

TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

Protecting Texas by Reducing and Preventing Pollution

June 6, 2011

Mr. Thomas H. Hornseth, P.E. Comal County Engineer 195 David Jonas Drive New Braunfels TX 78132-3710

Re: Edwards Aquifer, Comal County PROJECT NAME: Westpointe Village Phase II, located near Loop 337 and Highway 46, New Braunfels, Texas PLAN TYPE: Application for Approval of a Water Pollution Abatement Plan, 30 Texas Administration Code (TAC) Chapter 213; Edwards Aquifer Protection Program EAPP File No.: 2873.08

Dear Mr. Hornseth:

The referenced application is being forwarded to you pursuant to the Edwards Aquifer Rules. The Texas Commission on Environmental Quality (TCEQ) is required by 30 TAC Chapter 213 to provide copies of all applications to affected incorporated cities and underground water conservation districts for their comments prior to TCEQ approval.

Please forward your comments to this office by July 5, 2011.

The Texas Commission on Environmental Quality appreciates your assistance in this matter and your compliance efforts to ensure protection of the State's environment. If you or members of your staff have any questions regarding these matters, please feel free to contact the San Antonio Region Office at (210) 490-3096.

Sincerely

Todd Jones Water Section Work Leader San Antonio Regional Office

TJ/eg

TCEQ Region 13 • 14250 Judson Rd. • San Antonio, Texas 78233-4480 • 210-490-3096 • Fax 210-545-4329

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VICINITY MAP N.T.S. NEW BRAUNFELS, TEXAS	
DEVELOPER: NB RETAIL, LTD. 801 CONGRESS AVE, STE 300	
AUSTIN, TEXAS 78701 (512) 477–1212	
ATTN.: MR. WILLIAM VANDENBOSCH	
ENGINEER: BURY+PARTNERS, INC. 922 ISOM ROAD, SUITE 100	
SAN ANTONIO, TEXAS 78216 (210) 525–9090 ATTN.: ARMANDO NIEBLA, P.E.	
SURVEY PROVIDED BY: BURY+PARTNERS, INC.	
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Tel. (210)525-9090 Fax (210)525-0529 TBPE Registration Number F1048 Bury+Partners-SA, Inc. ©Copyright 2009	

WESTPOINTE VILLAGE SH 46 AND LOOP 337 NEW BRAUNFELS, TEXAS

WATER POLLUTION ABATEMENT PLAN

TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

WET POND NOTES:

1. CONTRACTOR IS TO CONSTRUCT ALL POND EMBANKMENT SECTIONS AND LINERS PER THE GEOTECHNICAL ENGINEERING STUDY FOR WESTPOINTE VILLAGE AS PREPARED BY TERRACON

2. WETLAND PLANTS PROVIDED IN BARE-ROOT FORM SHALL BE EQUAL IN ROOT BALL SIZE TO THE LISTED MINIMUM CONTAINER SIZES.

3. ALL WETLAND PLANTS WHICH FULFILL THE MINIMUM LANDSCAPE REQUIREMENTS SHALL BE PROPAGATED OR HARVESTED FROM REGIONALLY ADAPTED STOCK (WHENEVER POSSIBLE). THESE ARE PLANT SPECIES OR GENOTYPES WHICH ARE NATIVE TO A RANGE OF WITHIN 250 MILES OF THE PROJECT SITE.

4. A MINIMUM OF 90% OF THE VEGETATION SHALL BE ALIVE AND VIABLE FOR ONE YEAR FOLLOWING INSTALLATION.

5. WETLAND PLANTS MUST BE INSTALLED AT WATER DEPTHS APPROPRIATE TO THE SPECIES. THE WATER DEPTHS NOTED IN THE TABLE ON THIS SHEET SHOW THE RANGE OF NATURAL ZONES IN WHICH THESE PLANTS CAN BE FOUND. PLANTING DEPTHS ARE USUALLY SHALLOWER DUE TO THE SMALL SIZE OF THE PLANTS AT THE TIME OF INSTALLATION. IF USING THE MINIMUM-SIZED PLANT MATERIAL, PLANTS SHALL BE INSTALLED AT THE SHALLOW WATER DEPTH LISTED.

6. CATTAILS (TYPHA SPP.) TEND TO INVADE ALMOST ALL WETLANDS AND AGGRESSIVELY COLONIZE THE SHALLOW WATER BENCH. THEREFORE CATTAILS SHALL NOT BE SPECIFIED ON THE PLANTING PLAN.

7. THE DESIGNER IS NOT LIMITED TO THE SPECIES DESCRIBED. ADDITIONAL SPECIES USED FOR AESTHETIC REASONS, ETC. ARE ENCOURAGED. PLANTS NOT INTENDED TO MEET MINIMUM REQUIREMENTS DO NOT NEED TO BE NATIVE OR REGIONALLY ADAPTED STOCK.

8. MICROBIAL INITIATION: A SUBSTANTIAL PORTION OF THE POLLUTANT REMOVAL IN WET PONDS IS DUE TO BIOLOGICAL PROCESSES THAT OCCUR IN THE SEDIMENT. BACTERIA IN THE POND SUBSTRATE REMOVE NUTRIENTS THROUGH A PROCESS OF DENITRIFICATION. THESE MICROBIAL PROCESSES REQUIRE AN ORGANIC FOOD SOURCE, SUCH AS DECAYING PLANT LITTER. BECAUSE IT IS THE SUPPLY OF ORGANIC CARBON THAT DETERMINES NUTRIENT REMOVAL – MORE THAN UPTAKE BY LIVING PLANTS – DENIFITRICATION CAN BE EXPECTED TO CONTINUE EVEN DURING COLD WEATLED DI AND CONTACT TO CONTINUE EVEN DURING

COLD-WEATHER PLANT DORMANCY. IN MATURE PONDS WITH ABUNDANT VEGETATION, AQUATIC PLANTS SUPPLY THE NECESSARY LITTER LAYER AND AEROBIC ZONE FOR MICROBIAL ACTIVITY. HOWEVER, SINCE NEW PONDS LACK A SUFFICIENT SOURCE OF ORGANIC MATTER, AN APPROPRIATE AMOUNT OF CARBON (STRAW, HAY, LEAF CLIPPINGS, AND OTHER NON-WOODY MATERIAL) SHALL BE INSTALLED DURING CONSTRUCTION. AFTER THE POND LINER IS IN PLACE YET PRIOR TO ALLOWING THE POND TO BE FILLED, SPREAD A MINIMUM OF ONE INCH OF PLANT LITTER EVENLY ON THE SIDES OF THE POND (BELOW THE PERMANENT POOL LEVEL). TREAT THE ENTIRE SHALLOW WATER BENCH IN THIS THIS MANNER AND ALL POND SLOPES (RANGING FROM 3:1 TO 10:1). CRIMP THE PLANT LITTER INTO THE POND SUBSTRATE TO PREVENT THE MATERIAL FROM BEING TRANSPORTED DOWNSTREAM AS THE POND FILLS.

9. ALGAE: HIGH NUTRIENT LOADS IN WET PONDS MAY CAUSE ALGAE BLOOMS TO OCCUR. PUNGENT ODOR IS OFTEN ASSOCIATED WITH THESE ALGAE BLOOMS. HOWEVER, TREATING WITH AN ALGAECIDE IS NOT RECOMMENDED BECAUSE BLOOMS ARE USUALLY SHORT LIVED AND ARE CONSIDERED DESIRABLE FOR NUTRIENT REMOVAL. THE USE OF SUBMERGENTS AND FLOATING-LEAFED AQUATICS CAN REDUCE THE EXTENT OF ALGAE BLOOMS BY REDUCING NUTRIENT LOADS AND SHADING THE WATER.

10. NUTRIA: WILDLIFE, SUCH AS NUTRIAS, HAS BEEN REPORTED TO DESTROY THE VEGETATED ELEMENT OF WET PONDS. EVALUATION OF THE POTENTIAL OF SUCH WILDLIFE INHABITING OR BEING ATTRACTED TO THE PROPOSED POND SITE IS REQUIRED. WHEN THERE IS A POTENTIAL FOR SUCH ACTIVITY, FENCING (SUCH AS CHAIN LINK) SHOULD BE PROVIDED.

11. MOSQUITO CONTROL: MOSQUITOES ARE PROBLEMS IN URBAN AREAS. STANDING WATER IN WET PONDS BECOMES IDEAL BREEDING LOCALITIES. THE WET POND SHOULD BE STOCKED WITH THE FISH SPECIES GAMBUSIA AFFINIS TO SERVE AS A BIOLOGICAL CONTROL FOR MOSQUITOES. GAMBUSIA IS EFFECTIVE CONTROL FOR MOSQUITOES ELIMINATING THE NEED FOR CHEMICAL CONTROL, GAMBUSIA SHOULD BE STOCKED AT THE INITIAL DENSITY OF 200 INDIVIDUALS PER SURFACE ACRE.

12. DOMESTIC WATERFOWL: DOMESTIC WATERFOWL CAN DESTROY VEGETATION AND INCREASE POLLUTANT LOADING IN WET POND SYSTEMS IN ADDITION, WATERFOWL CAN BECOME NUISANCES TO PROPERTY OWNERS NEAR THE POND. FOR THESE REASONS, DOMESTIC WATERFOWL SHOULD NOT BE INTRODUCED INTO THESE SYSTEMS.

 CARP AND GOLDFISH: CARP AND GOLDFISH ARE BOTTOM-FEEDERS THAT CAN CAUSE TURBIDITY AND OTHER PROBLEMS. THEY SHOULD NOT BE INTRODUCED INTO A WET POND.
 INITIAL FILLING: WHILE THE POND IS IN CONSTRUCTION, IT IS INTENDED THAT NON POTABLE WATER, NOT POTABLE WATER, BE USED TO FILL UP THE POND.

15. UTILITY LINES: UTILITY LINES MAY NOT BE LOCATED WITHIN THE LIMITS OF THE MAXIMUM WATER SURFACE ELEVATION OF A WET POND.

16. HAZARDOUS MATERIAL TRAP: SPILLS OF HAZARDOUS LIQUIDS CAN SEVERELY DAMAGE OR KILL THE BIOTA OF A WET POND. THEREFORE, DEVELOPMENTS WHERE THE TRANSPORTATION, STORAGE, OR DISTRIBUTION OF HAZARDOUS MATERIALS IS ANTICIPATED SHOULD INCLUDE HAZARDOUS MATERIAL TRAPS IN THE DRAINAGE SYSTEM IMMEDIATELY UPSTREAM OF THE WET POND INLET.

17. AERATION AND RECIRCULATION UNIT (OPTIONAL): PRIVATELY MAINTAINED WET PONDS MAY INCLUDE SOME TYPE OF AERATION DEVICE (SUCH AS A FOUNTAIN) WHICH COULD ENHANCE THE DISSOLVED OXYGEN CONCENTRATION. INCREASED DISSOLVED OXYGEN PREVENTS THE POND FROM BECOMING ANAEROBIC, HENCE MINIMIZING PROBLEMS WITH ODOR FROM BACTERIAL DECOMPOSITION.

CONSTRUCTION NOTES:

- PRIOR TO INITIALLY FILLING THE PERMANENT POOL, THE CLAY LINER WITHIN THE PERMANENT POOL SHALL BE KEEP MOIST UNTIL THE PERMANENT POOL VOLUME HAS BEEN REACHED TO
- PREVENT CRACKS FROM FORMING IN THE LINEAR. 2. ALL BACK FILL FOR THE INVERTED OUTFALL PIPE AND MAKE-UP WATER LINE SHALL BE OF CLAY MATCHING THE SPECIFICATIONS LISTED ON SHEET C14.3.
- 3. THE INVERTED OUTFALL PIPE SHALL HAVE WATER TIGHT JOINTS.
- 4. CONTRACTOR IS TO MONITOR THE SURFACE WATER ELEVATION OF THE PERMANENT POOL UNTIL CONSTRUCTION IS COMPLETE. THE CONTRACTOR SHALL CONTACT THE ENGINEER/OWNER IMMEDIATELY IF THE POND IS LOSING MORE THAN 1.5" OF WATER AT ANY GIVEN WEEK.

ARMANDO J. NIEBLA

DATE

ARMANDO NIEBLA, P.E. BURY+PARTNERS, INC. 922 ISOM ROAD, SUITE 100 SAN ANTONIO, TEXAS 78216 (210) 525-9090 **GENERAL CONSTRUCTION NOTES:**

1. WRITTEN CONSTRUCTION NOTIFICATION MUST BE GIVEN TO THE APPROPRIATE TCEQ REGIONAL OFFICE NO LATER THAN 48 HOURS PRIOR TO COMMENCEMENT OF THE REGULATED ACTIVITY. INFORMATION MUST INCLUDE THE DATE ON WHICH HE REGULATED ACTIVITY WILL COMMENCE, THE NAME OF THE APPROVED PLAN FOR THE REGULATED ACTIVITY, AND THE NAME OF THE PRIME CONTRACTOR AND THE NAME AND TELEPHONE NUMBER OF THE CONTACT PERSON.

2. ALL CONTRACTORS CONDUCTING REGULATED ACTIVITIES ASSOCIATED WITH THIS PROJECT MUST BE PROVIDED WITH COMPLETE COPIES OF THE APPROVED WATER POLLUTION ABATEMENT PLAN AND THE TCEQ LETTER INDICATING THE SPECIFIC CONDITIONS OF ITS APPROVAL. DURING THE COURSE OF THESE REGULATED ACTIVITIES, THE CONTRACTORS ARE REQUIRED TO KEEP ON-SITE COPIES OF THE APPROVED PLAN AND APPROVAL LETTER.

3. IF ANY SENSITIVE FEATURE IS DISCOVERED DURING CONSTRUCTION, ALL REGULATED ACTIVITIES NEAR THE SENSITIVE FEATURE MUST BE SUSPENDED IMMEDIATELY. THE APPROPRIATE TCEQ REGIONAL OFFICE MUST BE IMMEDIATELY NOTIFIED OF ANY SENSITIVE FEATURES ENCOUNTERED DURING CONSTRUCTION. THE REGULATED ACTIVITIES NEAR THE SENSITIVE FEATURE MAY NOT PROCEED UNTIL THE TCEQ HAS REVIEWED AND APPROVED THE METHODS PROPOSED TO PROTECT THE SENSITIVE FEATURE AND THE EDWARDS AQUIFER FROM ANY POTENTIALLY ADVERSE IMPACTS TO WATER QUALITY.

4. NO TEMPORARY ABOVEGROUND HYDROCARBON AND HAZARDOUS SUBSTANCE STORAGE TANK SYSTEM IS INSTALLED WITHIN 150 FEET OF A DOMESTIC, INDUSTRIAL, IRRIGATION, OR PUBLIC WATER SUPPLY WELL, OR OTHER SENSITIVE FEATURE.

5. ALL TEMPORARY EROSION AND SEDIMENTATION (E&S) CONTROL MEASURES MUST BE PROPERLY SELECTED, INSTALLED, AND MAINTAINED IN ACCORDANCE WITH THE MANUFACTURERS SPECIFICATIONS AND GOOD ENGINEERING PRACTICES. CONTROLS SPECIFIED IN THE TEMPORARY STORM WATER SECTION OF THE APPROVED EDWARDS AQUIFER PROTECTION PLAN ARE REQUIRED DURING CONSTRUCTION. IF INSPECTIONS INDICATE A CONTROL HAS BEEN USED INAPPROPRIATELY, OR INCORRECTLY, THE APPLICANT MUST REPLACE OR MODIFY THE CONTROL FOR SITE SITUATIONS. THE CONTROLS MUST REMAIN IN PLACE UNTIL DISTURBED AREAS ARE REVEGETATED AND THE AREAS HAVE BECOME PERMANENTLY STABILIZED.

6. 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).

7. SEDIMENT MUST BE REMOVED FROM SEDIMENT TRAPS OR SEDIMENTATION PONDS NOT LATER THAN WHEN DESIGN CAPACITY HAS BEEN REDUCED BY 50%. A PERMANENT STAKE MUST BE PROVIDED THAT CAN INDICATE WHEN THE SEDIMENT OCCUPIES 50% OF THE BASIN VOLUME.

8. 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).

9. ALL SPOILS (EXCAVATED MATERIAL) GENERATED FROM THE PROJECT SITE MUST BE STORED ON-SITE WITH PROPER E&S CONTROLS. FOR STORAGE OR DISPOSAL OF SPOILS AT ANOTHER SITE ON THE EDWARDS AQUIFER RECHARGE ZONE, THE OWNER OF THE SITE MUST RECEIVE APPROVAL OF A WATER POLLUTION ABATEMENT PLAN FOR THE PLACEMENT OF FILL MATERIAL OR MASS GRADING PRIOR TO THE PLACEMENT OF SPOILS AT THE OTHER SITE.

10. 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 TEMPORARILY OR PERMANENTLY CEASED. WHERE THE INITIATION OF STABILIZATION MEASURES BY THE 14TH DAY AFTER CONSTRUCTION ACTIVITY TEMPORARY OR PERMANENTLY CEASE IS 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 WILL 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.

11. THE FOLLOWING RECORDS SHALL BE MAINTAINED AND MADE AVAILABLE TO THE TCEQ UPON REQUEST: 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. 12. THE HOLDER OF ANY APPROVED EDWARD AQUIFER PROTECTION PLAN MUST NOTIFY THE APPROPRIATE REGIONAL OFFICE IN WRITING AND OBTAIN APPROVAL FROM THE EXECUTIVE DIRECTOR PRIOR TO INITIATING ANY OF THE FOLLOWING:

A. ANY PHYSICAL OR OPERATIONAL MODIFICATION OF ANY WATER POLLUTION ABATEMENT STRUCTURE(S), INCLUDING BUT NOT LIMITED TO PONDS, DAMS, BERMS, SEWAGE TREATMENT PLANTS, AND DIVERSIONARY STRUCTURES;

B. ANY CHANGE IN THE NATURE OR CHARACTER OF THE REGULATED ACTIVITY FROM THAT WHICH WAS ORIGINALLY APPROVED OR A CHANGE WHICH WOULD SIGNIFICANTLY IMPACT THE ABILITY OF THE PLAN TO PREVENT POLLUTION OF THE EDWARDS AQUIFER;

C. ANY DEVELOPMENT OF LAND PREVIOUSLY IDENTIFIED AS UNDEVELOPED IN THE ORIGINAL WATER POLLUTION ABATEMENT PLAN.

SAN ANTONIO REGIONAL OFFICE 14250 JUDSON RD. SAN ANTONIO, TEXAS 78233-4480 PHONE (210) 490-3096 FAX (210) 545-4329 AUSTIN REGIONAL OFFICE 2800 S. IH-35, SUITE 100 AUSTIN, TEXAS 78704-5712 PHONE (512) 339-2929 FAX (512) 339-3795

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MAINTENANCE NOTES:

1. DURING SITE CONSTRUCTION - THE SEDIMENT LOAD TO THE SEDIMENT FOREBAY SHALL BE CLOSELY MONITORED AFTER EVERY STORM EVENT. IF HEAVY SEDIMENT LOADS ARE DETECTED DURING AN INSPECTION. THE SOURCE SHOULD BE CORRECTED. SEDIMENT SHALL BE REMOVED FROM THE SEDIMENT FOREBAY WHEN ONE-THIRD OF THE FOREBAY VOLUME IS LOST.

2. UPON COMPLETION OF SITE REVEGETATION - ANY SEDIMENT BUILDUP (GREATER THAN 5% VOLUME LOSS) SHALL BE REMOVED FROM THE FOREBAY UPON COMPLETION OF SITE REVEGETATION. THE SEDIMENT BUILDUP IN THE MAIN POOL SHALL BE CHECKED AND IF MORE THE TEN-PERCENT OF THE VOLUME IS LOST, IT SHOULD BE CLEANED AT THAT TIME.

3. EVERY THREE MONTHS FOR THE FIRST TWO YEARS - DURING THE THREE MONTH INITIAL INSPECTION CYCLE, IF MORE THAN FIFTEEN PERCENT OF THE VOLUME OF THE FOREBAY IS LOST, IT SHALL BE CLEANED AT THAT TIME.

4. <u>BI-ANNUALLY</u> - THE BASIN SHOULD BE INSPECTED BI-ANNUALLY FOR SIDE SLOPE EROSION AND DETERIORATION OR DAMAGE TO STRUCTURE ELEMENTS. ANY DAMAGE SHALL BE REPAIRED. LARGE AREAS, WHICH HAVE DEAD OR MISSING VEGETATION, SHALL BE REPLANTED. TURF AREAS AROUND THE POND SHOULD BE MOWED. ACCUMULATED PAPER, TRASH, AND DEBRIS SHALL BE REMOVED BI-ANNUALLY OR AS NECESSARY. CATTAILS, COTTONWOODS, AND WILLOWS CAN QUICKLY COLONIZE SHALLOW WATER AND THE EDGE OF THE POND. THESE SPECIES, OR ANY AREAS OF PLANT OVERGROWTH MAY BE THINNED AT THIS TIME OR AS NEEDED.

5. EVERY TWO YEARS - THE SEDIMENT BUILDUP IN THE SEDIMENT FOREBAY SHALL BE REMOVED EVERY TWO YEARS OR WHEN MORE THAN ONE-THIRD OF THE FOREBAY VOLUME IS LOST. FOREBAY VOLUME SHALL BE REMOVED BY MEANS OF A PUMP AND SHALL BE DONE SO IN 24-HRS.

6. EVERY TWENTY YEARS - THE SEDIMENT BUILDUP IN THE SEDIMENT FOREBAY SHALL BE REMOVED EVERY TWENTY YEARS OR WHEN MORE THAN TWENTY PERCENT OF THE MAIN POOL VOLUME IS LOST. MAIN POOL VOLUME SHALL BE REMOVED BY MEANS OF A PUMP AND SHALL BE DONE SO IN 24-HRS.

