

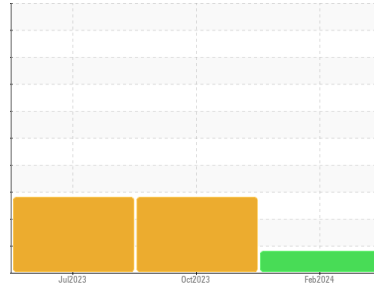
# OIL ANALYSIS REPORT

## Sample Rating Trend

ISO



Area  
**G.LOPES CONSTRUCTION INC./OFF-ROAD**  
 Machine Id  
**L-63**  
 Component  
**Hydraulic System**  
 Fluid  
**PETRO CANADA DURATRAN (--- GAL)**



## DIAGNOSIS

**Recommendation**  
 No corrective action is recommended at this time. Resample at the next service interval to monitor.

**Wear**  
 All component wear rates are normal.

**Contamination**  
 There is a moderate amount of silt (particulates < 14 microns in size) present in the oil.

**Fluid Condition**  
 Confirm oil type. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

## SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		<b>PCA0098334</b>	PCA0098626	PCA0098541
Sample Date	Client Info		<b>14 Feb 2024</b>	18 Oct 2023	03 Jul 2023
Machine Age	hrs	Client Info	<b>1924</b>	1513	343
Oil Age	hrs	Client Info	<b>1924</b>	1513	343
Oil Changed	Client Info		<b>N/A</b>	N/A	N/A
Sample Status			<b>ATTENTION</b>	ATTENTION	ATTENTION

## CONTAMINATION

	method	limit/base	current	history1	history2
Water	WC Method	>0.1	<b>NEG</b>	NEG	NEG

## WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >20	<b>4</b>	4	3
Chromium	ppm	ASTM D5185m >10	<b>1</b>	<1	<1
Nickel	ppm	ASTM D5185m >10	<b>&lt;1</b>	0	0
Titanium	ppm	ASTM D5185m	<b>0</b>	0	0
Silver	ppm	ASTM D5185m	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m >10	<b>2</b>	2	<1
Lead	ppm	ASTM D5185m >10	<b>&lt;1</b>	<1	0
Copper	ppm	ASTM D5185m >75	<b>3</b>	4	3
Tin	ppm	ASTM D5185m >10	<b>&lt;1</b>	<1	0
Vanadium	ppm	ASTM D5185m	<b>0</b>	0	<1
Cadmium	ppm	ASTM D5185m	<b>0</b>	0	0

## ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m 110	<b>0</b>	▲ 0	▲ 0
Barium	ppm	ASTM D5185m 0.0	<b>0</b>	0	1
Molybdenum	ppm	ASTM D5185m 0.0	<b>0</b>	0	<1
Manganese	ppm	ASTM D5185m 1	<b>&lt;1</b>	<1	0
Magnesium	ppm	ASTM D5185m 13	<b>7</b>	1	5
Calcium	ppm	ASTM D5185m 3610	<b>201</b>	▲ 214	▲ 217
Phosphorus	ppm	ASTM D5185m 1192	<b>701</b>	▲ 744	▲ 703
Zinc	ppm	ASTM D5185m 1455	<b>894</b>	930	▲ 910
Sulfur	ppm	ASTM D5185m 2641	<b>1677</b>	▲ 1787	2058

## CONTAMINANTS

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

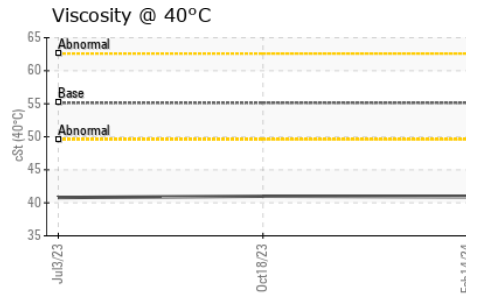
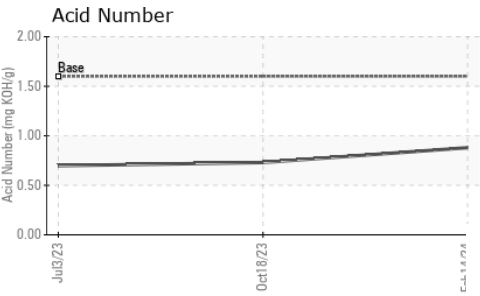
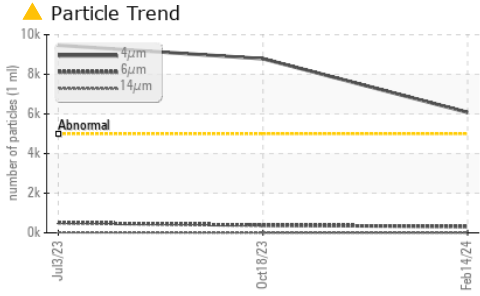
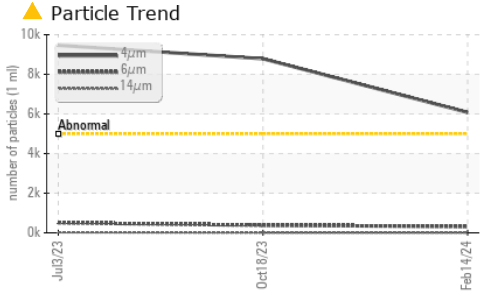
## FLUID CLEANLINESS

