



OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
46853351
 Component
Diesel Engine
 Fluid
SHELL ROTELLA T 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		CU0009607	KL	KL0003994
Sample Date		Client Info		07 Sep 2021	29 Aug 2020	01 Aug 2019
Machine Age	hrs	Client Info		1976	1874	1781
Oil Age	hrs	Client Info		102	279	186
Filter Age	hrs	Client Info		102	93	56
Oil Changed		Client Info		Not Changed	Changed	Not Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	ATTENTION	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185(m)	>90	4	9	7
Chromium	ppm	ASTM D5185(m)	>20	0	<1	<1
Nickel	ppm	ASTM D5185(m)	>2	<1	<1	<1
Titanium	ppm	ASTM D5185(m)	>2	0	<1	<1
Silver	ppm	ASTM D5185(m)	>2	<1	2	1
Aluminum	ppm	ASTM D5185(m)	>20	<1	<1	<1
Lead	ppm	ASTM D5185(m)	>40	0	<1	<1
Copper	ppm	ASTM D5185(m)	>330	5	9	7
Tin	ppm	ASTM D5185(m)	>15	<1	0	0
Vanadium	ppm	ASTM D5185(m)		0	0	0

CONTAMINATION

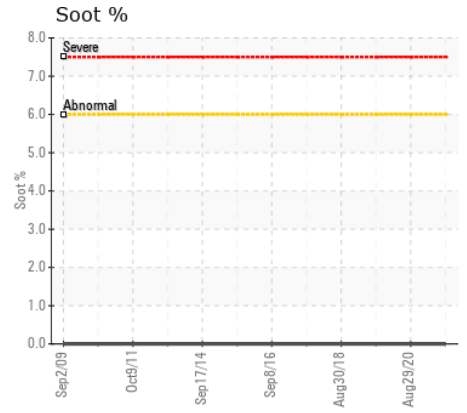
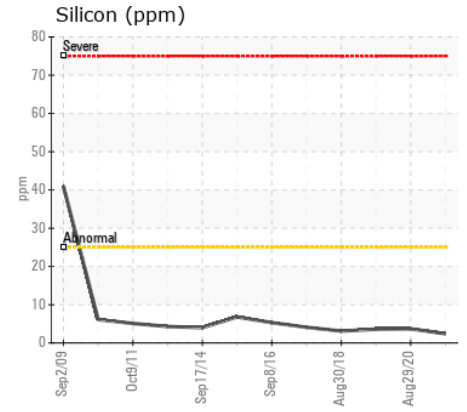
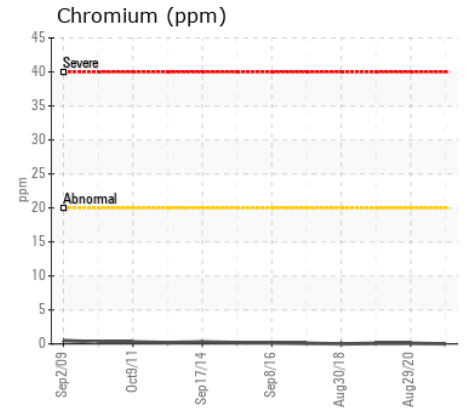
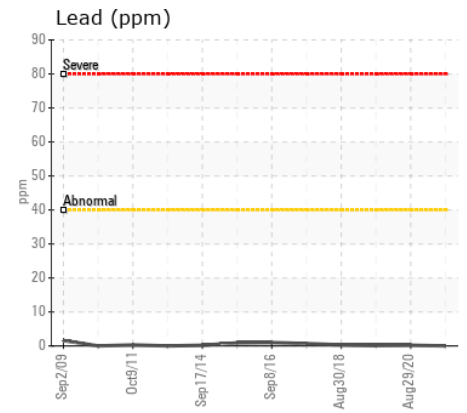
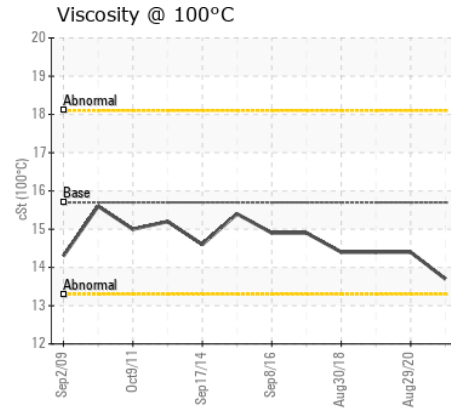
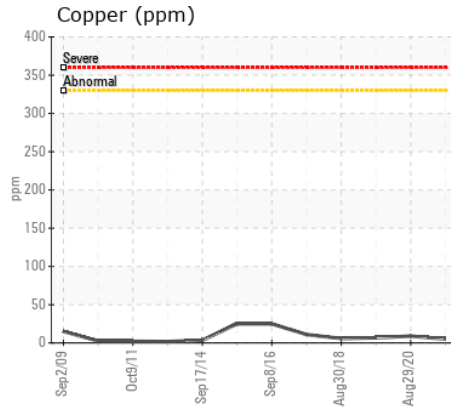
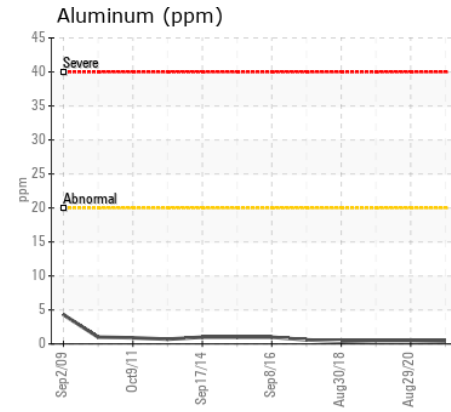
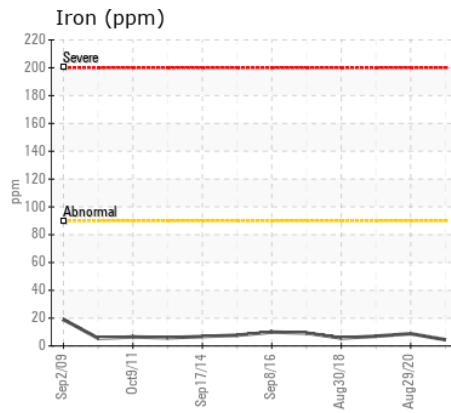
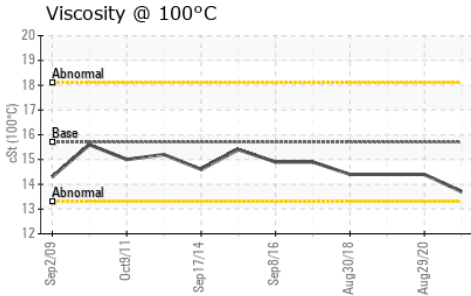
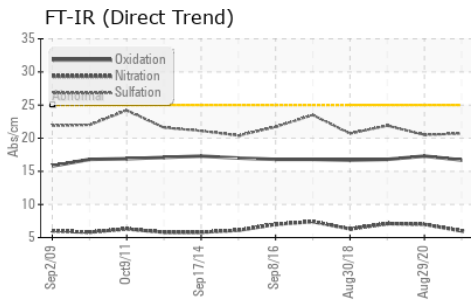
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185(m)	>25	2	4	4
Potassium	ppm	ASTM D5185(m)	>20	2	1	1
Fuel		WC Method	>3.0	<1.0	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	ASTM D7844*	>6	0	0	0
Nitration	Abs/cm	ASTM D7624*	>20	6.0	7.0	7.1
Sulfation	Abs/.1mm	ASTM D7415*	>30	20.7	20.5	21.9
Emulsified Water	scalar	Visual*	>0.2	NEG	NEG	NEG

FLUID CONDITION

The condition of the oil is acceptable for the time in service.

Sodium	ppm	ASTM D5185(m)		2	<1	0
Boron	ppm	ASTM D5185(m)	35	144	105	119
Barium	ppm	ASTM D5185(m)	0	0	<1	<1
Molybdenum	ppm	ASTM D5185(m)	0	<1	<1	<1
Manganese	ppm	ASTM D5185(m)	0	<1	<1	<1
Magnesium	ppm	ASTM D5185(m)	10	9	9	9
Calcium	ppm	ASTM D5185(m)	2340	2104	2132	2187
Phosphorus	ppm	ASTM D5185(m)	1110	1044	1019	1016
Zinc	ppm	ASTM D5185(m)	1210	1144	1178	1180
Sulfur	ppm	ASTM D5185(m)	3890	3084	3122	3092
Oxidation	Abs/.1mm	ASTM D7414*	>25	16.7	17.3	16.8
Visc @ 100°C	cSt	ASTM D7279(m)	15.7	13.7	14.4	14.4



Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9
Sample No. : CU0009607
Lab Number : 02444432
Unique Number : 5279964
Test Package : MOB 1

Received : 16 Sep 2021
Tested : 17 Sep 2021
Diagnosed : 17 Sep 2021 - Wes Davis

Stephen Hill
 2445 PRESQUILE DR
 Oakville, ON
 CA L6H 0B8
 Contact: Stephen Hill
 stephen.h.hill@gmail.com
 T: (647)764-2910
 F: x:

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.