SPECIAL CONSTRUCTION NOTES:

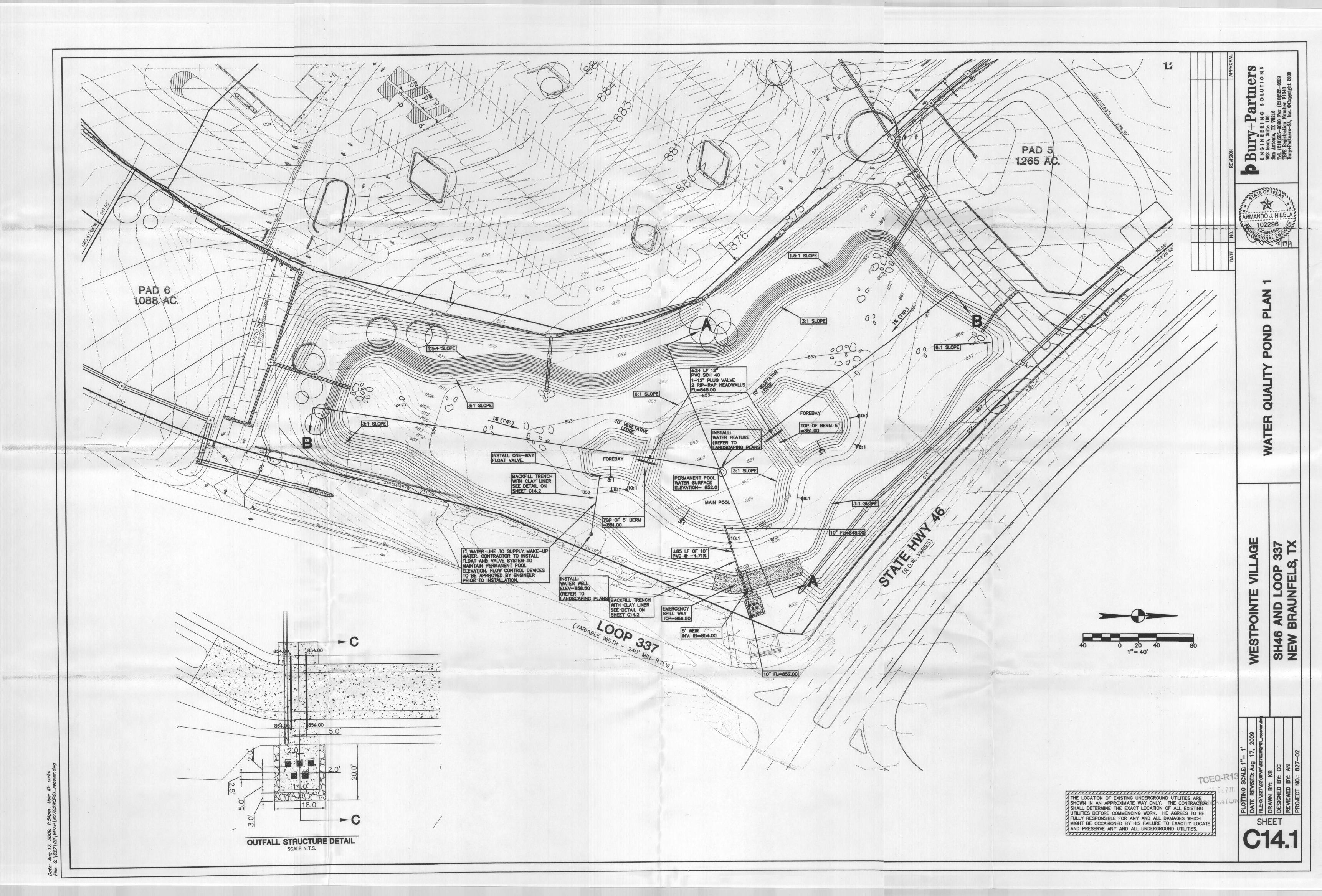
- 1. THE CONTRACTOR SHALL CONTACT NEW BRAUNFELS UTILITIES AND ALL UTILITY COMPANIES LOCATOR 48 HOURS BEFORE BEGINNING ANY EXCAVATION.
- 2. DUE TO FEDERAL REGULATIONS TITLE 49, PART 192.181. GAS PROVIDER MUST MAINTAIN ACCESS TO GAS VALVES AT ALL TIMES. THE CONTRACTOR MUST PROTECT AND WORK AROUND ANY GAS VALVES THAT ARE IN THE PROJECT AREA.
- 3. THE EXISTENCE AND LOCATION OF UNDERGROUND CABLE INDICATED ON THE PLANS ARE TAKEN FROM THE BEST RECORDS AVAILABLE AND ARE NOT GUARANTEED TO BE ACCURATE. CONTRACTOR TO CONTACT THE TELEPHONE COMPANY CABLE LOCATOR 48 HOURS PRIOR TO EXCAVATION. CONTRACTOR HAS THE RESPONSIBILITY TO PROTECT AND SUPPORT TELEPHONE COMPANY PLANT DURING CONSTRUCTION.
- THE CONTRACTOR SHALL CONTACT NEW BRAUNFELS UTILITIES, WATER LINE LOCATOR 48 HOURS PRIOR TO EXCAVATION IN THE IMMEDIATE AREA OF WATER LINE.
 DAMAGE TO ANY UNDERGROUND DRAINAGE SYSTEM SHALL BE REPORTED
- TO CITY OF NEW BRAUNFELS PUBLIC WORKS. THE CITY WILL INSTRUCT THE DAMAGING PARTY (CONTRACTOR) ON HOW TO REPAIR THE LINE AT THE CONTRACTORS COST. 6. CONTRACTOR IS RESPONSIBLE FOR MAINTAINING AND PROTECTING THE
- INTEGRITY OF THE POWER POLES DURING CONSTRUCTION. THE CONTRACTOR SHALL BE REQUIRED AT THEIR EXPENSE TO PROVIDE ACCEPTABLE BRACING OF SPECIFIC UTILITIES POLES DURING THE CONSTRUCTION OF THIS PROJECT AND/OR PROVIDE AT THEIR EXPENSE FOR THE ELECTRIC PROVIDER TO PROVIDE BRACING, IN ADDITION IT IS CRITICAL THE CONTRACTOR WORK CLOSELY WITH THE ELECTRIC PROVIDER'S CONSTRUCTION FORMAN FOR THE SAKE OF SAFETY TO ISOLATE AND/OR PROTECT CONTRACTOR FROM ENERGIZED ELECTRIC CONDUCTORS ABOVE AREAS OF PROPOSED EXCAVATION.

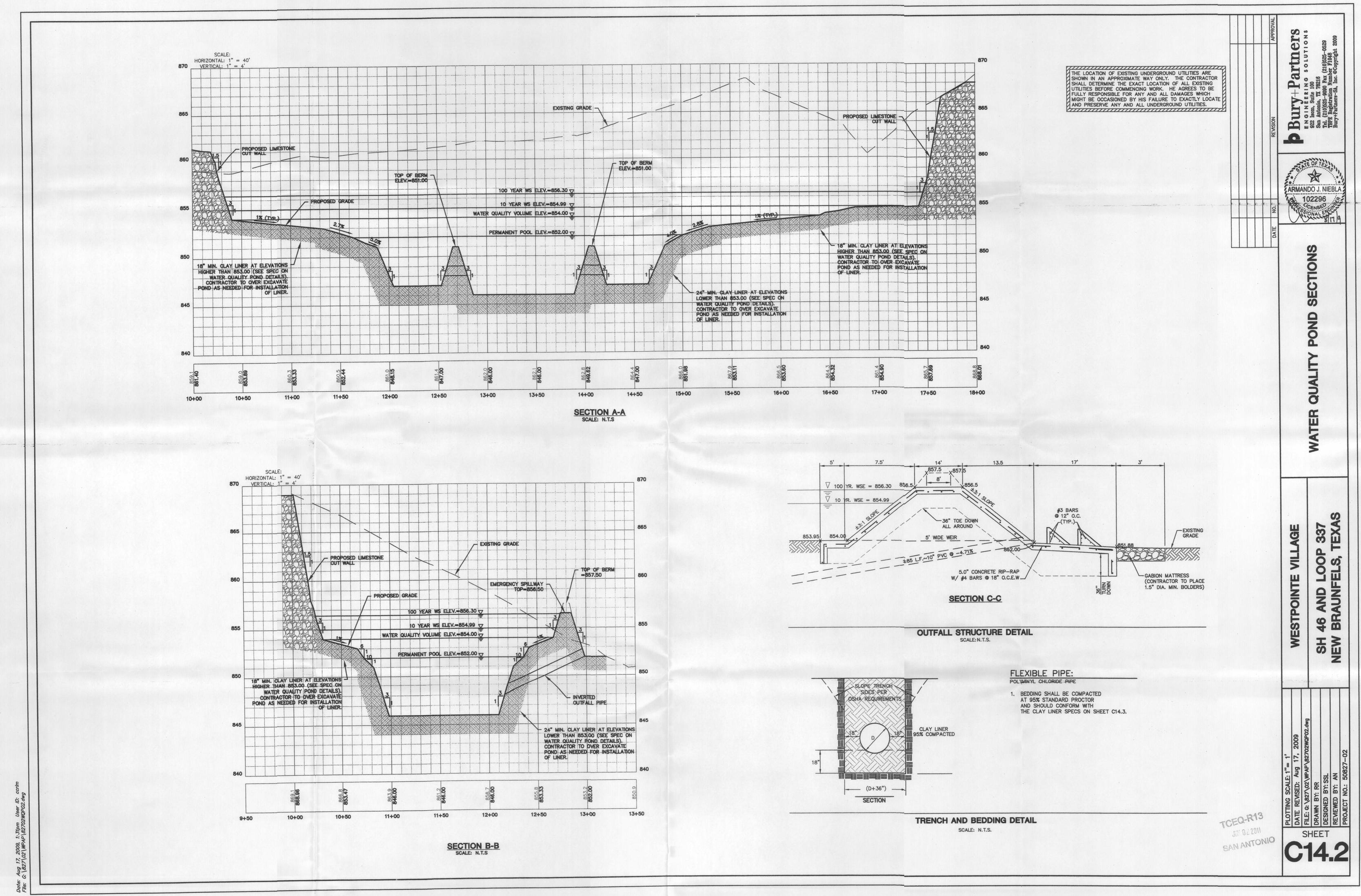
TRENCH EXCAVATION SAFETY PROTECTION: CONTRACTOR AND/OR CONTRACTOR'S INDEPENDENTLY RETAINED EMPLOYEE OR STRUCTURAL DESIGN/GEOTECHNICAL/SAFETY/EQUIPMENT CONSULTANT, IF ANY, SHALL REVIEW THESE PLANS AND AVAILABLE GEOTECHNICAL

INFORMATION AND THE ANTICIPATED INSTALLATION SITE(S) WITHIN THE PROJECT AREA IN ORDER TO IMPLEMENT CONTRACTOR'S TRENCH EXCAVATION SAFETY PROTECTION SYSTEMS PROGRAMS AND/OR PROCEDURES. THE CONTRACTOR'S IMPLEMENTATION OF THE SYSTEM'S PROGRAMS AND/OR PROCEDURES SHALL PROVIDE FOR ADEQUATE TRENCH EXCAVATION SAFETY PROTECTION THAT COMPLIES WITH AS A MINIMUM, OSHA STANDARDS FOR TRENCH EXCAVATION. SPECIFICALLY, CONTRACTOR AND/OR CONTRACTOR'S INDEPENDENTLY RETAINED EMPLOYEE OR SAFETY CONSULTANT SHALL IMPLEMENT A TRENCH SAFETY PROGRAM IN ACCORDANCE WITH OSHA STANDARDS GOVERNING THE PRESENCE AND ACTIVITIES OF INDIVIDUALS WORKING IN AND AROUND TRENCH EXCAVATION.

> TCEQ-R13 JUI 02 2011 SAN ANTONIO

			SHEET
NO.	REVISION	APPROVAL	C14.0





WETLAND PLANT LIST INSTALL BULLRUSH IN CLUMPS, WITH INDIVIDUAL PLANTS SPACED APPROXIMATELY THREE TO FOUR FEET ON CENTER: AT LEAST TWO OF THE FOLLOWING SPECIES SHALL BE USED: WATER DEPTH **NOTES** BULLRUSH 8' TALL EVERGREEN, RESISTS CATTAIL ENCROACHMENT SCIRPUS VALIDUS BULLRUSH 1' - 3' 8' TALL EVERGREEN, RESISTS CATTAIL ENCROACHMENT SCIRPUS CALIFORNICUS BULLRUSH 1' - 3' 2' TO 4' TALL, WITH 3 DISTINCT EDGES SCIRPUS AMERICANUS THREE-SQUARE BULLRUSH 2' - 6" INSTALL SPIKERUSH AT OR NEAR WATER'S EDGE, WITH INDIVIDUAL PLANTS SPACED APPROXIMATELY THREE TO SIX FEET ON CENTER. AT LEAST TWO OF THE FOLLOWING SPECIES SHALL BE USED: WATER DEPTH NOTES SPIKEBRUSH ELEOCHARIS MONTEVIDENSIS SPIKERUSH 1' TALL, RHIZOMATOUS, REDUCES EROSION AT 0" - 6" THE POND EDGE 1' TALL, RHIZOMATOUS, REDUCES EROSION AT THE POND EDGE ELEOCHARIS MACROSTACHYS SPIKERUSH 0" - 6" 2' TO 2.5 TALL, RHIZOMATOUS, CAN ACCOMMODATE DEEPER WATER, 4-ANGLED ELEOCHARIS QUADRANGULATA 3" - 1' AT LEAST TWO SPECIES OF THE FOLLOWING MARSH SPECIES SHALL BE USED (ADDITIONAL SPECIES ARE ENCOURAGED). INSTALL IN CLUMPS IN SHALLOW WATER, WITH INDIVIDUAL PLANTS SPACED AT APPROXIMATELY THREE FEET ON CENTER. MARSH DIVERSITY WATER DEPTH NOTES 1' TO 2' TALL, CLUMP-FORMING, COMMON TO CENTRAL TEXAS CYPERUS OCHARCEUS FLATSEDGE 2" -6" 1' TO 2' TALL, WHITE BRACTS DURING WARM . DICHROMENA COLORATA WHITE-TOPPED SEDGE 2" - 6" SEASON 1' TO 2' TALL, ANNUAL, HEART-SHAPED LEAVES, FLOWER SIMILAR TO ARROWHEAD 3. ECHINODORUS ROSTRATUS BURHEAD 3" - 1' 1' TO 2' TALL, COLONIZES, INHABITS DEEPER WATER THAN SPIKEBRUSHES 4. ELEOCHARIS QUADRANGULATA FOUR-SQUARE SPIKEBRUSH 6" - 1' 3' TO 4' TALL, CAN BE INVASIVE, DENSE GROWTH, YELLOW FLOWERS 5. IRIS PSEUDACORUS YELLOW FLAG IRIS 1' - 2' 3' TO 4' TALL, FORMS A TIGHT CLUMP, EVERGREEN, VERY ATTRACTIVE 6. JUNCUS EFFUSUS SOFT RUSH 6" - 1' 3' TO 4' TALL, COMMON, WHITE FLOWERS, HERBACEOUS, COLONIZES 7. JUSTICIA AMERICANA WATER-WILLOW 2" - 6" LOOKS LOKE FLOATING FOUR-LEAF CLOVER, ENDEMIC TO TEXAS 8. MARSILEA MACROPODA WATER CLOVER 2" - 6" 9. <u>NAJAS QUADALUPENSIS</u> WATER-NAIAD SUBMERGENT, VALUABLE TO FISH AND WILDLIFE 1' - 4' 3' TALL, COLONIZES, COSMOPOLITAN, PURPLE FLOWERS 10. PONTEDERIA CORDATA PICKERELWEED 2" - 1' 2' TO 3' TALL, BRASS-COLORED FLOWERS IN MAY 11. RHYNCHOSPORA CORNICULATA HORNED-RUSH 2" - 6" INSTALL ARROWHEAD IN CLUMPS IN SHALLOW WATER, WITH INDIVIDUAL PLANTS SPACED APPROXIMATELY THREE FEET ON CENTER. WATER DEPTH NOTES ARROWHEAD 2' HEIGHT, WILDLIFE VALUE, WHITE FLOWERS, PROVEN WATER QUALITY PERFORMER SAGGITARIA LATIFOLIA ARROWHEAD 2" - 1' THE FOLLOWING CATEGORY, AQUATICS, INCLUDES SUBMERGENTS AND FLOATING-LEAVED AQUATICS. SUBMERGENTS ARE ROOTED IN THE SEDIMENT OF THE POND, AND ARE COMPLETELY SUBMERGED IN THE WATER. FLOATING-LEAVED AQUATIC PLANTS ARE ROOTED IN THE SEDIMENT OF THE POND, AND HAVE LEAVES THAT FLOAT ON THE SURFACE OF THE WATER. THESE LEAVES SHADE THE WATER, WHICH LIMITS POTENTIAL ALGAE GROWTH. AT LEAST TWO OF THE FOLLOWING SPECIES SHALL BE LISED AND SHOULD BE DIACED AT DANDON'S DOCUMENT THE DOUD. FOLLOWING SPECIES SHALL BE USED AND SHOULD BE PLACED AT RANDOM LOCATIONS THROUGHOUT THE POND: NOTES WATER DEPTH AQUATICS APPROXIMATELY 6' LENGTH UNDERWATER, SUBMERGENT 1. CABOMBA CAROLINIANA FANWORT 1' - 4' MAXIMUM 8' LENGTH, TOLERANT OF TURBIDITY AND WATER FLUCTUATION, WILDLIFE FOOD 2. <u>CERATOPHYLLUM SPP.</u> COON-TAIL 1' - 4' A NATIVE, RELIABLY HARDY, FLOATING-LEAVED 3. NYMPHAEA ODORATA WATER LILY 6" - 2' AQUATIC: WITH WHITE FLOWERS COLONIZES QUICKLY, VALUABLE TO FISH AND 4. <u>POTOMAGETON PECTINATUS</u> SAGO PONDWEED 8" - 3' WILDLIFE; FLOATING-LEAVED AQUATIC WATER EDGE 852.00 SPIKERUSH . SPIKERUSH ARROWHEAD PICKERELWEED PICKERELWEED FOUR SQUARE SPIKERUSH . FOUR SQUARE SPIKERUSH ARROWHEAD WATER LILLY SAGE PONDWEED ARROWHEAD 10' VEGETATED BENCH YELLOW FLAG IRIS BULRUSH YELLOW FLAG IRIS • SUBMERGENT SAGE PONDWEED WATER LILLY

EDGE OF VEGETATIVE BENCH

3:1 SLOPE

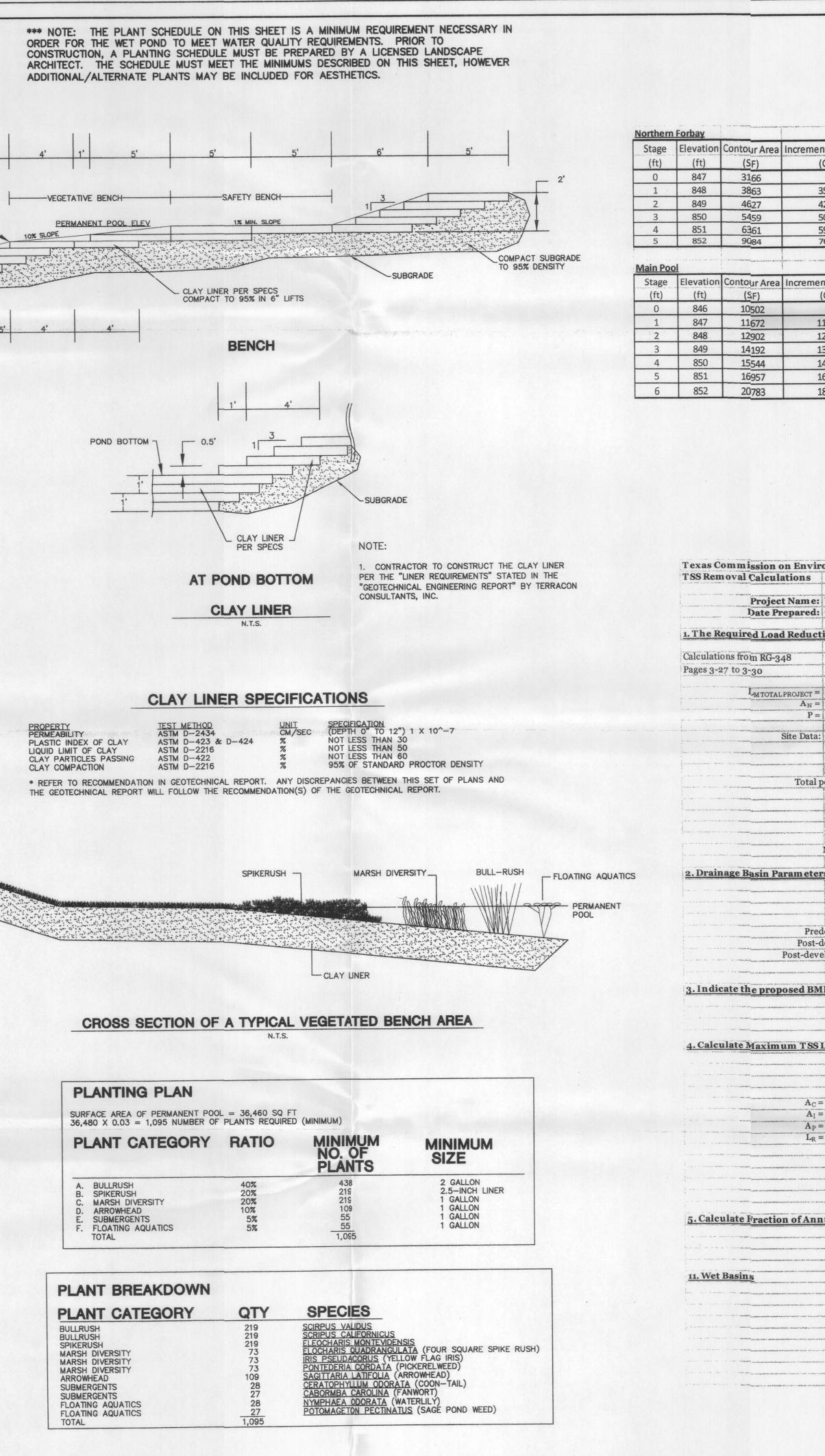
821.00

BULRUSH

TYPICAL WET POND SPACING N.T.S.

