014 Annual Report – Waste Water

## **2014 ANNUAL REPORT**

### **MORRISBURG WASTE WATER TREATMENT PLANT**

Reporting period - JAN 1st - DEC 31st 2014

### **MORRISBURG WASTE WATER TREATMENT PLANT**

**5 ALLISON STREET - MORRISBURG** 

Waste Water Treatment System Number: 2147-734L2K Waste Water Treatment System Owner : Municipality of South Dundas Waste Water Treatment System Category : Large Municipal Residential



South Dundas Waste Water Treatment Plant 5 Allison Street, Morrisburg



Supervisor of Water & Wastewater Ian Kemp

#### 2014 Annual Report – Waste Water

### Availability

Public Access via the web Public Access via Public Request http://www.southdundas.com Municipal Offices, 34 Ottawa Street,

Public Notice via Local Newspaper

Free copies of this report and the Summary report prepared as per requirements as per C of A number 2147-734L2K 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 2147-734L2K

Morrisburg



#### 2014 Annual Report – Waste Water

## Inside This Report

- Summary and comments outlining the monitoring data and effluent limits' (Condition 7 of C of A # 2147-734L2K), including an overview of the success and adequacy of the Works.
- 2. Description of any operating problems/corrective actions taken. page 6
- **3.** Summary of all maintenance carried out on any major structure, equipment, apparatus, mechanism or thing forming part of the Works. page 6
- Summary of any effluent quality assurance or control measures undertaken in the reporting period.
   page 6
- Summary of the calibration and maintenance carried out on all effluent monitoring equipment.
   page 6
- 6. Description of efforts made and results achieved in meeting the Effluent objectives of Condition 6 of C of A number 2147-734L2K. page 6
- 7. Tabulation of the quantity of septage added to the works for co-treatment during the reporting period.
  page 7
- 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 sludge disposal locations.
- Summary of any complaints received during the reporting period and any steps taken to address the complaints.
  page 7
- **10.** Summary of all By-pass, spill or abnormal discharge events . page 7



### 2014 Annual Report – Waste Water

1. Summary and comments outlining the monitoring data and effluent limits' (Condition 7 of C of A # 2147-734L2K), including an overview of the success and adequacy of the Works

MORRISBURG	Total m <sup>3</sup>	Average Daily m <sup>3</sup>	Maximum Daily m <sup>3</sup>			
Jan	67,328.00	2,171.87	6,055.00			
Feb	41,469.89	1,469.89	3,588.00			
March	58,362.00	1,882.65	3,872.00			
April	54,029.00	5,134.30	9,759.00			
May	89,312.00	2,881.00	6,744.00			
June	75,822.00	2,527.40	6,264.00			
July	63,675.00	2,054.03	3,252.00			
August	77,710.00	2,506.77	5,611.00			
September	49,984.00	1,666.13	2,067.00			
October	44,212.00	1,700.46	3,171.00			
November	44,134.00	1,576.21	3,352.00			
December	50,622.00	1,632.97	3,339.00			
Total Flow	716,659.89					
Ave Daily Flow		2,266.97				
Max Day			9,759.00			



South Dundas Waste Water Treatment Plant 5 Allison Street, Morrisburg Supervisor of Water & Wastewater Ian Kemp

#### 2014 Annual Report – Waste Water

Raw Influent					Final Effluent							
MORRISBURG	Suspend ed Solids mg/L	TKN mg/l	Total Phosphoru s mg/L	Nitrite (NO2) mg/L	Nitrate (NO3)m g/L	CBOD₅ mg/L	Suspended Solids mg/L	Ammonia + Ammonium	TKN mg/l	Total Phosphorus mg/L	Nitrite (NO2) mg/L	Nitrate (NO3)m g/L
Jan	116	24.7	2.81			3.7	6.5	0.0425		0.2725	0.1	4.6
Feb	124	16.7	1.67			3.25	4	0.1125		0.4925	0.1	5.4
March	172	17.4	1.95			3.25	3.5	0.0875		0.4175		
April	86	84	7.14			5	19.3	0.06		0.36		
May	124	11.2	1.73			3	5.6	0.066		0.204		
June	136	14.8	1.65			3.5	8.5	0.045		0.285	0.1	4.2
July	136	16.3	2.22			3.25	5.75	0.0275		0.35	0.1	5.9
August	26	11.3	1.28			3	3.6	0.03		0.38	0.1	4.3
September	180	35.1	4.39			3.5	4	0.07		0.6225	0.1	5.65
October	148	37.7	4.72			3	3	0.044		0.486	0.1	5.4
November	232	22.7	2.93			3.5	3	0.0775		0.2875	0.5	3.8
December	360	18.9	2.67			3.6	3.8	0.014		0.252	0.1	4.1
Average	153.3	25.9	2.93			3.462	5.9	0.056		0.367	0.1	4.82
Limits						25	25			1		
Objectives						15	15	5/7 <sup>(i)</sup>		0.5		

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



2014 Annual Report – Waste Water

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

None to report during this period.

# 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 Manufacturer's specifications, as detailed in the maintenance manuals.

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

The Table on page 6 'Effluent Quality' demonstrates that all analytical samples taken have proven to be within acceptable limits. No other control measure were required to be undertaken within the annual reporting period covered by this report.

# 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 July 16th 2014.

## 6. Description of efforts made and results achieved in meeting the Effluent Objectives of Condition 6 of C of A number 62-A-864/3-0958-76-006/ 3-0128-76-006

As can be seen in the chart on page 5 all effluent objectives in condition 6 of the certificate of approval were met during this reporting period.

South Dundas Waste Water Treatment Plant 5 Allison Street, Morrisburg



Supervisor of Water & Wastewater Ian Kemp

#### 2014 Annual Report – Waste Water

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

No septage was received during this reporting period.

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 sludge disposal locations

On September 17<sup>th</sup> and 18<sup>th</sup> 2014 Third High Farms removed a total of 1,120 cubic meters of sludge from the Morrisburg Plant. This was spread at licenced fields of McPherson Farms.

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

There were no complaints received relating to this plant, during this reporting period.

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

There were no events during this reporting period.