

Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, March 3, 2023 1:45 PM
To: PUBCOMMENT-OCC2; PUBCOMMENT-OPIC; PUBCOMMENT-ELD; PUBCOMMENT-WQ
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: GEAA Comments CityofKyle_KyleTX_0303231.pdf

H

From: nathan@aquiferalliance.org <nathan@aquiferalliance.org>
Sent: Friday, March 3, 2023 12:55 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER:

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: MR Nathan Glavy

EMAIL: nathan@aquiferalliance.org

COMPANY: Greater Edwards Aquifer Alliance

ADDRESS: PO BOX 15618
SAN ANTONIO TX 78212-8818

PHONE: 2103200149

FAX: 2103206298

COMMENTS: Please accept the attached the updated comments on behalf of the fifty-four member groups of the Greater Edwards Aquifer Alliance.



Member Organizations

Alamo, Austin, and Lone Star chapters of the Sierra Club
Bexar Audubon Society
Austin, Bexar and Travis Green Parties
Bexar Grotto
Boerne Together
Bulverde Neighborhood Alliance
Bulverde Neighbors for Clean Water
Cibolo Center for Conservation
Citizens for the Protection of Cibolo Creek
Comal County Conservation Alliance
Environment Texas
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Friends of Canyon Lake
Friends of Dry Comal Creek
Friends of Government Canyon
Fuerza Unida
Green Society of UTSA
Guadalupe River Road Alliance
Guardians of Lick Creek
Headwaters at Incarnate Word
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Signal Hill Area Alliance
Sisters of the Divine Providence
Solar San Antonio
Texas Cave Management Association
Trinity Edwards Spring Protection Assoc.
Water Aid – Texas State University
Wildlife Rescue & Rehabilitation
Wimberley Valley Watershed Association

PO Box 15618
San Antonio, Texas 78212
(210) 320-6294

March 3, 2023

Laurie Gharis, Chief Clerk
Office of the Chief Clerk, MC 105
Texas Commission on Environmental Quality
PO Box 13087
Austin, TX 78711-3087

Submitted electronically at <https://www14.tceq.texas.gov/epic/eComment/>

Re: Updated Comments and Hearing Request Regarding the Major Amendment Application of the City of Kyle for TPDES Permit No. WQ0011041002

Please accept the attached comments on behalf of the fifty-four member groups of the Greater Edwards Aquifer Alliance.

1. Background. City of Kyle, 100 West Center Street, Kyle, Texas 78640, has applied to the Texas Commission on Environmental Quality (TCEQ) for a major amendment to Texas Pollutant Discharge Elimination System (TPDES) Permit No. WQ0011041002 to authorize an increase in the discharge of treated domestic wastewater from an annual average flow limit not to exceed 4,500,000 gallons per day to an annual average flow limit not to exceed 12,000,000 gallons per day and the addition of an Interim II phase at an annual average flow not to exceed 9,000,000 gallons per day.

The facility is located at 941 New Bridge Drive, in Hays County, Texas 78640. The treated effluent is discharged directly to Plum Creek in Segment No. 1810 of the Guadalupe River Basin. The designated uses for Segment No. 1810 are primary contact recreation, aquifer protection, and high aquatic life use.

2. Greater Edwards Aquifer Alliance (GEAA). GEAA submits the following comments on behalf of our fifty-four member organizations and requests a contested case hearing regarding this permit application. GEAA also requests that our organization is recognized as an affected party with standing to represent our members who are adjacent landowners. GEAA is a 501(c)(3) nonprofit organization that promotes effective broad-based advocacy for the protection and preservation of the Edwards Aquifer, its springs, watersheds, and the Texas Hill Country that sustains it. GEAA has multiple members who would be adversely affected by the proposed amendment of the City of Kyle.

GEAA's members have serious concerns regarding the permit application and draft permit, and regarding the degradation to Plum Creek that will likely occur with the increased discharge of treated sewage into these waterways. GEAA and its members' specific areas of concern are summarized in the following section of this letter.

3. **Comments on the application.** As noted in the Notice of Application and Preliminary Decision for TPDES Permit for Municipal Wastewater, the discharge route is from the City of Kyle Wastewater Treatment Facility directly to Plum Creek in Segment No. 1810 of the Guadalupe River Basin. There are several areas of concern with the current application:

A. Effluent Discharge Levels: The effluent discharge levels in the application currently depict a phased approach for effluent discharge levels as the expansion of the City of Kyle Wastewater Treatment Facility (WWTF) occurs, with the applicant requesting discharge level limits of 10 mg/l carbonaceous biochemical oxygen demand (CBOD₅), 15 mg/l total suspended solids (TSS), 2 mg/l ammonia-nitrogen (NH₃-N), 5 mg/l dissolved oxygen (DO), and no set total phosphorus (TP) level limit.

CBOD₅ is the amount of dissolved oxygen consumed in five days by biological processes breaking down organic matter, but in which the contribution from nitrogenous bacteria has been suppressed. Essentially, CBOD₅ is a marker of how much waste has been left untreated during the wastewater treatment process. This results in the untreated waste being treated in the stream itself, which is a process that consumes oxygen, including the dissolved oxygen in the water that's used by fish and other aquatic life. A high level of CBOD₅ threatens the health of the aquatic life of the receiving waterbody and raises the chance of fish kills.

Total suspended solids are waterborne particles that are larger than 2 microns that float or "suspend" in water. A variety of particles can be considered suspended solids, including plankton, sand, and sediment. In some instances, algae and bacteria may also be considered total suspended solids. The impact total suspended solids have on water quality is associated with a waterbody's clarity. The higher the amount of total suspended solids present in a waterbody, the increased chance of lowering the waterbody's natural dissolved oxygen level and increasing its water temperature. These implications would threaten the survival of the high aquatic life that is present in Plum Creek, the receiving waterbody for the City of Kyle's WWTF's discharged effluent. Further, the increased levels of total suspended solids could block the needed sunlight that Plum Creek utilizes for photosynthesis; decreasing the survival of plants and further decreasing the waterbody's oxygen levels.

Lastly, phosphorus is a "limiting nutrient" in ecosystems, meaning the quantity of this nutrient controls the pace of algal and aquatic plant production. However, excess quantities of phosphorus, even in small amounts, can lead to eutrophication and harmful algal growth in a waterbody.

