Venegas, Victoria, EMNRD

From: Hamlet, Robert, EMNRD

Sent: Monday, September 9, 2019 9:39 AM

To: Bob Asher

Cc: Bratcher, Mike, EMNRD; Venegas, Victoria, EMNRD

Subject: RE: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

Bob,

I made a list of things that need to be included in the remediation plan:

- 1. Scaled site map diagram
- 2. Site Photos
- 3. Site Assessment/Delineation summary (horizontal and vertical)
- 4. Delineation sample analytical results (lab tested)
- 5. Table containing analytical data
- 6. Description of proposed excavation depths corresponding to analytical table
- 7. Depth to groundwater evaluation, including fluid level data from New Mexico Office of the State Engineer or other documented evidence
- 8. Karst evaluation, here is the link to the CFO GIS data
- 9. FEMA National Flood map review.
- 10. Signed and dated C-141 (Pages 3-5)

Some operators include additional information, but at a minimum these are the things we need to make a decision. I would just check and make sure all things are included in the report.

Thanks

Robert J Hamlet
State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 748-1283
Robert.Hamlet@state.nm.us

OCD approval does not relieve the operator of liability should their operations fail to adequately investigate and remediate contamination that may pose a threat to groundwater, surface water, human health or the environment. In addition, OCD approval does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

From: Bob Asher <Bob Asher@eogresources.com>

Sent: Monday, September 9, 2019 7:47 AM

To: Hamlet, Robert, EMNRD < Robert. Hamlet@state.nm.us>

Subject: [EXT] RE: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

Rob,

Per the below email from you (August 13, 2019), are you just needing the additional information highlighted in vellow?

Thank you,

Robert Asher Environmental Supervisor, S & E Department, EOG Resources, Inc. Artesia Division 104 South Fourth Street, Artesia, NM 88210, 575-748-4217 (Office), 575-365-4021 (Cell) EOG Safety Begins with YOUR Safety

eog resources

From: Hamlet, Robert, EMNRD < Robert. Hamlet@state.nm.us>

Sent: Tuesday, August 13, 2019 11:03 AM

To: Bob Asher <Bob Asher@eogresources.com>; Katie Jamison@eogresources.com>

Cc: Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Venegas, Victoria, EMNRD <Victoria.Venegas@state.nm.us>

Subject: RE: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

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Hey Bob and Katie,

Thank you for the drillers log verifying the DTW is 60 feet.

I just wanted to let you know that we no longer use the ranking system included on the Characterization & Remediation Plan that was sent in on 2/8/2019.

Please review and resubmit including all documentation as required.

Please submit:

- 1. Scaled site map diagram
- 2. Site Photos
- 3. Site Assessment/Delineation summary (horizontal and vertical)
- 4. Delineation sample analytical results (lab tested)
- 5. Table containing analytical data
- 6. Description of proposed excavation depths corresponding to analytical table
- 7. Depth to groundwater evaluation, including fluid level data from New Mexico Office of the State Engineer or other documented evidence
- 8. Karst evaluation

Thank you,

Robert J Hamlet State of New Mexico Energy, Minerals, and Natural Resources Oil Conservation Division 811 S. First St., Artesia NM 88210 (575) 840-5963 Robert.Hamlet@state.nm.us

OCD approval does not relieve the operator of liability should their operations fail to adequately investigate and remediate contamination that may pose a threat to groundwater, surface water, human health or the environment. In addition, OCD approval does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

From: Bob Asher < Bob Asher@eogresources.com >

Sent: Tuesday, August 13, 2019 8:19 AM

To: Hamlet, Robert, EMNRD < Robert. Hamlet@state.nm.us >; Katie Jamison@eogresources.com >

Cc: Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Venegas, Victoria, EMNRD <Victoria.Venegas@state.nm.us>

Subject: RE: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

Rob,

Attached is the Drilling Log from Talon, LPE.

Thank you,

Robert Asher Environmental Supervisor, S & E Department, EOG Resources, Inc. Artesia Division 104 South Fourth Street, Artesia, NM 88210, 575-748-4217 (Office), 575-365-4021 (Cell) **EOG Safety Begins with YOUR Safety**

eog resources

From: Hamlet, Robert, EMNRD < Robert.Hamlet@state.nm.us>

Sent: Wednesday, July 24, 2019 12:05 PM

To: Bob Asher <Bob Asher@eogresources.com>; Katie Jamison@eogresources.com>

Cc: Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Venegas, Victoria, EMNRD <Victoria.Venegas@state.nm.us>

Subject: RE: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

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Could you have Talon send a copy of the drillers log? We will revise to 51-100' for the closure criteria limit on contaminants, once we receive it.

