MOB I LUBE 360™ OIL DIAGNOSTICS

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	SEVERE
FLUID CONDITION	ABNORMAL

Area
KEMP QUARRIES / NEOSHO [68014]
Machine Id
WL111
Component
Diesel Engine
Fluid
PETRO CANADA 15W40 (--- GAL)

RECOMMENDATION

We advise that you check the fuel injection system. Oil and filter change at the time of sampling has been noted. We recommend an early resample to monitor this condition. (Customer Sample Comment: PM-1 changed filters and fluid (Oil was changed last week due to fuel))

WEAR

All component wear rates are normal.

CONTAMINATION

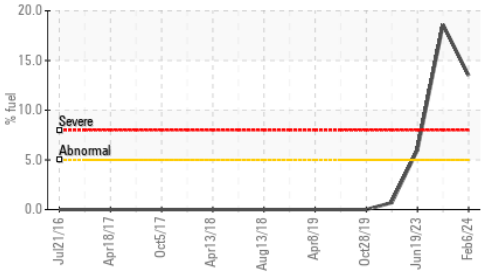
There is a high amount of fuel present in the oil.

FLUID CONDITION

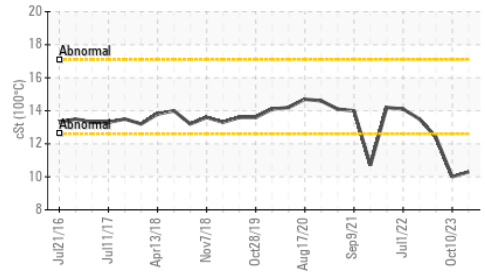
Fuel is present in the oil and is lowering the viscosity. The oil is no longer serviceable due to the presence of contaminants.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		PCA0086530	PCA0084711	PCA0086325
Sample Date		Client Info		06 Feb 2024	10 Oct 2023	19 Jun 2023
Machine Age	hrs	Client Info		30222	29750	29243
Oil Age	hrs	Client Info		30222	29750	29243
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				SEVERE	SEVERE	ABNORMAL
Iron	ppm	ASTM D5185m	>100	2	19	18
Chromium	ppm	ASTM D5185m	>20	0	0	<1
Nickel	ppm	ASTM D5185m	>2	0	0	0
Titanium	ppm	ASTM D5185m	>2	<1	0	0
Silver	ppm	ASTM D5185m	>2	0	0	0
Aluminum	ppm	ASTM D5185m	>25	<1	1	0
Lead	ppm	ASTM D5185m	>40	0	4	2
Copper	ppm	ASTM D5185m	>330	3	173	9
Tin	ppm	ASTM D5185m	>15	<1	<1	1
Vanadium	ppm	ASTM D5185m		<1	0	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Silicon	ppm	ASTM D5185m	>25	4	8	7
Potassium	ppm	ASTM D5185m	>20	1	3	<1
Fuel	%	ASTM D3524	>5	13.5	18.6	6.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844	>3	0.1	0.4	0.3
Nitration	Abs/cm	*ASTM D7624	>20	4.8	6.7	17.5
Sulfation	Abs/.1mm	*ASTM D7415	>30	16.3	17.4	23.8
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	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	>0.2	NEG	NEG	NEG
Sodium	ppm	ASTM D5185m		1	2	<1
Boron	ppm	ASTM D5185m		1	0	0
Barium	ppm	ASTM D5185m		0	0	0
Molybdenum	ppm	ASTM D5185m		51	51	56
Manganese	ppm	ASTM D5185m		0	0	<1
Magnesium	ppm	ASTM D5185m		838	796	868
Calcium	ppm	ASTM D5185m		896	861	998
Phosphorus	ppm	ASTM D5185m		894	850	940
Zinc	ppm	ASTM D5185m		1077	1029	1122
Sulfur	ppm	ASTM D5185m		2785	2476	2863
Oxidation	Abs/.1mm	*ASTM D7414	>25	11.5	12.7	16.4
Base Number (BN)	mg KOH/g	ASTM D2896		8.1	7.4	12.0
Visc @ 100°C	cSt	ASTM D445		10.3	10.0	12.4