GEAA strongly encourages the adoption of a CBOD₅ limit of 5 mg/l, Total Suspended Solids limit of 5 mg/l, and a Total Phosphorus limit of 0.5 mg/l; **bringing the effluent discharge level to a 5mg/l CBOD₅, 5mg/l TSS, 2 mg/l NH₃-N, 0.50 mg/l TP, and a 5 mg/l DO maximum effluent discharge limit.**

B. Water Quality and Quantity Impacts: As stated in the amendment application, the discharged effluent will flow directly into Plum Creek, Segment No. 1810 of the Guadalupe River Basin at a maximum rate of 12,000,000 gallons per day. Since 2008, Plum Creek has been actively following strategies found in a United States Environmental Protection Agency (USEPA) sponsored watershed protection plan (WPP) to restore and protect the water quality of Plum Creek. According to the Plum Creek WPP¹, water quality data dating back to 1998 indicated *E. coli* levels were not meeting Texas water quality standards for

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recreation use. Further, a 2022 Plum Creek WPP update² revealed that the upper, middle, and lower reaches of Plum Creek are still not meeting water quality standards for *E. coli*, and are listed in the Texas Commission on Environmental Quality's (TCEQ) Integrated Report; a biannual report indicating the water quality status of Texas' natural waters.

The 2022 Plum Creek WPP update also showed that Plum Creek is currently receiving treated wastewater discharge from 23 outfalls that are associated with 18 different TPDES permits across the watershed area (with three permits still pending). From these outfalls, prior to the potential approval of this major amendment, Plum Creek has the potential to receive an approximate range of 9.8 – 19.8 million gallons of treated effluent. With the potential increase of treated effluent entering Plum Creek resulting from the City of Kyle WWTF's major amendment application, GEAA would have serious concerns about the overall environmental integrity of stability of Plum Creek and threatened the success of meeting the implementation goals of the Plum Creek WPP.

C. City of Kyle WWTF Violations: A 2020 report developed by the Save Barton Creek Association (SBCA)³, a GEAA member organization, examined 48 wastewater treatment plants that had TPDES permits across 17 counties that made up the Texas Hill Country. Examining the pollutant monitoring data, a requirement for all TPDES permit holders to keep and submit data records to TCEQ, from January 2017 – June 2020, SBCA examined two key statistics:

1. The number of effluent exceedances that a WWTF reported during this study period, and
2. The number of days with exceedances a WWTF experienced.

When examining the City of Kyle's WWTF pollutant monitoring data, it was reported this WWTF experienced 65 instances of discharged effluent exceedances totaling a number of 833 days. SBCA ultimately gave the City of Kyle's WWTF a letter grade of "F" based on the number of days with effluent exceedances during the study period; A = 0 days, B = 1-50 days, C = 51-500 days; F = more than 500 days. With this report's findings, GEAA has serious concerns regarding the WWTF's capability of ensuring compliance and protecting the water quality and quantity of Plum Creek.

D. Incorporation of Beneficial Reuse: Examining the application paperwork, the City of Kyle WWTF application does not include any capacity to conduct beneficial reuse, which would reduce the risk of promoting environmental harm to Plum Creek and the surrounding watershed areas. Accordingly, GEAA urges the City of Kyle Company to utilize a "One Water" approach for their wastewater treatment system, incorporating beneficial reuse of effluent (to the extent possible), thereby eliminating the need to discharge effluent into Plum Creek. In the event the City of Kyle is unable to reuse all the wastewater generated, it is GEAA's recommendation that the remaining amounts be land applied, with the City of Kyle purchasing the necessary land for such and obtaining the requisite Texas Land Application Permit (TLAP) from TCEQ.

GEAA understands the need to support the local Kyle, TX community as this area continues to grow and becomes more urbanized. Further, we understand the costs associated with these environmentally-

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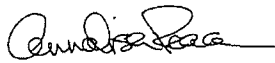
³ Zabcik, Brian. Save Barton Creek Association, Austin, TX, 2022, pp. 1–41, *Pristine to Polluted: Sewage Problems & Solutions in the Texas Hill Country*.

friendly solutions to wastewater discharge. We would encourage the City of Kyle to examine external funding opportunities to fund such solutions. Some funding opportunities that could assist in implementing these strategies include funding programs offered by the Texas Water Development Board (TWDB), and the new infrastructure funding from the Federal Government.

The TCEQ has previously stated that in evaluating wastewater permits, they consider baseline conditions in the receiving stream, the physical and hydrological characteristics of the stream, waterbody uses, and the associated water quality standards that protect those uses. We trust that the TCEQ will consider the stated factors when implementing the City of Kyle's major amendment TPDES application and will adopt standards that are in line with others in Central Texas.

Thank you for the opportunity to submit these comments.

Sincerely,



Annalisa Peace
Executive Director
Greater Edwards Aquifer Alliance



Nathan Glavy
Technical Director
Greater Edwards Aquifer Alliance

Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, October 21, 2022 12:22 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-OPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: GEAA Comments CityofKyle_KyleTX_1021221.pdf

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Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER:

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: Nathan Glavy

EMAIL: nathan@aquiferalliance.org

COMPANY: Greater Edwards Aquifer Alliance

ADDRESS: 1809 BLANCO RD
SAN ANTONIO TX 78212-2616

PHONE: 2103200149

FAX: 2103206298

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Bexar Grotto

Boerne Together

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Trinity Edwards Spring Protection Assoc.

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Wimberley Valley Watershed Association

October 21, 2022

Laurie Gharis, Chief Clerk

Office of the Chief Clerk, MC 105

Texas Commission on Environmental Quality

PO Box 13087

Austin, TX 78711-3087

Submitted electronically at <https://www14.tceq.texas.gov/epic/eComment/>

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PO Box 15618
San Antonio, Texas 78212
(210) 320-6294

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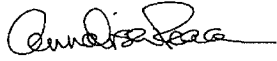
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Thank you for the opportunity to submit these comments.

Sincerely,

A handwritten signature in black ink, appearing to read "Annalisa Peace". The signature is fluid and cursive, with a long horizontal stroke extending to the right.

Annalisa Peace
Executive Director
Greater Edwards Aquifer Alliance

A handwritten signature in black ink, appearing to read "Nathan Glavy". The signature is cursive and elegant, with a prominent loop at the end.

Nathan Glavy
Technical Director
Greater Edwards Aquifer Alliance

Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, October 21, 2022 12:23 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-ÓPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: GEAA Comments CityofKyle_KyleTX_102122.pdf

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From: annalisa@aquiferalliance.org <annalisa@aquiferalliance.org>
Sent: Friday, October 21, 2022 12:02 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER: 2022-0891-MLM-E

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: Annalisa Peace

EMAIL: annalisa@aquiferalliance.org

COMPANY: Greater Edwards Aquifer Alliance

ADDRESS: 1809 BLANCO RD
SAN ANTONIO TX 78212-2616

PHONE: 2103200149

FAX: 2103206298

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October 21, 2022

Laurie Gharis, Chief Clerk

Office of the Chief Clerk, MC 105

Texas Commission on Environmental Quality

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Total suspended solids are waterborne particles that are larger than 2 microns that float or “suspend” in water. A variety of particles can be considered suspended solids, including plankton, sand, and sediment. In some instances, algae and bacteria may also be considered total suspended solids. The impact total suspended solids have on water quality is associated with a waterbody’s clarity. The higher the amount of total suspended solids present in a waterbody, the increased chance of lowering the waterbody’s natural dissolved oxygen level and increasing its water temperature. These implications would threaten the survival of the high aquatic life that is present in Plum Creek, the receiving waterbody for the City of Kyle’s WWTF’s discharged effluent. Further, the increased levels of total suspended solids could block the needed sunlight that Plum Creek utilizes for photosynthesis; decreasing the survival of plants and further decreasing the waterbody’s oxygen levels.

