Texas Commission on Environmental Quality

Edwards Aquifer Application Cover Page

Our Review of Your Application

The Edwards Aquifer Program staff conducts an administrative and technical review of all applications. The turnaround time for administrative review can be up to 30 days as outlined in 30 TAC 213.4(e). Generally administrative completeness is determined during the intake meeting or within a few days of receipt. The turnaround time for technical review of an administratively complete Edwards Aquifer application is 90 days as outlined in 30 TAC 213.4(e). Please know that the review and approval time is directly impacted by the quality and completeness of the initial application that is received. In order to conduct a timely review, it is imperative that the information provided in an Edwards Aquifer application include final plans, be accurate, complete, and in compliance with 30 TAC 213.

Administrative Review

1. Edwards Aquifer applications must be deemed administratively complete before a technical review can begin. To be considered administratively complete, the application must contain completed forms and attachments, provide the requested information, and meet all the site plan requirements. The submitted application and plan sheets should be final plans. Please submit one full-size set of plan sheets with the original application, and half-size sets with the additional copies.

   To ensure that all applicable documents are included in the application, the program has developed tools to guide you and web pages to provide all forms, checklists, and guidance. Please visit the below website for assistance: http://www.tceq.texas.gov/field/eapp.

2. This Edwards Aquifer Application Cover Page form (certified by the applicant or agent) must be included in the application and brought to the administrative review meeting.

3. Administrative reviews are scheduled with program staff who will conduct the review. Applicants or their authorized agent should call the appropriate regional office, according to the county in which the project is located, to schedule a review. The average meeting time is one hour.

4. In the meeting, the application is examined for administrative completeness. Deficiencies will be noted by staff and emailed or faxed to the applicant and authorized agent at the end of the meeting, or shortly after. Administrative deficiencies will cause the application to be deemed incomplete and returned.

   An appointment should be made to resubmit the application. The application is re-examined to ensure all deficiencies are resolved. The application will only be deemed administratively complete when all administrative deficiencies are addressed.

5. If an application is received by mail, courier service, or otherwise submitted without a review meeting, the administrative review will be conducted within 30 days. The applicant and agent will be contacted with the results of the administrative review. If the application is found to be administratively incomplete, it can be retrieved from the regional office or returned by regular mail. If returned by mail, the regional office may require arrangements for return shipping.

6. If the geologic assessment was completed before October 1, 2004 and the site contains "possibly sensitive" features, the assessment must be updated in accordance with the *Instructions to Geologists* (TCEQ-0585 Instructions).

Technical Review

1. When an application is deemed administratively complete, the technical review period begins. The regional office will distribute copies of the application to the identified affected city, county, and groundwater conservation district whose jurisdiction includes the subject site. These entities and the public have 30 days to provide comments on the application to the regional office. All comments received are reviewed by TCEQ.

2. A site assessment is usually conducted as part of the technical review, to evaluate the geologic assessment and observe existing site conditions. The site must be accessible to our staff. The site boundaries should be

clearly marked, features identified in the geologic assessment should be flagged, roadways marked and the alignment of the Sewage Collection System and manholes should be staked at the time the application is submitted. If the site is not marked the application may be returned.

3. We evaluate the application for technical completeness and contact the applicant and agent via Notice of Deficiency (NOD) to request additional information and identify technical deficiencies. There are two deficiency response periods available to the applicant. There are 14 days to resolve deficiencies noted in the first NOD. If a second NOD is issued, there is an additional 14 days to resolve deficiencies. If the response to the second notice is not received, is incomplete or inadequate, or provides new information that is incomplete or inadequate, the application must be withdrawn or will be denied. Please note that because the technical review is underway, whether the application is withdrawn or denied **the application fee will be forfeited**.

4. The program has 90 calendar days to complete the technical review of the application. If the application is technically adequate, such that it complies with the Edwards Aquifer rules, and is protective of the Edwards Aquifer during and after construction, an approval letter will be issued. Construction or other regulated activity may not begin until an approval is issued.

Mid-Review Modifications

It is important to have final site plans prior to beginning the permitting process with TCEQ to avoid delays.

Occasionally, circumstances arise where you may have significant design and/or site plan changes after your Edwards Aquifer application has been deemed administratively complete by TCEQ. This is considered a "Mid-Review Modification". Mid-Review Modifications may require redistribution of an application that includes the proposed modifications for public comment.

If you are proposing a Mid-Review Modification, two options are available:

- If the technical review has begun your application can be denied/withdrawn, your fees will be forfeited, and the plan will have to be resubmitted.
- TCEQ can continue the technical review of the application as it was submitted, and a modification application can be submitted at a later time.

If the application is denied/withdrawn, the resubmitted application will be subject to the administrative and technical review processes and will be treated as a new application. The application will be redistributed to the affected jurisdictions.

Please contact the regional office if you have questions. If your project is located in Williamson, Travis, or Hays County, contact TCEQ's Austin Regional Office at 512-339-2929. If your project is in Comal, Bexar, Medina, Uvalde, or Kinney County, contact TCEQ's San Antonio Regional Office at 210-490-3096

Please fill out all required fields below and submit with your application.

1. Regulated Entity : Hilltop RV Park LLC						**2. Regulated Entity No.: N/A**			
3. Customer Name: Donald Burkhardt						**4. Customer No.: N/A**			
5. Project Type: **(Please circle/check one)**	New		Modification			Extension		Exception	
6. Plan Type: **(Please circle/check one)**	WPAP	CZP	SCS	UST	AST	EXP	EXT	Technical Clarification	Optional Enhanced Measures
7. Land Use: **(Please circle/check one)**	Residential		Non-residential			**8. Site (acres):**		20.79	
9. Application Fee:	$6,500		**10. Permanent BMP(s):**			Engineered Vegetative Filter Strips			
11. SCS (Linear Ft.):	N/A		**12. AST/UST (No. Tanks):**			N/A			
13. County:	Comal		**14. Watershed:**			Tom Creek-Canyon Lake			

Application Distribution

Instructions: Use the table below to determine the number of applications required. One original and one copy of the application, plus additional copies (as needed) for each affected incorporated city, county, and groundwater conservation district are required. Linear projects or large projects, which cross into multiple jurisdictions, can require additional copies. Refer to the "Texas Groundwater Conservation Districts within the EAPP Boundaries" map found at:

http://www.tceq.texas.gov/assets/public/compliance/field_ops/eapp/EAPP%20GWCD%20map.pdf

For more detailed boundaries, please contact the conservation district directly.

Austin Region			
County:	**Hays**	**Travis**	**Williamson**
Original (1 req.)	___	___	___
Region (1 req.)	___	___	___
County(ies)	___	___	___
Groundwater Conservation District(s)	___Edwards Aquifer Authority ___Barton Springs/ Edwards Aquifer ___Hays Trinity ___Plum Creek	___Barton Springs/ Edwards Aquifer	NA
City(ies) Jurisdiction	___Austin ___Buda ___Dripping Springs ___Kyle ___Mountain City ___San Marcos ___Wimberley ___Woodcreek	___Austin ___Bee Cave ___Pflugerville ___Rollingwood ___Round Rock ___Sunset Valley ___West Lake Hills	___Austin ___Cedar Park ___Florence ___Georgetown ___Jerrell ___Leander ___Liberty Hill ___Pflugerville ___Round Rock

San Antonio Region					
County:	**Bexar**	**Comal**	**Kinney**	**Medina**	**Uvalde**
Original (1 req.)	___	X	___	___	___
Region (1 req.)	___	X	___	___	___
County(ies)	___	X	___	___	___
Groundwater Conservation District(s)	___ Edwards Aquifer Authority ___Trinity-Glen Rose	X Edwards Aquifer Authority	___Kinney	___EAA ___Medina	___EAA ___Uvalde
City(ies) Jurisdiction	___Castle Hills ___Fair Oaks Ranch ___Helotes ___Hill Country Village ___Hollywood Park ___San Antonio (SAWS) ___Shavano Park	___Bulverde ___Fair Oaks Ranch ___Garden Ridge ___New Braunfels ___Schertz	NA	___San Antonio ETJ (SAWS)	NA

I certify that to the best of my knowledge, that the application is complete and accurate. This application is hereby submitted to TCEQ for administrative review and technical review. Trevor Tast, P.E.
Print Name of Customer/Authorized Agent
Signature of Customer/Authorized Agent 2023-04-26 Date

FOR TCEQ INTERNAL USE ONLY				
Date(s)Reviewed:		Date Administratively Complete:		
Received From:		Correct Number of Copies:		
Received By:		Distribution Date:		
EAPP File Number:		Complex:		
Admin. Review(s) (No.):		No. AR Rounds:		
Delinquent Fees (Y/N):		Review Time Spent:		
Lat./Long. Verified:		SOS Customer Verification:		
Agent Authorization Complete/Notarized (Y/N):		Fee Check:	Payable to TCEQ (Y/N):	
Core Data Form Complete (Y/N):			Signed (Y/N):	
Core Data Form Incomplete Nos.:			Less than 90 days old (Y/N):	

Contributing Zone Plan Application

Texas Commission on Environmental Quality

for Regulated Activities on the Contributing Zone to the Edwards Aquifer and Relating to 30 TAC §213.24(1), Effective June 1, 1999

To ensure that the application is administratively complete, confirm that all fields in the form are complete, verify that all requested information is provided, consistently reference the same site and contact person in all forms in the application, and ensure forms are signed by the appropriate party.

Note: Including all the information requested in the form and attachments contributes to more streamlined technical reviews.

Signature

To the best of my knowledge, the responses to this form accurately reflect all information requested concerning the proposed regulated activities and methods to protect the Edwards Aquifer. This **Contributing Zone Plan Application** is hereby submitted for TCEQ review and Executive Director approval. The application was prepared by:

Print Name of Customer/Agent: Trevor Tast, P.E.

Date: 2023-04-26

Signature of Customer/Agent:

Regulated Entity Name: Hilltop RV LLC

Project Information

1. County: Comal
2. Stream Basin: Tom Creek-Canyon Lake
3. Groundwater Conservation District (if applicable): Comal Trinity GCD
4. Customer (Applicant):

   Contact Person: Donald Burkhardt
   Entity: Hilltop RV LLC
   Mailing Address: 15794 Cranes Mill Road
   City, State: Canyon Lake, TX Zip: 78133
   Telephone: 713-724-6339 Fax: N/A
   Email Address: CURRANPAT380@GMAIL.COM

5. Agent/Representative (If any):

Contact Person: Trevor Tast, P.E.
Entity: TX2 Engineering
Mailing Address: 645 Floral Ave. Suite C
City, State: New Braunfels, TX Zip: 78130
Telephone: 816-510-9151 Fax: _____
Email Address: trevor@tx2engineering.com

6. Project Location:

☐ The project site is located inside the city limits of _____.
☐ The project site is located outside the city limits but inside the ETJ (extra-territorial jurisdiction) of _____.
☒ The project site is not located within any city's limits or ETJ.

7. ☒ The location of the project site is described below. Sufficient detail and clarity has been provided so that the TCEQ's Regional staff can easily locate the project and site boundaries for a field investigation.

From TCEQ San Antonio Regional office (145250 Judson Road San Antonio, TX 78233):
Take Nacogdoches Rd North approximately 6 miles to FM3009
Turn North on FM3009 for approximately 12.1 miles to TX-46
Turn West on TX-46 for approximately 2.8 miles to FM311
Turn North on FM311 for approximately 1.0 mile to FM3159
Turn East on FM3159 for approximately 4.8 miles to Startz Rd
Turn left on Startz Rd for approximately 0.4 mile to FM2673
Turn West on FM2673 for approximately 0.2 mile to the property entrance on the South side of the road.

8. ☒ **Attachment A - Road Map**. A road map showing directions to and the location of the project site is attached. The map clearly shows the boundary of the project site.

9. ☒ **Attachment B - USGS Quadrangle Map**. A copy of the official 7 ½ minute USGS Quadrangle Map (Scale: 1" = 2000') is attached. The map(s) clearly show:

☒ Project site boundaries.
☒ USGS Quadrangle Name(s).

10. ☒ **Attachment C - Project Narrative**. A detailed narrative description of the proposed project is attached. The project description is consistent throughout the application and contains, at a minimum, the following details:

☒ Area of the site
☒ Offsite areas
☒ Impervious cover
☒ Permanent BMP(s)
☒ Proposed site use

☒ Site history
☒ Previous development
☒ Area(s) to be demolished

11. Existing project site conditions are noted below:

☐ Existing commercial site
☐ Existing industrial site
☐ Existing residential site
☐ Existing paved and/or unpaved roads
☐ Undeveloped (Cleared)
☒ Undeveloped (Undisturbed/Not cleared)
☐ Other: _____

12. The type of project is:

☐ Residential: # of Lots: _____
☒ Residential: # of Living Unit Equivalents: 78
☐ Commercial
☐ Industrial
☐ Other: _____

13. Total project area (size of site): 20.79 Acres

Total disturbed area: 10.38 Acres

14. Estimated projected population: 156

15. The amount and type of impervious cover expected after construction is complete is shown below:

Table 1 - Impervious Cover

Impervious Cover of Proposed Project	***Sq. Ft.***	***Sq. Ft./Acre***	***Acres***
Structures/Rooftops	2,500	÷ 43,560 =	0.06
Parking	53,692	÷ 43,560 =	1.23
Other paved surfaces	72,258	÷ 43,560 =	1.66
Total Impervious Cover	128,450	÷ 43,560 =	2.95

Total Impervious Cover 2.95 **÷ Total Acreage** 20.79 **X 100 =** 14.19% **Impervious Cover**

16. ☒ **Attachment D - Factors Affecting Surface Water Quality**. A detailed description of all factors that could affect surface water quality is attached. If applicable, this includes the

location and description of any discharge associated with industrial activity other than construction.

17. ☒ Only inert materials as defined by 30 TAC 330.2 will be used as fill material.

For Road Projects Only

Complete questions 18 - 23 if this application is exclusively for a road project.

☒ N/A

18. Type of project:

☐ TXDOT road project.
☐ County road or roads built to county specifications.
☐ City thoroughfare or roads to be dedicated to a municipality.
☐ Street or road providing access to private driveways.

19. Type of pavement or road surface to be used:

☐ Concrete
☐ Asphaltic concrete pavement
☐ Other: _____

20. Right of Way (R.O.W.):

Length of R.O.W.: _____ feet.
Width of R.O.W.: _____ feet.
L x W = _____Ft^2 ÷ 43,560 Ft^2/Acre = _____ acres.

21. Pavement Area:

Length of pavement area: _____ feet.
Width of pavement area: _____ feet.
L x W = _____Ft^2 ÷ 43,560 Ft^2/Acre = _____ acres.
Pavement area _____ acres ÷ R.O.W. area _____ acres x 100 = _____% impervious cover.

22. ☐ A rest stop will be included in this project.

☐ A rest stop will not be included in this project.

23. ☐ Maintenance and repair of existing roadways that do not require approval from the TCEQ Executive Director. Modifications to existing roadways such as widening roads/adding shoulders totaling more than one-half (1/2) the width of one (1) existing lane require prior approval from the TCEQ.

Stormwater to be generated by the Proposed Project

24. ☒ **Attachment E - Volume and Character of Stormwater**. A detailed description of the volume (quantity) and character (quality) of the stormwater runoff which is expected to occur from the proposed project is attached. The estimates of stormwater runoff

quality and quantity are based on area and type of impervious cover. Include the runoff coefficient of the site for both pre-construction and post-construction conditions.

Wastewater to be generated by the Proposed Project

25. ☐ Wastewater is to be discharged in the contributing zone. Requirements under 30 TAC §213.6(c) relating to Wastewater Treatment and Disposal Systems have been satisfied.

☒ N/A

26. Wastewater will be disposed of by:

☒ On-Site Sewage Facility (OSSF/Septic Tank):

☒ **Attachment F - Suitability Letter from Authorized Agent**. An on-site sewage facility will be used to treat and dispose of the wastewater from this site. The appropriate licensing authority's (authorized agent) written approval is attached. It states that the land is suitable for the use of private sewage facilities and will meet or exceed the requirements for on-site sewage facilities as specified under 30 TAC Chapter 285 relating to On-site Sewage Facilities.

☒ Each lot in this project/development is at least one (1) acre (43,560 square feet) in size. The system will be designed by a licensed professional engineer or registered sanitarian and installed by a licensed installer in compliance with 30 TAC Chapter 285.

☐ Sewage Collection System (Sewer Lines):

The sewage collection system will convey the wastewater to the _____ (name) Treatment Plant. The treatment facility is:

☐ Existing.
☐ Proposed.

☐ N/A

Permanent Aboveground Storage Tanks(ASTs) ≥ 500 Gallons

Complete questions 27 - 33 if this project includes the installation of AST(s) with volume(s) greater than or equal to 500 gallons.

☒N/A

27. Tanks and substance stored:

Table 2 - Tanks and Substance Storage

AST Number	*Size (Gallons)*	*Substance to be Stored*	*Tank Material*
1			

AST Number	*Size (Gallons)*	*Substance to be Stored*	*Tank Material*
2			
3			
4			
5			

Total x 1.5 = _____ Gallons

28. ☐ The AST will be placed within a containment structure that is sized to capture one and one-half (1 1/2) times the storage capacity of the system. For facilities with more than one tank system, the containment structure is sized to capture one and one-half (1 1/2) times the cumulative storage capacity of all systems.

