

IDAHO DEPARTMENT OF LANDS
DIRECTOR'S OFFICE
300 N 6th Street Suite 103
PO Box 83720
Boise ID 83720-0050
Phone (208) 334-0200
Fax (208) 334-5342



MICK THOMAS, DIVISION ADMINISTRATOR
SECRETARY TO THE COMMISSION

IDAHO OIL AND GAS
CONSERVATION COMMISSION
Betty Coppersmith, Chairman
Marc Shigeta, Vice-Chairman
Jim Classen
Renee Love, Ph.D
Dustin T. Miller

February 11, 2020

Snake River Oil & Gas, LLC
Attn: Mr. Chris Weiser
117 East Calhoun
Magnolia, AR 71753-3528

SUBJECT: Conditional Transfer of Well Permits, Well Operations

Dear Mr. Weiser,

This correspondence is notification that the Idaho Department of Lands recognizes the transfer of the well permits listed below from AM Idaho, LLC to Snake River Oil & Gas, LLC. The designation of Snake River Oil & Gas, LLC as the designated operator of the wells only applies to the wells designated below and does not apply to leases administered by Idaho Department of Lands, current applications, or Orders issued by Idaho Department of Lands or the Idaho Oil & Gas Conservation Commission to Alta Mesa Services, LP, or AM Idaho LLC.

The Department of Lands received and accepted your Power of Attorney and Acknowledgment of Surety from RLI Insurance Company in the amount of \$100,000 for the following wells:

No.	API Number	Well Name
1.	11-075-20-020	DJS Properties #1-15
2.	11-075-20-022	ML Investments #2-10
3.	11-075-20-023	DJS Properties #2-14
4.	11-075-20-024	Kauffman #1-34
5.	11-075-20-025	ML Investments #1-11
6.	11-075-20-026	ML Investments #1-3
7.	11-075-20-027	Kauffman #1-9
8.	11-075-20-029	ML Investments #2-3
9.	11-075-20-031	ML Investments #3-10
10.	11-075-20-033	Barlow #1-14
11.	11-075-20-032	Fallon #1-10

The Idaho Department of Lands does not recognize the transfer of operator for the Tracy Trust #3-2 well (USWN 11-075-20011) because it has not received a bond for the required amount of \$100,000 per IDAPA 20.07.02.220.03 and IDAPA 20.07.02.220.04.

By assuming operatorship of the wells listed above, Snake River agrees to assume full responsibility for the operation and eventual abandonment in conformity with the laws, rules, regulations and orders issued by the Commission.

If you have any questions, please don't hesitate to contact me at your earliest convenience.

Sincerely,

A handwritten signature in blue ink that reads "Mick Thomas". The signature is written in a cursive, flowing style.

Mick Thomas
Division Administrator, Oil & Gas
Secretary to the Oil & Gas Commission
(208) 334-0298 Office
Website: <https://ogcc.idaho.gov>
[News](#) | [Facebook](#) | [Twitter](#) | [Web](#)
[*Sign up to receive news from IDL*](#)

ecc: Chad Rader, Richard Brown, Nathan Caldwell, James Thum

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IDAHO OIL AND GAS
CONSERVATION COMMISSION
James Classen
Ken Smith
Margaret Chipman
Chris Beck
Sid Cellan

June 30, 2014

Ronda Louderman
Regulatory Coordinator
15021 Katy Frwy., Suite 400
Houston, TX 77094

SUBJECT: Permit to Drill API#11-075-20024, Kauffman 1-34

The Idaho Department of Lands has completed our review of this permit to drill for oil. Enclosed is a copy of the approved permit. This permit was approved with the following stipulations:

1. The permittee shall be required to submit an affidavit covering the initial BOP pressure test after installation signed by the operator or contractor attesting to the satisfactory pressure test.
2. The permittee shall ensure tanks are adequately sized, designed and constructed for the reception and confinement of mud and cuttings and to prevent contamination of streams and potable water.
3. Drilled holes cannot be used for any other purposes unless they are constructed according to the applicable well construction standards administered by the Idaho Department of Water Resources.
4. Applicant will obtain any needed water rights from Idaho Department of Water Resources if nearby wells will be used to supply water for the drilling operations.
5. All well log information required by IDAPA 20.07.02.091 will be submitted to IDL within 30 days of the logs being run.
6. Idaho Department of Lands inspectors shall have 24 hour, unencumbered access for compliance and regulatory purposes.
7. All cementing operations shall be in accordance with IDAPA 20.07.02.050. Cement will be returned to surface on all string via the

pump and plug method or other method as approved by the Department.

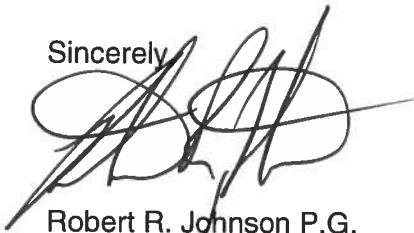
8. This permit does not grant the right for ingress or egress nor does this application grant the right to production from unleased lands.

9. No production or drainage must occur until all circumstance in item 8 above has been met or the Commission has issued an order to satisfy item 8.

Please ensure that all operations are conducted in accordance with the requirements of IDAPA 20.07.02 (Rules Governing Conservation Of Crude Oil And Natural Gas In The State Of Idaho).

This permit will be administered by AJ Mondor in our Southwest Supervisory Area. He will be inspecting the drilling operation. Please contact him at 208-334-3488 if you have any questions.

Sincerely

A handwritten signature in black ink, appearing to be 'R. Johnson', written over a circular stamp or seal.