GEAA strongly encourages the adoption of a Total Suspended Solids limit of 5 mg/l; **bringing the effluent discharge level to a 5mg/l CBOD₅, 5mg/l TSS, 2 mg/l NH₃-N .50 mg/l TP, and a 5 mg/l DO maximum effluent discharge limit.**

B. Water Quality and Quantity Impacts: As stated in the amendment application, the discharged effluent will flow directly into Plum Creek, Segment No. 1810 of the Guadalupe River Basin at a maximum rate of 12,000,000 gallons per day. Since 2008, Plum Creek has been actively following strategies found in a United States Environmental Protection Agency (USEPA) sponsored watershed protection plan (WPP) to restore and protect the water quality of Plum Creek. According to the Plum Creek WPP¹, water quality data dating back to 1998 indicated *E. coli* levels were not meeting Texas water quality standards for recreation use. Further, a 2022 Plum Creek WPP update² revealed that the upper, middle, and lower reaches of Plum Creek are still not meeting water quality standards for *E. coli*, and are listed in the Texas Commission on Environmental Quality’s (TCEQ) Integrated Report; a biannual report indicating the water quality status of Texas’ natural waters.

The 2022 Plum Creek WPP update also showed that Plum Creek is currently receiving treated wastewater discharge from 23 outfalls that are associated with 18 different TPDES permits across the watershed area (with three permits still pending). From these outfalls, prior to the potential approval of this major amendment, Plum Creek has the potential to receive an approximate range of 9.8 – 19.8 million gallons of treated effluent. With the potential increase of treated effluent entering Plum Creek

¹Berg, Matt, et al. Plum Creek Watershed Partnership, College Station, TX, 2008, pp. 1–170, Plum Creek Watershed Protection Plan.

²Plum Creek Watershed Partnership. Plum Creek Watershed Partnership, College Station, TX, 2022, pp. 1–83, *2022 Update to The Plum Creek Watershed Protection Plan*.

resulting from the City of Kyle WWTF's major amendment application, GEAA would have serious concerns about the overall environmental integrity of stability of Plum Creek and threatened the success of meeting the implementation goals of the Plum Creek WPP.

C. City of Kyle WWTF Violations: A 2020 report developed by the Save Barton Creek Association (SBCA)³, a GEAA member organization, examined 48 wastewater treatment plants that had TPDES permits across 17 counties that made up the Texas Hill Country. Examining the pollutant monitoring data, a requirement for all TPDES permit holders to keep and submit data records to TCEQ, from January 2017 – June 2020, SBCA examined two key statistics:

1. The number of effluent exceedances that a WWTF reported during this study period, and
2. The number of days with exceedances a WWTF experienced.

When examining the City of Kyle's WWTF pollutant monitoring data, it was reported this WWTF experienced 65 instances of discharged effluent exceedances totaling a number of 833 days. SBCA ultimately gave the City of Kyle's WWTF a letter grade of "F" based on the number of days with effluent exceedances during the study period; A = 0 days, B = 1-50 days, C = 51-500 days; F = more than 500 days. With this report's findings, GEAA has serious concerns regarding the WWTF's capability of ensuring compliance and protecting the water quality and quantity of Plum Creek.

D. Incorporation of Beneficial Reuse: Examining the application paperwork, the City of Kyle WWTF application does not include any capacity to conduct beneficial reuse, which would reduce the risk of promoting environmental harm to Plum Creek and the surrounding watershed areas. Accordingly, GEAA urges the City of Kyle Company to utilize a "One Water" approach for their wastewater treatment system, incorporating beneficial reuse of effluent (to the extent possible), thereby eliminating the need to discharge effluent into Plum Creek. In the event the City of Kyle is unable to reuse all the wastewater generated, it is GEAA's recommendation that the remaining amounts be land applied, with the City of Kyle purchasing the necessary land for such and obtaining the requisite Texas Land Application Permit (TLAP) from TCEQ.

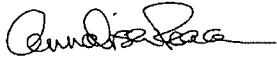
GEAA understands the need to support the local Kyle, TX community as this area continues to grow and becomes more urbanized. Further, we understand the costs associated with these environmentally-friendly solutions to wastewater discharge. We would encourage the City of Kyle to examine external funding opportunities to fund such solutions. Some funding opportunities that could assist in implementing these strategies include funding programs offered by the Texas Water Development Board (TWDB), and the new infrastructure funding from the Federal Government.

The TCEQ has previously stated that in evaluating wastewater permits, they consider baseline conditions in the receiving stream, the physical and hydrological characteristics of the stream, waterbody uses, and the associated water quality standards that protect those uses. We trust that the TCEQ will consider the stated factors when implementing the City of Kyle's major amendment TPDES application and will adopt standards that are in line with others in Central Texas.

³ Zabcik, Brian. Save Barton Creek Association, Austin, TX, 2022, pp. 1–41, *Pristine to Polluted: Sewage Problems & Solutions in the Texas Hill Country*.

Thank you for the opportunity to submit these comments.

Sincerely,

A handwritten signature in black ink, appearing to read "Annalisa Peace". The signature is fluid and cursive, with a long horizontal stroke extending to the right.

Annalisa Peace
Executive Director
Greater Edwards Aquifer Alliance

A handwritten signature in black ink, appearing to read "Nathan Glavy". The signature is cursive and elegant, with a prominent "N" and a long, sweeping "y".

Nathan Glavy
Technical Director
Greater Edwards Aquifer Alliance

Kimberly Muth

From: PUBCOMMENT-OCC
Sent: Thursday, August 17, 2023 3:58 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-OPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: City of Kyle Contested Case Hearing Request.pdf

H

From: victoria@sosalliance.org <victoria@sosalliance.org>
Sent: Thursday, August 17, 2023 2:33 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER:

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

NAME: Victoria Rose

EMAIL: victoria@sosalliance.org

COMPANY:

ADDRESS: 4701 W GATE BLVD Ste. D-401
AUSTIN TX 78745-1479

PHONE: 5124772320

FAX:

COMMENTS: Please find SMRF's contested case hearing request in the attached PDF.

Laurie Gharis
Chief Clerk
Texas Commission on Environmental Quality
P.O. Box 13087 – MC 105
Austin, Texas 787011 – 3087

August 17, 2023

Via: Online Submission Form

Re: Request for Contested Case Hearing on the Application and Draft Permit of the City of Kyle for Proposed Major Amendment to TPDES Permit No. WQ0011041002

Dear Ms. Gharis:

The San Marcos River Foundation (SMRF) requests a contested case hearing on the application and draft permit of the City of Kyle for proposed major amendment for TPDES Permit No. WQ0011041002.