    ☐ **Attachment G - Alternative Secondary Containment Methods**. Alternative methods for providing secondary containment are proposed. Specifications showing equivalent protection for the Edwards Aquifer are attached.

29. Inside dimensions and capacity of containment structure(s):

Table 3 - Secondary Containment

Length (L)(Ft.)	*Width(W)(Ft.)*	*Height (H)(Ft.)*	*L x W x H = (Ft3)*	*Gallons*

Total: _____ Gallons

30. Piping:

    ☐ All piping, hoses, and dispensers will be located inside the containment structure.
    ☐ Some of the piping to dispensers or equipment will extend outside the containment structure.
    ☐ The piping will be aboveground
    ☐ The piping will be underground

31. ☐ The containment area must be constructed of and in a material impervious to the substance(s) being stored. The proposed containment structure will be constructed of: _____.

32. ☐ **Attachment H - AST Containment Structure Drawings**. A scaled drawing of the containment structure is attached that shows the following:

    ☐ Interior dimensions (length, width, depth and wall and floor thickness).

☐ Internal drainage to a point convenient for the collection of any spillage.
☐ Tanks clearly labeled
☐ Piping clearly labeled
☐ Dispenser clearly labeled

33. ☐ Any spills must be directed to a point convenient for collection and recovery. Spills from storage tank facilities must be removed from the controlled drainage area for disposal within 24 hours of the spill.

    ☐ In the event of a spill, any spillage will be removed from the containment structure within 24 hours of the spill and disposed of properly.
    ☐ In the event of a spill, any spillage will be drained from the containment structure through a drain and valve within 24 hours of the spill and disposed of properly. The drain and valve system are shown in detail on the scaled drawing.

Site Plan Requirements

Items 34 - 46 must be included on the Site Plan.

34. ☒ The Site Plan must have a minimum scale of 1" = 400'.

    Site Plan Scale: 1" = 100'.

35. 100-year floodplain boundaries:

    ☐ Some part(s) of the project site is located within the 100-year floodplain. The floodplain is shown and labeled.
    ☒ No part of the project site is located within the 100-year floodplain.
    The 100-year floodplain boundaries are based on the following specific (including date of material) sources(s): 48091C0235F effective September 2, 2009.

36. ☒ The layout of the development is shown with existing and finished contours at appropriate, but not greater than ten-foot contour intervals. Lots, recreation centers, buildings, roads, etc. are shown on the site plan.

    ☒ The layout of the development is shown with existing contours at appropriate, but not greater than ten-foot contour intervals. Finished topographic contours will not differ from the existing topographic configuration and are not shown. Lots, recreation centers, buildings, roads, etc. are shown on the site plan.

37. ☒ A drainage plan showing all paths of drainage from the site to surface streams.

38. ☒ The drainage patterns and approximate slopes anticipated after major grading activities.

39. ☒ Areas of soil disturbance and areas which will not be disturbed.

40. ☒ Locations of major structural and nonstructural controls. These are the temporary and permanent best management practices.

41. ☒ Locations where soil stabilization practices are expected to occur.

42. ☒ Surface waters (including wetlands).

☐ N/A

43. ☐ Locations where stormwater discharges to surface water.

☒ There will be no discharges to surface water.

44. ☐ Temporary aboveground storage tank facilities.

☒ Temporary aboveground storage tank facilities will not be located on this site.

45. ☐ Permanent aboveground storage tank facilities.

☒ Permanent aboveground storage tank facilities will not be located on this site.

46. ☒ Legal boundaries of the site are shown.

Permanent Best Management Practices (BMPs)

Practices and measures that will be used during and after construction is completed.

47. ☒ Permanent BMPs and measures must be implemented to control the discharge of pollution from regulated activities after the completion of construction.

☐ N/A

48. ☒ These practices and measures have been designed, and will be constructed, operated, and maintained to insure that 80% of the incremental increase in the annual mass loading of total suspended solids (TSS) from the site caused by the regulated activity is removed. These quantities have been calculated in accordance with technical guidance prepared or accepted by the executive director.

☒ The TCEQ Technical Guidance Manual (TGM) was used to design permanent BMPs and measures for this site.

☐ A technical guidance other than the TCEQ TGM was used to design permanent BMPs and measures for this site. The complete citation for the technical guidance that was used is: _____.

☐ N/A

49. ☒ Owners must insure that permanent BMPs and measures are constructed and function as designed. A Texas Licensed Professional Engineer must certify in writing that the permanent BMPs or measures were constructed as designed. The certification letter must be submitted to the appropriate regional office within 30 days of site completion.

☐ N/A

50. Where a site is used for low density single-family residential development and has 20 % or less impervious cover, other permanent BMPs are not required. This exemption from permanent BMPs must be recorded in the county deed records, with a notice that if the percent impervious cover increases above 20% or land use changes, the exemption for the

whole site as described in the property boundaries required by 30 TAC §213.4(g) (relating to Application Processing and Approval), may no longer apply and the property owner must notify the appropriate regional office of these changes.

- ☐ The site will be used for low density single-family residential development and has 20% or less impervious cover.
- ☐ The site will be used for low density single-family residential development but has more than 20% impervious cover.
- ☒ The site will not be used for low density single-family residential development.

51. The executive director may waive the requirement for other permanent BMPs for multi-family residential developments, schools, or small business sites where 20% or less impervious cover is used at the site. This exemption from permanent BMPs must be recorded in the county deed records, with a notice that if the percent impervious cover increases above 20% or land use changes, the exemption for the whole site as described in the property boundaries required by 30 TAC §213.4(g) (relating to Application Processing and Approval), may no longer apply and the property owner must notify the appropriate regional office of these changes.

- ☐ **Attachment I - 20% or Less Impervious Cover Waiver**. The site will be used for multi-family residential developments, schools, or small business sites and has 20% or less impervious cover. A request to waive the requirements for other permanent BMPs and measures is attached.
- ☒ The site will be used for multi-family residential developments, schools, or small business sites but has more than 20% impervious cover.
- ☐ The site will not be used for multi-family residential developments, schools, or small business sites.

52. ☒ **Attachment J - BMPs for Upgradient Stormwater**.

- ☒ A description of the BMPs and measures that will be used to prevent pollution of surface water, groundwater, or stormwater that originates upgradient from the site and flows across the site is attached.
- ☐ No surface water, groundwater or stormwater originates upgradient from the site and flows across the site, and an explanation is attached.
- ☐ Permanent BMPs or measures are not required to prevent pollution of surface water, groundwater, or stormwater that originates upgradient from the site and flows across the site, and an explanation is attached.

53. ☒ **Attachment K - BMPs for On-site Stormwater**.

- ☒ A description of the BMPs and measures that will be used to prevent pollution of surface water or groundwater that originates on-site or flows off the site, including pollution caused by contaminated stormwater runoff from the site is attached.
- ☐ Permanent BMPs or measures are not required to prevent pollution of surface water or groundwater that originates on-site or flows off the site, including pollution caused by contaminated stormwater runoff, and an explanation is attached.

54. ☒ **Attachment L - BMPs for Surface Streams**. A description of the BMPs and measures that prevent pollutants from entering surface streams is attached.

☐ N/A

55. ☒ **Attachment M - Construction Plans**. Construction plans and design calculations for the proposed permanent BMPs and measures have been prepared by or under the direct supervision of a Texas Licensed Professional Engineer, and are signed, sealed, and dated. Construction plans for the proposed permanent BMPs and measures are attached and include: Design calculations, TCEQ Construction Notes, all proposed structural plans and specifications, and appropriate details.

☐ N/A

56. ☒ **Attachment N - Inspection, Maintenance, Repair and Retrofit Plan**. A site and BMP specific plan for the inspection, maintenance, repair, and, if necessary, retrofit of the permanent BMPs and measures is attached. The plan fulfills all of the following:

☒ Prepared and certified by the engineer designing the permanent BMPs and measures
☒ Signed by the owner or responsible party
☒ Outlines specific procedures for documenting inspections, maintenance, repairs, and, if necessary, retrofit.
☒ Contains a discussion of record keeping procedures

☐ N/A

57. ☐ **Attachment O - Pilot-Scale Field Testing Plan**. Pilot studies for BMPs that are not recognized by the Executive Director require prior approval from the TCEQ. A plan for pilot-scale field testing is attached.

☒ N/A

58. ☒ **Attachment P - Measures for Minimizing Surface Stream Contamination**. A description of the measures that will be used to avoid or minimize surface stream contamination and changes in the way in which water enters a stream as a result of the construction and development is attached. The measures address increased stream flashing, the creation of stronger flows and in-stream velocities, and other in-stream effects caused by the regulated activity, which increase erosion that result in water quality degradation.

☐ N/A

Responsibility for Maintenance of Permanent BMPs and Measures after Construction is Complete.

59. ☒ The applicant is responsible for maintaining the permanent BMPs after construction until such time as the maintenance obligation is either assumed in writing by another entity having ownership or control of the property (such as without limitation, an

owner's association, a new property owner or lessee, a district, or municipality) or the ownership of the property is transferred to the entity. Such entity shall then be responsible for maintenance until another entity assumes such obligations in writing or ownership is transferred.

60. ☒ A copy of the transfer of responsibility must be filed with the executive director at the appropriate regional office within 30 days of the transfer if the site is for use as a multiple single-family residential development, a multi-family residential development, or a non-residential development such as commercial, industrial, institutional, schools, and other sites where regulated activities occur.

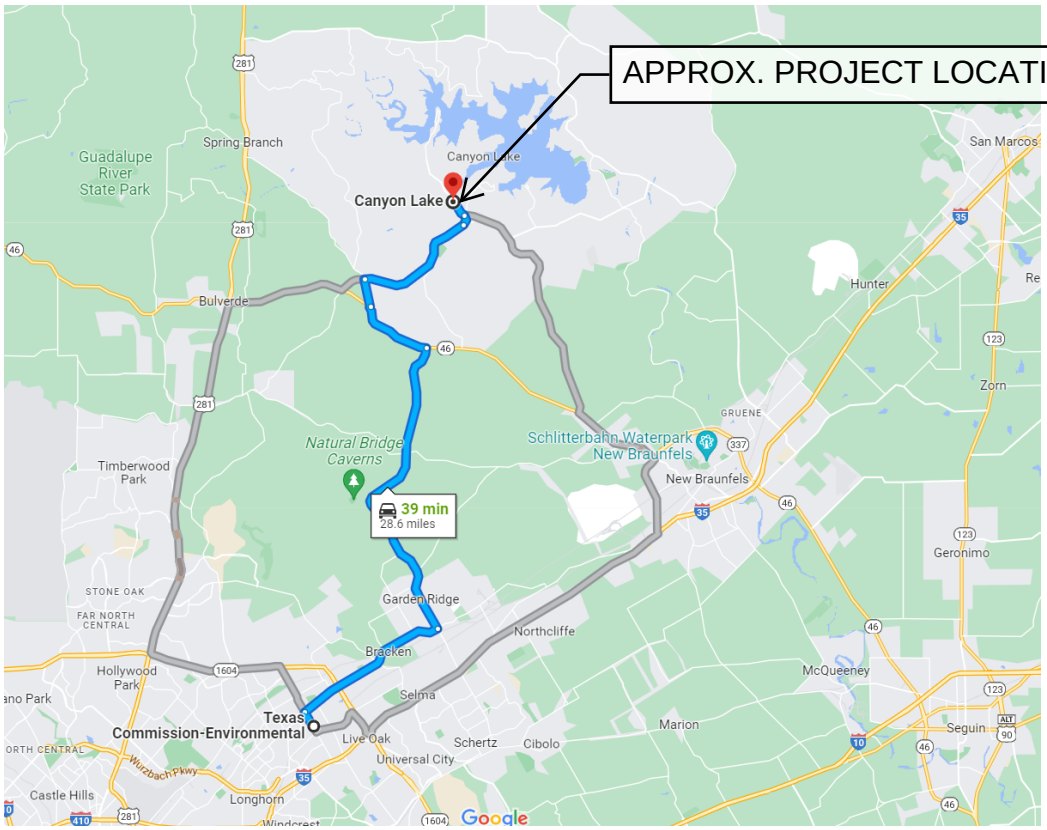
Administrative Information

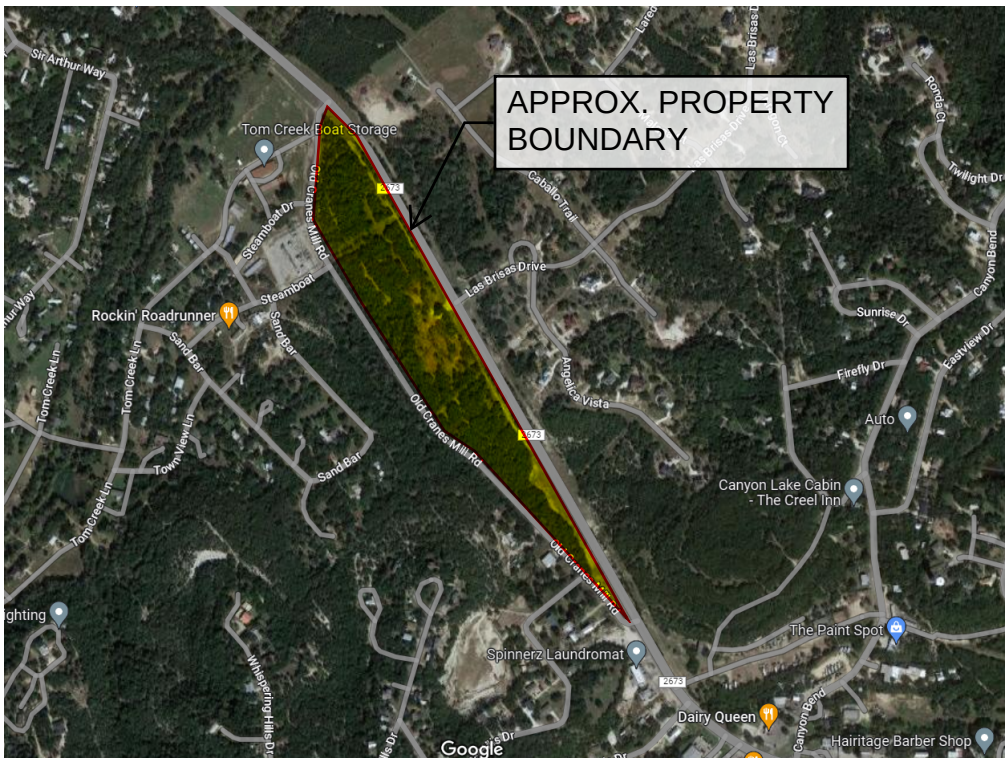
61. ☒ Submit one (1) original and one (1) copy of the application, plus additional copies as needed for each affected incorporated city, groundwater conservation district, and county in which the project will be located. The TCEQ will distribute the additional copies to these jurisdictions.

62. ☒ Any modification of this Contributing Zone Plan may require TCEQ review and Executive Director approval prior to construction, and may require submission of a revised application, with appropriate fees.

63. ☒ The site description, controls, maintenance, and inspection requirements for the storm water pollution prevention plan (SWPPP) developed under the EPA NPDES general permits for stormwater discharges have been submitted to fulfill paragraphs 30 TAC §213.24(1-5) of the technical report. All requirements of 30 TAC §213.24(1-5) have been met by the SWPPP document.

☒ The Temporary Stormwater Section (TCEQ-0602) is included with the application.





811 Know what's below. Call before you dig.

SHEET

ATTACHMENT A

VICINITY MAP

HILLTOP RV LLC

NOT TO SCALE

N

2023

TX2 ENGINEERING
FIRM #: 20787

CONTACT
1659 STATE HWY 46 WEST, STE 115-438
NEW BRAUNFELS, TX 78132

TEL: (816) 510-9151

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

SMITHSON VALLEY QUADRANGLE
TEXAS–COMAL CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)

APPROXIMATE PROJECT LOCATION

Edwards Aquifer Contributing Zone

Edwards Aquifer Recharge Zone

Produced by the United States Geological Survey
in cooperation with the Texas Water Development Board

Control by USGS and NOS/NOAA

Compiled from aerial photographs taken 1963. Revisions shown in purple compiled from aerial photographs taken 1986 and other sources and has been field checked. Map edited 1994 Conflicts may exist between some updated features and previously mapped contours

North American Datum of 1927 (NAD 27). Projection and 10000-foot ticks: Texas Coordinate System, south central zone (Lambert Conformal Conic)
Blue 1000-meter Universal Transverse Mercator ticks, zone 14

North American Datum of 1983 (NAD 83) is shown by dashed corner ticks. The values of the shift between NAD 27 and NAD 83 for 7.5-minute intersections are obtainable from National Geodetic Survey NADCON software

Fine red dashed lines indicate selected fence lines

UTM GRID AND 1994 MAGNETIC NORTH DECLINATION AT CENTER OF SHEET

SCALE 1:24 000

CONTOUR INTERVAL 20 FEET
NATIONAL GEODETIC VERTICAL DATUM OF 1929

THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS
FOR SALE BY U. S. GEOLOGICAL SURVEY, DENVER, COLORADO 80225, OR RESTON, VIRGINIA 22092
A FOLDER DESCRIBING TOPOGRAPHIC MAPS AND SYMBOLS IS AVAILABLE ON REQUEST

TEXAS
QUADRANGLE LOCATION

2998-431

ROAD CLASSIFICATION

Primary highway, hard surface
Secondary highway, hard surface
Light-duty road, hard or improved surface
Unimproved road
Interstate Route
U. S. Route
State Route

SMITHSON VALLEY, TEX.
29098-G3-TF-024

1964
REVISED 1994
DMA 6343 IV SE-SERIES V882

INTERIOR-GEOLOGICAL SURVEY, RESTON, VIRGINIA—1994

Texas Commission on Environmental Quality
Edwards Aquifer Protection Program

Regulatory Zones

30 TAC Chapter 213- Edwards Aquifer
Effective September 2005

This map was produced by the Groundwater Planning and Assessment Team of the Texas Commission on Environmental Quality to detail the boundaries of the regulatory zones of the Edwards Aquifer Protection Program, as described in Texas Administrative Code Title 30, Part 1, §213.3. No other claims are made to the accuracy or completeness of the data or to its suitability for a particular use. For more information about the Edwards Aquifer Protection Program, please contact the TCEQ Regional Offices in San Antonio or Austin. Printed June 2006.

TX2 Engineering
Firm F-20787
645 Floral Ave, Ste C
New Braunfels, TX 78130
816-510-9151

CZP Application Attachment C – Project Description

The Hilltop RV Park LLC project is located on a 20.79-acre tract of land in Comal County. This existing site is predominantly undeveloped ranch land with no existing buildings.

The proposed development is to be a residential RV park. The proposed improvements associated with this project include an asphalt access drive, 78 RV stalls, an amenity building. The total impervious cover proposed for the site is 2.95 acres of the overall 20.79 acres being 14% impervious.

The property drains primarily overland to the south side of the property and eventually to Tom Creek which is located approximately 0.1 mile west of the subject property.

The estimated total disturbed area is 10.38 acres. All stormwaters will be treated with temporary BMPs before leaving the site. Temporary BMPs proposed for the site include a construction entrance/ exit, rock berms, concrete washout pits, silt fences, and naturally vegetated buffers.

Engineered vegetative filter strips are proposed permanent BMPs for this project. Sheet flow from the proposed impervious cover will be directed across minimum 15’ widths of vegetation graded to a uniform, even slope of less than 20% in order to achieve the 80% TSS removal in accordance with TCEQ RG 348. Available LIDAR topography for the area indicates the existing slopes onsite are less than 20%. All areas not planned to receive impervious cover are planned to be revegetated after construction is complete. All impervious cover will be located within the catchment limits (72’ in the direction of flow) of filter strip. The majority of catchment areas will overlap with adjacent catchment areas providing for overtreatment capabilities.

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ATTACHMENT D
FACTORS AFFECTING SURFACE WATER QUALITY

Potential sources of pollution that may be expected to affect the quality of storm water discharges from the site during construction include primarily suspended solids with examples as follows:

- Soil erosion due to clearing of site.
- Oil, grease, fuel and hydraulic fluid contamination from construction equipment and vehicle drippings.
- Hydrocarbons from asphalt paving.
- Trash and litter from construction workers and material wrappings.
- Tar, fertilizers, cleaning solvents, detergents, and petroleum-based products.

Potential sources of pollution that may be expected to affect the quality of storm water discharges from the site after development include:

- Oil, grease, fuel and hydraulic fluid contamination from vehicle drippings.
- Dirt and dust from vehicles.
- Trash and litter.

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ATTACHMENT E
VOLUME AND CHARACTER OF STORMWATER

The overall contributing drainage area for this project is 25.73 acres. All stormwater will be routed via overland sheet flow across permanent BMPs. The stormwater runoff for the pre-project conditions are primarily across rocky soil, with native grasses, and dense canopy coverage. The site has an average slope ranging from 1% to 15%. Peak discharges were calculated using the Rational Method. Runoff coefficient numbers were taken from the City of New Braunfels Drainage Criteria Manual. The existing site is considered to have an average coefficient value of 0.56 consisting of undeveloped, forest/woodlands. The proposed development will add 2.95 acres of impervious coverage to the existing watershed boundary. A compound coefficient was calculated to determine the volume of stormwater discharged from the site after improvements are constructed.

EXISTING CONDITION - RUNOFF COEFFICIENT		
Description	Area (Acres)	C
Paved area, rooftops	2.18	0.95
Undeveloped, Forest/Woodlands, Steep, over 7%	23.55	0.52
Total	25.73	0.56

PROPOSED CONDITION - RUNOFF COEFFICIENT		
Description	Area (Acres)	C
Paved area, rooftops	5.13	0.95
Undeveloped, Forest/Woodlands, Steep, over 7%	20.6	0.52
Total	25.73	0.61

STORMWATER DISCHARGE			
STORM EVENT	EXISTING CONDITION (CFS)	PROPOSED CONDITION (CFS)	NET CHANGE (CFS)
2YR	52.14	56.8	4.66
10YR	76.17	82.97	6.8
25YR	91.31	99.46	8.15
100YR	115.86	126.20	10.34

COMAL COUNTY

ENGINEER'S OFFICE

April 26, 2023

Mr. Evan Calhoun, P.E.
TX2 Engineering
645 Floral Ave, Suite C
New Braunfels, TX 78130

Re: Hilltop RV Park Suitability Letter within Comal County Texas

Dear Mr. Calhoun:

In accordance with TAC §213.24(8)(B), Comal County has found that the entire referenced site is suitable for the use of private sewage facilities and will meet the requirements for on-site sewage facilities.

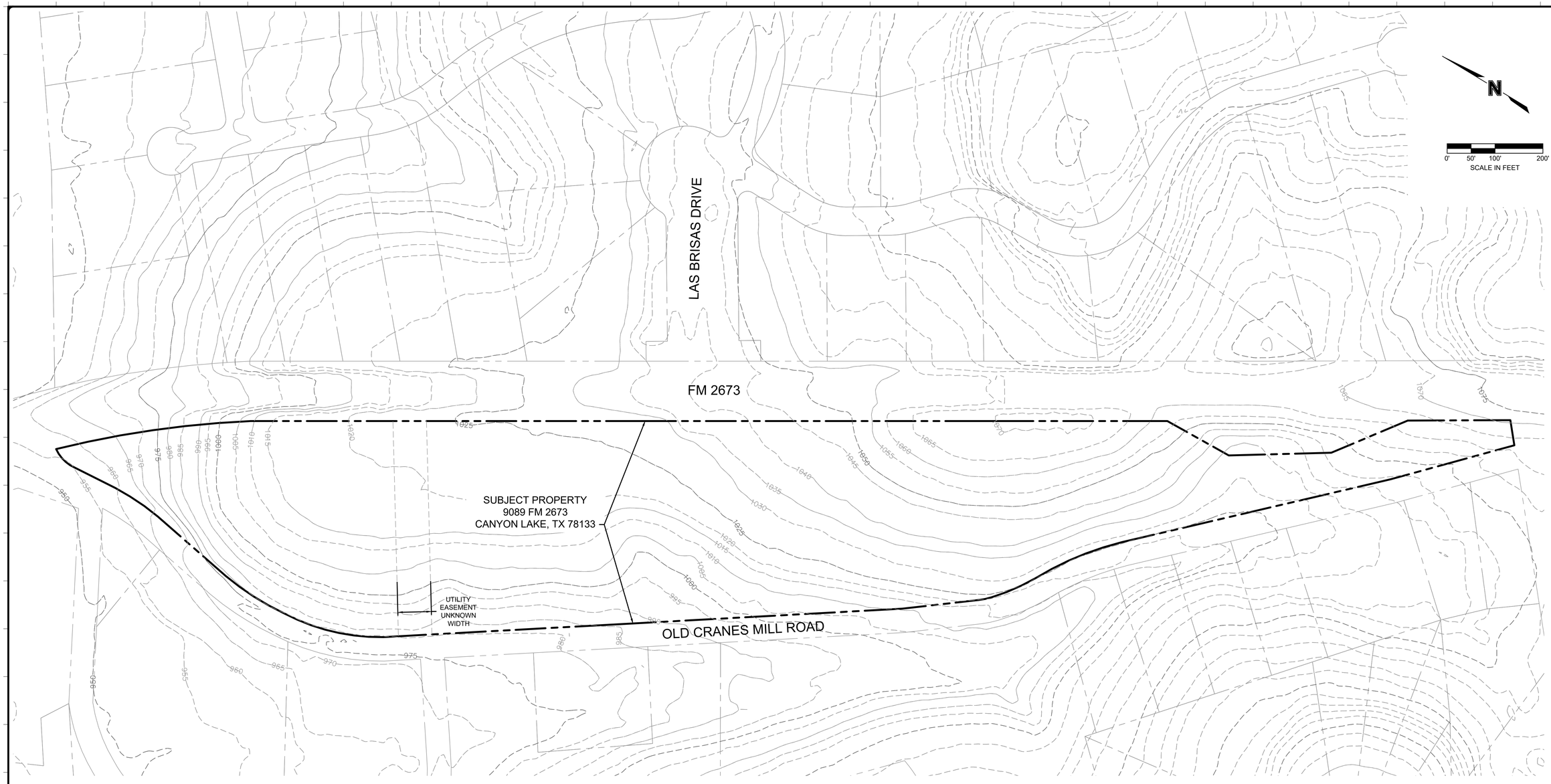
If you have any questions or need additional information, please contact our office.

Sincerely,

Robert Boyd, P.E.
Comal County Assistant Engineer

cc: Donna Eccleston, Comal County Commissioner, Precinct No. 1

195 David Jonas Dr, New Braunfels, Texas, 78132 – Phone (830) 608-2090



LEGEND

- PROPERTY LINE
- EXISTING ADJACENT LOT
- PROPOSED EDGE OF PAVEMENT
- PROPOSED ROAD CENTERLINE
- EXISTING MINOR CONTOUR
- EXISTING MAJOR CONTOUR

SITEPLAN NOTES:

1. SITEPLAN
   - 1.1. RV SLIPS:
     - 1.1.1. BACK IN: 65
     - 1.1.2. PULL THRU: 15
   - 1.2. AMENITY AREA: 1 - 50'X50' BUILDING
   - 1.3. DRIP FIELD REQUIRES 0.1 GPD / SF

NOTES:

1. THE PROPOSED SITEPLAN WAS DEVELOPED AND DRAWN BASED OFF OF AVAILABLE LIDAR DATA.
2. A SURVEY HAS NOT BEEN PERFORMED BY THE ENGINEER OR THEIR SURVEYOR AND ONE WAS NOT PROVIDED AT TIME OF PREPARATION OF EXHIBIT(S).
3. A TITLE REPORT HAS NOT BEEN PROVIDED TO THE ENGINEER AT TIME OF PREPARATION.
4. FIRE ACCESS IS SHOWN AT 20' WIDTH.

KNOW WHAT'S BELOW.
811 BEFORE YOU DIG.

TX2 ENGINEERING
FIRM #: 20787

CONTACT:

645 FLORAL AVE, STE C
NEW BRAUNFELS, TX 78130

TEL: (830) 327-1235

STATE OF TEXAS
TREVOR N. TAST
124101
LICENSED
PROFESSIONAL ENGINEER

04/26/2023

EXISTING SITE PLAN

LAS BRISAS
TCEQ CZP
COMAL COUNTY, TX. 78133

REVISIONS			
REV.	DATE	DESCRIPTION	BY

DRAWN BY:	MA
QA/QC BY:	TNT
PROJECT NO.:	022-0054
PERMIT #:	

C0.0

SHEET

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DATE: Apr 26, 2023 10:45am XREFS: TBLK_24X36 Las Brisas - EBASE

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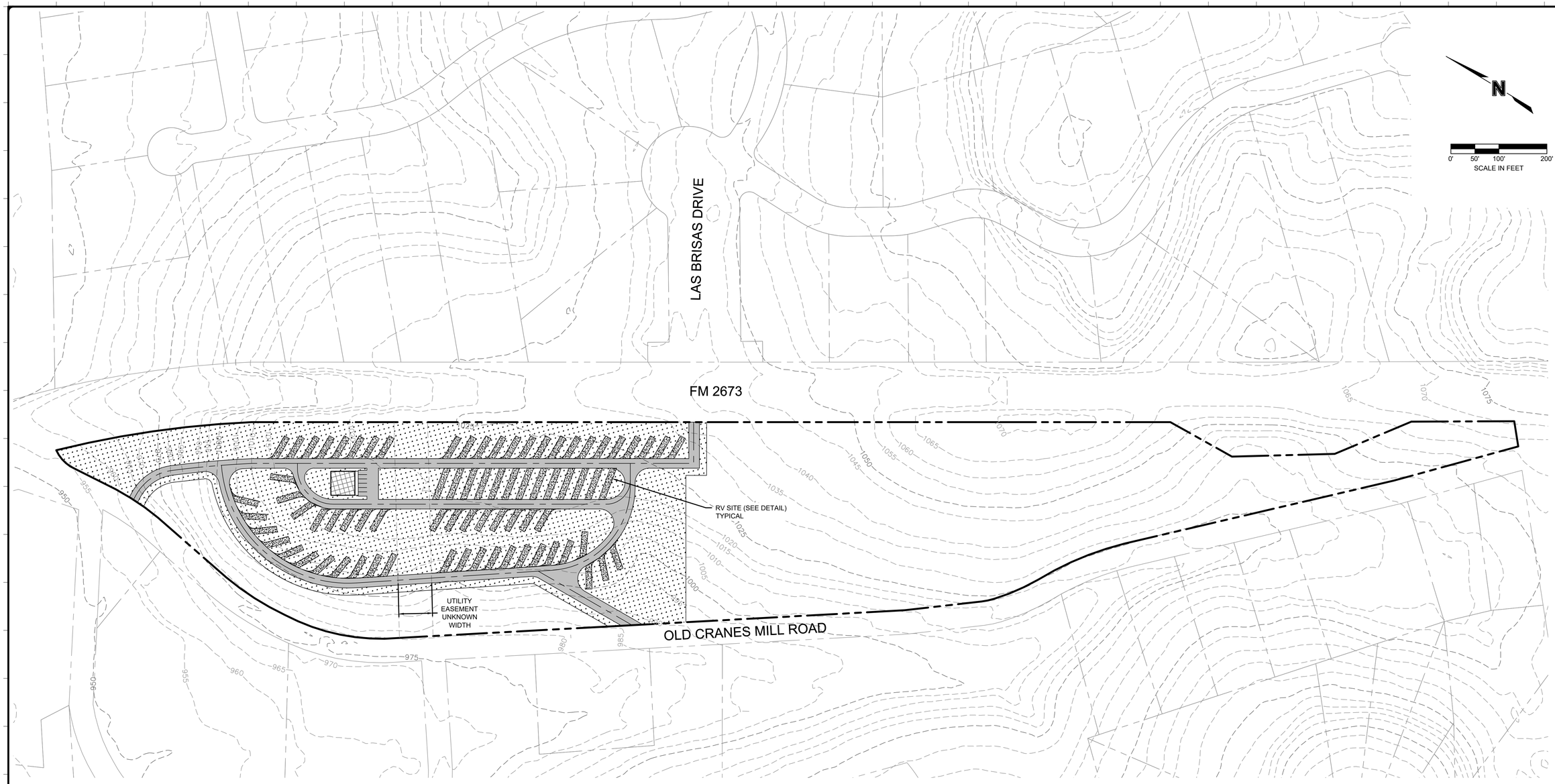
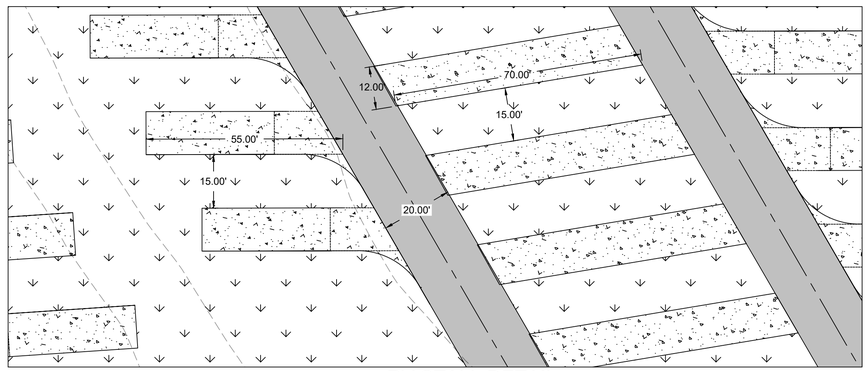
DATE: Apr 26, 2023 10:45am XREFS: TBLK_24X36 Las Brisas - EBASE



LEGEND

- PROPERTY LINE
- EXISTING ADJACENT LOT
- PROPOSED EDGE OF PAVEMENT
- PROPOSED ROAD CENTERLINE
- EXISTING MINOR CONTOUR
- EXISTING MAJOR CONTOUR
- PROPOSED GRAVEL PAVEMENT
- PROPOSED CONCRETE PAVEMENT
- PROPOSED BUILDING
- PROPOSED PERMANENT STRUCTURAL BMP (VEGETATIVE BUFFER)



RV STALL DETAIL
SCALE: 1"=20'

SITEPLAN NOTES:

1. SITEPLAN
   - 1.1. RV SLIPS:
     - 1.1.1. BACK IN: 65
     - 1.1.2. PULL THRU: 15
   - 1.2. AMENITY AREA: 1 - 50'X50' BUILDING

NOTES:

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3. A TITLE REPORT HAS NOT BEEN PROVIDED TO THE ENGINEER AT TIME OF PREPARATION.
4. FIRE ACCESS IS SHOWN AT 20' WIDTH.

