District I 1625 N. French Dr., Hobbs, NM 88240 District II 811 S. First St., Artesia, NM 88210 District III 1000 Rio Brazos Road, Aztec, NM 87410 District IV 1220 S. St. Francis Dr., Santa Fe, NM 87505	State of New Energy Minerals and M Departm Oil Conservation 1220 South St. Santa Fe, NM	Mexico Natural Resou nent Division Francis Dr. M 87505	rces For tem multi-w appropri For per Environn to the ap	porary pits, below-gr ell fluid management ate NMOCD District (manent pits submit to mental Bureau office a propriate NMOCD Di	Form C-144 Revised April 3, 2017 ade tanks, and pits, submit to the Office. the Santa Fe nd provide a copy strict Office.
BGT 1 Proposed A	Pit, Below-Gra	de Tank, o nit or Clos	<u>r</u> ure Plan A <u>r</u>	plication	
C517 Type of action: Below grade tank registration Permit of a pit or proposed alternative method Closure of a pit, below-grade tank, or proposed alternative method Modification to an existing permit/or registration Closure plan only submitted for an existing permitted or non-permitted pit, below-grade tank,					
Instructions: Please subm	t one application (Form C-144) p	er individual pit,	below-grade tan	k or alternative reques	st
Please be advised that approval of this request doe environment. Nor does approval relieve the opera	s not relieve the operator of liability tor of its responsibility to comply with	should operations th any other applie	result in pollution cable governmenta	of surface water, ground l authority's rules, regul	d water or the ations or ordinances.
1. Operator: Enduring Resources, LLC		OGR	ID #: <u>372286</u>		
Address: 200 Energy Court, Farmington, N	New Mexico 87401				
Facility or well name: Kimbeto Wash Unit	2309 19K Recycling Facility				_
API Number: <u>NA</u>	OCD Permit Nu	mber: <u>3RF</u>	43		
U/L or Qtr/Qtr <u>NESW</u> Section	19 Township 23N	Range <u>9W</u>	County:	San Juan	
Center of Proposed Design: Latitude 36.210	825	Longitude <u>-1</u>	07.831105		NAD83
Surface Owner: 🛛 Federal 🗌 State 🗌 Priva	te 🗌 Tribal Trust or Indian Allotm	nent			
 2. Pit: Subsection F, G or J of 19.15.17.11 Temporary: Drilling Workover Permanent Emergency Cavitation Lined Unlined Liner type: Thicknes String-Reinforced Liner Seams: Welded Factory Other 	NMAC P&A Multi-Well Fluid Ma ssmil LLDPE nerY	nagement HDPE 🗌 PVC Volume:	Low Chlorid	de Drilling Fluid 🗌 ye ions: L x W	s □ no x D
3. Below-grade tank: Subsection I of 19.1	5.17.11 NMAC				
Volume: <u>20</u> bbl Typ	e of fluid: <u>Produced Water</u>			NMOC	D
Tank Construction material: <u>Steel</u>					
Secondary containment with leak detection	n 🗌 Visible sidewalls, liner, 6-in	nch lift and autor	natic overflow shi	ut-off MAY 2 7	2019
Visible sidewalls and liner Visible si	dewalls only Other			DISTRICT	111
Liner type: Thickness	_mil HDPE PVC Oth	her		DISTRIC) 5 6 8
4.					
Alternative Method:	T (1) 1 (1) 1		·	CC C	·
Submittal of an exception request is required.	Exceptions must be submitted to	the Santa Fe Env	aronmental Burea	iu office for considerat	ion of approval.
 5. Fencing: Subsection D of 19.15.17.11 NMA Chain link, six feet in height, two strands of <i>institution or church</i>) Four foot height, four strands of barbed with Alternate. Please specify. 8' chain link 	C (Applies to permanent pits, temp of barbed wire at top (Required if la ire evenly spaced between one and	orary pits, and b ocated within 10 four feet	elow-grade tanks, 00 feet of a perma) inent residence, school	, hospital,
O Chail link			_		

Netting: Subsection E of 19.15.17.11 NMAC (Applies to permanent pits and permanent open top tanks)

Screen Netting Other cone top

Monthly inspections (If netting or screening is not physically feasible)

Signs: Subsection C of 19.15.17.11 NMAC

🛛 12"x 24", 2" lettering, providing Operator's name, site location, and emergency telephone numbers

Signed in compliance with 19.15.16.8 NMAC

Variances and Exceptions:

7

Justifications and/or demonstrations of equivalency are required. Please refer to 19.15.17 NMAC for guidance.

Please check a box if one or more of the following is requested, if not leave blank:

- Variance(s): Requests must be submitted to the appropriate division district for consideration of approval.
- Exception(s): Requests must be submitted to the Santa Fe Environmental Bureau office for consideration of approval.