I. Background.

The City of Kyle (“the Applicant”) has applied for a major amendment to existing TPDES permit no. WQ0011041002 to increase the permitted annual average flow from 4.5 million gallons per day to 12 million gallons per day directly into Plum Creek which is a tributary of the San Marcos River.

II. The San Marco River Foundation Meets the Requirements to be Considered an “Affected Person” in Order to Contest the Draft Permit.

SMRF meets the requirements set out in 30 T.A.C. § 55.205 for a group or association to be considered an “affected person” for the purposes of requesting a contested case hearing.

SMRF is a non-profit organization that was established to protect public access to and to preserve the San Marcos River. To carry out this mission, SMRF works to protect the flow of aquifer fed springs into the San Marcos River, improve the water quality of the river, protect the beauty of the river and nearby parks, and protect streams what flow into the San Marcos River. A large part of SMRF’s work involves water quality monitoring and scientific studies aimed at improving the quality of effluent discharged from wastewater facilities, and SMRF regularly participates in the wastewater permitting process. SMRF’s work and mission directly encompass protecting the receiving waters for the Draft Permit since the receiving waters for the Draft Permit flow into the San Marcos River, and the issuance of the Draft Permit will harm SMRF’s interest in the protection of water quality, aquatic life, property values, recreation, conservation, and aesthetic beauty of the San Marcos River and Plum Creek. SMRF submitted timely comments on October 21, 2022, detailing the ways in which the Draft Permit will harm these interests and the receiving waters.

SMRF has members who would otherwise have standing to request a contested case hearing for the Draft Permit in their own right. Among these is SMRF member Chelsea Collie.

Chelsea Collie is a SMRF member who owns real property and lives at 490 Holly Grove Street, Kyle TX 78640 which is less than a quarter mile from the discharge point for the Draft Permit. The treatment facility associated with the Draft Permit is adjacent to Ms. Collie's backyard. Ms. Collie's economic, property, aesthetic, recreation, and personal health and safety interests will be harmed by the Draft Permit. And Ms. Collie has concerns about odor, medical issues in the neighborhood related to treatment facility (several neighbors experiencing hair loss), what is in the air, chemicals being used with treatment, soil concerns, effluent quality being discharged, water quality, home values, quality of life, use of back yard with expansion, effects of neighborhood on neighborhood. Ms. Collie's phone number is 512-787-7988, and her email is chelsealaine2013@gmail.com.

For these reasons, SMRF is an "affected person" entitled to a contested case hearing on the application and Draft Permit. 30 T.A.C. § 55.205.

III. The TCEQ Executive Director Did Not Sufficiently Address the Issues Raised by SMRF, and SMRF Requests a Contested Case Hearing on These Issues.

SMRF remains concerned about the impacts of the Draft Permit on the receiving waters in light of, and among other concerns, the high levels of nutrients in the wastewater effluent. The following relevant and material issues were timely raised by SMRF during the comment period for the Draft Permit and were not sufficiently addressed by the TCEQ Executive Director ("ED"). SMRF reiterates the concerns and comments raised during the comment period as the basis for this request for a contested case hearing, and to further show that the ED did not adequately address SMRF's comments.

These issues were raised by SMRF and were not adequately addressed in the ED's Response to Comments ("RTC"):

1. Whether the Draft Permit will degrade water quality.
2. Whether the Draft Permit will violate Texas Surface Water Quality Standards.
3. Whether the Draft Permit complies with antidegradation requirements.
4. Whether the Draft Permit is protective of wildlife.
5. Whether the Draft Permit is protective of human health.
6. Whether TCEQ should decline to issue the Draft Permit due to the City of Kyle's poor compliance history.
7. Whether the Applicant has demonstrated a need for the requested volume.

This request for Contested Case Hearing identifies specific comments made by SMRF related to the above issues (as numbered by the ED), the ED's corresponding response in

her RTC, and the factual basis of each dispute, as well as any related disputed issues of law.

Issue 1: Whether the Draft Permit will degrade water quality.

Comments 4, 5, 7.

SMRF commented that the nutrient pollution, high volume of discharged wastewater, and *E.coli* associated with the Draft Permit will degrade water quality in Plum Creek.

In response, the ED stated that the Draft Permit would not degrade water quality

The ED's response is inadequate because the ED provided no evidence or information to support the ED's statement that water quality would not be degraded. The ED simply recited the parameters of the Draft Permit and concluded, without support, that the parameters were protective.

Issue 2: Whether the Draft Permit will violate the Texas Surface Water Quality Standards.

Comments 4, 5, 7, 26.

SMRF commented that the Draft Permit will violate the Texas Surface Water Quality Standards. SMRF also commented that the Draft Permit should contain more stringent effluent limitations for several parameters, and even the current updated limitations are likely not enough to comply with Texas Surface Water Quality Standards.

In response, the ED stated that the Draft Permit was developed to comply with applicable water quality standards.

The ED's response is inadequate because the response did not contain any justification to conclude that the Draft Permit will in fact comply with the Texas Surface Water Quality Standards. The ED also failed to address the studies submitted by SMRF that discuss the ways that nutrient pollution can lead to violations of Texas Surface Water Quality Standards and other issues raised by SMRF.

Issue 3: Whether the Draft Permit complies with antidegradation requirements

Comment 4.

SMRF Commented that the Draft Permit would violate the Tier 1 and Tier 2 antidegradation requirements.

The ED did not directly respond to SMRF's comment that the Draft Permit would violate the Tier 1 and Tier 2 antidegradation requirements.

The ED's response is inadequate because the ED failed to respond at all.

Issue 4: Whether the Draft Permit is protective of wildlife.

Comment 16. SMRF commented that, among other concerns for wildlife, increased algal growth, increased nitrogen levels, and scouring caused by the large permitted volume of wastewater discharge will harm wildlife.

The ED responded that dissolved oxygen levels would be protective of existing aquatic uses and summarily concluded that the Draft Permit would comply with Texas Surface Water Quality Standards related to wildlife.

The ED's response is inadequate because the response failed to address several aspects of SMRF's comment expressing concern for wildlife and failed to provide any justification for concluding that the Draft Permit would be protective of wildlife.

Issue 5: Whether the Draft Permit is protective of human health.

Comment 17. SMRF comment that the Draft Permit will harm human health, in part, due to increased nitrogen levels in the water and exposure to harmful algae.

The ED responded that the Draft Permit would comply with Texas Surface Water Quality Standards.

The ED's response is inadequate because she failed to explain how the Draft Permit would protect human health beyond reciting the regulatory requirements.

Issue 6: Whether TCEQ should decline to issue the Draft Permit due to the City of Kyle's poor compliance history.