Thanks,

Robert J Hamlet
State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 840-5963
Robert.Hamlet@state.nm.us

From: Bob Asher <Bob_Asher@eogresources.com>

Sent: Wednesday, July 24, 2019 10:49 AM

To: Hamlet, Robert, EMNRD < <u>Robert.Hamlet@state.nm.us</u>>; Katie Jamison < <u>Katie Jamison@eogresources.com</u>> **Cc:** Bratcher, Mike, EMNRD < <u>mike.bratcher@state.nm.us</u>>; Venegas, Victoria, EMNRD < <u>Victoria.Venegas@state.nm.us</u>>

Subject: [EXT] RE: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

Rob,

Per your February 13, 2019 email, EOG Resources, Inc. drilled a borehole to a depth of sixty (60) feet, the borehole remained open for a time period of 72 hours and was gauged. The gauging detected no groundwater at the 60' depth. With the attached summary report, EOG requests that the site be revised to the 51 feet-100 feet, Table I, Closure Criteria for Soils Impacted by a Release limits.

EOG Resources, Inc. will submit a Remediation Plan to you on or before the August 7, 2019 extension deadline.

Thank you,

Robert Asher Environmental Supervisor, S & E Department, EOG Resources, Inc. Artesia Division 104 South Fourth Street, Artesia, NM 88210, 575-748-4217 (Office), 575-365-4021 (Cell) **EOG Safety Begins with YOUR Safety**

eog resources

From: Hamlet, Robert, EMNRD < Robert.Hamlet@state.nm.us>

Sent: Tuesday, May 7, 2019 3:02 PM

To: Katie Jamison < Katie Jamison@eogresources.com >

Cc: Bob Asher <Bob Asher@eogresources.com>; Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Venegas,

Victoria, EMNRD < Victoria. Venegas@state.nm.us >

Subject: Extension Approval - EOG - Leontodon ASH Fed Com #1 - (2RP-5066) 11-7-2018

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RE: 2RP-5066

Katie,

Your request for an extension to August 7th, 2019 is approved.

Thank you,

Robert J Hamlet

State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 840-5963
Robert.Hamlet@state.nm.us

From: Katie Jamison < Katie_Jamison@eogresources.com>

Sent: Tuesday, May 7, 2019 2:32 PM

To: Hamlet, Robert, EMNRD < Robert.Hamlet@state.nm.us>

Cc: Bob Asher <Bob Asher@eogresources.com>; Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Venegas,

Victoria, EMNRD < Victoria. Venegas@state.nm.us >

Subject: [EXT] RE: 90 Day Extension to 5/7/2019 (2RP-5066) (30-005-63324)

Hi Rob,

EOG Resources is requesting an additional 90-day extension for the Characterization Plan of 2RP-5066. Our Production Dept. is currently working on writing plugging procedures for the well on location. Once the plugging is complete, we can accomplish the core sampling that NMOCD has requested.

Thank you for your help,

Katie Jamison

Safety & Environmental Manager EOG Resources, Inc – Artesia NM Division 105 S. Fourth Street Artesia, NM 88210

Cell: 575-513-9915 Office: 575-748-4193



From: Hamlet, Robert, EMNRD < Robert.Hamlet@state.nm.us>

Sent: Thursday, February 14, 2019 9:39 AM

To: Katie Jamison < Katie_Jamison@eogresources.com>

Cc: Bob Asher < Bob Asher@eogresources.com >; Bratcher, Mike, EMNRD < mike.bratcher@state.nm.us >; Venegas,

Victoria, EMNRD < Victoria. Venegas@state.nm.us>

Subject: 90 Day Extension to 5/7/2019 (2RP-5066) (30-005-63324)

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RE: 2RP-5066

Hey Katie,

Your request for an extension to May 7th, 2019 is approved.