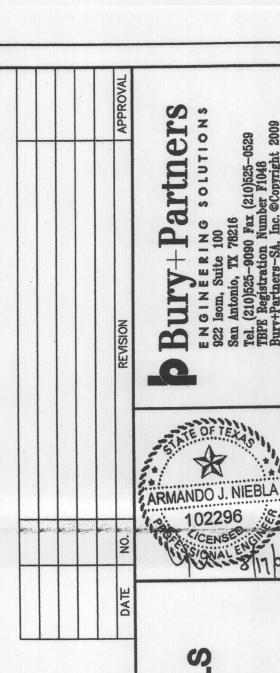
SUBMERGENTS

Aug 17, 2009, 8:52am User ID: ccrim ::\827\02\WPAP\82702WQP03.dwg



STORAGE TABLE

		Southern	Forbay		analara la cina di Baladana da an'an'ananana nan'initana any ananana da ananana da ananana da anana da ana an	
ental Storage	Total Storage	Stage	Elevation	Contour Area	Incremental Storage	Total Storage
(CF)	(CF)	(ft)	(ft)	(SF)	(CF)	(CF)
0	0	0	847	1219	0	0
3508	3508	1	848	1677	1442	1442
4239	7747	2	849	2202	1933	3375
5037	12784	3	850	2798	2494	5869
5904	18688	4	851	3467	3126	8995
7681	26369	5	852	5666	4521	13516
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ental Storage	Total Storage	Stage	Elevation	Contour Area	Incremental Storage	Total Storage
(CF)	(CF)	(ft)	(ft)	(SF)	(CF)	(CF)
0	0	0	852	36480	0	0
11081	11081	1	853	45135	40727	40727
12281	23362	2	854	79376	79426	120153
13541	36903	3	855	104017	109973	230126
14861	51764	4	856	116061	118646	348772
16244	68008	5	857	121273	123865	472637
18835	86843		Aleren a			



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		2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2
WestPointe Village	**************************************	n en en sen en e
7/17/2009	5 45 26 4 mar an	a an
on for the total project:	*********	
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Page 3-29 Equation 3.3: $L_M = 27.2(A_N \times P)$	n fan fan de ser fan fan de ser f	an and the standard and a standard and a standard a standard a standard a standard a standard a standard a stan
	??~???	
Required TSS removal resulting from the proposed development = Net increase in impervious area for the project	80% of incre	ased load
Average annual precipitation, inches	ing in constants if during chairs download and a second part of a second part of the second part of the second	
	ϒ;;;ϒ;Ͽϳ;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;;	and an
Determine Required Load Removal Based on the Entire Project County =	Comal	Contraction of the second s
Total project area included in plan * =	37.36	acres
Predevelopment impervious area within the limits of the plan * =	0.38	acres
ost-development impervious area within the limits of the plan* =	25.96	acres
Total post-development impervious cover fraction * =	0.69	inches
P=	33	menes
L _{M TOTAL PROJECT} =	22961	lbs.
Number of drainage basins / outfalls areas leaving the plan area =	1	
	المحمد ا محمد المحمد الم	
s (This information should be provided for each basin):	na ga ga ga na a a a a a a a a a a a a a	
Drainage Basin/Outfall Area No. =	1	Service many manufacture and solved a structure with
The tail due in g as he giv (aut 61) and	1. 1	
Total drainage basin/outfall area = evelopment impervious area within drainage basin/outfall area =	<u>34.72</u> 0.38	acres
evelopment impervious area within drainage basin/outfall area =	24.62	acres
lopment impervious fraction within drainage basin/outfall area =	0.71	AN TO BE REPORT ON THE PART OF
L _{MTHIS} BASIN =	21758	lbs.
P Code for this basin.	and war, also an add in child in childre for a childre	an a
	الم بن من	
Proposed BMP = Removal efficiency =	WB	abbreviation percent
ingen genergen men en einer gelegen aber de Frankreisen anderen Standen versten einer Kannen versten her sollte in der	93	and and reading an all for a linear species posterior and one po
oad Removed (L _R) for this Drainage Basin by the selected	BMP Type.	ent serentario de la cosa estas partecesario de
RG-348 Page 3-33 Equation 3.7:		4994 - 19 w
$LR = (BMP efficiency) \times P \times (A_1 \times 34.6 + A_P \times 0.54)$	⁴ 4 ⁴ 4997 Carrow Parlow Interest front from the second	and the second the second second second
Total On-Site drainage area in the BMP catchment area	antilleanna a fa sugadi anana anina '	NA THE REPORT OF THE REPORT
Impervious area proposed in the BMP catchment area	197 - Salanayan Sarahay - Sala maranga da Sant da serang adawa Milang Santana na maranga sa	La Carlo Carlo Carlo Carlo
Pervious area remaining in the BMP catchment area TSS Load removed from this catchment area by the proposed BMI	and the second se	
	ar mag mag yang ang ang ang ang ang ang ang ang ang	and and for proper such as good as and formed whereas a start of a start of the space of
$A_{C} =$	34.72	acres
${f A_I}=$	24.62	acres
$A_P = L_R $	10.10 26311	acres Ibs
$L_R =$	20311	100
ual Runoff to Treat the drainage basin / outfall area	***************************************	
	23275	lbs.
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Desired $L_{M THIS BASIN} = F =$	0.88	5
And a second of a second second and a second as a seco	U.000	an interest when is presented a state of the state strategy
F =	9666 de 2666 notes notes en de participador (notes notes en 	cubic feet
And and a second state of the second second and second approximation and an and a second approximation and a second second approximation	116811 214153	cubic feet cubic feet
F = Required capacity of permanent Pool = Required capacity at WQV Elevation =	116811 214153	cubic feet
F = Required capacity of permanent Pool = Required capacity at WQV Elevation = Forebay North Volume =	116811 214153 26369	cubic feet
F = Required capacity of permanent Pool = Required capacity at WQV Elevation = Forebay North Volume = Forebay South Volume =	116811 214153 26369 13516	cubic feet cubic feet cubic feet
F = Required capacity of permanent Pool = Required capacity at WQV Elevation = Forebay North Volume =	116811 214153 26369 13516 86843	cubic feet cubic feet cubic feet cubic feet
F = Required capacity of permanent Pool = Required capacity at WQV Elevation = Forebay North Volume = Forebay South Volume = Main Pool Volume =	116811 214153 26369 13516	cubic feet cubic feet cubic feet

POND DETAIL 22 QUALI ATER 6 0 33 0 C AUNFI NIO BR SH46 NEW WES⁻ SCALE: 1": SED: Aug 22\WPAP\827 6: KB BY: CC BY: AN 티비 PL(DA DR DR SHEE1

TCEQ-R13 JUN 02 2011

SAN ANTONIC

WATER POLLUTION ABATEMENT PLAN MODIFICATION

For

WESTPOINTE VILLAGE Phase II

SH 46 and Loop 337 New Braunfels, Texas

JUNE 2011



Prepared By:

Bury+Partners 922 Isom Road, Suite 100 San Antonio, Texas 78216 Office: 210-525-9090/Fax: 210-525-0529 TBPE Registration Number F-1048

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TCEQ Core Data Form

TCEQ Use Only

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

SECTION	<u>N I: Gen</u>	eral Information						
Castadant in the interview	with which the second	on (If other is checked please o	· minimum an and of channel					
New Pe	rmit, Registr	ation or Authorization (Core Dat	a Form should	be submitted with	the program applicat	ion)		
Renewa	```	ta Form should be submitted with		/	her			
2. Attachme		Describe Any Attachments: (e						
⊠Yes		Modification to an Appro			-			
3. Customer Reference Number (<i>if issued</i>) Follow this link to search for CN or RN numbers in								
CN 603488982 Central Registry** RN 105739023								
SECTIO	<u>NII: Cu</u>	stomer Information						
5. Effective	Date for Cu	stomer Information Updates (m	ım/dd/yyyy)					
6. Customer	r Role (Propo	sed or Actual) – as it relates to the F	Regulated Entity	listed on this form.	Please check only <u>one</u> o	f the following:		
Owner		Operator		& Operator				
	onal Licensè	e 🗌 Responsible Party	🗌 Volunti	ary Cleanup Appl	icant Other:			
7. General C	Sustomer Inf	formation		500000 (MM)			****	
New Cus	tomer	Upd	ate to Custome	er Information	Change ir	n Regulated Er	tity Ownership	
Change ir	n Legal Nam	e (Verifiable with the Texas Secre	etary of State)		🛛 <u>No Chanc</u>	<u>ie**</u>		
<u>**If "No Cha</u>	nge" and Se	ection I is complete, skip to Se	ction III – Reg	ulated Entity Inf	ormation.			
8. Type of C	ustomer:	Corporation	🗌 🗌 Individ	lual	Sole Proprietors	hip- D.B.A		
City Gove	ernment	County Government	Federa	al Government	State Governme	nt		
Other Go	vernment	General Partnership	🔀 Limite	d Partnership	Other:			
9. Customer	Legal Nam	e (If an individual, print last name firs	st: ex: Doe, John		tomer, enter previous C	ustomer	End Date:	
		чинынаны осносносто силонициин	,	below				
	[
10. Mailing		MANJARAN MANA MANA MANA MANA MANA MANA MANA						
Address:								
	City		State	ZIP		ZIP + 4		
11. Country	Mailing Info	rmation (if outside USA)		12. E-Mail Ad	dress (if applicable)	dd		

13. Telephor	ne Number	14.	Extension or	Code	15. Fax Numbe	er (if applicable	,)	
()	-				()	16.		
16. Federal T	ax ID (9 digits)	17. TX State Franchise Tax	ID (11 digits)	18. DUNS Num	ber(if applicable) 19. T.	X SOS Filing I	Number (if applicable)	
20. Number o		25			21 Indepen	dently Owned	and Operated?	
0-20] 21-100		501 and hig	her	1	Yes		
				,		x with		
SECTION	v III: Ке	gulated Entity Inform	ation					

22. General Regulated Entity Information (If 'New Regulated Entity" is selected below this form should be accompanied by a permit application)						
New Regulated Entity	Update to Regulated Entity Name	Update to Regulated Entity Information	🔀 No Change** (See below)			
**If "NO CHANGE" is checked and Section I is complete, skip to Section IV, Preparer Information.						
23. Regulated Entity Name (name of the site where the regulated action is taking place)						

[
24. Street Address of the Regulated								
Entity:								
(No P.O. Boxes)	City	1		State		ZIP		ZIP + 4
25. Mailing						_		
Address:	City			State		ZIP		ZIP + 4
				State		2.1F		211 1 4
26. E-Mail Address:				28. Extension	or Codo	20 Ea	x Number (if applicabl	2
27. Telephone Numb	er			20. Extension	orcode	29. Fd		
() -) -	
30. Primary SIC Cod	e (4 digi	ts) 31. Second	ary SIC (32. Primary N (5 or 6 digits)	NAICS Co	de 33. Secol (5 or 6 digits	ndary NAICS Code
								•
34. What is the Prima	ary Bu	siness of this ent	tity? (P	lease do not repea	t the SIC or NA	AICS descri	ption.)	
	Questi	ons 34 – 37 addre	ess geog	raphic location.	Please refe	r to the in	structions for appli	cability.
35. Description to								
Physical Location:								
36. Nearest City				County		Sta	te	Nearest ZIP Code
4								
37. Latitude (N) In I	Decima	ıl:			38. Longitu	ude (W)	In Decimal:	
Degrees	Minute	es	Seconds		Degrees		Minutes	Seconds
39. TCEQ Programs at	nd ID N	lumbers Check all F	Programs ar	nd write in the permit	s/registration nun	nbers that wi	I be affected by the updat	es submitted on this form or the
updates may not be made. If	your Pro	ogram is not listed, che	ck other and	d write it in. See the	Core Data Form	instructions	for additional guidance.	
Dam Safety		Districts		Edwards Ac	quifer	🗌 Indu	strial Hazardous Waste	Municipal Solid Waste
				WPAP				
New Source Review	New Source Review – Air OSSF Petroleum S		Storage Tank	torage Tank PWS		Sludge		
Stormwater Title V – Air			Tires		🗌 Use	d Oil	Utilities	
U Voluntary Cleanup)	U Waste Water		Wastewat	er Agriculture	🗌 Wat	er Rights	Other:
				1		1		

SECTION IV: Preparer Information

40. Name:	Chris Crim			41. Title:	Engineer Associate
42. Telephon	e Number	43. Ext./Code	44. Fax Number	45. E-Mail	Address
(210)525	-9090		(210) 525-0529	ccrim@t	ourypartners.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 9 and/or as required for the updates to the ID numbers identified in field 39.

(See the Core Data Form instructions for more information on who should sign this form.)

Company:	Bury+Partners	Job Title:	Project Manager	
Name(In Print) :	Armando J. Niebla, P.E.		Phone:	(210) 525-9090
Signature:	4		Date:	2011





GENERAL INFORMATION FORM

General Information Form

For Regulated Activities on the Edwards Aquifer Recharge and Transition Zones and Relating to 30 TAC §213.4(b) & §213.5(b)(2)(A), (B) Effective June 1, 1999

	ENTITY NAME Comal	: <u>WestPointe Vi</u>		SIN: <u>Comal Creek</u>
EDWARDS AG	QUIFER:	X_ RECHARGE ZON TRANSITION ZON		
PLAN TYPE:		X_WPAP SCS	AST UST	$\frac{1}{X} = \frac{1}{1} $
CUSTOMER I	NFORMATION			
1. Custon	ner (Applicant):			
Entity: Mailing City, St Teleph		Wade McGinnis NB Retail, Ltd 801 Congress Ave., Austin, Texas (512) 477-1212 (If any):		_ Zip:78701 (512) 495-9875
Entity:		Armando J. Niebla, F Bury+Partners 922 Isom Road, Suit San Antonio, Texas (210) 525-9090	e 100	Zip: <u>78216</u> (210) 525-0529
2. <u>X</u> —	This project is	inside the city limits of outside the city limits not located within any	·	s <u>, Texas</u> . extra-territorial jurisdiction) of

3. The location of the project site is described below. The description provides sufficient detail and clarity so that the TCEQ's Regional staff can easily locate the project and site boundaries for a field investigation.

WestPointe Village is located near the satiment where of the intersection of SH the

- 4. <u>X</u> ATTACHMENT A ROAD MAP. A road map showing directions to and the location of the project site is attached at the end of this form.
- 5. X ATTACHMENT B USGS / EDWARDS RECHARGE ZONE MAP. A copy of the official 7 ½ minute USGS Quadrangle Map (Scale: 1" = 2000') of the Edwards Recharge Zone is attached behind this sheet. The map(s) should clearly show:

- Project site. Х
- USGS Quadrangle Name(s).
- Х Boundaries of the Recharge Zone (and Transition Zone, if applicable).
- Х Drainage path from the project to the boundary of the Recharge Zone.
- 6. Sufficient survey staking is provided on the project to allow TCEQ regional staff to _X_ locate the boundaries and alignment of the regulated activities and the geologic or manmade features noted in the Geologic Assessment. The TCEQ must be able to inspect the project site or the application will be returned.
- 7. ATTACHMENT C - PROJECT DESCRIPTION. Attached at the end of this form is a Х detailed narrative description of the proposed project.
- 8. 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/Uncleared)
 - X Other: Commercial Site Under Construction

PROHIBITED ACTIVITIES

- 9. I am aware that the following activities are prohibited on the **Recharge Zone** and are Х not proposed for this project:
 - (1) waste disposal wells regulated under 30 TAC Chapter 331 of this title (relating to Underground Injection Control);
 - new feedlot/concentrated animal feeding operations, as defined in 30 TAC (2)§213.3:
 - (3)land disposal of Class I wastes, as defined in 30 TAC §335.1;
 - (4)the use of sewage holding tanks as parts of organized collection systems; and
 - new municipal solid waste landfill facilities required to meet and comply with (5) Type I standards which are defined in §330.41(b), (c), and (d) of this title (relating to Types of Municipal Solid Waste Facilities).
- 10. N/A I am aware that the following activities are prohibited on the Transition Zone and are not proposed for this project:
 - (1)waste disposal wells regulated under 30 TAC Chapter 331 (relating to Underground Injection Control);
 - land disposal of Class I wastes, as defined in 30 TAC §335.1; and (2)
 - (3)new municipal solid waste landfill facilities required to meet and comply with Type I standards which are defined in §330.41 (b), (c), and (d) of this title.

ADMINISTRATIVE INFORMATION

- 11. The fee for the plan(s) is based on:
 - For a Water Pollution Abatement Plan and Modifications, the total acreage of the site _X_ where regulated activities will occur.
 - For an Organized Sewage Collection System Plans and Modifications, the total linear

footage of all collection system lines.

- For a UST Facility Plan or an AST Facility Plan, the total number of tanks or piping systems.
- ____ A request for an exception to any substantive portion of the regulations related to the protection of water quality.
- A request for an extension to a previously approved plan.
- 12. Application fees are due and payable at the time the application is filed. If the correct fee is not submitted, the TCEQ is not required to consider the application until the correct fee is submitted. Both the fee and the Edwards Aquifer Fee Form have been sent to the Commission's:
 - TCEQ cashier
 - Austin Regional Office (for projects in Hays, Travis, and Williamson Counties)
 - X San Antonio Regional Office (for projects in Bexar, Comal, Kinney, Medina, and Uvalde Counties)
- 13. X 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. The copies must be submitted to the appropriate regional office.
- 14. X No person shall commence any regulated activity until the Edwards Aquifer Protection Plan(s) for the activity has been filed with and approved by the Executive Director.

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 **GENERAL INFORMATION FORM** is hereby submitted for TCEQ review. The application was prepared by:

Armando J. Niebla, P.E. Print Name of Customer/Agent

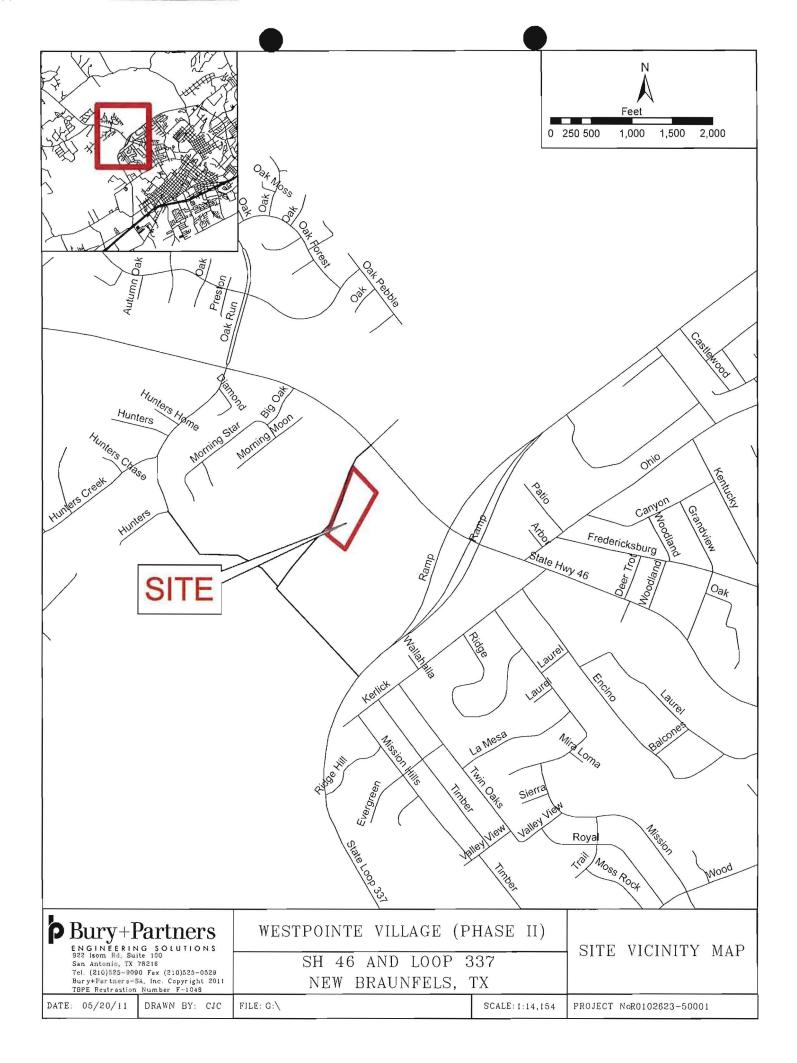
Signature of Customer/Agent

If you have questions on how to fill out this form or about the Edwards Aquifer protection program, please contact us at 210/490-3096 for projects located in the San Antonio Region or 512/339-2929 for projects located in the Austin Region.

Individuals are entitled to request and review their personal information that the agency gathers on its forms. They may also have any errors in their information corrected. To review such information, contact us at 512/239-3282.

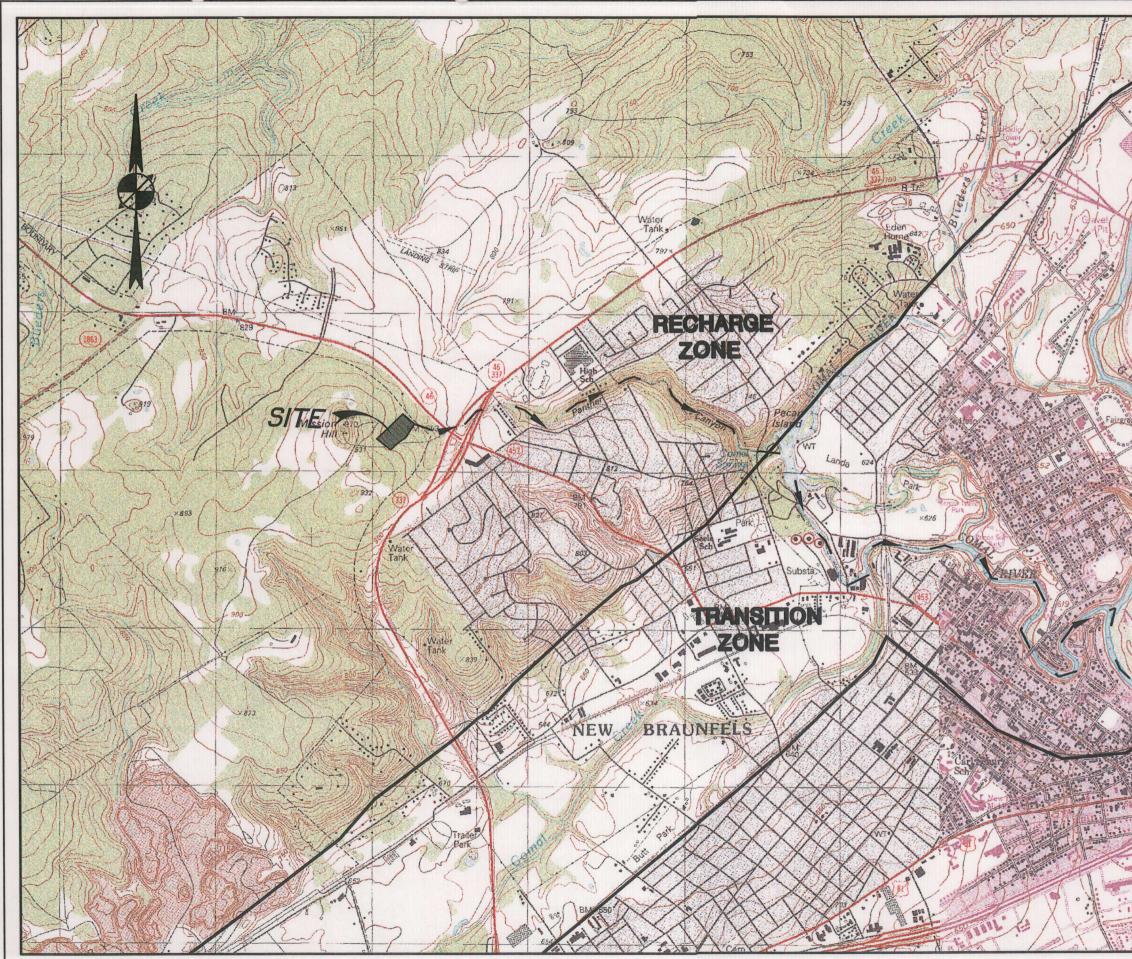
ATTACHMENT A

ROAD MAP



ATTACHMENT B

USGS/EDWARDS RECHARGE ZONE MAP (Scale 1" = 2,000')



Date: May 25, 2011, 9:39am User ID: sa-engineer File: J:\102623\50002\Reports\WPAP Mod\Exhibits\USGS MAP.dwg

	NEW BRUANFELS EAST, TX QUADRANGLE NEW BRAUNFELS WEST, TX	QUADRANGLE	PROJECT No.: 118-14.60
And Station Set S	WESTPOINTE VILLAGE (PHASE II)	ATTACHMENT B USGS MAP	DRAWN BY: MS FILE: G: \118\14\WPAP\11814WPAP01.DWG
	Bury+Partners ENGINEERING SOLUTIONS SER INTO SOLUTIONS Sea Antonio, 177 78216	Tel. (210)525-9090 Fax (210)525-0529 TBPE Registration Number F-1048 Bury+Partners-SA, Inc. ©Copyright 2011	DATE: 05-05-10 SCALE: 1"=2000' DF

ATTACHMENT C

PROJECT DESCRIPTION

PROJECT DESCRIPTION

WestPointe Village is a ± 37.00 -acre development located near the southwest corner of the intersection of State Highway 46 and Loop 337. The ± 37.00 -acres are the sum of Lots 1, 7, 8, 9, 10, and 11 in Block 1 of WestPointe Subdivision Unit 2. In addition, it lies within the city limits of the City of New Braunfels in Comal County, Texas. The project is located entirely in the Edwards Aquifer Recharge Zone (EARZ), and is within the sub-watershed of Comal Creek, a tributary of the Guadalupe River.

The Phase 2 development of Lot 1 will result in a disturbance of approximately 4.19 acres of land for construction of the commercial shopping center, associated parking, and utilities. The Phase 2 development will result in an increase of ± 2.88 acres of impervious cover to the approved wet basin for the WestPointe Village Development resulting in an overall impervious cover percentage of 69% for Lot 1 which is below the anticipated build out of 90%.

Storm water from the property will be conveyed through a proposed storm sewer system for the site. The proposed storm sewer will connect to the development's existing underground storm water infrastructure and to the BMP in accordance with the approved drainage plans. Storm water will be detained within the wet basin prior to being released into the Texas Department of Transportation (TxDOT) drainage structure. Lastly, all areas not covered by the building footprint, sidewalks, or pavement will be stabilized with either sod or landscaping prior to the removal of all Temporary Best Management Practices (BMPs).





GEOLOGIC ASSESSMENT

GEOLOGIC ASSESSMENT FOR THE WESTPOINTE VILLAGE SEWAGE COLLECTION SYSTEM TRACT

Comal County, Texas

May 2009

Prepared for:

H.E.B Grocery Company, LP and B&O Development G.P., L.L.C. c/o Barshop and Oles, Inc. 900 Isom Road, Suite 300 San Antonio, Texas 78216

Prepared by:

aci consulting 1001 Mopac Circle, Suite 100 Austin, Texas 78746



Geologic Assessment For Regulated Activities on The Edwards Aquifer Recharge/transition Zones and Relating to 30 TAC §213.5(b)(3), Effective June 1, 1999

- 1. <u>X Geologic or manmade features are described and evaluated using the attached GEOLOGIC</u> ASSESSMENT TABLE.
- 2. Soil cover on the project site is summarized in the table below and uses the SCS Hydrologic Soil Groups* (Urban Hydrology for Small Watersheds, Technical Release No. 55, Appendix A, Soil Conservation Service, 1986). If there is more than one soil type on the project site, show each soil type on the site Geologic Map or a separate soils map.

Soil Units, Infiltration Characteristics & Thickness											
Soil Name	Group *	Thickness (feet)									
Krum clay (Krb) – 1 to 3 percent slopes	С	4-5 ft									
Medlin-Eckrant association (MED), undulating	D	1.5 ft									
Rumple-Comfort association (RUD), undulating	D	2.5 ft									

* Soil Group Definitions (Abbreviated)
A. Soils having a <u>high infiltration</u> rate when thoroughly wetted.
 Soils having a <u>moderate infiltration</u> rate when thoroughly wetted.
C. Soils having a <u>slow infiltration</u> rate when thoroughly wetted.
D. Soils having a <u>very slow infiltration</u> rate when thoroughly wetted.

- 3. <u>X</u> A **STRATIGRAPHIC COLUMN** is attached at the end of this form that shows formations, members, and thicknesses. The outcropping unit should be at the top of the stratigraphic column.
- 4. <u>X</u> A NARRATIVE DESCRIPTION OF SITE SPECIFIC GEOLOGY is attached at the end of this form. The description must include a discussion of the potential for fluid movement to the Edwards Aquifer, stratigraphy, structure, and karst characteristics of the site.
- 5. <u>X</u> Appropriate **SITE GEOLOGIC MAP(S)** are attached:

The Site Geologic Map must be the same scale as the applicant's Site Plan. The minimum scale is 1": 400'

Applicant's Site Plan Scale	1" = 100'
Site Geologic Map Scale	1" = 100'
Site Soils Map Scale (if more than 1 soil type)	1" = 100'

 Method of collecting positional data:
 <u>X</u> Global Positioning System (GPS) technology. Other method(s).

- 7. <u>X</u> The project site is shown and labeled on the Site Location Map.
- 8. <u>X</u> Surface geologic units are shown and labeled on the Site Topographic Map.
- 9. X Geologic or manmade features were discovered on the project site during the field investigation. They are shown and labeled on the Site Feature Map and are described in the attached Geologic Assessment Table.
 - Geologic or manmade features were not discovered on the project site during the field investigation.
- 10. <u>NA</u> The Recharge Zone boundary is shown and labeled, if appropriate.
- 11. All known wells (test holes, water, oil, unplugged, capped and/or abandoned, etc.):
 - ____ There are water wells present within the project corridor study area and the locations are shown and labeled. (Check all of the following that apply.)
 - ____ The wells are not in use and have been properly abandoned.
 - The wells are not in use and will be properly abandoned.
 - _ The well are in use and complies with 16 TAC §76.
 - \underline{X} There are no wells or test holes of any kind known to exist on the project site.

ADMINISTRATIVE INFORMATION

12. X One (1) original and three (3) copies of the completed assessment have been provided.

Date(s) Geologic Assessment was performed: July 25, 2007

Date(s)

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. My signature certifies that I am qualified as a geologist as defined by 30 TAC 213.

Stan Reece P.G.	(512) 347-9000
Print Name of Geologist	Telephone
STATE OF TELAS STATE OF TELAS STAN REECE	(512) 306-0974 Fax 5/19/09
Signature of Geologist	Date
Representing: <u>aci consultos (_{CENSED} columnation</u>) (Name of Alonda Barriero de Columnation)	<i>q</i>

If you have questions on how to fill out this form or about the Edwards Aquifer Protection Program, please contact us at 512/939-2929 (Austin) or 210/403-4024 (San Antonio).

Individuals are entitled to request and review their personal information that the agency gathers on its forms. They may also have any errors in their information corrected. To review such information, contact us at 512/239-3282.

GEOL	OGIC ASS	ESSMENT	TABL	E			PR	JE		MIE	:	WestP	ointe V	illage Am	mende	ed S	CS G	A Tal	ole	
	LOCATIO	N				FEA	TUR	E CH	ARACT	ERI	STICS				EVAL	.UAT	ION	PHYS	SICAL	SETTING
1A	18 *	1C*	2A	28	3		4		5	5A	6	7	8A	8B	9	1	0	1	1	12
FEATURE ID	LATITUDE	LONGITUDE	FEATURE TYPE	POINTS	FORMATION	DIME	VSIONS (FEET)	TREND (DEGREES)	DOM	DENSITY (NO/FT)	APERTURE (FEET)	INFILL	RELATIVE INFILTRATION RATE	TOTAL	SENS	πινιτγ		ENT AREA RES)	TOPOGRAPHY
						х	Y	Z		10						<40	<u>>40</u>	<1.6	<u>>1.6</u>	
WP-1	29.713353	-98.158867	SF	20	Ked	0.25	1	0.5	N	0	NA	NA	O-F-N	17	37	X			Х	Drainage
WP-2	29.712964	-98.159556	SC	20	Ked	0.75	0.5	1	NA	0	NA	NA	O-F	17	. 37	Х		Х		Hilltop
MH-1	29.715249	-98.158968	MB	30	Ked	2	2	?	NA	0	NA	NA	NA	5	35	Х		X		Drainage
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2A TYPE		TYPE		2	B POINTS	1					8	AINFILL	ING				_			
5	Cave				30		N	None	, exposed	d bed	rock									
SC	Solution cavity				20		С		se - cobbl			vn, sand,	gravel							
SF	Solution-enlarg	ed fracture(s)			20		0	Loos	e or soft r	mud c	or soil, o	rganics, I	eaves, sti	cks, dark co	lors					
=	Fault				20		F	Fines	s, compac	cted c	lay-rich	sediment	t, soil prof	īle, gray or r	ed color	s				
)	Other natural b	edrock features			5		V	Vege	tation. Gi	ve de	tails in r	narrative	descriptio	n						
1 B	Manmade featu	ire in bedrock			30		FS	Flow	stone, cer	ments	s, cave o	deposits								
SW	Swallow hole				30		x	Othe	r material	S										
SH	Sinkhole				20															
CD	Non-karst close	ed depression			5					12	TOPOC	GRAPHY			1					
Z		l or aligned featu	res		30		Cliff,	Hillto	p, Hillside	e, Dra	inage, F	loodplair	i, Streaml	bed						

I have read, I understood, and I have followed the Texas Commission on Environmental Quality's Instructions to Geologists. The information presented here constructions for the conditions observed in the field. My signature certifies that I restonalified as a geologist defined by 30 TAC Chapter 213.

 My signature certifies that I restonalified as a geologist defined by 30 TAC Chapter 213.

 STAN REECE

 Date

 GEOLOGY

 No. 3295

 Sheet
 1

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 1



GEOLOGIC ASSESSMENT FOR THE WESTPOINTE VILLAGE SEWAGE COLLECTION SYSTEM TRACT

Comal County, Texas

May 2009

Prepared for:

H.E.B Grocery Company, LP and B&O Development G.P., L.L.C. c/o Barshop and Oles, Inc. 900 Isom Road, Suite 300 San Antonio, Texas 78216

Prepared by:

aci consulting 1001 Mopac Circle, Suite 100 Austin, Texas 78746

aci consulting

a division of aci group, LLC



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11.0	RECOMMENDATIONS	
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Appendix A: GA Table

2



May 2009

Geologic Assessment for the Westpointe Village Sewage Collection System Tract in Comal County, Texas 4

1.0 INTRODUCTION

The purpose of this task is to identify "karst" features during a pedestrian survey for the property known as the Westpointe Village Sewage Collection System tract in New Braunfels, Comal County, Texas. The approximate 50-acre property, hereafter referred to as the subject area, is located at the northwest corner of State Loop 337 and Highway 46 in New Braunfels, Comal County, Texas (Figure 1).

2.0 SCOPE

This report is intended to satisfy the requirements for a Geologic Assessment, which shall be included as a component of a Water Pollution Abatement Plan (WPAP). The scope of the report consists of a site reconnaissance and field survey and review of existing data and reports. Features identified during the field survey are ranked utilizing the Texas Commission on Environmental Quality (TCEQ) matrix for Edwards Aquifer Recharge Zone Features. The ranking of the features determines their viability as a recharge feature.

3.0 INVESTIGATION METHOD

The following investigation methods and activities were used to develop this report:

- A review of existing files and literature to determine the regional geology and known caves associated with the property;
- A review of past geological field reports, cave studies, and correspondence regarding the existing geologic features on the property;
- A site reconnaissance performed by a registered professional geologist to identify and examine caves, recharge features, and other significant geological features; and,
- Evaluation of collected field data and a ranking of features using the TCEQ Ranking Table 0585 for the Edwards Aquifer Recharge Zone.

Westpointe Village Geologic Assessment



Map Document: (P:\Project Folders\Barshop and Oles\Westpointe Village SCS\GIS\Maps\fig1_site.mxd) 5/18/2009 -- 3:57:59 PM



4.0 **PROPOSED SURVEY AREA USE**

The site will be utilized for the construction of a commercial/retail complex.

5.0 **REGIONAL AND SITE GEOLOGY**

The site lies within the Edwards aquifer recharge zone as defined by the TCEQ (TCEQ 2001). The geologic strata associated with the Edwards aquifer include the Georgetown Formations overlying the Edwards Limestone Formation, interfingering with the Comanche Peak Formation in Williamson County. These rocks are underlain by the Walnut Formation, which has members including the Whitestone Member, Keys Valley Marl Member, the Cedar Park Member, the Bee Cave Member and the Bull Creek Member. The Glen Rose Formation, another marine limestone, is located below the Walnut Formation. The dominant structural trend of known faults in the area is to the northeast on a bearing of approximately 30 to 40 degrees and to the southwest on a bearing of approximately 210 to 220 degrees.

Surface geology of the area is dominated by consistent outcrops of the Edwards Formation which is contained within the Fredericksburg Group. Outcrops on the site occur as light-gray to gray, thick bedded limestone. Some outcrops are dolomitic in nature. Figure 2 depicts the stratigraphic column for the site. A topographic map with formation outcrops is included as Figure 3.

6.0 KARST FEATURES IN COMAL COUNTY, TEXAS

In limestone terrains, karst is expressed by erratically developed cavernous porosity and the manifestations of sinkholes, voids, and erratic surface drainage. Karst landscapes are typical of the Edwards Limestone, occurring across a vast region of Central Texas west of the Balcones Escarpment, and these processes are critical to understanding the Edwards Aquifer within its various segments. The features produced by karst processes (voids, holes, and solution layers) eventually provide conduits for surface water runoff and "point recharge" for the Edwards aquifer. The identification and protection of these features in established recharge areas is critical to maintaining groundwater quality and species habitat. The United States Fish and Wildlife Service (USFWS) and the TCEQ require protective strategies within these areas to ensure recharge and endangered species habitat protection prior to, during, and upon completion of construction activities. The subject area is located in Comal County which is not within an area where endangered karst invertebrates exist or may be known to exist.

Figure 2 Stratigraphic Column Weston Tract

System	Group or Formation	Thickness	Description
· Cretaceous	Del Rio Clay (Kdr)	Unknown	Dark gray to olive brown, calcareous clay, some pyritic
Cretaceous	Edwards Limestone (Ked)	Unknown	Mostly hard and dense, thin bedded, dark gray, fine to medium grained limestone, some dolomitic. Tree cover is sparse in western portion of formation.



7.0 SITE SOILS

The description of the site soils are derived from two sources:

- Utilization of the "Soil Survey of Comal County, Texas," January, 1984, compiled by the United States Department of Agriculture (USDA) Natural Resource Conservation Service; and,
- Field observations made during the site reconnaissance.

There are two main soil units identified within the subject area:

Krum clay (Krb) -1 to 3 percent slopes – These are gently sloping soils occurring on stream terraces and valley hills. Typically, the surface layer consists of dark gray clay about 16 inches thick with subsoil to a depth of 58 inches consisting of grayish, brown clay. This soil is typically well-drained with moderate permeability.

Rumple-Comfort association (RUD), undulating – This association consists of shallow and moderately deep upland soils in the Edwards Plateau area. Rumple soils make up approximately 60 percent of the association, Comfort soils make up 20 percent and other soils, mainly Tarpley soils make up 20 percent. The typical surface layer consists of dark reddish-brown cherty clay loam about 10 inches thick. The subsoil to a depth of 28 inches is dark reddish brown extremely stony clay. The soil is mildly alkaline and noncalcareous throughout.

The surface layer of the Comfort soil is dark brown, extremely stony clay to about 7 inches. The subsoil to a depth of 12 inches is dark, reddish-brown, mildly alkaline, extremely stony clay. The underlying material is indurated non-calcareous fractured limestone throughout. All soils in this association are well-drained with moderate surface runoff. A site soils map is included as Figure 4 in this report.

8.0 **PREVIOUS SITE INVESTIGATIONS**

There are no known previous site investigations conducted for this property according to information received from the property developer.

9.0 DESCRIPTION OF SITE FEATURES

During a site visit conducted on July 25, 2007 there were no features identified within the site boundary (Figure 5). A GA Table is included in Appendix A. Following the completion of a realignment of the sewage collection system for Westpointe Village, an updated delineation of the alignment is included as figure 6.



10.0 SUMMARY OF FINDINGS

No geologic or manmade features were identified within the site boundary.



11.0 RECOMMENDATIONS

As there are no features found within the site boundary, there are no recommendations for the site.



12.0 REFERENCES

- Barnes, V.E. 1974. Geologic Atlas of Texas, Austin Sheet. Bureau of Economic Geology, The University of Texas at Austin.
- Soil Conservation Service. 1984. Soil Survey of Comal County, Texas. United States Department of Agriculture. Texas Agriculture Experiment Station. 136 pp.
- (TCEQ) Texas Commission on Environmental Quality. 2001. "Edwards Aquifer Protection Program, Chapter 213 Rules - Recharge Zone, Transition Zone, Contributing Zone, and Contributing Zone within the Transition Zone." Map. Digital data. November 28, 2001. Austin, Texas.



APPENDIX A

GA Table

		SSESS	MENT	TAB	LE				CT NA				ointe	Village Se						
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FEATURE ID	LATITUDE	LONGITUDE	FEATURE TYPE	POINTS	FORMATION	DIME	NSIONS (PEETJ	TREND (DEGREES)	DOM	DENSITY (NO/FT)	APERTURE (FEET)	INFILL	RELATIVE INFILTRATION RATE	TOTAL	SENS	τινιτγ		ENT AREA RES)	TOPOGRAPH
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• DATUM	1:																			
2A TYPE		TYPE		2	B POINTS							NFILLIN	IG							
С	Cave				30		N None, exposed bedrock													
SC	Solution ca	avity			20		C Coarse - cobbles, breakdown, sand, gravel													
SF	Solution-er	nlarged frac	ture(s)		20		O Loose or soft mud or soil, organics, leaves, sticks, dark colors													
F	Fault				20		F Fines, compacted clay-rich sediment, soil profile, gray or rad colors													
	Contraction of the second second second						V Vegetation. Give details in narrative description													
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Response to July 30, 2009 TCEQ Comments WestPointe Geologic Assessment and SCS reports HWY 46 and Loop 337 Comal County, Texas

Page 3 Geologic Assessment

4

- 1. (a) Revised map attached.
 - (b) See revised GA table which includes MH A-01 a non sensitive manmade feature in bedrock. MH A01 is also displayed on the revised map.

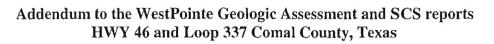
Page 4 July 30, 2009 SCS Investigation....

2. Two **non-sensitive** features were identified in the area of interest noted by the TCEQ. The feature WP-1 was outside the buffer for the proposed SCS line. Feature WP-2 is located just inside the 50 foot buffer upslope from the sewer line. The features are included on the site map and revised WPAP GA table. Additionally, feature photos and descriptions are attached.

Addendum to the WestPointe Geologic Assessment and SCS reports HWY 46 and Loop 337 Comal County, Texas

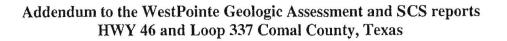


Feature WP-1- This feature is identified as a solution fracture (SF) located on the upper bank of a small drainage in the west central portion of the property. The rock joint is approximately 3 inches wide, 1 foot long and 6 inches deep. Infilling consisted of leaf litter, and dark soils. The feature was excavated by hand to reveal a bedrock bottom shown in the next photo. This feature is located outside the 50 foot buffer for the proposed SCS.



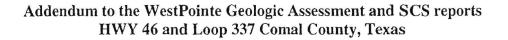


Feature WP-1- Post excavation photo showing bedrock bottom. This feature was rated as non-sensitive.



