



WEAR	<b>NORMAL</b>
CONTAMINATION	<b>NORMAL</b>
FLUID CONDITION	<b>NORMAL</b>



Machine Id  
**JOHN DEERE 245P 000398**  
 Component  
**Diesel Engine**  
 Fluid  
**{not provided} (--- GAL)**

### RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>JR0223154</b>	JR0204781	---
Sample Date		Client Info		<b>30 Jun 2024</b>	03 Mar 2024	---
Machine Age	hrs	Client Info		<b>974</b>	490	---
Oil Age	hrs	Client Info		<b>0</b>	0	---
Filter Age	hrs	Client Info		<b>0</b>	0	---
Oil Changed		Client Info		<b>N/A</b>	N/A	---
Filter Changed		Client Info		<b>N/A</b>	N/A	---
Sample Status				<b>NORMAL</b>	NORMAL	---

### WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>51	<b>7</b>	17	---
Chromium	ppm	ASTM D5185m	>11	<b>&lt;1</b>	<1	---
Nickel	ppm	ASTM D5185m	>5	<b>0</b>	0	---
Titanium	ppm	ASTM D5185m		<b>&lt;1</b>	0	---
Silver	ppm	ASTM D5185m	>3	<b>0</b>	0	---
Aluminum	ppm	ASTM D5185m	>31	<b>4</b>	4	---
Lead	ppm	ASTM D5185m	>26	<b>&lt;1</b>	<1	---
Copper	ppm	ASTM D5185m	>26	<b>4</b>	14	---
Tin	ppm	ASTM D5185m	>4	<b>2</b>	5	---
Vanadium	ppm	ASTM D5185m		<b>0</b>	<1	---
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.

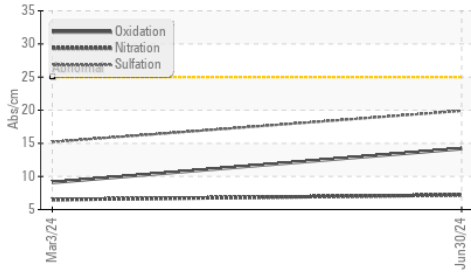
Silicon	ppm	ASTM D5185m	>22	<b>11</b>	27	---
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	4	---
Fuel		WC Method	>2.1	<b>&lt;1.0</b>	<1.0	---
Water		WC Method	>0.21	<b>NEG</b>	NEG	---
Glycol		WC Method		<b>NEG</b>	NEG	---
Soot %	%	*ASTM D7844	>3	<b>0.1</b>	0.1	---
Nitration	Abs/cm	*ASTM D7624	>20	<b>7.2</b>	6.5	---
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>19.9</b>	15.2	---
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	>0.21	<b>NEG</b>	NEG	---

### FLUID CONDITION

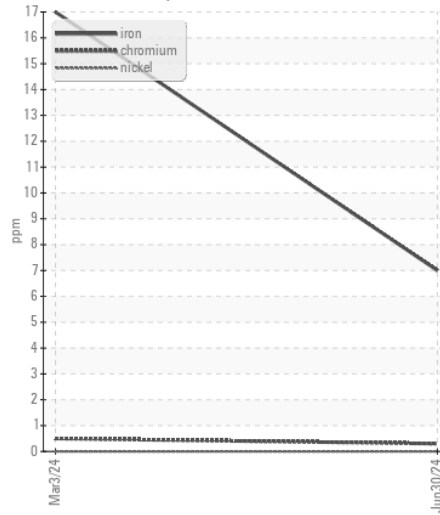
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m	>31	<b>1</b>	2	---
Boron	ppm	ASTM D5185m		<b>212</b>	192	---
Barium	ppm	ASTM D5185m		<b>&lt;1</b>	<1	---
Molybdenum	ppm	ASTM D5185m		<b>215</b>	8	---
Manganese	ppm	ASTM D5185m		<b>2</b>	4	---
Magnesium	ppm	ASTM D5185m		<b>782</b>	42	---
Calcium	ppm	ASTM D5185m		<b>1695</b>	2303	---
Phosphorus	ppm	ASTM D5185m		<b>992</b>	1040	---
Zinc	ppm	ASTM D5185m		<b>1197</b>	1220	---
Sulfur	ppm	ASTM D5185m		<b>3885</b>	2801	---
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>14.2</b>	9.1	---
Base Number (BN)	mg KOH/g	ASTM D2896		<b>8.9</b>	8.0	---
Visc @ 100°C	cSt	ASTM D445		<b>13.3</b>	13.0	---