Siting Criteria (regarding permitting): 19.15.17.10 NMAC

Instructions: The applicant must demonstrate compliance for each siting criteria below in the application. Recommendations of acceptable source material are provided below. Siting criteria does not apply to drying pads or above-grade tanks.

General siting	
Ground water is less than 25 feet below the bottom of a low chloride temporary pit or below-grade tank. - □ NM Office of the State Engineer - iWATERS database search; □ USGS; ⊠ Data obtained from nearby wells	□ Yes ⊠ No □ NA
Ground water is less than 50 feet below the bottom of a Temporary pit, permanent pit, or Multi-Well Fluid Management pit. NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells	☐ Yes ☐ No ☐ NA
 Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance adopted pursuant to NMSA 1978, Section 3-27-3, as amended. (Does not apply to below grade tanks) Written confirmation or verification from the municipality; Written approval obtained from the municipality 	🗌 Yes 🗌 No
 Within the area overlying a subsurface mine. (Does not apply to below grade tanks) Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division 	🗌 Yes 🗌 No
 Within an unstable area. (Does not apply to below grade tanks) Engineering measures incorporated into the design; NM Bureau of Geology & Mineral Resources; USGS; NM Geological Society: Topographic man 	🗌 Yes 🗌 No
Within a 100-year floodplain. (Does not apply to below grade tanks) - FEMA map	🗌 Yes 🗌 No
Below Grade Tanks	
 Within 100 feet of a continuously flowing watercourse, significant watercourse, lake bed, sinkhole, wetland or playa lake (measured from the ordinary high-water mark). Topographic map; Visual inspection (certification) of the proposed site 	🗌 Yes 🛛 No
 Within 200 horizontal feet of a spring or a fresh water well used for public or livestock consumption;. NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site 	🗌 Yes 🛛 No
Temporary Pit using Low Chloride Drilling Fluid (maximum chloride content 15,000 mg/liter)	
 Within 100 feet of a continuously flowing watercourse, or any other significant watercourse or within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). (Applies to low chloride temporary pits.) Topographic map; Visual inspection (certification) of the proposed site 	🗌 Yes 🗌 No
Within 300 feet from an occupied permanent residence, school, hospital, institution, or church in existence at the time of initial application. - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image	🗌 Yes 🗌 No
Within 200 horizontal feet of a spring or a private, domestic fresh water well used by less than five households for domestic or stock watering purposes, or 300feet of any other fresh water well or spring, in existence at the time of the initial application.	Yes No

 Within 100 feet of a wetland. US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site 	Yes No			
Temporary Pit Non-low chloride drilling fluid				
 Within 300 feet of a continuously flowing watercourse, or any other significant watercourse, or within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). Topographic map; Visual inspection (certification) of the proposed site 	🗌 Yes 🗌 No			
 Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. Visual inspection (certification) of the proposed site; Aerial photo; Satellite image 	🗌 Yes 🗌 No			
 Within 500 horizontal feet of a spring or a private, domestic fresh water well used by less than five households for domestic or stock watering purposes, or 1000 feet of any other fresh water well or spring, in the existence at the time of the initial application; NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site 	🗌 Yes 🗌 No			
 Within 300 feet of a wetland. US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site 	Yes No			
Permanent Pit or Multi-Well Fluid Management Pit				
 Within 300 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse, or lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). Topographic map; Visual inspection (certification) of the proposed site 	🗌 Yes 🗌 No			
 Within 1000 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. Visual inspection (certification) of the proposed site; Aerial photo; Satellite image 				
 Within 500 horizontal feet of a spring or a fresh water well used for domestic or stock watering purposes, in existence at the time of initial application. NM Office of the State Engineer - iWATERS database search; Visual inspection (certification) of the proposed site 	🗌 Yes 🗌 No			
 Within 500 feet of a wetland. US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site 				
10. Temporary Pits, Emergency Pits, and Below-grade Tanks Permit Application Attachment Checklist: Subsection B of 19.15.17.9 NMAC <i>Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the documents are attached.</i> Mydrogeologic Report (Below-grade Tanks) - based upon the requirements of Paragraph (4) of Subsection B of 19.15.17.9 NMAC Hydrogeologic Data (Temporary and Emergency Pits) - based upon the requirements of Paragraph (2) of Subsection B of 19.15.17.9 NMAC Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC Design Plan - based upon the appropriate requirements of 19.15.17.10 NMAC Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC Closure Plan (Please complete Boxes 14 through 18, if applicable) - based upon the appropriate requirements of Subsection C of 19.15.17.9 NMAC and 19.15.17.13 NMAC Previously Approved Design (attach copy of design)				
11. Multi-Well Fluid Management Pit Checklist: Subsection B of 19.15.17.9 NMAC Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the do attached. Design Plan - based upon the appropriate requirements of 19.15.17.11 NMAC Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC A List of wells with approved application for permit to drill associated with the pit. Closure Plan (Please complete Boxes 14 through 18, if applicable) - based upon the appropriate requirements of Subsection C of 19	cuments are 0.15.17.9 NMAC			

and 19.15.17.13 NMAC

Hydrogeologic Data - based upon the requirements of Paragraph (4) of Subsection B of 19.15.17.9 NMAC
 Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC

Previously Approved Design (attach copy of design) API Number: ______ or Permit Number: ______

12. * Permanent Pits Permit Application Checklist: Subsection B of 19.15.17.9 NMAC Instructions: Each of the following items must be attached to the application. Please indicate, by a check mark in the box, that the attached. Hydrogeologic Report - based upon the requirements of Paragraph (1) of Subsection B of 19.15.17.9 NMAC Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC Climatological Factors Assessment Certified Engineering Design Plans - based upon the appropriate requirements of 19.15.17.11 NMAC Dike Protection and Structural Integrity Design - based upon the appropriate requirements of 19.15.17.11 NMAC Leak Detection Design - based upon the appropriate requirements of 19.15.17.11 NMAC Quality Control/Quality Assurance Construction and Installation Plan Operating and Maintenance Plan - based upon the appropriate requirements of 19.15.17.12 NMAC Freeboard and Overtopping Prevention Plan - based upon the appropriate requirements of 19.15.17.11 NMAC Nuisance or Hazardous Odors, including H₂S, Prevention Plan Emergency Response Plan Oil Field Waste Stream Characterization Monitoring and Inspection Plan Erosion Control Plan Closure Plan - based upon the appropriate requirements of 19.15.17.9 NMAC and 19.15.17.13 NMAC 	locuments are			
13. Proposed Closure: 19.15.17.13 NMAC Instructions: Please complete the applicable boxes, Boxes 14 through 18, in regards to the proposed closure plan. Type: Drilling Workover Emergency Cavitation P&A Permanent Pit Below-grade Tank Multi-well FI Alternative Alternative Proposed Closure Method: Waste Excavation and Removal Waste Removal (Closed-loop systems only) On-site Closure Method (Only for temporary pits and closed-loop systems) In-place Burial On-site Trench Burial Alternative Closure Method	uid Management Pit			
 ^{14.} Waste Excavation and Removal Closure Plan Checklist: (19.15.17.13 NMAC) Instructions: Each of the following items must be a closure plan. Please indicate, by a check mark in the box, that the documents are attached. 	nttached to the			
15. <u>Siting Criteria (regarding on-site closure methods only)</u> : 19.15.17.10 NMAC Instructions: Each siting criteria requires a demonstration of compliance in the closure plan. Recommendations of acceptable sour provided below. Requests regarding changes to certain siting criteria require justifications and/or demonstrations of equivalency. P 19.15.17.10 NMAC for guidance.	ce material are lease refer to			
Ground water is less than 25 feet below the bottom of the buried waste. - NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells Ground water is between 25-50 feet below the bottom of the buried waste	☐ Yes ☐ No ☐ NA ☐ Ves ☐ No			
 NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells Ground water is more than 100 feet below the bottom of the buried waste. 	$\square NA$ $\square Yes \square No$			
 NM Office of the State Engineer - iWATERS database search; USGS; Data obtained from nearby wells Within 100 feet of a continuously flowing watercourse, or 200 feet of any other significant watercourse, lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark). Topographic map; Visual inspection (certification) of the proposed site 				
Within 300 feet from a permanent residence, school, hospital, institution, or church in existence at the time of initial application. - Visual inspection (certification) of the proposed site; Aerial photo; Satellite image				
 Within 300 horizontal feet of a private, domestic fresh water well or spring used for domestic or stock watering purposes, in existence at the time of initial application. NM Office of the State Engineer - iWATERS database; Visual inspection (certification) of the proposed site 	🗌 Yes 🗌 No			
Written confirmation or verification from the municipality; Written approval obtained from the municipality	Yes No			
Within 300 feet of a wetland. US Fish and Wildlife Wetland Identification map; Topographic map; Visual inspection (certification) of the proposed site	🗌 Yes 🗌 No			
Within incorporated municipal boundaries or within a defined municipal fresh water well field covered under a municipal ordinance				

