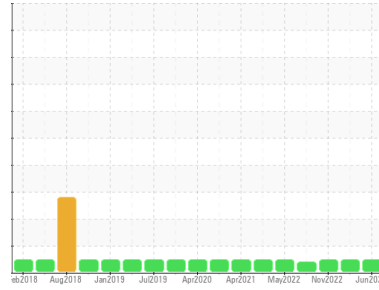


# OIL ANALYSIS REPORT

Sample Rating Trend



**NORMAL**



Machine Id  
**ISUZU 172088**

Component  
**Diesel Engine**

Fluid  
**PETRO CANADA DURON SHP 10W30 (13 QTS)**

## DIAGNOSIS

### Recommendation

Resample at the next service interval to monitor.

### Wear

All component wear rates are normal.

### Contamination

There is no indication of any contamination in the oil.

### 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.

SAMPLE INFORMATION		method	limit/base	current	history 1	history 2
Sample Number	Client Info			<b>PCA0097787</b>	PCA0094523	PCA0079764
Sample Date	Client Info			<b>10 Jun 2023</b>	03 Mar 2023	05 Nov 2022
Machine Age	mls	Client Info		<b>245503</b>	235517	222191
Oil Age	mls	Client Info		<b>10000</b>	0	0
Oil Changed	Client Info			<b>Changed</b>	N/A	Changed
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

CONTAMINATION		method	limit/base	current	history 1	history 2
Fuel	WC Method	>5		<b>&lt;1.0</b>	<1.0	<1.0
Glycol	WC Method			<b>NEG</b>	NEG	NEG

WEAR METALS		method	limit/base	current	history 1	history 2
Iron	ppm	ASTM D5185m	>100	<b>25</b>	37	36
Chromium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	<1	<1
Nickel	ppm	ASTM D5185m	>4	<b>0</b>	0	0
Titanium	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Silver	ppm	ASTM D5185m	>3	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m	>20	<b>0</b>	3	2
Lead	ppm	ASTM D5185m	>40	<b>&lt;1</b>	2	2
Copper	ppm	ASTM D5185m	>330	<b>&lt;1</b>	1	1
Tin	ppm	ASTM D5185m	>15	<b>0</b>	<1	<1
Vanadium	ppm	ASTM D5185m		<b>0</b>	<1	0
Cadmium	ppm	ASTM D5185m		<b>0</b>	0	0

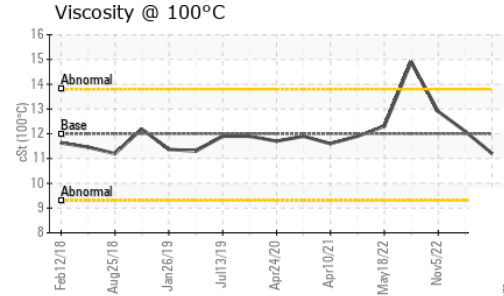
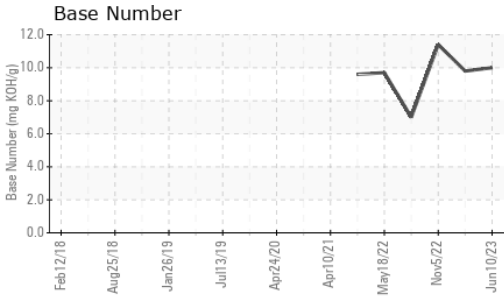
ADDITIVES		method	limit/base	current	history 1	history 2
Boron	ppm	ASTM D5185m	2	<b>12</b>	8	15
Barium	ppm	ASTM D5185m	0	<b>12</b>	0	<1
Molybdenum	ppm	ASTM D5185m	50	<b>73</b>	63	68
Manganese	ppm	ASTM D5185m	0	<b>&lt;1</b>	1	<1
Magnesium	ppm	ASTM D5185m	950	<b>951</b>	883	859
Calcium	ppm	ASTM D5185m	1050	<b>1175</b>	1169	1256
Phosphorus	ppm	ASTM D5185m	995	<b>1070</b>	992	1071
Zinc	ppm	ASTM D5185m	1180	<b>1311</b>	1259	1304
Sulfur	ppm	ASTM D5185m	2600	<b>3757</b>	3196	3460

CONTAMINANTS		method	limit/base	current	history 1	history 2
Silicon	ppm	ASTM D5185m	>25	<b>4</b>	6	5
Sodium	ppm	ASTM D5185m		<b>6</b>	6	3
Potassium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	1	3

INFRA-RED		method	limit/base	current	history 1	history 2
Soot %	%	*ASTM D7844	>3	<b>1.5</b>	2.3	2.7
Nitration	Abs/cm	*ASTM D7624	>20	<b>10.5</b>	12.4	12.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>21.0</b>	23.3	25.8