Robert R. Johnson P.G.
Oil & Gas Program Manager

cc: AJ Mondor, Resource Specialist, IDL Southwest Office
Chad Hersley, IDWR, PO Box 83720, Boise, Idaho 83720-0098



PERKINS PEISERICH GREATHOUSE MORGAN RANKIN

101 MORGAN KEEGAN DRIVE, SUITE A | LITTLE ROCK, AR 72202
P.O. BOX 251618 | LITTLE ROCK, AR 72225-1618
TEL: (501) 603-9000 | FAX: (501) 603-0556 | PPGMRLAW.COM | PLLC

JOHN F. PEISERICH
JOHN@PPGMRLAW.COM

~~July 19, 2013~~ 6/3/14 JS

Mr. Bobby Johnson
Idaho Department of Lands
Idaho Oil and Gas Conservation Commission
300 N. 6th Street
Suite 103
Boise, ID 83702

DEPT. OF LANDS
2014 JUN -3 PM 12:55
BOISE, IDAHO

RE: Exceptional Location Letter Application
Section 34, Township 9 North, Range 4 West
Willow Field, Payette County, Idaho

Mr. Johnson,

Please allow this letter to serve as Alta Mesa Services, LP's application for an exceptional location for its well proposed in Section 34, Township 9 North, Range 4 West in the Willow Field located in Payette County, Idaho. The well permit application is being transmitted concurrently for your consideration and Alta Mesa Services, LP ("Applicant") requests that this letter application be attached to the well permit as an additional submittal.

In accordance with IDAPA 20.07.02.330.04, the Applicant submits with this application a plat which provides the following information:

- a. The location at which an oil or gas well could be drilled in compliance with Subsections 330.01 or 330.02 or the applicable order; (*demonstrated as the nearest potential well location within Section 34*)
- b. The location at which the applicant requests permission to drill; and (*demonstrated by the Proposed Well Location*)
- c. The location at which oil or gas wells have been drilled or could be drilled, in agreement with Subsection 330.01 or 330.02 or the applicable order, directly or diagonally offsetting the proposed exception. (*There are no current wells within the adjoining sections. The Applicant has proposed a well in Section 3, T8N, R4W at a legal location within Section 3. The drainage for the proposed wells in Section 34 and Section 3 are not overlapping. The drainage zone is indicated on the attached plat and potential locations are demonstrated by the 1,660 foot legal location boxes shown within each section.*)

BOISE, IDAHO

It should be noted that AM Idaho, LLC is the only working interest owner of the offset sections and thus would be operator in each of those sections.

DEPT. OF LANDS
2014 JUN -3 PM 12:55

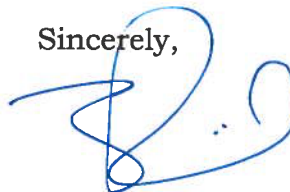
The Applicant, Alta Mesa Services, LP, requests the approval of an exceptional location due to reservoir characteristics related to the target formation. The proposed surface hole and bottom hole locations are the most protective of the environment; are the most prospective for oil and/or gas; and are necessary to prevent waste and avoid stranding of resources.

The target formation presents the optimal drilling target at the location selected by the Applicant. Specifically, three dimensional seismic survey data has identified the target, identified for discussion purposes as the "Willow Sand", as time equivalent to the Willow Sand found in the ML Investment #1-10 well. Seismic data of the target indicates [REDACTED] i.e. a likely indicator of high-hydrocarbon saturation. The proposed location in Section 34 is planned in order to develop the Willow Sand separated by the well-defined fault located to the [REDACTED] of the proposed location. Generally, the identified reservoir appears to be similar to that found within [REDACTED] and follows the same faulting patterns as found further [REDACTED]. The proposed location in Section 34 is believed to be most prospective for oil and/or gas.

Geologically, the selected target is believed to be the best potential location within the reservoir with the greatest chance that the target will be prospective for oil and/or gas. Selection of this location will reduce the number of wells necessary to fully develop the prospect by selecting the target with the greatest drainage potential which will prevent economic waste; prevent drilling of additional otherwise unnecessary wells which causes additional surface impacts; and avoid creating areas within the reservoir that are incapable of being drained.

For the reasons stated above, Alta Mesa Services, LP respectfully requests the approval of this exceptional location. If you have further questions, please contact me.

Sincerely,



John F. Peiserich



IDAHO OIL AND GAS CONSERVATION COMMISSION
Application For Permit to Drill, Deepen or Plug Back

APPLICATION TO: Drill (\$2,000) Deepen (\$500) Plug Back (\$500)

NAME OF COMPANY OR OPERATOR: Alta Mesa Services, LP Date: May 15, 2014

Address: 15021 Katy Frwy., Suite 400

City: Houston State: TX Zip Code: 77094 Telephone: 713-530-0991

Contact Name: Ronda Louderman Email Address: rlouderman@altamesa.net

DESCRIPTION OF WELL AND LEASE

Name of Lease: Kauffman Well Number: 1-34 Elevation (ground) 2,484.3'

Well Location: Section: 34 Township: 9 North Range: 4 West (or block and survey)
 (give footage from Section lines): 277' from West line; 1042' from North line

Field and Reservoir (if wildcat, so state): Willow County: Payette

Distance, in miles, and direction from nearest town or post office: 4.5 miles east of Payette

Nearest distance from proposed location to property or lease line: 365' from south Lease line

Nearest Distance from proposed location to nearest drilling, completed or applied for on the same lease: N/A

Proposed depth: 5,800' Rotary or cable tools: Rotary

Planned logging tools: Mud Logging only while drilling. After: Gamma Ray; Propagation Resistivity; Density, Neutron Porosity, Electron Capture Spectroscopy; Sonic; and Percussion sidewall cores will be completed by wireline.

