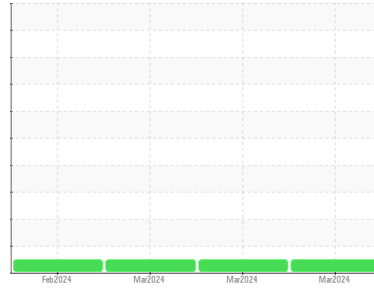




# OIL ANALYSIS REPORT

Sample Rating Trend



**NORMAL**



Machine Id

**833001C**

Component

**Diesel Engine**

Fluid

**PETRO CANADA DURON SHP 15W40 (29 QTS)**

## DIAGNOSIS

### Recommendation

Resample at the next service interval to monitor.

### Wear

All component wear rates are normal.

### Contamination

There is no indication of any contamination in the oil.

### 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.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			<b>GFL0101758</b>	GFL0101759	GFL0101745
Sample Date	Client Info			<b>29 Mar 2024</b>	26 Mar 2024	22 Mar 2024
Machine Age	hrs	Client Info		<b>2310</b>	2274	2239
Oil Age	hrs	Client Info		<b>600</b>	600	600
Oil Changed	Client Info			<b>Changed</b>	Changed	Changed
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

CONTAMINATION		method	limit/base	current	history1	history2
Fuel	WC Method	>3.0		<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

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>90	<b>2</b>	13	10
Chromium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	1	<1
Nickel	ppm	ASTM D5185m	>2	<b>0</b>	1	<1
Titanium	ppm	ASTM D5185m	>2	<b>0</b>	<1	<1
Silver	ppm	ASTM D5185m	>2	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m	>20	<b>&lt;1</b>	2	1
Lead	ppm	ASTM D5185m	>40	<b>0</b>	2	<1
Copper	ppm	ASTM D5185m	>330	<b>0</b>	3	<1
Tin	ppm	ASTM D5185m	>15	<b>0</b>	1	<1
Vanadium	ppm	ASTM D5185m		<b>0</b>	<1	<1
Cadmium	ppm	ASTM D5185m		<b>0</b>	<1	<1

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	0	<b>49</b>	22	49
Barium	ppm	ASTM D5185m	0	<b>0</b>	<1	<1
Molybdenum	ppm	ASTM D5185m	60	<b>48</b>	54	47
Manganese	ppm	ASTM D5185m	0	<b>&lt;1</b>	2	<1
Magnesium	ppm	ASTM D5185m	1010	<b>559</b>	573	532
Calcium	ppm	ASTM D5185m	1070	<b>1525</b>	1596	1482
Phosphorus	ppm	ASTM D5185m	1150	<b>777</b>	832	836
Zinc	ppm	ASTM D5185m	1270	<b>896</b>	959	905
Sulfur	ppm	ASTM D5185m	2060	<b>2749</b>	2498	2571

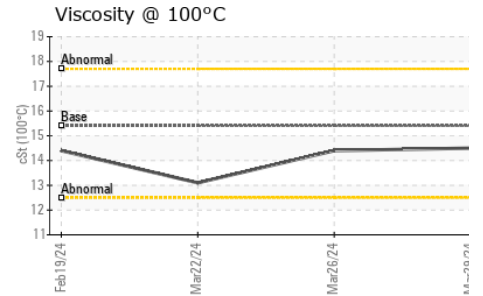
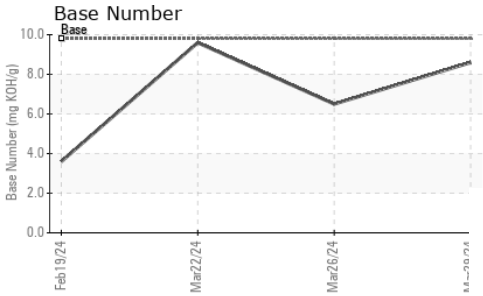
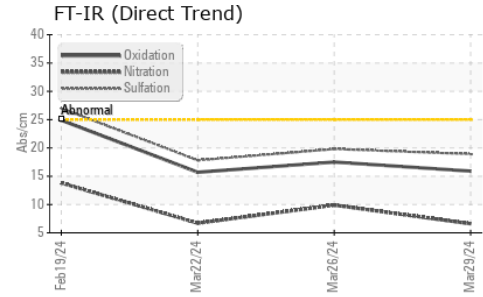
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>25	<b>4</b>	7	9
Sodium	ppm	ASTM D5185m		<b>3</b>	4	3
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	8	2

INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844	>6	<b>0</b>	0	0.1
Nitration	Abs/cm	*ASTM D7624	>20	<b>6.6</b>	9.9	6.7
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>18.9</b>	19.8	17.8

FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>15.9</b>	17.5	15.7
Base Number (BN)	mg KOH/g	ASTM D2896	9.8	<b>8.6</b>	6.5	9.6



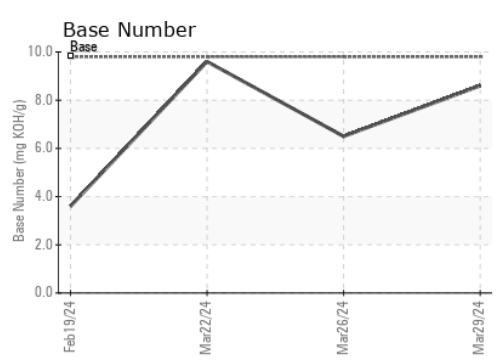
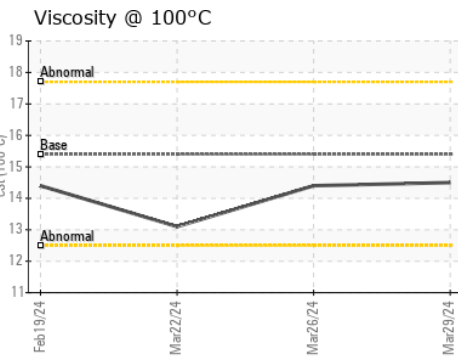
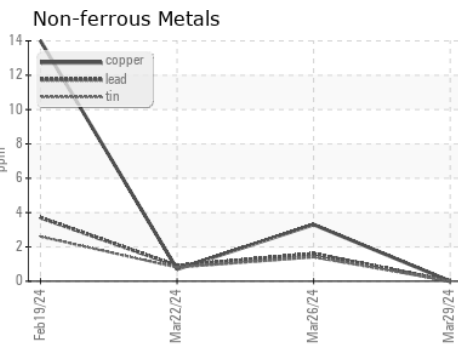
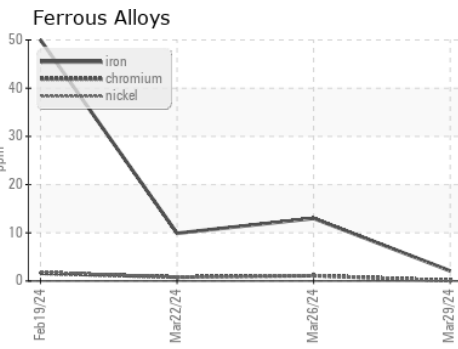
# OIL ANALYSIS REPORT



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	>0.2	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	15.4	14.5	14.4

## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : GFL0101758  
**Lab Number** : 06136030  
**Unique Number** : 10955495  
**Test Package** : FLEET

**GFL Environmental - 030 - Conway Myrtle Beach**  
 3010 HWY 378  
 Conway, SC  
 US 29527  
 Contact: ARCILIO RUEZ  
 aruiz@gflenv.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)