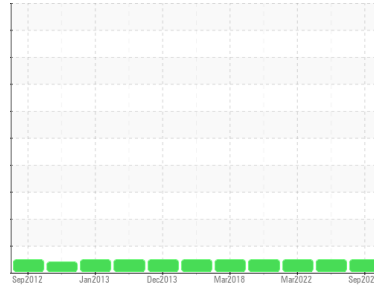


# OIL ANALYSIS REPORT

Sample Rating Trend

**NORMAL**


Area  
**KEMP QUARRIES / MUSKOGEE SAND [65023]**  
 Machine Id  
**TTH015**  
 Component  
**Hydraulic System**  
 Fluid  
**PETRO CANADA HYDREX AW 68 (--- GAL)**


**DIAGNOSIS**
**Recommendation**

Resample at the next service interval to monitor. ( Customer Sample Comment: PM-2 changed filters )

**Wear**

All component wear rates are normal.

**Contamination**

There is no indication of any contamination in the oil.

**Fluid Condition**

The condition of the oil is acceptable for the time in service.

**SAMPLE INFORMATION**

	method	limit/base	current	history1	history2
Sample Number	Client Info		<b>PCA0037707</b>	PCA0062259	PCA0034596
Sample Date	Client Info		<b>06 Sep 2023</b>	14 Oct 2022	15 Mar 2022
Machine Age	hrs	Client Info	<b>18526</b>	17730	17595
Oil Age	hrs	Client Info	<b>18526</b>	135	2000
Oil Changed		Client Info	<b>N/A</b>	Changed	Changed
Sample Status			<b>NORMAL</b>	NORMAL	NORMAL

**WEAR METALS**

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >20	<b>3</b>	2	5
Chromium	ppm	ASTM D5185m >10	<b>&lt;1</b>	<1	2
Nickel	ppm	ASTM D5185m >10	<b>&lt;1</b>	0	<1
Titanium	ppm	ASTM D5185m	<b>0</b>	0	<1
Silver	ppm	ASTM D5185m	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m >10	<b>&lt;1</b>	0	1
Lead	ppm	ASTM D5185m >10	<b>0</b>	0	0
Copper	ppm	ASTM D5185m >75	<b>2</b>	1	1
Tin	ppm	ASTM D5185m >10	<b>&lt;1</b>	0	<1
Vanadium	ppm	ASTM D5185m	<b>0</b>	0	0
Cadmium	ppm	ASTM D5185m	<b>0</b>	0	0

**ADDITIVES**

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m 0	<b>0</b>	13	42
Barium	ppm	ASTM D5185m 0	<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m 0	<b>4</b>	11	16
Manganese	ppm	ASTM D5185m 0	<b>0</b>	0	<1
Magnesium	ppm	ASTM D5185m 0	<b>83</b>	166	315
Calcium	ppm	ASTM D5185m 50	<b>170</b>	383	837
Phosphorus	ppm	ASTM D5185m 330	<b>439</b>	439	591
Zinc	ppm	ASTM D5185m 430	<b>553</b>	555	654
Sulfur	ppm	ASTM D5185m 760	<b>1355</b>	1364	1717

**CONTAMINANTS**

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >20	<b>2</b>	2	4
Sodium	ppm	ASTM D5185m	<b>2</b>	<1	3
Potassium	ppm	ASTM D5185m >20	<b>0</b>	0	0

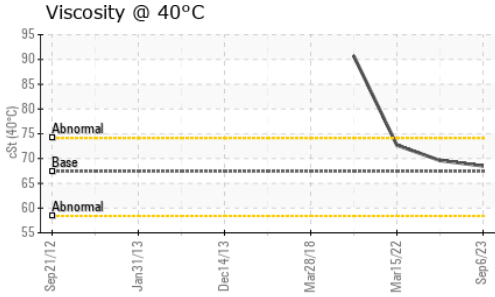
**VISUAL**

	method	limit/base	current	history1	history2
White Metal	scalar	*Visual NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual NONE	<b>NONE</b>	NONE	NONE
Precipitate	scalar	*Visual NONE	<b>NONE</b>	NONE	NONE
Silt	scalar	*Visual NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual NONE	<b>NONE</b>	VLITE	NONE
Sand/Dirt	scalar	*Visual NONE	<b>NONE</b>	NONE	NONE
Appearance	scalar	*Visual NORML	<b>NORML</b>	NORML	NORML
Odor	scalar	*Visual NORML	<b>NORML</b>	NORML	NORML
Emulsified Water	scalar	*Visual >0.1	<b>NEG</b>	NEG	NEG
Free Water	scalar	*Visual	<b>NEG</b>	NEG	NEG