Approx date work will start: June 15, 2014 Number of acres in lease(s): 640

Number of wells on lease, including this well, completed in or drilling to this reservoir: 1

If lease purchased with one or more wells drilled, complete the following information:

Purchased from (name) N/A

Address of above _____

Status of bond _____

Remarks: (If this is an application to deepen or plug back, briefly describe work to be done, giving present producing zone and expected new producing zone) N/A

CERTIFICATE: I, the undersigned, state that I am the Regulatory Coordinator

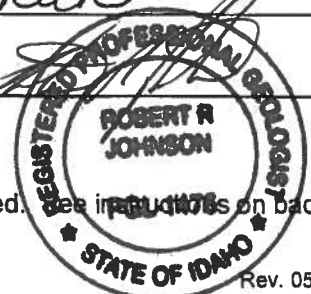
of Alta Mesa Services, LP

(company) and that I am authorized by said company to make this application and that this application was prepared under my supervision and direction and that the facts stated herein are true, correct and complete to the best of my knowledge.

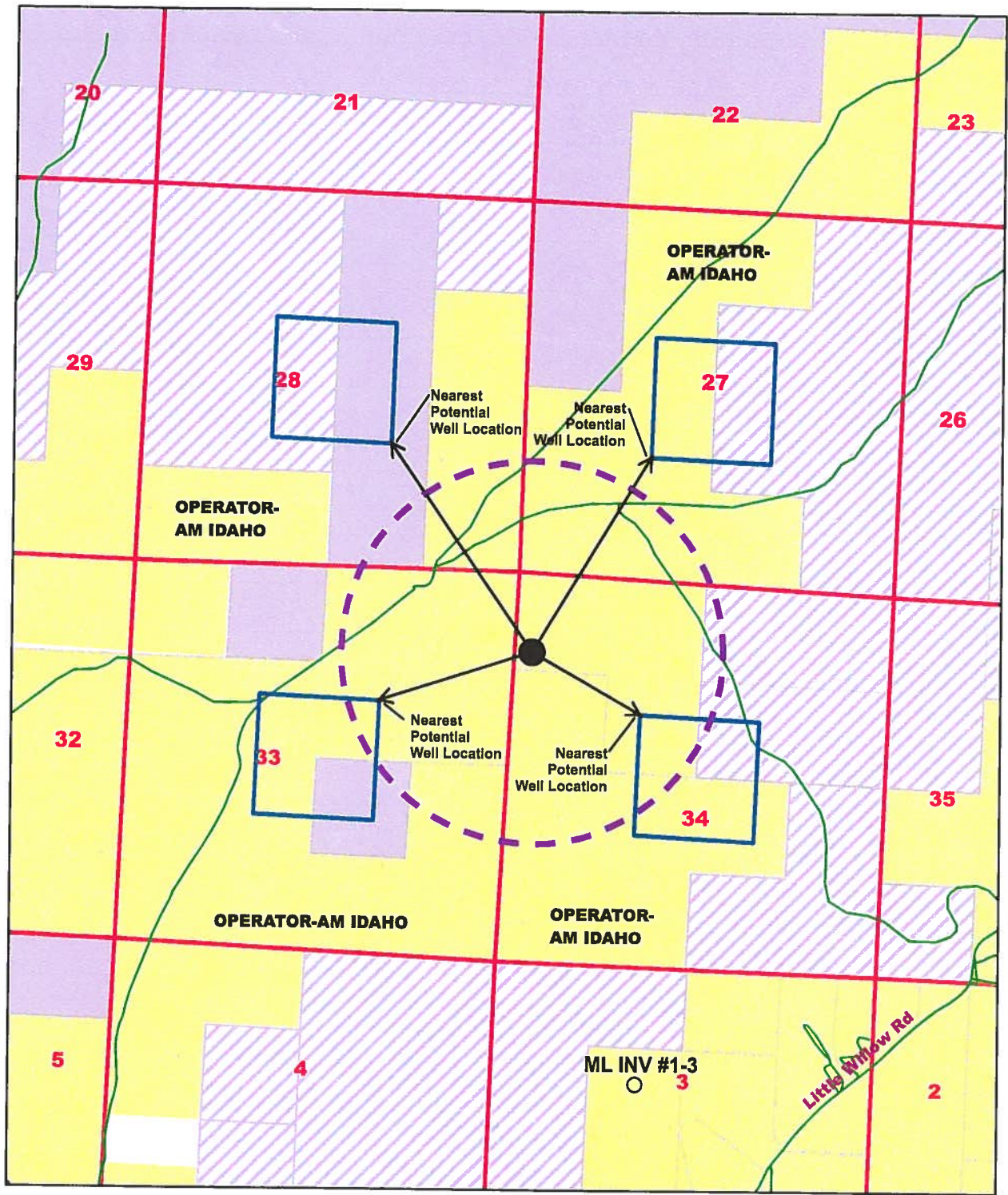
Date: 5/15/2014 Signature: Ronda Louderman

Permit Number: N/A Approval Date: 6-30-14 Approved by: _____

API Number: 11-075-20624



NOTICE: Before sending in this form, be sure that you have given all information requested. See instructions on back.