	🗌 Yes 🗌 No			
 Within the area overlying a subsurface mine. Written confirmation or verification or map from the NM EMNRD-Mining and Mineral Division 	🗌 Yes 🗌 No			
Within an unstable area. - Engineering measures incorporated into the design: NM Bureau of Geology & Mineral Resources: USGS: NM Geological				
Society; Topographic map	🗌 Yes 🗌 No			
FEMA map	🗌 Yes 🗌 No			
 16. On-Site Closure Plan Checklist: (19.15.17.13 NMAC) Instructions: Each of the following items must be attached to the closure plan. Please indicate, by a check mark in the box, that the documents are attached. Siting Criteria Compliance Demonstrations - based upon the appropriate requirements of 19.15.17.10 NMAC Proof of Surface Owner Notice - based upon the appropriate requirements of Subsection E of 19.15.17.13 NMAC Construction/Design Plan of Burial Trench (if applicable) based upon the appropriate requirements of Subsection K of 19.15.17.11 NMAC Construction/Design Plan of Temporary Pit (for in-place burial of a drying pad) - based upon the appropriate requirements of 19.15.17.13 NMAC Protocols and Procedures - based upon the appropriate requirements of 19.15.17.13 NMAC Confirmation Sampling Plan (if applicable) - based upon the appropriate requirements of 19.15.17.13 NMAC Disposal Facility Name and Permit Number (for liquids, drilling fluids and drill cuttings or in case on-site closure standards cannot be achieved) Soil Cover Design - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC Re-vegetation Plan - based upon the appropriate requirements of Subsection H of 19.15.17.13 NMAC 				
17. Operator Application Certification:				
I hereby certify that the information submitted with this application is true, accurate and complete to the best of my knowledge and bel	ief.			
Name (Print): James McDaniel Title: HSE Supervisor				
Signature: Date:				
e-mail address: jmcdaniel@enduringresources.com Telephone: 505-636-9731				
18. OCD Approval: Print Application (including closure plan) Closure Plan (only) OCD Conditions (see attachment) OCD Representative Signature:				
OCD Approval: Image: Permit Application functuding closure plan) Image: Closure Plan (only) Image: OCD Conditions (see attachment) OCD Representative Signature: Image: Approval Date: Sec: Sec: Sec: Sec: Sec: Sec: Sec: Sec:	0/19			
OCD Approval: Image: Permit Application functuding closure plan) Image: Closure Plan (only) Image: OCD Conditions (see attachment) OCD Representative Signature: Image: Approval Date: Sec. Approval Date: Sec. Title: Environmental Spec. OCD Permit Number: 16517	5/19			
OCD Approval: Permit Application including closure plan) Closure Plan (only) OCD Conditions (see attachment) OCD Representative Signature:	the closure report.			
OCD Approval: Permit Application including closure plan) Closure Plan (only) OCD Conditions (see attachment) OCD Representative Signature:	the closure report.			
19. CD Approval: Section of the form until an approved closure plan has been obtained and the closure activities have been completed. OCD Permit Number: 16. 19. Closure Report (required within 60 days of closure completion): 19.15.17.13 NMAC 19. Closure report (required within 60 days of closure completion): 19.15.17.13 NMAC 19. Closure Report (required within 60 days of closure completion): 19.15.17.13 NMAC 19. Closure Report (required to obtain an approved closure plan prior to implementing any closure activities and submitting the closure report is required to be submitted to the division within 60 days of the completion of the closure activities. Please do not section of the form until an approved closure plan has been obtained and the closure activities have been completed. 20. Closure Completion Date: 20. Closure form until an approved plan, please explain.	the closure report. t complete this			

22. Operator Closure Certification:

I hereby certify that the information and attachments submitted with this closure report is true, accurate and complete to the best of my knowledge and belief. I also certify that the closure complies with all applicable closure requirements and conditions specified in the approved closure plan.			
Name (Print):	Title:		
Signature:	Date:		
e-mail address:	Telephone:		

Enduring Resources, LLC Below Grade Tank Closure Plan

Lease Name: Kimbeto Wash Unit 2309 19K OCD Num.: 3RF-43 Description: Section 19, Township 23N, Range 9W, San Juan County

In accordance with Rule 19.15.17.13 NMAC the following information describes the closure requirements of below-grade tanks on Enduring Resources, LLC. (Enduring) locations. This is Enduring's standard procedure for all below-grade tanks. A separate plan will be submitted for any below-grade tank which does not conform to this plan.

General Plan

- 1. Enduring will obtain approval of this closure plan prior to commencing closure of the below grade tank at this location pursuant to 19.15.17.13.C (1) NMAC
- 2. Enduring will notify the surface owner by certified mail, return receipt requested, that the operator plans closure operations at least 72 hours, but no more than one week, prior to any closure operation. Notice will include:
 - a. Well Name
 - b. API
 - c. Well Location

*Enduring will notify government agencies by email of closure activities.

- 3. Enduring will notify the NMOCD Aztec Office by email that the operator plans closure operations at least 72 hours, but no more than one week, prior to any closure operation. Notice will include:
 - a. Well Name
 - b. API
 - c. Well Location
- 4. Within 60 days of cessation of operations, Enduring will remove all liquids and sludge from below grade tanks prior to implementing closure activities, and will dispose of the liquids and sludge at a division approved facility. Approved facilities and waste steams include:
 - a. Soils, tank bottoms, produced sands, pit sludge and other exempt wastes impacted by petroleum hydrocarbon will be disposed of at: *Envirotech: Permit #NM01-0011* and *IEI: Permit #NM01-0010B*
 - b. Produced water will be disposed of at: Basin Disposal: Permit #NM01-005, Agua Moss: Permit #NM-009, and Enduring owned disposal wells.
- 5. Within six (6) months of cessation of operations, Enduring will remove the below grade tank and dispose of it in a division approved facility, or recycle, reuse or reclaim it in a manner that the appropriate district office approves. If there is any equipment associated with a below grade tank,

then the operator shall remove the equipment, unless the equipment is required for some other purpose.