SMRF commented that TCEQ should reject the application because from January 2017 to June 2020, the City of Kyle reported 833 days of exceedances under its current TPDES wastewater discharge permit. If the Applicant cannot properly operate a wastewater treatment plant discharging 4,500,000 gallons per day, it is not reasonable to think that the Applicant can properly operate a wastewater treatment plant discharging 12,000,000 gallons per day.

The ED provided no response to SMRF's comment.

Issue 7: Whether the Applicant has demonstrated a need for the requested volume.

SMRF commented that the Applicant failed to supply sufficient justification for requesting to more than double its ability to discharge wastewater from 4,500,000 gallons per day to 12,000,000 gallons per day. The Applicant's justification is speculative and does not rationalize such a large increase in discharge capacity. In fact, the Applicant admits that it is not currently using the full 4,500,000 gallons per day capacity that it currently has, and the Applicant is not projected to exceed this amount until much later this decade.

The ED provided no response to SMRF's comment.

IV. Conclusion.

SMRF respectfully requests a contested case hearing on the application and Draft Permit of the City of Kyle for major amendments to TPDES Permit No. WQ0011041002. SMRF requests that the TCEQ Commissioners refer the case to the State Office of Administrative Hearings on the issues listed and discussed above.

SMRF continues to urge the Applicant and TCEQ to provide for the re-use of wastewater effluent and/or to apply for a TLAP permit to avoid the discharge of treated sewage into the sensitive receiving waters.

Thank you for considering SMRF's comments and concerns associated with the Application and Draft Permit and for considering SMRF's Contested Case Hearing Request.

Please use the contact information below for all communications with SMRF on this matter.

Sincerely,
/s/ Victoria Rose
Victoria Ann Rose
State Bar No. 24131088
victoria@sosalliance.org

Bill Bunch
State Bar No. 03342520
bill@sosalliance.org

Save Our Springs Alliance
4701 Westgate Blvd.
Bldg. D, Suite 401
Austin, Texas 78745
Tel.: 512-477-2320
Fax: 512-477-6410

Attorneys for San Marcos River Foundation

Laurie Gharis
Chief Clerk
Texas Commission on Environmental Quality
P.O. Box 13087 – MC 105
Austin, Texas 787011 – 3087

October 21, 2022

RECEIVED

MAR 30 2023

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Via: Online Submission Form

AT PUBLIC MEETING

RE: Application and Draft Permit of City of Kyle, for a Proposed Amendment to TPDES Permit No. WQ0011041002

Dear Ms. Gharis:

These comments are submitted on behalf of the San Marcos River Foundation, regarding the Application and Draft Permit of the City of Kyle., for a proposed major amendment to TPDES Permit No. WQ0011041002.

The City of Kyle, (“the Applicant”) has applied for a major amendment to TPDES Permit No. WQ0011041002. With the major amendment, the Applicant seeks to discharge 12,000,000 gallons per day into Plum Creek in Segment 1810 of the Guadalupe River Basin.

Plum Creek itself has long been a valued resource for those living in its watershed and is home to a diverse array of mammals and birds. However, this beloved resource is at risk from the increased pressures posed by rapid development and the associated water pollution. As detailed in the comments below, allowing the proposed amendments to TPDES Permit No. WQ0011041002 (“the Draft Permit”) will cause continued degradation of Plum Creek and further imperil this treasured watershed because of the high levels of nutrient pollution, large volume of water, and high levels of *E. coli* allowed in the Draft Permit. Plum Creek then drains into the San Marcos River, another beloved natural resource that is used for recreation and that is home to many wildlife species. Like Plum Creek, the San Marcos River is under pressure from development and other sources of pollution.

1. The Draft Permit Must Contain More Stringent Limitations on Nutrients.

Without more stringent limits on nutrients, the Draft Permit will violate the Tier 1 and Tier 2 antidegradation rules, violate the Texas Surface Water Quality Standards, harm wildlife, and harm human health and recreation. Total phosphorus and nitrate nitrogen are already parameters of concern for Plum Creek, and there are concerns that the microbenthic community are already impaired. THE PLUM CREEK WATERSHED PARTNERSHIP, 2022 UPDATE TO THE PLUM CREEK WATERSHED PROTECTION PLAN (2022). Further degradation cannot be allowed, and the Draft Permit, if issued, should set limits on CBOD/TSS/Ammonia Nitrogen/Total Phosphorus of at least 5-5-2-0.5 for all phases of the discharge.¹

¹ 5-5-2-0.5 is a shorthand referenced for effluent parameters of 5 mg/L CBOD, 5 mg/L TSS, 2 mg/L Ammonia Nitrogen, and 0.5 mg/L Total Phosphorus.

The harms of phosphorus enrichment in aquatic ecosystems are well documented and include impacts such as increased algal growth, proliferation of cyanotoxins, and increased murkiness in water. U.S. ENVIRONMENTAL PROTECTION AGENCY, A COMPILATION OF COST DATA ASSOCIATED WITH THE IMPACTS AND CONTROL OF NUTRIENT POLLUTION (2015).² And rigorous scientific studies of Texas Hill Country streams, streams like the receiving waters for low in order to avoid nuisance algae growth, violation of antidegradation standards, and impairment of current uses.³ Plum Creek already has concerning high concentrations of total phosphorus due to wastewater discharges and other sources of urban pollution. The high levels of total phosphorus currently in the Draft Permit must be reduced to avoid the negative consequences of phosphorus enrichment in Plum Creek.

Plum Creek is also at risk for violating regulations in relation to nitrogen and nitrate concentrations. The Draft Permit must include a limit on total nitrogen or nitrate nitrogen and a lower limit on ammonia nitrate in order to avoid impairing current uses, violating antidegradation standards, and harming wildlife and human health. Wildlife and humans are at risk under the current Draft Permit nitrogen related limitations as wildlife are at risk from the impacts linked with excessive nitrate consumption, Isaza et al., *Living in Polluted Waters: A Meta-Analysis of the Effects of Nitrate and Interactions with Other Environmental Stressors on Freshwater Taxa*, 261 ENVIRONMENTAL POLLUTION 1 (2020), and humans are at risk for nitrate poisoning as well.

2. The Draft Permit Must Have More Stringent Limits on *E. Coli*.

In addition to reducing the amount of nutrient pollution allowed in the Draft Permit, the Applicant and TCEQ should reduce the amount of *E. coli* colony forming units permitted by the Draft Permit. The Draft Permit currently allows 126 CFU, which is part of the limit under Texas Surface Water Quality Standards for contact recreation uses. However, Plum Creek is already close to exceeding these limits. THE PLUM CREEK WATERSHED PARTNERSHIP, PLUM CREEK WATERSHED PROTECTION PLAN (2008). While the *E. coli* issue in Plum Creek has improved since the beginning of the Plum Creek Watershed Protection Plan, Plum Creek is still at risk of no longer supporting its designated uses for this parameter. TCEQ and the Applicant should take every opportunity to avoid such a violation rather than setting the *E. coli* limit at the line between supporting and not supporting a designated use in an area that is already under pressure from other sources of *E. coli* pollution. Permitting the discharge of wastewater effluent containing such high levels of *E. coli* places Plum Creek at high risk of not supporting its designated use of contact recreation in violation of the Tier 1 antidegradation standard.

