



# WEAR CHECK

## OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id  
**15298**  
Component  
**Diesel Engine**  
Fluid  
**EXXON 15W40 (--- QTS)**

### RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>WC0903531</b>	WC0858293	WC0858255
Sample Date		Client Info		<b>14 Feb 2024</b>	05 Dec 2023	10 Oct 2023
Machine Age	mls	Client Info		<b>213289</b>	207021	185905
Oil Age	mls	Client Info		<b>6268</b>	21116	22728
Filter Age	mls	Client Info		<b>6268</b>	21116	22728
Oil Changed		Client Info		<b>Changed</b>	Changed	Changed
Filter Changed		Client Info		<b>Changed</b>	Changed	Changed
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

### WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>100	<b>14</b>	15	20
Chromium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	<1	<1
Nickel	ppm	ASTM D5185m	>4	<b>6</b>	<1	<1
Titanium	ppm	ASTM D5185m		<b>0</b>	0	<1
Silver	ppm	ASTM D5185m	>3	<b>0</b>	<1	0
Aluminum	ppm	ASTM D5185m	>20	<b>3</b>	3	4
Lead	ppm	ASTM D5185m	>40	<b>&lt;1</b>	1	2
Copper	ppm	ASTM D5185m	>330	<b>5</b>	5	7
Tin	ppm	ASTM D5185m	>15	<b>&lt;1</b>	1	1
Vanadium	ppm	ASTM D5185m		<b>0</b>	<1	0
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE

### CONTAMINATION

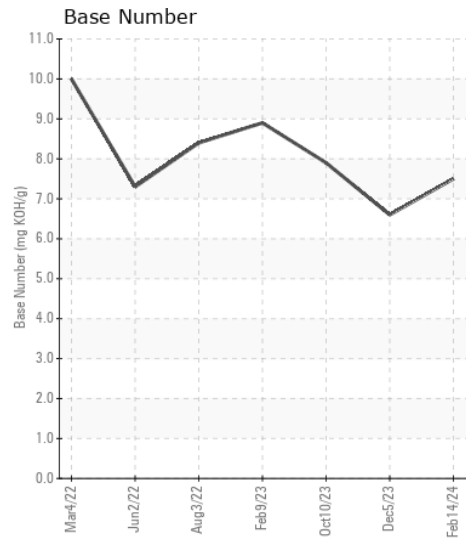
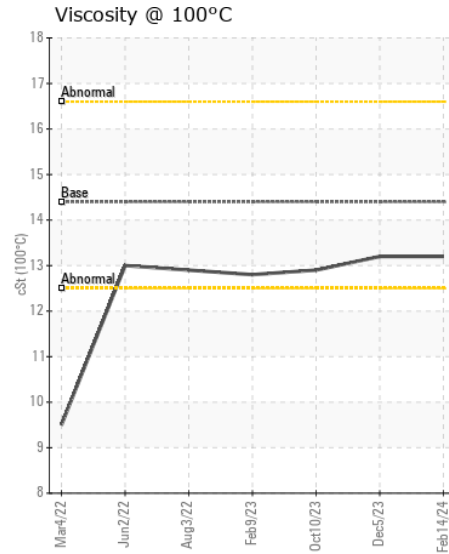
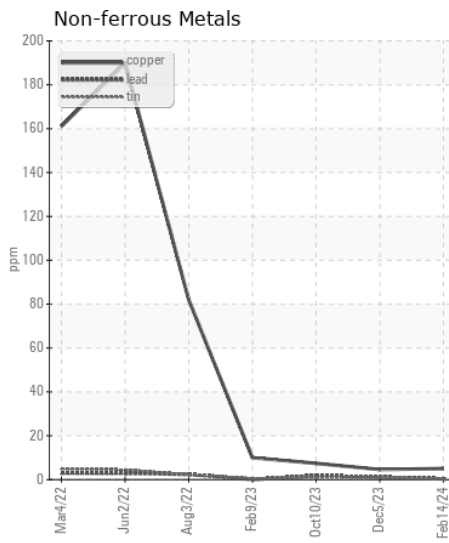
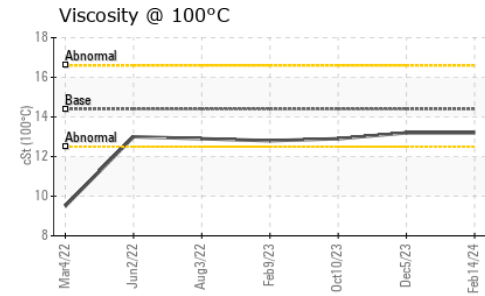
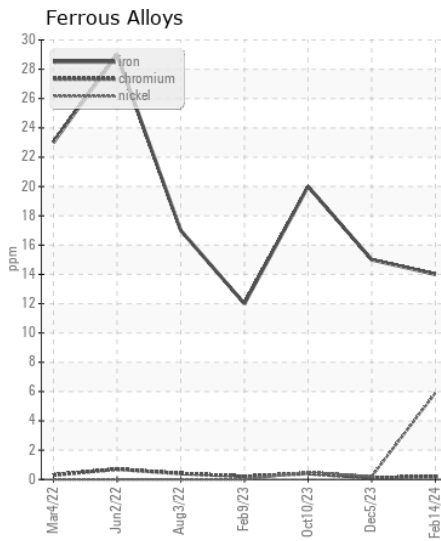
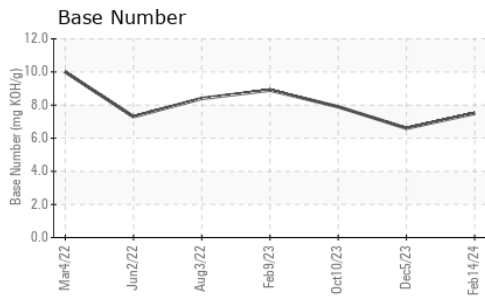
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>25	<b>6</b>	5	6
Potassium	ppm	ASTM D5185m	>20	<b>2</b>	2	5
Fuel		WC Method	>5	<b>&lt;1.0</b>	<1.0	<1.0
Water		WC Method	>0.2	<b>NEG</b>	NEG	NEG
Glycol		WC Method		<b>NEG</b>	NEG	NEG
Soot %	%	*ASTM D7844	>3	<b>0.2</b>	0.4	0.4
Nitration	Abs/cm	*ASTM D7624	>20	<b>6.3</b>	8.0	8.7
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>20.9</b>	22.2	20.3
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Appearance	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Odor	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	<b>NEG</b>	NEG	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>2</b>	<1	<1
Boron	ppm	ASTM D5185m		<b>392</b>	177	2
Barium	ppm	ASTM D5185m		<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m		<b>88</b>	79	71
Manganese	ppm	ASTM D5185m		<b>&lt;1</b>	<1	0
Magnesium	ppm	ASTM D5185m		<b>480</b>	497	945
Calcium	ppm	ASTM D5185m		<b>1474</b>	1276	1141
Phosphorus	ppm	ASTM D5185m		<b>1149</b>	1058	1069
Zinc	ppm	ASTM D5185m		<b>1341</b>	1251	1260
Sulfur	ppm	ASTM D5185m		<b>3516</b>	3100	3829
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>14.6</b>	16.1	15.6
Base Number (BN)	mg KOH/g	ASTM D2896		<b>7.5</b>	6.6	7.9
Visc @ 100°C	cSt	ASTM D445	14.4	<b>13.2</b>	13.2	12.9



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : WC0903531 **Received** : 28 Feb 2024  
**Lab Number** : 06103524 **Tested** : 01 Mar 2024  
**Unique Number** : 10901754 **Diagnosed** : 02 Mar 2024 - Don Baldrige  
**Test Package** : FLEET

**SALEM NATIONALEASE CORPORATION**  
 198 PARK PLAZA DRIVE  
 WINSTON SALEM, NC  
 US 27105  
 Contact: Audrey Hopkins  
 Audrey.Hopkins@salemcorp.com  
 T: (336)767-9642  
 F: x:

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)