6. Enduring will collect a closure sample of the soil beneath the location of the below grader tank or liner that is being closed. The closure sample will consist of a five-point composite sample to include any obvious stained or wet soils, or other evidence of contamination. The closure sample will be analyzed for all constituents listed in Table I below, including DRO+GRO, chlorides, TPH (C6-C36), benzene and BTEX.

Table I				
Closure Criteria for Soils Impacted by a Release				
Minimum depth below	Constituent	Method*	Limit**	
any point within the				
horizontal boundary of the				
release to ground water				
less than 10,000 mg/l				
TDS			(0.0 /l	
\leq 50 feet	Chloride***	EPA 300.0 or SM4500 Cl	600 mg/kg	
		В	100 /	
	TPH	EPA SW-846	100 mg/kg	
	(GRO+DRO+MRO)	Method 8015M		
	BTEX	EPA SW-846 Method	50 mg/kg	
		8021B or 8260B	10 1	
	Benzene	EPA SW-846 Method	10 mg/kg	
		8021B or 8260B	10.000 //	
51 feet-100 feet	Chloride***	EPA 300.0 or SM4500 Cl	10,000 mg/kg	
		В		
	TPH	EPA SW-846 Method	2,500 mg/kg	
	(GRO+DRO+MRO)	8015M		
	GRO+DRO	EPA SW-846 Method	1,000 mg/kg	
		8015M		
	BTEX	EPA SW-846 Method	50 mg/kg	
		8021B or 8260B		
	Benzene	EPA SW-846 Method	10 mg/kg	
	1	8021B or 8260B		
>100 feet	Chloride***	EPA 300.0 or SM4500 Cl	20,000 mg/kg	
		B		
	TPH	EPA SW-846 Method	2,500 mg/kg	
	(GRO+DRO+MRO)	8015M		
	GRO+DRO	EPA SW-846 Method	1,000 mg/kg	
		8015M		
	BTEX	EPA SW-846 Method	50 mg/kg	
		8021B or 8260B		
	Benzene	EPA SW-846 Method	10 mg/kg	
		8021B or 8260B		

- 7. Enduring will close this BGT based on the requirements for groundwater over 100 feet.
- 8. If any contaminant concentration is higher than the parameters listed in Table I above, additional delineation may be required based on review of the results. Enduring will receive division approval prior to proceeding with additional closure activities. If all contaminant concentrations

are less than, or equal to, the parameters listed in Table I above, the operator can proceed to backfill with non-waste containing, uncontaminated earthen material.

- 9. After closure has occurred, Enduring will reclaim the former BGT area, if it is no longer being utilized for the continued extraction of oil and gas, by substantially restoring the surface area to the condition that existed prior to oil and gas operations. Enduring will construct the soil cover to the site's existing grade and prevent ponding of water and erosion of the cover materials. The soil cover shall consist of the background thickness of topsoil, or one foot of suitable materials to establish vegetation at the site, whichever is greater. All areas will be reclaimed as early as practicable, and as close to their original condition or land use as possible. They shall be maintained in such a way as to control dust and to minimize erosion.
- 10. Enduring will complete reclamation in accordance with the requirements listed in NMAC 19.15.17.13.H(5).

(a) Enduring will reclaim all areas disturbed by the closure below-grade tanks, except areas reasonably needed for production operations or for subsequent drilling operations, shall be reclaimed as early and as nearly as practicable to their original condition or their final land use and shall be maintained to control dust and minimize erosion to the extent practicable.

(b) Enduring will ensure that topsoils and subsoils are replaced to their original relative positions and contoured so as to achieve erosion control, long-term stability and preservation of surface water flow patterns. The disturbed area then shall be reseeded in the first favorable growing season following closure of the below-grade tank.

(c) Enduring will consider reclamation of disturbed areas no longer in use complete when all ground surface disturbing activities at the site have been completed, and a uniform vegetative cover has been established that reflects a life-form ratio of plus or minus fifty percent (50%) of pre-disturbance levels and a total percent plant cover of at least seventy percent (70%) of pre-disturbance levels, excluding noxious weeds.

(d) Re-vegetation and reclamation obligations imposed by other applicable federal or tribal agencies on lands managed by those agencies shall supersede these provisions and govern the obligations of any operator subject to those provisions, provided that the other requirements provide equal or better protection of fresh water, human health and the environment.

