



P.O. Box 625, Rt. 331S, Millsboro, DE 19966

AME 10-26-09

October 20, 2009

Address

- 5-DAY LETTER -

Allen McCloskey
Sr. Environmental Compliance Specialist
Division of Water Resources
DNREC
89 Kings Highway
Dover, DE 19966

RE: DE0000736, PH and TSS limits

Dear Allen:

I arrived at approximately 4:00 am on the morning of Friday October 16th to find high turbidity coming off the clarifier and cloudy effluent. After getting a grab sample I increased the P891L polymer feed to the clarifier and began my morning routine. I reviewed the inspection records and noted that the turbidity began to increase around 10:00 p.m. and remained the same at 1:00 am. The Aeration was high, EB was full and it appeared the system was overloaded. It had been raining most of Thursday and the EB was overflowing. After approximately an hour I rechecked the turbidity from the clarifier again and found it to still be rising. I again increased the polymer feed and started my MLSS and RAS samples. When I found the MLSS PH to be 4.97, I realized we had a more severe upset on our hands. I called Randy Spence, Plant Manager, at home and the decision was made to cancel production as they were underway. We shut production down rather quickly and an Effluent PH was grabbed. The PH was 5.66 S.U.: under our limit of 6.0. Once we were safely shut down I called your cell and left a message. We then called Glenn at the office to inform him. The TSS from the earlier grab was 123 mg/l, exceeding our maximum daily concentration of 45 mg/l. I called Jane Keller (Chemtreat) to enlist her help.

I then started doing PH adjustment tests to determine the amount of caustic that would be needed. We ended up using 1800 lbs. of beads that were on hand and 766 lbs. that we diverted from a water plant shipment. In the meantime we had placed another order with Intercoastal Trading Inc. When that arrived we used another 300 lbs. of beads and started a constant liquid feed to the AB. The AB ph was raised to the 7.50 range and we started monitoring the clarifier turbidity until we got to a level (approx. 37) that would correlate to an allowable TSS. Discharge was resumed around 11 pm. Saturdays test showed TSS of 11 mg/l and PH of 6.98. Sunday's tests showed TSS of 6mg/l and PH of 7.44.

Our investigation of the incident indicates that the probable causes were, heavy loading from production , increased volume and we discovered the seal of a Sucrose tank leaking several days later that provided additional loading. The tank has been repaired and I have contacted H.I.E. to get info and quotes on a PH probe for the AB and a turbidity meter for the effluent or perhaps the clarifier.

Any questions or concerns please call me.

Sincerely,

A handwritten signature in cursive script that reads "Bob Lynch".

Bob Lynch
Environmental/Wastewater Supervisor
(302)934-3833