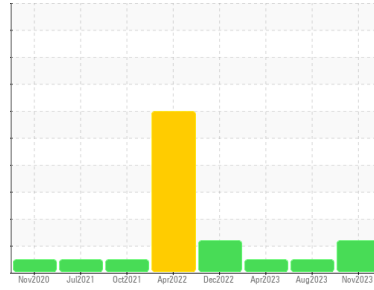




OIL ANALYSIS REPORT

Sample Rating Trend



FUEL



Area
[7503]
 Machine Id
7377

Component
Diesel Engine
 Fluid

DIESEL ENGINE OIL SAE 15W40 (--- GAL)

DIAGNOSIS

Recommendation

The oil change at the time of sampling has been noted. Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

Light fuel dilution occurring.

Fluid Condition

Fuel is present in the oil and is lowering the viscosity. The condition of the oil is acceptable for the time in service.

SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		WC0853262	WC0796666	WC0796357
Sample Date	Client Info		26 Nov 2023	02 Aug 2023	15 Apr 2023
Machine Age	kms	Client Info	185619	171723	155957
Oil Age	kms	Client Info	0	0	0
Oil Changed	Client Info		Changed	Changed	Changed
Sample Status			ABNORMAL	NORMAL	NORMAL

CONTAMINATION

	method	limit/base	current	history1	history2
Water	WC Method	>0.2	NEG	NEG	NEG
Glycol	WC Method		NEG	NEG	NEG

WEAR METALS

	method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185(m)	>90	15	15	19
Chromium	ppm	ASTM D5185(m)	>20	<1	<1	<1
Nickel	ppm	ASTM D5185(m)	>2	<1	<1	<1
Titanium	ppm	ASTM D5185(m)	>2	0	0	<1
Silver	ppm	ASTM D5185(m)	>2	<1	<1	0
Aluminum	ppm	ASTM D5185(m)	>20	5	7	15
Lead	ppm	ASTM D5185(m)	>40	0	0	0
Copper	ppm	ASTM D5185(m)	>330	2	2	2
Tin	ppm	ASTM D5185(m)	>15	0	0	<1
Antimony	ppm	ASTM D5185(m)		0	0	0
Vanadium	ppm	ASTM D5185(m)		0	0	0
Beryllium	ppm	ASTM D5185(m)		0	0	0
Cadmium	ppm	ASTM D5185(m)		0	0	0

ADDITIVES

	method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185(m)	250	45	49	49
Barium	ppm	ASTM D5185(m)	10	0	0	0
Molybdenum	ppm	ASTM D5185(m)	100	<1	1	2
Manganese	ppm	ASTM D5185(m)		0	<1	<1
Magnesium	ppm	ASTM D5185(m)	450	697	709	693
Calcium	ppm	ASTM D5185(m)	3000	1279	1306	1330
Phosphorus	ppm	ASTM D5185(m)	1150	661	694	695
Zinc	ppm	ASTM D5185(m)	1350	734	751	734
Sulfur	ppm	ASTM D5185(m)	4250	2544	2490	2515
Lithium	ppm	ASTM D5185(m)		<1	<1	<1

CONTAMINANTS

	method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185(m)	>25	5	6	6
Sodium	ppm	ASTM D5185(m)	>158	2	3	3
Potassium	ppm	ASTM D5185(m)	>20	6	12	25
Fuel	%	ASTM D7593*	>3.0	▲ 2.5	<1.0	<1.0

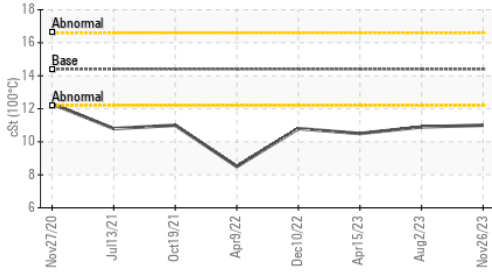
INFRA-RED

	method	limit/base	current	history1	history2	
Soot %	%	ASTM D7844*	>6	0.4	0.4	0.4
Nitration	Abs/cm	ASTM D7624*	>20	9.9	10.1	10.5
Sulfation	Abs/.1mm	ASTM D7415*	>30	20.6	21.5	20.8

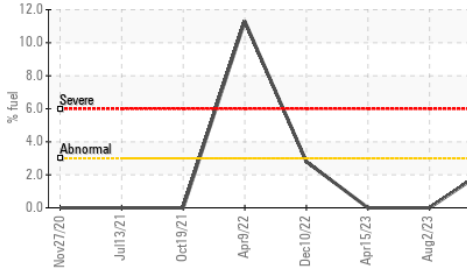


OIL ANALYSIS REPORT

▲ Viscosity @ 100°C



▲ Fuel Dilution



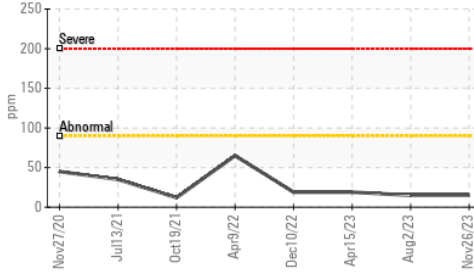
FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs./1mm	ASTM D7414*	>25	16.7	17.3	16.9

VISUAL		method	limit/base	current	history1	history2
Emulsified Water	scalar	Visual*	>0.2	NEG	NEG	NEG
Free Water	scalar	Visual*		NEG	NEG	NEG

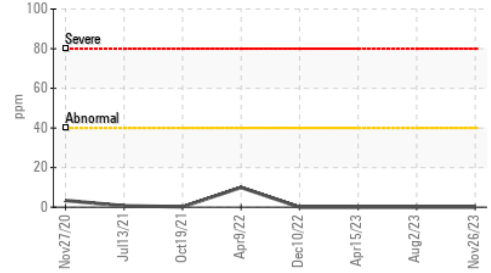
FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D7279(m)	14.4	▲ 11.0	10.9	10.5

GRAPHS

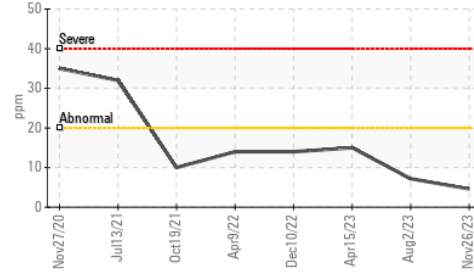
Iron (ppm)



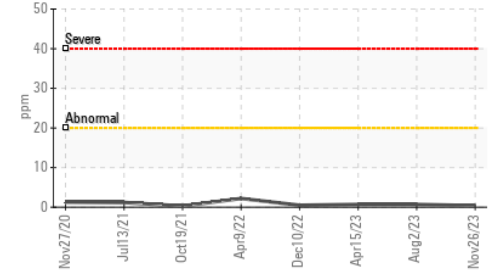
Lead (ppm)



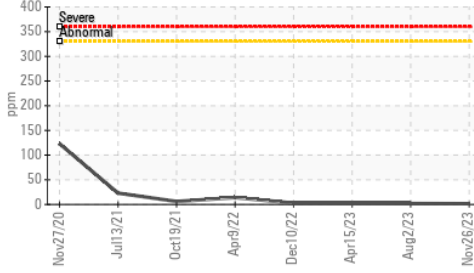
Aluminum (ppm)



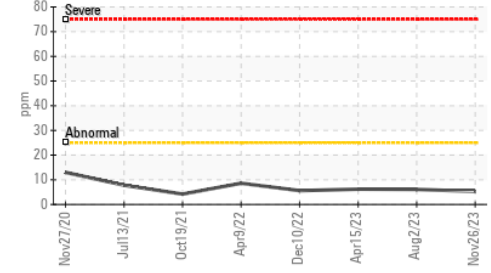
Chromium (ppm)



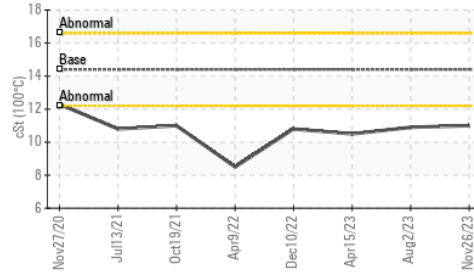
Copper (ppm)



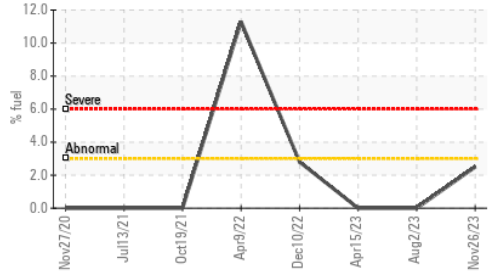
Silicon (ppm)



▲ Viscosity @ 100°C



▲ Fuel Dilution



Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9
Sample No. : WC0853262 **Received** : 09 Jan 2024
Lab Number : **02607464** **Diagnosed** : 10 Jan 2024
Unique Number : 5708550 **Diagnostician** : Wes Davis
Test Package : MOB 1 (Additional Tests: FuelDilution, PercentFuel)

Rush Truck Centres
 7450 Torbram Rd.
 Mississauga, ON
 CA L4T 1G9
 Contact: Serdar Okur
 sokur@rushtruckcentres.ca
 T: (905)671-7600
 F:

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.