(e) The operator shall notify the division when reclamation and re-vegetation are complete

- 11. Within 60 days of closure of the below-grade tank, Enduring will submit a closure report to the Aztec office of the NMOCD. Closure report will be filed on form C-144 and include the following:
 - Proof of closure notice to division and surface owner;
 - Confirmation sampling analytical results;
 - Soil backfilling and cover installation;
 - Photo documentation of the site reclamation.
 - Alternative Table I groundwater criteria request, groundwater information, and received approval (If Needed)

Enduring Resources, LLC Below Grade Tank General Design and Construction Plan

Lease Name: Kimbeto Wash Unit 2309 19K OCD Num.: 3RF-43 Description: Section 19, Township 23N, Range 9W, San Juan County

In accordance with Rule 19.15.17.12 NMAC the following information describes the design and construction plan for this below grade tank (BGT).

Procedures

- 1. Enduring will design and construct the BGT at this facility to contain liquids and solid, prevent contamination of fresh water, and protect public health and the environment.
- 2. The tank will be a 20 bbl double-walled tank with leak detection capability. The tank will be constructed of materials resistant to the BGT's particular contents and resistant to damage from sunlight, and the sidewall of the tank exterior will be buried.
- 3. Enduring will equip the BGT with an automated shut off level control system to prevent overflows.
- 4. The top of the BGT will be at least 6" above ground level to prevent the collection of surface water and run on into the tank.
- 5. Enduring shall construct the BGT with a solid cone top with a hatch to inspect the tank insides.
- 6. The tank will be placed on a foundation consisting of a level base free of rocks, debris, sharp edges or irregularities to prevent punctures or cracks in the tank bottom.
- 7. Enduring will post a facility sign that meets the criteria listed in 19.15.17.11.C NMAC.
- 8. Enduring is requesting approval of alternative fencing to be used around the below grade tank. This location has an existing 8' fence around the location, which will provide adequate protection to livestock and wildlife from the below grade tank. No specific fencing will be utilized for this below grade tank.



Enduring Resources, LLC Below Grade Tank Operations and Maintenance Plan

Lease Name:Kimbeto Wash Unit 2309 19KOCD Num.:3RF-43Description:Section 19, Township 23N, Range 9W, San Juan County

In accordance with Rule 19.15.17.12 NMAC the following information describes the operations and maintenance requirements of below-grade tanks on Enduring Resources, LLC. (Enduring) locations. This is Enduring's standard procedure for all below-grade tanks.

Procedures

- 1. Enduring will operate below grade tanks in such a way as to contain liquids, and maintain the integrity of the secondary containment system. Enduring will operate the below grade tank in such a way as to prevent the contamination of freshwater, and protect public health and the environment.
- 2. Enduring will not discharge into or store any hazardous waste into a below grade tank.
- 3. In the event of a leak in the below grade tank, Enduring will:
 - a. Remove all liquids above the leak within 48 hours
 - b. Notify the Aztec Office of the NMOCD of the leak within 48 hours
 - c. Repair the leak, or replace the below grade tank, as necessary
- 4. All below grade tanks will be installed and operated in such a way as to prevent surface water run-on or collection.
- 5. Enduring will remove any measurable layer of oil from the fluid surface of a below grade tank as soon as practicable.
- 6. Enduring will inspect the below grade tank for leaks and damage at least monthly, documenting the inspections, and maintaining a record of inspection for five (5) years. The leak detection space in double walled tanks will be checked during this monthly inspection
- 7. Enduring will operate the below grade tank in such a way as to maintain adequate freeboard to prevent over topping of the below grade tank. Adequate freeboard will be considered 12" from the top of the tank.
- 8. In the event the below grade tank no longer demonstrates integrity, Enduring will close the below grade tank in accordance with the closure plan submitted with this registration.

3.1. Distance to Groundwater

A test well was drilled on the KWU 787H on 9/18/2018 per the attached MO-TE Drilling Log which indicates a groundwater depth greater than 100'. The KWU 787H has an elevation of 6596'. The KWU 2309-19K has an elevation of 6625' providing an increase of 29'. The groundwater depth is estimated to be greater than 129'. Therefore the groundwater depth is greater than 50 feet below the bottom of the recycling containment.

3.2. Distance to Surface Water

There are not any continuously flowing watercourses within 300' nor any other significant watercourse and lakebed or playa lake within 200' of the recycling containment as shown on the Aerial or Topo maps provided.

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3.3. Distance to Structures

There are no permanent residence, school, hospital, institution or church at the time of initial registration within 1000' of the recycling containment as shown on the Aerial and Topo maps provided.

3.4. Distance to Non-Public Water Supply

There are no springs or fresh water wells used for domestic or stock water purposes within 500' in existence at the time of initial registration as shown on the Aerial and Topo maps provided.

