



**Environmental
Protection Agency**

Ted Strickland, Governor
Lee Fisher, Lt. Governor
Chris Korleski, Director

December 30, 2010

RE: LAKE COUNTY
VILLAGE OF MADISON WWTP
COMPLIANCE EVALUATION INSPECTION
NPDES PERMIT #OH0023515
OEPA PERMIT # 3PB00030

Mayor, Council & Administrator
Village of Madison
126 West Main Street
P.O. Box 7
Madison, Ohio 44057

Ladies/Gentlemen:

On December 30, 2010, this writer conducted a compliance evaluation inspection of the wastewater treatment plant serving the Village of Madison. Mr. Dave Cogar represented the village during the inspection. The purpose of the inspection was to evaluate the treatment facility's compliance with the terms and conditions of the National Pollutant Discharge Elimination System (NPDES) permit.

Wastewater Treatment Plant Observations

At the time of inspection, the plant was discharging an effluent satisfactory visual quality, in that there was no evidence of solids, debris or oil and grease. The following observations were noted:

1. The rags and other debris blocking the bar screens should be removed.
2. The activated sludge content in the plant is high. The oxidation ditches contained high concentrations of activated sludge, and the clarifiers had excessive amounts of sludge in the troughs.
3. Sludge was on the surface of the former chlorine contact chamber.
4. The sludge lagoon was filled to capacity. Mr. Cogar stated that sludge pressing occurs one day per week. Consideration should be given to increasing the frequency of sludge pressing.
5. No thermometer was found in the effluent composite sampler. When sampling, a thermometer, immersed in water, must be kept in the sampler refrigerator in order to ensure that composite samples are kept at 6 degrees Celsius.

NPDES Permit

During the inspection, this writer requested to see the current NPDES permit. Mr. Cogar was unable to locate the permit. The NPDES permit must be kept readily available at the wastewater treatment plant for reference.

The mercury variance application was processed and approved. As stated in Part II of the village's current NPDES permit, the village must commence the implementation of the Plan of Study as stated in the mercury variance application.

Also, Part II, Item E of the NPDES permit requires the reporting of sanitary sewer overflows. A sanitary sewer overflow (SSO) is an overflow, spill, release, or diversion of wastewater from a sanitary sewer system. An SSO may include, but is not limited to, collection system sewer pipe breaks, pump station overflows, sewage tank overflows, etc. When an SSO occurs, Ohio EPA must be notified within 24 hours of learning of any SSO. A written follow-up report must be submitted within 5 days of learning of the release. SSO Report Forms are available on the Division of Surface Water webpage, www.epa.state.oh.us/dsw/forms.

A review of the Discharge Monitoring Reports (DMRs) covering the period of February 2009 through November 2010 revealed the following effluent limitation violations:

