WEAR CONTAMINATION FLUID CONDITION

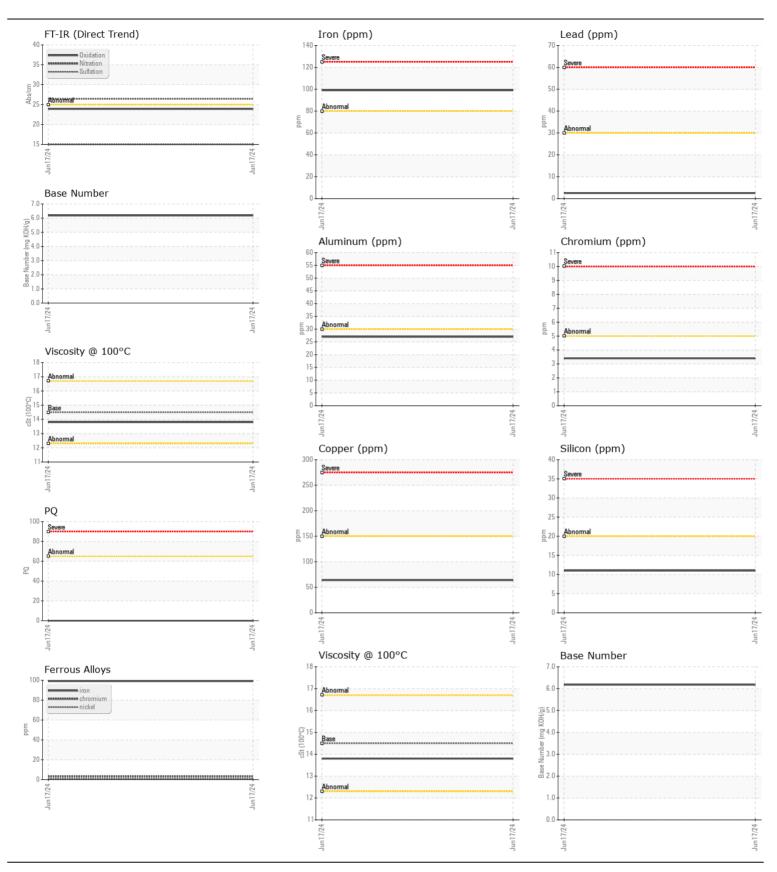
NORMAL NORMAL

City of Mount Pearl FREIGHTLINER 21-19D

Diesel Engine

SAE 15W40 (--- GAL)

SAE 13W40 (GAL)							
RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
Please note that all wear metal and contaminant levels are being considered accumulative. Resample at the next service interval to monitor.	Sample Number		Client Info		OF0000728		
	Sample Date		Client Info		17 Jun 2024		
	Machine Age	hrs	Client Info		3217		
	Oil Age	hrs	Client Info		1500		
	Filter Age	hrs	Client Info		1500		
	Oil Changed		Client Info		Changed		
	Filter Changed		Client Info		Changed		
	Sample Status				NORMAL		
WEAR	PQ		ASTM D8184*	>65	0		
All component wear rates are normal.	Iron	ppm	ASTM D5185(m)	>80	99		
	Chromium	ppm	ASTM D5185(m)	>5	3		
	Nickel	ppm	ASTM D5185(m)	>2	1		
	Titanium	ppm	ASTM D5185(m)		<1		
	Silver	ppm	ASTM D5185(m)	>3	<1		
	Aluminum	ppm	ASTM D5185(m)	>30	27		
	Lead	ppm	ASTM D5185(m)	>30	2		
	Copper	ppm	ASTM D5185(m)	>150	64		
	Tin	ppm	ASTM D5185(m)	>5	<1		
	Vanadium	ppm	ASTM D5185(m)		0		
CONTANUNATION							
CONTAMINATION	Silicon	ppm	ASTM D5185(m)		11		
There is no indication of any contamination in the oil.	Potassium	ppm	ASTM D5185(m)		2		
	Fuel		WC Method		<1.0		
	Water		WC Method	>0.2	NEG		
	Glycol		WC Method		NEG		
	Soot %	%	ASTM D7844*	>3	1.1		
	Nitration	Abs/cm	ASTM D7624*	>20	15.0		
	Sulfation	Abs/.1mm	ASTM D7415*	>30	26.4		
	Emulsified Water	scalar	Visual*	>0.2	NEG		
FLUID CONDITION	Sodium	ppm	ASTM D5185(m)	>57	13		
TESIS CONSTITOR	Boron		ASTM D5185(m)	701	<1		
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.	Barium	ppm	ASTM D5185(m)		<1		
	Molybdenum	ppm	ASTM D5185(m)		61		
	Manganese	ppm	ASTM D5185(m)		2		
	Magnesium		ASTM D5185(m)		969		
	Calcium	ppm	ASTM D5185(m)		1056		
	Phosphorus	ppm	ASTM D5185(m)		881		
	Zinc		, ,		1194		
	Sulfur	ppm	ASTM D5185(m)		2000		
		ppm Abo/1mm	ASTM D5185(m)	- OF			
	Oxidation	Abs/.1mm	ASTM D2806*	>20	23.9		
	Base Number (BN)	-	ASTM D2896*	145	6.18		
	Visc @ 100°C	cSt	ASTM D7279(m)	14.5	13.8		





CALA ISO 17025:2017 Accredited Laboratory

Laboratory Sample No. Lab Number

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

: OF0000728 : 02644137 Unique Number : 5801676

Received **Tested** Diagnosed

: 26 Jun 2024 : 26 Jun 2024 : 27 Jun 2024 - Kevin Marson Oil Filtration Solutions Ltd.

PO BOX 16125 CONCEPTION BAY SOUTH, NL **CA A1X 2E2**

Contact: BILL BUTLER

BBUTLER@OILFILTRATIONSOLUTIONS.COM T: (709)834-8433

Test Package: MOB 2 (Additional Tests: PQ) 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.

F: (709)834-8435 Contact/Location: BILL BUTLER - FILCON