TX2 ENGINEERING
FIRM #: 20787

CONTACT:

645 FLORAL AVE, STE C
NEW BRAUNFELS, TX 78130

TEL: (830) 327-1235

STATE OF TEXAS
TREVOR N. TAST
124101
LICENSED PROFESSIONAL ENGINEER
04/26/2023

PROPOSED SITE PLAN

LAS BRISAS
TCEQ CZP
COMAL COUNTY, TX. 78133

REVISIONS			
REV.	DATE	DESCRIPTION	BY

DRAWN BY:	MA
QA/QC BY:	TNT
PROJECT NO.:	022-0054
PERMIT #:	

C1.0

SHEET

811 KNOW WHAT'S BELOW. 811 BEFORE YOU DIG.

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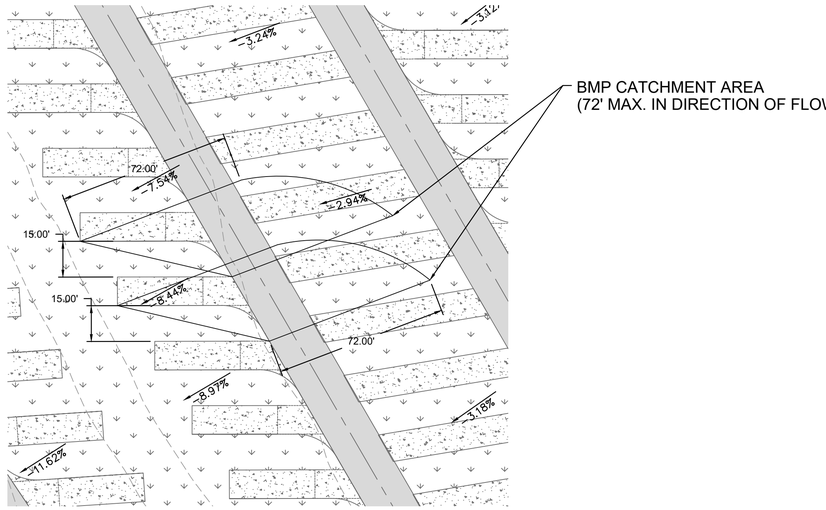
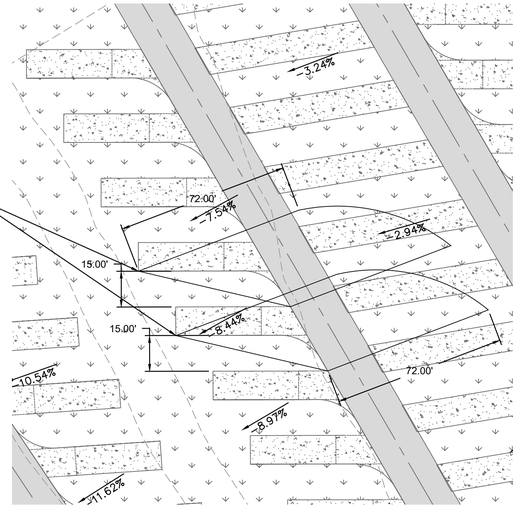
DATE: Apr 26, 2023 11:13am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

DWG: Z:\022-0054 Las Brisas FM 2673\40-Design\AutoCAD\Final Plans\Sheets\LDVP\Las Brisas - PSITE.dwg USER: EvanCalhoun
DATE: Apr 26, 2023 11:13am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

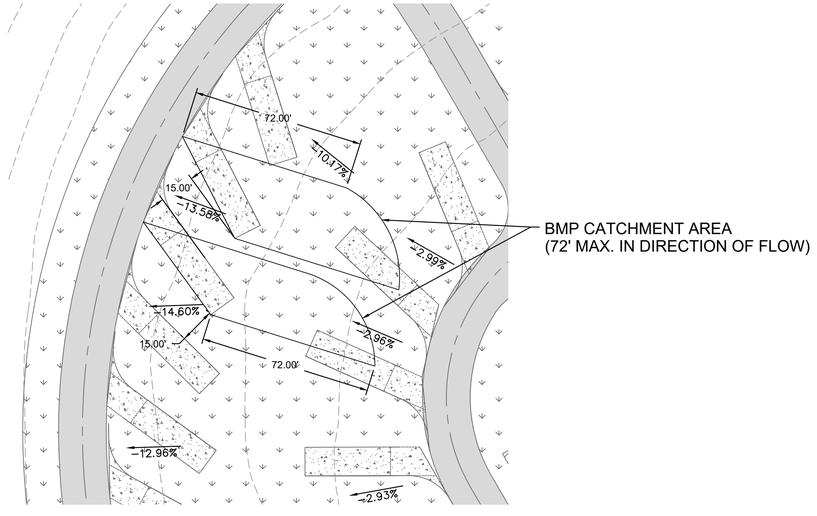
TYPICAL RV CONFIGURATION A
SCALE 1"=30'



TYPICAL RV CONFIGURATION B
SCALE 1"=30'



TYPICAL RV CONFIGURATION C
SCALE 1"=30'



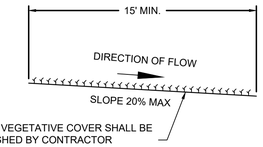
TYPICAL RV CONFIGURATION D
SCALE 1"=30'

N

0' 15' 30' 60'
SCALE IN FEET

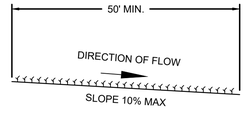
LEGEND

- PROPERTY LINE
- EXISTING ADJACENT LOT
- PROPOSED EDGE OF PAVEMENT
- PROPOSED ROAD CENTERLINE
- PROPOSED GRAVEL PAVEMENT
- PROPOSED CONCRETE PAVEMENT
- PROPOSED BUILDING
- PROPOSED PERMANENT STRUCTURAL BMP (VEGETATIVE BUFFERS)



80% MIN. VEGETATIVE COVER SHALL BE ESTABLISHED BY CONTRACTOR

ENGINEERED VEGETATIVE FILTER STRIP DETAIL
SCALE: N.T.S.



NATURAL VEGETATIVE FILTER STRIP DETAIL
SCALE: N.T.S.

SITEPLAN NOTES:

1. SITEPLAN
   - 1.1. RV SLIPS:
     - 1.1.1. BACK IN: 65
     - 1.1.2. PULL THRU: 15
   - 1.2. AMENITY AREA: 1 - 50'X50' BUILDING

NOTES:

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KNOW WHAT'S BELOW. 811 BEFORE YOU DIG.

TX2 ENGINEERING
FIRM #: 20787

CONTACT:

645 FLORAL AVE, STE C
NEW BRAUNFELS, TX 78130

TEL: (830) 327-1235

STATE OF TEXAS
TREVOR N. TAST
124101
LICENSED
PROFESSIONAL ENGINEER

04/26/2023

BMP CATCHMENT AREA

LAS BRISAS
TCEQ CZP
COMAL COUNTY, TX. 78133

REVISIONS

REV.	DATE	DESCRIPTION	BY

DRAWN BY:	MA
QA/QC BY:	TNT
PROJECT NO.:	022-0054
PERMIT #:	

C1.1

SHEET

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DATE: Apr 26, 2023 11:55am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

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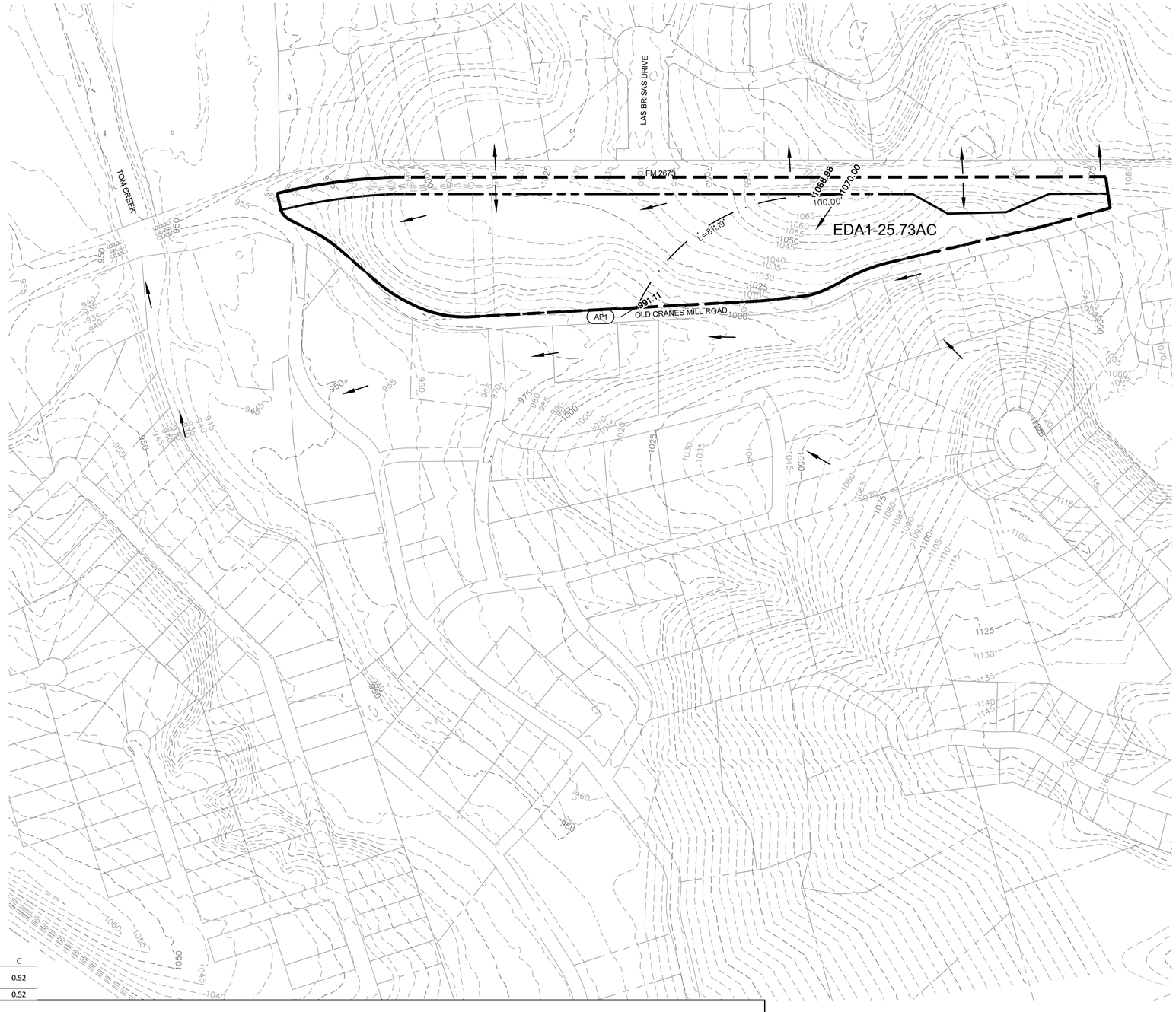

N

0' 50' 100' 200'
SCALE IN FEET

LEGEND

- PROPERTY LINE
- RIGHT OF WAY
- P–OH — EXISTING OVERHEAD POWER
- UGE — EXISTING UNDERGROUND POWER
- T — T — EXISTING TELPHONE CONDUIT
- CATV — EXISTING CABLE TELEVISION CONDUIT
- FO — EXISTING FIBER OPTIC CONDUIT
- G — G — EXISTING NATURAL GAS SERVICE
- FP — EXISTING FIRE PROTECTION SERVICE
- W — W — EXISTING WATER SERVICE
- SS — EXISTING SANITARY SEWER
- SD — EXISTING ROOF DRAINS AND HEADER PIPES
- EXISTING STORM SEWER
- DRAINAGE BASIN
- TIME OF CONCENTRATION
- DIRECTION OF FLOW

EXISTING CONDITION - RUNOFF COEFFICIENT

Description	Area (Acres)	C
Undeveloped, Forest/Woodlands, Steep, over 7%	25.73	0.52
Total	25.73	0.52

Assumptions:	
Mannings n (Sheet):	0.24
Mannings n (Channel/ Storm):	0.045
Sheet Flow Length (Max)	100 L.F
ToC (Min.)	10 Min
P_2 = 2-Year, 24-Hour Storm	3.34 in.

Time of Concentration (ToC) Calculations

$$T_{(t\ \_\ Sheet)} = \frac{0.007\ (n * L)^{0.8}}{(P_2^{0.5})(S^{0.4})} * 60$$

Paved: $T_{(t\ \_\ Shall)} = \frac{L}{(60 * 20.3282 * S^{0.5}}$

UnPaved: $T_{(t\ \_\ Shall)} = \frac{L}{(60 * 16.1345 * S^{0.5}}$

$$T_{(t\ \_\ Channel)} = \sum(\frac{L_i}{60Vi})$$

Drainage Basin ID	Sheet					Shallow Concentrated Flow						Channel or Storm Drain Flow								Total
	Elev. Up	Elev. Down	Length (L) (ft)	Slope (S) (%)	$T_{(t\text{-}Sheet)}$ (min.)	Elev. Up	Elev. Down	Length (L) (ft)	Slope (S) (%)	Paved/ UnPaved	$T_{(t\text{-}Shall.)}$ (min.)	Elev. Up	Elev. Down	Length (L) (ft)	Slope (S) (%)	X-Sectional Area (ft^2)	Wetted Perimeter (ft)	Velocity (ft/s)	$T_{(t\text{-}Chan.)}$ (min.)	ToC (min.)
DA1	1070.00	1068.98	100	1.02%	**18.29**	1068.98	991.11	811.19	9.60%	UnPaved	**2.70**								**0.00**	**20.99**

SITEPLAN NOTES:

1. SITEPLAN
   - 1.1. RV SLIPS:
     - 1.1.1. BACK IN: 65
     - 1.1.2. PULL THRU: 15
   - 1.2. AMENITY AREA: 1 - 50'X50' BUILDING
   - 1.3. DRIP FIELD REQUIRES 0.1 GPD / SF

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KNOW WHAT'S BELOW. 811 BEFORE YOU DIG.

