



# OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id  
**CUMMINS 1461405**  
 Component  
**Diesel Engine**  
 Fluid  
**MOBIL DELVAC 1300 SUPER15W40 (--- GAL)**

## RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>RPL0020383</b>	RPL0016117	---
Sample Date		Client Info		<b>17 May 2024</b>	15 Dec 2023	---
Machine Age	mls	Client Info		<b>43805</b>	0	---
Oil Age	mls	Client Info		<b>0</b>	24487	---
Filter Age	mls	Client Info		<b>0</b>	0	---
Oil Changed		Client Info		<b>Not Chngd</b>	Not Chngd	---
Filter Changed		Client Info		<b>Not Chngd</b>	N/A	---
Sample Status				<b>NORMAL</b>	ABNORMAL	---

## WEAR

Metal levels are typical for a new component breaking in.

Iron	ppm	ASTM D5185m	>90	<b>24</b>	45	---
Chromium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	2	---
Nickel	ppm	ASTM D5185m	>2	<b>&lt;1</b>	0	---
Titanium	ppm	ASTM D5185m	>2	<b>0</b>	<1	---
Silver	ppm	ASTM D5185m	>2	<b>&lt;1</b>	<1	---
Aluminum	ppm	ASTM D5185m	>20	<b>12</b>	15	---
Lead	ppm	ASTM D5185m	>40	<b>2</b>	3	---
Copper	ppm	ASTM D5185m	>330	<b>4</b>	16	---
Tin	ppm	ASTM D5185m	>15	<b>2</b>	2	---
Vanadium	ppm	ASTM D5185m		<b>&lt;1</b>	0	---
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	---

## CONTAMINATION

There is no indication of any contamination in the oil.

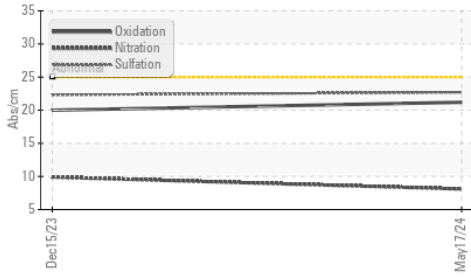
Silicon	ppm	ASTM D5185m	>25	<b>13</b>	40	---
Potassium	ppm	ASTM D5185m	>20	<b>39</b>	71	---
Fuel		WC Method	>3.0	<b>&lt;1.0</b>	0.9	---
Water		WC Method	>0.2	<b>NEG</b>	NEG	---
Glycol		WC Method		<b>NEG</b>	NEG	---
Soot %	%	*ASTM D7844	>6	<b>0.2</b>	0.2	---
Nitration	Abs/cm	*ASTM D7624	>20	<b>8.1</b>	9.9	---
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>22.7</b>	22.3	---
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Sand/Dirt	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Appearance	scalar	*Visual	NORML	<b>NORML</b>	NORML	---
Odor	scalar	*Visual	NORML	<b>NORML</b>	NORML	---
Emulsified Water	scalar	*Visual	>0.2	<b>NEG</b>	NEG	---

## FLUID CONDITION

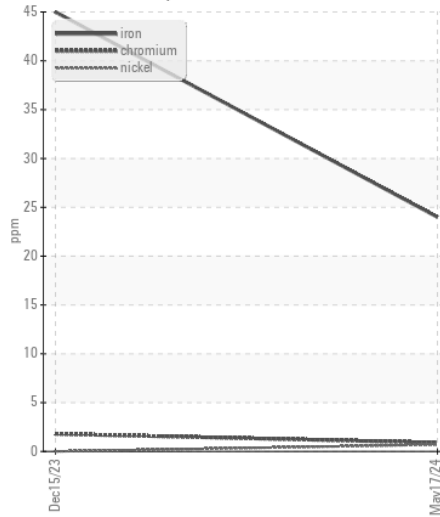
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m		<b>3</b>	6	---
Boron	ppm	ASTM D5185m	0	<b>43</b>	42	---
Barium	ppm	ASTM D5185m	0	<b>0</b>	5	---
Molybdenum	ppm	ASTM D5185m	0	<b>38</b>	26	---
Manganese	ppm	ASTM D5185m		<b>2</b>	4	---
Magnesium	ppm	ASTM D5185m	0	<b>591</b>	732	---
Calcium	ppm	ASTM D5185m		<b>1624</b>	1359	---
Phosphorus	ppm	ASTM D5185m		<b>749</b>	705	---
Zinc	ppm	ASTM D5185m		<b>941</b>	829	---
Sulfur	ppm	ASTM D5185m		<b>2897</b>	2749	---
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>21.2</b>	20.0	---
Base Number (BN)	mg KOH/g	ASTM D2896	9.4	<b>8.8</b>	5.3	---
Visc @ 100°C	cSt	ASTM D445	14	<b>12.8</b>	11.7	---