Kauffman 1-34

Located in Section 34, T9N R4W, BM, Payette County, ID
06/02/14

Legend

- Legal Location
- - - Anticipated Well Drainage Zone (1 Mile Diameter Circle)
- Section Lines
- Roadways
- Property Boundary
- AM Idaho
- BLM owns surface and minerals
- BLM owns mineral rights only
- Proposed Bottom Hole Well Location



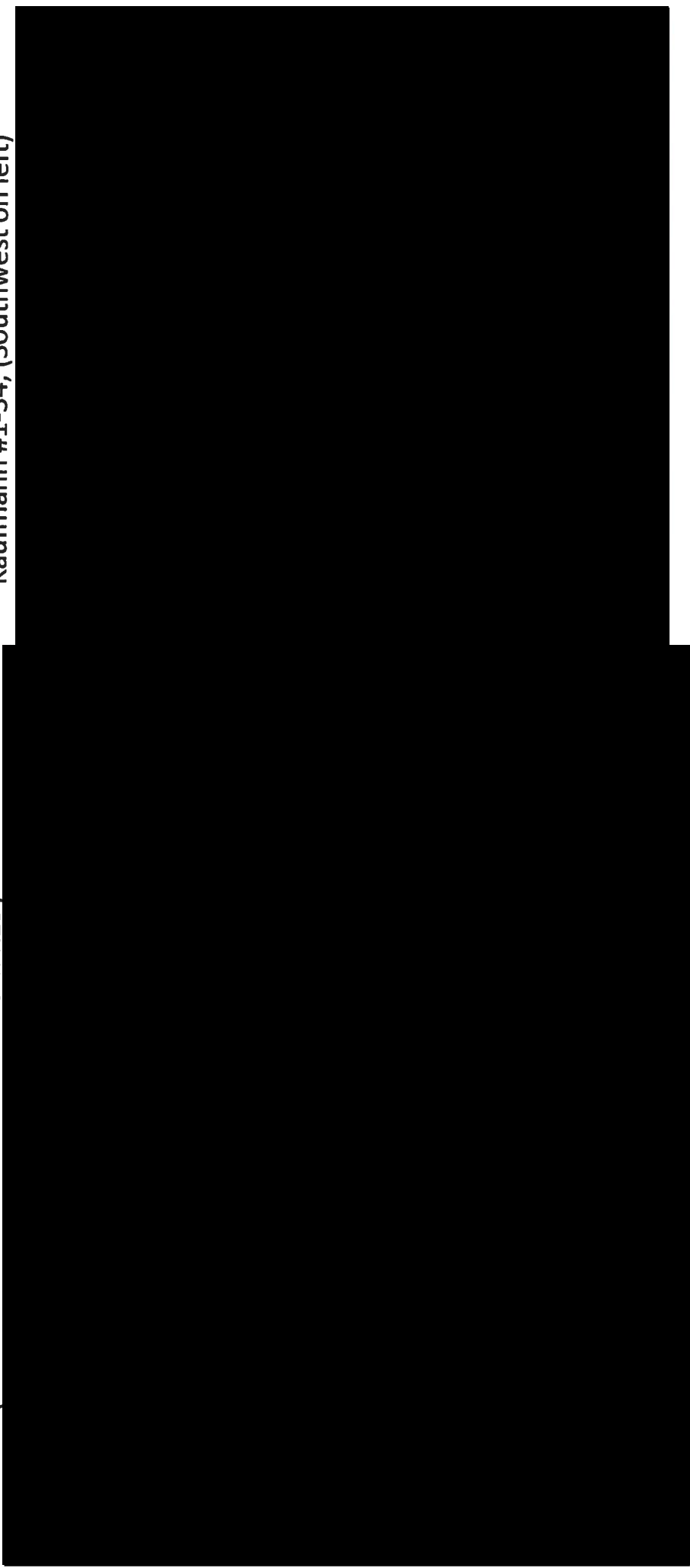
1 inch equals 2,000 feet

AM IDAHO Kaufmann #1-34

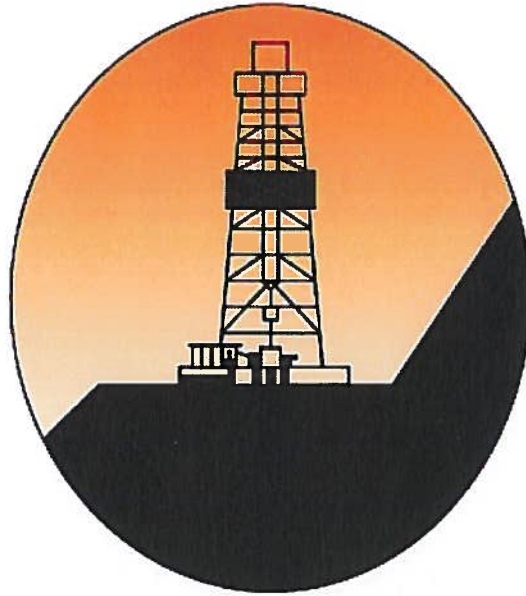
CONFIDENTIAL

Time Structure Map of Top Willow Sand
(Southwest-Northeast Seismic line in RED)

SW-NE Seismic Line thru proposed
Kaufmann #1-34, (Southwest on left)



**TRADE SECRET PROTECTED UNDER
Idaho Code Title 9, Chapter 3, 9-340D**



ALTA MESA

ALTA MESA SERVICES, LP

IDL Permit Supplement

Kauffman 1-34

Payette County, ID

May 12, 2014

10:40 AM EST KAMFIBS

10:40 AM EST

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1 Background Information

Objective: The objective of this operation is to drill a vertical well to 5,800'TVD/MD.

AFE #:	TBD	County:	Payette
Well Type:	Vertical	State:	Idaho
Well Name:	Kauffman 1-34	Section:	34
Field:	Willow	Township:	9N
		Range:	4W

Mapping Reference:

System:	NAD83 / NAD27	Mag Dec:	14.15° (01-Jul-2013)
Zone:	UTM11	Grid Conv.:	-0.75113 °
SPCS:	Idaho West Zone 1103	Total Corr.:	14.90113°

Coordinates:

Surface Location:

NAD83

Lat.: N 44° 04' 45.35989"
Long.: W 116° 48' 39.01178"
SPCS: 2345904.7 ft. E
881053.8 ft. N

NAD27

SPCS: 221490 ft. E
881081 ft. N

Bottom Hole Location:

NAD83

Lat.: Same
Long.: Same
SPCS: Same
Same

NAD27

SPCS: Same
Same

Elevation:

GL: 2,484.3 ft.
RKB: 2496 ft.

Planned TD:

MD: 5,800.0 ft.
TVD: 5,800.0 ft.

Contractor: Paul Graham Drilling

Rig: #7

2 Geologic Prognosis

2.1 Prospect

The Kauffman 1-34 Prospect is designed to test the Willow sand, which is found in the Bridge ML Investments 1-10 well at 4,088' TVD. It is estimated that the target sand will be encountered at +/- 3,815' TVD in the Prospect

2.2 PROPOSED WELL:

The well is to be vertically drilled to a measured depth of 5,800' (5,800 TVD). The surface location is in Section 34-9N-4W (Payette County, Idaho).

2.3 Estimated Geological Formation Tops

		Est. Tops are +/-10'		
		Alta Mesa	Alta Mesa	Alta Mesa
		Sec. 34 NW 4	Sec. 34 NW 4	Sec. 34 NW 4
<u>Formation Tops</u>	<u>Comments</u>	<u>Est MD</u>	<u>Est TVD</u>	<u>Est SS</u>
Hamilton Sand		1,422	1,422	1,077
CS Marker 1		1,735	1,735	765
CS Marker 2 (LS Top)		2,179	2,179	321
CS Marker 3		/	/	/
BBF		3,582	3,582	-1,082
Willow Sand	<i>TARGET</i>	3,815	3,815	-1,315
Top Basalt		/	/	/

3 Site Preparation

3.1 Access Roads

The proposed surface location is to be accessed by an existing farm road that supports heavy truck traffic, approximately 15,000' of improved road over an existing farm path, and 2,400' of new roadway.

3.2 Erosion Control

Appropriate grading, mechanical stabilization (rip-rap or hay bales), chemical stabilization (soil cement), and silt fencing will be used to prevent soil erosion. All cut and fill slopes are designed with a minimum 2:1 grade to minimize runoff erosion and ensure mechanical stability. See attached engineering drawings.

3.3 Cellars

An 8' deep round cellar box will be installed after the conductor is installed per the relevant section below.

3.4 Pit System

A closed-loop circulating system will be used for this well from spud. Zero discharge practices will be implemented, and all cuttings and waste fluid will be solidified and disposed of at an approved facility. A third party oilfield waste management contractor will provide waste management and tracking services.

3.5 Sump

The location will have a 2' deep trench on downhill sides where the spoil from that trench will be used to construct an earthen berm around the location. The trench will act as a sump to collect rain and wash water for controlled release or appropriate disposal as required.

4 Well Construction

4.1 Casing and Cementing Program

Well Interval	Bit Size	Casing Size, Grade and Weight	Casing Setting Depth	Top of Cement	Cement Type and Volume
Conductor	17-1/2"	13-3/8" 54.5 ppf K-55 LTC	120'	Surface	Class "A" ~140 sxs 100% excess
Surface	12-1/4"	9-5/8" 40 ppf K-55 LTC	1,000'	Surface	Lead: 100 sxs TCI Beaded Lite @ 10.4 ppg, 100% excess Tail: 50 sxs Class "H" @ 14.8 ppg
Production	8-3/4"	5-1/2" 17 ppf K-55 LTC	5,800'	Surface	Lead: 500 sxs TCI Lite @ 12.7 ppg Tail: 200 sxs Gas Seal @ 16.0 ppg

TCI Beaded Lite: An engineered light weight slurry with excellent compressive strength development the slurry exhibits low fluid loss, thixotropic behavior, and has zero free water.

TCI-Lite: A light weight gel extended slurry that develops excellent compressive strength within 24 hours.

Gas-Bloc: A premium production casing slurry that has a gas migration control additive for providing an exceptional cement bond to formation and casing. The slurry also contains clay control with low fluid loss for added gas migration inhibition and slurry stability.

4.2 Proposed Wellbore Schematic

**Alta Mesa
 Kauffman 1-34
 Payette Co., Idaho**
Proposed Wellbore Schematic

GL: 2,484.3'

RKB: ~12' (2,496')

All depths reference RKB unless otherwise noted.

