WEAR CONTAMINATION FLUID CONDITION

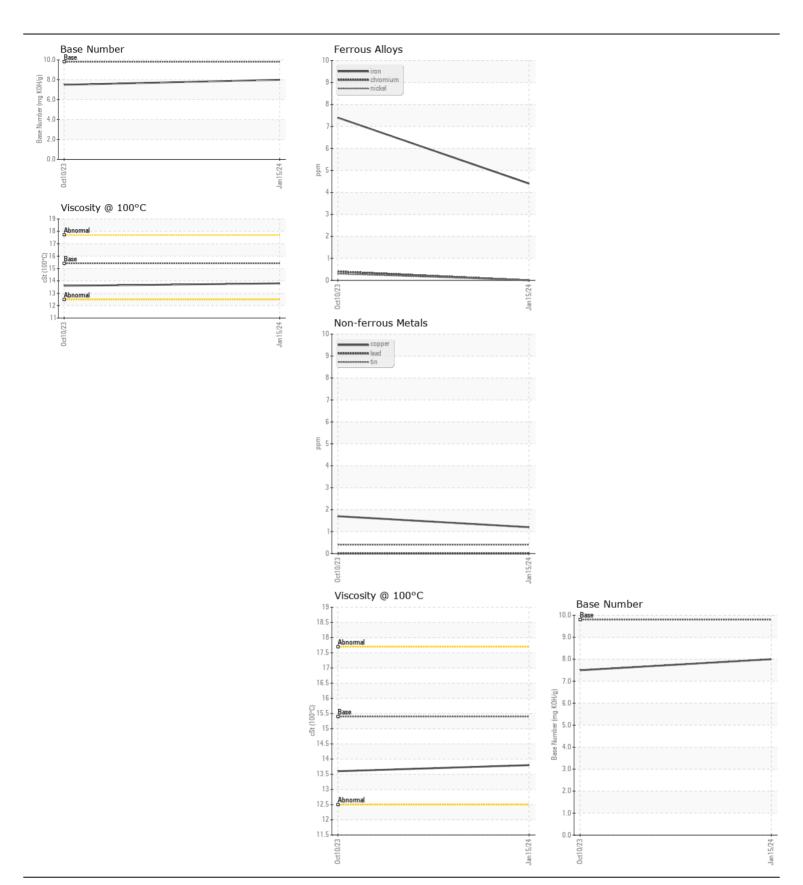
NORMAL NORMAL



Machine Id
420057
Component
Diesel Engine
Fluid

PETRO CANADA DURON SHP 15W40 (--- GAL)

PETRO CANADA DURON SHP 15W40 (GAL)							
RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
TESSIMIERBATION	Sample Number		Client Info	2.1111071011	GFL0102129	GFL0087953	
Resample at the next service interval to monitor.	Sample Date		Client Info		15 Jan 2024	10 Oct 2023	
	Machine Age	hrs	Client Info		11364	11364	
	Oil Age	hrs	Client Info		600	600	
	Filter Age	hrs	Client Info		600	600	
	Oil Changed		Client Info		Changed	Changed	
	Filter Changed		Client Info		Changed	Changed	
	Sample Status				NORMAL	NORMAL	
WEAR	Iron	ppm	ASTM D5185m	>120	4	7	
All component wear rates are normal.	Chromium	ppm	ASTM D5185m	>20	0	<1	
	Nickel	ppm	ASTM D5185m	>5	0	<1	
	Titanium	ppm	ASTM D5185m	>2	0	<1	
	Silver	ppm	ASTM D5185m	>2	0	0	
	Aluminum	ppm	ASTM D5185m	>20	<1	1	
	Lead	ppm	ASTM D5185m	>40	0	0	
	Copper	ppm	ASTM D5185m	>330	1	2	
	Tin	ppm	ASTM D5185m	>15	<1	<1	
	Vanadium	ppm	ASTM D5185m		<1	<1	
	White Metal	scalar	*Visual	NONE	NONE	NONE	
	Yellow Metal	scalar	*Visual	NONE	NONE	NONE	
CONTAMINATION	Silicon		ASTM D5185m	. 05	4	4	
CONTAMINATION	Potassium	ppm	ASTM D5185m		4 <1	4	
There is no indication of any contamination in the oil.	Fuel	ppm	WC Method			<1.0	
	Water		WC Method		<1.0 NEG	NEG	
			WC Method	>0.2	NEG	NEG	
	Glycol Soot %	%	*ASTM D7844	- 1	0.2	0.3	
	Nitration	Abs/cm	*ASTM D7624	>20	7.5	7.5	
	Sulfation				19.0	18.8	
	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		*Visual	>0.2	NEG	NEG	
FLUID CONDITION	Sodium	ppm	ASTM D5185m		3	5	
The BN result indicates that there is suitable alkalinity remaining in the	Boron	ppm	ASTM D5185m	0	12	2	
oil. The condition of the oil is suitable for further service.	Barium	ppm	ASTM D5185m	0	0	0	
	Molybdenum	ppm	ASTM D5185m		59	58	
	Manganese	ppm	ASTM D5185m		<1	<1	
	Magnesium	ppm	ASTM D5185m		997	910	
	Calcium	ppm	ASTM D5185m		1069	1037	
	Phosphorus	ppm	ASTM D5185m		1094	965	
	Zinc	ppm	ASTM D5185m		1274	1134	
	Sulfur	ppm	ASTM D5185m		3162	2787	
	Oxidation	Abs/.1mm	*ASTM D7414		15.5	15.0	
	Base Number (BN)		ASTM D2896		8.0	7.5	
	Visc @ 100°C	cSt	ASTM D445	15.4	13.8	13.6	







Certificate L2367

Laboratory Sample No. Lab Number **Unique Number**

: GFL0102129 : 06065324 : 10836706 Test Package : FLEET

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 Recieved : 19 Jan 2024 Diagnosed : 20 Jan 2024

Diagnostician : Wes Davis

GFL Environmental - 960B - Pittsfield HC 1335 W. Washington

Pittsfield, IL US 62363 Contact: David Bradshaw david.bradshaw@gflenv.com

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:

F: