

Sequence V Surveillance Panel Meeting October 15th, 2021 11 AM EST, via Webex

Roll Call:

Afton: C. Porter
ExxonMobil: A. Meier, A. Montufar
Ford: M. Deegan, R. Zdrodowski
Haltermann: Q. Dunford, E. Hennessy, P. Tumati
HCS Group: I. Gabrel
Infineum: D. Boese, C. Laufer, C. Leverett, A. Ritchie (Chair)
Intertek: A. Lopez
Lubrizol: J. Gingerich, J. Gleason
OHT: J. Bowden
Oronite: R. Stockwell
Shell: J. Hsu
SwRI: S. Clark, D. Engstrom, T. Kostan, P. Lang
TEI: D. Lanctot
TMC: R. Grundza

Meeting Summary:

The fuels contract team updated the Sequence VH Surveillance Panel that the fuel contract has been awarded to Haltermann. Haltermann reported that 129k gallons of the current fuel batch is remaining and that the new batch will take about 30-45 days to complete. More than half of the tests with 1011-1 have been reported and the rest are on track to complete in the next 2 weeks. By the next meeting, the panel will be in a good position to set targets for 1011-1 and to hear an update from Haltermann on the new fuel batch. The panel was asked to vote on the upcoming B ballot re: the negative vote for Information Letter 21-04.

Actions:

1. Open action from Sep 9th meeting: **Haltermann** to report monthly inventory via email to V SP.
2. Open action from [March 26th meeting](#): **Lab engineers** to meet to investigate severity shifts (share operational data, build data, ratings, etc). **Rich Grundza (TMC)** to schedule meetings and to include Ford and the Chair.
3. Open action from [Feb 25th meeting](#): **Robert Stockwell (Oronite)** to lead task force on obtaining clarity around test validity, QIs, 2 hours of no data, etc.
4. Open action from [June 24th, 2020 meeting](#): **Haltermann** to look at fuel data from Sec 8.2.6 requirement and report back to panel.

Next call: tbd, via Webex

Meeting Details:

The panel met to learn the outcome of the fuel contract negotiations. On behalf of the fuels contract team, Al Lopez (Intertek) updated the Surveillance Panel that Haltermann was awarded the contract to build the next fuel batch. The contract is not signed yet but is very close to being approved by all parties.

The Chair asked Haltermann for an update of the fuels inventory. Prasad Tumati (Haltermann) reported that we have 129k gallons remaining. We have consumed about 58k gallons in the last 3 months. The consumption will likely be the same for the next 3 months. By end of December, Prasad estimates that we will have about 75k gallons remaining. Quintine Dunford (Haltermann) explained that once the contract is signed, the batch will be started and will take about 30-45 days to complete. Haltermann is confident to hit all targets with the next batch. For planning purposes, the Chair stated that the matrix should be starting early January after the testing surges which typically occur at YE.

Given our recent experience with the current fuel batch, Mike Deegan (Ford) asked if there should be any discussion to address this with the upcoming fuel matrix. Al Lopez (Intertek) explained that the plan is to run the matrix with the intention of hitting the target based on our first 3 tests – to make sludge and discriminate. Then we will run the rest of the matrix, a total of 15 tests across 3 labs. The data set will then be analyzed by the statisticians to determine how close we are to existing targets, if a correction should be applied, or if we need additional testing. The Chair added that 15 tests might not be enough to show if the fuel batch is mild or not. Rich Grundza (TMC) said the initial 15-test results suggested a correction factor was not needed but a lot more data collected over time showed that a correction factor should have been adopted. Doyle Boese (Infineum) stated that if the difference we calculate is not statistically significant, we would again not recommend a correction factor with the introduction of a new fuel batch. Rich summarized that we just do the best we can with the data we have.

Al Lopez (Intertek) had a few questions for Haltermann. Quintine Dunford (Haltermann) replied to the questions.

- Given the well reported supply chain situations, do Haltermann see any likely delays or have any concerns with the next fuel batch? Quintine confirmed that Haltermann has already factored these delays in with the 30–45-day estimate. Most of the chemical deliveries should not be impacted. He commented that the biggest challenge might be finding drivers of hazardous materials but Haltermann has mitigated that by having dedicated trucks. He does not foresee any issues.
- As the batch size is 400k gallons, what is the status of leasing a smaller tank? Quintine responded by saying that a tank in Nixon, Texas has been identified. It unfortunately needs some repairs. Depending on timing, Haltermann may need to go into the larger million-gallon tank and later transfer the fuel batch to the smaller tank. If the larger tank is needed initially, we will keep the panel apprised of the situation. If that's the case, Haltermann will go through all the necessary protocols to ensure the tank and lines are cleaned before the transfer process. Al asked about the potential risk of contamination from a transfer process. Quintine explained that the transfer just involves opening valves appropriately to ensure no contamination and ensuring the tank is clean. Quintine confirmed that the panel will be updated.
- If we test and then do the transfer, the panel may want to run a reference to verify. The decision will require the whole panel to discuss. Quintine said Haltermann does tank transfers often and there's a procedure in place. The product is tested once it's moved to confirm the product. There should be no issue.

- How long does the transfer take? Quintine answered that it depends on the size of the pump. If the transfer rate is 400 gal / min, then it will take a few hours, less than a full shift. No disruption is foreseen.

Rich Grundza (TMC) reported that four 1011-1 tests have been uploaded to TMC. LTMS file should be available soon at the TMC site. 5th test should be completed and reported shortly. 2 additional tests coming. We should have 7 results in a couple weeks, so we should be in a good position to set targets by December. Al Lopez (Intertek) shared that sludge is tracking well with an average Yi of almost zero, same with rocker cover and pistons. Engine varnish seems to be a bit mild so far. But so far so good. Dan Engstrom (SwRI) confirmed that their 2nd test will be uploaded soon and should fit in well with this data set.

Oil 1011-1										
1011 Targets										
Lab	EOT	AES	Yi	RCS	Yi	AE50	Yi	AP50	Yi	OSC
G	20210923	8.690	0.456	9.540	-1.285	9.500	1.143	8.910	0.500	1
G	20210923	8.130	-0.526	9.330	0.670	9.440	0.857	8.710	0.063	1
A	20210923	9.120	1.211	9.480	-0.647	9.550	1.381	9.050	0.792	0
D	20211012	7.960	-0.825	9.440	-0.262	9.400	0.667	8.600	-0.146	28
Mean		8.475	0.079	9.448	-0.381	9.473	1.012	8.818	0.307	7.500

Joe Gleason (Lubrizol) informed the panel that he was not able to get approval for Lubrizol participation in the matrix due to business needs.

Rich Grundza (TMC) pointed out that a lot of the data is from one lab and would like to make sure that the panel is aware of this observation. 4 from 1 lab, 2 from 1 lab, 1 from 1 lab.

The Chair stated the panel will need to reconvene by mid-late November to set targets for 1011-1 and to get an update from Haltermann about the new fuel batch preparation. Prasad Tumati (Haltermann) confirmed that he will keep the panel updated. The Chair reminded the panel that the IL 21-01 B ballot negative will be sent out soon for voting and that the statement that was written on behalf of the panel was not challenged. The Chair asked each panel member to please vote on the ballot and it will be adjudicated at the December B meeting. If the negative is judged to be technically persuasive, Rich Grundza (TMC) confirmed the panel will need to meet to address it.

Meeting adjourned at 11:44 AM EST.