



UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549

DIVISION OF
CORPORATION FINANCE

Mail Stop 4628

March 24, 2017

Kyle S. Ramachandran
Chief Financial Officer
Solaris Oilfield Infrastructure, Inc.
8901 Gaylord Drive, Suite 210
Houston, TX 77024

**Re: Solaris Oilfield Infrastructure, Inc.
Registration Statement on Form S-1
Filed March 15, 2017
File No. 333-216721**

Dear Mr. Ramachandran:

We have reviewed your registration statement and have the following comments. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to this letter by amending your registration statement and providing the requested information. If you do not believe our comments apply to your facts and circumstances or do not believe an amendment is appropriate, please tell us why in your response.

After reviewing any amendment to your registration statement and the information you provide in response to these comments, we may have additional comments. Unless we note otherwise, our references to prior comments are to comments in our March 8, 2017 letter.

Our Corporate Structure, page 6

1. We note that the tax receivable agreement (TRA) will provide for the payment by Solaris Inc. to each TRA holder of 85% of the net cash savings that Solaris Inc. actually realizes or is deemed to realize in certain circumstances in periods after this offering as a result of (i) certain increases in tax basis that occurs as a result of Solaris Inc.'s acquisition of all or a portion of such TRA holder's Solaris LLC Units in connection with this offering or pursuant to the exercise of the Redemption Right or the call right and (ii) imputed interest deemed to be paid by Solaris Inc. as a result of, and additional tax basis arising from, any payments Solaris Inc. makes under the

TRA. Please provide an expanded description of your expected accounting including the related journal entries. Your response should address, but not necessarily be limited to, the following:

- How you considered whether a pro form adjustment is needed for incurring a tax agreement liability resulting from the acquisition of TRA holder's Solaris LLC units in connection with the offering;
- The initial accounting for any tax agreement liability recorded in connection with the reorganization transaction;
- The initial accounting for any exchanges subsequent to the reorganization transaction; and,
- The subsequent accounting for any changes to previously recorded liabilities, including i) adjustments to valuation allowances associated with the underlying tax assets and ii) other changes that impact the amount of net cash savings realized by Solaris Inc.

Provide reference to the specific authoritative literature that supports your accounting.

Risk Factors, page 17

2. We note that you will use a portion of the proceeds from this offering to make a distribution to the Existing Owners and grant certain employees cash bonuses. Please tell us what consideration you have given to including a risk factor that discusses the possibility that Existing Owners, including certain officers and directors, may receive a substantial portion of the proceeds from this offering.

Management's Discussion and Analysis of Financial Condition and Results of Operations, page 51

Recent Trends and Outlook, page 52

3. We note your response to comment 12 which specifies that you are unable to provide the requested information. It would appear that a utilization ratio can be derived from the total system revenue days for a specific period relative to the total system revenue days available. If such information is available for the periods presented, it is unclear as to how you are unable to calculate the requested information as the total change in revenue days is attributable to the two variables referenced in the response. We re-issue prior comment 12.

Results of Operations, page 56

Cost of Revenues, page 57

4. We note that your cost of proppant system services as a percentage of proppant system services revenue increased from 121% for the year ended December 31, 2015 to 138% for the year ended December 31, 2016. Please disclose the reasons attributable to this unfavorable trend of increased costs relative to the amounts of related revenue.

In addition, please expand your discussion in MD&A to address the complete measure for costs of revenues and costs of revenues as a percentage of total revenue, including the effects of depreciation, depletion and amortization.

Certain Relationships and Related Party Transactions, page 95

Historical Transactions with Affiliates, page 99

5. We note you disclose that you may continue to utilize office space under the administrative services agreement or receive certain other administrative services from Solaris Energy Management LLC. Please revise your disclosure to clarify whether you intend to terminate this agreement following the completion of this offering. To the extent this agreement will remain effective, please file the agreement as an exhibit in accordance with Item 601 of Regulation S-K or tell us why you do not believe the agreement is material.

Consolidated Statements of Operations, page F-4

6. We note your response to comment 22 and your revised disclosure on page F-14. If you apply the accommodation outlined in SAB Topic 11.B, in excluding depreciation and amortization from certain cost and expense categories, please separately report depreciation and amortization that is attributable to each line from which it has been excluded on the face of your statement of operations.

We remind you that the company and its management are responsible for the accuracy and adequacy of their disclosures, notwithstanding any review, comments, action or absence of action by the staff.

Kyle S. Ramachandran
Solaris Oilfield Infrastructure, Inc.
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Refer to Rules 460 and 461 regarding requests for acceleration. Please allow adequate time for us to review any amendment prior to the requested effective date of the registration statement.

You may contact John Cannarella, Staff Accountant, at (202) 551-3337 or Jenifer Gallagher, Staff Accountant, at (202) 551-3706 if you have questions regarding comments on the financial statements and related matters. Please contact Parhaum J. Hamidi, Attorney-Adviser, at (202) 551-3421 or, in his absence, Karina V. Dorin, Senior Counsel, at (202) 551-3763 with any other questions.

Sincerely,

/s/ Loan Lauren P. Nguyen for

H. Roger Schwall
Assistant Director
Office of Natural Resources