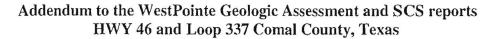


Feature WP-2- This feature was initially identified as a solution cavity. The feature was approximately $\frac{3}{4}$ foot by $\frac{1}{2}$ foot by 1 foot deep. Fill was identified as leaf litter, and loose soils. The feature sits on an elevated area on a shallow hillside and receives little to no drainage. The feature was excavated by hand.



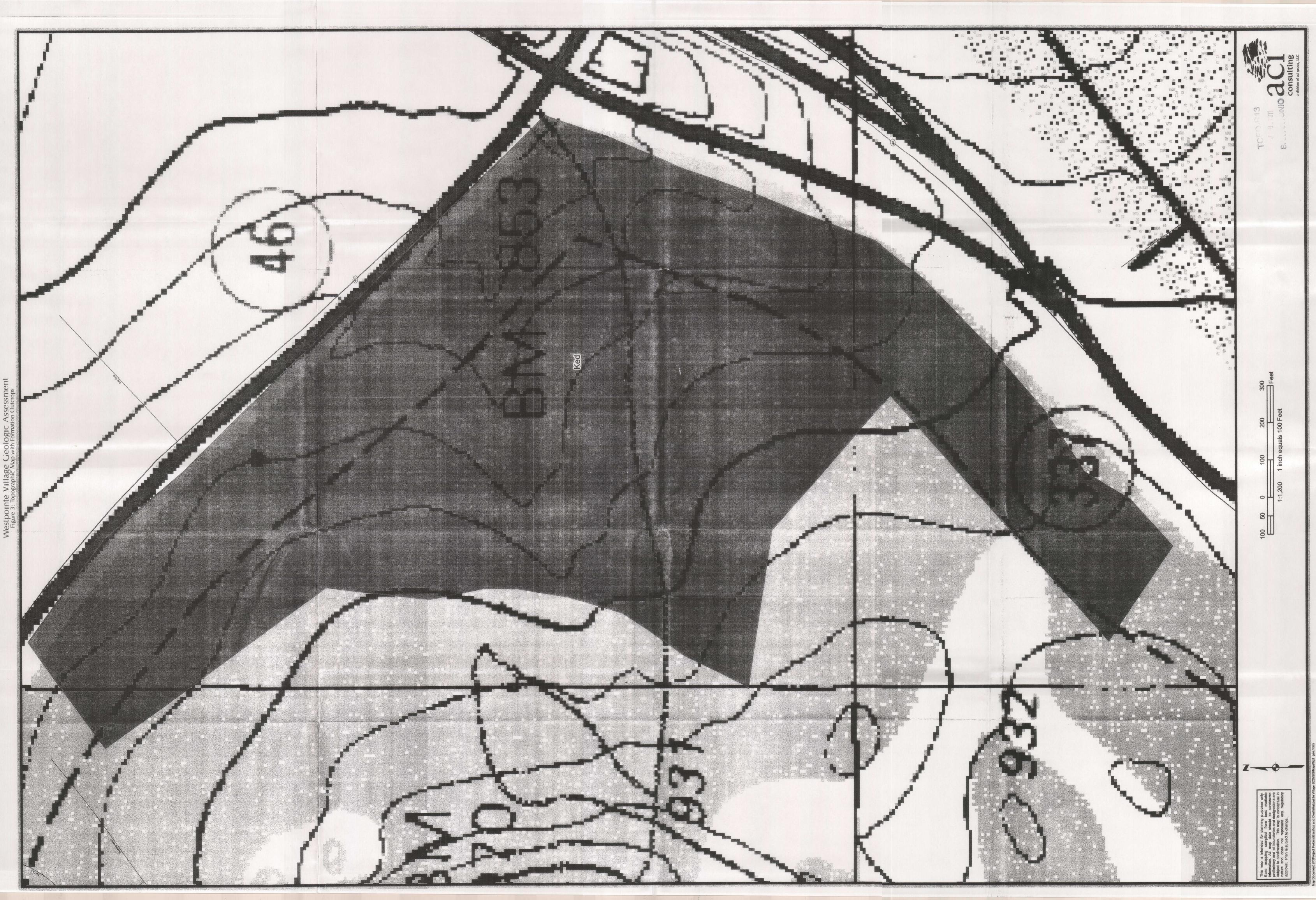


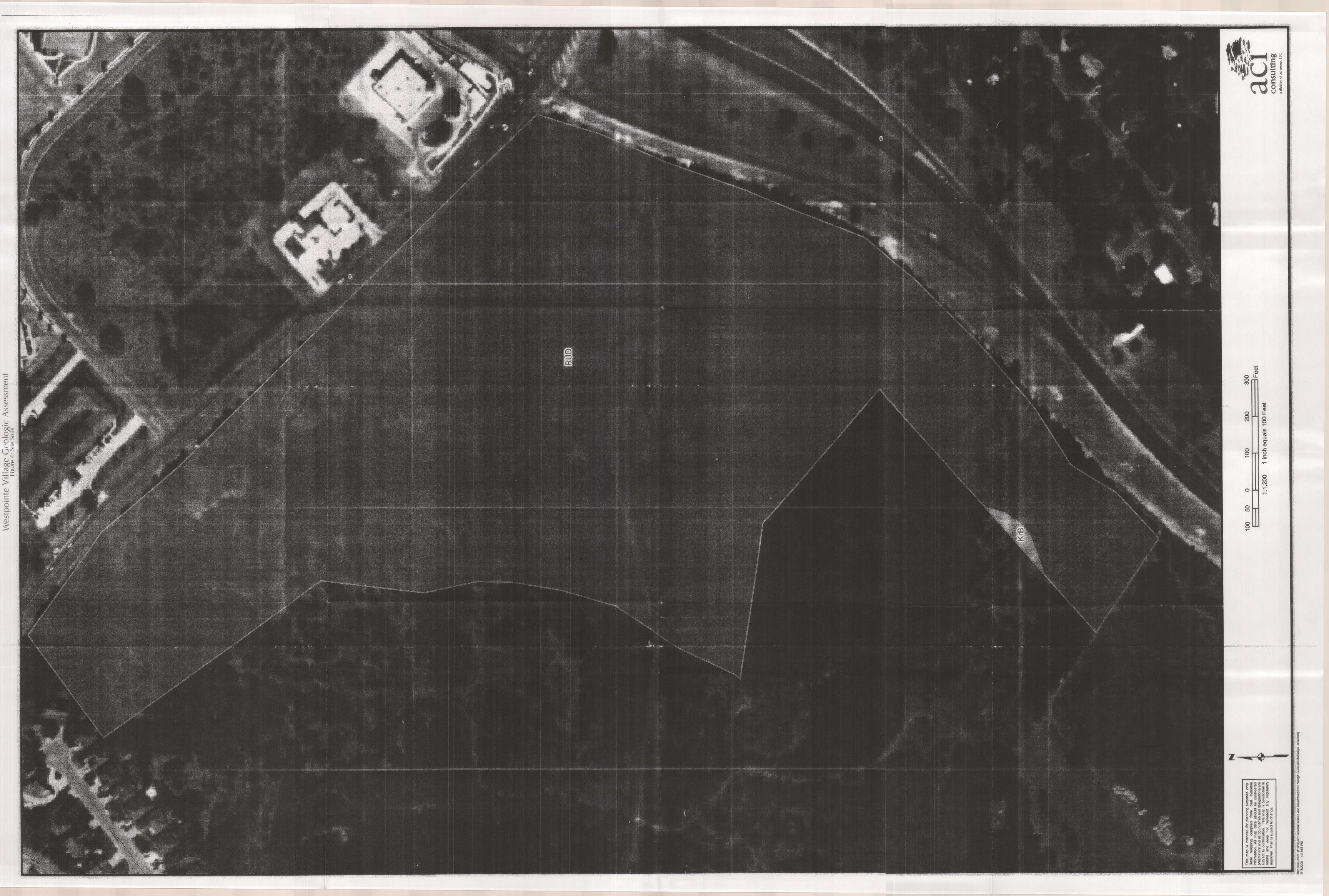
Feature WP-2- This feature was hand excavated to a depth of approximately $1\frac{1}{2}$ feet were it was determined that the feature was the result of uplift by roots. The feature was rated as non-sensitive.





Feature MH A-01- This is an existing man hole for an existing offsite SCS line. The feature is located between the sidewalk along HWY 46 and the northern fence line of the property. Due to the surface completion this man made feature in bedrock (MB) is classified as non-sensitive.







MODIFICATION OF PREVIOUSLY APPROVED PLAN

Modification of a Previously Approved Plan

for Regulated Activities on the Edwards Aquifer Recharge Zone and Transition Zone and Relating to 30 TAC 213.4(j), Effective June 1, 1999

- - X The applicant has not changed and the Customer Number (CN) is: CN_603488982
 - The applicant has changed. A new Core Data Form has been provided.
- 2. X Attachment A: Original Approval Letter and Approved Modification Letters: A copy of the original approval letter and copies any letters approving modification are found at the end of this form.
- 3. A modification of a previously approved plan in requested for (check all that apply):
 - X physical or operational modification of any water pollution abatement structure(s) including but not limited to ponds, dams, berms, sewage treatment plants, and diversionary structures;
 - _____ change in the nature or character of the regulated activity from that which was originally approved or a change which would significantly impact the ability of the plan to prevent pollution of the Edwards Aquifer;
 - X development of land previously identified as undeveloped in the original water pollution abatement plan;
 - _____ physical modification of the approved organized sewage collection system;
 - physical modification of the approved underground storage tank system;
 - _____ physical modification of the approved aboveground storage tank system.
 - 4. Summary of Proposed Modifications (select plan type being modified). If the approved plan has been modified more than once, copy the appropriate table below, as necessary, and complete the information for each additional modification.

WPAP Modification Summary Acres Type of Development Number of Residential Lots Impervious Cover (acres) Impervious Cover (%) Permanent BMPs Other	Approved Project 37.00 Commercial 0 18.56* 50.16%** Wet Basin	Proposed Modification 37.00 Commercial 0 21.44 57.95% N/A
SCS Modification Summary Linear Feet Pipe Diameter Other	Approved Project 2,855 8	Proposed Modification N/A
AST Modification Summary Number of ASTs Volume of ASTs Other	Approved Project	Proposed Modification

Note: *Pond designed for ±25.96 acres of impervious cover

**Impervious Cover % includes previously approved modifications within the overall project area

UST Modification Summary Number of USTs Volume of USTs Other	Approved Project	Proposed Modification N/A
---	------------------	------------------------------

- 5. X Attachment B: Narrative of Proposed Modification. A narrative description of the nature of the proposed modification is provided at the end of this form. It discusses what was approved, including previous modifications, and how this proposed modification will change the approved plan.
- 6. X Attachment C: Current site plan of the approved project. A current site plan showing the existing site development (i.e., current site layout) at the time this application for modification is provided at the end of this form. A site plan detailing the changes proposed in the submitted modification is required elsewhere.
 - ____ The approved construction has not commenced. The original approval letter, and any subsequent modification approval letters are included as Attachment A to document that the approval has not expired.
 - X The approved construction has commenced and has been completed. Attachment C illustrates that the site was constructed as approved.
 - ____ The approved construction has commenced and has been completed. Attachment C illustrates that the site was **not** constructed as approved.
 - ____ The approved construction has commenced and has **not** been completed. Attachment C illustrates that, thus far, the site was constructed as approved.
 - ____ The approved construction has commenced and has **not** been completed. Attachment C illustrates that, thus far, the site was **not** constructed as approved.
- 7. <u>N/A</u> The acreage of the approved plan has increased. A Geologic Assessment has been provided for the new acreage.
 - X Acreage has not been added to **or** removed from the approved plan.
- 8. X 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. The copies must be submitted to the appropriate regional office.

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 request for a **MODIFICATION TO A PREVIOUSLY APPROVED PLAN** is hereby submitted for TCEQ review and executive director approval. The request was prepared by:

Armando J. Niebla, P.E. Print Name of Customer/Agent

Signature of Customer/Agent

<u>bllir</u> Date

ATTACHMENT A

ORIGINAL APPROVAL LETTER AND APPROVED MODIFICATION LETTERS



Ø 002/006

Buddy Garcia, *Chairman* Larry R. Soward, *Commissioner* Bryan W. Shaw, Ph.D., *Commissioner* Mark R. Vickery, P.G., *Executive Director*



TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

Protecting Texas by Reducing and Preventing Pollution

August 25, 2009

Mr. William Vandenbosch, AIA NB Retail, Ltd. 900 Isom Rd Ste 300 San Antonio TX 78216

Re: Edwards Aquifer, Comal County

NAME OF PROJECT: WestPointe Village; Located at the southwest corner of Hwy. 46 and Loop 337; New Braunfels, Texas

TYPE OF PLAN: Request for Approval of a Water Pollution Abatement Plan (WPAP); 30 Texas Administrative Code (TAC) Chapter 213 Edwards Aquifer

Edwards Aquifer Protection Program ID No. 2873.01; Investigation No. 748244; Regulated Entity No. RN105739023

Dear Mr. Vandenbosch:

The Texas Commission on Environmental Quality (TCEQ) has completed its review of the WPAP application for the above-referenced project submitted to the San Antonio Regional Office by Bury+Partners on behalf of NB Retail, Ltd. on May 27, 2009. Final review of the WPAP was completed after additional material was received on July 17, 2009 and August 17, 2009. As presented to the TCEQ, the Temporary and Permanent Best Management Practices (BMPs) and construction plans were prepared by a Texas Licensed Professional Engineer to be in general compliance with the requirements of 30 TAC Chapter 213. These planning materials were sealed, signed and dated by a Texas Licensed Professional Engineer. Therefore, based on the engineer's concurrence of compliance, the planning materials for construction of the proposed project and pollution abatement measures are hereby approved subject to applicable state rules and the conditions in this letter. The applicant or a person affected may file with the chief clerk a motion for reconsideration must be filed no later than 23 days after the date of this approval letter. This approval expires two (2) years from the date of this letter unless, prior to the expiration date, more than 10 percent of the construction has commenced on the project or an extension of time has been requested.

PROJECT DESCRIPTION

The proposed commercial project will have an area of approximately 37.00 acres. It will include the construction of a commercial shopping center and associated parking, driveways and utilities. The impervious cover will be 16.12 acres (43.57 percent). Project wastewater will be disposed of by conveyance to the existing Gruene Water Recycling Center owned by New Braunfels Utilities.

PERMANENT POLLUTION ABATEMENT MEASURES

To prevent the pollution of storm water runoff originating on-site or upgradient of the site and potentially flowing across and off the site after construction, a wet basin, designed using the TCEQ technical guidance document, <u>Complying with the Edwards Aquifer Rules</u>: <u>Technical Guidance on Best</u>

REPLY TO: REGION 13 • 14250 JUDSON RD. • SAN ANTONIO, TEXAS 78233-4480 • 210-490-3096 • FAX 210-545-4329

minied up received paper using any based light



Mr. William Vandenbosch, AIA August 25, 2009 Page 2

<u>Management Practices</u> (2005), will be constructed to treat storm water runoff. The required total suspended solids (TSS) treatment for this project is 14,128 pounds of TSS generated from the 16.12 acres of impervious cover and 0.38 acres of existing impervious cover. The approved measures meet the required 80 percent removal of the increased load in TSS caused by the project.

The individual treatment measures will consist of a wet basin with a permanent pool volume of 126,728 cubic feet at the 852 foot elevation contour and a water quality volume of 246,881 cubic feet at the 854 foot elevation contour. The designed drainage area to the wet basin is 34.72 acres total and 14.78 acre of impervious cover from the development of Phase I. The wet basin will have two inlets and two separate forebays that lead to a main pool.

<u>GEOLOGY</u>

According to the geologic assessment included with the application, three non-sensitive geologic and manmade features exist at the site. The two geologic features were further excavated by hand and determined to have a low infiltration rating by the project geologist. The San Antonio Regional Office site assessment conducted on July 30, 2009 revealed the site as described by the revised geologic assessment. During the site assessment, regulated activities and soil disturbance was noted at the site.

SPECIAL CONDITIONS

- I. The permanent pollution abatement measures shall be operational prior to occupancy or public use of the facility.
- II. All sediment and/or media removed from the water quality basin during maintenance activities shall be properly disposed of according to 30 TAC 330 or 30 TAC 335, as applicable.
- III. As described in RG-348 (2005) a sediment depth marker is required in both sediment forebays.
- IV. As stated in the application, impervious cover is not approved in areas designated as Phase II in the WPAP application. Future modifications to this WPAP application will be required for construction of impervious cover in area designated as Phase II.
- V. Except for roadway and sidewalk construction to Oak Run Pkwy, regulated activities in the 5.54 acres along Loop 337 are not approved by this letter. The applicant is responsible for ensuring regulated activities approved in this application do not extend onto the 5.54 acres. Visible barriers should be considered to separate out the undisturbed areas.
- VI. Regulated activities identified during the site assessment constitute construction without the prior approval of a water pollution abatement plan as required by Commission rules (30 TAC Chapter 213). Therefore, the applicant is hereby advised that the after-the-fact approval of the development, as provided by this letter, shall not absolve the applicant of any prior violations of commission rules related to this project, and shall not necessarily preclude the Commission from pursuing appropriate enforcement actions and administrative penalties associated with such violations, as provided in 30 TAC §213.10 of Commission rules.
- VII. This approval letter is being issued for regulated activities (as defined in Chapter 213) and for best management practices presented in the application. This approval does not constitute a water right permit or authorization from the TCEQ Dam Safety Program. Failure to obtain all necessary authorizations could result in enforcement actions. For more information on Water Rights Permits, please refer to:

http://www.tceq.state.tx.us/permitting/water_supply/water_rights/wr_amiregulated.html

→ SA-Fax

Mr. William Vandenbosch, AIA August 25, 2009 Page 3

> For more information on the Dam Safety program, please refer to: <u>http://www.tceq.state.tx.us/compliance/field_ops/dam_safety/damsafetyprog.html</u>

STANDARD CONDITIONS

- 1. Pursuant to Chapter 7 Subchapter C of the Texas Water Code, any violations of the requirements in 30 TAC Chapter 213 may result in administrative penalties.
- 2. The holder of the approved Edwards Aquifer Protection Plan must comply with all provisions of 30 TAC Chapter 213 and all best management practices and measures contained in the approved plan. Additional and separate approvals, permits and/or authorizations from other TCEQ Programs (i.e., Storm Water, Water Rights, UIC) can be required depending on the specifics of the plan.
- 3. In addition to the rules of the Commission, the applicant may also be required to comply with state and local ordinances and regulations providing for the protection of water quality.

Prior to Commencement of Construction:

- 4. Within 60 days of receiving written approval of an Edwards Aquifer Protection Plan, the applicant must submit to the San Antonio Regional Office, proof of recordation of notice in the county deed records, with the volume and page number(s) of the county deed records of the county in which the property is located. A description of the property boundaries shall be included in the deed recordation in the county deed records. A suggested form (Deed Recordation Affidavit, TCEQ-0625) that you may use to deed record the approved WPAP is enclosed.
- 5. All contractors conducting regulated activities at the referenced project location shall be provided a copy of this notice of approval. At least one complete copy of the approved WPAP and this notice of approval shall be maintained at the project location until all regulated activities are completed.
- 6. Modification to the activities described in the referenced WPAP application following the date of approval may require the submittal of a plan to modify this approval, including the payment of appropriate fees and all information necessary for its review and approval prior to initiating construction of the modifications.
- 7. The applicant must provide written notification of intent to commence construction, replacement, or rehabilitation of the referenced project. Notification must be submitted to the San Antonio Regional Office no later than 48 hours prior to commencement of the regulated activity. Written notification must include the date on which the regulated activity will commence, the name of the approved plan and program ID number for the regulated activity, and the name of the prime contractor with the name and telephone number of the contact person. The executive director will use the notification to determine if the approved plan is eligible for an extension.
- 8. Temporary erosion and sedimentation (E&S) controls, i.e., silt fences, rock berms, stabilized construction entrances, or other controls described in the approved WPAP, must be installed prior to construction and maintained during construction. Temporary E&S controls may be removed when vegetation is established and the construction area is stabilized. If a water quality pond is proposed, it shall be used as a sedimentation basin during construction. The TCEQ may monitor storm water discharges from the site to evaluate the adequacy of temporary E&S control measures. Additional controls may be necessary if excessive solids are being discharged from the site.
- 9. All borings with depths greater than or equal to 20 feet must be plugged with non-shrink grout from the bottom of the hole to within three (3) feet of the surface. The remainder of the hole must be



Mr. William Vandenbosch, AIA i August 25, 2009 Page 4

backfilled with cuttings from the boring. All borings less than 20 feet must be backfilled with cuttings from the boring. All borings must be backfilled or plugged within four (4) days of completion of the drilling operation. Voids may be filled with gravel.

During Construction:

- 10. During the course of regulated activities related to this project, the applicant or agent shall comply with all applicable provisions of 30 TAC Chapter 213, Edwards Aquifer. The applicant shall remain responsible for the provisions and conditions of this approval until such responsibility is legally transferred to another person or entity.
- 11. This approval does not authorize the installation of temporary aboveground storage tanks on this project. If the contractor desires to install a temporary aboveground storage tank for use during construction, an application to modify this approval must be submitted and approved prior to installation. The application must include information related to tank location and spill containment. Refer to Standard Condition No. 6, above.
- 12. If any sensitive feature (caves, solution cavities, sink holes, etc.) is discovered during construction, all regulated activities near the feature must be suspended immediately. The applicant or his agent must immediately notify the San Antonio Regional Office of the discovery of the feature. Regulated activities near the feature may not proceed until the executive director has reviewed and approved the methods proposed to protect the feature and the aquifer from potentially adverse impacts to water quality. The plan must be sealed, signed, and dated by a Texas Licensed Professional Engineer.
- 13. No wells exist on site. All water wells, including injection, dewatering, and monitoring wells must be in compliance with the requirements of the Texas Department of Licensing and Regulation under Title 16 TAC Chapter 76 (relating to Water Well Drillers and Pump Installers) and all other locally applicable rules, as appropriate.
- 14. If sediment escapes the construction site, the 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). Sediment must be removed from sediment traps or sedimentation ponds not later than when design capacity has been reduced by 50 percent. Litter, construction debris, and construction chemicals shall be prevented from becoming storm water discharge pollutants.
- 15. Intentional discharges of sediment laden water are not allowed. If dewatering becomes necessary, the discharge will be filtered through appropriately selected best management practices. These may include vegetated filter strips, sediment traps, rock berms, silt fence rings, etc.
- 16. The following records shall be maintained and made available to the executive director upon request: 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.
- 17. Stabilization measures shall be initiated as soon as practicable in portions of the site where construction activities have temporarily or permanently ceased, and construction activities will not resume within 21 days. When the initiation of stabilization measures by the 14th day is precluded by weather conditions, stabilization measures shall be initiated as soon as practicable.