TX2 ENGINEERING
FIRM #: 20787

CONTACT:

645 FLORAL AVE, STE C
NEW BRAUNFELS, TX 78130

TEL: (830) 327-1235

STATE OF TEXAS
TREVOR N. TAST
124101
LICENSED
PROFESSIONAL ENGINEER
04/26/2023

EXISTING DRAINAGE PLAN

LAS BRISAS
TCEQ CZP
COMAL COUNTY, TX. 78133

REVISIONS

REV.	DATE	DESCRIPTION	BY

DRAWN BY: MA
QA/QC BY: TNT
PROJECT NO.: 022–0054
PERMIT #:

C3.0
SHEET

DWG: Z:\022-0054 Las Brisas FM 2673\40-Design\AutoCAD\Final Plans\Sheets\LDVP\Las Brisas - EDRAIN.dwg USER: EvanCalhoun
DATE: Apr 26, 2023 11:41am XREFS: TBLK_24X36 Las Brisas - EBASE

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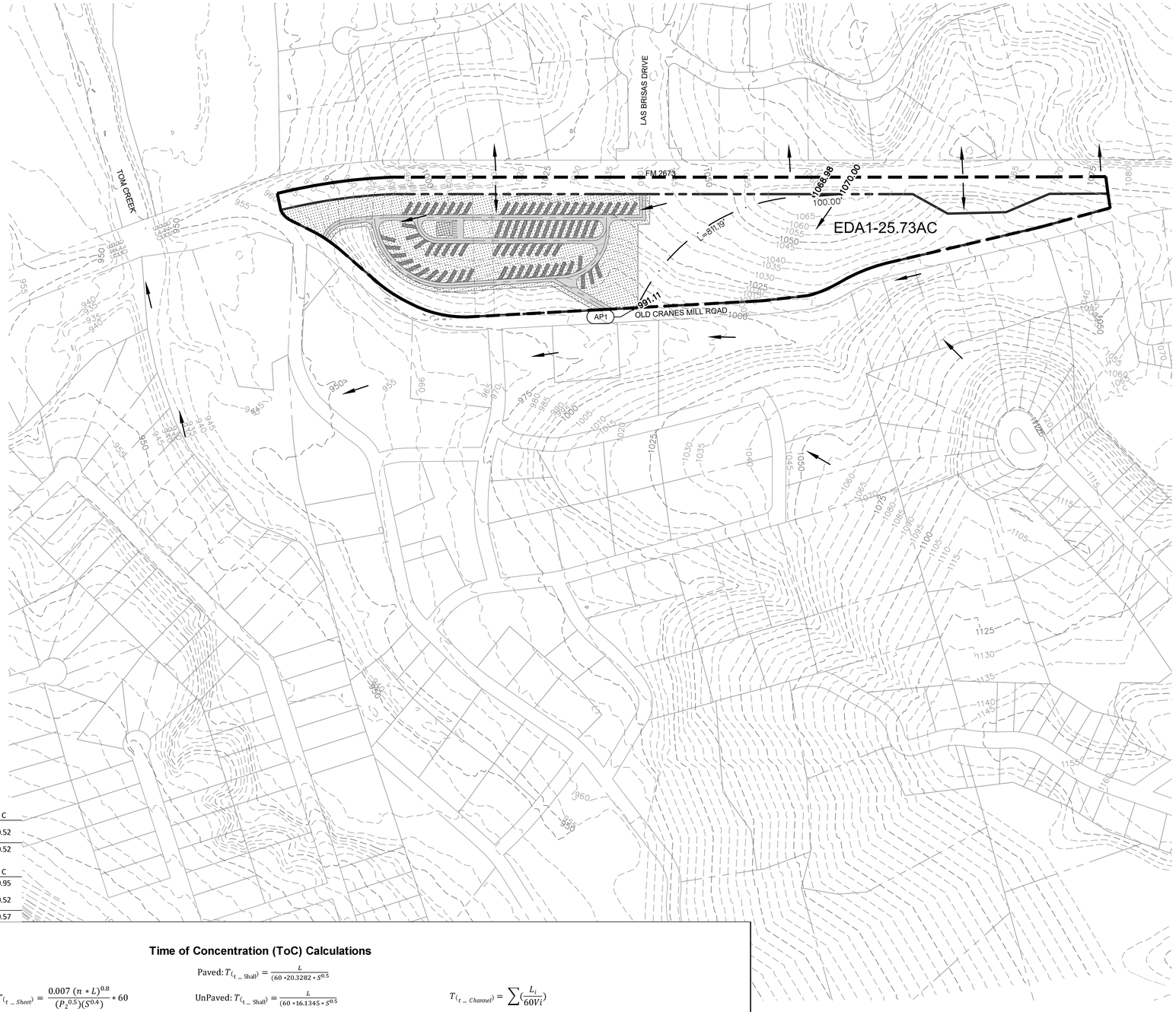

N

0' 50' 100' 200'
SCALE IN FEET

LEGEND

- PROPERTY LINE
- RIGHT OF WAY
- P—OH — EXISTING OVERHEAD POWER
- UGE — EXISTING UNDERGROUND POWER
- T — T — EXISTING TELPHONE CONDUIT
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- SD — EXISTING ROOF DRAINS AND HEADER PIPES
- EXISTING STORM SEWER
- PROPOSED GRAVEL PAVEMENT
- PROPOSED CONCRETE PAVEMENT
- PROPOSED BUILDING
- PROPOSED PERMANENT STRUCTURAL BMP
- TEMPORARY CONSTRUCTION ENTRANCE
- DRAINAGE BASIN
- TIME OF CONCENTRATION
- DIRECTION OF FLOW

EXISTING CONDITION - RUNOFF COEFFICIENT

Description	Area (Acres)	C
Undeveloped, Forest/Woodlands, Steep, over 7%	25.73	0.52
Total	25.73	0.52

PROPOSED CONDITION - RUNOFF COEFFICIENT

Description	Area (Acres)	C
Paved area, rooftops	2.95	0.95
Undeveloped, Forest/Woodlands, Steep, over 7%	22.78	0.52
Total	25.73	0.57

Assumptions:

Mannings n (Sheet):	0.24
Mannings n (Channel/ Storm):	0.045
Sheet Flow Length (Max)	100 L.F
ToC (Min.)	10 Min
P_2 = 2-Year, 24-Hour Storm	3.34 in.

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$$T_{(t\_Channel)} = \sum\left(\frac{L_i}{60Vi}\right)$$

Drainage Basin ID	Sheet					Shallow Concentrated Flow						Channel or Storm Drain Flow								Total
	Elev. Up	Elev. Down	Length (L) (ft)	Slope (S) (%)	$T_{(t\text{-}Sheet)}$ (min.)	Elev. Up	Elev. Down	Length (L) (ft)	Slope (S) (%)	Paved/ UnPaved	$T_{(t\text{-}Shall.)}$ (min.)	Elev. Up	Elev. Down	Length (L) (ft)	Slope (S) (%)	X-Sectional Area (ft^2)	Wetted Perimeter (ft/s)	Velocity (ft/s)	$T_{(t\text{-}Chan.)}$ (min.)	ToC (min.)
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STORMWATER DISCHARGE

STORM EVENT	EXISTING CONDITION (CFS)	PROPOSED CONDITION (CFS)	NET CHANGE (CFS)
2YR	48.42	53.08	4.66
10YR	70.73	77.53	6.8
25YR	84.78	92.94	8.16
100YR	107.58	117.93	10.35

SITEPLAN NOTES:

1. SITEPLAN
   - 1.1. RV SLIPS:
     - 1.1.1. BACK IN: 65
     - 1.1.2. PULL THRU: 15
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NOTES:

1. THE PROPOSED SITEPLAN WAS DEVELOPED AND DRAWN BASED OFF OF AVAILABLE LIDAR DATA.
2. A SURVEY HAS NOT BEEN PERFORMED BY THE ENGINEER OR THEIR SURVEYOR AND ONE WAS NOT PROVIDED AT TIME OF PREPARATION OF EXHIBIT(S).
3. A TITLE REPORT HAS NOT BEEN PROVIDED TO THE ENGINEER AT TIME OF PREPARATION.
4. FIRE ACCESS IS SHOWN AT 20' WIDTH.

KNOW WHAT'S BELOW. 811 BEFORE YOU DIG.

TX2 ENGINEERING
FIRM #: 20787

CONTACT:

645 FLORAL AVE, STE C
NEW BRAUNFELS, TX 78130

TEL: (830) 327-1235

STATE OF TEXAS
TREVOR N. TAST
124101
LICENSED
PROFESSIONAL ENGINEER
04/26/2023

PROPOSED DRAINAGE PLAN

LAS BRISAS
TCEQ CZP
COMAL COUNTY, TX. 78133

REVISIONS

REV.	DATE	DESCRIPTION	BY

DRAWN BY: MA
QA/QC BY: TNT
PROJECT NO.: 022-0054
PERMIT #:

C3.1
SHEET

DWG: Z:\022-0054 Las Brisas FM 2673\40-Design\AutoCAD\Final Plans\Sheets\LDVP\Las Brisas - PDRAIN.dwg USER: EvanCalhoun
DATE: Apr 26, 2023 11:40am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

DWG: Z:\022-0054 Las Brisas FM 2673\40-Design\AutoCAD\Final Plans\Sheets\LDVP\Las Brisas - PDRAIN.dwg USER: EvanCalhoun
DATE: Apr 26, 2023 11:40am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

Contributing Zone Plan Application - Attachment I

20% or Less Impervious Cover Waiver

Not Applicable

Contributing Zone Plan Application - Attachment J

BMPs for Upgradient Stormwater

Permanent BMPs or measures are not required to prevent pollution of surface water, groundwater, or stormwater that originates upgradient from the site because the upgradient stormwater is directed across natural vegetation prior to entering the project site.

Contributing Zone Plan Application - Attachment K

BMPs for On-Site Stormwater

Vegetative Filter Strips will be constructed to prevent pollution of surface water or groundwater that originates on-site or flows off site. The BMPs will be constructed in accordance with TCEQ Technical Guidance Manual RG-348 which states 80% TSS removal is provided by vegetative filter strips when the contributing drainage area does not exceed 72 feet (direction of flow) and the sheet flow leaving the impervious cover is directed across 15 feet of engineered filter strips with maximum slope of 20%.

Contributing Zone Plan Application - Attachment L

BMPs for Surface Streams

Vegetative Filter Strips will be constructed to prevent pollution of the surface stream (Tom Creek). The BMPs will be constructed in accordance with TCEQ Technical Guidance Manual RG-348 which states 80% TSS removal is provided by vegetative filter strips when the contributing drainage area does not exceed 72 feet (direction of flow) and the sheet flow leaving the impervious cover is directed across 15 feet of engineered filter strips with maximum slope of 20%.

Contributing Zone Plan Application - Attachment M

Construction Plans

BMPs and TSS Removal Calculation shown on attached site plan.

Contributing Zone Plan Application - Attachment N

Inspection, Maintenance, Repair and Retrofit Plan

The party responsible for the maintenance of the filter strip shall develop an Integrated Pest Management (IPM) for the filter strip area.

Pest Management: An integrated Pest Management (IPM) Plan should be developed for vegetated areas. The plan shall specify how problem insects and weeds will be controlled with minimal or no use of insecticides and herbicides.

Seasonal Mowing and Lawn Care: If the filter strip is made up of turf grass, it should be mowed as needed to limit vegetation height to 18 inches, using a mulching mower (or removal of clippings). If native grasses are used, the filter may require less frequent mowing, but a minimum of twice annually. Grass clippings and brush debris should not be deposited on vegetated filter strip areas. Regular mowing should also include weed control practices; however, herbicide use should be kept to a minimum.

Inspection: Inspect filter strips at least twice annually for erosion or damage to vegetation; however, additional inspection after periods of heavy runoff shall be made. The strip shall be checked for uniformity of grass cover, debris and litter, and areas of sediment accumulation. More frequent inspections of the grass cover during the first few years after establishment will help to determine if any problems are developing, and to plan for long-term restorative maintenance needs. Bare spots and areas of erosion identified during semi-annual inspections must be replanted and restored to meet specifications. After all inspections results shall be written and records maintained and made available upon request by TCEQ officials.

Debris and Litter Removal: The filter strip shall be kept free of trash and accumulation to reduce floatables being flushed downstream, and for aesthetic reasons. The need for this practice is determined through periodic inspection but should be performed no less than 4 times per year.

Sediment Removal: Sediment removal is not normally required in filter strips since the vegetation normally grows through it and binds to the soil. However, sediment may accumulate along the upstream boundary of the strip preventing uniform overland flow. Excess sediment shall be removed by hand or with flat-bottomed shovels.

Grass Reseeding and Mulching: A healthy dense grass shall be maintained on the filter strip. If areas are eroded, they should be filled, compacted, and reseeded so that the final grade is level. Grass damaged during the sediment removal process shall be promptly replaced using the same seed mix used during filter strip establishment. If possible, flow should be diverted from the damaged areas until the grass is firmly established. Bare spots and areas of erosion identified during semi-annual inspections must be replanted and restored to meet specifications. Corrective maintenance, such as weeding, or replanting should be done more frequently in the first two to three years after installation to ensure stabilization. Dense vegetation may require irrigation immediately after planting, and during particularly dry periods, particularly as the vegetation is initially established.

General Information

Upon transfer of ownership or maintenance responsibility, the seller must inform the buyer of all requirements of the BMP maintenance. TCEQ must be notified and receive the form "TCEQ-10623 Change in Responsibility for Maintenance on Permanent Best Management Practices and Measures". In addition, TCEQ shall receive a signed, dated copy of this maintenance plan from the new owner.

An amended copy of this document will be provided to the Texas Commission on Environmental Quality within thirty (30) days of any changes in the following information.

Responsible Party for Maintenance	Donald Burkhardt
Address	15794 Craves Mill RD
City, State, Zip	Canyon Lake, TX 78133
Telephone Number	713-724-6339
Signature of Representative	Donald L Burkhardt
Print Name	Donald Burkhardt

Contributing Zone Plan Application - Attachment O

Pilot -Scale Field Testing Plan

NOT APPLICABLE

Contributing Zone Plan Application - Attachment P

Measures for Minimizing Surface Stream Contamination

Vegetative Filter Strips and temporary BMPs (silt fence) will be installed to minimize surface stream contamination. The permanent and temporary BMPs will be constructed in accordance with TCEQ Technical Guidance Manual.

Texas Commission on Environmental Quality

TSS Removal Calculations 04-20-2009

Project Name: LAS BRISAS
Date Prepared: 2/16/2023

Additional information is provided for cells with a red triangle in the upper right corner. Place the cursor over the cell.
Text shown in blue indicate location of instructions in the Technical Guidance Manual - RG-348.
Characters shown in red are data entry fields.
Characters shown in black (Bold) are calculated fields. Changes to these fields will remove the equations used in the spreadshe

1. The Required Load Reduction for the total project: Calculations from RG-348 Pages 3-27 to 3-30

Page 3-29 Equation 3.3: $L_M = 27.2(A_N \times P)$

where:
$L_{M\ TOTAL\ PROJECT}$ = Required TSS removal resulting from the proposed development = 80% of increased load
A_N = Net increase in impervious area for the project
P = Average annual precipitation, inches

Site Data: Determine Required Load Removal Based on the Entire Project

County =	Comal	
Total project area included in plan * =	20.79	acres
Predevelopment impervious area within the limits of the plan * =	0.00	acres
Total post-development impervious area within the limits of the plan * =	2.95	acres
Total post-development impervious cover fraction * =	0.14	
P =	33	inches
$L_{M\ TOTAL\ PROJECT}$ =	2648	lbs.

* The values entered in these fields should be for the total project area.

Number of drainage basins / outfalls areas leaving the plan area = 1

2. Drainage Basin Parameters (This information should be provided for each basin):

Drainage Basin/Outfall Area No. = 1

Total drainage basin/outfall area =	25.73	acres
Predevelopment impervious area within drainage basin/outfall area =	2.18	acres
Post-development impervious area within drainage basin/outfall area =	5.13	acres
Post-development impervious fraction within drainage basin/outfall area =	0.20	
$L_{M\ THIS\ BASIN}$ =	2648	lbs.

3. Indicate the proposed BMP Code for this basin.

Proposed BMP = Vegetated Filter Strips
Removal efficiency = 85 percent

Aqualogic Cartridge Filter
Bioretention
Contech StormFilter
Constructed Wetland
Extended Detention
Grassy Swale
Retention / Irrigation
Sand Filter
Stormceptor
Vegetated Filter Strips
Vortechs
Wet Basin
Wet Vault

4. Calculate Maximum TSS Load Removed (L_R) for this Drainage Basin by the selected BMP Type.

RG-348 Page 3-33 Equation 3.7: L_R = (BMP efficiency) x P x (A x 34.6 + A_P x 0.54)

where:
A_C = Total On-Site drainage area in the BMP catchment area
A_I = Impervious area proposed in the BMP catchment area
A_P = Pervious area remaining in the BMP catchment area
L_R = TSS Load removed from this catchment area by the proposed BMP

A_C =	8.81	acres
A_I =	2.95	acres
A_P =	5.86	acres
L_R =	2952	lbs

5. Calculate Fraction of Annual Runoff to Treat the drainage basin / outfall area

Desired $L_{M\ THIS\ BASIN}$ = 2648 lbs.

F = 0.90

6. Calculate Capture Volume required by the BMP Type for this drainage basin / outfall area. Calculations from RG-348 Pages 3-34 to 3-36

Rainfall Depth =	1.70	inches
Post Development Runoff Coefficient =	0.28	
On-site Water Quality Volume =	14981	cubic feet

Calculations from RG-348 Pages 3-36 to 3-37

Off-site area draining to BMP =	0.00	acres
Off-site Impervious cover draining to BMP =	0.00	acres
Impervious fraction of off-site area =	0	
Off-site Runoff Coefficient =	0.00	
Off-site Water Quality Volume =	0	cubic feet
Storage for Sediment =	2996	
Total Capture Volume (required water quality volume(s) x 1.20) =	17977	cubic feet

The following sections are used to calculate the required water quality volume(s) for the selected BMP.
The values for BMP Types not selected in cell C45 will show NA.

7. Retention/Irrigation System Designed as Required in RG-348 Pages 3-42 to 3-46

Required Water Quality Volume for retention basin = NA cubic feet

Irrigation Area Calculations:

Soil infiltration/permeability rate =	0.1	in/hr	Enter determined permeability rate or assumed value of 0.1
Irrigation area =	NA	square feet	
	NA	acres	

8. Extended Detention Basin System Designed as Required in RG-348 Pages 3-46 to 3-51

Required Water Quality Volume for extended detention basin = NA cubic feet

9. Filter area for Sand Filters Designed as Required in RG-348 Pages 3-58 to 3-63

9A. Full Sedimentation and Filtration System

Water Quality Volume for sedimentation basin =	NA	cubic feet	
Minimum filter basin area =	NA	square feet	
Maximum sedimentation basin area =	NA	square feet	For minimum water depth of 2 feet
Minimum sedimentation basin area =	NA	square feet	For maximum water depth of 8 feet

9B. Partial Sedimentation and Filtration System

Water Quality Volume for combined basins =	NA	cubic feet	
Minimum filter basin area =	NA	square feet	
Maximum sedimentation basin area =	NA	square feet	For minimum water depth of 2 feet
Minimum sedimentation basin area =	NA	square feet	For maximum water depth of 8 feet

10. Bioretention System Designed as Required in RG-348 Pages 3-63 to 3-65

Required Water Quality Volume for Bioretention Basin = NA cubic feet

04/26/2023

11. Wet Basins Designed as Required in RG-348 Pages 3-66 to 3-71

Required capacity of Permanent Pool = **NA** cubic feet **Permanent Pool Capacity is 1.20 times the WQV**
Required capacity at WQV Elevation = **NA** cubic feet **Total Capacity should be the Permanent Pool Capacity plus a second WQV.**

12. Constructed Wetlands Designed as Required in RG-348 Pages 3-71 to 3-73

Required Water Quality Volume for Constructed Wetlands = **NA** cubic feet

13. AquaLogic™ Cartridge System Designed as Required in RG-348 Pages 3-74 to 3-78

** 2005 Technical Guidance Manual (RG-348) does not exempt the required 20% increase with maintenance contract with AquaLogic ™.

