



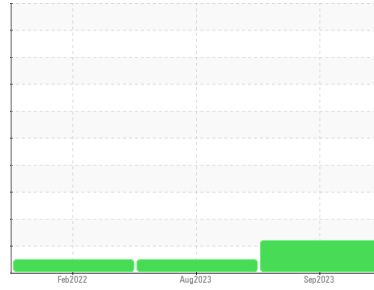
PROBLEM SUMMARY

Sample Rating Trend

GLYCOL

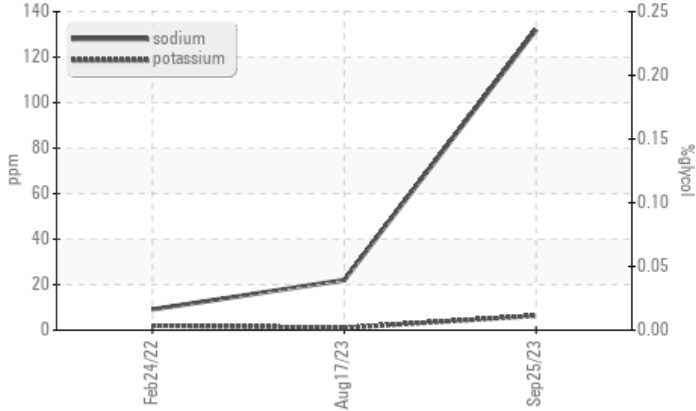


Machine Id
759M
Component
Diesel Engine
Fluid
PETRO CANADA DURON SHP 15W40 (36 GAL)



COMPONENT CONDITION SUMMARY

▲ Glycol Contamination



RECOMMENDATION

We advise that you check for the source of the coolant leak. Check for low coolant level. Oil and filter change at the time of sampling has been noted. We recommend an early resample to monitor this condition.

PROBLEMATIC TEST RESULTS

Sample Status			ABNORMAL	NORMAL	NORMAL
Sodium	ppm	ASTM D5185m	▲ 132	22	9

Customer Id: GFL410
Sample No.: GFL0084949
Lab Number: 05964014
Test Package: FLEET



To manage this report scan the QR code

To discuss the diagnosis or test data:
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jhester@wearcheckusa.com

To change component or sample information:
Customer Service +1 1-800-237-1369
customerservice@wearcheck.com

RECOMMENDED ACTIONS

Action	Status	Date	Done By	Description
Change Fluid	---	---	?	Oil and filter change at the time of sampling has been noted.
Change Filter	---	---	?	Oil and filter change at the time of sampling has been noted.
Resample	---	---	?	We recommend an early resample to monitor this condition.
Check Glycol Access	---	---	?	We advise that you check for the source of the coolant leak.

HISTORICAL DIAGNOSIS

17 Aug 2023 Diag: Don Baldrige

NORMAL



Resample at the next service interval to monitor. All component wear rates are normal. There is no indication of any contamination in the oil. The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

view report



24 Feb 2022 Diag: Wes Davis

NORMAL



Resample at the next service interval to monitor. All component wear rates are normal. There is no indication of any contamination in the oil. The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

view report





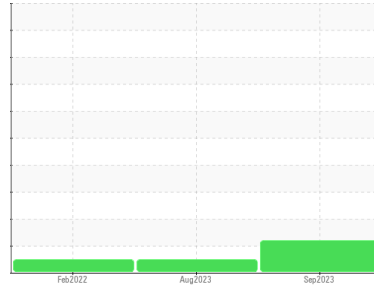
OIL ANALYSIS REPORT

Sample Rating Trend

GLYCOL



Machine Id
759M
Component
Diesel Engine
Fluid
PETRO CANADA DURON SHP 15W40 (36 GAL)



DIAGNOSIS

Recommendation

We advise that you check for the source of the coolant leak. Check for low coolant level. Oil and filter change at the time of sampling has been noted. We recommend an early resample to monitor this condition.

Wear

All component wear rates are normal.

Contamination

Sodium and/or potassium levels are high.

Fluid Condition

The BN result indicates that there is suitable alkalinity remaining in the oil.

SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	GFL0084949	GFL0085033	GFL0018456
Sample Date	Client Info	25 Sep 2023	17 Aug 2023	24 Feb 2022
Machine Age	hrs	17954	17618	14144
Oil Age	hrs	17954	17618	0
Oil Changed	Client Info	Changed	Changed	N/A
Sample Status		ABNORMAL	NORMAL	NORMAL

CONTAMINATION

method	limit/base	current	history1	history2
Fuel	WC Method >3.0	<1.0	<1.0	<1.0

WEAR METALS

method	limit/base	current	history1	history2
Iron	ppm ASTM D5185m >75	9	44	35
Chromium	ppm ASTM D5185m >5	<1	2	2
Nickel	ppm ASTM D5185m >4	0	<1	0
Titanium	ppm ASTM D5185m >2	0	<1	0
Silver	ppm ASTM D5185m >2	0	0	0
Aluminum	ppm ASTM D5185m >15	2	10	4
Lead	ppm ASTM D5185m >25	<1	11	<1
Copper	ppm ASTM D5185m >100	4	3	1
Tin	ppm ASTM D5185m >4	<1	1	<1
Antimony	ppm ASTM D5185m	---	---	0
Vanadium	ppm ASTM D5185m	0	<1	<1
Cadmium	ppm ASTM D5185m	0	0	0

ADDITIVES

method	limit/base	current	history1	history2
Boron	ppm ASTM D5185m 0	10	48	4
Barium	ppm ASTM D5185m 0	0	0	0
Molybdenum	ppm ASTM D5185m 60	65	74	62
Manganese	ppm ASTM D5185m 0	1	<1	<1
Magnesium	ppm ASTM D5185m 1010	965	1051	1037
Calcium	ppm ASTM D5185m 1070	1096	1370	1153
Phosphorus	ppm ASTM D5185m 1150	1047	1152	1093
Zinc	ppm ASTM D5185m 1270	1270	1443	1400
Sulfur	ppm ASTM D5185m 2060	3140	3723	2600

CONTAMINANTS

method	limit/base	current	history1	history2
Silicon	ppm ASTM D5185m >25	8	11	6
Sodium	ppm ASTM D5185m	▲ 132	22	9
Potassium	ppm ASTM D5185m >20	6	1	2
Glycol	% *ASTM D2982	NEG	NEG	NEG

INFRA-RED

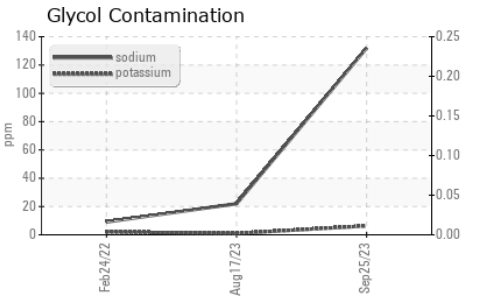
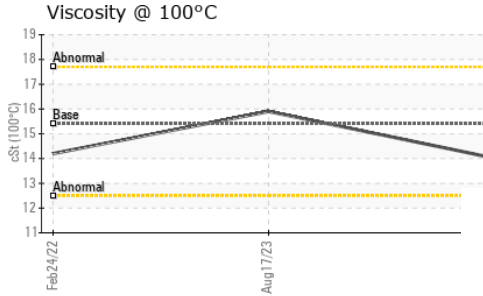
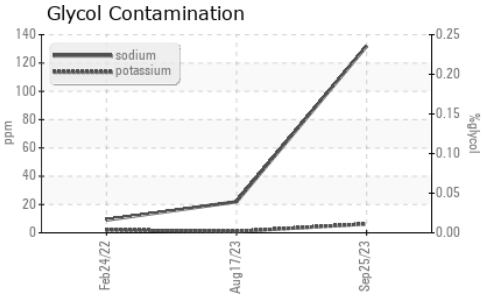
method	limit/base	current	history1	history2
Soot %	% *ASTM D7844 >6	0.1	0.3	0.9
Nitration	Abs/cm *ASTM D7624 >20	5.8	12.4	12.6
Sulfation	Abs/.1mm *ASTM D7415 >30	17.8	27.6	24.1

FLUID DEGRADATION

method	limit/base	current	history1	history2
Oxidation	Abs/.1mm *ASTM D7414 >25	13.8	30.6	22.0
Base Number (BN)	mg KOH/g ASTM D2896 9.8	8.9	6.1	7.7



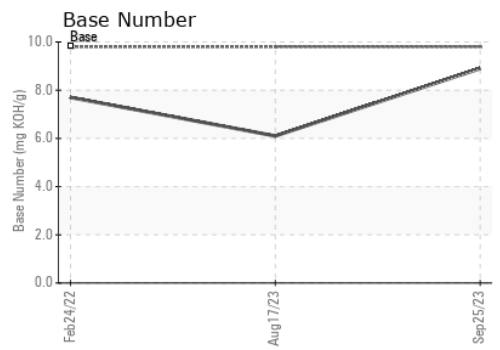
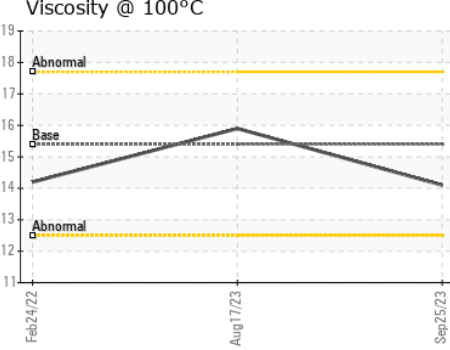
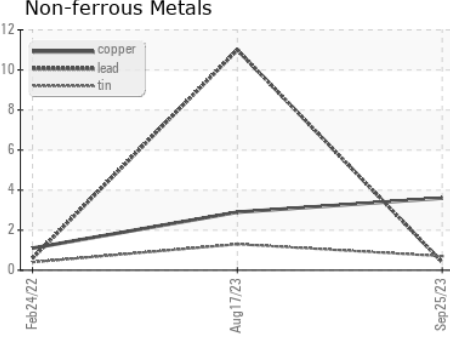
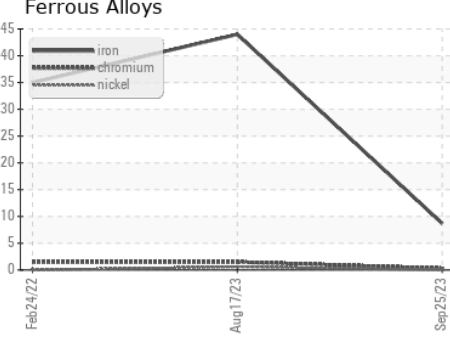
OIL ANALYSIS REPORT



VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	LIGHT
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	>0.2	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	15.4	14.1	15.9

GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : GFL0084949 **Received** : 28 Sep 2023
Lab Number : **05964014** **Diagnosed** : 02 Oct 2023
Unique Number : 10670565 **Diagnostician** : Jonathan Hester
Test Package : FLEET (Additional Tests: Glycol)

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 US 48184
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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)