



WEAR	<b>NORMAL</b>
CONTAMINATION	<b>NORMAL</b>
FLUID CONDITION	<b>NORMAL</b>

Machine Id  
**929144**  
 Component  
**Diesel Engine**  
 Fluid  
**PETRO CANADA DURON SHP 15W40 (--- GAL)**

**RECOMMENDATION**

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>GFL0107956</b>	GFL0107955	GFL0107971
Sample Date		Client Info		<b>26 Feb 2024</b>	15 Feb 2024	30 Jan 2024
Machine Age	hrs	Client Info		<b>3568</b>	3503	3386
Oil Age	hrs	Client Info		<b>600</b>	0	0
Filter Age	hrs	Client Info		<b>600</b>	0	0
Oil Changed		Client Info		<b>Changed</b>	Not Changd	Not Changd
Filter Changed		Client Info		<b>Changed</b>	Not Changd	Not Changd
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

**WEAR**

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>110	<b>42</b>	36	23
Chromium	ppm	ASTM D5185m	>4	<b>3</b>	2	2
Nickel	ppm	ASTM D5185m	>2	<b>1</b>	1	1
Titanium	ppm	ASTM D5185m		<b>0</b>	<1	<1
Silver	ppm	ASTM D5185m	>2	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m	>25	<b>7</b>	6	4
Lead	ppm	ASTM D5185m	>45	<b>0</b>	0	<1
Copper	ppm	ASTM D5185m	>85	<b>3</b>	2	2
Tin	ppm	ASTM D5185m	>4	<b>&lt;1</b>	0	<1
Vanadium	ppm	ASTM D5185m		<b>0</b>	<1	0
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE

**CONTAMINATION**

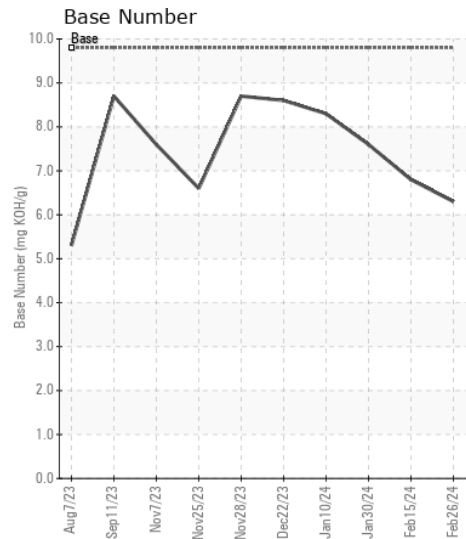
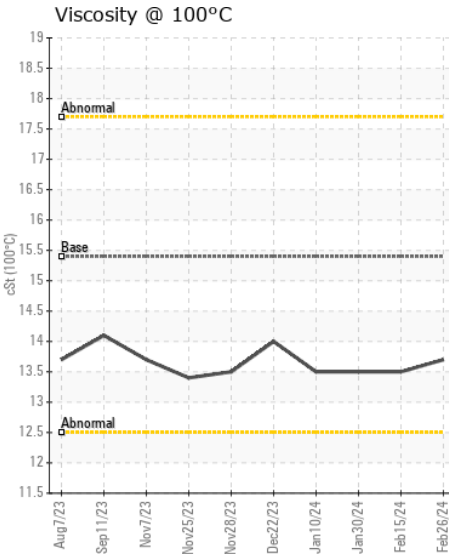
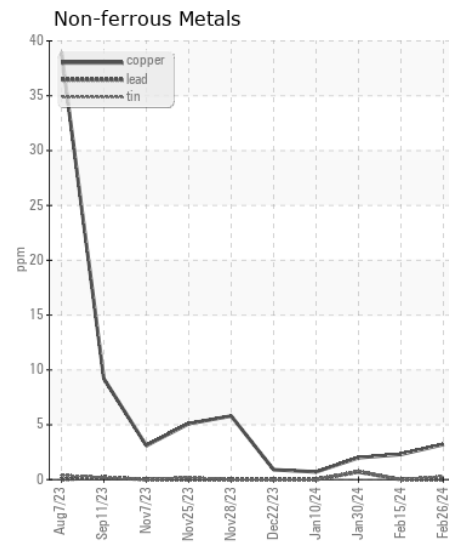
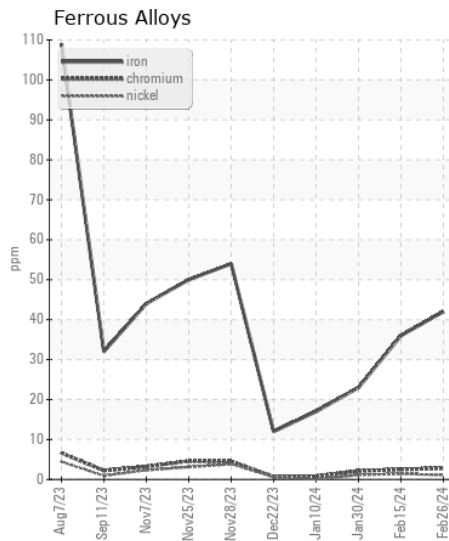
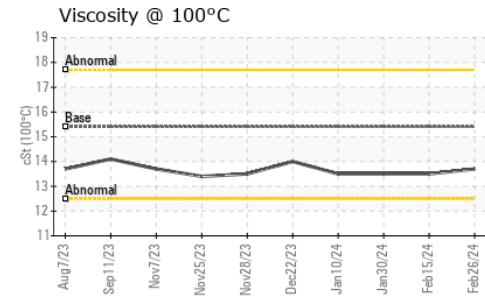
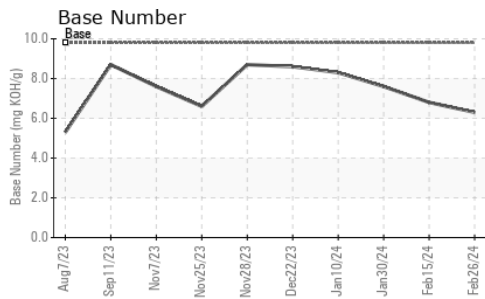
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>30	<b>7</b>	7	5
Potassium	ppm	ASTM D5185m	>20	<b>4</b>	3	2
Fuel		WC Method	>5	<b>&lt;1.0</b>	<1.0	<1.0
Water		WC Method	>0.2	<b>NEG</b>	NEG	NEG
Glycol		WC Method		<b>NEG</b>	NEG	NEG
Soot %	%	*ASTM D7844	>3	<b>0.8</b>	0.7	0.6
Nitration	Abs/cm	*ASTM D7624	>20	<b>10.9</b>	10.3	9.1
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>22.6</b>	21.6	20.6
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	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	>0.2	<b>NEG</b>	NEG	NEG

**FLUID CONDITION**

The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m		<b>7</b>	5	5
Boron	ppm	ASTM D5185m	0	<b>3</b>	<1	0
Barium	ppm	ASTM D5185m	0	<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m	60	<b>71</b>	60	63
Manganese	ppm	ASTM D5185m	0	<b>&lt;1</b>	<1	<1
Magnesium	ppm	ASTM D5185m	1010	<b>1070</b>	1069	930
Calcium	ppm	ASTM D5185m	1070	<b>1219</b>	1166	1031
Phosphorus	ppm	ASTM D5185m	1150	<b>1153</b>	1054	1045
Zinc	ppm	ASTM D5185m	1270	<b>1420</b>	1342	1177
Sulfur	ppm	ASTM D5185m	2060	<b>3229</b>	2979	2828
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>19.4</b>	18.4	17.0
Base Number (BN)	mg KOH/g	ASTM D2896	9.8	<b>6.3</b>	6.8	7.6
Visc @ 100°C	cSt	ASTM D445	15.4	<b>13.7</b>	13.5	13.5



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : GFL0107956  
**Lab Number** : 06103496  
**Unique Number** : 10901726  
**Test Package** : FLEET  
**Received** : 28 Feb 2024  
**Tested** : 01 Mar 2024  
**Diagnosed** : 01 Mar 2024 - Wes Davis

**GFL Environmental - 892 - Pauls Valley Hauling**  
 405 East Airport Industrial Road  
 Pauls Valley, OK  
 US 73075  
 Contact: Tony Graham  
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 T:  
 F:

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)