Required Sedimentation chamber capacity = **NA** cubic feet
Filter canisters (FCs) to treat WQV = **NA** cartridges
Filter basin area (RIA_F) = **NA** square feet

14. Stormwater Management StormFilter® by CONTECH

Required Water Quality Volume for Contech StormFilter System = **NA** cubic feet

THE SIZING REQUIREMENTS FOR THE FOLLOWING BMPs / LOAD REMOVALS ARE BASED UPON FLOW RATES - NOT CALCULATED WATER QUALITY VOLUMES

15. Grassy Swales Designed as Required in RG-348 Pages 3-51 to 3-54

Design parameters for the swale:

Drainage Area to be Treated by the Swale = A = acres
Impervious Cover in Drainage Area = acres
Rainfall intensity = i = 1.1 in/hr
Swale Slope = ft/ft
Side Slope (z) =
Design Water Depth = y = ft
Weighted Runoff Coefficient = C = #DIV/0!

A_{CS} = cross-sectional area of flow in Swale = #DIV/0! sf
P_W = Wetted Perimeter = #DIV/0! feet
R_H = hydraulic radius of flow cross-section = A_{CS}/P_W = #DIV/0! feet
n = Manning's roughness coefficient = 0.2

15A. Using the Method Described in the RG-348

Manning's Equation: $Q = \frac{1.49}{n} A_{CS} R_H^{.67} S^{0.5}$

$b = \frac{0.134 \times Q}{y^{1.67} S^{0.5}} - zy$ = #DIV/0! feet

Q = CiA = #DIV/0! cfs

To calculate the flow velocity in the swale:

V (Velocity of Flow in the swale) = Q/A_{CS} = #DIV/0! ft/sec

To calculate the resulting swale length:

L = Minimum Swale Length = V (ft/sec) * 300 (sec) = #DIV/0! feet

If any of the resulting values do not meet the design requirement set forth in RG-348, the design parameters must be modified and the solver rerun.

15B. Alternative Method using Excel Solver

Design Q = CiA = #DIV/0! cfs

Manning's Equation Q = 0.00 cfs Error 1 = #DIV/0!
Swale Width= 6.00 ft

Instructions are provided to the right (green comments).

Flow Velocity #DIV/0! ft/s
Minimum Length = #DIV/0! ft

Instructions are provided to the right (blue comments).

Design Width = ft
Design Discharge = 0.00 cfs Error 2 = #DIV/0!
Design Depth = 0.33 ft
Flow Velocity = #DIV/0! cfs
Minimum Length = #DIV/0! ft

If any of the resulting values do not meet the design requirement set forth in RG-348, the design parameters may be modified and the solver rerun.
If any of the resulting values still do not meet the design requirement set forth in RG-348, widening the swale bottom value may not be possible.

16. Vegetated Filter Strips Designed as Required in RG-348 Pages 3-55 to 3-57

There are no calculations required for determining the load or size of vegetative filter strips.
The 80% removal is provided when the contributing drainage area does not exceed 72 feet (direction of flow) and the sheet flow leaving the impervious cover is directed across 15 feet of engineered filter strips with maximum slope of 20% or across 50 feet of natural vegetation with a maximum slope of 10%. There can be a break in grade as long as no slope exceeds 20%.

If vegetative filter strips are proposed for an interim permanent BMP, they may be sized as described on Page 3-56 of RG-348.

17. Wet Vaults Designed as Required in RG-348 Pages 3-30 to 3-32 & 3-79

Required Load Removal Based upon Equation 3.3 = **NA** lbs

First calculate the load removal at 1.1 in/hour

RG-348 Page 3-30 Equation 3.4: Q = CiA

C = runoff coefficient for the drainage area = 0.12 **C = Runoff Coefficient = 0.546 (IC)^2 + 0.328 (IC) + 0.03**
i = design rainfall intensity = 1.1 in/hour
A = drainage area in acres = acres

Q = flow rate in cubic feet per second = 0.00 cubic feet/sec

RG-348 Page 3-31 Equation 3.5: V_{OR} = Q/A

Q = Runoff rate calculated above = 0.00 cubic feet/sec
A = Water surface area in the wet vault = square feet

V_{OR} = Overflow Rate = #DIV/0! feet/sec

Percent TSS Removal from Figure 3-1 (RG-348 Page 3-31) = percent

Load removed by Wet Vault = #VALUE! lbs

If a bypass occurs at a rainfall intensity of less than 1.1 in/hours
Calculate the efficiency reduction for the actual rainfall intensity rate

Actual Rainfall Intensity at which Wet Vault bypass Occurs = in/hour

Fraction of rainfall treated from Figure 3-2 RG-348 Page 3-32 = percent
Efficiency Reduction for Actual Rainfall Intensity = 0.00 percent

Resultant TSS Load removed by Wet Vault = #VALUE! lbs

18. Permeable Concrete Designed as Required in RG-348 Pages 3-79 to 3-83

PERMEABLE CONCRETE MAY ONLY BE USED ON THE CONTRIBUTING ZONE

19. BMPs Installed in a Series Designed as Required in RG-348 Pages 3-32

04/26/2023

To solve for bottom width of the trapezoidal swale (b) using the Excel solver:
Excel can simultaneously solve the "Design Q" (C217) vs "Manning's Q" (C219) by varying the "Swale Width" (C220).
The required "Swale Width" occurs when the "Design Q" = "Manning's Q"

First, highlight Cell F219 (Error 1 value). The equation showing in the fx screen for Cell F219 should be "= C217-C219"
Then click on "Tools" and "Solver". The "Solver Parameters" screen pops up.
The value in the "Set Target cell" should be F219 "Error 1 ="
The value in the "By Changing Cells" should be C220 "Swale Width"
Click on solve.

The resulting "Swale Width" must be less than 10 feet to meet the requirements of the TGM.
If the resulting "Swale Width" exceeds 10 feet then the design parameters must be revised and the solver run again.

If there is not the option for "Solver" under "Tools"
Click on "Tools" and "Add Ins" and then check "Solver Add-in"
Then proceed as instructed above.

If you would like to increase the bottom width of the trapezoidal swale (b):
Excel can simultaneously solve the "Design Q" (C217) vs "Design Discharge" (C232) by varying the "Design Depth" (C233).
The required "Design Depth" for a 10-foot bottom width occurs when the "Design Q" (C217) = the "Design Discharge" (C232).

First set the desired bottom width in Cell C231.
Highlight Cell F232. The equation showing in the fx screen for Cell F232 should be "= C217-C232"

Click on "Tools" and "Solver". The "Solver Parameters" screen pops up.
The value in the "Set Target cell" should be F232 "Error 2"
The value in the "By Changing Cells" should be C233 "Design Depth"
Click on solve.

The resulting "Design Depth" must be equal to or less than 0.33 feet to meet the requirements of the TGM.
If the resulting "Design Depth" exceeds 0.33 feet then the design parameters must be revised and the solver run again.
First set the desired bottom width in Cell C231.
Highlight Cell F232. The equation showing in the fx screen for Cell F232 should be "= C217-C232"
Click on "Tools" and "Solver". The "Solver Parameters" screen pops up.
The value in the "Set Target cell" should be F232 "Error 2"
The value in the "By Changing Cells" should be C233 "Design Depth"
Click on solve.

The resulting "Design Depth" must be equal to or less than 0.33 feet to meet the requirements of the TGM.
If the resulting "Design Depth" exceeds 0.33 feet then the design parameters must be revised and the solver run again.

Michael E. Barrett, Ph.D., P.E. recommended that the coefficient for E_2 be changed from 0.5 to 0.65 on May 3, 2006

E_{TOT} = [1 - (($1 - E_1$) X ($1 - 0.65E_2$) x ($1 - 0.25E_3$))] X 100 = 86.38 percent NET EFFICIENCY OF THE BMPs IN THE SERIES

EFFICIENCY OF FIRST BMP IN THE SERIES = E_1 = 75.00 percent

EFFICIENCY OF THE SECOND BMP IN THE SERIES = E_2 = 70.00 percent

EFFICIENCY OF THE THIRD BMP IN THE SERIES = E_3 = 0.00 percent

THEREFORE, THE NET LOAD REMOVAL WOULD BE:
(A_1 AND A_2, VALUES ARE FROM SECTION 3 ABOVE)

$L_R = E_{TOT}$ X P X (A_1 X 34.6 X A_2, X0.54) = 2999.58 lbs

20. Stormceptor

Required TSS Removal in BMP Drainage Area=	**NA**	lbs
Impervious Cover Overtreatment=	0.0000	ac
TSS Removal for Uncaptured Area =	0.00	lbs

BMP Sizing

Effective Area =	NA	EA
Calculated Model Size(s) =	#N/A	
Actual Model Size (if multiple values provided in Calculated Model Size or if you are choosing a larger model size) =	0	Model Size
Surface Area =	#N/A	ft^2
Overflow Rate =	#VALUE!	V_{or}
Rounded Overflow Rate =	#VALUE!	V_{or}
BMP Efficiency % =	#VALUE!	%
L_R Value =	#VALUE!	lbs
TSS Load Credit =	#VALUE!	lbs
Is Sufficient Treatment Available? (TSS Credit ≥ TSS Uncapt.)	#VALUE!	
TSS Treatment by BMP (LM + TSS Uncapt.) =	#VALUE!	

21. Vortech

Required TSS Removal in BMP Drainage Area=	**NA**	lbs
Impervious Cover Overtreatment=	0.0000	ac
TSS Removal for Uncaptured Area =	0.00	lbs

BMP Sizing

Effective Area =	NA	EA
Calculated Model Size(s) =	#N/A	
Actual Model Size (if choosing larger model size) =	Vx1000	Pick Model Size
Surface Area =	7.10	ft^2
Overflow Rate =	#VALUE!	V_{or}
Rounded Overflow Rate =	#VALUE!	V_{or}
BMP Efficiency % =	#VALUE!	%
L_R Value =	#VALUE!	lbs
TSS Load Credit =	#VALUE!	lbs
Is Sufficient Treatment Available? (TSS Credit ≥ TSS Uncapt.)	#VALUE!	
TSS Treatment by BMP (LM + TSS Uncapt.) =	#VALUE!	

04/26/2023

Temporary Stormwater Section

Texas Commission on Environmental Quality

for Regulated Activities on the Edwards Aquifer Recharge Zone and Relating to 30 TAC §213.5(b)(4)(A), (B), (D)(I) and (G); Effective June 1, 1999

To ensure that the application is administratively complete, confirm that all fields in the form are complete, verify that all requested information is provided, consistently reference the same site and contact person in all forms in the application, and ensure forms are signed by the appropriate party.

Note: Including all the information requested in the form and attachments contributes to more streamlined technical reviews.

Signature

To the best of my knowledge, the responses to this form accurately reflect all information requested concerning the proposed regulated activities and methods to protect the Edwards Aquifer. This **Temporary Stormwater Section** is hereby submitted for TCEQ review and executive director approval. The application was prepared by:

Print Name of Customer/Agent: Trevor Tast, P.E.

Date: 2023-04-26

Signature of Customer/Agent:

Regulated Entity Name: Hilltop RV LLC

Project Information

Potential Sources of Contamination

Examples: Fuel storage and use, chemical storage and use, use of asphaltic products, construction vehicles tracking onto public roads, and existing solid waste.

1. Fuels for construction equipment and hazardous substances which will be used during construction:

   ☐ The following fuels and/or hazardous substances will be stored on the site: _____

   These fuels and/or hazardous substances will be stored in:

   ☐ Aboveground storage tanks with a cumulative storage capacity of less than 250 gallons will be stored on the site for less than one (1) year.

☐ Aboveground storage tanks with a cumulative storage capacity between 250 gallons and 499 gallons will be stored on the site for less than one (1) year.

☐ Aboveground storage tanks with a cumulative storage capacity of 500 gallons or more will be stored on the site. An Aboveground Storage Tank Facility Plan application must be submitted to the appropriate regional office of the TCEQ prior to moving the tanks onto the project.

☒ Fuels and hazardous substances will not be stored on the site.

2. ☒ **Attachment A - Spill Response Actions**. A site specific description of the measures to be taken to contain any spill of hydrocarbons or hazardous substances is attached.

3. ☒ Temporary aboveground storage tank systems of 250 gallons or more cumulative storage capacity must be located a minimum horizontal distance of 150 feet from any domestic, industrial, irrigation, or public water supply well, or other sensitive feature.

4. ☒ **Attachment B - Potential Sources of Contamination**. A description of any activities or processes which may be a potential source of contamination affecting surface water quality is attached.

Sequence of Construction

5. ☒ **Attachment C - Sequence of Major Activities**. A description of the sequence of major activities which will disturb soils for major portions of the site (grubbing, excavation, grading, utilities, and infrastructure installation) is attached.

   ☒ For each activity described, an estimate (in acres) of the total area of the site to be disturbed by each activity is given.

   ☒ For each activity described, include a description of appropriate temporary control measures and the general timing (or sequence) during the construction process that the measures will be implemented.

6. ☒ Name the receiving water(s) at or near the site which will be disturbed or which will receive discharges from disturbed areas of the project: Tom Creek

Temporary Best Management Practices (TBMPs)

Erosion control examples: tree protection, interceptor swales, level spreaders, outlet stabilization, blankets or matting, mulch, and sod. Sediment control examples: stabilized construction exit, silt fence, filter dikes, rock berms, buffer strips, sediment traps, and sediment basins. Please refer to the Technical Guidance Manual for guidelines and specifications. All structural BMPs must be shown on the site plan.

7. ☒ **Attachment D – Temporary Best Management Practices and Measures**. TBMPs and measures will prevent pollution of surface water, groundwater, and stormwater. The construction-phase BMPs for erosion and sediment controls have been designed to retain sediment on site to the extent practicable. The following information is attached:

☒ A description of how BMPs and measures will prevent pollution of surface water, groundwater or stormwater that originates upgradient from the site and flows across the site.

☒ A description of how BMPs and measures will prevent pollution of surface water or groundwater that originates on-site or flows off site, including pollution caused by contaminated stormwater runoff from the site.

☒ A description of how BMPs and measures will prevent pollutants from entering surface streams, sensitive features, or the aquifer.

☒ A description of how, to the maximum extent practicable, BMPs and measures will maintain flow to naturally-occurring sensitive features identified in either the geologic assessment, TCEQ inspections, or during excavation, blasting, or construction.

8. ☒ The temporary sealing of a naturally-occurring sensitive feature which accepts recharge to the Edwards Aquifer as a temporary pollution abatement measure during active construction should be avoided.

☐ **Attachment E - Request to Temporarily Seal a Feature**. A request to temporarily seal a feature is attached. The request includes justification as to why no reasonable and practicable alternative exists for each feature.

☒ There will be no temporary sealing of naturally-occurring sensitive features on the site.

9. ☒ **Attachment F - Structural Practices**. A description of the structural practices that will be used to divert flows away from exposed soils, to store flows, or to otherwise limit runoff discharge of pollutants from exposed areas of the site is attached. Placement of structural practices in floodplains has been avoided.

10. ☒ **Attachment G - Drainage Area Map**. A drainage area map supporting the following requirements is attached:

☐ For areas that will have more than 10 acres within a common drainage area disturbed at one time, a sediment basin will be provided.

☐ For areas that will have more than 10 acres within a common drainage area disturbed at one time, a smaller sediment basin and/or sediment trap(s) will be used.

☒ For areas that will have more than 10 acres within a common drainage area disturbed at one time, a sediment basin or other equivalent controls are not attainable, but other TBMPs and measures will be used in combination to protect down slope and side slope boundaries of the construction area.

☐ There are no areas greater than 10 acres within a common drainage area that will be disturbed at one time. A smaller sediment basin and/or sediment trap(s) will be used in combination with other erosion and sediment controls within each disturbed drainage area.

☐ There are no areas greater than 10 acres within a common drainage area that will be disturbed at one time. Erosion and sediment controls other than sediment basins or sediment traps within each disturbed drainage area will be used.

11. ☐ **Attachment H - Temporary Sediment Pond(s) Plans and Calculations**. Temporary sediment pond or basin construction plans and design calculations for a proposed temporary BMP or measure have been prepared by or under the direct supervision of a Texas Licensed Professional Engineer. All construction plans and design information must be signed, sealed, and dated by the Texas Licensed Professional Engineer. Construction plans for the proposed temporary BMPs and measures are attached.

☒ N/A

12. ☒ **Attachment I - Inspection and Maintenance for BMPs.** A plan for the inspection of each temporary BMP(s) and measure(s) and for their timely maintenance, repairs, and, if necessary, retrofit is attached. A description of the documentation procedures, recordkeeping practices, and inspection frequency are included in the plan and are specific to the site and/or BMP.