² U.S. Environmental Protection Agency, *Indicators: Phosphorus*, <https://www.epa.gov/national-aquatic-resource-surveys/indicators-phosphorus>; USGS, *Phosphorus and Water*, <https://www.usgs.gov/special-topics/water-science-school/science/phosphorus-and-water>.

³ Bioassessment of Four Hill Country Streams Threatened by Proposed Municipal Wastewater Discharges; PowerPoint Presentation on Nutrient Pollution in the Blanco River: https://wimberleywatershed.org/wp-content/uploads/2020/08/KingRS_BlancoCityCouncil_Public_Comment_Aug_2020.pdf; Presentation on Nutrient Pollution: <https://www.youtube.com/watch?v=abxeLoBTaLA>.

3. The Applicant has not Shown a Need for the Requested Volume.

The Applicant failed to supply sufficient justification for requesting to more than double its ability to discharge wastewater from 4,500,000 gallons per day to 12,000,000 gallons per day. The Applicant's justification is speculative and does not rationalize such a large increase in discharge capacity. In fact, the Applicant admits that it is not currently using the full 4,500,000 gallons per day capacity that it currently has, and the Applicant is not projected to exceed this amount until much later this decade.

The large increase in wastewater discharge could also lead to scouring of the Plum Creek bed, churning up sediment while impairing uses and harming wildlife. The Applicant cannot justify a need for the large increase in discharge capacity, and its request must be denied.

4. TCEQ Should Reject the Amendment Based on the Applicant's Compliance History.

From January 2017 to June 2020, the City of Kyle reported 833 days of exceedances under its current TPDES wastewater discharge permit. SBCA, PRISTINE TO POLLUTED SEWAGE PROBLEMS & SOLUTIONS IN THE TEXAS HILL COUNTRY (2020). With such a history of polluting Plum Creek and unsatisfactory compliance history, TCEQ must exercise its authority under 30 T.A.C. § 60.3 to deny the amendment. If the Applicant cannot properly operate a wastewater treatment plant discharging 4,500,000 gallons per day, it is not reasonable to think that the Applicant can properly operate a wastewater treatment plant discharging 12,000,000 gallons per day.

5. The Draft Permit, if Issued Should Include Provisions That Require Reuse of Effluent.

Setting more stringent treatment standards would support the inclusion of a re-use provision in the Draft Permit. The higher quality treated wastewater can be sold for irrigation or industry, making it a valuable commodity for the City of Kyle. For example, treated wastewater can also be reused in landscape irrigation, gray water systems, and cooling towers, and presents a much better option than groundwater.

There are many other uses for good quality treated wastewater, uses better than increasing pollutant loads in Plum Creek. With water prices skyrocketing and demand for water rising steeply, including a reuse provision in the Draft Permit would be a win-win to meet the growing demand for treated wastewater and lessen the impacts of wastewater pollution in Plum Creek and the Guadalupe and San Marcos River basins. Having good quality wastewater, a small lake for storing some of it, and a re-use provision in the Draft Permit, if issued, will make treated wastewater a valuable commodity for the City of Kyle, while also helping to protect those downstream of the wastewater treatment plant.

b, We want to see at least 6.0 mg/L
for dissolved oxygen - 5.0 mg/L
is too small.

For the above reasons, the San Marcos River Foundation opposes the proposed major amendments to TPDES Permit No. WQ0011041002 and asks that the application be denied. Thank you for considering our comments and allowing us to express our concerns about the Draft Permit.

Sincerely,

Virginia Parker
Executive Director
San Marcos River Foundation
P.O. Box 1393
San Marcos, Texas 78667
Tel.: 512-353-4628
virginia@sanmarcosriver.org

Victoria Rose
Staff Attorney
Save Our Springs Alliance
4701 Westgate Blvd.
Bldg. D, Suite 401
Austin, Texas 78745
Tel.: 512-477-2320, ext. 6
Fax: 512-477-6410
victoria@sosalliance.org

Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, October 21, 2022 3:08 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-OPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: Comments on City of Kyle WWTP Renewal.docx

From: virginia@sanmarcosriver.org <virginia@sanmarcosriver.org>
Sent: Friday, October 21, 2022 3:07 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTITY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER: 2016-0829-MWD-E

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: Virginia Parker

EMAIL: virginia@sanmarcosriver.org

COMPANY: San Marcos River Foundation

ADDRESS: PO BOX 1393
SAN MARCOS TX 78667-1393

PHONE: 2108604575

FAX:

COMMENTS: Laurie Gharis October 21, 2022 Chief Clerk Texas Commission on Environmental Quality P.O. Box 13087 – MC 105 Austin, Texas 787011 – 3087 Via: Online Submission Form RE: Application and Draft Permit of City of Kyle, for a Proposed Amendment to TPDES Permit No. WQ0011041002 Dear Ms. Gharis: These comments are submitted on behalf of the San Marcos River Foundation, regarding the Application and Draft Permit of the City of Kyle., for a proposed major

amendment to TPDES Permit No. WQ0011041002. The City of Kyle, ("the Applicant") has applied for a major amendment to TPDES Permit No. WQ0011041002. With the major amendment, the Applicant seeks to discharge 12,00,000 gallons per day into Plum Creek in Segment 1810 of the Guadalupe River Basin. Plum Creek itself has long been a valued resource for those living in its watershed and is home to a diverse array of mammals and birds. However, this beloved resource is at risk from the increased pressures posed by rapid development and the associated water pollution. As detailed in the comments below, allowing the proposed amendments to TPDES Permit No. WQ0011041002 ("the Draft Permit") will cause continued degradation of Plum Creek and further imperil this treasured watershed because of the high levels of nutrient pollution, large volume of water, and high levels of E. coli allowed in the Draft Permit. Plum Creek then drains into the San Marcos River, another beloved natural resource that is used for recreation and that is home to many wildlife species. Like Plum Creek, the San Marcos River is under pressure from development and other sources of pollution.