Conductor

13-3/8" 54.5# K-55 LTC @ ~120'

Surface Casing

9-5/8" 40 ppf K-55 LTC @ ~1,000' MD

Hole Size: 12-1/4"

Cemented to surface

MW 9.2 - 9.4 ppg WBM

Production Casing

5-1/2" 17ppf K-55 LTC @ ~5,800 MD/TVD

Hole Size: 8-3/4"

Cemented to 100' inside surface casing

MW @ TD 9.8 - 10.0 ppg (OBM)

Total Depth: 5,800' TVD/MD

Well Name & No.: Kauffmann 1-34	Field: Wildcat
County or Parish: Payette	State: Idaho
Total Depth (MD): 5,800'	(TVD): 5,800'

4.3 Blow-Out Preventers

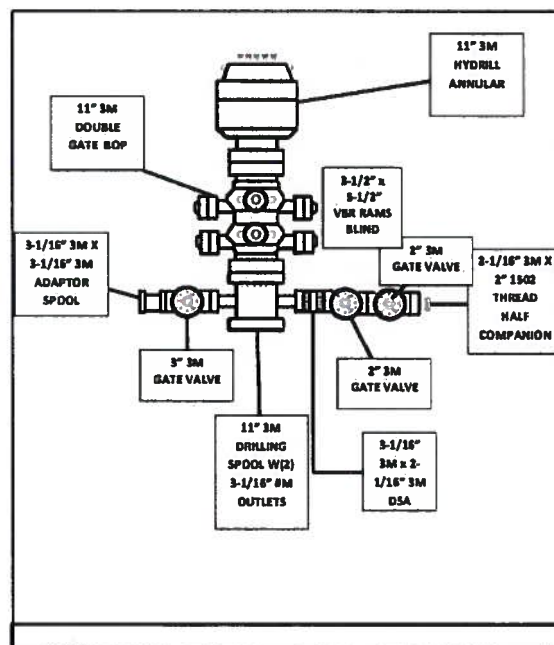
4.3.1 BOP Hardware Configuration

BOP Stack configuration includes an annular preventer and double ram preventers. The top most ram preventer will be fitted with variable ram blocks, the lower ram preventer will be fitted with blind ram blocks. A full-opening safety valve, inside BOP, and functioning wrench – *specific to the pipe in use and only those specific to the pipe in use* – are to be kept on the rig floor with easy access at all times.

4.3.2 BOP Testing

Test annular, rams, choke manifold, FOSV, and IBOP when BOP is first nipped up on casing head. Low-pressure test to 250psi and high-pressure test to 3,000psi (100% of 3M wellhead), except for annular. Test annular preventer to 2,100psi (70% of 3,000psi rating). Test the kelly hose and standpipe back to pump isolation valves to 200 psi above pop off setting or minimum of 3,000 psi. All tests must hold for five minutes. Retest specific component each time a seal is broken. Work BOP's and flush choke lines each trip. Tighten BOP and wellhead bolts every 3 days. Non-ported float valves to be used in BHA after surface casing set.

During drilling and completion operations, the ram-type blow-out preventer shall be function tested by closing on the drill pipe once every seven (7) days. Independently powered accumulators or accumulators and pumps shall maintain a pressure capacity reserve at all times to provide for repeated operation of hydraulic preventers. All tests may be conducted using a test plug. Tests shall be recorded by charts, if required by the Supervisor.



4.4 13-3/8" Conductor

4.4.1 Drilling

The conductor will be installed via auger and grout unless surface conditions dictate driving.

4.4.2 Casing

Set Depth ft.	Top (RTE)	Size	Weight	Grade	Burst	Collapse	Centralizers
120'	GL	13-3/8"	54.5#	K-55	2730 psi	1130 psi	None

4.5 12-1/4" Surface Hole

4.5.1 Drilling

4.5.1.1 Directional Objective

The surface hole will be drilled vertically to 1,000' MD/TVD.

4.5.1.2 Mud System

The surface hole will be drilled using fresh water based mud. Additives will be included for inhibition and also to build high-viscosity sweeps as necessary.

Measured Depth, ft.	Mud Density, ppg	Funnel Viscosity, cP	Yield Point, lb/100ft ²	API Fluid Loss, ml	pH	LGS %
120 – 1,000'	8.6	25-36	8-12	N/C	7.0-8.0	4 - 7

4.5.2 Open Hole Evaluation

No open-hole evaluation will be conducted in this interval

4.5.3 Casing

The surface casing is to be set at a depth that isolates problematic formations and usable water strata.

Set Depth, ft.	Top (RTE)	Size	Weight	Grade	Conn	Internal Diameter	Burst	Collapse	Tension
1,000'	GL	9-5/8"	40.0#	K-55	LTC	8.835"	3950 psi	2570 psi	561 kips

4.6 8-3/4" Production Hole

The 8-3/4" hole will be drilled vertically to ~5,800'.

4.6.1 Drilling

4.6.1.1 Directional Objective

The 8-3/4" production hole will be drilled vertically to 5,800' MD/TVD. Surveys will be obtained using a single-shot inclination tool.

4.6.1.2 Mud System

The production hole interval will be drilled with an invert emulsion mud system.

Measured Depth, ft.	Mud Density, ppg	Funnel Viscosity, cP	Yield Point, lb/100ft ²	HHP Fluid Loss, ml	ES	LGS %
1,000 – 5,800'	9.2 -9.8	36 - 45	6 - 10	<10.0	>600	< 5%

An invert emulsion drilling fluid will be used from below surface casing to total depth. The production casing will be cemented to surface thus, no drilling fluid will be left in the hole. Drill cuttings waste generated will be managed on location by a third party oilfield waste management company who will supervise the solidification, tracking and transportation to an approved waste disposal site of all oilfield waste generated while drilling. A zero-discharge closed loop system will be employed.

4.6.2 Logging Program

While Drilling: Mud logging only

Coring: None

Wireline: After reaching TD, and conditioning the hole, wireline evaluation will be conducted as follows:

- Gamma Ray
- Propagation Resistivity
- Density
- Neutron Porosity
- Electron Capture Spectroscopy
- Sonic
- Percussion sidewall cores

4.6.3 Production Casing

The production casing string is designed to be run to total depth and withstand the expected wellbore pressures.