13. ☒ All control measures must be properly selected, installed, and maintained in accordance with the manufacturer's specifications and good engineering practices. If periodic inspections by the applicant or the executive director, or other information indicate a control has been used inappropriately, or incorrectly, the applicant must replace or modify the control for site situations.

14. ☒ If sediment escapes the construction site, off-site accumulations of sediment must be removed at a frequency sufficient to minimize offsite impacts to water quality (e.g., fugitive sediment in street being washed into surface streams or sensitive features by the next rain).

15. ☒ Sediment must be removed from sediment traps or sedimentation ponds not later than when design capacity has been reduced by 50%. A permanent stake will be provided that can indicate when the sediment occupies 50% of the basin volume.

16. ☒ Litter, construction debris, and construction chemicals exposed to stormwater shall be prevented from becoming a pollutant source for stormwater discharges (e.g., screening outfalls, picked up daily).

Soil Stabilization Practices

Examples: establishment of temporary vegetation, establishment of permanent vegetation, mulching, geotextiles, sod stabilization, vegetative buffer strips, protection of trees, or preservation of mature vegetation.

17. ☒ **Attachment J - Schedule of Interim and Permanent Soil Stabilization Practices**. A schedule of the interim and permanent soil stabilization practices for the site is attached.

18. ☒ Records must be kept at the site of the dates when major grading activities occur, the dates when construction activities temporarily or permanently cease on a portion of the site, and the dates when stabilization measures are initiated.

19. ☒ Stabilization practices must be initiated as soon as practicable where construction activities have temporarily or permanently ceased.

Administrative Information

20. ☒ All structural controls will be inspected and maintained according to the submitted and approved operation and maintenance plan for the project.

21. ☒ If any geologic or manmade features, such as caves, faults, sinkholes, etc., are discovered, all regulated activities near the feature will be immediately suspended. The appropriate TCEQ Regional Office shall be immediately notified. Regulated activities must cease and not continue until the TCEQ has reviewed and approved the methods proposed to protect the aquifer from any adverse impacts.

22. ☒ Silt fences, diversion berms, and other temporary erosion and sediment controls will be constructed and maintained as appropriate to prevent pollutants from entering sensitive features discovered during construction.

Temporary Stormwater Section - Attachment A

Spill Response Action

The following steps shall help reduce the stormwater impacts of leaks and spills:

The contractor shall be aware that different materials pollute in different amounts. Make sure that each employee knows what a "significant spill" is for each material they use, and what is an appropriate response for "significant" and "insignificant" spills. Employees should also be aware of when spill must be reported to the TCEQ. Information available in 30 TAC 327.4 and 40 CFR 302.4. Have contractor's superintendent or representative oversee and enforce proper spill prevention and control measures.

More information on spill rules and appropriate responses is available on the TCEQ website at http://www.tnrcc.state.tx.us/enforcement/emergency_response.html

General:

- To the extent that the work can be accomplished safely, spills of oil, petroleum products, substances listed under 40 CFR parts 110, 117, and 302, and sanitary and septic wastes should be contained and cleaned up immediately.
- Store hazardous materials and wastes in covered containers and protect form vandalism.
- Place a stockpile of spill cleanup materials where it shall be readily accessible.
- Train employees in spill prevention and cleanup.
- Designate responsible individuals to oversee and enforce control measures.
- Spills should be covered and protected from stormwater runon during rainfall to the extent that it doesn't compromise clean up activities.
- Do not bury or wash spills with water.
- Store and dispose of used clean up materials, contaminated materials, and recovered spill material that is no longer suitable for the intended purpose in conformance with the provisions in applicable BMPs.
- Do not allow water used for cleaning and decontamination to enter storm drains or watercourses. Collect and dispose of contaminated water in accordance with applicable regulations.
- Contain water overflow or minor water spillage and do not allow it to discharge into drainage facilities or watercourses.
- Place Material Safety Data Sheets (MSDS), as well as proper storage, cleanup, and spill reporting instructions for hazardous materials stored or used on the project site in an open, conspicuous, and accessible location.
- Keep waste storage areas clean, well organized, and equipment with ample cleanup supplies as appropriate for the materials being stored. Perimeter controls, containment structures, covers, and liners should be repaired or replaced as needed to maintain proper function.

Cleanup:

- Spills shall be cleaned immediately.
- Use a rag for small spills on paved surfaces, a damp mop for general mop for general cleanup, and absorbent material for larger spills. All hazardous materials must be disposed of as hazardous waste.

- Never hose down or bury dry material spills. Clean up as much as the material as possible and dispose of properly. See the waste management BMPs in this section for specific information.

Minor Spills:

- Minor spills typically involve small quantities of oil, gasoline, paint, etc. which can be controlled by the first responder at the discovery of the spill.
- Use absorbent material on small spills rather than hosing down or burying the spill. Absorbent material should be promptly removed and disposed of properly.
- Follow the practice below for a minor spill:
- Contain the spread of the spill.
- Recover spilled material.
- Clean the contaminated area and properly dispose of contaminated materials.

Semi-Significant Spills:

Semi-significant spills still can be controlled by the first responder along with the aid of other personnel such as laborers and the foreman, etc. This response may require the cessation of all other activities.

Spills should be cleaned up immediately:

- Contain spread of the spill
- Notify the project foreman immediately.
- If the spill occurs on paved or impermeable surfaces, clean up using “dry” methods (absorbent materials, cat litter and/or rags). Contain the spill by encircling with absorbent materials and do not let the spill spread widely.
- If the spill occurs in dirt areas, immediately contain the spill be constructing an earthen dike. Dig up and properly dispose of contaminated soil.
- If the spill occurs during rain, cover spill with tarps or other material to prevent contaminating runoff.

Significant/Hazardous Spills:

For significant or hazardous spills that are in reportable quantities:

- Notify the TCEQ by telephone as soon as possible and within 24 hours at 512-339-2929 (Austin) or 210-490-3096 (San Antonio) between 8 AM and 5 PM. After hours, contact the Environmental Release Hotline at 1-800-832-8224. It is the contractor’s responsibility to have all emergency phone numbers at the construction site.
- For spills of federal reportable quantities, in conformance with the requirements in 40 CFR parts 110, 119, and 302, the contractor should notify the National Response Center at (800) 424-8802.
- Notification should first be made by telephone and followed up with a written report.
- The services of a spills contractor or a Haz-Mat team should be obtained immediately. Construction personnel should not attempt to clean up until the appropriate and qualified staffs have arrived at the job site.
- Other agencies which may need to be consulted include, but are not limited to, the County Sheriff Office, Fire Departments, etc.

Temporary Stormwater Section - Attachment B

Potential Sources of Contamination

- **Source**: Construction Equipment and other Vehicle leaks: Oil, grease, fuel and hydraulic fluids
    - **Preventative measure**: Lubrication and fueling shall be performed in a designated area. This area shall be monitored daily for contamination.

- **Source**: Miscellaneous trash and litter form construction workers.
    - **Preventative measure**: Designated containers shall be located on site for trash disposal.

- **Source**: Construction debris.
    - **Preventative measure**: Debris shall be collected weekly and deposited in on site bins for offsite disposal. Situations requiring immediate attention shall be handled on a case by case basis.

- **Source**: Asphalt products.
    - **Preventative measure**: After placement of asphalt, emulsion or coatings, the contractor shall be responsible for immediate cleanup should an unexpected rain occur. For the duration of the asphalt product curing time, the contractor shall maintain standby personnel and equipment to maintain and asphalt wash-off should and unexpected rain occurs. The contractor shall be instructed not to place asphalt products on the ground within 48 hours of a forecasted rain.

- **Source**: Tar, fertilizers, cleaning solvents, detergents, and petroleum-based products.
    - **Preventative measure**: The contractor shall be responsible for immediate cleanup should an unexpected rain occur. Debris shall be collected weekly and deposited in on site bins for offsite disposal. Situations requiring immediate attention shall be handled on a case by case basis.

Temporary Stormwater Section - Attachment C

Sequence of Major Activities

1. Install erosion and sedimentation controls as indicated on the construction plan(s) and as directed by agencies having authority in the project area.
2. Construct, proposed development site work included but not limited to, pavement, and utilities.
3. Install landscaping, vegetated blankets, or hydro-mulch to exposed areas
4. Re-vegetate disturbed areas
5. Remove temporary erosion and sedimentation controls
6. Vertical construction.

Construction entrances for site shall be accessed from FM 2673.

Temporary Stormwater Section - Attachment D

Temporary Best Management Practices and Measures

All Temporary BMPs shall be installed prior to the beginning of site preparation and construction activities as per the Storm Water Pollution Prevention Plan. The TBMPs shall remain in place and shall be maintained until all construction has ceased and a perennial vegetative cover with a density of 70 percent has been established.

a) Description of BMPs and measures to prevent pollution of surface water, groundwater or stormwater that originates upgradient from the site and flows across the site: Stabilized Construction Entrance, Silt fences and rock berms shall be utilized for these purposes.

b) Description of BMPs and measures to prevent pollution of surface water or groundwater that originates on-site or flows off site, including pollution caused by contaminated stormwater runoff from the site: Stabilized Construction Entrance, Silt fences and rock berms shall be utilized for these purposes.

c) Surface stream and feature protection: A 50-foot radius natural buffer zone adjacent to and upgradient of any sensitive features shall remain undisturbed so that rainfall may continue to enter the feature. The natural vegetated areas shall ensure that pre-development stormwater quantity and quality shall continue to recharge the aquifer via the feature. Rock berms shall be placed downgradient of all construction activities so that potentially contaminated stormwater may be treated before leaving the sited and entering downstream surface water.

d) Naturally occurring sensitive features protection: No construction shall occur within a 50-foot radius of naturally-occurring sensitive features. The vegetative buffer zone shall serve as both TMBP and BMP for the sensitive features. In the case that construction activities occur upgradient of a sensitive feature (greater than the 50-foot radius) the disturbed soils shall be protected from erosion by silt fences as outlined above.

Temporary Stormwater Section - Attachment E

Request to Temporarily Seal a Feature

NOT APPLICABLE

Temporary Stormwater Section - Attachment F

Structural Practices

The structural practices that shall limit runoff discharge of pollutants form exposed areas of the site shall be the use of a stabilized construction entrance, rock berms and silt fences to prevent the excavated material from leaving the site.

Temporary Stormwater Section - Attachment G

Drainage Area Map

Silt fences shall be used to limit pollutant discharges prior to becoming concentrated channel flow.

Rock berms shall be used to limit runoff discharge of pollutants from the site in channelized conditions.

Temporary Stormwater Section - Attachment H

Temporary Sediment Pond(s) Plans and Calculations

NOT APPLICABLE

Temporary Stormwater Section - Attachment I

Inspection and Maintenance for BMPs

The BMPs for the construction of this project shall be the use of rock berms and silt fencing. The following inspection and maintenance procedures shall be implemented:

1. Stabilized Construction Entrance/Exit, Silt fencing and rock berms must be in place prior to the start of construction and shall remain in place until construction has been complete and the site stabilized from further erosion.

2. The contractor shall inspect the rock berms and silt fencing at least once a week and within 24 hours of a storm of 0.5 inches or more in depth. The contractor shall repair or replace any damaged TBMPs. The contractor shall correct damage or deficiencies as soon as practical after the inspection but no later than 7 days after the inspection.
   a. Rock Berms:
      1. Contractor shall remove sediment and other debris when buildup reaches 6 inches and dispose of the accumulated silt in an approval manner that shall not cause any additional siltation.
      2. The berm should be replaced when the structures ceases to function as intended due to silt accumulation among the rocks, washout, construction traffic damage, etc.
      3. Inspection should be made weekly and after each rainfall by the responsible party.
      4. For installations in streambeds, additional daily inspections should be made.
      5. Repair any loose wire sheathing
      6. The berm should be reshaped as needed during inspection
      7. The rock berm should be left in place until all upstream areas are stabilized and accumulated silt removed.
   b. Temporary Construction Entrance/Exit:
      1. All sediment spilled, dropped, washed or tracked onto public right-of-way
         should be removed immediately by contractor.
      2. When necessary, wheels should be cleaned to remove sediment prior to
         entrance onto right-of-way.
      3. When washing is required, it should be done on an area stabilized with crushed stone that drains into an approved sediment trap or sediment basin.
      4. The entrance should be maintained in a condition, which shall prevent tracking or flowing of sediment onto public rights-of-way. This may require periodic top dressing with additional stone as conditions demand and repair and/or cleanout of any measures used to trap sediments.
      5. All sediment should be prevented from entering any storm drain, ditch or water course by using approved methods.

c. For Silt Fence:
    1. Remove sediment when buildup reaches 6 inches.
    2. When construction is complete, the sediment should be disposed of in a manner that shall not cause additional siltation and the prior location if the silt fence should be revegetated. The fence itself should be disposed of in an approved landfill.
    3. Inspect all fencing weekly and after any rainfall
    4. Replace any torn fabric or install a second line of fencing parallel to the torn section
    5. Replace or repair any sections crushed or collapsed in the course of construction activity. If a section of fence is obstructing vehicular access, consider relocating it to a spot where it shall provide equal protection, but shall not obstruct vehicles. A triangular filter dike may be preferable to a silt fence at common vehicle access points.

3. Contractor shall place trench excavation on the upgradient side of the trench.

4. All soil, sand, gravel, and excavated material stockpiled on-site shall have appropriately sized silt fencing placed upgradient and down gradient.

5. The contractor shall keep a record of the weekly inspections, noting the condition of the rock berms, silt fencing and construction entrance and any corrective action taken to maintain the erosion control structures. In addition to the inspection and maintenance reports, the operator should keep records of the construction activity on-site, in particular, the following information should be kept.

    a. The dates when major grading activities occur in a particular area.

    b. The dates when construction activities cease in an area, temporarily or permanently.

    c. The dates when an area is stabilized, temporarily or permanently.

    d. Records to be maintained in SWPPP.

Temporary Stormwater Section - Attachment J

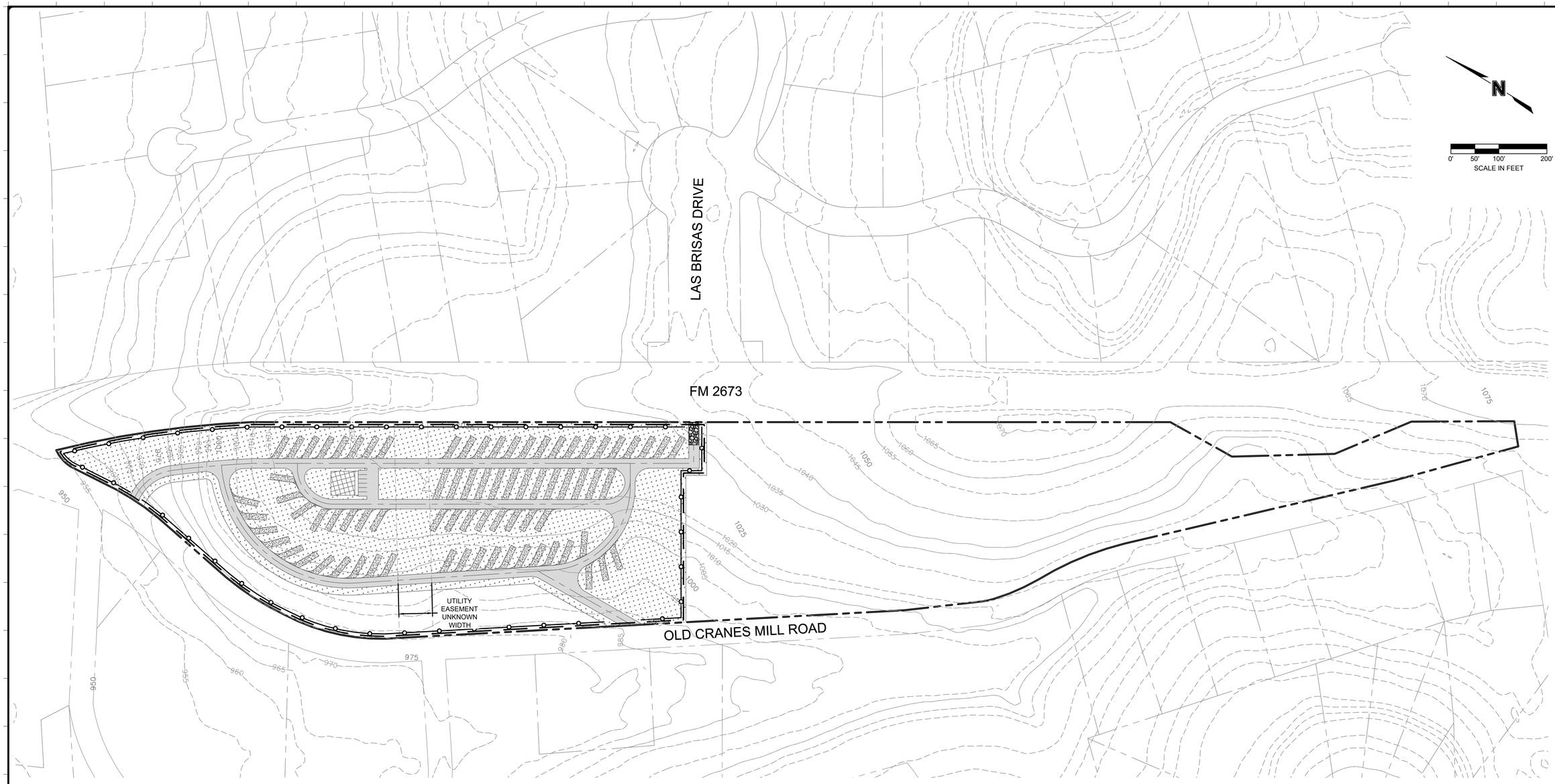
Schedule of Interim and Permanent Soil Stabilization Practices

The schedule of interim and permanent soil stabilization shall be as follows:

1. Once construction of the project has commenced, the construction activity is planned to continue until the project is complete. The water, electrical, cable TV and telephone trenches shall be excavated. The trenches shall then be re-excavated and the water, electrical, cable TV and telephone lines shall be installed. This work is intended to continue until all the lines are installed. The utility lines are located within the project boundaries as shown on the site plan. As soon as the underground utilities are installed, the road base shall be installed and compacted providing the interim soil stabilization for the paved area and the permanent soil stabilization for the parking areas. Once the individual residential buildings are built and landscaped this shall provide permanent soil stabilization for the building areas.