Mr. William Vandenbosch, AIA August 25, 2009 Page 5

After Completion of Construction:

- 18. 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 San Antonio Regional Office within 30 days of site completion.
- 19. The applicant shall be 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. The regulated entity shall then be responsible for maintenance until another entity assumes such obligations in writing or ownership is transferred. A copy of the transfer of responsibility must be filed with the executive director through San Antonio Regional Office within 30 days of the transfer. A copy of the transfer form (TCEQ-10263) is enclosed.
- 20. Upon legal transfer of this property, the new owner(s) is required to comply with all terms of the approved Edwards Aquifer protection plan. If the new owner intends to commence any new regulated activity on the site, a new Edwards Aquifer protection plan that specifically addresses the new activity must be submitted to the executive director. Approval of the plan for the new regulated activity by the executive director is required prior to commencement of the new regulated activity.
- 21. An Edwards Aquifer protection plan approval or extension will expire and no extension will be granted if more than 50 percent of the total construction has not been completed within ten years from the initial approval of a plan. A new Edwards Aquifer protection plan must be submitted to the San Antonio Regional Office with the appropriate fees for review and approval by the executive director prior to commencing any additional regulated activities.
- 22. At project locations where construction is initiated and abandoned, or not completed, the site shall be returned to a condition such that the aquifer is protected from potential contamination.

If you have any questions or require additional information, please contact Charly Fritz of the Edwards Aquifer Protection Program of the San Antonio Regional Office at (210) 403-4065.

Singerely,) Barcia Aark R. Vickerv

Executive Director Texas Commission on Environmental Quality

MRV/CEF/eg

Enclosures: Deed Recordation Affidavit, Form TCEQ-0625 Change in Responsibility for Maintenance of Permanent BMPs, Form TCEQ-10263

cc: Mr. Armando Niebla, P.E., Bury+Partners

Mr. James Klein, P.E., City Engineer, City of New Braunfels,

Mr. Thomas Hornseth, P.E., Comal County Engineer

Ms. Velma Danielson, General Manager, Edwards Aquifer Authority

TCEQ Central Records, Building F, MC212

ATTACHMENT B

NARRATIVE OF PROPOSED MODIFICATION

NARRATIVE OF PROPOSED MODIFICATION

An original WPAP report known as "Westpointe Village" prepared by Bury+Partners June of 2009 was reviewed and approved to account for the entire ± 37.00 -acre site including future phased development (EAPP #2823.01).

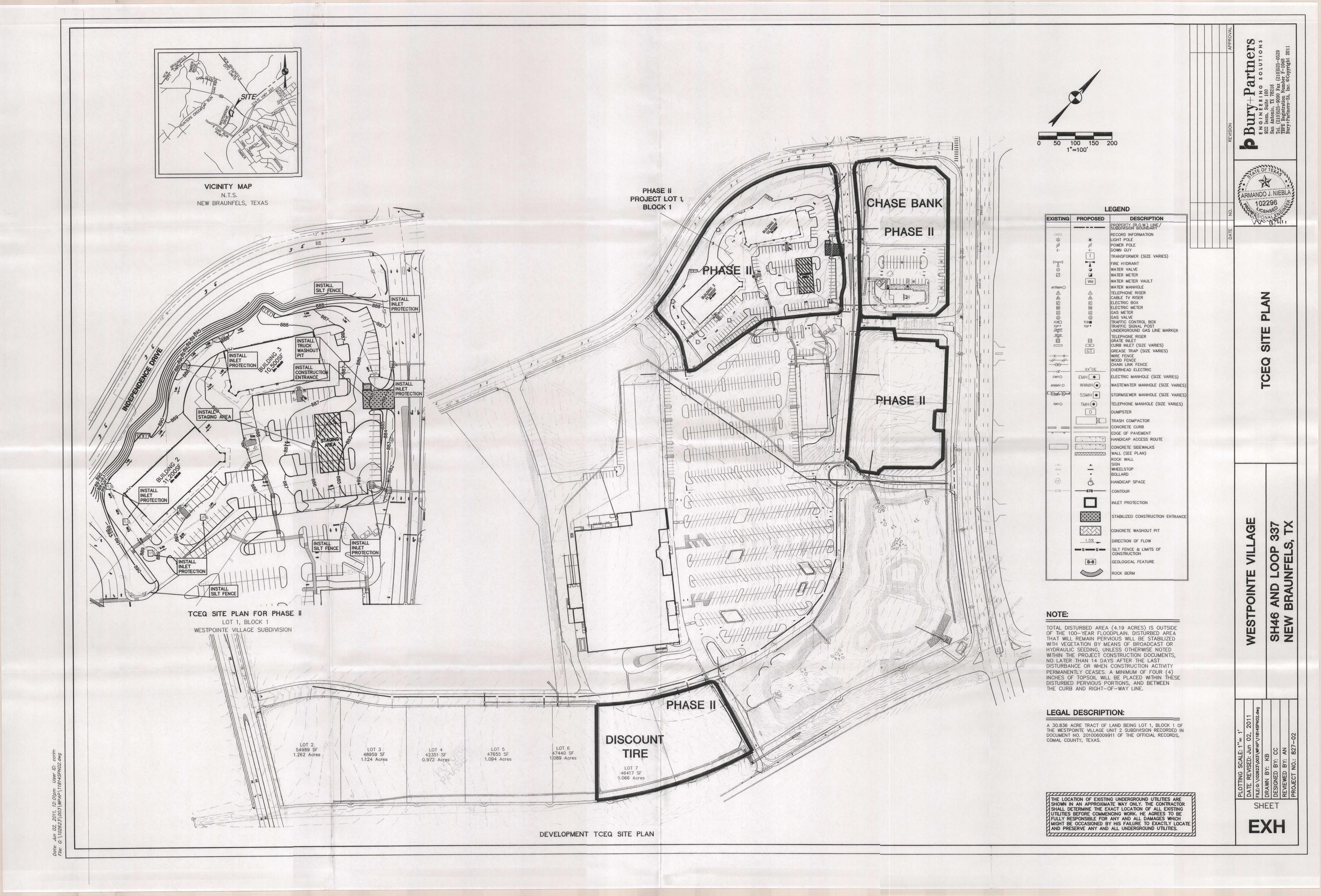
The Phase II Development of Lot 1 will result in a disturbance of approximately 4.19 acres of land for construction of the commercial shopping center, associated parking, and utilities. The development will result in an increase of ± 2.88 acres of impervious cover to the approved wet basin for the WestPointe Village Development resulting in an overall impervious cover percentage of 69% for Lot 1 which is below the anticipated build out of 90%.

There are no proposed modifications to the existing Permanent Best Management Practice structure, the Wet Basin, provided with the WestPointe Village Unit 2 Development.

The wet basin was designed for 25.96 acres of impervious cover. The development of Phase II brings the total impervious cover to ± 21.44 acres which are less than 25.96 acres. The existing wet basin has sufficient capacity to provide treatment of runoff for the Phase II retail project in accordance with the approved Water Pollution Abatement Plan; EAPP # 2873.01.

ATTACHMENT C

CURRENT SITE PLAN OF THE APPROVED PROJECT



WATER POLLUTION ABATEMENT PLAN APPLICATION

Water Pollution Abatement Plan Application

for Regulated Activities on the Edwards Aquifer Recharge Zone and Relating to 30 TAC §213.5(b), Effective June 1, 1999

REGULATED ENTITY NAME: Westpointe Village

REGULATED ENTITY INFORMATION

- 1. The type of project is:
 - ____ Residential: # of Lots:
 - Residential: # of Living Unit Equivalents:
 - X Commercial
 - Industrial
 - ____ Other: _____
- 2. Total site acreage (size of property): <u>37 (Lots1, 7-11)</u>
- 3. Projected population:
- 4. The amount and type of impervious cover expected after construction are shown below:

0

Impervious Cover of Proposed Project (Phase II)	Sq. Ft.	Sq. Ft./Acre	Acres
Structures/Rooftops	186,785	+ 43,560 =	4.29
Parking	560,355	÷ 43,560 =	12.86
Other paved surfaces	186,785	÷ 43,560 =	4.29
Total Impervious Cover	933,926	÷ 43,560 =	21.44
Total Impervious Cover ÷ Total Acreage x 100 =			57.95%

- 5. <u>X</u> ATTACHMENT A Factors Affecting Water Quality. A description of any factors that could affect surface water and groundwater quality is provided at the end of this form.
- 6. X Only inert materials as defined by 30 TAC §330.2 will be used as fill material.

FOR ROAD PROJECTS ONLY

Complete questions 7-12 if this application is exclusively for a road project.

7. 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.

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

- ____Concrete
- Asphaltic concrete pavement
- ____Other: _____

9	Length of Right of Way (R.O.W.): Width of R.O.W.: L x W = Ft² ÷ 43,560 Ft²/Acre =	feet. feet. acres.
10	Length of pavement area: Width of pavement area: L x W = Ft ² ÷ 43,560 Ft ² /Acre = Pavement area acres ÷ R.O.W. area _	feet. feet. acres. acres x 100 % impervious cover.

 11.
 ______A rest stop will be included in this project.

 _______A rest stop will not be included in this project.

12. ____ 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

13. X ATTACHMENT B - Volume and Character of Stormwater. A description of the volume and character (quality) of the stormwater runoff which is expected to occur from the proposed project is provided at the end of this form. The estimates of stormwater runoff quality and quantity should be 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

14. The character and volume of wastewater is shown below:

100% Domestic	45,443	gallons/day
% Industrial		gallons/day
% Commingled		gallons/day

TOTAL <u>45,443</u> gallons/day

15. Wastewater will be disposed of by:

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

- ____ ATTACHMENT C Suitability Letter from Authorized Agent. An on-site sewage facility will be used to treat and dispose of the wastewater. The appropriate licensing authority's (authorized agent) written approval is provided at the end of this form. It states that the land is suitable for the use of an on-site sewage facility or identifies areas that are not suitable.
- 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.

X Sewage Collection System (Sewer Lines):

- X Private service laterals from the wastewater generating facilities will be connected to an existing SCS.
- Private service laterals from the wastewater generating facilities will be connected to a proposed SCS.
 - The SCS was previously submitted on

- The SCS was submitted with this application.
- The SCS will be submitted at a later date. The owner is aware that the SCS may not be installed prior to Executive Director approval.

- X existing.
- proposed.
- 16. X All private service laterals will be inspected as required in 30 TAC §213.5.

SITE PLAN REQUIREMENTS

Items 17 through 27 must be included on the Site Plan.

- 17. The Site Plan must have a minimum scale of 1'' = 400'. Site Plan Scale: 1'' = 100.
- 18. 100-year floodplain boundaries
 - ____ Some part(s) of the project site is located within the 100-year floodplain. The floodplain is shown and labeled.
 - X 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):

FEMA FIRM Number 48091C0435F Effective Date September 2, 2009

- 19. X The layout of the development is shown with existing and finished contours at appropriate, but not greater than ten-foot contour intervals. Show lots, recreation centers, buildings, roads, etc.
 - X The layout of the development is shown with existing contours. Finished topographic contours will not differ from the existing topographic configuration and are not shown.
- 20. All known wells (oil, water, unplugged, capped and/or abandoned, test holes, etc.):
 - <u>N/A</u> There are ____(#) wells present on the project site and the locations are shown and labeled. (Check all of the following that apply)
 - ____ The wells are not in use and have been properly abandoned.
 - The wells are not in use and will be properly abandoned.
 - The wells are in use and comply with 16 TAC §76.
 - There are no wells or test holes of any kind known to exist on the project site.
- 21. Geologic or manmade features which are on the site:
 - _____All **sensitive** geologic or manmade features identified in the Geologic Assessment are shown and labeled.
 - X No sensitive geologic or manmade features were identified in the Geologic Assessment.
 - X ATTACHMENT D Exception to the Required Geologic Assessment. An exception to the Geologic Assessment requirement is requested and explained at the end of this form.
- 22. X The drainage patterns and approximate slopes anticipated after major grading activities.

23. <u>X</u> Areas of soil disturbance and areas which will not be disturbed.

- 24. <u>X</u> Locations of major structural and nonstructural controls. These are the temporary and permanent best management practices.
- 25. X Locations where soil stabilization practices are expected to occur.
- 26. N/A Surface waters (including wetlands).
- 27. Locations where stormwater discharges to surface water or sensitive features. X There will be no discharges to surface water or sensitive features.

ADMINISTRATIVE INFORMATION

- 28. X 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. The copies must be submitted to the appropriate regional office.
- 29. X Any modification of this WPAP will require Executive Director approval, prior to construction, and may require submission of a revised application, with appropriate fees.

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 **WATER POLLUTION ABATEMENT PLAN APPLICATION FORM** is hereby submitted for TCEQ review and Executive Director approval. The form was prepared by:

Armando J. Niebla, P.E. Print Name of Customer/Agent

Signature of Customer/Agent

<u>le il n</u> Date

ATTACHMENT A

FACTORS AFFECTING WATER QUALITY

FACTORS AFFECTING WATER QUALITY

The materials listed below are anticipated to be present on-site during construction and as such may present a potential pollutant source: (This is not an all inclusive list).

- 1. Concrete/Masonry
- 2. Metal studs, Metal reinforcing bars, etc.
- 3. Tar
- 4. Fertilizers
- 5. Petroleum based products
- 6. Cleaning solvents/Detergents
- 7. Wood

Material management practices will be utilized to reduce the risk of spills, or other accidental exposure of the materials listed above to storm water runoff, including the following:

- 1. An effort shall be made to store only enough product required to complete the work as so defined in the approved construction documents.
- 2. All materials stored on-site shall be stored in a neat, orderly manner in their appropriate containers and, if possible, under a roof or other enclosure.
- 3. Products should be kept in their original containers with the original manufacturer's label.
- 4. Manufactures' recommendations for proper use and disposal shall be followed.
- 5. Substances shall not be mixed with one another unless recommended by the manufacturer.
- 6. Whenever possible, all of a product shall be used before disposing of its respective container.
- 7. The site superintendent should inspect daily to ensure proper use and disposal of on-site materials.

Post-Construction

The materials listed below are anticipated to be present on-site after construction and as such may present a potential pollutant source: (This is not an all inclusive list).

- 1. Vehicle Fluid and Petroleum based products (Motor Oil, Brake Fluid, Etc.)
- 2. Trash and Debris (Litter)
- 3. Discarded Food and Tobacco Products

These and other sources of pollutants which may affect storm water quality will be screened and filtered by proposed water quality ponds that will treat the storm water prior to releasing into the creek. All ponds will undergo periodic maintenance and cleaning to keep the integrity and effectiveness of treatment efficiency.





ATTACHMENT B

VOLUME AND CHARACTER OF STORM WATER

VOLUME AND CHARACTER OF STORM WATER

The existing drainage area, which is ± 37.36 -acres, will produce a peak flow of 92 cfs during a 25-year storm event. This existing watershed releases into a TxDOT culvert structure at the intersection of SH-46 and Loop 337. The entire ± 37.36 acre drainage area is located within the Comal Creek Sub-Watershed within the Guadalupe River Watershed. The proposed drainage area consist of ± 34.72 acres that will be routed to the pond and ± 2.64 acres that will bypass the pond (± 0.36 acres being offsite improvements), and will produce a peak flow of 260 cfs during a 25-year storm event. The proposed watershed will utilize a wet basin to release runoff at its existing rate.

EXISTING CONDITIONS:

Drainage	Weighted	
Area	C-Value	Q25
Existing	0.38	92

PROPOSED CONDITIONS:

Drainage Area	Weighted C-Value	Q25
DA-1	0.70	245
UNTREATED	0.49	15

ATTACHMENT C

SUITABILITY LETTER FROM AUTHORIZED AGENT (Not Applicable)

ATTACHMENT D

EXCEPTION TO THE REQUIRED GEOLOGIC ASSESSMENT (Not Applicable)



TEMPORARY STORM WATER SECTION

Temporary Stormwater Section

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

REGULATED ENTITY NAME: WestPointe Village

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:
 - Aboveground storage tanks with a cumulative storage capacity of less that 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.
 - \underline{X} Fuels and hazardous substances will not be stored on-site.
- 2. <u>X</u> ATTACHMENT A Spill Response Actions. A description of the measures to be taken to contain any spill of hydrocarbons or hazardous substances is provided at the end of this form.
- 3. <u>N/A</u> 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. <u>X</u> ATTACHMENT B Potential Sources of Contamination. Describe in an attachment at the end of this form any other activities or processes which may be a potential source of contamination.
 - ____ There are no other potential sources of contamination.

SEQUENCE OF CONSTRUCTION

- 5. X 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 provided at the end of this form. For each activity described, an estimate of the total area of the site to be disturbed by each activity is given.
- 6. <u>X</u> 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: <u>Comal Creek</u>

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. X ATTACHMENT D Temporary Best Management Practices and Measures. A description of the TBMPs and measures that will be used during and after construction are provided at the end of this form. For each activity listed in the sequence of construction, include appropriate control measures and the general timing (or sequence) during the construction process that the measures will be implemented.
 - X 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 has been provided in the attachment at the end of this form
 - a. 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.
 - b. 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.
 - c. A description of how BMPs and measures will prevent pollutants from entering surface streams, sensitive features, or the aquifer.
 - d. 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.
 - <u>N/A</u> **ATTACHMENT E Request to Temporarily Seal a Feature.** A request to temporarily seal a feature is provided at the end of this form. The request includes justification as to why no reasonable and practicable alternative exists for each feature.
 - \underline{X} There will be no temporary sealing of naturally-occurring sensitive features on the site.
- 9. X ATTACHMENT F Structural Practices. Describe 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. Placement of structural practices in floodplains has been avoided.
- 10. <u>X</u> **ATTACHMENT G Drainage Area Map**. A drainage area map is provided at the end of this form to support the following requirements.

- ____ 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.
- X 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.
- 11. <u>N/A</u> **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 has 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 provided as at the end of this form.
- 12. <u>X</u> **ATTACHMENT I Inspection and Maintenance for BMPs.** A plan for the inspection of temporary BMPs and measures and for their timely maintenance, repairs, and, if necessary, retrofit is provided at the end of this form. A description of documentation procedures and recordkeeping practices is included in the plan.
- 13. X 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. <u>X</u> 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. \underline{X} 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. <u>X</u> 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. X 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 at the end of this form.
- 18. \underline{X} 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. \underline{X} Stabilization practices must be initiated as soon as practicable where construction activities have temporarily or permanently ceased.

ADMINISTRATIVE INFORMATION

- 20. \underline{X} All structural controls will be inspected and maintained according to the submitted and approved operation and maintenance plan for the project.
- 21. X 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. X 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.

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:

Armando J. Niebla Print Name of Customer/Agent

lolili Date

Signature of Customer/Agent

ATTACHMENT A

SPILL RESPONSE ACTIONS

SPILL RESPONSE ACTIONS

Potential Source:

Spills of Hydrocarbons or other hazardous substances.

Preventative Measures:

The following practices will be used to reduce the risks associated with hazardous materials, if hazardous materials are needed for the work:

Education/General Measures

- 1. Products will be kept in original containers unless they are not resealable.
- 2. Original labels and material safety data will be retained.
- 3. Modify the Storm Water Pollution Prevention Plan to include the information dealing with, and the steps needed to correct, the encountered hazardous waste spill.
- 4. 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 the 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.
- 5. Educate employees and subcontractors on potential dangers to humans and the environment from spills and leaks.
- 6. Hold regular meetings to discuss and reinforce appropriate disposal procedures (incorporate into regular safety meetings).
- 7. Establish a continuing education program to indoctrinate new employees.
- 8. Have contractor's superintendent or representative oversee and enforce proper spill prevention and control measures.
- 9. To the extent that the work can be accomplished safely, spills of oil, petroleum products, and substances listed under 40 CFR parts 110,117, and 302, as well as sanitary and septic wastes should be contained and cleaned up immediately.
- 10. Store hazardous materials and wastes in covered containers and protect from vandalism.

- 11. Place a stockpile of spill cleanup materials where it will be readily accessible.
- 12. Train employees in spill prevention and cleanup.
- 13. Designate responsible individuals to oversee and enforce control measures.
- 14. Spills should be covered and protected from storm water run-on during rainfall to the extent that it doesn't compromise clean up activities.
- 15. Do not bury or wash spills with water.
- 16. 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.
- 17. 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.
- 18. Contain water overflow or minor water spillage and do not allow it to discharge into drainage facilities or watercourses.
- 19. 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.
- 20. Keep waste storage areas clean, well organized, and equipped 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.

If surplus product must be disposed of, manufacturers' or local and state recommended methods for proper disposal will be followed.

Spill Measures:

In the event that hazardous wastes are encountered, they will be disposed of in the manner specified by local or state regulations.

Cleanup

- 1. Clean up leaks and spills immediately.
- 2. Use a rag for small spills on paved surfaces, a damp mop for general cleanup, and absorbent material for larger spills. If the spilled material is hazardous, then the used cleanup materials are also hazardous and must be disposed of as hazardous waste.
- 3. Never hose down or bury dry material spills. Clean up as much of the material as possible and dispose of properly. See the waste management BMPs in this section for specific information.

Minor Spills

- 1. 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.
- 2. Use absorbent materials on small spills rather than hosing down or burying the spill.
- 3. Absorbent materials should be promptly removed and disposed of properly.
- 4. Follow the practice below for a minor spill:
- 5. Contain the spread of the spill.
- 6. Recover spilled materials.
- 7. 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. T his response may require the cessation of all other activities.