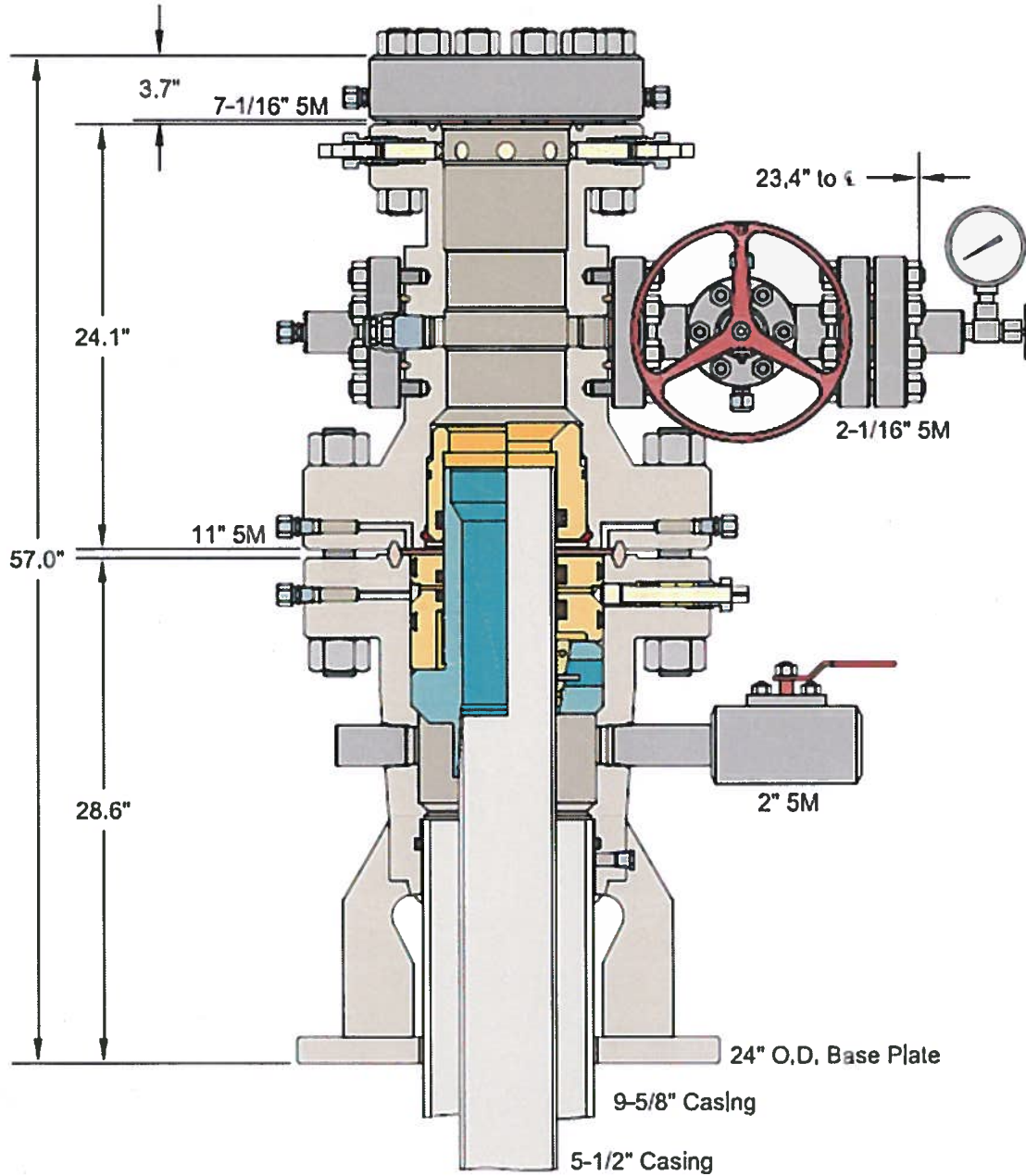
Set Depth ft.	Top (RTE)	Size	Weight	Grade	Conn	Internal Diameter	Burst	Collapse	Tension
5,800'	GL	5-½"	17.0#	K-55	LTC	4.892"	5320 psi	4910 psi	272 kips

