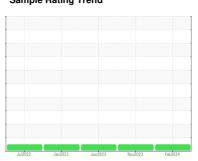


# **OIL ANALYSIS REPORT**

Sample Rating Trend



NORMAL



# Machine Id **621329**

Component **Diesel Engine** 

PETRO CANADA DURON SHP 10W30 (--- QTS)

## DIAGNOSIS

### Recommendation

Resample at the next service interval to monitor. Please specify the component make and model with your next sample.

#### Wear

Metal levels are typical for a new component breaking in.

## Contamination

There is no indication of any contamination in the

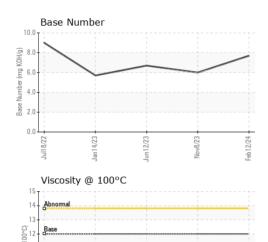
## **Fluid Condition**

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

QTS)		Jul2022	Jan2023	Jun2023 Nov2023	Feb 2024	
SAMPLE INFORI	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		PCA0119052	PCA0112253	PCA0095773
Sample Date		Client Info		12 Feb 2024	08 Nov 2023	12 Jun 2023
Machine Age	mls	Client Info		8736	15937	19267
Oil Age	mls	Client Info		8736	15937	19267
Oil Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	NORMAL	NORMAL
CONTAMINAT	ION	method	limit/base	current	history1	history2
Fuel		WC Method	>5	<1.0	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
WEAR METAL	S	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>100	7	15	15
Chromium	ppm	ASTM D5185m	>20	<1	<1	<1
Nickel	ppm	ASTM D5185m	>4	0	<1	<1
Titanium	ppm	ASTM D5185m		<1	2	9
Silver	ppm	ASTM D5185m	>3	0	<1	<1
Aluminum	ppm	ASTM D5185m	>20	<1	3	1
Lead	ppm	ASTM D5185m	>40	0	2	1
Copper	ppm	ASTM D5185m	>330	5	14	56
Tin	ppm	ASTM D5185m	>15	0	2	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	2	7	5	5
Barium	ppm	ASTM D5185m	0	0	0	0
Molybdenum	ppm	ASTM D5185m	50	51	56	53
Manganese	ppm	ASTM D5185m	0	<1	<1	<1
Magnesium	ppm	ASTM D5185m	950	813	914	823
Calcium	ppm	ASTM D5185m	1050	1007	1107	1194
Phosphorus	ppm	ASTM D5185m	995	908	946	877
Zinc	ppm	ASTM D5185m	1180	1091	1221	1157
Sulfur	ppm	ASTM D5185m	2600	2623	2819	3011
CONTAMINAN		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>25	5	6	4
Sodium	ppm	ASTM D5185m	00	0	0	<1
Potassium	ppm	ASTM D5185m		0	7	5
INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844	>3	0.2	0.3	0.3
Nitration	Abs/cm	*ASTM D7624	>20	8.7	9.0	9.6
Sulfation	Abs/.1mm	*ASTM D7415	>30	18.2	20.7	20.0
FLUID DEGRA	OITAC	method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	14.6	16.6	15.6
Base Number (BN)	mg KOH/g	ASTM D2896		7.7	6.0	6.7



## **OIL ANALYSIS REPORT**



VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
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
<b>Emulsified Water</b>	scalar	*Visual	>0.2	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
FLUID PROPE	RTIES	method	limit/base	current	history1	history2

FLUID PROPE	ERTIES	method	limit/bas	e current	history1	history2
Visc @ 100°C	cSt	ASTM D445	12.00	11.3	11.1	11.1
GRAPHS						
Iron (ppm)				Lead (ppm)		
200 Severe	!			80 Severe		
Abnormal			8	40 Abnormal		
50				20		1 1
33 23			42	23 23		23
Jul18/22	Jun12/23	Nov8/23 -	Feb12/24	Jul18/22 Jan14/23	Jun12/23	Nov8/23 -
Aluminum (ppm)				Chromium (p	om)	
Severe				Severe	1	
Abnormal				20 - Abnormal		
20 Abnormal	1			20 Abnormal	:	
0				0	m	m **
Jul18/22	Jun12/23	Nov8/23	Feb 12/24	Jul18/22 Jan14/23	Jun12/23	Nov8/23 Feb12/24
Copper (ppm)	7		ш.	Silicon (ppm)	7	ш.
400 Severe				80 - Severe		
300				60		
100				Abnomaal		
0				0		
Jul18/22 -	Jun12/23 -	Nov8/23 -	Feb12/24	Jul18/22 -	Jun12/23 -	Nov8/23 - Feb12/24 -
الله الله الله الله الله الله الله الله		Ž	표	Base Number	Jur	≥ <u>1</u> 2
16 T			(8)	10.0		
Abnormal			g KOH/g)	8.0	<u>-</u>	





Report Id: MILPHINE [WUSCAR] 06095290 (Generated: 02/23/2024 08:09:22) Rev: 1

Laboratory Sample No.

: WearCheck USA - 501 Madison Ave., Cary, NC 27513

Lab Number : 06095290 **Unique Number** : 10888143

: PCA0119052

Received

Jan 14/23

Jun 12/23

**Tested** Diagnosed Test Package: MOB 1 (Additional Tests: TBN)

: 21 Feb 2024 : 23 Feb 2024 : 23 Feb 2024 - Wes Davis

Feb12/24

Base Number 4.0

0.0

2196 BENNETT ROAD

PHILADELPHIA, PA US 19116 Contact: ROSTY VITER rviter@millertransgroup.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.

T: (215)552-9832 Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012) F: (215)552-9892

**MILLER TRUCK LEASING #118** 

Contact/Location: ROSTY VITER - MILPHINE

Jun12/23