Spills should be cleaned up immediately

- 1. Contain spread of the spill.
- 2. Notify the project foreman immediately.
- 3. 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.

- 4. If the spill occurs in dirt areas, immediately contain the spill by constructing an earthen dike. Dig up and properly dispose of contaminated soil.
- 5. If the spill occurs during rain, cover spill with tarps or other material to prevent contaminating runoff.

Significant/Hazardous Spills

Spills of hazardous waste in amounts that equal or exceed Reportable Quantity (RQ), as defined by the EPA through issued regulations (40 CFR Part 110, 40 CFR Part 117, 40 CFR Part 119 or 40 CFR Part 302), will be handled in the following steps:

- 1. Notify the National Response Center immediately at 1-800-424-8802.
- 2. Notify TCEQ immediately at 1-210-490-3096 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.
- 3. Submit a written description of the release to the EPA Region 11 office providing the date and circumstances of the release and the steps to be taken to prevent another release:

Attn: Hazardous Waste Dept. 1445 Ross Ave. STE 1200 Dallas, TX 75202 1-214-665-2224 (Region 6 Emergency Line)

- 4. 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.
- 5. Other agencies which may need to be consulted include, but are not limited to, the City Police Department, County Sheriff Office, Fire Departments, etc.

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

Vehicle Measures:

Vehicle and Equipment Maintenance

- 1. If maintenance must occur on-site, use a designated area and a secondary containment, located away from drainage courses, to prevent the run-on of stormwater and the runoff of spills.
- 2. Regularly inspect on-site vehicles and equipment for leaks and repair immediately.
- 3. Check incoming vehicles and equipment (including delivery trucks, and employee and subcontractor vehicles) for leaking oil and fluids. Do not allow leaking vehicles or equipment onsite.
- 4. Always use secondary containment, such as a drain pan or drop cloth, to catch spills or leaks when removing or changing fluids.
- 5. Place drip pans or absorbent materials under paving equipment when not in use.
- 6. Use absorbent materials on small spills rather than hosing down or burying the spill. Remove the absorbent materials promptly and dispose of properly.
- 7. Promptly transfer used fluids to the proper waste or recycling drums. Don't leave full drip pans or other open containers lying around.
- 8. Oil filters disposed of in trashcans or dumpsters can leak oil and pollute storm water. Place the oil filter in a funnel over a waste oil-recycling drum to drain excess oil before disposal. Oil filters can also be recycled. Ask the oil supplier or recycler about recycling oil filters.
- 9. Store cracked batteries in a non-leaking secondary container. Do this with all cracked batteries even if you think all the acid has drained out. If you drop a battery, treat it as if it is cracked. Put it into the containment area until you are sure it is not leaking.

Vehicle and Equipment Fueling

- 1. If fueling must occur on-site, use designated areas, located away from drainage courses, to prevent the run-on of storm water and the runoff of spills.
- 2. Discourage "topping off" of fuel tanks.
- 3. Always use secondary containment, such as a drain pan, when fueling to catch spills/ leaks.

ATTACHMENT B

POTENTIAL SOURCES OF CONTAMINATION

POTENTIAL SOURCES OF CONTAMINATION

- Potential Source: Oil, grease, fuel and hydraulic fluid contamination from construction equipment and vehicle dripping.
- Preventative Measures: Vehicle maintenance when possible will be performed within the construction staging area or at a local maintenance shop.
- Potential Source: Miscellaneous trash and litter from construction workers and material wrappings.
- Preventative Measures: Trash containers will be placed throughout the site to encourage proper trash disposal.
- Potential Source: Construction debris.
- Preventative Measures: Construction debris will be monitored daily by contractor. Debris will be collected and placed in disposal bins. Situations requiring immediate attention will be addressed on a case-by-case basis.
- Potential Source: Silt leaving the site.
- Preventative Measures: Contractor will monitor all vehicles leaving the site to prevent tracking silt and mud onto public streets. The contractor will ensure that trucks will be washed down to minimize the amount of silt leaving the site.

Potential Source: Construction related portable toilets.

Preventative Measures: Any on-site portable toilets will be in good working order with no defects that cause leaks. All portable toilets will be maintained to ensure no overflowing of sewage.

ATTACHMENT C

SEQUENCE OF MAJOR ACTIVITIES

SEQUENCE OF MAJOR ACTIVITIES

The sequence of work described below will be accomplished through the timing of proposed work relating the maintenance of service (i.e. proposed utility installation as compared to the removal/abandonment of existing utilities). The developer will deliver a cleared pad site graded to an elevation approximately consistent with approved CZP Plan. Below is a general sequence of events to be followed:

- 1. Obtain all required permits. (July 2011)
- 2. Review and document through photographic record the condition and state of the Developments water quality basin.
- 3. Install all Erosion Control Measures. (±4.19 acres) (August 2011)
- 4. Begin construction of building foundation; install all underground utilities and construction of site improvements. (August 2011 November 2011)
- 5. Maintain and replace erosion control measures as requires. (Ongoing)
- 6. Fine Grade site. $(\pm 0.10 \text{ acres})$ (September 2011)
- 7. Install pavement (November 2011)
- 8. Inspect and maintain all erosion control measures until all disturbed offsite and on-site areas have been hydromulched or sodded in accordance with the landscape plan and a mowable stand of grass is achieved.

Total Site Area/Total Disturbed Area

The total area of the site is ± 4.19 acres. Approximately 4.19 Acres within Lot 9 will be disturbed through site excavation, grading, or other activities throughout the construction process for this project. Post-construction impervious coverage will total ± 21.44 acres for the entire development.

ATTACHMENT D

TEMPORARY BEST MANAGEMENT PRACTICES AND MEASURES

TEMPORARY BMPs

At the beginning of the project, Temporary Best Management Practices (BMPs) will be installed according to the attached Temporary BMPs Details and placed as shown on the TCEQ Site Plan.

Upgradient Water

The site is located near the southwest corner of the State Highway 46 and Loop 337 intersection. Upgradient water from undeveloped sites upstream of the proposed development will be captured into a storm sewer system and routed around existing water quality and detention ponds.

On-site Water

Silt fencing will be placed along the boundary line of the majority of the tract. Inlet protection and triangular filter dikes will be placed as necessary. These Temporary BMPs will be installed along the down-gradient boundary of the property to filter all runoff that originates on site and sequenced as indicated in the report. A temporary construction entrance will be installed to prevent tracking materials offsite. In addition, a concrete truck washout pit will be placed on-site and be accessible to all exiting traffic leaving the site. By this, the Temporary BMPs will prevent pollution of surface water that originates on-site.



ATTACHMENT E

REQUEST TO TEMPORARILY SEAL A FEATURE (Not Applicable)

ATTACHMENT F

STRUCTURAL PRACTICES

STRUCTURAL PRACTICES

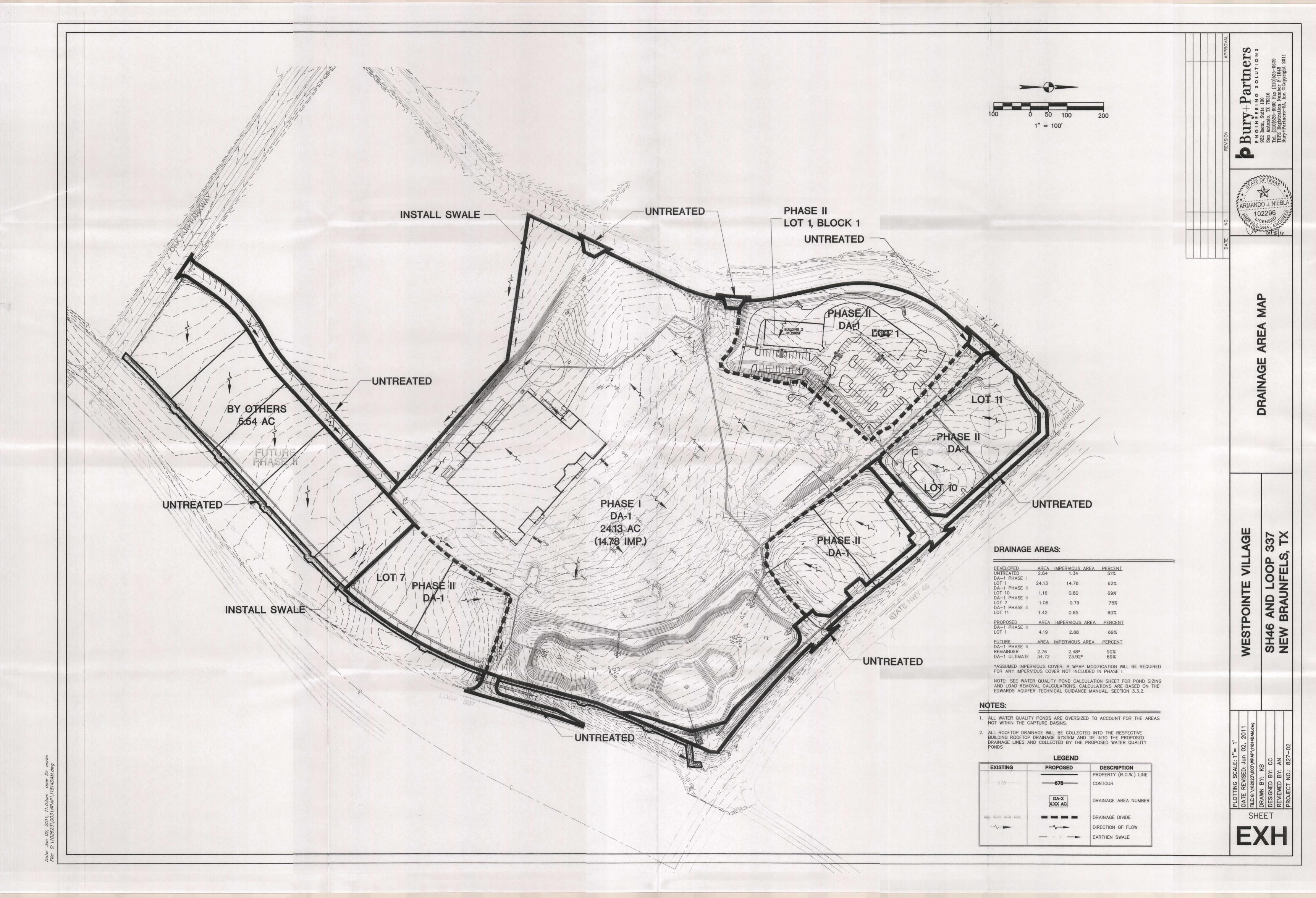
Silt fencing, triangular sediment filter dikes, inlet protection devices, and stabilized construction entrances will be incorporated as temporary erosion control devices and will be removed after permanent stabilization is established.

Silt fencing shall be incorporated throughout the construction process. The placement of the silt fencing shall be perpendicular to runoff flow. Refer to project construction documents for quantity and actual locations of these erosion control devices. In areas where silt fencing is to be situated but is non-installable, triangular filter dikes shall be incorporated.

Stabilized construction entrances will be employed during the construction of this development to help minimize vehicle tracking of sediments. Paved streets adjacent to these site entrances shall be cleaned regularly to remove any excess mud, dirt or rock tracked from the site. Refer to the project construction documents for actual locations of these erosion control devices. Staging areas will be utilized in locations as decided by the project general contractor and validated by the ivil engineer. If the contractor determines the need for additional stabilized construction entrances, construction staging areas or pits, their locations shall be agreed upon by the contractor and the engineer.

ATTACHMENT G

DRAINAGE AREA MAP



ATTACHMENT H

TEMPORARY SEDIMENT POND(S) PLANS AND CALCULATIONS (Not Applicable)

ATTACHMENT I

INSPECTION AND MAINTENANCE FOR BMPs

INSPECTIONS

Each contractor will designate a qualified person (or persons) to perform the following inspections:

- 1. Disturbed areas and areas used for storage of materials that are exposed to precipitation will be inspected for evidence of, or the potential for, pollutants entering the drainage system.
- 2. Erosion and sediment control measures identified in the plan will be observed to ensure that they are operating correctly.
- 3. Where discharge locations or points are accessible, they will be inspected to ascertain whether erosion control measures are effective in preventing significant impacts to receiving waters.
- 4. Locations where vehicles enter or exit the site will be inspected for evidence of offsite sediment tracking.
- 5. Permanent seeding and planting will be inspected for bare spots, washouts and unhealthy growth.

The inspection shall be conducted by the responsible person at least once every seven (7) calendar days and within 24 hours after a storm providing 1/2 inches of rainfall or greater. If one or more of the following conditions apply, the frequency of inspections shall be conducted at least once every month:

- 1. The site has been either finally or temporarily stabilized.
- 2. Where runoff is unlikely due to winter conditions (i.e. site is covered with snow, ice, or where frozen ground exists.
- 3. During seasonal arid periods in arid areas (areas with an average annual rainfall of 0 to 10 inches) and semi-arid areas (areas with an average annual rainfall of 10 to 20 inches).

The information required within an inspection and maintenance report are as follows:

- 1. Summary of the scope of the inspection.
- 2. Name(s) and qualifications of personnel making the inspection.
- 3. The date(s) of the inspection.

- 4. Major observations relating to the implementation of the storm water pollution prevention plan.
- 5. Changes required to correct damages or deficiencies in the control measures.

In addition to the required routine inspections, the following record of information will also be maintained:

- 1. The dates when major grading activities occur.
- 2. The dates when construction activities temporarily or permanently cease on a portion of the site.
- 3. The dates when stabilization measures are initiated.

Inspection and maintenance reports as well as all records required by this Storm Water Pollution Prevention Plan shall become part of the Storm Water Pollution Plan. Copies of example forms to be used for the inspection and maintenance reports as well as related records are included in the project's Texas Pollution Discharge Elimination System (TPDES) Report.

MAINTENANCE

Based on the results of the inspection, any changes required to correct damages or deficiencies in the control measures shall be made within seven (7) calendar days after the inspection. If existing stabilization/erosion controls need modification or additional stabilization/erosion controls are necessary, implementation shall be achieved prior to the next anticipated storm event. If, however, the execution of this requirement becomes impractical, then the implementation will occur as soon as possible, with the incident duly noted with an explanation of the impracticality, in the inspection report.

Sediment accumulation at each control will be removed and properly disposed when the depth of accumulation equals or exceeds six (6) inches. If sediment accumulation is found to be contaminated, its disposal shall be off-site in a manner which conforms to the appropriate applicable regulations.

ATTACHMENT J

SCHEDULE OF INTERIM AND PERMANENT SOIL STABILIZATION

SCHEDULE OF INTERIM AND PERMANENT SOIL STABILIZATION

During Construction:

The methodology for handling pollution of on-site or up-gradient storm water during construction will include the following:

- 1. Silt fencing and rock berms will be used as a temporary erosion and sedimentation controls.
- 2. Stabilized construction entrances/exits will be put into place to reduce the dispersion of sediment from the site, and to aid in accessibility to the site.
- 3. A construction staging area will also be put into place for material stockpiles, machinery storage, and machinery maintenance.
- 4. Concrete truck washout pits will be put into place to prevent contamination of storm water runoff and to aid in the removal of sediments from the site.
- 5. As required by the TCEQ General Permit, disturbed areas on which construction activity has ceased (temporarily or permanently) and which will be exposed for more than 21 days shall be stabilized within 14 days. Areas receiving less than 20 inches of annual rainfall should be stabilized as soon as practicable and only to pre-project conditions.
- 6. If construction stops for more than 14 days, hydro-seeding, sod or other TCEQ approved method will be applied to re-stabilize vegetation.

After Construction:

This site will provide the following permanent pollution abatement measures to prevent the pollution of storm water originating on-site or upgradient from the project site:

- 1. Storm water will be directed to grate inlets via curbing and grading and discharged into the sedimentation/filtration basins. The sedimentation/filtration basins have been designed to capture and filter the required runoff from the individual watersheds. The basin has been designed in accordance with the TCEQ Technical Guidance Manual. Each basin will be constructed as that particular phase is built.
- 2. Native grasses will be used on-site to help reduce the use of fertilizers and this will in turn reduce the levels of phosphates present in the stormwater runoff.
- 3. Where possible drainage will be directed across vegetated areas to provide some pretreatment prior to discharge into the filter basin.

Permanent Erosion Control:

- 1. All disturbed areas shall be restored as noted below:
 - A minimum of 4" of topsoil shall be placed in all drainage channels (except rock) and between the curb and R.O.W. property lines.
- 2. Broadcast Seeding:
 - From September 15 to March 1, seeding shall be with a combination of 2 pounds per 1,000 SF of unhulled Bermuda and 7 pounds per 1000 SF of Winter Rye with a purity of 95% with 90% germination.
 - From March 2 to September 14, seeding shall be with hulled Bermuda at a rate of 2 pounds per 1000 SF with a purity of 95% with 85% germination.
- 3. Fertilizer shall be a pelleted or granular slow release with an analysis of 15-15-15 to be applied once at planting and once during the period of establishment at a rate of 1 pound per 1,000 SF.
- 4. Hydraulic Seeding:
 - From September 15 to March 1, seeding shall be with a combination of 1 pound per 1,000 SF of unhulled Bermuda and 7 pounds per 1,000 SF of Winter Rye with a purity of 95% with 90% germination.
 - From March 2 to September 14, seeding shall be with hulled Bermuda at a rate of 7 pounds per 1,000 SF with a purity of 95% with 85% germination.
- 5. Fertilizer shall be a water soluble fertilizer with an analysis of 15-15-15 at a rate of 1 to 1.5 pounds per 1,000 SF (45-65 pounds per acre).
- 6. Mulch type used shall be hay, straw, or mulch applied at a rate of 45 pounds per 1,000 SF with a soil tackifier at a rate of 1.4 pounds per 1,000 SF.
- 7. The planted area shall be irrigated or sprinkled in a manner that will not erode the topsoil but will sufficiently soak the soil to a depth of 6". The irrigation shall occur at ten-day intervals during the first two months. Rainfall occurrences of ¹/₂" or more shall postpone the watering schedule for one week.
- 8. Restoration shall be acceptable when the grass has grown at least 1¹/₂" high with 95% coverage, provided no bare spots larger than 16 square feet exist.



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PERMANENT STORM WATER SECTION

Permanent Stormwater Section

for Regulated Activities on the Edwards Aquifer Recharge Zone and Relating to 30 TAC §213.5(b)(4)(C), (D)(Ii), (E), and (5), Effective June 1, 1999

REGULATED ENTITY NAME: _____ WestPointe Village

Permanent best management practices (BMPs) and measures that will be used during and after construction is completed.

- 1. <u>X</u> Permanent BMPs and measures must be implemented to control the discharge of pollution from regulated activities after the completion of construction.
- 2. <u>X</u> 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.
 - <u>X</u> 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 provided below:
- 3. X 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.
- 4. <u>X</u> 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.
 - This site will be used for low density single-family residential development and has 20% or less impervious cover.
 - ____ This site will be used for low density single-family residential development but has more than 20% impervious cover.
 - X This site will not be used for low density single-family residential development.
- 5. <u>X</u> The executive director may waive the requirement for other permanent BMPs for multifamily 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.

- <u>N/A</u> **ATTACHMENT A 20% or Less Impervious Cover Waiver.** This 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 found at the end of this form.
- ____ This site will be used for multi-family residential developments, schools, or small business sites but has more than 20% impervious cover.
- <u>X</u> This site will not be used for multi-family residential developments, schools, or small business sites.

6. ATTACHMENT B - BMPs for Upgradient Stormwater.

- <u>X</u> 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 identified as **ATTACHMENT B** at the end of this form.
- ____ If no surface water, groundwater or stormwater originates upgradient from the site and flows across the site, an explanation is provided as **ATTACHMENT B** at the end of this form.
- _____ If 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, an explanation is provided as **ATTACHMENT B** at the end of this form.

7. ATTACHMENT C - BMPs for On-site Stormwater.

- <u>X</u> 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 identified as **ATTACHMENT C** at the end of this form.
- ____ If 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, an explanation is provided as **ATTACHMENT C** at the end of this form.
- 8. <u>X</u> ATTACHMENT D BMPs for Surface Streams. A description of the BMPs and measures that prevent pollutants from entering surface streams, sensitive features, or the aquifer is provided at the end of this form. Each feature identified in the Geologic Assessment as "sensitive" has been addressed.
- 9. X The applicant understands that to the extent practicable, BMPs and measures must maintain flow to naturally occurring sensitive features identified in either the geologic assessment, executive director review, or during excavation, blasting, or construction.
 - X The permanent sealing of or diversion of flow from a naturally-occurring "sensitive" or "possibly sensitive" feature that accepts recharge to the Edwards Aquifer as a permanent pollution abatement measure has not been proposed for any naturally-occurring "sensitive" or "possibly sensitive" features on this site.
 - <u>N/A</u> **ATTACHMENT E Request to Seal Features.** A request to seal a naturallyoccurring "sensitive" or "possibly sensitive" feature, that includes a justification as to why no reasonable and practicable alternative exists, is found at the end of this form. A request and justification has been provided for each feature.
- 10. <u>X</u> ATTACHMENT F 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. All construction plans and design information have been signed, sealed, and dated by the Texas Licensed Professional Engineer. Construction plans for the proposed permanent BMPs and measures are provided at the end of this form. Design Calculations, TCEQ

Construction Notes, all man-made or naturally occurring geologic features, all proposed structural measures, and appropriate details must be shown on the construction plans.

- 11. <u>X</u> ATTACHMENT G Inspection, Maintenance, Repair and Retrofit Plan. A plan for the inspection, maintenance, repair, and, if necessary, retrofit of the permanent BMPs and measures is provided at the end of this form. The plan has been prepared and certified by the engineer designing the permanent BMPs and measures. The plan has been signed by the owner or responsible party. The plan includes procedures for documenting inspections, maintenance, repairs, and, if necessary, retrofits as well as a discussion of record keeping procedures.
- 12. <u>X</u> The TCEQ Technical Guidance Manual (TGM) was used to design permanent BMPs and measures for this site.
 - <u>N/A</u> Pilot-scale field testing (including water quality monitoring) may be required for BMPs that are not contained in technical guidance recognized by or prepared by the executive director.
 - <u>N/A</u> **ATTACHMENT H Pilot-Scale Field Testing Plan.** A plan for pilot-scale field testing is provided at the end of this form.
- 13. X ATTACHMENT I -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 provided at the end of this form. 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 results in water quality degradation.