1. The Draft Permit Must Contain More Stringent Limitations on Nutrients. Without more stringent limits on nutrients, the Draft Permit will violate the Tier 1 and Tier 2 antidegradation rules, violate the Texas Surface Water Quality Standards, harm wildlife, and harm human health and recreation. Total phosphorus and nitrate nitrogen are already parameters of concern for Plum Creek, and there are concerns that the microbenthic community are already impaired. THE PLUM CREEK WATERSHED PARTNERSHIP, 2022 UPDATE TO THE PLUM CREEK WATERSHED PROTECTION PLAN (2022). Further degradation cannot be allowed, and the Draft Permit, if issued, should set limits on CBOD/TSS/Ammonia Nitrogen/Total Phosphorus of at least 5-5-2-0.5 for all phases of the discharge. 1 1 5-5-2-0.5 is a shorthand referenced for effluent parameters of 5 mg/L CBOD, 5 mg/L TSS, 2 mg/L Ammonia Nitrogen, and 0.5 mg/L Total Phosphorus.
- 2 The harms of phosphorus enrichment in aquatic ecosystems are well documented and include impacts such as increased algal growth, proliferation of cyanotoxins, and increased murkiness in water. U.S. ENVIRONMENTAL PROTECTION AGENCY, A COMPILATION OF COST DATA ASSOCIATED WITH THE IMPACTS AND CONTROL OF NUTRIENT POLLUTION (2015).
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Laurie Gharis
Chief Clerk
Texas Commission on Environmental Quality
P.O. Box 13087 – MC 105
Austin, Texas 787011 – 3087

October 21, 2022

Via: Online Submission Form

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Sincerely,

Virginia Parker
Executive Director
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P.O. Box 1393
San Marcos, Texas 78667
Tel.: 512-353-4628
virginia@sanmarcosriver.org

Victoria Rose
Staff Attorney
Save Our Springs Alliance
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Bldg. D, Suite 401
Austin, Texas 78745
Tel.: 512-477-2320, ext. 6
Fax: 512-477-6410
victoria@sosalliance.org

Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, October 21, 2022 3:08 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-OPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: Comments on City of Kyle WWTP Renewal.docx

From: virginia@sanmarcosriver.org <virginia@sanmarcosriver.org>
Sent: Friday, October 21, 2022 3:06 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTITY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER: 2017-1734-MWD-E

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: Virginia Parker

EMAIL: virginia@sanmarcosriver.org

COMPANY: San Marcos River Foundation

ADDRESS: PO BOX 1393
SAN MARCOS TX 78667-1393

PHONE: 2108604575

FAX:

COMMENTS: Laurie Gharis October 21, 2022 Chief Clerk Texas Commission on Environmental Quality P.O. Box 13087 – MC 105 Austin, Texas 787011 – 3087 Via: Online Submission Form RE: Application and Draft Permit of City of Kyle, for a Proposed Amendment to TPDES Permit No. WQ0011041002 Dear Ms. Gharis: These comments are submitted on behalf of the San Marcos River Foundation, regarding the Application and Draft Permit of the City of Kyle., for a proposed major

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Virginia Parker
Executive Director
San Marcos River Foundation
P.O. Box 1393
San Marcos, Texas 78667
Tel.: 512-353-4628
virginia@sanmarcosriver.org

Victoria Rose
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Save Our Springs Alliance
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victoria@sosalliance.org

Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, October 21, 2022 3:07 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-OPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: Comments on City of Kyle WWTP Renewal.docx

From: virginia@sanmarcosriver.org <virginia@sanmarcosriver.org>
Sent: Friday, October 21, 2022 3:04 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER:

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: Virginia Parker

EMAIL: virginia@sanmarcosriver.org

COMPANY: san marcos river foundation

ADDRESS: PO BOX 1393
SAN MARCOS TX 78667-1393

PHONE: 2108604575

FAX:

COMMENTS: Laurie Gharis October 21, 2022 Chief Clerk Texas Commission on Environmental Quality P.O. Box 13087 – MC 105 Austin, Texas 787011 – 3087 Via: Online Submission Form RE: Application and Draft Permit of City of Kyle, for a Proposed Amendment to TPDES Permit No. WQ0011041002 Dear Ms. Gharis: These comments are submitted on behalf of the San Marcos River Foundation, regarding the Application and Draft Permit of the City of Kyle., for a proposed major

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- 2 U.S. Environmental Protection Agency, Indicators: Phosphorus, <https://www.epa.gov/national-aquatic-resource-surveys/indicators-phosphorus>; USGS, Phosphorus and Water, <https://www.usgs.gov/special-topics/water-science-school/science/phosphorus-and-water>.
- 3 Bioassessment of Four Hill Country Streams Threatened by Proposed Municipal Wastewater Discharges; PowerPoint Presentation on Nutrient Pollution in the Blanco River: https://wimberleywatershed.org/wp-content/uploads/2020/08/KingRS_BlancoCityCouncil_Public_Comment_Aug_2020.pdf; Presentation on Nutrient Pollution: <https://www.youtube.com/watch?v=abxeLoBTaLA>.

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Laurie Gharis
Chief Clerk
Texas Commission on Environmental Quality
P.O. Box 13087 – MC 105
Austin, Texas 787011 – 3087

October 21, 2022

Via: Online Submission Form

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Ellie Guerra

From: PUBCOMMENT-OCC
Sent: Friday, October 21, 2022 3:06 PM
To: PUBCOMMENT-WQ; PUBCOMMENT-ELD; PUBCOMMENT-OCC2; PUBCOMMENT-OPIC
Subject: FW: Public comment on Permit Number WQ0011041002
Attachments: Comments on City of Kyle WWTP Renewal.docx

From: virginia@sanmarcosriver.org <virginia@sanmarcosriver.org>
Sent: Friday, October 21, 2022 3:02 PM
To: PUBCOMMENT-OCC <PUBCOMMENT-OCC@tceq.texas.gov>
Subject: Public comment on Permit Number WQ0011041002

REGULATED ENTITY NAME CITY OF KYLE WWTP

RN NUMBER: RN102182680

PERMIT NUMBER: WQ0011041002

DOCKET NUMBER: 2022-0891-MLM-E

COUNTY: HAYS

PRINCIPAL NAME: CITY OF KYLE

CN NUMBER: CN600334510

FROM

NAME: MS Virginia Parker

EMAIL: virginia@sanmarcosriver.org

COMPANY: San Marcos River Foundation

ADDRESS: PO BOX 1393
SAN MARCOS TX 78667-1393

PHONE: 2108604575

FAX:

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Without more stringent limits on nutrients, the Draft Permit will violate the Tier 1 and Tier 2 antidegradation rules, violate the Texas Surface Water Quality Standards, harm wildlife, and harm human health and recreation. Total phosphorus and nitrate nitrogen are already parameters of concern for Plum Creek, and there are concerns that the microbenthic community are already impaired. THE PLUM CREEK WATERSHED PARTNERSHIP, 2022 UPDATE TO THE PLUM CREEK WATERSHED PROTECTION PLAN (2022). Further degradation cannot be allowed, and the Draft Permit, if issued, should set limits on CBOD/TSS/Ammonia Nitrogen/Total Phosphorus of at least 5-5-2-0.5 for all phases of the discharge.¹

¹ 5-5-2-0.5 is a shorthand referenced for effluent parameters of 5 mg/L CBOD, 5 mg/L TSS, 2 mg/L Ammonia Nitrogen, and 0.5 mg/L Total Phosphorus.