Thank you,

Robert J Hamlet
State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 840-5963
Robert.Hamlet@state.nm.us

OCD approval does not relieve the operator of liability should their operations fail to adequately investigate and remediate contamination that may pose a threat to groundwater, surface water, human health or the environment. In addition, OCD approval does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

From: Katie Jamison < Katie Jamison@eogresources.com >

Sent: Thursday, February 14, 2019 8:11 AM

To: Hamlet, Robert, EMNRD < Robert. Hamlet@state.nm.us>

Cc: Bob Asher < Bob_Asher@eogresources.com >; Bratcher, Mike, EMNRD < mike.bratcher@state.nm.us >; Venegas, Victoria, EMNRD < Victoria, Venegas@state.nm.us >

Subject: [EXT] FW: Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019) (2RP-5066) (30-005-63324)

Hi Rob,

EOG Resources, Inc. would like to pursue drilling a borehole within the spill site as soon as a core rig can be scheduled. However, another factor with this battery location is that our geology department is re-evaluating the well and may decide to plug the well (possibly within the next 90 - 180 days). Since the tanks and lines need to be moved in order to bore in the release location, EOG would like to request a 90-day extension on the Characterization Plan currently due on 2/7/2019. This would allow for all tanks and equipment to be removed so a core rig could be brought in to drill the borehole as you have suggested.

Thank you for your time and consideration in this matter. Please let me know if you have any questions and I will get answers for you.

Sincerely,

Katie Jamison

Safety & Environmental Manager EOG Resources, Inc – Artesia NM Division 105 S. Fourth Street Artesia, NM 88210

Cell: 575-513-9915

Office: 575-748-4193



From: Hamlet, Robert, EMNRD [mailto:Robert.Hamlet@state.nm.us]

Sent: Wednesday, February 13, 2019 9:01 AM **To:** Bob Asher < Bob Asher@eogresources.com >

Cc: Bratcher, Mike, EMNRD <mike.bratcher@state.nm.us>; Venegas, Victoria, EMNRD <Victoria.Venegas@state.nm.us>

Subject: RE: Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019) (2RP-5066) (30-005-

63324)

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Bob.

I talked to Mike about this subject this morning. Until, Santa Fe gives us more leeway in making these types of DTW adjustments in the Spill Rule, we are obligated to follow the guidelines set forth. The common assumption is that the aquifers stays lateral and 50 feet of additional elevation increases the DTW by 50 feet. In some cases that is true and others not so much. Bedding planes tend to bend with forces pushing against each other (i.e. plates colliding) or they move up or down (i.e. strike slip fault). Without hard data closer to the spill site there's no alternative, but to use the DTW from nearby or surrounding wells within ½ mile radius of the spill. One possibility would be to drill a borehole near the spill site 60 feet and wait 72 hours to see if water is present. If no water was present, we would except the driller's log as hard data.

Regards,

Robert J Hamlet
State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 840-5963
Robert.Hamlet@state.nm.us

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From: Bob Asher < Bob Asher@eogresources.com >

Sent: Tuesday, February 12, 2019 3:43 PM

To: Hamlet, Robert, EMNRD < Robert. Hamlet@state.nm.us >

Cc: Bratcher, Mike, EMNRD < <u>mike.bratcher@state.nm.us</u>>; Venegas, Victoria, EMNRD < <u>Victoria.Venegas@state.nm.us</u>> **Subject:** [EXT] RE: Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019) (2RP-5066) (30-005-63324)

Rob,

Sound good concerning the floodplain. I'm still interested in floodplain data, is there a website to access that information?

I've attached a google image showing elevations of the Leontodon ASH Federal Com #1 and the water wells. Below shows the recorded DTW and the elevations of the location and water wells. Based off of the Lat/Long of USGS #0801 and the UTM coordinates of NMOSE #12648, places these two wells side by side which could indicate these are the same wells.

Leontodon ASH Federal Com #1 Elevation	USGS #2501	NMOSE #09337	NMOSE #12648	USGS #0801	Elevation Difference	DTW	Recalculated DTW
3827	3763				64	32.5	96.5'
3827		3840			-13	99	86'
3827			3773		54	45	99'
3827				3776	51	35.26	86.26'

Would this information warrant the well to be remediated at the 51 feet-100 feet limit using the recalculated DTW of USGS #0801?

 Chloride
 1,0000 mg/kg

 TPH
 2,500 mg/kg

 GRO+DRO
 1,000 mg/kg

 BTEX
 50 mg/kg

 Benzene
 10 mg/kg

Thank you,

Robert C. "Bob" Asher

Environmental Supervisor
Safety & Environmental Department
EOG Resources, Inc.
Artesia Division
EOG Safety Begins With YOUR Safety



From: Hamlet, Robert, EMNRD [mailto:Robert.Hamlet@state.nm.us]

Sent: Tuesday, February 12, 2019 2:01 PM

To: Bob Asher <Bob Asher@eogresources.com>

Cc: Bratcher, Mike, EMNRD < mike.bratcher@state.nm.us >; Venegas, Victoria, EMNRD < Victoria.Venegas@state.nm.us >

Subject: RE: Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019) (2RP-5066) (30-005-

63324)

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Bob,

Disregard the 100 year floodplain portion. After talking to Mike, the well is outside the floodplain. The Panel notation was mistook as being the floodplain portion of the map.

The most recent DTW of 35.26 feet (2/7/2006) requires the well still be remediated at the <50 limit:

Chloride 600 mg/kg
TPH 100 mg/kg
BTEX 50 mg/kg
Benzene 10 mg/kg

Please let me know if you have any questions.

Thank you,

Robert J Hamlet
State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 840-5963
Robert.Hamlet@state.nm.us

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From: Bob Asher < Bob Asher@eogresources.com >

Sent: Tuesday, February 12, 2019 1:36 PM

To: Hamlet, Robert, EMNRD < Robert. Hamlet@state.nm.us>

Cc: Bratcher, Mike, EMNRD < mike.bratcher@state.nm.us >; Venegas, Victoria, EMNRD < Victoria.Venegas@state.nm.us >

Subject: [EXT] RE: Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019)

Rob,

What resource(s) were utilized for determining the well/release is within a 100-year floodplain? So that for future plans, I can be completely accurate with determining the site ranking.

Thank you,

Robert C. "Bob" Asher

Environmental Supervisor
Safety & Environmental Department
EOG Resources, Inc.
Artesia Division

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From: Hamlet, Robert, EMNRD [mailto:Robert.Hamlet@state.nm.us]

Sent: Tuesday, February 12, 2019 7:38 AM

To: Bob Asher <Bob Asher@eogresources.com>

Cc: Yvette Moore < Yvette_Moore@eogresources.com>; Bratcher, Mike, EMNRD < mike.bratcher@state.nm.us>;

Venegas, Victoria, EMNRD < Victoria. Venegas@state.nm.us >

Subject: RE: Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019)

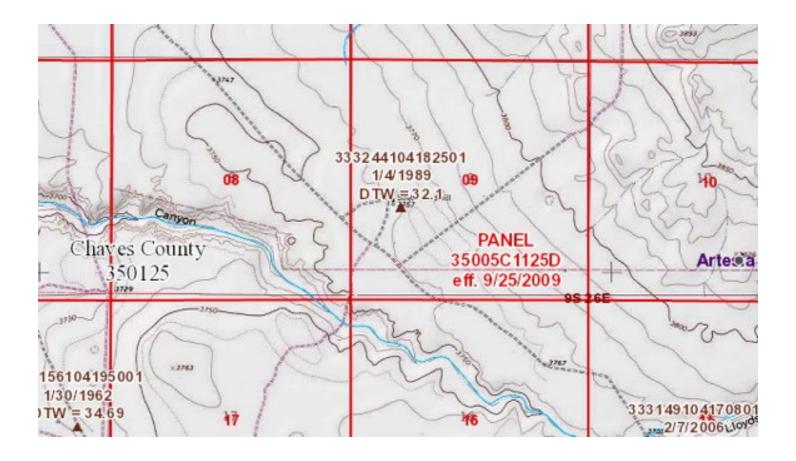
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Bob,

Thanks for the Characterization and Remediation proposal. There seems to be a couple issues with the Characterization. First, the well is ½ mile away from an ephemeral stream and located in a 100 year floodplain. The closest DTW (Measurement) that we have is about 1/2 mile south of the Leontodon ASH Federal Com #1 well, which had a DTW of 35.26 feet (2/7/2006).

The criteria for soils impacted by the release will need to be remediated at the <50 limit:

Chloride 600 mg/kg
TPH 100 mg/kg
BTEX 50 mg/kg
Benzene 10 mg/kg



Please let me know if you have any questions.

Thank you,

Robert J Hamlet
State of New Mexico
Energy, Minerals, and Natural Resources
Oil Conservation Division
811 S. First St., Artesia NM 88210
(575) 840-5963
Robert.Hamlet@state.nm.us

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From: Bob Asher < Bob Asher@eogresources.com >

Sent: Friday, February 8, 2019 7:23 AM

To: Hamlet, Robert, EMNRD < Robert.Hamlet@state.nm.us>; Bratcher, Mike, EMNRD < mike.bratcher@state.nm.us>

Cc: Yvette Moore < Yvette Moore@eogresources.com>

Subject: [EXT] Leontodon ASH Federal Com #1 (Characterization & Remediation Plan, 2/7/2019)

Thank you,

Robert C. "Bob" Asher

Environmental SupervisorSafety & Environmental Department

EOG Resources, Inc.
Artesia Division
Artesia, NM 88210
575-748-4217 (Office)
575-365-4021 (Cell)

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