3.5. Distance to Municipal Boundaries and Defined Fresh Water Fields

The recycling facility is not within any incorporated municipal boundaries within a defined municipal fresh water well field covered by a municipal ordinance adopted pursuant to Section 3-27-3 NMSA 1978, as amended.

3.6. Distance to Subsurface Mines

The recycling containment is not located in an "unstable" area. The location is not over a mine and is not on the side of a hill. The location of the excavated surface material will not be located within 100 feet of a continuously flowing or significant watercourse. According to the NM EMNRD Mining and Mineral Divisions database there are no subsurface mines in Section 30, Township 23N, Range 9W of San Juan County.

3.7 Distance to 100-Year Floodplain

The KWU 2309-19K proposed recycling containment is not located within a 100-year floodplain as demonstrated on the FEMA Map.

JAN 15 2019

DISTRICT III

7. IWATERS REPORT

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The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

1/10/19 12:08 PM

WATER COLUMN/ AVERAGE DEPTH TO WATER

MO-TE DRILLING, INC.

JAN 15 2019 District III

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NO. OF LOADS OF WATER_____SOURCE__

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san juan repr farm,nm Form 219-6



ENDURING RESOURCES 200 Energy Court • Farmington, NM 87401 Telephone (505) 636-9741 Fax (505) 334-1979

JAN 15 2019 District III

NMOCD

KWU 2309-30D

Ground Water Depth Confirmation

Day 2

Attendees: Vanessa Fields James McDaniel Chad Snell

.

NMOCD Enduring Resources Enduring Resources

Day 1 Recap:

Damp soil only @86 feet when Mo-Te Drilling Rig 212 left location. Enduring & NMOCD will return to location on 9-19-2018 to recheck and confirm ground water depth.

Arrived at location at 9am boring was tagged at 86 feet deep before encountering damp soil, Vanessa advised NMOCD will go forward with drillers log of water encountered at 86 feet deep.



8. AERIAL MAP

NMOCD Jan 15 2019 District_III



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9. TOPO MAP

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DISTRICT III



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DISTRICT III

12. HYDROLOGY REPORT

Hydrogeological Report for KWU 2309-19K

Regional Geological context:

The Nacimiento Formation is of Paleocene age (Baltz, 1967, p. 35). It crops out in a broad band inside the southern and western margins of the central basin and in a narrow band along the west face of the Nacimiento Uplift. The Nacimiento is a nonresistant unit and typically erodes to low, rounded hills or forms badland topography.

The Nacimiento Formation occurs in approximately only the southern two-thirds of the San Juan Basin where it conformably overlies and intertongues with the Ojo Alamo Sandstone (Fassett, 1974, p. 229). The Nacimiento Formation grades laterally into the main part of the Animas Formation (Fassett and Hinds, 1971, p. 34); thus, in this area, the two formations occupy the same stratigraphic interval.

Strata of the Nacimiento Formation were deposited in lakebeds in the central basin area with lesser deposition in stream channels (Brimhall, 1973, p. 201). In general, the Nacimiento consists of drab, interbedded black and gray shale with discontinuous, white, medium- to very coarse grained arkosic sandstone (Stone e al., 1983, p.30). Stone et al. indicated that the formation may contain more sandstone than commonly reported because some investigators assume the slope-forming strata in the unit area shales, whereas in many places the strata actually are poorly consolidated sandstones. Total thickness of the Nacimiento Formation ranges from about 500 to 1,300 feet. The unit generally thickens from the basin margins toward the basin center (Steven et al., 1974). The sandstone deposits within the Nacimiento Formation are much thinner than the total thickness of the formation because their environment of deposition was localized stream channels (Brimhall, 1973, p. 201). The thickness of the combined San Jose, Animas, and Nacimiento Formations ranges from 500 to more than 3.500 feet.

Hydraulic Properties:

Reported well yields for 53 wells completed in either the Animas or Nacimiento Formations range from 2 to 90 gallons per minute and the median yield is 7.5 gallons per minute. The primary use of water from Nacimiento and Animas Formations is domestic and livestock supplies. There are no known aquifer tests for the Animas or Nacimiento Formations, but specific capacities reported for six wells range from 0.24 to 2.30 gallons per minute per foot of drawdown (Levings et al., 1990).

The Animas and Nacimiento Formations are in many ways hydrologically similar to the San Jose Formation because sands in both units produce approximately the same quantities of water. However, the greater percentage of fine materials in the Animas and Nacimiento Formations may restrict downward vertical leakage to the Ojo Alamo Sandstone or Kirtland Shale. The poorly cemented fine material is highly erodible, forms a badland terrain, and supports only spotty vegetation. These conditions are more conductive to runoff than retention of precipitation.

References:

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Baltz, E.H., 1967, Stratigraphy and regional tectonic implications of part of Upper Cretaceous rocks, east-central San Juan Basin, New Mexico: USGS Professional Paper ISTRICT III 552, 101 p.

