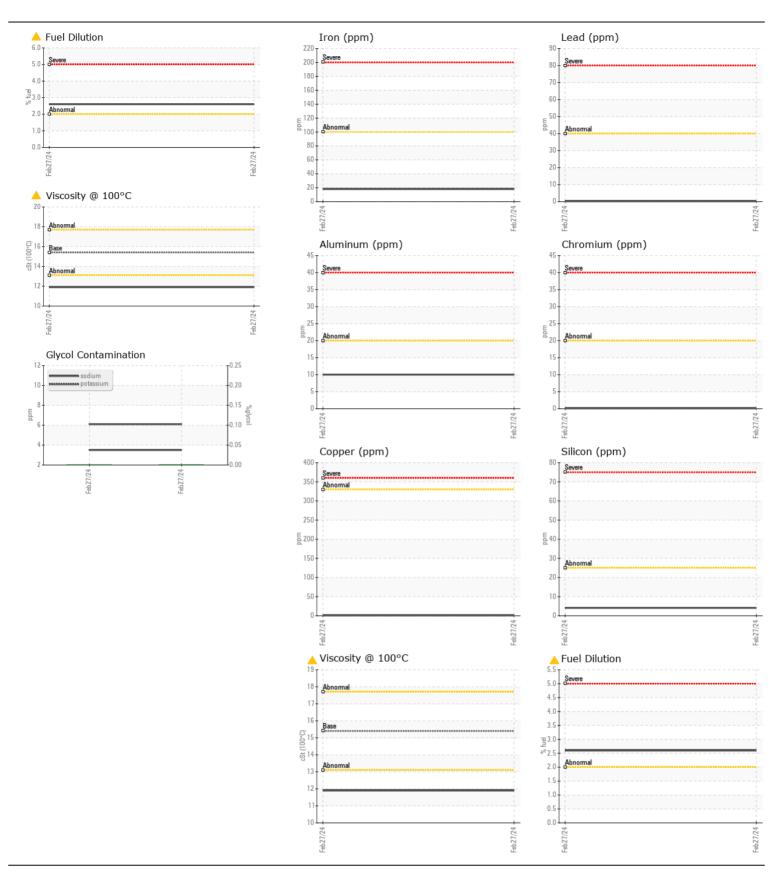
WEAR CONTAMINATION **FLUID CONDITION**

NORMAL ABNORMAL ABNORMAL

Machine Id 351054

Component Diesel Engine

Diesel Engine PETRO CANADA DURON SHP 15W40 (GAL))						
RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
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.	Sample Number		Client Info		GFL0107920		
	Sample Date		Client Info		27 Feb 2024		
	Machine Age	hrs	Client Info		15351		
	Oil Age	hrs	Client Info		0		
	Filter Age	hrs	Client Info		0		
	Oil Changed		Client Info		Not Changd		
	Filter Changed		Client Info		N/A		
	Sample Status				ABNORMAL		
WEAR	Iron	ppm	ASTM D5185(m)	>100	18		
All component wear rates are normal.	Chromium	ppm	ASTM D5185(m)		<1		
	Nickel	ppm	ASTM D5185(m)		<1		
	Titanium	ppm	ASTM D5185(m)		0		
	Silver	ppm	ASTM D5185(m)	>3	0		
	Aluminum	ppm	ASTM D5185(m)	>20	10		
	Lead	ppm	ASTM D5185(m)	>40	<1		
	Copper	ppm	ASTM D5185(m)	>330	1		
	Tin	ppm	ASTM D5185(m)	>15	0		
	Vanadium	ppm	ASTM D5185(m)		0		
CONTAMINATION	Ciliana		ACTM DE10E()	05	4		
There is a moderate amount of fuel present in the oil. Tests confirm the presence of fuel in the oil.	Silicon	ppm	ASTM D5185(m)	>25	4		
	Potassium Fuel	ppm	ASTM D5185(m) ASTM D7593*	>20	6		
	Water	%	WC Method	>2.0	▲ 2.6 NEG		
	Glycol	%	ASTM D7922*	>0.2	0.0		
	Soot %	%	ASTM D7922	~3	0.0		
	Nitration	Abs/cm	ASTM D7644*	>20	9.2		
	Sulfation	Abs/.1mm	ASTM D7415*	>30	22.0		
	Emulsified Water		Visual*	>0.2	NEG		
FLUID CONDITION	Sodium	ppm	ASTM D5185(m)		4		
Fuel is present in the oil and is lowering the viscosity. The oil is no longer serviceable due to the presence of contaminants.	Boron	ppm	ASTM D5185(m)		122		
	Barium	ppm	ASTM D5185(m)		0		
	Molybdenum	ppm	ASTM D5185(m)		7		
	Manganese	ppm	ASTM D5185(m)		0		
	Magnesium	ppm	, ,	1010	219		
	Calcium	ppm	. ,	1070	2051		
	Phosphorus	ppm	ASTM D5185(m)		997		
	Zinc	ppm	ASTM D5185(m)	1270	1128		
	Sulfur	ppm	ASTM D5185(m)	2060	3107		
	Oxidation	Abs/.1mm	ASTM D7414*		19.4		
	Visc @ 100°C	cSt	ASTM D7279(m)	15.4	11.9		





CALA ISO 17025:2017 Accredited

Laboratory

Laboratory Sample No.

Lab Number : 02618868 Unique Number : 5735978

: WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9 : GFL0107920

Received : 29 Feb 2024 **Tested** Diagnosed

: 01 Mar 2024 : 01 Mar 2024 - Kevin Marson

2B Industrial Drive,, Great Plains Industrial Park, Emerald Park, SK CA S4L 1B6

GFL Environmental - 350 - Emeral Park Regina

Contact: Vaughn Hortness vhortness@gflenv.com T: (877)244-9500 F: (306)244-9501

To discuss this sample report, contact Customer Service at 1-800-268-2131. Test denoted (*) outside scope of accreditation, (m) method modified, (e) tested at external lab. Validity of results and interpretation are based on the sample and information as supplied.

Test Package: MOB 1 (Additional Tests: FuelDilution, Glycol, PercentFuel)