<u>District I</u> 1625 N. French Dr., Hobbs, NM 88240 <u>District II</u> 1301 W. Grand Avenue, Artesia, NM 88210 <u>District III</u> 1000 Rio Brazos Road, Aztec, NM 87410 <u>District IV</u> 1220 S. St. Francis Dr., Santa Fe, NM 87505	State of New Mexico Energy Minerals and Natural Resources Department Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505	Form C-144 CLEZ July 21, 2008 For closed-loop systems that only use above ground steel tanks or haul-off bins and propose to implement waste removal for closure, submit to the appropriate NMOCD District Office.		
	ks or haul-off bins and propose to implement waste eve the operator of liability should operations result	ment waste removal for closure) st. For any application request other than for a e removal for closure, please submit a Form C-144. in pollution of surface water, ground water or the		
I. Operator:McElvain Oil & Gas Properties, Inc Address:1050 – 17 <sup>th</sup> Street, Suite 2500 Denver, Co Facility or well name:McElvain # 11 API Number:MCElvain # 11 API Number:MOLT U/L or Qtr/QtrNWNW (Unit D) Section31 Center of Proposed Design: LatitudeN 622433.092 Surface Owner: X Federal State Private Tri	lorado         80265           OCD Permit Number:            Township         185            Longitude         E 765617.473	PL-D3D74 County: Lea County, New Mexico		
2.   Closed-loop System:   Subsection H of 19.15.17.11 NMAC   Operation:   Operation: <t< td=""></t<>				
<ul> <li>4. <u>Closed-loop Systems Permit Application Attachmer</u> <i>Instructions: Each of the following items must be atta</i> <i>attached.</i></li> <li>M Design Plan - based upon the appropriate require Operating and Maintenance Plan - based upon the Closure Plan (Please complete Box 5) - based upon Previously Approved Design (attach copy of design) Previously Approved Operating and Maintenance Plan</li> </ul>	ached to the application. Please indicate, by a c ements of 19.15.17.11 NMAC as appropriate requirements of 19.15.17.12 NMA bon the appropriate requirements of Subsection C b) API Number:	heck mark in the box, that the documents are C C of 19.15.17.9 NMAC and 19.15.17.13 NMAC		
<ul> <li>S. <u>Waste Removal Closure For Closed-loop Systems T</u> <i>Instructions: Please Indentify the facility or facilities</i> <i>facilities are required.</i> Disposal Facility Name:Sundance Services, Inc.</li> <li>Disposal Facility Name:Controlled Recovery, Inc.</li> <li>Will any of the proposed closed-loop system operation:  Yes (If yes, please provide the information below <i>Required for impacted areas which will not be used for</i>  Soil Backfill and Cover Design Specifications -  Re-vegetation Plan - based upon the appropriate</li> </ul>	Inst Utilize Above Ground Steel Tanks or Hau         for the disposal of liquids, dritting fluids and dr	ill cuttings. Use attachment if more than two mit Number:NM-0003 mit Number:NM-0006 at will not be used for future service and operations? section H of 19.15.17.13 NMAC AC		
Site Reclamation Plan - based upon the appropri  Constraint of the experimental end of the experiment	s application is true, accurate and complete to the	e best of my knowledge and belief. enior Operations Engincer		
Signature:	,	April 6, 2011 (303) 893-0933 xtn 330 Page 1 of 2		

7.       OCD Approval:     □ Permit Application (including closure plan)       □ Closure Plan (only)			
OCD Representative Signature:			
OCD Representative Signature:Geologist	OCD Permit Number:	P1-03074	
<sup>8.</sup> Closure Report (required within 60 days of closure completion): Subsection K of 19.15.17.13 NMAC Instructions: Operators are required to obtain an approved closure plan prior to implementing any closure activities and submitting the closure report. The closure report is required to be submitted to the division within 60 days of the completion of the closure activities. Please do not complete this section of the form until an approved closure plan has been obtained and the closure activities have been completed.			
	Closure Completion Dat	e:	
9. <u>Closure Report Regarding Waste Removal Closure For Closed-loop Systems That Utilize Above Ground Steel Tanks or Haul-off Bins Only:</u> Instructions: Please indentify the facility or facilities for where the liquids, drilling fluids and drill cuttings were disposed. Use attachment if more than two facilities were utilized.			
Disposal Facility Name:Sundance Services, Inc	Disposal Facility Permit Numb	er:NM-0003	
Disposal Facility Name:Controlled Recovery, Inc	Disposal Facility Permit Numb	er:NM-0006	
Were the closed-loop system operations and associated activities performed on or in areas that will not be used for future service and operations? Ves (If yes, please demonstrate compliance to the items below) 🛛 No			
Required for impacted areas which will not be used for future service and operations:         Site Reclamation (Photo Documentation)         Soil Backfilling and Cover Installation         Re-vegetation Application Rates and Seeding Technique			
10. 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:		
c-mail address:	Telephone:		

## **Closed Loop Mud System**

Drilling muds will circulate through a closed system consisting of steel tanks, mud pumps, piping, to the rotating head, return piping back to the steel tanks. Solids will be removed from the waste streams to steel pits using these types of equipment.

- 1. Shale shakers will be installed with graduated screens to remove solids from all mud streams.
- 2. A mud cleaner will be installed to remove finer solid particles. Drilling mud will circulate by pump through the mud cleaner. The pump will generate optimal pressure for the mud cleaner cones to process solids.
- 3. A centrifuge will pick up effluent from the mud cleaner to process smaller particles.
- 4. Flocculants will be added to the waste stream entering the centrifuge to flocculate solids. Flocculation increases the efficiency of the centrifuge to remove solids to a smaller size.
- 5. Roll off bins will installed to handle the solids produced by the shale shaker, mud cleaner, and centrifuge. The solids will drop directly into the bins. Once a bin is full it will be hauled to OCD approved disposal site.

## **Operation and Maintenance**

Personnel with appropriate training and experience will be on-site 24 hours per day to operate and maintain the solids control equipment. If equipment problems occur the repairs or parts replacement will be done by qualified personnel. Personnel will monitor the solids levels in the roll off bins. Trucking companies will be notified to pick up the full bins and move the new bins into place.

## **Closure Plan**

Cuttings and solids will be disposed of at an OCD permitted facility according to OCD guidelines. Where possible fluids will be recycled. If unable to use the fluids the fluids will be hauled to an approved disposal facility. Fluids will be temporarily stored in tanks of sufficient volume to maintain the liquids on-site.