



Metropolitan
St. Louis
Sewer District

Division of Environmental Compliance Industrial Waste Investigation

August 20, 2013

To: File

Subject: Industrial Waste Investigation
1134 Lockett Rd.
Des Peres, MO 63131

Introduction

On May 9, 2013, the Metropolitan St. Louis Sewer District (MSD) received a report from the Washington University Stable Isotope Laboratory, on behalf of the Two Mile Creek Alliance, regarding elevated levels of bacteria in the south branch of Two Mile Creek. The findings of the report indicate the elevated levels of bacteria originate from Tomasovic Greenhouses and Nursery, Inc. located at 1251 Meier Lane, a commercial site in the study area. The Washington University Stable Isotope Laboratory report was also sent to the St. Louis County Health Department and the City of Des Peres for review. A copy of the report can be found in the attachment section of this document.

Site History

An MSD records review of the area in question revealed the following:

- September 8, 2010 – MSD Maintenance responds to an odor complaint resulting in a “No MSD Problem” event. The Tomasovic Greenhouse was mentioned in MSD logs as a possible source. According to MSD logs the City of Des Peres was notified (SR# 201028225, WO# 1233297).
- May 21, 2011 – An odor complaint was received by MSD resulting in a “No MSD Problem” Event (SR# 201119998).
- May 25, 2011 – MSD Division of Environmental Compliance (DEC) Emergency Response Unit (ERU) visits 1137 Lockett to investigate an odor complaint. No odors were present at the time of the investigation. The property owner was given ERU contact information and advised to contact when odor returned. No contact was made by the property owner after the site visit. Tomasovic Greenhouse & Nursery management was visited and BMP's were discussed (SP-11-087).

DEC Investigation Results

MSD ERU conducted an investigation into the elevated bacteria levels found in the south branch of Two Mile Creek between the May 28, 2013 and July 18, 2013; the findings are as follow:

Site Characteristics:

A site inspection of the south branch of Two Mile Creek was conducted to help identify potential sources of bacteria pollution in the area of concern. The area of concern is delineated by Manchester Road to the south, Harwood Drive to the west, Middleview Drive to the north and Woodgate Drive to the east (See Attached Base Map). Located within this boundary are 15 residential homes bordering the south branch of Two Mile Creek, 50+ residential homes potentially contributing to stormwater runoff to the south branch of Two Mile Creek, four commercial properties including Tomasovic Greenhouse and Nursery and Harwood City Park.

Potential Pollution Sources:

Residential Sources:

There are 60+ residential homes that contribute to stormwater runoff into the south branch of Two Mile Creek. Household pet waste not properly disposed of can be carried by stormwater to nearby waterways and negatively impact water quality.

Harwood City Park:

Harwood City Park borders Two Mile Creek to the west. The park is frequented by pet owners walking and playing with their dogs. There is a "Doggie Dump Station" located within the park for pet owners which may or may not be utilized by users of the park. Pet waste not properly disposed of can be carried by stormwater to nearby waterways and negatively impact water quality.

Tomasovic Greenhouse & Nursery:

As seen in the Site History portion of this report MSD has visited Tomasovic Greenhouse & Nursery in the past investigating odor problems. Previous dye testing at the Tomasovic facility found they were on a septic system and an exotic bird facility had been added to their operation. It was concluded by MSD Maintenance the exotic bird facility discharged bird waste to a drainage ditch which eventually found its way to portions of Two Mile Creek. In 2011 MSD discussed BMP's with the Tomasovic's including "dry" methods which would prevent bird waste from entering the environment.

Stream investigations on the South branch of Two Mile creek found no physical impact from the nursery. Conversations with the Tomasovic family found they were in process of hooking their entire facility (house, bird cages, ect) to the MSD sanitary system. On July 18, 2013, MSD received construction approval verifying the Tomasovic Greenhouse & Nursery had connected to the MSD sanitary system (P29479-00).

Wildlife:

Excessive wildlife in any area can contribute to water quality issues. Although no wildlife was observed during this investigation, it was mentioned in conversations with the public and the Tomasovic's that flocks of geese frequently visited the nursery property and were often seen in Harwood park. Excessive wildlife waste can be carried by stormwater to nearby waterways and negatively impact water quality.

The City of Des Peres and St. Louis County were contacted during this investigation to discuss findings. MSD spoke with Dennis Stock of the City of Des Peres and a message was left with the St. Louis County Health Department which was never returned.

Conclusion

Although there may be many contributing factors to the excessive bacteria levels found in the south branch of Two Mile Creek, it is the opinion of this investigation the discharge from Tomasovic exotic bird facility may have been the main factor in the Washington University study. It is likely with the Tomasovic facility now connected to the MSD sanitary sewer system, bacteria levels will decrease to levels more commonly found in urban streams.

The Metropolitan St. Louis Sewer District

A handwritten signature in blue ink, appearing to read "Joseph J. Grib", with a long horizontal flourish extending to the right.

Joseph J. Grib
Division of Environmental Compliance

Attachments: Washington University Chemical and Bacterial Analysis
Figures