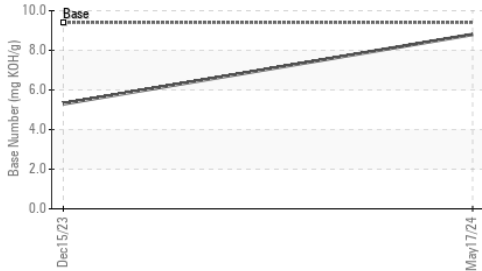
FT-IR (Direct Trend)



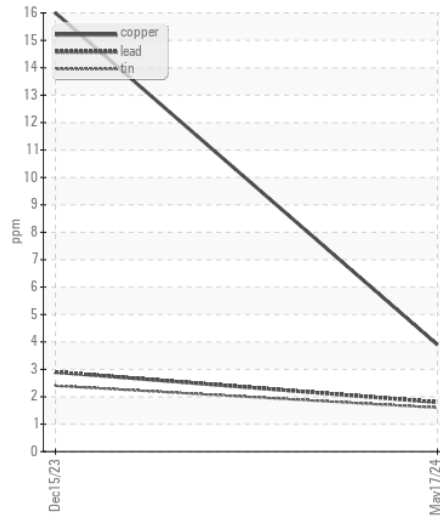
Ferrous Alloys



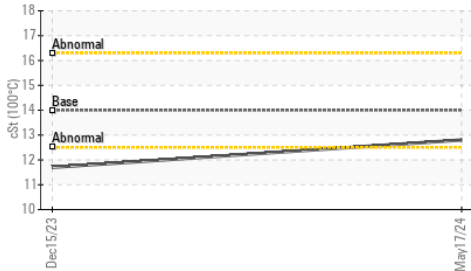
Base Number



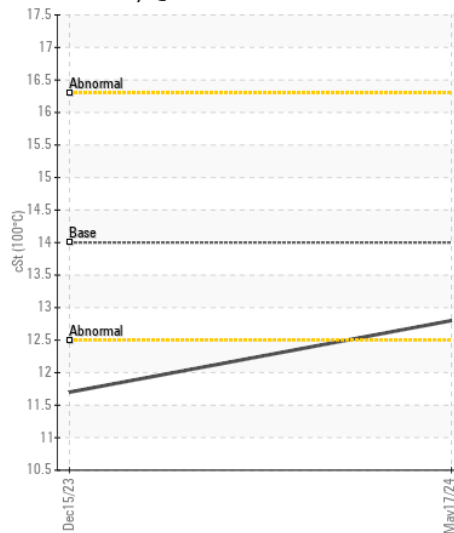
Non-ferrous Metals



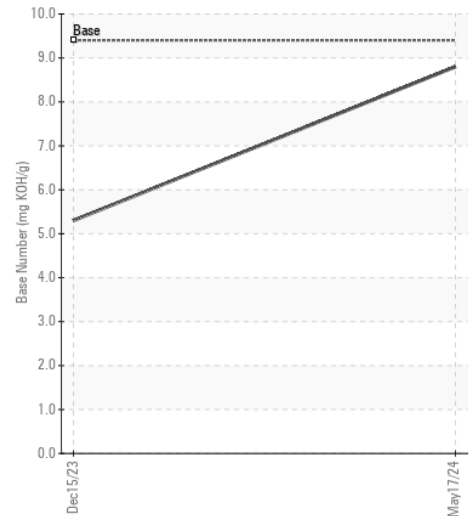
Viscosity @ 100°C



Viscosity @ 100°C



Base Number



Certificate L2367

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

Sample No. : RPL0020383

Lab Number : 06190184

Unique Number : 11046936

Test Package : FLEET

Received : 24 May 2024

Tested : 28 May 2024

Diagnosed : 28 May 2024 - Wes Davis

RTL PACLEASE - 7007 - Fontana

3121 South Riverside

Bloomington, CA

US 92316

Contact: Rudy Trevizo

TrevizoR@RushEnterprises.Com

T: (909)829-1044

F:

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)