5 Completion

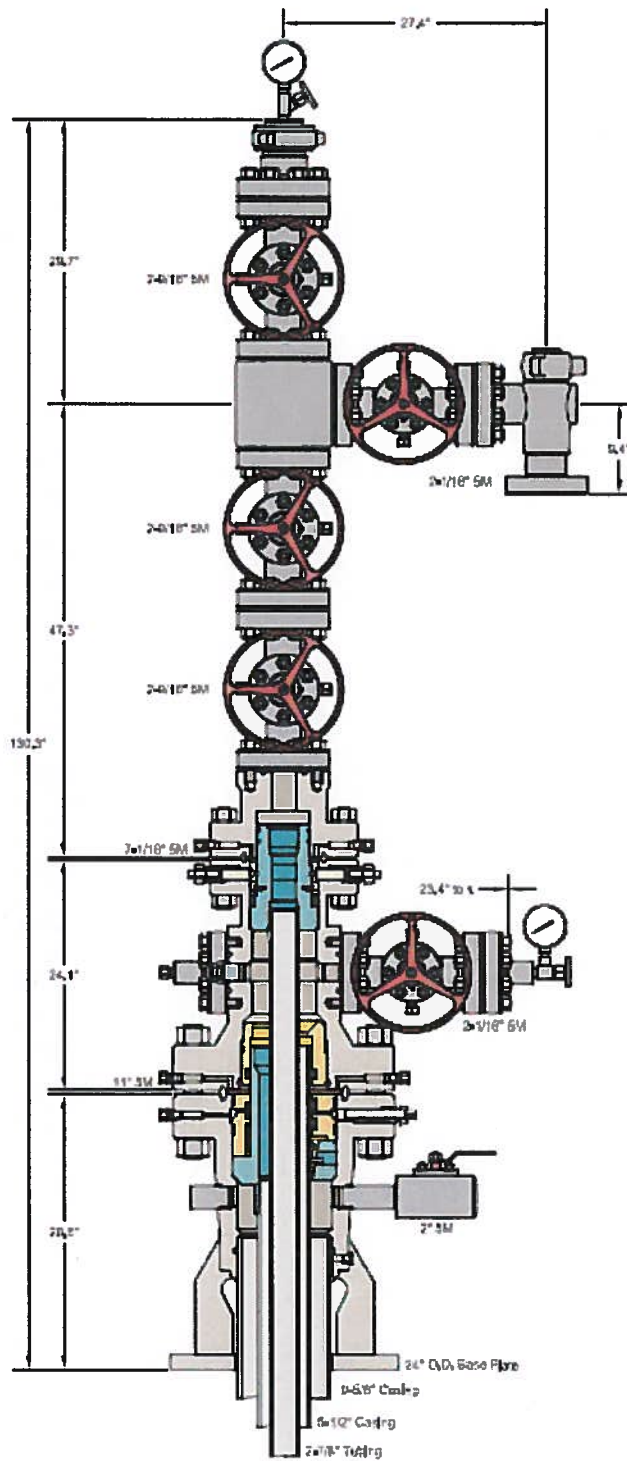
Method of completion will be determined subsequent to review of open-hole log data and cased hole cement bond logs (CBL).

6 Wellhead

6.1 Surface Wellhead System



6.2 Complete Wellhead System with Tree



7 Reclamation

Reclamation will be conducted in accordance with IDAPA 20.07.02.325. To achieve those requirements, Alta Mesa Services, L.P. proposes to address reclamation through a multistep process which is outlined below. As provided for in IDAPA 20.07.02.325.08, Alta Mesa Services, L.P. may enter into a Surface Use Agreement with the landowner the terms of which will ensure that the site is left in a stable, non-eroding condition as required.

1. Re-establish slope stability, surface stability, and desired topographic diversity.
 - a. Reconstruct the landscape to the approximate original contour unless otherwise provided for in the Surface Use Agreement
 - b. Maximize geomorphic stability and topographic diversity of the reclaimed topography.
 - c. Eliminate high walls, cut slopes, and/or topographic depressions on site, unless otherwise approved.
 - d. Minimize sheet and rill erosion on the reclaimed area. Eliminate mass wasting, head cutting, large rills or gullies, down cutting in drainages, or overall slope instability on the reclaimed area.
2. Maintain the integrity of the topsoil and subsoil (where appropriate and not otherwise dictated by the Surface Use Agreement)
 - a. Identify salvaged topsoil and subsoil.
 - b. Segregation of salvaged soils to protect those materials from erosion, degradation, and contamination.
 - c. Incorporate stored soil material into the disturbed landscape to the extent practicable.
 - d. Stockpiled soils to be stored beyond one growing season shall be stabilized with appropriate vegetation
 - e. Record location and approximate volumes of stockpiles.
3. Prepare site for revegetation upon completion of well activities – plugging/abandonment.
 - a. Redistribute soil materials in a manner similar to the original vertical profile.
 - b. Reduce compaction to an appropriate depth (generally below the root zone) prior to redistribution of topsoil, to accommodate appropriate site-specific plant species.
 - c. Provide suitable conditions to support the long term establishment and viability of the desired plant community.
 - d. Protect seed and seedling establishment (e.g. erosion control matting, mulching, hydro-seeding, surface roughening, fencing, etc. to be determined based upon site specific conditions
4. Establish a desired self-perpetuating native plant community based upon region specific guidance available from NRCS
 - a. Establish species composition, diversity, structure, and total ground cover appropriate for the desired plant community
 - b. Select genetically appropriate and locally adapted native plant materials based on the site characteristics and setting.
 - i. Seed mixtures shall be selected based on soil type, site conditions and intended final use
 - ii. Seed shall not be used later than one year after the test date that appears on the label.
 - iii. The bags of seed shall be clearly labeled indicating test date, weed percentage or % Pure Live Seed (PLS), viability or germination percentage, and inert material

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- c. Select non-native plants only as a short term and non-persistent alternative to native plant materials. Ensure the non-natives are designed to aid in the re-establishment of native plant communities. Revegetate in accordance with best practices described below:
 - i. Re-spread topsoil to a minimum depth of 4 inches.
 - ii. Prepare a friable but firm and weed free seedbed that is not compacted by prior construction work.
 - iii. Appropriate firmness can be estimated when a person leaves about a ¼ inch deep footprint.
 - iv. Remove rocks, twigs, concrete, foreign material and clods over 2 inches that can't be broken down.
 - v. Soil moisture content shall be at least 30% soil capacity (estimated). Do not seed into undesirable moisture conditions (e.g. "dust" or "mud").
 - d. Plant communities shall be evaluated annually for two years to ensure revegetation success as determined by IDAPA 20.07.02.325
 - i. Repair and reseed areas that have erosion damage as necessary.
 - ii. If a stand has less than 70% ground cover after two years, re-evaluate the choice of plant materials, methods and available light and moisture. Re-establish the stand with modifications based on the evaluation
5. Reestablish initial visual composition
- a. Ensure the reclaimed landscape features conform to the prior conditions of the site.