**FLUID PROPERTIES**

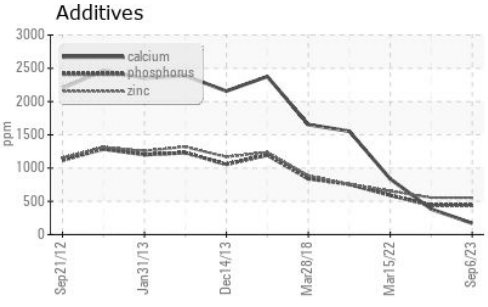
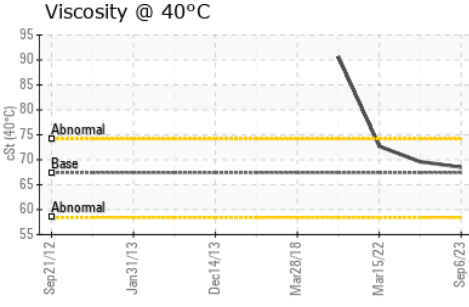
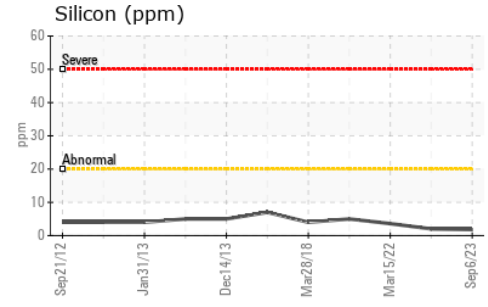
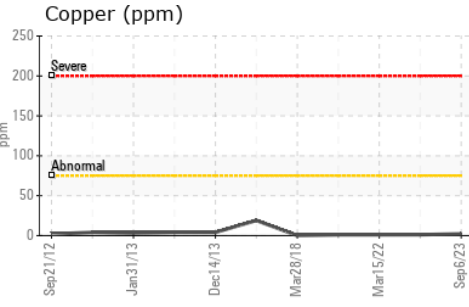
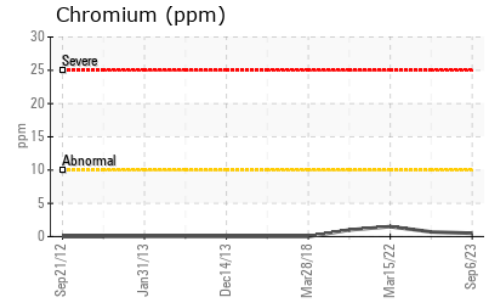
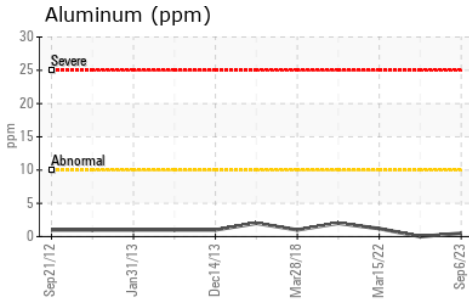
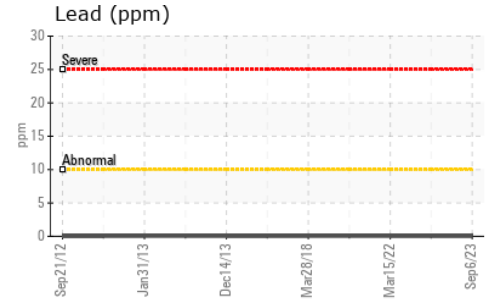
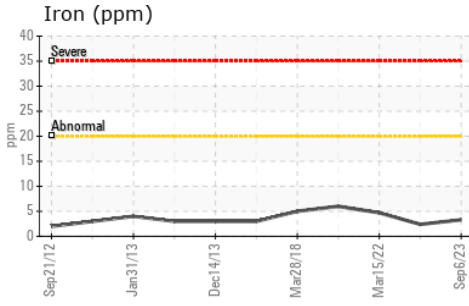
	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445 67.4	<b>68.5</b>	69.6	72.7

# OIL ANALYSIS REPORT



	SAMPLE IMAGES	method	limit/base	current	history1	history2
Color						
Bottom						

## GRAPHS



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PCA0037707  
**Lab Number** : 05952361  
**Unique Number** : 10648320  
**Test Package** : MOB 1

**Kemp Quarries - Muskogee Sand**  
 3395 W 50th St N  
 Porter, OK  
 US 74454

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)

muskegee@muskogeessand.com

T:  
F: