



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area
(TB7322)
Machine Id
812030
Component
Diesel Engine
Fluid
PETRO CANADA DURON SHP 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		GFL0069963	GFL0069948	GFL0069996
Sample Date		Client Info		19 May 2024	20 Sep 2023	28 Dec 2022
Machine Age	hrs	Client Info		6082	4362	2458
Oil Age	hrs	Client Info		600	600	600
Filter Age	hrs	Client Info		600	600	600
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	NORMAL	SEVERE

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>100	7	9	▲ 831
Chromium	ppm	ASTM D5185m	>20	0	0	▲ 61
Nickel	ppm	ASTM D5185m	>4	0	0	▲ 22
Titanium	ppm	ASTM D5185m		0	0	<1
Silver	ppm	ASTM D5185m	>3	0	0	0
Aluminum	ppm	ASTM D5185m	>20	2	<1	● 20
Lead	ppm	ASTM D5185m	>40	0	0	▲ 52
Copper	ppm	ASTM D5185m	>330	0	<1	▲ 137
Tin	ppm	ASTM D5185m	>15	<1	0	10
Vanadium	ppm	ASTM D5185m		0	0	<1
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

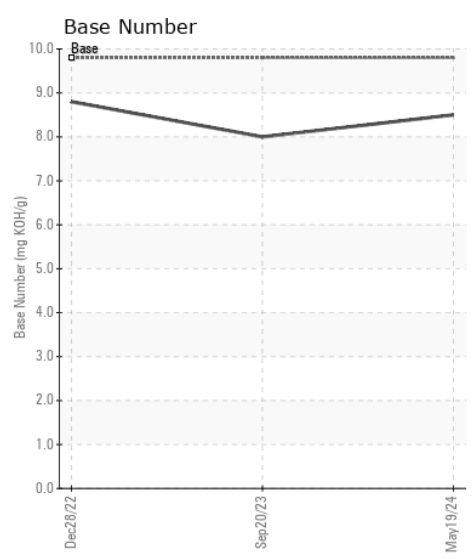
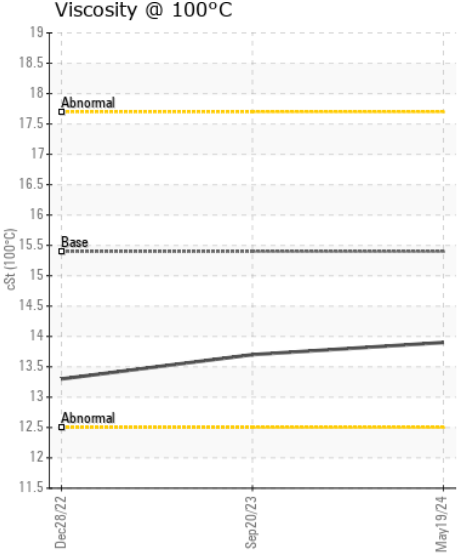
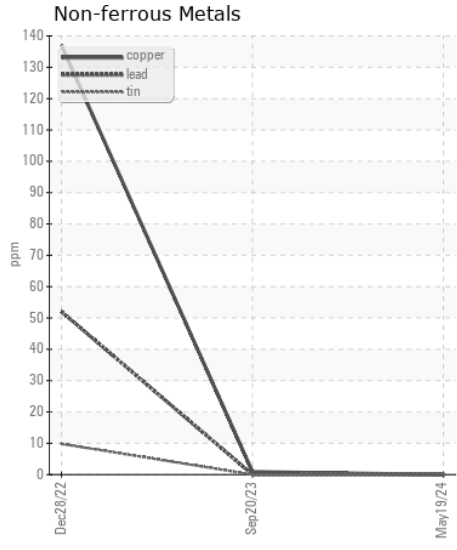
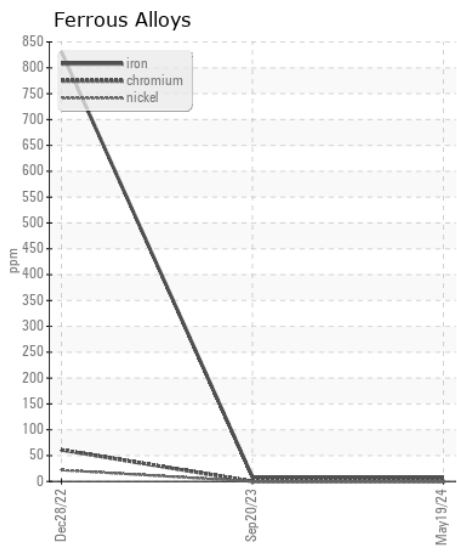
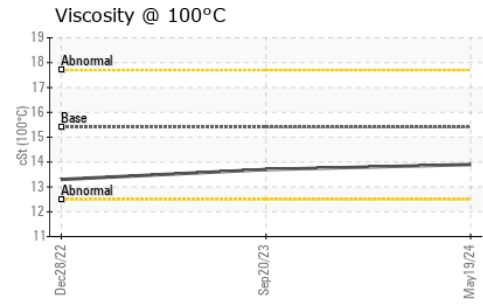
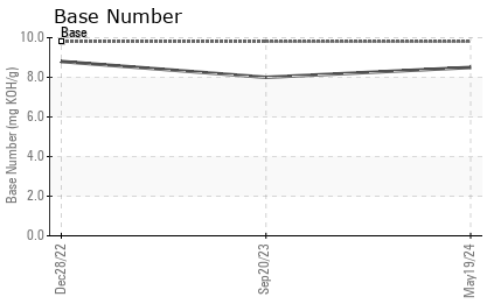
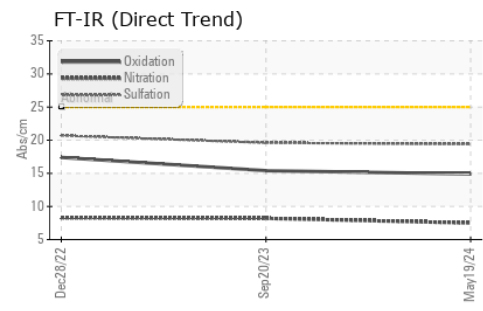
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>25	3	2	▲ 267
Potassium	ppm	ASTM D5185m	>20	<1	2	▲ 72
Fuel		WC Method	>5	<1.0	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844	>3	0.5	0.8	0.6
Nitration	Abs/cm	*ASTM D7624	>20	7.5	8.2	8.3
Sulfation	Abs/.1mm	*ASTM D7415	>30	19.4	19.6	20.7
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	NEG	NEG	NEG

FLUID CONDITION

The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m		<1	1	▲ 7083
Boron	ppm	ASTM D5185m	0	2	<1	297
Barium	ppm	ASTM D5185m	0	0	0	0
Molybdenum	ppm	ASTM D5185m	60	64	60	284
Manganese	ppm	ASTM D5185m	0	<1	0	6
Magnesium	ppm	ASTM D5185m	1010	1002	1007	807
Calcium	ppm	ASTM D5185m	1070	1071	1118	1003
Phosphorus	ppm	ASTM D5185m	1150	1044	1012	936
Zinc	ppm	ASTM D5185m	1270	1297	1279	1113
Sulfur	ppm	ASTM D5185m	2060	3487	3067	2523
Oxidation	Abs/.1mm	*ASTM D7414	>25	14.9	15.4	17.4
Base Number (BN)	mg KOH/g	ASTM D2896	9.8	8.5	8.0	8.8
Visc @ 100°C	cSt	ASTM D445	15.4	13.9	13.7	13.3



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : GFL0069963
Lab Number : 06188948
Unique Number : 11045700
Test Package : FLEET
Received : 23 May 2024
Tested : 24 May 2024
Diagnosed : 24 May 2024 - Wes Davis

GFL Environmental - 902 - Chilton HC
 428 High St
 Chilton, WI
 US 53014
 Contact: Keith Mueller
 keith.mueller@gflenv.com
 T: (920)374-1404
 F:

Certificate L2367
 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)