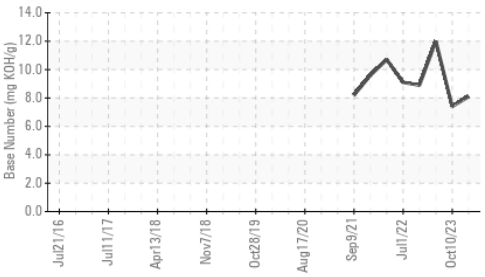
Fuel Dilution



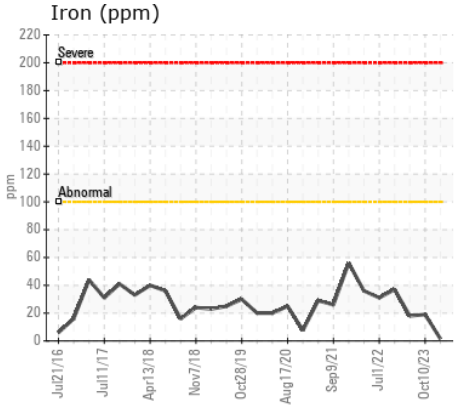
Viscosity @ 100°C



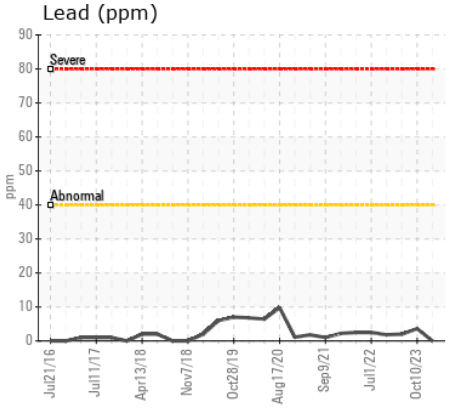
Base Number



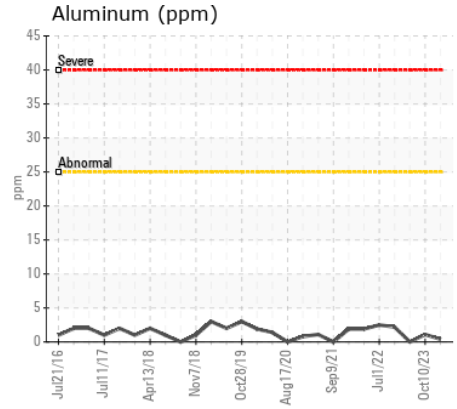
Iron (ppm)



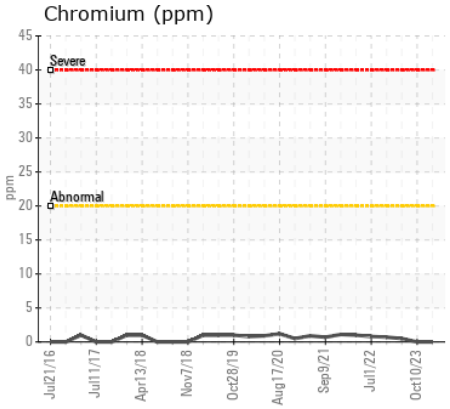
Lead (ppm)



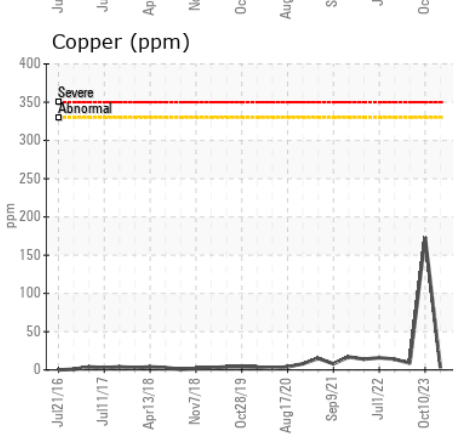
Aluminum (ppm)



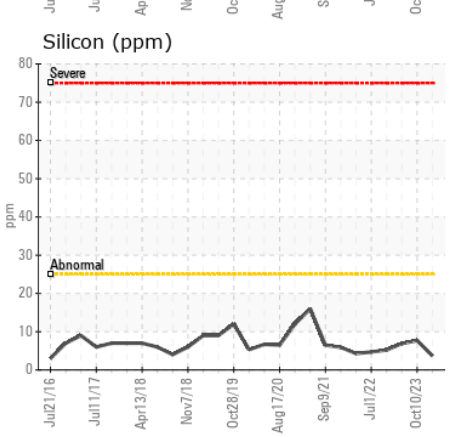
Chromium (ppm)



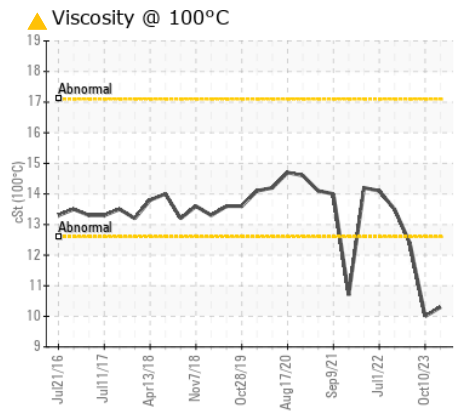
Copper (ppm)



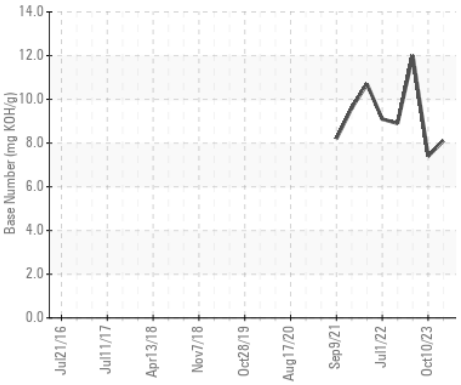
Silicon (ppm)



Viscosity @ 100°C



Base Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PCA0086530
Lab Number : 06084288
Unique Number : 10871733
Test Package : MOB 1 (Additional Tests: PercentFuel, TBN)

Received : 08 Feb 2024
Tested : 09 Feb 2024
Diagnosed : 12 Feb 2024 - Don Baldridge

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)

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