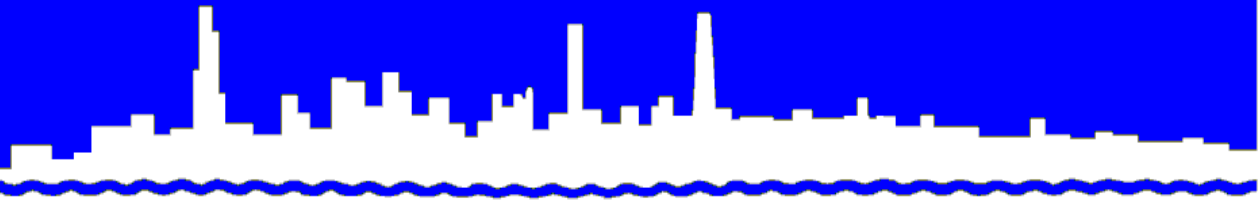


Protecting Our Water Environment



Metropolitan Water Reclamation District of Greater Chicago

***MONITORING AND RESEARCH
DEPARTMENT***

REPORT NO. 18-13

CALUMET EAST AND WEST SOLIDS MANAGEMENT AREAS

MONITORING REPORT FOR

FIRST QUARTER 2018

May 2018

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Edward W. Podczewski, P.E.
Director of Monitoring and Research

May 18, 2018

Mr. Roger Callaway
Illinois Environmental Protection Agency
Bureau of Water
DWPC Compliance Section #19
1021 North Grand Avenue East
P.O. Box 19276
Springfield, Illinois 62794-9274

Dear Mr. Callaway:

Subject: Calumet East and West Solids Management Areas - Calumet Water Reclamation Plant, Illinois Environmental Protection Agency Permit No. 2015-AO-59622, Monitoring Report for January, February, and March 2018

The attached tables contain the monitoring data for the Calumet East and West Solids Management Areas for January, February, and March 2018 as required by Illinois Environmental Protection Agency (IEPA) Operating Permit No. 2015-AO-59622. Biosolids were placed in the Calumet East Solids Management Area in January and March, and no biosolids were placed in the Calumet West Solids Management Area in January, February, or March.

Table 1 Analysis of Water From Lysimeters L-1N through L-6N at the Calumet East Solids Management Area Sampled on February 28, 2017.

Table 2 Analysis of Water From Lysimeters L-1N through L-3N at the Calumet West Solids Management Area Sampled on February 28, 2017.

Table 3 Analysis of Biosolids Placed in the Calumet East Solids Management Area During January 2018.

Mr. Roger Callaway

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May 18, 2018

Subject: Calumet East and West Solids Management Areas - Calumet Water Reclamation Plant, Illinois Environmental Protection Agency Permit No. 2015-AO-59622, Monitoring Report for January, February, and March 2018

Table 4 Analysis of Biosolids Placed in the Calumet East Solids Management Area During March 2018.

Very truly yours,

Albert E. Cox
Environmental Monitoring and Research Manager
Monitoring and Research Department

AC:DB:cm

Attachments

cc/att: Mr. J. Patel, IEPA
Records Unit, IEPA
Dr. H. Zhang
Dr. G. Tian
Dr. D. Brose

Metropolitan Water Reclamation District of Greater Chicago
100 East Erie Street Chicago, Illinois 60611-2803 312-751-5600

**CALUMET EAST AND WEST SOLIDS MANAGEMENT AREAS
MONITORING REPORT FOR FIRST QUARTER 2018**

Monitoring and Research Department
Edward W. Podczewinski, Director

May 2018

TABLE 1: ANALYSIS OF WATER FROM LYSIMETERS L-1N THROUGH L-6N AT THE CALUMET EAST SOLIDS MANAGEMENT AREA SAMPLED ON FEBRUARY 28, 2018

Parameter	Lysimeter No.					
	L-1N	L-2N	L-3N	L-4N	L-5N	L-6N
pH ¹	7.1	7.0	7.2	7.0	7.3	7.6
	----- mg L ⁻¹ -----					
Cl ⁻	162	131	36	829	231	18
SO ₄ ²⁻	2,044	1,865	1,325	2,637	561	731
NO ₂ +NO ₃ -N	0.76	<0.15	<0.15	<0.15	0.20	0.20

¹pH analyzed beyond recommended holding time of 15 minutes.

TABLE 2: ANALYSIS OF WATER FROM LYSIMETERS L-1N THROUGH L-3N
 AT THE CALUMET WEST SOLIDS MANAGEMENT AREA SAMPLED ON
 FEBRUARY 28, 2018

Parameter	Lysimeter No.		
	L-1N	L-2N	L-3N
pH ¹	7.5	7.6	7.3
	----- mg L ⁻¹ -----		
Cl ⁻	35	23	59
SO ₄ ²⁻	1,824	2,025	2,321
NO ₂ +NO ₃ -N	<0.15	<0.15	0.29

¹pH analyzed beyond recommended holding time of 15 minutes.

TABLE 3: ANALYSIS OF BIOSOLIDS PLACED IN THE
CALUMET EAST SOLIDS MANAGEMENT DRYING
AREA DURING JANUARY 2018

Parameter	Analysis ¹
pH	8.3
	---- % ----
Total Solids	21
Total Volatile Solids ²	69

¹One sample.

²Total volatile solids as a percentage of total solids.

TABLE 4: ANALYSIS OF BIOSOLIDS PLACED IN THE
 CALUMET EAST SOLIDS MANAGEMENT DRYING
 AREA DURING MARCH 2018

Parameter	Analysis ¹
pH	8.2
	---- % ----
Total Solids	21
Total Volatile Solids ²	64

¹Two samples.

²Total volatile solids as a percentage of total solids.