Station	Reporting Code	Parameter	Limit Type	Limit	Reported Value	Violation Date
001	00665	Phosphorus, Total (P)	30D Conc	.73	.81	9/1/2010
001	00530	Total Suspended Solids	7D Conc	24	30.	5/8/2010
001	00530	Total Suspended Solids	7D Qty	45.4	69.2768	5/8/2010
001	00530	Total Suspended Solids	7D Qty	45.4	48.9343	3/8/2010
001	00610	Nitrogen, Ammonia (NH3)	7D Conc	2.6	3.935	9/22/2009
001	00610	Nitrogen, Ammonia (NH3)	7D Conc	2.6	4.155	9/15/2009
001	00610	Nitrogen, Ammonia (NH3)	7D Conc	2.6	4.435	9/8/2009
001	00610	Nitrogen, Ammonia (NH3)	30D Conc	1.7	4.29125	9/1/2009
001	00610	Nitrogen, Ammonia (NH3)	7D Conc	2.6	4.64	9/1/2009
001	00610	Nitrogen, Ammonia (NH3)	30D Qty	3.2	3.8095	9/1/2009
001	00665	Phosphorus, Total (P)	30D Conc	.73	1.04	9/1/2009
001	00300	Dissolved Oxygen	1D Conc	6.0	2.75	8/31/2009
001	00610	Nitrogen, Ammonia (NH3)	7D Conc	2.6	4.72	8/22/2009
001	00665	Phosphorus, Total (P)	7D Conc	1.1	1.51	8/22/2009
001	31616	Fecal Coliform	7D Conc	2000	4224.92	8/15/2009
001	31616	Fecal Coliform	7D Conc	2000	2824.88	8/8/2009
001	00610	Nitrogen, Ammonia (NH3)	30D Conc	1.7	2.32375	8/1/2009
001	00665	Phosphorus, Total (P)	30D Conc	.73	1.51	8/1/2009
001	00665	Phosphorus, Total (P)	30D Qty	1.4	1.71461	8/1/2009
001	00665	Phosphorus, Total (P)	7D Conc	1.1	1.19	7/22/2009
001	00665	Phosphorus, Total (P)	30D Conc	.73	1.19	7/1/2009
001	00665	Phosphorus, Total (P)	30D Qty	1.4	1.57645	7/1/2009
001	00530	Total Suspended Solids	7D Conc	24	30.5	6/15/2009
001	00300	Dissolved Oxygen	1D Conc	6.0	5.53	6/10/2009
001	00530	Total Suspended Solids	30D Conc	16	16.125	6/1/2009
001	00530	Total Suspended Solids	7D Conc	24	27.	3/15/2009
001	00530	Total Suspended Solids	7D Qty	45.4	58.9135	3/15/2009
001	80082	CBOD 5 day	7D Qty	36.9	38.7642	3/15/2009

Station	Reporting Code	Parameter	Limit Type	Limit	Reported Value	Violation Date
001	00530	Total Suspended Solids	7D Conc	24	33.	3/8/2009
001	00530	Total Suspended Solids	7D Qty	45.4	145.139	3/8/2009
001	00610	Nitrogen, Ammonia (NH3)	7D Qty	16.5	16.5654	3/8/2009
001	00530	Total Suspended Solids	30D Conc	16	20.25	3/1/2009
001	00530	Total Suspended Solids	30D Qty	30.3	60.5320	3/1/2009
001	00665	Phosphorus, Total (P)	30D Qty	1.4	1.56673	3/1/2009
001	00552	Oil and Grease, Hexane	1D Conc	10	12.	2/27/2009
001	00300	Dissolved Oxygen	1D Conc	6.0	5.71	2/18/2009
001	00530	Total Suspended Solids	7D Qty	45.4	54.4093	2/15/2009
001	00530	Total Suspended Solids	7D Conc	24	24.5	2/8/2009
001	00530	Total Suspended Solids	7D Qty	45.4	104.730	2/8/2009
001	00610	Nitrogen, Ammonia (NH3)	7D Qty	16.5	26.6259	2/8/2009
001	80082	CBOD 5 day	7D Qty	36.9	41.7447	2/8/2009
001	00530	Total Suspended Solids	30D Qty	30.3	47.6044	2/1/2009
001	00610	Nitrogen, Ammonia (NH3)	30D Qty	11.0	12.1830	2/1/2009

The A-Substitution Code "AK" (too numerous to count) has been used several times on the e-DMRs for fecal coliform. If a sample has fecal colonies that are too numerous to count, the sample should be diluted.

Be advised that failure to comply with the effluent limitations or to satisfy the monitoring, reporting, or compliance scheduling requirements of your NPDES permit may be cause for enforcement pursuant to the Ohio Revised Code Chapter 6111.

Actions to be Taken by Permittee

Within 10 days of the date of this letter, you are directed to notify this office, in writing, outlining the corrective action, either actual or proposed, that will be taken to eliminate the above highlighted deficiencies.

Should you have any questions regarding this letter, please contact this writer at (330) 963-1183.

Sincerely,



Marie Underwood, P.E.
Environmental Engineer
Division of Surface Water

MU/mt