The harms of phosphorus enrichment in aquatic ecosystems are well documented and include impacts such as increased algal growth, proliferation of cyanotoxins, and increased murkiness in water. U.S. ENVIRONMENTAL PROTECTION AGENCY, A COMPILATION OF COST DATA ASSOCIATED WITH THE IMPACTS AND CONTROL OF NUTRIENT POLLUTION (2015).² And rigorous scientific studies of Texas Hill Country streams, streams like the receiving waters for low in order to avoid nuisance algae growth, violation of antidegradation standards, and impairment of current uses.³ Plum Creek already has concerning high concentrations of total phosphorus due to wastewater discharges and other sources of urban pollution. The high levels of total phosphorus currently in the Draft Permit must be reduced to avoid the negative consequences of phosphorus enrichment in Plum Creek.

Plum Creek is also at risk for violating regulations in relation to nitrogen and nitrate concentrations. The Draft Permit must include a limit on total nitrogen or nitrate nitrogen and a lower limit on ammonia nitrate in order to avoid impairing current uses, violating antidegradation standards, and harming wildlife and human health. Wildlife and humans are at risk under the current Draft Permit nitrogen related limitations as wildlife are at risk from the impacts linked with excessive nitrate consumption, Isaza et al., *Living in Polluted Waters: A Meta-Analysis of the Effects of Nitrate and Interactions with Other Environmental Stressors on Freshwater Taxa*, 261 ENVIRONMENTAL POLLUTION 1 (2020), and humans are at risk for nitrate poisoning as well.

2. The Draft Permit Must Have More Stringent Limits on *E. Coli*.

In addition to reducing the amount of nutrient pollution allowed in the Draft Permit, the Applicant and TCEQ should reduce the amount of *E. coli* colony forming units permitted by the Draft Permit. The Draft Permit currently allows 126 CFU, which is part of the limit under Texas Surface Water Quality Standards for contact recreation uses. However, Plum Creek is already close to exceeding these limits. THE PLUM CREEK WATERSHED PARTNERSHIP, PLUM CREEK WATERSHED PROTECTION PLAN (2008). While the *E. coli* issue in Plum Creek has improved since the beginning of the Plum Creek Watershed Protection Plan, Plum Creek is still at risk of no longer supporting its designated uses for this parameter. TCEQ and the Applicant should take every opportunity to avoid such a violation rather than setting the *E. coli* limit at the line between supporting and not supporting a designated use in an area that is already under pressure from other sources of *E. coli* pollution. Permitting the discharge of wastewater effluent containing such high levels of *E. coli* places Plum Creek at high risk of not supporting its designated use of contact recreation in violation of the Tier 1 antidegradation standard.

² U.S. Environmental Protection Agency, *Indicators: Phosphorus*, <https://www.epa.gov/national-aquatic-resource-surveys/indicators-phosphorus>; USGS, *Phosphorus and Water*, <https://www.usgs.gov/special-topics/water-science-school/science/phosphorus-and-water>.

³ Bioassessment of Four Hill Country Streams Threatened by Proposed Municipal Wastewater Discharges; PowerPoint Presentation on Nutrient Pollution in the Blanco River: https://wimberleywatershed.org/wp-content/uploads/2020/08/KingRS_BlancoCityCouncil_Public_Comment_Aug_2020.pdf; Presentation on Nutrient Pollution: <https://www.youtube.com/watch?v=abxeLoBTaLA>.

3. The Applicant has not Shown a Need for the Requested Volume.

The Applicant failed to supply sufficient justification for requesting to more than double its ability to discharge wastewater from 4,500,000 gallons per day to 12,000,000 gallons per day. The Applicant's justification is speculative and does not rationalize such a large increase in discharge capacity. In fact, the Applicant admits that it is not currently using the full 4,500,000 gallons per day capacity that it currently has, and the Applicant is not projected to exceed this amount until much later this decade.

The large increase in wastewater discharge could also lead to scouring of the Plum Creek bed, churning up sediment while impairing uses and harming wildlife. The Applicant cannot justify a need for the large increase in discharge capacity, and its request must be denied.

4. TCEQ Should Reject the Amendment Based on the Applicant's Compliance History.

From January 2017 to June 2020, the City of Kyle reported 833 days of exceedances under its current TPDES wastewater discharge permit. SBCA, PRISTINE TO POLLUTED SEWAGE PROBLEMS & SOLUTIONS IN THE TEXAS HILL COUNTRY (2020). With such a history of polluting Plum Creek and unsatisfactory compliance history, TCEQ must exercise its authority under 30 T.A.C. § 60.3 to deny the amendment. If the Applicant cannot properly operate a wastewater treatment plant discharging 4,500,000 gallons per day, it is not reasonable to think that the Applicant can properly operate a wastewater treatment plant discharging 12,000,000 gallons per day.

5. The Draft Permit, if Issued Should Include Provisions That Require Reuse of Effluent.

Setting more stringent treatment standards would support the inclusion of a re-use provision in the Draft Permit. The higher quality treated wastewater can be sold for irrigation or industry, making it a valuable commodity for the City of Kyle. For example, treated wastewater can also be reused in landscape irrigation, gray water systems, and cooling towers, and presents a much better option than groundwater.

There are many other uses for good quality treated wastewater, uses better than increasing pollutant loads in Plum Creek. With water prices skyrocketing and demand for water rising steeply, including a reuse provision in the Draft Permit would be a win-win to meet the growing demand for treated wastewater and lessen the impacts of wastewater pollution in Plum Creek and the Guadalupe and San Marcos River basins. Having good quality wastewater, a small lake for storing some of it, and a re-use provision in the Draft Permit, if issued, will make treated wastewater a valuable commodity for the City of Kyle, while also helping to protect those downstream of the wastewater treatment plant.

For the above reasons, the San Marcos River Foundation opposes the proposed major amendments to TPDES Permit No. WQ0011041002 and asks that the application be denied. Thank you for considering our comments and allowing us to express our concerns about the Draft Permit.

Sincerely,

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TCEQ Public Meeting Form
March 30, 2023

(4)

City of Kyle
TPDES Permit for Municipal Wastewater
Permit No. WQ0011041002

PLEASE PRINT

Name: Virginia Parker

Mailing Address: P.O. Box 1393, San Marcos TX 78667

Physical Address (if different): 1061 Martindale ~~St~~ Falls Rd,
Martindale TX 78655

City/State: _____ Zip: _____

****This information is subject to public disclosure under the Texas Public Information Act****

Email: Virginia@Sanmarcosriver.org

Phone Number: 210 860 4575

- Are you here today representing a municipality, legislator, agency, or group? ☒ Yes ☐ No
If yes, which one? San Marcos River Foundation



Please add me to the mailing list.



I wish to provide formal **ORAL COMMENTS** at tonight's public meeting.



I wish to provide formal **WRITTEN COMMENTS** at tonight's public meeting.

(Written comments may be submitted at any time during the meeting)
Please give this form to the person at the information table. Thank you.