

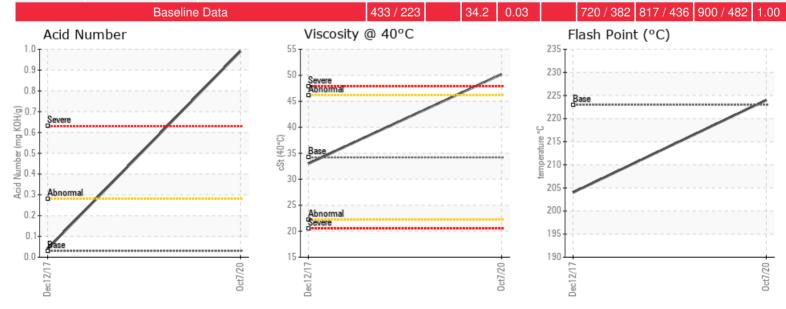
[2-25-38-9W5] Z-530 REFRIDGE

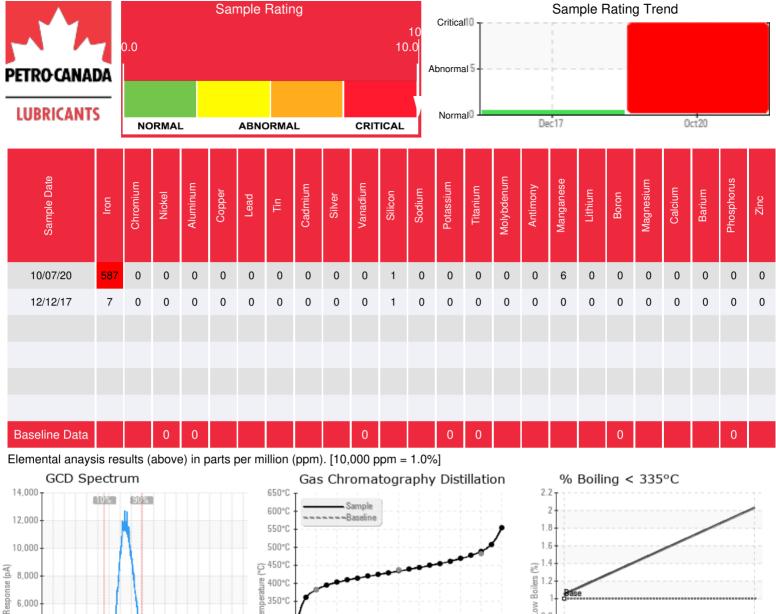
Customer: PTRHTF20192	System Information	Sample Information
Petrus Resources Corp	System Volume: 13000 ltr	Lab No: 02380382
2400, 240 – 4th Avenue S.W.	Bulk Operating Temp: 464F / 240C	Analyst: Terry Veenstra
02-25-38-9W5 Rocky Mountain House	Heating Source:	Sample Date: 10/07/20
Calgary, AB T2P 4H4 Canada	Blanket:	Received Date: 10/08/20
Attn: Jamin Severson	Fluid: PETRO CANADA PETRO-THERM	Completed: 10/13/20
Tel: (403)844-0600	Make: ALCO	Terry Veenstra
E-Mail: jseverson@petrusresources.com		terry.veenstra@petrocanadalsp.com

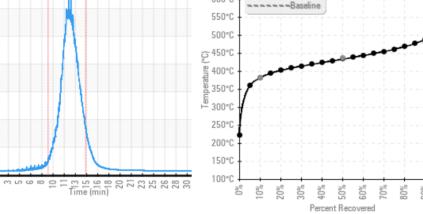
Recommendation: Viscosity is very high. Acid number is very high. Pentane Insolubles are very high. Sample location shows that it was taken from a bottom drain. This may not be representative of the fluid in the system. Suggest resampling in a location where oil is flowing.

Comments: Iron ppm levels are severe. PQ levels are severe. Pentane Insolubles levels are severely high. Acid Number (AN) is severely high. Visc @ 40°C is severely high.

Sample Date	Received Date	Fluid Age	Sample Location	Flash Point (COC)	Water (KF)	Viscosity (40°C)	Acid Number	Solids	GCD 10%	GCD 50%	GCD 90%	GCD % < 335°C
	mm/dd/yy			°F/°C	ppm	cSt	mg/KOH/ g	%wt	°F/°C	°F/°C	°F/°C	%
10/07/20	10/08/20	5y	Bottom Drain	435 / 224	156.0	50.2	0.99	2.44	719 / 382	812 / 434	911 / 488	2.03
12/12/17	12/22/17	2у		399 / 204	9.3	33.0	0.04	0.239	720 / 382	816 / 436	913 / 490	1.05







6,000

4,000

2,000

0



2 0.8

0.6

0.4

0.2

%00

0

Dec12/1

0ct7/20

Historical Comments			
12/12/17	This sample is in god condition and oil is good for continued use. Resample in 12 months.		

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