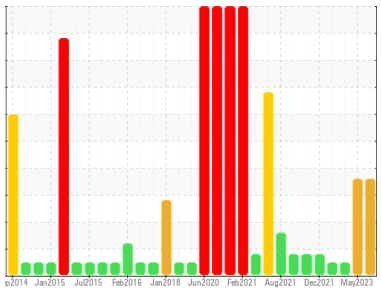
PROBLEM SUMMARY

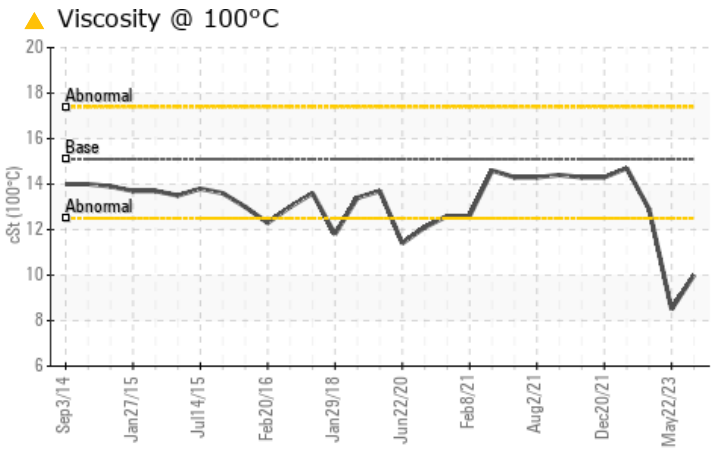
Sample Rating Trend

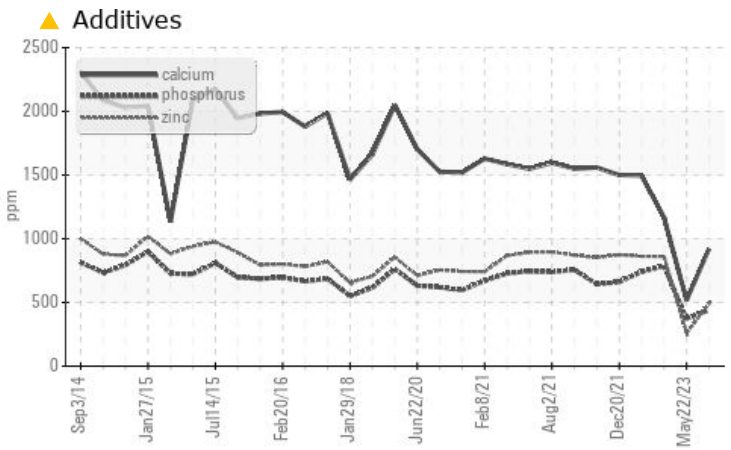


DEGRADATION

Area
(YA134210)
Machine Id
10351C
Component
Natural Gas Engine
Fluid
PETRO CANADA DURON GEO LD 15W40 (29 GAL)

COMPONENT CONDITION SUMMARY





RECOMMENDATION

We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition.

PROBLEMATIC TEST RESULTS

Sample Status				**ABNORMAL**	ABNORMAL	NORMAL
Molybdenum	ppm	ASTM D5185m	50	▲ **29**	▲ 14	51
Magnesium	ppm	ASTM D5185m	560	▲ **290**	▲ 151	532
Calcium	ppm	ASTM D5185m	1510	▲ **920**	▲ 518	1164
Phosphorus	ppm	ASTM D5185m	780	▲ **441**	▲ 374	785
Zinc	ppm	ASTM D5185m	870	▲ **490**	▲ 260	859
Base Number (BN)	mg KOH/g	ASTM D2896	10.2	▲ **1.2**	▲ 0.2	9.2
Visc @ 100°C	cSt	ASTM D445	15.1	▲ **10.0**	▲ 8.5	12.9

Customer Id: GFL017
Sample No.: GFL0098103
Lab Number: 05997292
Test Package: FLEET

To manage this report scan the QR code

To discuss the diagnosis or test data:
Don Baldridge +1
don.b505@comcast.net

To change component or sample information:
Customer Service +1 1-800-237-1369
customerservice@wearcheck.com

RECOMMENDED ACTIONS

Action	Status	Date	Done By	Description
Change Fluid	---	---	?	We recommend that you drain the oil from the component if this has not already been done.
Resample	---	---	?	We recommend an early resample to monitor this condition.

