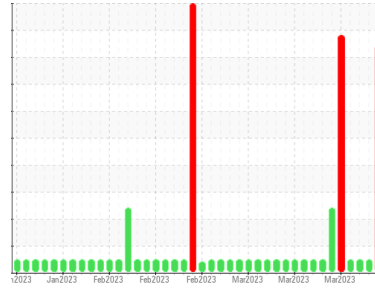




OIL ANALYSIS REPORT

Sample Rating Trend



GLYCOL



Area
WCLSNC
 Machine Id
QC DE NC 08012022
 Component
Diesel Engine
 Fluid
PETRO CANADA DURON SHP 15W40 (--- GAL)

DIAGNOSIS

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			WC0796918	WC0796917	WC0796914
Sample Date	Client Info			21 Mar 2023	20 Mar 2023	17 Mar 2023
Machine Age	hrs	Client Info		0	0	0
Oil Age	hrs	Client Info		0	0	0
Oil Changed	Client Info			N/A	N/A	N/A
Sample Status				SEVERE	NORMAL	NORMAL

WEAR METALS		method	limit/base	current	history1	history2
PQ		ASTM D8184		10	13	7
Iron	ppm	ASTM D5185m		9	10	9
Chromium	ppm	ASTM D5185m		2	2	1
Nickel	ppm	ASTM D5185m		<1	<1	<1
Titanium	ppm	ASTM D5185m		0	<1	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m		2	2	2
Lead	ppm	ASTM D5185m		4	4	4
Copper	ppm	ASTM D5185m		<1	<1	<1
Tin	ppm	ASTM D5185m		0	<1	<1
Vanadium	ppm	ASTM D5185m		0	0	0
Cadmium	ppm	ASTM D5185m		0	0	0

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		33	34	34
Barium	ppm	ASTM D5185m		0	0	0
Molybdenum	ppm	ASTM D5185m		89	95	99
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m		554	514	512
Calcium	ppm	ASTM D5185m		1620	1594	1660
Phosphorus	ppm	ASTM D5185m		701	709	719
Zinc	ppm	ASTM D5185m		960	947	954
Sulfur	ppm	ASTM D5185m		3070	2351	2322

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m		25	28	25
Sodium	ppm	ASTM D5185m		▲ 1264	1535	1644
Potassium	ppm	ASTM D5185m		▲ 7	8	9
Fuel	%	ASTM D3524		0.3	0.3	0.2
Glycol	%	*ASTM D2982		● 0.12	NEG	NEG

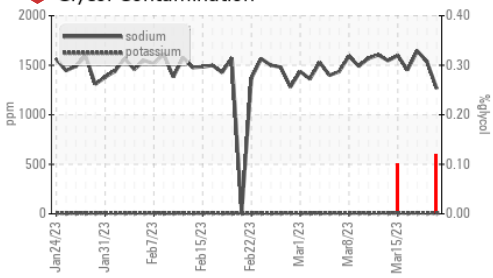
INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844		0.1	0.1	0.1
Nitration	Abs/cm	*ASTM D7624		11.3	11.4	11.3
Sulfation	Abs/.1mm	*ASTM D7415		22.2	22.3	22.1

FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414		16.6	16.6	16.4
Acid Number (AN)	mg KOH/g	ASTM D8045		0.30	0.48	0.486
Base Number (BN)	mg KOH/g	ASTM D2896		12.03	12.50	11.58

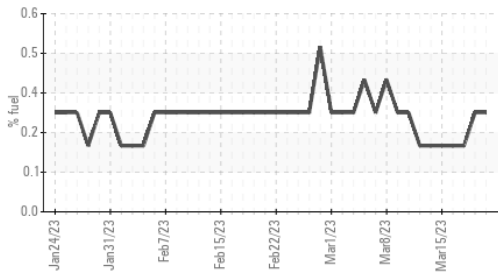


OIL ANALYSIS REPORT

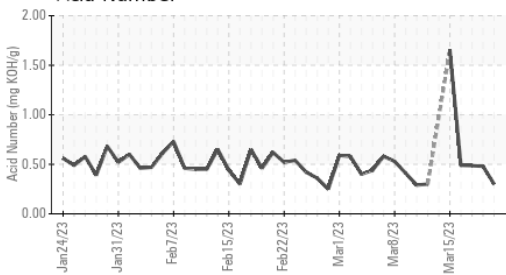
Glycol Contamination



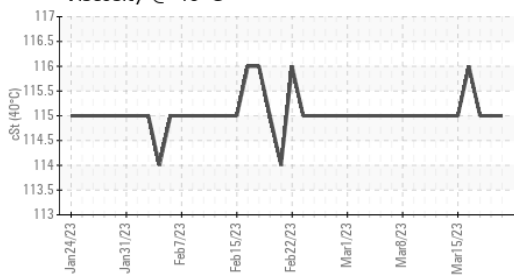
Fuel Dilution



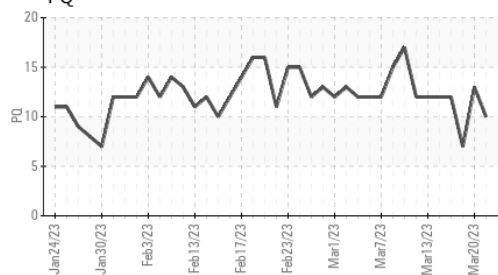
Acid Number



Viscosity @ 40°C



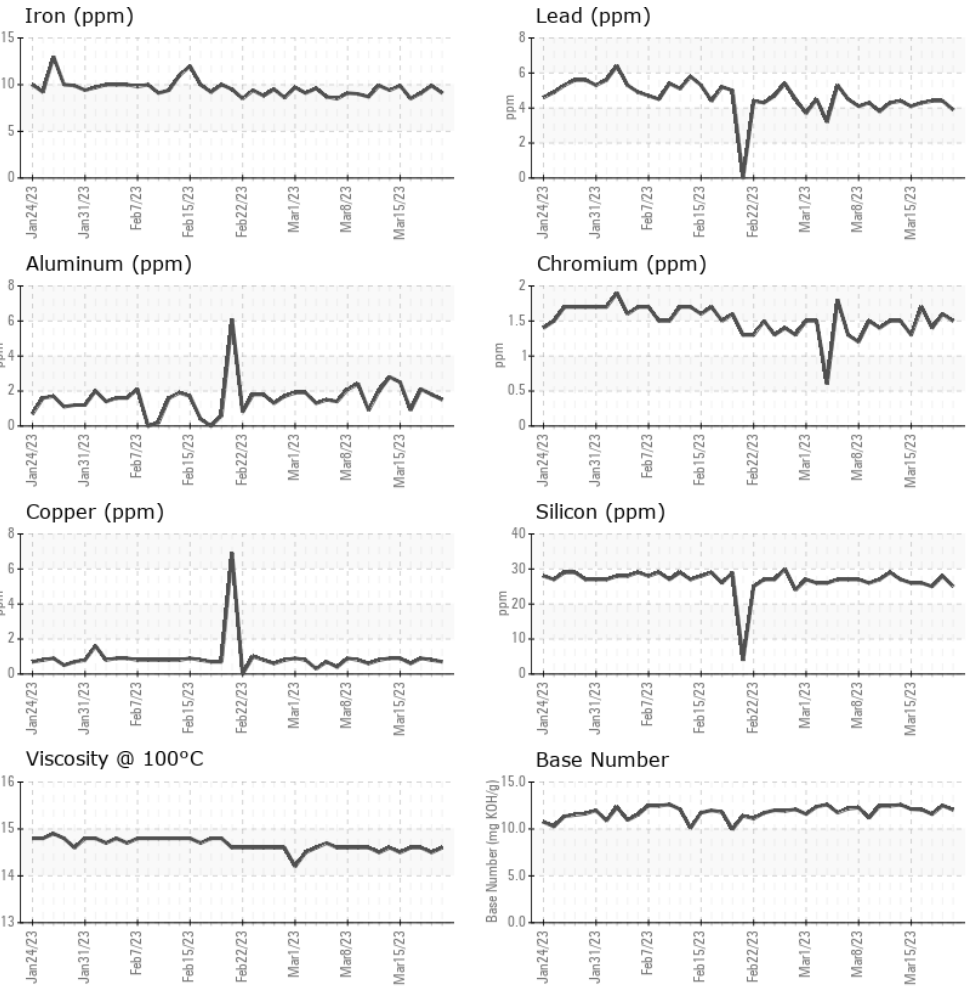
PQ



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	NEG	NEG	NEG
Free Water	scalar	*Visual	NEG	NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	115	115	115
Visc @ 100°C	cSt	ASTM D445	14.6	14.5	14.6
Viscosity Index (VI)	Scale	ASTM D2270	129	128	129

GRAPHS



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0796918 **Received** : 21 Mar 2023
Lab Number : 05797723 **Diagnosed** : 02 Oct 2023
Unique Number : 10387407 **Diagnostician** : System
Test Package : MOB 2 (Additional Tests: FuelDilution, Glycol, KV40, PercentFuel, PQ, VI)

Contact: WCLS CARY NC
 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)

T: (919)379-4102
 F: (919)379-4050