Responsibility for maintenance of permanent BMPs and measures after construction is complete.

- 14. X 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.
- 15. <u>X</u> 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.

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 **PERMANENT STORMWATER SECTION** is hereby submitted for TCEQ review and executive director approval. The application was prepared by:

Armando J. Niebla, P.E. Print Name of Customer/Agent Signature of Customer/Agent

TCEQ-0600 (Rev. 10/01/04)

<u>loliii</u> Date

ATTACHMENT A

20% OR LESS IMPERVIOUS COVER WAIVER (Not Applicable)

ATTACHMENT B

BMPs FOR UPGRADIENT STORM WATER

BMPs FOR UPGRADIENT STORM WATER

Upgradient water from undeveloped sites upstream of the proposed development will be captured into a storm sewer system and routed around existing water quality and detention ponds.

ATTACHMENT C

BMPs FOR ON-SITE STORM WATER

BMPs FOR ON-SITE STORM WATER

The Best Management Practice implemented for this site will consist of a single wet basin. The wet basin will serve the respective drainage areas providing sufficient storage volumes to treat 80% of all TSS produced by the proposed development. All BMPs have been designed in accordance with the TCEQ's Technical Guidance Manual. All TSS produced from impervious cover that was not routed to the proposed wet basin, which includes private drives with insufficient grades to be routed through a storm sewer system or the private road located on the southeast portion of the proposed tract, where accounted for by providing over treatment.



BMPs FOR SURFACE STREAMS

BMPS FOR SURFACE STREAMS

There are no surface streams on-site. Furthermore, there are no sensitive features identified on the Geological Assessment.

ATTACHMENT E

REQUEST TO TEMPORARILY SEAL A FEATURE (Not Applicable)

ATTACHMENT F

CONSTRUCTION PLANS

CONSTRUCTION PLANS

The Construction Plans for the Approved Wet Basin at WestPointe Village (EAPP ID No. 2873.01) remain current and will not be modified with this submittal. The Construction Plans have been provided in the Modification of a Previously Approved WPAP Section within this document.

ATTACHMENT G

INSPECTION, MAINTENANCE, REPAIR AND RETROFIT PLAN

INSPECTION, MAINTENANCE, REPAIR AND RETROFIT PLAN FOR WESTPOINTE SHOPPING CENTER (SH 46 AND LOOP 337)

The owner of the lot where a sedimentation/filtration basin is located is responsible for the inspection, maintenance, and repair of the water quality pond(s).

• First year of operation. The sand filter BMPs will be inspected on a quarterly basis and after large storms for the first year of operation.

• Inspections. BMP facilities will be inspected at least twice a year (once during or immediately following wet weather) to evaluate facility operation. During each inspection, erosion areas inside and downstream of the BMP will be identified and repaired or re-vegetated immediately. With each inspection, any damage to the structural elements of the system (pipes, concrete drainage structures, retaining walls, etc.) will be identified and repaired immediately. Cracks, voids and undermining will be patched/filled to prevent additional structural damage. Trees and root systems will be removed to prevent growth in cracks and joints that can cause structural damage.

• Sediment Removal. Sediment will be removed from the inlet structure and sedimentation chamber when sediment buildup reaches a depth of 6 inches or when the proper functioning of inlet and outlet structures is impaired. Sediment will be cleared from the inlet structure at least every year and from the sedimentation basin at least every 5 years.

• *Media Replacement*. Maintenance of the filter media will be performed *when the drawdown time exceeds 48 hours*. When this occurs, the upper layer of sand will be removed and replaced with new material meeting the original specifications. Any discolored sand will also be removed and replaced. In filters that have been regularly maintained, this will be limited to the top 2 to 3 inches.

• Boom Truck Use. A boom truck will be used for the removal of sediment from basins without the presence of a ramp, as well as used for replacing the filter media and any other pond maintenance operation.

• Debris and Litter Removal. Debris and litter that accumulates near the sedimentation basin outlet device will be removed *during regular mowing operations and inspections*. (Particular attention will be paid to floating debris that can eventually clog the control device or riser.)

• *Filter Underdrain*. The underdrain piping network will be cleaned to remove any sediment buildup *as needed* to maintain design drawdown time.

INSPECTION, MAINTENANCE, REPAIR AND RETROFIT PLAN FOR WESTPOINTE SHOPPING CENTER (SH 46 AND LOOP 337)

• *Mowing.* Grass areas in and around sand filters will be mowed *at least twice annually* to limit vegetation height to 18 inches. Vegetation on the pond embankments will be mowed as appropriate to prevent the establishment of woody vegetation.

• *Rock Gabion*. Rock gabion structure will be removed from pond prior to filter media replacement, cleaned and returned to the original location after the filter media replacement is complete.

William VandenBosch VP Name of Owner/Agent for NB Retail, Ltd

William Voundien Posch

Signature of Owner/Agent

14/09

Date

ATTACHMENT H

PILOT-SCALE FIELD TESTING PLAN (Not Applicable)

ATTACHMENT I

MEASURES FOR MINIMIZING SURFACE STREAM CONTAMINATION

MEASURES FOR MINIMIZING SURFACE STREAM CONTAMINATION

Once construction is completed, the runoff will be captured by a storm sewer system through a series of inlets. These inlets discharge into the proposed wet basin where the water is treated within a time period of 24-48 hours. Once treated, the storm water will be released into existing culverts along TxDOT right-of-way. The release rate will be within TCEQ's specifications and will not have any adverse impact to habitable structures located downstream of the site. The wet basin will utilize erosion prevention devices to mitigate the effects of erosion to the natural grade.

AUTHORIZATION AND APPLICATION FORMS

1Texas Commission on Environmental Quality Edwards Aquifer Protection Program Application Fee Form

Regulated Entity Reference Number (if issued): RN Austin Regional Office (3373)	o 337 ers) PHONE: (21 (nine (nine Travis Williamson Comal Medina or money order, payable to the e as your receipt. This form	0) 525-9090 e digits) e digits) Kinney Uvalde e Texas Commission on
Austin Regional Office	🔀 San Antonio Regional Of	ffice
Mailed to TCEQ: TCEQ – Cashier Revenues Section Mail Code 214 P.O. Box 13088 Austin, TX 78711-3088 Site Location (Check All That Apply): Recharge Zo	Overnight Delivery to TC TCEQ - Cashier 12100 Park 35 Circle Building A, 3rd Floor Austin, TX 78753 512/239-0347	EQ:
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	4.19 Acres	\$4,000.00
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

10/1/11

If you have questions on how to fill out this form or about the Edwards Aquifer protection program, please contact us at 210/490-3096 for projects located in the San Antonio Region or 512/339-2929 for projects located in the Austin Region. TCEQ-0574 (Rev. 4/25/08)





Individuals are entitled to request and review their personal information that the agency gathers on its forms. They may also have any errors in their information corrected. To review such information, contact us at 512/239-3282.

Texas Commission on Environmental Quality Edwards Aquifer Protection Program Application Fee Schedule 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	<pre>< 5 5 < 10 10 < 40 40 < 100 100 < 500 ≥ 500</pre>	\$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)	<pre>< 1 1 < 5 5 < 10 10 < 40 40 < 100 ≥ 100</pre>	\$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

Agent Authorization Form

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

1			H. W	ade Mc	Ginnis		
Print Name							
Vic	ce President	of	Barshop	& Oles	Company,	Authorized	Agents
			Title - Ow	ner/Pres	ident/Other		······································
of		Сс		<u>Retail, L</u> Partnersh	<u>td</u> iip/Entity Nar	ne	
have authorized <u>Armando J. Niebla, P.E.</u> Print Name of Agent/Engineer							
of				artners-S Name c			

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:

JUNE 1, 2011

Applicant's Signature Date H. Wade McGinnis Vice President, Barshop & Oles Company Authorized Agents for NB Retail, Ltd. THE STATE OF <u>TEXAS</u> §

County of _____§

H. Wade

BEFORE ME, the undersigned authority, on this day personally appeared <u>McGinnis</u> 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 18th day of June, 2011.

************************ KIM GARVEN Notary Public STATE OF TEXAS My Comm Exp. 06-16-2012 1717-11-11-11-11

yped or Printed Name of Notary

16/2012 MY COMMISSION EXPIRES:

NAL DOCUMENT PRINTED ON CHEMICAL REACTIVE PAPER WITH MICHOPRINTED BORDE 728 NB Retail, Ltd. J PMorgan Chase Bank N.A. Barshop & Oles Company, Agent Dallas, Texas 75201 900 Isom, Suite 300 San Antonio, TX 78216 (210) 366-3555 32-61/1110 **** FOUR THOUSAND AND 00/100 DOLLARS G TO THE 06/01/2011 \$4,000.00*** ORDER OF Texas Commission on Environmental Quality P. O. Box 13087 Austin, TX 78711-3087 THIS DOCUMENT CONTAINS HEAT SENSITIVE INK. TOUCH OR PRESS HERE. RED IMAGE DISAPPEARS WITH I

#000728# #111000614# 753984707#

DATE:06/01/2011 CK#:728 TOTAL:\$4,000.00*** BANK:operating account(nbrckg) PAYEE:Texas Commission on(v0000178)

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Bryan W. Shaw, Ph.D., *Chairman* Buddy Garcia, *Commissioner* Carlos Rubinstein, *Commissioner* Mark R. Vickery, P.G., *Executive Director*



COUNTY ENGINEER

TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

Protecting Texas by Reducing and Preventing Pollution

July 15, 2011

Mr. Wade McGinnis NB Retail, Ltd. 801 Congress Ave., Suite 300 Austin, TX 78701

Re: Edwards Aquifer Protection Program, Comal County

Name of Project: Westpointe Village, Phase 2; Located at the southwest corner of Hwy. 46 and Loop 337, New Braunfels, Texas

Type of Plan: Request for a Modification to an Approved Water Pollution Abatement Plan (WPAP); 30 Texas Administrative Code (TAC) Chapter 213 Edwards Aquifer

Edwards Aquifer Protection Program San Antonio File No. 2873.08; Investigation No. 932617; Regulated Entity No. RN105739023

Dear Mr. McGinnis:

The Texas Commission on Environmental Quality (TCEQ) has completed its review of the WPAP modification for the above-referenced project submitted to the San Antonio Regional Office by Bury+Partners on behalf of NB Retail, Ltd. on June 2, 2011. As presented to the TCEQ, the Temporary and Permanent Best Management Practices (BMPs) and construction plans were prepared by a Texas Licensed Professional Engineer to be in general compliance with the requirements of 30 TAC Chapter 213. These planning materials were sealed, signed and dated by a Texas Licensed Professional Engineer. Therefore, based on the engineer's concurrence of compliance, the planning materials for construction of the proposed project and pollution abatement measures are hereby approved subject to applicable state rules and the conditions in this letter. The applicant or a person affected may file with the chief clerk a motion for reconsideration must be filed no later than 23 days after the date of this approval letter. *This approval expires two (2) years from the date of this letter unless, prior to the expiration date, more than 10 percent of the construction has commenced on the project or an extension of time has been requested.*

Background

The Phase 2 site is part of a larger 37.00 acre site with 25.96 acres of proposed impervious cover. The Westpointe Village Shopping Center WPAP (#2873.02) was approved on August 25, 2009 and included a commercial shopping center with associated parking lots and driveways and one regional wet basin as the water quality treatment device. Also included in the August 25, 2009 WPAP was the preparation of seven pad sites surrounding the shopping center, which

Reply To: Region 13 ° 14250 Judson Rd. ° San Antonio, Texas 78233-4480 ° 210-490-3096 ° Fax 210-545-4329

required prior approval of a pad-specific modification before physical construction on the pad site could commence. Phase 2 is the fourth pad site to be approved. A summary of the approved WPAPs, impervious cover amounts and TSS amounts for the Westpointe Village Shopping Center is provided in Table 1, below.

Table 1: Westpointe Village Impervious C	over and TSS Summ	ary
	Total Impervious	TSS Removal
	Cover (ac)	(lb/yr)
Westpointe Village Shopping Center: Design Values (Approved 8/25/2009)	25.96	22,961 ^A
Phase 1 – HEB and Roads (Approved 8/25/2009)	14.78	12,925 ^A
Phase 1 – Uncaptured Area (Approved 8/25/2009)	1.34	1,203
Pad 3 – Whataburger (Approved 5/14/2010)	0.80	718
Pad 7 – Discount Tires (Approved 8/30/2010)	0.80	718
Pad 2 – Chase Bank (Approved 11/16/2010)	0.85	763
Pad 1 – Phase 2 (This Approval)	2.88	2,585
Subtotal	21.45	18,912
Amount Remaining	4.51	4,049
Note: The wet basin was sized for a drainage area of 3 impervious cover with TSS compensation for 1.34 acr $A - The TSS$ removal amount included 0.38 acres of e	es of uncaptured imp	pervious cover.

Project Description

The proposed commercial project will have an area of approximately 4.19 acres. It will include the construction of two commercial retail buildings and associated driveways and parking areas. The increase in impervious cover will be 2.88 acres. The total impervious cover for the 37.00 acre site is now 21.45 acres (57.97 percent). Project wastewater will be disposed of by conveyance to the existing Gruene Road Wastewater Treatment Plant owned by New Braunfels Utilities.

Permanent Pollution Abatement Measures

To prevent the pollution of storm water runoff originating on-site or upgradient of the site and potentially flowing across and off the site after construction, one wet basin, designed using the TCEQ technical guidance document, <u>Complying with the Edwards Aquifer Rules: Technical Guidance on Best Management Practices (2005)</u>, has been constructed to treat storm water runoff. The Phase 2 site contributes 2,585 pounds of total suspended solids (TSS) from the 2.88 acres of impervious cover. The required TSS treatment for the 37.00 acre site is 18,912 pounds of TSS generated from the 21.45 acres of impervious cover with 0.38 acres of existing impervious cover. There is 1.34 acres of uncaptured impervious cover at the site. The approved measures meet the required 80 percent removal of the increased load in TSS caused by the project.

No changes have been proposed to the layout, specifications or the design of the wet basin. The minimum water quality volume and permanent pool volume have increased due to the increase in TSS associated with this approval. The wet basin has been designed with a permanent pool volume of 126,728 cubic feet (98,184 cubic feet required) at the 852 elevation contour and a water quality volume of 246,881 cubic feet (180,004 cubic feet required) at the 854 foot

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elevation contour. The wet basin has a drainage area of 34.72 acres with 20.11 acression to the second seco

Geology

According to the geologic assessment included with the application, three non-sensitive geologic and manmade features exist at the larger 37.00 acre site. The two geologic features were further excavated by hand and determined to have a low infiltration rate by the project geologist. The 4.19 acre site did not contain any geologic or manmade features. The San Antonio Regional Office site assessment conducted on June 29, 2011 revealed the site was adequately described by the geologic assessment.

Special Conditions

- 1. This modification is subject to all Special and Standard Conditions listed in the WPAP approval letter dated August 25, 2009.
- 2. This modification approval is only for the regulated activities proposed with the 4.19 acre site limits described in the WPAP application. Regulated activities outside the project limits that have not been previously approved by TCEQ will require a separate modification to the original WPAP.

Standard Conditions

- 1. Pursuant to Chapter 7 Subchapter C of the Texas Water Code, any violations of the requirements in 30 TAC Chapter 213 may result in administrative penalties.
- 2. The holder of the approved Edwards Aquifer protection plan must comply with all provisions of 30 TAC Chapter 213 and all best management practices and measures contained in the approved plan. Additional and separate approvals, permits, registrations and/or authorizations from other TCEQ Programs (i.e., Storm water, Water Rights, UIC) can be required depending on the specifics of the plan.
- 3. In addition to the rules of the Commission, the applicant may also be required to comply with state and local ordinances and regulations providing for the protection of water quality.

Prior to Commencement of Construction:

- 4. Within 60 days of receiving written approval of an Edwards Aquifer Protection Plan, the applicant must submit to the San Antonio Regional Office, proof of recordation of notice in the county deed records, with the volume and page number(s) of the county deed records of the county in which the property is located. A description of the property boundaries shall be included in the deed recordation in the county deed records. A suggested form (Deed Recordation Affidavit, TCEQ-0625) that you may use to deed record the approved WPAP is enclosed.
- 5. All contractors conducting regulated activities at the referenced project location shall be provided a copy of this notice of approval. At least one complete copy of the approved WPAP and this notice of approval shall be maintained at the project location until all regulated activities are completed.

- 6. Modification to the activities described in the referenced WPAP application following the date of approval may require the submittal of a plan to modify this approval, including the payment of appropriate fees and all information necessary for its review and approval prior to initiating construction of the modifications.
- 7. The applicant must provide written notification of intent to commence construction, replacement, or rehabilitation of the referenced project. Notification must be submitted to the San Antonio Regional Office no later than 48 hours prior to commencement of the regulated activity. Written notification must include the date on which the regulated activity will commence, the name of the approved plan and program ID number for the regulated activity, and the name of the prime contractor with the name and telephone number of the contact person. The executive director will use the notification to determine if the approved plan is eligible for an extension.
- 8. Temporary erosion and sedimentation (E&S) controls, i.e., silt fences, rock berms, stabilized construction entrances, or other controls described in the approved WPAP, must be installed prior to construction and maintained during construction. Temporary E&S controls may be removed when vegetation is established and the construction area is stabilized. If a water quality pond is proposed, it shall be used as a sedimentation basin during construction. The TCEQ may monitor storm water discharges from the site to evaluate the adequacy of temporary E&S control measures. Additional controls may be necessary if excessive solids are being discharged from the site.
- 9. All borings with depths greater than or equal to 20 feet must be plugged with non-shrink grout from the bottom of the hole to within three (3) feet of the surface. The remainder of the hole must be backfilled with cuttings from the boring. All borings less than 20 feet must be backfilled with cuttings from the boring. All borings must be backfilled or plugged within four (4) days of completion of the drilling operation. Voids may be filled with gravel.

During Construction:

- 10. During the course of regulated activities related to this project, the applicant or agent shall comply with all applicable provisions of 30 TAC Chapter 213, Edwards Aquifer. The applicant shall remain responsible for the provisions and conditions of this approval until such responsibility is legally transferred to another person or entity.
- 11. This approval does not authorize the installation of temporary aboveground storage tanks on this project. If the contractor desires to install a temporary aboveground storage tank for use during construction, an application to modify this approval must be submitted and approved prior to installation. The application must include information related to tank location and spill containment. Refer to Standard Condition No. 6, above.
- 12. If any sensitive feature (caves, solution cavities, sink holes, etc.) is discovered during construction, all regulated activities near the feature must be suspended immediately. The applicant or his agent must immediately notify the San Antonio Regional Office of the discovery of the feature. Regulated activities near the feature may not proceed until the executive director has reviewed and approved the methods proposed to protect the feature and the aquifer from potentially adverse impacts to water quality. The plan must be sealed, signed, and dated by a Texas Licensed Professional Engineer.
- 13. No wells are located onsite. All water wells, including injection, dewatering, and monitoring wells must be in compliance with the requirements of the Texas Department of Licensing

RECEIVED

COUNTY ENGINEER

and Regulation under Title 16 TAC Chapter 76 (relating to Water Well Drillers and Pump Installers) and all other locally applicable rules, as appropriate.

- 14. If sediment escapes the construction site, the 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). Sediment must be removed from sediment traps or sedimentation ponds not later than when design capacity has been reduced by 50 percent. Litter, construction debris, and construction chemicals shall be prevented from becoming storm water discharge pollutants.
- 15. Intentional discharges of sediment laden storm water are not allowed. If dewatering becomes necessary, the discharge will be filtered through appropriately selected best management practices. These may include vegetated filter strips, sediment traps, rock berms, silt fence rings, etc.
- 16. The following records shall be maintained and made available to the executive director upon request: 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.
- 17. Stabilization measures shall be initiated as soon as practicable in portions of the site where construction activities have temporarily or permanently ceased, and construction activities will not resume within 21 days. When the initiation of stabilization measures by the 14th day is precluded by weather conditions, stabilization measures shall be initiated as soon as practicable.

After Completion of Construction:

- 18. 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 San Antonio Regional Office within 30 days of site completion.
- 19. The applicant shall be 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. The regulated entity shall then be responsible for maintenance until another entity assumes such obligations in writing or ownership is transferred. A copy of the transfer of responsibility must be filed with the executive director through San Antonio Regional Office within 30 days of the transfer. A copy of the transfer form (TCEQ-10263) is enclosed.
- 20. Upon legal transfer of this property, the new owner(s) is required to comply with all terms of the approved Edwards Aquifer protection plan. If the new owner intends to commence any new regulated activity on the site, a new Edwards Aquifer protection plan that specifically addresses the new activity must be submitted to the executive director. Approval of the plan for the new regulated activity by the executive director is required prior to commencement of the new regulated activity.
- 21. An Edwards Aquifer protection plan approval or extension will expire and no extension will be granted if more than 50 percent of the total construction has not been completed within ten years from the initial approval of a plan. A new Edwards Aquifer protection plan must

be submitted to the San Antonio Regional Office with the appropriate fees for review and approval by the executive director prior to commencing any additional regulated activities.

22. At project locations where construction is initiated and abandoned, or not completed, the site shall be returned to a condition such that the aquifer is protected from potential contamination.

If you have any questions or require additional information, please contact Charly Fritz of the Edwards Aquifer Protection Program of the San Antonio Regional Office at (210) 403-4065.

Sincerely, m. By For

Mark R. Vickery, P.G., Executive Director Texas Commission on Environmental Quality

MRV/CEF/eg

Enclosure: Deed Recordation Affidavit, Form TCEQ-0625 Change in Responsibility for Maintenance of Permanent BMPs, Form TCEQ-10263

cc: Mr. Armando Niebla, P.E., Bury+Partners Mr. James Klein, P.E., City Engineer, City of New Braunfels Mr. Thomas Hornseth, P.E., Comal County Engineer Mr. Karl Dreher, General Manager, Edwards Aquifer Authority TCEQ Central Records, Building F, MC 212