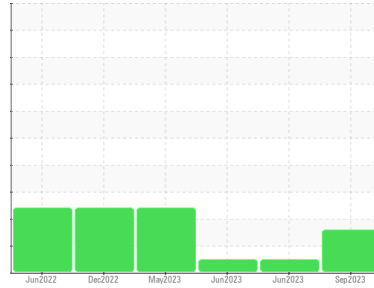


OIL ANALYSIS REPORT



Area
G.LOPES CONSTRUCTION INC./OFF-ROAD
Machine Id
L-96
Component
Hydraulic System
Fluid
PETRO CANADA DURATRAN (--- GAL)

Sample Rating Trend



ISO



DIAGNOSIS

Recommendation

We recommend you service the filters on this component. Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

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

Fluid Condition

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	PCA0104656	PCA0098312	PCA0098364
Sample Date	Client Info	05 Sep 2023	28 Jun 2023	14 Jun 2023
Machine Age	hrs	5682	5682	5571
Oil Age	hrs	5682	5682	5571
Oil Changed	Client Info	N/A	N/A	N/A
Sample Status		ABNORMAL	NORMAL	NORMAL

WEAR METALS

method	limit/base	current	history1	history2
Iron ppm	ASTM D5185m >20	5	4	5
Chromium ppm	ASTM D5185m >10	0	0	<1
Nickel ppm	ASTM D5185m >10	0	0	0
Titanium ppm	ASTM D5185m	0	<1	<1
Silver ppm	ASTM D5185m	0	0	0
Aluminum ppm	ASTM D5185m >10	2	<1	2
Lead ppm	ASTM D5185m >10	0	0	<1
Copper ppm	ASTM D5185m >75	4	4	5
Tin ppm	ASTM D5185m >10	0	0	0
Vanadium ppm	ASTM D5185m	0	0	0
Cadmium ppm	ASTM D5185m	0	0	0

ADDITIVES

method	limit/base	current	history1	history2
Boron ppm	ASTM D5185m 110	13	11	13
Barium ppm	ASTM D5185m 0.0	7	14	2
Molybdenum ppm	ASTM D5185m 0.0	2	2	3
Manganese ppm	ASTM D5185m 1	0	0	0
Magnesium ppm	ASTM D5185m 13	36	41	30
Calcium ppm	ASTM D5185m 3610	1416	1363	1451
Phosphorus ppm	ASTM D5185m 1192	769	752	820
Zinc ppm	ASTM D5185m 1455	972	957	1031
Sulfur ppm	ASTM D5185m 2641	2663	2603	2819

CONTAMINANTS

method	limit/base	current	history1	history2
Silicon ppm	ASTM D5185m >20	6	5	6
Sodium ppm	ASTM D5185m	<1	<1	0
Potassium ppm	ASTM D5185m >20	<1	<1	3

FLUID CLEANLINESS

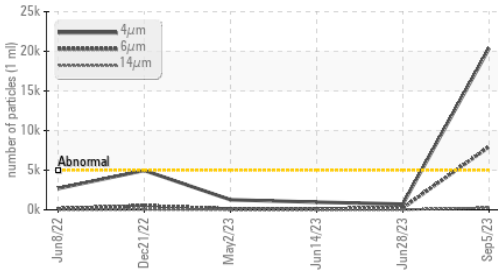
method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647 >5000	▲ 20382	725	966
Particles >6µm	ASTM D7647 >1300	▲ 7944	223	103
Particles >14µm	ASTM D7647 >160	▲ 259	16	16
Particles >21µm	ASTM D7647 >40	30	5	4
Particles >38µm	ASTM D7647 >10	0	0	0
Particles >71µm	ASTM D7647 >3	0	0	0
Oil Cleanliness	ISO 4406 (c) >19/17/14	▲ 22/20/15	17/15/11	17/14/11

FLUID DEGRADATION

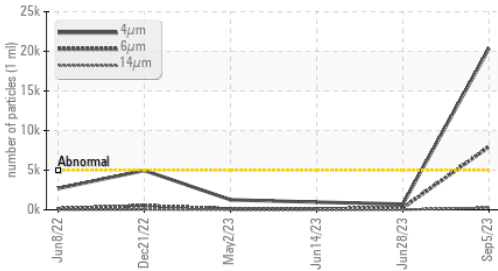
method	limit/base	current	history1	history2
Acid Number (AN) mg KOH/g	ASTM D8045 1.6	1.401	0.93	0.97

OIL ANALYSIS REPORT

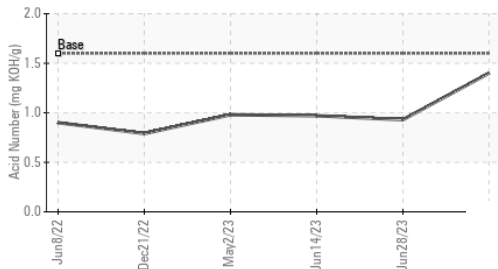
▲ Particle Trend



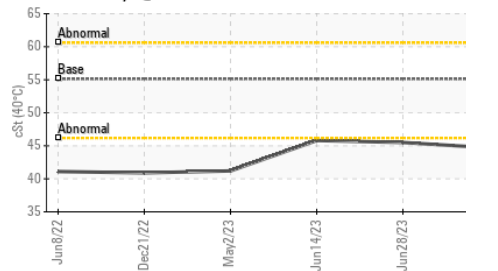
▲ Particle Trend



Acid Number



Viscosity @ 40°C



VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	LIGHT
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	44.7	45.5

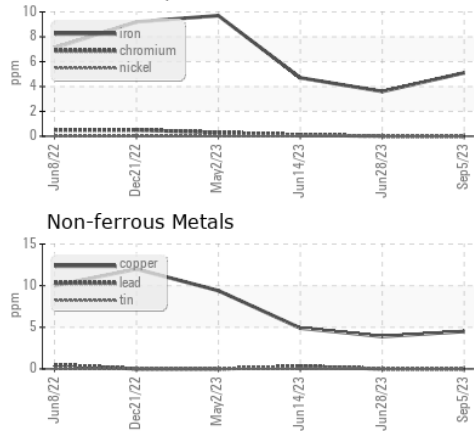
SAMPLE IMAGES

Color

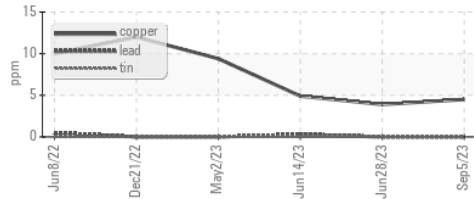
Bottom

GRAPHS

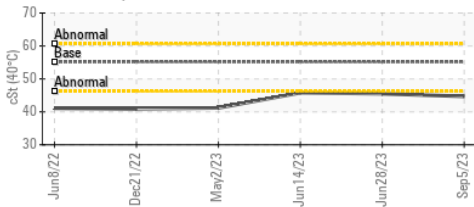
Ferrous Alloys



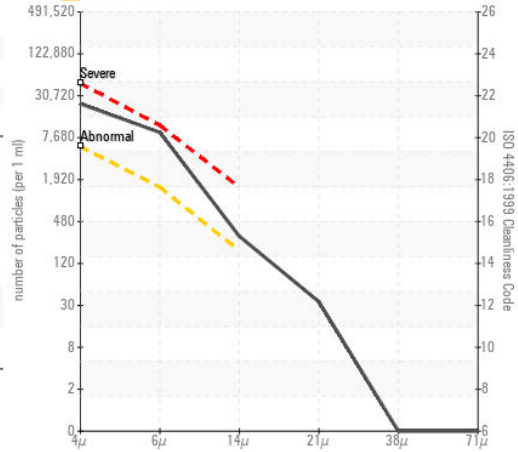
Non-ferrous Metals



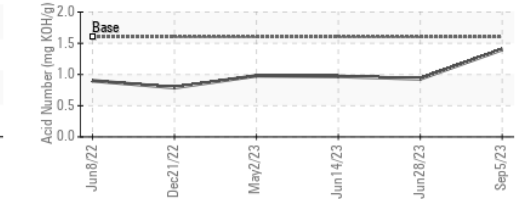
Viscosity @ 40°C



▲ Particle Count



Acid Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PCA0104656 **Received** : 07 Sep 2023
Lab Number : **05944534** **Diagnosed** : 09 Sep 2023
Unique Number : 10635146 **Diagnostician** : Don Baldrige
Test Package : MOB 2

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)

T:
F: