From: Ramona Hovey
To: McClure, Dean, EMNRD

Subject: [EXT] RE: Solaris Water Midstream, McCrae SWD #1

Date: Friday, October 11, 2019 1:56:56 PM

Attachments: McCrae UpdatedSec8.pdf

Indeed! Here is the updated Section VIII. Please let me know if you need any other information. Thank you so much for your help on this. I know it's been a bit crazy over there for a while. We are excited to see things are moving forward!

Regards,

Ramona Hovey

ENGINEERS

Sr. Petroleum Engineer

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12912 Hill Country Blvd., Suite F-200, Austin, Texas, 78738

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From: McClure, Dean, EMNRD < Dean. McClure@state.nm.us>

Sent: Friday, October 11, 2019 2:45 PM **To:** Ramona Hovey <ramona@lonquist.com>

Subject: RE: Solaris Water Midstream, McCrae SWD #1

Oh yes sorry, I had actually meant 9924 but wrote the liner top depth in my email. Hence proving how easy it is to have a typo.

Dean McClure
Petroleum Specialist
New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, New Mexico 87505
(505) 476-3471

From: Ramona Hovey < <u>ramona@longuist.com</u>>

Sent: Friday, October 11, 2019 1:37 PM

To: McClure, Dean, EMNRD < <u>Dean.McClure@state.nm.us</u>> **Subject:** [EXT] RE: Solaris Water Midstream, McCrae SWD #1

It was indeed a typo, but the set point is 9,924' with the top of the liner at 9,724. Sorry for the mixup! Here is a corrected schematic.

Regards,

Ramona Hovey

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From: McClure, Dean, EMNRD < Dean.McClure@state.nm.us>

Sent: Friday, October 11, 2019 2:31 PM

To: Ramona Hovey < ramona@longuist.com >

Subject: FW: Solaris Water Midstream, McCrae SWD #1

Hello Ramona,

While updating the depths, I noticed that on the new well diagram, the production casing is showing a new set point of 12094 instead of the previous 9724. Clearly that is a typo since a liner is still proposed, but I just want to confirm that the set point for the production casing is still 9724 or else find out the new depth.

Thanks,
Dean McClure
Petroleum Specialist
New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, New Mexico 87505
(505) 476-3471

From: McClure, Dean, EMNRD

Sent: Friday, October 11, 2019 12:58 PM **To:** 'Ramona Hovey' < ramona@longuist.com

Subject: RE: Solaris Water Midstream, McCrae SWD #1

Hello Ramona,

Considering that the intervals will be changed again once the well is drilled, I do not see a reason to submit an entire amended C108.

This email will be good enough for disclosing what the planned open hole diameter will be.

However, I would like an amended "Part VIII. Geological Data" be emailed to me that includes a statement that identifies the upper refining layer for the proposed McCrae SWD No. 1.

As a general update on the status of this application; unless something unforeseen occurs, I am hoping to be able to submit a final recommendation to the director by the middle of next week. Thanks for your patience thus far; within a few months we hope to start having these applications reviewed in a more timely manner.

Dean McClure
Petroleum Specialist
New Mexico Energy, Minerals and Natural Resources Department
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Santa Fe, New Mexico 87505
(505) 476-3471

From: Ramona Hovey < ramona@longuist.com>

Sent: Friday, October 11, 2019 9:50 AM

To: McClure, Dean, EMNRD < <u>Dean.McClure@state.nm.us</u>> **Subject:** [EXT] RE: Solaris Water Midstream, McCrae SWD #1

I apologize for the slow response to your last email. Solaris originally had a different geologist selecting the tops. They were unable to reach him, so they asked our geologist to review. We do see there is Woodford Shale at 12013'. Our geologist has also determined that the top of the Devonian should be at 12,094'. We would like to change the requested injection interval be changed per the attached well bore diagram. Please let me know if we should amend the C108 and support document to reflect these changes. Also, you are correct on the open hole diameter - it is planned to be 6-1/2".

Regards,

Ramona Hovey

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From: McClure, Dean, EMNRD < Dean. McClure@state.nm.us >

Sent: Friday, October 4, 2019 2:39 PM

To: Ramona Hovey < ramona@lonquist.com>

Subject: RE: Solaris Water Midstream, McCrae SWD #1

Ms. Ramona Hovey,

On the Woodford, that sounds good; I am just looking for something that asserts an upper confining layer exists and identifies what that layer is.

However, the open hole injection interval having an ID of 8-1/2" gives me pause due to the presence of a 7-5/8" liner proposed for this well. I would expect something along the lines of 6-3/8". As convenient, could you double check that number for me?

Dean McClure
Petroleum Specialist
New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, New Mexico 87505
(505) 476-3471

From: Ramona Hovey < ramona@lonquist.com>

Sent: Friday, October 4, 2019 12:57 PM

To: McClure, Dean, EMNRD < <u>Dean.McClure@state.nm.us</u>> **Subject:** [EXT] RE: Solaris Water Midstream, McCrae SWD #1

The open hole interval will be 8-1/2" diameter. Solaris is having their geologist review for the Woodford.

Regards,

Ramona Hovey

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From: McClure, Dean, EMNRD < Dean.McClure@state.nm.us>

Sent: Wednesday, October 2, 2019 1:02 PM
To: Ramona Hovey < ramona@lonquist.com >
Subject: Solaris Water Midstream, McCrae SWD #1

Ms. Ramona Hovey,

I am currently reviewing the application for the McCrae SWD # 1, operated by Solaris Water Midstream. I have the following questions:

What is the proposed open hole size for the injection interval?

The list of horizon tops is missing the Woodford Shale. Does your geologist think it is not present at the proposed location?

Dean McClure
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