



MEMORANDUM

TO: Mayor and Council

FROM: Katie Coyne, Environmental Officer;
Assistant Director, Watershed Protection Department

DATE: January 27, 2022

SUBJECT: Discharge of acidic waste into tributary of Harris Branch Creek

The purpose of this memorandum is to inform you of a large discharge of sulfuric acid waste originating from the Samsung Austin Semiconductor facility at 12100 Samsung Boulevard into their stormwater pond and an unnamed tributary of Harris Branch Creek in Northeast Austin. This property is located in City Council District 1.

While it is unknown how much waste entered the tributary, Watershed Protection Department (WPD) staff found virtually no surviving aquatic life within the entire tributary from the Samsung property to the main branch of Harris Branch Creek, near Harris Branch Parkway. However, no measurable impacts to water chemistry or aquatic life were noted further downstream, and there was no iron staining to indicate any drop in pH had occurred within the main branch of Harris Branch Creek.

WPD was alerted to the discharge on Tuesday, January 18, by the Texas Commission on Environmental Quality (TCEQ). TCEQ is the lead agency for this incident and is overseeing communications, investigation, cleanup, and enforcement. The notification stated that over a period as long as 106 days, up to 763,000 gallons of acidic waste reached the stormwater pond on the Samsung property and also impacted the nearby tributary of Harris Branch Creek. Harris Branch Creek starts near Parmer and Yager Lanes and flows into Gilleland Creek, east of SH 130. Samsung notified TCEQ and the National Response Center about the discharge on Friday, January 14, and later reported that sections of the tributary had a pH of between 3 and 4 (far below normal for surface water).

WPD's role in this incident is to investigate and document any impacts to surface water, and pass all information and data collected to TCEQ. On Tuesday, January 18, and Wednesday, January 19, spill investigators and environmental scientists surveyed the surrounding area.

- Investigators first met with Samsung staff and confirmed the discharge had ceased, with the stormwater pond valves closed and isolated. Staff then surveyed downstream, observing iron staining within the channel of the tributary consistent with a low pH environment, beginning at the stormwater pond on the Samsung property, and continuing down the tributary to the confluence with Harris Branch Creek (approximately 1.5 miles).
- Further assessment of the tributary by WPD on Wednesday, January 19 found pH had returned to close to normal levels, with values ranging from 6.7 to 8.5.
- Environmental scientists found remains of dead aquatic species; and virtually no surviving aquatic life within the affected stretch, including vertebrates (fish) and macro

invertebrates. This indicates the discharge had a significant short-term impact on the aquatic community and the ecology of the tributary. It is too early to know what the long-term impacts might be.

- No impacts were noted within the main branch of Harris Branch Creek, with healthy aquatic life present and no iron staining to indicate a significant drop in pH had occurred.

WPD is receiving daily updates from Samsung on the remediation process at the stormwater pond and will inspect the pond for integrity once the remediation is complete and before it is allowed to be put back in service. In addition, WPD will be performing weekly surveys of the affected tributary to monitor water quality parameters, including pH, until all remediation is complete.

Public access to this area is limited, and there are no nearby parks. WPD did not observe indications of homeless encampments along the tributary. There is one apartment complex north of the tributary near Harris Branch Parkway, as well as an area with single family housing south of the tributary, also near Harris Branch Parkway. At this time, WPD must yield to TCEQ to perform and report on any assessments on impacts to human health.

If you have any questions or concerns, please contact Katie Coyne, Environmental Officer; Assistant Director, Watershed Protection Department, at 512-968-5176.

Attachments: Aerial image of impacted area

cc: Spencer Cronk, City Manager
Rey Arellano, Assistant City Manager
Jorge L. Morales, P.E., CFM, Director



Aerial image of the Samsung facility (top left of image) and the unnamed tributary to Harris Branch Creek. Samsung stormwater pond and impacted waterway are outlined in red.