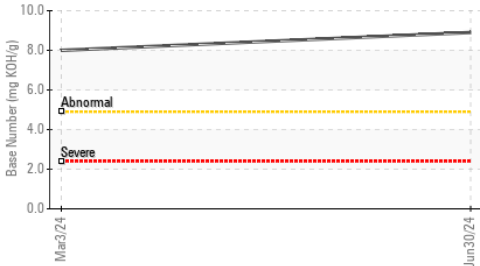
**FT-IR (Direct Trend)**



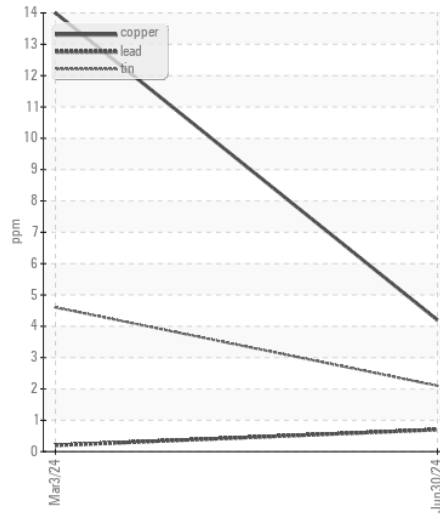
**Ferrous Alloys**



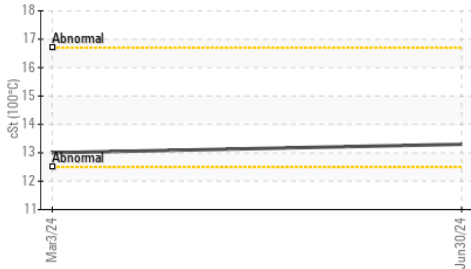
**Base Number**



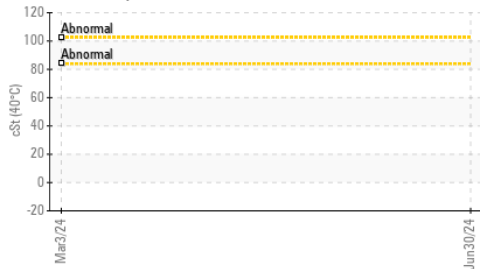
**Non-ferrous Metals**



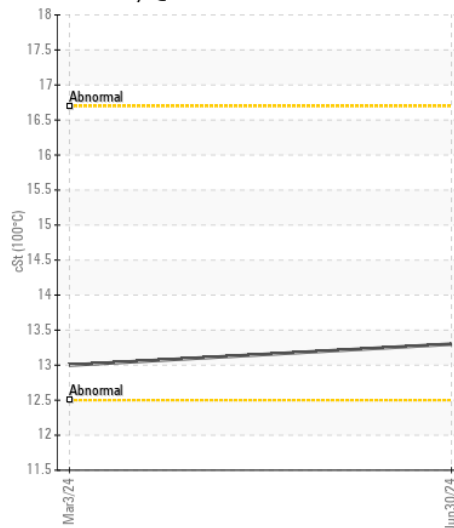
**Viscosity @ 100°C**



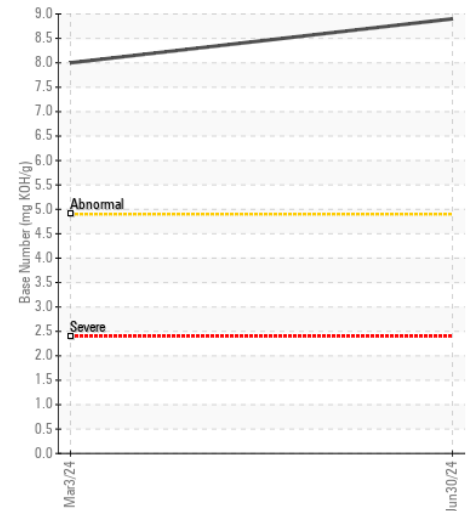
**Viscosity @ 40°C**



**Viscosity @ 100°C**



**Base Number**



Certificate L2367

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

**Sample No.** : JR0223154

**Lab Number** : 06224315

**Unique Number** : 11102512

**Test Package** : CONST ( Additional Tests: KV40, TBN )

**Received** : 01 Jul 2024

**Tested** : 02 Jul 2024

**Diagnosed** : 02 Jul 2024 - Jonathan Hester

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)

**JRE - GREENSBORO**

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