	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>5000	▲ <b>6078</b>	▲ 8787	▲ 9466
Particles >6µm	ASTM D7647	>1300	<b>320</b>	380	506
Particles >14µm	ASTM D7647	>160	<b>12</b>	12	27
Particles >21µm	ASTM D7647	>40	<b>3</b>	3	9
Particles >38µm	ASTM D7647	>10	<b>0</b>	0	1
Particles >71µm	ASTM D7647	>3	<b>0</b>	0	0
Oil Cleanliness	ISO 4406 (c)	>19/17/14	▲ <b>20/15/11</b>	▲ 20/16/11	▲ 20/16/12

## FLUID DEGRADATION

	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045 1.6	<b>0.88</b>	0.73	0.698

# OIL ANALYSIS REPORT



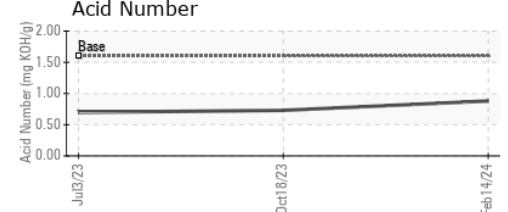
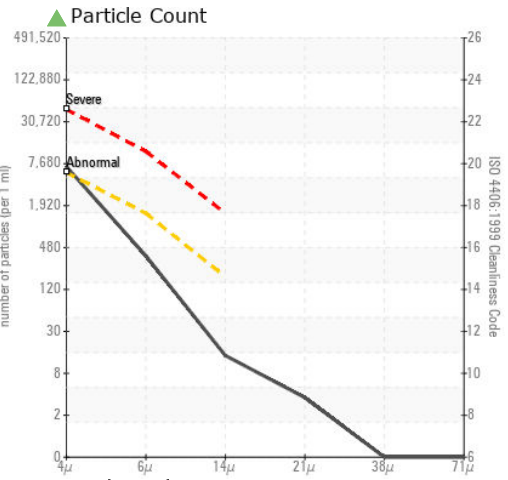
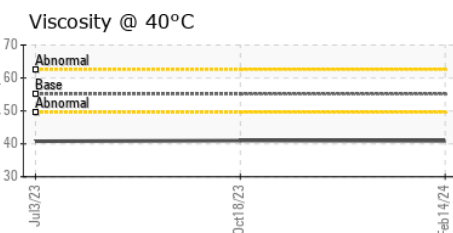
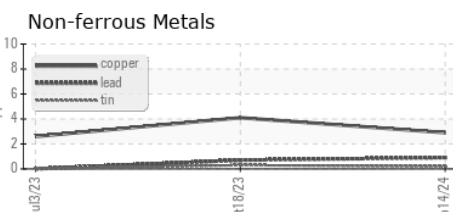
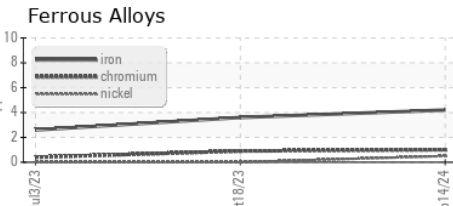
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance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

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	55.14	<b>40.9</b>	▲ 41.0 ▲ 40.8

SAMPLE IMAGES	method	limit/base	current	history1	history2
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## GRAPHS



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PCA0098334  
**Lab Number** : 06092994  
**Unique Number** : 10885847  
**Test Package** : MOB 2

**Received** : 19 Feb 2024  
**Tested** : 20 Feb 2024  
**Diagnosed** : 21 Feb 2024 - Don Baldrige

**G LOPES CONSTRUCTION**  
 565 WINTHROP ST  
 TAUNTON, MA  
 US 02780  
 Contact: BUTCH MCGRATH  
 bmcgrath@glopes.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)