HISTORICAL DIAGNOSIS

22 May 2023 Diag: Jonathan Hester

DEGRADATION

We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition.All component wear rates are normal. There is no indication of any contamination in the oil. The oil viscosity is lower than normal. Additive levels indicate the addition of a different brand, or type of oil. The BN level is low. Confirm oil type.

view report

13 Dec 2022 Diag: Jonathan Hester

NORMAL

Resample at the next service interval to monitor.All component wear rates are normal. There is no indication of any contamination in the oil. The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

view report

18 Feb 2022 Diag: Wes Davis

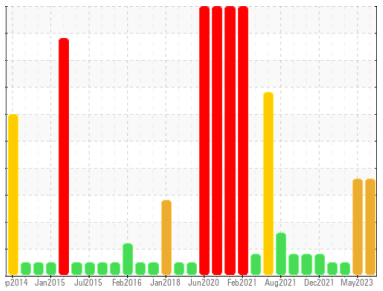
NORMAL

Resample at the next service interval to monitor.All component wear rates are normal. There is no indication of any contamination in the oil. The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

view report

OIL ANALYSIS REPORT

Sample Rating Trend



DEGRADATION

Area
(YA134210)
Machine Id
10351C
Component
Natural Gas Engine
Fluid
PETRO CANADA DURON GEO LD 15W40 (29 GAL)

DIAGNOSIS

Recommendation

We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition.

Wear

All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil.

Fluid Condition

The oil viscosity is lower than normal. Additive levels indicate the addition of a different brand, or type of oil. The BN level is low. Confirm oil type.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number		Client Info		**GFL0098103**	GFL0083329	GFL0054725
Sample Date		Client Info		**01 Nov 2023**	22 May 2023	13 Dec 2022
Machine Age	hrs	Client Info		**9199**	9199	9199
Oil Age	hrs	Client Info		**300**	598	218
Oil Changed		Client Info		**N/A**	N/A	Changed
Sample Status				**ABNORMAL**	ABNORMAL	NORMAL

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>50	**17**	24	10
Chromium	ppm	ASTM D5185m	>4	**1**	<1	<1
Nickel	ppm	ASTM D5185m	>2	**<1**	<1	0
Titanium	ppm	ASTM D5185m		**0**	0	<1
Silver	ppm	ASTM D5185m	>3	**0**	0	0
Aluminum	ppm	ASTM D5185m	>9	**<1**	0	2
Lead	ppm	ASTM D5185m	>30	**4**	<1	2
Copper	ppm	ASTM D5185m	>35	**5**	2	1
Tin	ppm	ASTM D5185m	>4	**<1**	<1	<1
Antimony	ppm	ASTM D5185m		**---**	---	---
Vanadium	ppm	ASTM D5185m		**0**	0	0
Cadmium	ppm	ASTM D5185m		**<1**	0	0

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	50	**9**	31	158
Barium	ppm	ASTM D5185m	5	**0**	0	0
Molybdenum	ppm	ASTM D5185m	50	▲ **29**	▲ 14	51
Manganese	ppm	ASTM D5185m	0	**<1**	<1	2
Magnesium	ppm	ASTM D5185m	560	▲ **290**	▲ 151	532
Calcium	ppm	ASTM D5185m	1510	▲ **920**	▲ 518	1164
Phosphorus	ppm	ASTM D5185m	780	▲ **441**	▲ 374	785
Zinc	ppm	ASTM D5185m	870	▲ **490**	▲ 260	859
Sulfur	ppm	ASTM D5185m	2040	**2242**	1872	2878

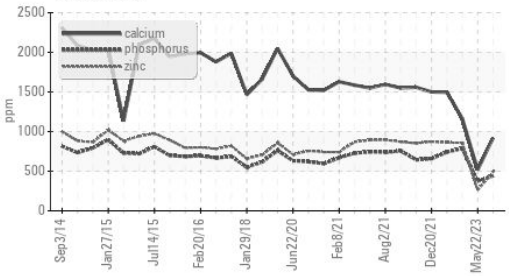
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>+100	**5**	7	12
Sodium	ppm	ASTM D5185m		**2**	4	10
Potassium	ppm	ASTM D5185m	>20	**5**	3	<1

INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844		**0**	0	0.1
Nitration	Abs/cm	*ASTM D7624	>20	**9.0**	6.8	5.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	**27.4**	27.0	22.0

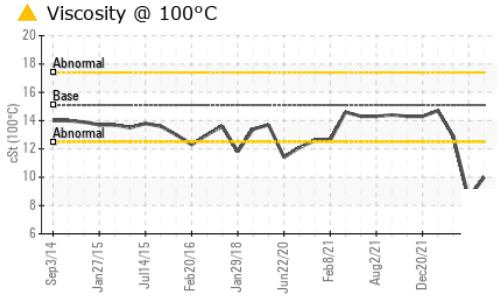
FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	**32.0**	33.5	18.1
Base Number (BN)	mg KOH/g	ASTM D2896	10.2	▲ **1.2**	▲ 0.2	9.2

OIL ANALYSIS REPORT

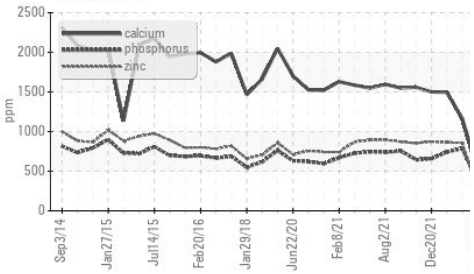
Additives



Viscosity @ 100°C



Additives

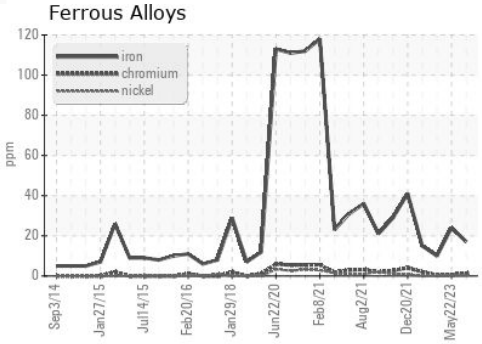


VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Precipitate	scalar	*Visual	NONE	**NONE**	NONE	NONE
Silt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Debris	scalar	*Visual	NONE	**NONE**	NONE	NONE
Sand/Dirt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

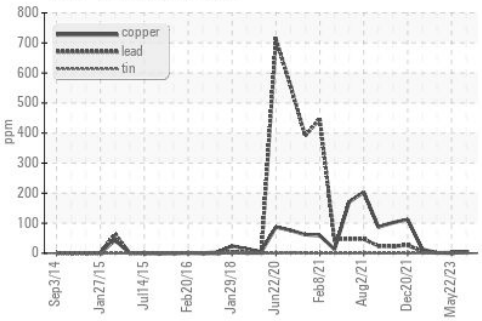
FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	15.1	▲ **10.0**	▲ 8.5	12.9

GRAPHS

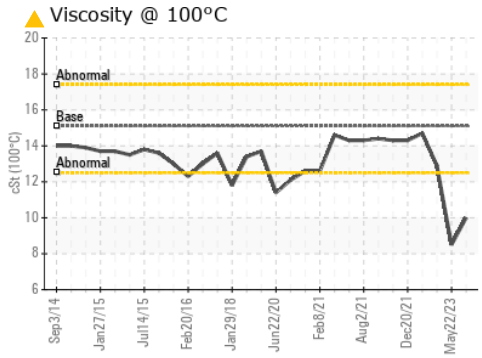
Ferrous Alloys



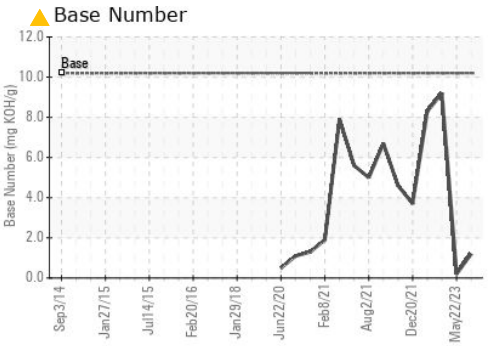
Non-ferrous Metals



Viscosity @ 100°C



Base Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : GFL0098103
Lab Number : 05997292
Unique Number : 10725652
Test Package : FLEET

Received : 02 Nov 2023
Diagnosed : 05 Nov 2023
Diagnostician : 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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