FLUID DEGRADATION		method	limit/base	current	history 1	history 2
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>16.3</b>	17.6	19.0
Base Number (BN)	mg KOH/g	ASTM D2896		<b>10.0</b>	9.8	11.4

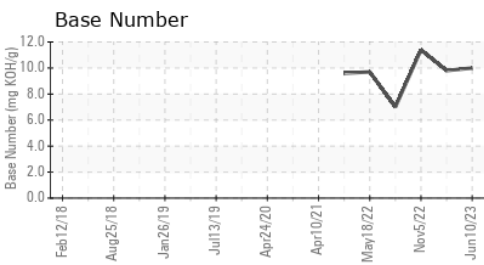
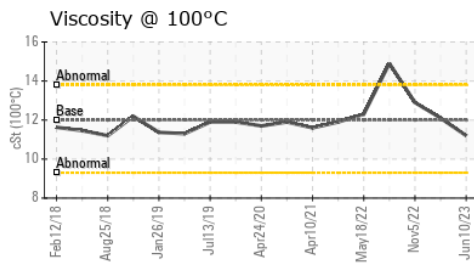
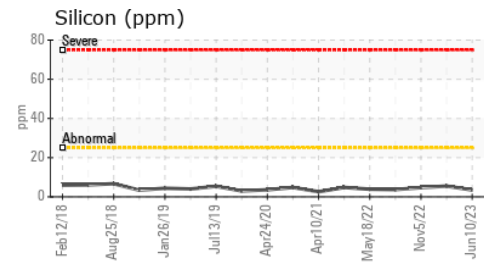
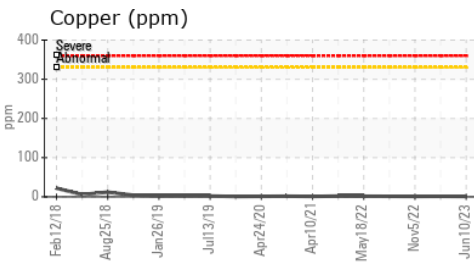
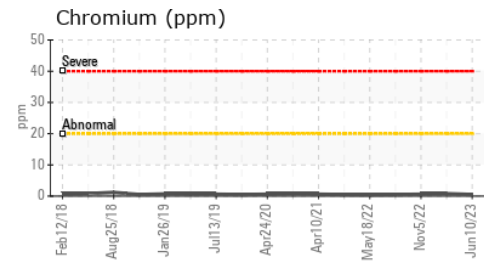
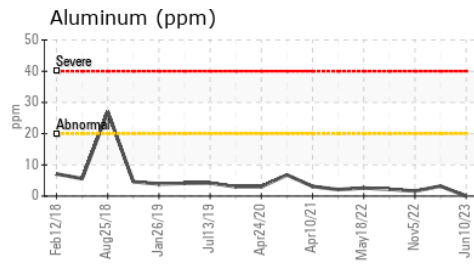
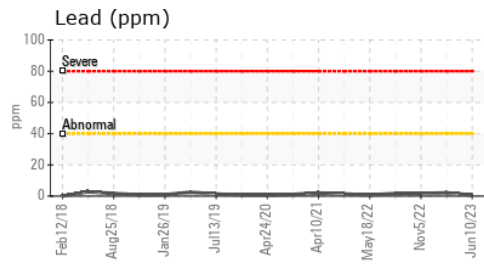
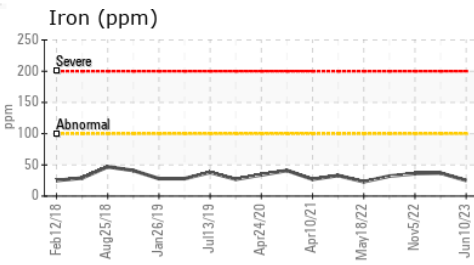
# OIL ANALYSIS REPORT



VISUAL	method	limit/base	current	history 1	history 2
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	>0.2	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history 1	history 2
Visc @ 100°C	cSt	ASTM D445	12.00	11.2	12.1

## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PCA0097787 **Received** : 03 Jul 2023  
**Lab Number** : 05888645 **Diagnosed** : 05 Jul 2023  
**Unique Number** : 10539128 **Diagnostician** : Wes Davis  
**Test Package** : MOB 1 ( Additional Tests: TBN )

63 REPAUPO STATION ROAD  
 LOGAN TOWNSHIP, NJ  
 US 08085  
 Contact: ED DAVIS  
 edavis@millertransgroup.com  
 T: (856)214-3521  
 F: (856)214-3663

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)