2. Much of the excavation for this project shall be in solid rock, helping to minimize the amount of loose soil which has the potential to become suspended in runoff and washed downstream.

3. Stabilization measures shall be initiated as soon as practicable in portions of the site where construction activities have temporarily or permanently ceased, but in no case more than 14 days after the construction activity in that portion of the site has temporary or permanently ceased. Where the initiation of stabilization measures by the 14th day after construction activity temporary or permanently cease in precluded by weather conditions, stabilization measures shall be initiated as soon as practicable. Where construction activity on a portion of the site is temporarily ceased, and earth disturbing activities shall be resumed within 21 days, temporary stabilization measures do not have to be initiated on that portion of site. In areas experiencing droughts where the initiation of stabilization measures by the 14th day after construction activity has temporarily or permanently ceased is precluded by seasonal arid conditions, stabilization measures shall be initiated as soon as practicable.



LEGEND

- PROPERTY LINE
- EXISTING ADJACENT LOT
- PROPOSED EDGE OF PAVEMENT
- PROPOSED ROAD CENTERLINE
- SEDIMENT FENCE
- LIMITS OF DISTURBANCE
- PROPOSED GRAVEL PAVEMENT
- PROPOSED CONCRETE PAVEMENT
- PROPOSED BUILDING
- PROPOSED PERMANENT STRUCTURAL BMP (VEGETATIVE BUFFER STRIPS)
- TEMPORARY CONSTRUCTION ENTRANCE

SITEPLAN NOTES:

1. SITEPLAN
   - 1.1. RV SLIPS:
     - 1.1.1. BACK IN: 65
     - 1.1.2. PULL THRU: 15
   - 1.2. AMENITY AREA: 1 - 50'X50' BUILDING

NOTES:

1. THE PROPOSED SITEPLAN WAS DEVELOPED AND DRAWN BASED OFF OF AVAILABLE LIDAR DATA.
2. A SURVEY HAS NOT BEEN PERFORMED BY THE ENGINEER OR THEIR SURVEYOR AND ONE WAS NOT PROVIDED AT TIME OF PREPARATION OF EXHIBIT(S).
3. A TITLE REPORT HAS NOT BEEN PROVIDED TO THE ENGINEER AT TIME OF PREPARATION.
4. FIRE ACCESS IS SHOWN AT 20' WIDTH.

KNOW WHAT'S BELOW. 811 BEFORE YOU DIG.

TX2 ENGINEERING
FIRM #: 20787

CONTACT:

645 FLORAL AVE, STE C
NEW BRAUNFELS, TX 78130

TEL: (830) 327-1235

STATE OF TEXAS
TREVOR N. TAST
124101
LICENSED
PROFESSIONAL ENGINEER

04/26/2023

STORM WATER POLLUTION PREVENTION PLAN

LAS BRISAS
TCEQ CZP
COMAL COUNTY, TX. 78133

REVISIONS

REV.	DATE	DESCRIPTION	BY

DRAWN BY:	MA
QA/QC BY:	TNT
PROJECT NO.:	022-0054
PERMIT #:	

C4.0

SHEET

DWG: Z:\022-0054 Las Brisas FM 2673\40-Design\AutoCAD\Final Plans\Sheets\LDVP\Las Brisas - SWPPP.dwg USER: EvanCalhoun
DATE: Apr 26, 2023 11:51am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

DWG: Z:\022-0054 Las Brisas FM 2673\40-Design\AutoCAD\Final Plans\Sheets\LDVP\Las Brisas - SWPPP.dwg USER: EvanCalhoun
DATE: Apr 26, 2023 11:51am XREFS: TBLK_24X36 Las Brisas - EBASE Las Brisas - PBASE

Agent Authorization Form
For Required Signature
Edwards Aquifer Protection Program
Relating to 30 TAC Chapter 213
Effective June 1, 1999

I DONALD BURKHARDT,
Print Name

_____,
Title - Owner/President/Other

of _____,
Corporation/Partnership/Entity Name

have authorized TREVOR TAST, P.E.
Print Name of Agent/Engineer

of TX2 ENGINEERING
Print Name of Firm

to represent and act on the behalf of the above named Corporation, Partnership, or Entity for the purpose of preparing and submitting this plan application to the Texas Commission on Environmental Quality (TCEQ) for the review and approval consideration of regulated activities.

I also understand that:

1. The applicant is responsible for compliance with 30 Texas Administrative Code Chapter 213 and any condition of the TCEQ's approval letter. The TCEQ is authorized to assess administrative penalties of up to $10,000 per day per violation.

2. For those submitting an application who are not the property owner, but who have the right to control and possess the property, additional authorization is required from the owner.

3. Application fees are due and payable at the time the application is submitted. The application fee must be sent to the TCEQ cashier or to the appropriate regional office. The application will not be considered until the correct fee is received by the commission.

4. A notarized copy of the Agent Authorization Form must be provided for the person preparing the application, and this form must accompany the completed application.

5. No person shall commence any regulated activity on the Edwards Aquifer Recharge Zone, Contributing Zone or Transition Zone until the appropriate application for the activity has been filed with and approved by the Executive Director.

SIGNATURE PAGE:

Donald R Burkhardt 4-19-23

Applicant's Signature Date

THE STATE OF Texas §

County of Comal §

BEFORE ME, the undersigned authority, on this day personally appeared Donald Burkhardt known to me to be the person whose name is subscribed to the foregoing instrument, and acknowledged to me that (s)he executed same for the purpose and consideration therein expressed.

GIVEN under my hand and seal of office on this 19 day of April, 2023

PRISCILLA K CARNES
NOTARY PUBLIC
STATE OF TEXAS
MY COMM. EXP. 01/10/27
NOTARY ID 13413525-6

Priscilla K Carnes

NOTARY PUBLIC

Priscilla K Carnes

Typed or Printed Name of Notary

MY COMMISSION EXPIRES: 1-10-2027

Application Fee Form

Texas Commission on Environmental Quality
Name of Proposed Regulated Entity: Hilltop RV LLC
Regulated Entity Location: 9089 FM 2673 Canyon Lake. TX 78133
Name of Customer: Hilltop RV LLC
Contact Person: Donald Burkardt Phone: 713-724-6339
Customer Reference Number (if issued):CN N/A
Regulated Entity Reference Number (if issued):RN N/A

Austin Regional Office (3373)

☐ Hays ☐ Travis ☐ Williamson

San Antonio Regional Office (3362)

☐ Bexar ☐ Medina ☐ Uvalde
☒ Comal ☐ Kinney

Application fees must be paid by check, certified check, or money order, payable to the **Texas Commission on Environmental Quality**. Your canceled check will serve as your receipt. **This form must be submitted with your fee payment**. This payment is being submitted to:

☐ Austin Regional Office
☐ Mailed to: TCEQ - Cashier
Revenues Section
Mail Code 214
P.O. Box 13088
Austin, TX 78711-3088

☒ San Antonio Regional Office
☐ Overnight Delivery to: TCEQ - Cashier
12100 Park 35 Circle
Building A, 3rd Floor
Austin, TX 78753
(512)239-0357

Site Location (Check All That Apply):

☐ Recharge Zone ☒ Contributing Zone ☐ Transition Zone

Type of Plan	***Size***	***Fee Due***
Water Pollution Abatement Plan, Contributing Zone Plan: One Single Family Residential Dwelling	Acres	$
Water Pollution Abatement Plan, Contributing Zone Plan: Multiple Single Family Residential and Parks	Acres	$
Water Pollution Abatement Plan, Contributing Zone Plan: Non-residential	20.79 Acres	$ 6,500
Sewage Collection System	L.F.	$
Lift Stations without sewer lines	Acres	$
Underground or Aboveground Storage Tank Facility	Tanks	$
Piping System(s)(only)	Each	$
Exception	Each	$
Extension of Time	Each	$

Signature: _____ Date: 2023-04-26

Application Fee Schedule

Texas Commission on Environmental Quality
Edwards Aquifer Protection Program 30 TAC Chapter 213 (effective 05/01/2008)

Water Pollution Abatement Plans and Modifications

Contributing Zone Plans and Modifications

Project	*Project Area in Acres*	*Fee*
One Single Family Residential Dwelling	< 5	$650
Multiple Single Family Residential and Parks	< 5 5 < 10 10 < 40 40 < 100 100 < 500 ≥ 500	$1,500 $3,000 $4,000 $6,500 $8,000 $10,000
Non-residential (Commercial, industrial, institutional, multi-family residential, schools, and other sites where regulated activities will occur)	< 1 1 < 5 5 < 10 10 < 40 40 < 100 ≥ 100	$3,000 $4,000 $5,000 $6,500 $8,000 $10,000

Organized Sewage Collection Systems and Modifications

Project	*Cost per Linear Foot*	*Minimum Fee-Maximum Fee*
Sewage Collection Systems	$0.50	$650 - $6,500

Underground and Aboveground Storage Tank System Facility Plans and Modifications

Project	*Cost per Tank or Piping System*	*Minimum Fee-Maximum Fee*
Underground and Aboveground Storage Tank Facility	$650	$650 - $6,500

Exception Requests

Project	*Fee*
Exception Request	$500

Extension of Time Requests

Project	*Fee*
Extension of Time Request	$150

TCEQ Use Only
13001762 CZP

TCEQ Core Data Form

For detailed instructions on completing this form, please read the Core Data Form Instructions or call 512-239-5175.

SECTION I: General Information

1. Reason for Submission (*If other is checked please describe in space provided.*)

☒ New Permit, Registration or Authorization (*Core Data Form should be submitted with the program application.*)

☐ Renewal *(Core Data Form should be submitted with the renewal form)* ☐ Other

2. Customer Reference Number *(if issued)*	Follow this link to search for CN or RN numbers in Central Registry**	**3. Regulated Entity Reference Number** *(if issued)*
CN 606145803		RN 111748042

SECTION II: Customer Information

4. General Customer Information	**5. Effective Date for Customer Information Updates** (mm/dd/yyyy)	

☒ New Customer ☐ Update to Customer Information ☐ Change in Regulated Entity Ownership
☐ Change in Legal Name (Verifiable with the Texas Secretary of State or Texas Comptroller of Public Accounts)

The Customer Name submitted here may be updated automatically based on what is current and active with the Texas Secretary of State (SOS) or Texas Comptroller of Public Accounts (CPA).

6. Customer Legal Name *(If an individual, print last name first: eg: Doe, John)* *If new Customer, enter previous Customer below:*

HILLTOP RV LLC

7. TX SOS/CPA Filing Number	**8. TX State Tax ID** (11 digits)	**9. Federal Tax ID** (9 digits)	**10. DUNS Number** *(if applicable)*
~~32087944966~~ 80488466	32087944966	92-1806364	

11. Type of Customer: ☒ Corporation ☐ Individual Partnership: ☐ General ☐ Limited
Government: ☐ City ☐ County ☐ Federal ☐ Local ☐ State ☐ Other ☐ Sole Proprietorship ☐ Other:

12. Number of Employees
☒ 0-20 ☐ 21-100 ☐ 101-250 ☐ 251-500 ☐ 501 and higher

13. Independently Owned and Operated?
☒ **Yes** ☐ **No**

14. Customer Role (Proposed or Actual) – *as it relates to the Regulated Entity listed on this form. Please check one of the following*

☒ Owner ☐ Operator ☐ Owner & Operator
☐ Occupational Licensee ☐ Responsible Party ☐ VCP/BSA Applicant ☐ Other:

15. Mailing Address:	15794 CRANES MILL ROAD						
	City	CANYON LAKE	**State**	TX	**ZIP**	78133	**ZIP + 4**

16. Country Mailing Information *(if outside USA)*	**17. E-Mail Address** *(if applicable)*
N/A	CURRANPAT380@GMAIL.COM

18. Telephone Number	**19. Extension or Code**	**20. Fax Number** *(if applicable)*

(713) 724-6339	N/A	N/A

SECTION III: Regulated Entity Information

21. General Regulated Entity Information *(If 'New Regulated Entity" is selected, a new permit application is also required.)*

☒ New Regulated Entity ☐ Update to Regulated Entity Name ☐ Update to Regulated Entity Information

The Regulated Entity Name submitted may be updated, in order to meet TCEQ Core Data Standards (removal of organizational endings such as Inc, LP, or LLC).

22. Regulated Entity Name *(Enter name of the site where the regulated action is taking place.)*

HILLTOP RV PARK ~~LLC~~

23. Street Address of the Regulated Entity: ***(No PO Boxes)***	9089 FM 2673							
		City	CANYON LAKE	**State**	TX	**ZIP**	78133	**ZIP + 4**	
24. County	Comal							

If no Street Address is provided, fields 25-28 are required.

25. Description to Physical Location:

From TCEQ San Antonio Regional office (145250 Judson Road San Antonio, TX 78233):

Take Nacogdoches Rd North approximately 6 miles to FM3009

Turn North on FM3009 for approximately 12.1 miles to TX-46

Turn West on TX-46 for approximately 2.8 miles to FM311

Turn North on FM311 for approximately 1.0 mile to FM3159

Turn East on FM3159 for approximately 4.8 miles to Startz Rd

Turn left on Startz Rd for approximately 0.4 mile to FM2673

Turn West on FM2673 for approximately 0.2 mile to the property entrance on the South side of the road.

26. Nearest City	**State**	**Nearest ZIP Code**
Sattler	TX	78133

Latitude/Longitude are required and may be added/updated to meet TCEQ Core Data Standards. (Geocoding of the Physical Address may be used to supply coordinates where none have been provided or to gain accuracy).

27. Latitude (N) In Decimal:	29.851124		**28. Longitude (W) In Decimal:**	-98.280395	
Degrees	Minutes	Seconds	Degrees	Minutes	Seconds
29	51	04.1	98	16	49.4

29. Primary SIC Code (4 digits)	**30. Secondary SIC Code** (4 digits)	**31. Primary NAICS Code** (5 or 6 digits)	**32. Secondary NAICS Code** (5 or 6 digits)
7033	7032	721211	721214

33. What is the Primary Business of this entity? *(Do not repeat the SIC or NAICS description.)*

RV Park

34. Mailing Address:	15794 CRANES MILL ROAD

	City	CANYON LAKE	State	TX	ZIP	78133	ZIP + 4	
35. E-Mail Address:	CURRANPAT380@GMAIL.COM							
36. Telephone Number		**37. Extension or Code**		**38. Fax Number** *(if applicable)*				
(713) 724-6339		N/A		N/A				

39. TCEQ Programs and ID Numbers Check all Programs and write in the permits/registration numbers that will be affected by the updates submitted on this form. See the Core Data Form instructions for additional guidance.

☐ Dam Safety	☐ Districts	☐ Edwards Aquifer	☐ Emissions Inventory Air	☐ Industrial Hazardous Waste
☐ Municipal Solid Waste	☐ New Source Review Air	☐ OSSF	☐ Petroleum Storage Tank	☐ PWS
☐ Sludge	☐ Storm Water	☐ Title V Air	☐ Tires	☐ Used Oil
☐ Voluntary Cleanup	☐ Wastewater	☐ Wastewater Agriculture	☐ Water Rights	☐ Other:

SECTION IV: Preparer Information

40. Name:	Micahel Avery		**41. Title:**	Designer
42. Telephone Number	**43. Ext./Code**	**44. Fax Number**	**45. E-Mail Address**	
(830 **)** 327-1235		**( )** -	mavery@tx2engineering.com	

SECTION V: Authorized Signature

46. By my signature below, I certify, to the best of my knowledge, that the information provided in this form is true and complete, and that I have signature authority to submit this form on behalf of the entity specified in Section II, Field 6 and/or as required for the updates to the ID numbers identified in field 39.

Company:	TX2 Engineering	**Job Title:**	President
Name *(In Print):*	Trevor Tast, P.E.	**Phone:**	**(** 816 **)** 510- **9151**
Signature:		**Date:**	2023-04-26