

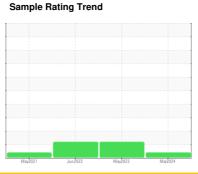
OIL ANALYSIS REPORT

VIAM/Main Floor Machine Id [VIAM^Main Floor] EXT 3 LAMINATOR

Component

Hydraulic System

PETRO CANADA TURBOFLO R&O 150 (--- GAL)





DIAGNOSIS

Recommendation

We recommend you service the filters on this component. Resample at the next service interval to monitor. We were unable to perform a particle count due to a high concentration of particles present in this sample.

Wear

All component wear rates are normal.

Contamination

Moderate concentration of visible dirt/debris present in the oil.

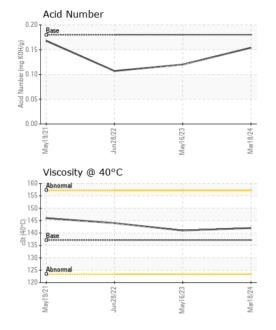
Fluid Condition

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

		May202	1 Jun2022	May2023 M	ar2024	
SAMPLE INFORM	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		KFS0005111	KFS0002203	KFS0001646
Sample Date		Client Info		18 Mar 2024	16 May 2023	28 Jun 2022
Machine Age	hrs	Client Info		0	0	0
Oil Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		N/A	N/A	N/A
Sample Status				ABNORMAL	ATTENTION	ABNORMAL
CONTAMINATION	V	method	limit/base	current	history1	history2
Water		WC Method	>0.05	NEG	NEG	NEG
WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>20	<1	<1	1
Chromium	ppm	ASTM D5185m	>20	<1	<1	0
Nickel	ppm	ASTM D5185m	>20	0	0	0
Titanium	ppm	ASTM D5185m		0	<1	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>20	0	<1	0
Lead	ppm	ASTM D5185m	>20	0	0	<1
Copper	ppm	ASTM D5185m	>20	1	<1	<1
Tin	ppm	ASTM D5185m	>20	<1	0	0
Antimony	ppm	ASTM D5185m				
Vanadium	ppm	ASTM D5185m		0	0	0
Cadmium	ppm	ASTM D5185m		0	0	0
ADDITIVES		method	limit/base	current	history1	history2
ADDITIVES Boron	ppm	method ASTM D5185m	limit/base	current 0	history1	history2
	ppm		limit/base			
Boron	• • •	ASTM D5185m	limit/base	0	0	1
Boron Barium	ppm	ASTM D5185m ASTM D5185m	limit/base	0 0	0	1 <1
Boron Barium Molybdenum	ppm	ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 <1	0 0 <1	1 <1 0
Boron Barium Molybdenum Manganese	ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 <1 <1	0 0 <1 <1	1 <1 0 0
Boron Barium Molybdenum Manganese Magnesium	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m		0 0 <1 <1 0	0 0 <1 <1 0	1 <1 0 0 0 0
Boron Barium Molybdenum Manganese Magnesium Calcium	ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	0 4	0 0 <1 <1 0	0 0 <1 <1 0	1 <1 0 0 0 0 0 0 0
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus	ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	0 4	0 0 <1 <1 0 0	0 0 <1 <1 0 0	1 <1 0 0 0 0 0 0 25
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc	ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	0 4	0 0 <1 <1 0 0 13	0 0 <1 <1 0 0 23	1 <1 0 0 0 0 0 0 25 10
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur	ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	0 4 0	0 0 <1 <1 0 0 13 7 2241	0 0 <1 <1 0 0 23 0 2695	1 <1 0 0 0 0 0 0 25 10 2889
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS	ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	0 4 0	0 0 <1 <1 0 0 13 7 2241	0 0 <1 <1 0 0 23 0 2695 history1	1 <1 0 0 0 0 0 0 25 10 2889 history2
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS	ppm ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m	0 4 0	0 0 <1 <1 0 0 13 7 2241 current	0 0 <1 <1 0 0 23 0 2695 history1	1 <1 0 0 0 0 0 0 25 10 2889 history2 <1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium	ppm	ASTM D5185m	0 4 0 limit/base >15	0 0 <1 <1 0 0 13 7 2241 current 0 <1	0 0 <1 <1 0 0 23 0 2695 history1 <1	1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium	ppm	ASTM D5185m	0 4 0 limit/base >15 >20	0 0 <1 <1 0 0 13 7 2241 current 0 <1	0 0 <1 <1 0 0 0 23 0 2695 history1 <1 <1	1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium FLUID CLEANLIN	ppm	ASTM D5185m	0 4 0 limit/base >15 >20 limit/base >1300	0 0 <1 <1 0 0 13 7 2241 current 0 <1	0 0 <1 <1 0 0 23 0 2695 history1 <1 0	1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium FLUID CLEANLIN Particles >4µm	ppm	ASTM D5185m method ASTM D5185m	0 4 0 limit/base >15 >20 limit/base >1300	0 0 <1 <1 0 0 13 7 2241 current 0 <1 0 current	0 0 <1 <1 0 0 23 0 2695 history1 <1 0 history1 2286	1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium FLUID CLEANLIN Particles >4µm Particles >6µm	ppm	ASTM D5185m method ASTM D5185m	0 4 0 limit/base >15 >20 limit/base >1300 >320 >80	0 0 <1 <1 0 0 13 7 2241 current 0 <1 0 current	0 0 <1 <1 <1 0 0 23 0 2695 history1 <1 <1 0 history1 2286 501	1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium FLUID CLEANLIN Particles >4µm Particles >6µm Particles >14µm	ppm	ASTM D5185m method ASTM D5185m ASTM D7647 ASTM D7647	0 4 0 limit/base >15 >20 limit/base >1300 >320 >80	0 0 <1 <1 0 0 13 7 2241 current 0 <1 0 current	0 0 <1 <1 <1 0 0 23 0 2695 history1 <1 <1 0 history1 2286 501 28	1
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium FLUID CLEANLIN Particles >4µm Particles >14µm Particles >21µm	ppm	ASTM D5185m method ASTM D5185m ASTM D7647 ASTM D7647 ASTM D7647	0 4 0 limit/base >15 >20 limit/base >1300 >320 >80 >20 >4	0 0 0 0 0 0	0 0	1



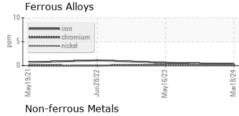
OIL ANALYSIS REPORT

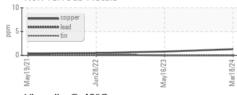


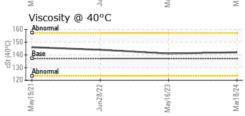
FLUID DEGRADA	TION	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045	0.18	0.154	0.12	0.107
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	MODER	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.05	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
FLUID PROPERT	TES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	137.1	142	141	144
SAMPLE IMAGES		method	limit/base	current	history1	history2
Color					2003	

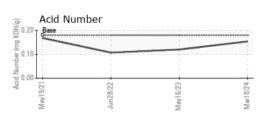


Bottom













Certificate L2367

Laboratory Sample No. Lab Number : 06124864

Test Package : IND 2

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : KFS0005111

Unique Number : 10939015

Received : 21 Mar 2024 **Tested**

: 26 Mar 2024 Diagnosed : 26 Mar 2024 - Jonathan Hester

VIAM/VICAM Manufacturing - Tennessee

87 Parktower Road Manchester, TN US 37355

T: (931)461-2300

Contact: Eric Thompson ethompson@viammfg.com

To discuss this sample report, contact Customer Service at 1-800-237-1369.

* - Denotes test methods that are outside of the ISO 17025 scope of accreditation.

Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)