Brimhall, R.M., 1973, Ground-water hydrology of Tertiary rocks of the San Juan Basin, New Mexico, in Fassett, J.E., ed., Cretaceous and Tertiary rocks of the Southern Colorado Plateau: Four Corners Geological Society Memoir, p. 197-207. Fassett, J.E., 1974, Cretaceous and Tertiary rocks of the eastern San Juan Basin, New Mexico and Colorado, in Guidebook of Ghost Ranch, central-northern New Mexico: New Mexico Geological Society, 25th Field Conference, p. 225-230.

Fassett, J.E., and Hinds, J.S., 1971, Geology and fuel resources of the Fruitland Formation and Kirtland Shale of the San Juan Basin, New Mexico and Colorado: USGS Professional Paper 676, 76 p.

Levings, G.W., Craigg, S.d., Dam, W.L., Kernodle, J.M., and Thorn, C.R., 1990, Hydrogeology of the San Jose, Nacimiento, and Animas Formations in the San Juan structural basin, New Mexico, Colorado, Arizona, and Utah: USGS Hydrologic Investigations Atlas HA-720-A, 2 sheets.

Stone, W.J., Lyford, F.P., Frenzel, P.F., Mizell, N.H., and Padgett, E.T., 1983, Hydrogeology and water resources of San Juan Basin, New Mexico: New Mexico Bureau of Mines and Mineral Resources, Hydrologic Report 6.

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Enduring Resources, LLC Below Grade Tank Variance Page

Lease Name:Kimbeto Wash Unit 2309 19KOCD Num.:3RF-43Description:Section 19, Township 23N, Range 9W, Sandoval County

- Enduring Resources proposes to utilize an 8' chain link fence around the entire facility in lieu of the fencing requirements outlined in subsection D of 19.15.17.11 NMAC.
- Enduring Resources proposes to use an enclosed tank in lieu of the screening and netting requirements outlined in subsection e of 19.15.17.11 NMAC
- Enduring Resources proposes to use an alternative to USEPA Method 418.1, as outlined in the attached *Variance Request for 19.15.17 NMAC Tables I and Table II*

Oil Conservation Division 1000 Rio Brazos Rd. Aztec, New Mexico 87410 Email: cory.smith@state.nm.us Phone (505) 334-6178 Ext 115

Re: Variance Request for 19.15.17 NMAC Table I and Table II

To Whom It May Concern,

Please accept this letter as a variance request as outlined in 19.15.17.15(A) NMAC. Enduring Resources, LLC (Enduring) would like to request the replacement of USEPA Method 418.1 for the analysis of Total Petroleum Hydrocarbons (TPH) for USEPA Method 8015M, measuring carbon ranges C6-C36, for all sampling associated with closures and confirmations samples in relation to 19.15.17 NMAC, both in Table I and Table II (2103) and the 'pit rule' passed in 2008. Enduring is requesting this variance on the grounds that USEPA Method 418.1 is an outdated analytical method that reports a full range of hydrocarbons from C5 through C40 (*Reference: American Petroleum Institute*).

The attached table demonstrates the carbon ranges, and the typical hydrocarbon products that can be found in those ranges. As you can see, lube oil ranges from C28-C35. Analytical Method USEPA 418.1 extends past lube oils from C35 through C40. This range of hydrocarbons is above the range that can reasonably be expected to be found in our field in both drilling pits and beneath below grade tanks. USEPA Method 8015M (GRO/DRO + extended analysis) will report hydrocarbons ranging from C6-C10 for GRO, C10- C28 for DRO, and C28-C36 for extended analysis. This information was provided by Environmental Science Corporation Laboratories. As the information demonstrates, the 8015M analytical method reports as low as C6, reporting lower than USEPA Method 418.1. Utilizing analytical method 8015M, lighter range hydrocarbons will be reported instead of higher range, heavy hydrocarbons that may not be reasonably expected to be found in our field. Utilization of USEPA Method 8015M will better protect groundwater resources by identifying lighter, more mobile hydrocarbons that USEPA Method 8015M are not a mobile form of hydrocarbon, and are not a threat to human health and the environment. With your acceptance of this variance request, Enduring Resources will begin utilizing USEPA Method 8015M in place of USEPA Method 418.1 for all sampling activities associated with 19.15.17 NMAC, both from the rules passed in 2008 and 2013.

Respectfully Submitted,

James McDaniel, CHMM #15676 HSE Supervisor Enduring Resources, LLC

Carbon Ranges of Typical Hydrocarbons

Hydrocarbon Carbon Range Condensate C2-C12 Aromatics C5-C7 Gasoline C7-C11 Kerosene C6-C16 Diesel Fuel C8-C21 Fuel Oil #1 C9-C16 Fuel Oil #2 C11-C20 Heating Oil C14-C20 Lube Oil C28-C35