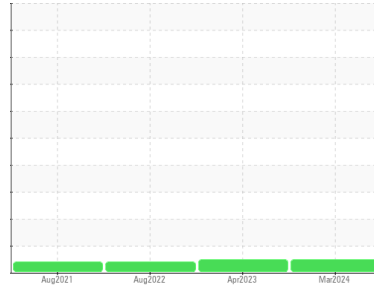


# OIL ANALYSIS REPORT

Sample Rating Trend

**NORMAL**



Area  
**(T513197) 600HP [0014931]**  
Machine Id  
**482313 [600HP]**  
Component  
**Diesel Engine**  
Fluid  
**DIESEL ENGINE OIL SAE 10W30 (--- GAL)**

## DIAGNOSIS

### Recommendation

Oil and filter change at the time of sampling has been noted. 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 acceptable for the time in service.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			<b>PCA0101234</b>	PCA0073102	PCA0067710
Sample Date	Client Info			<b>05 Mar 2024</b>	12 Apr 2023	11 Aug 2022
Machine Age	hrs	Client Info		<b>34760</b>	30995	27698
Oil Age	hrs	Client Info		<b>3000</b>	3000	3500
Oil Changed	Client Info			<b>Changed</b>	Changed	Changed
Sample Status				<b>NORMAL</b>	NORMAL	ATTENTION

CONTAMINATION		method	limit/base	current	history1	history2
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

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>100	<b>38</b>	26	31
Chromium	ppm	ASTM D5185m	>20	<b>1</b>	<1	<1
Nickel	ppm	ASTM D5185m	>4	<b>&lt;1</b>	0	<1
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>4</b>	2	2
Lead	ppm	ASTM D5185m	>40	<b>&lt;1</b>	0	0
Copper	ppm	ASTM D5185m	>330	<b>&lt;1</b>	<1	<1
Tin	ppm	ASTM D5185m	>15	<b>&lt;1</b>	0	<1
Antimony	ppm	ASTM D5185m		<b>---</b>	---	---
Vanadium	ppm	ASTM D5185m		<b>0</b>	0	0
Cadmium	ppm	ASTM D5185m		<b>0</b>	0	0

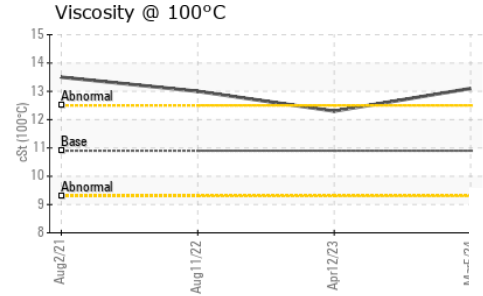
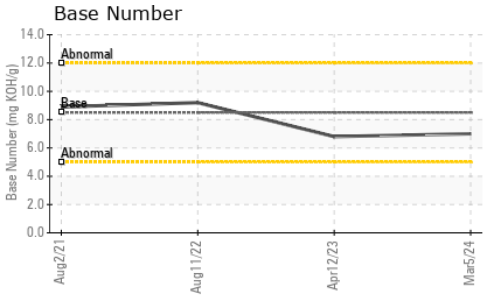
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	250	<b>13</b>	6	140
Barium	ppm	ASTM D5185m	10	<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m	100	<b>66</b>	65	79
Manganese	ppm	ASTM D5185m		<b>&lt;1</b>	<1	<1
Magnesium	ppm	ASTM D5185m	450	<b>1039</b>	1025	830
Calcium	ppm	ASTM D5185m	3000	<b>1185</b>	1160	1231
Phosphorus	ppm	ASTM D5185m	1150	<b>1151</b>	1091	934
Zinc	ppm	ASTM D5185m	1350	<b>1381</b>	1351	1203
Sulfur	ppm	ASTM D5185m	4250	<b>3295</b>	3655	2739

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>25	<b>6</b>	4	6
Sodium	ppm	ASTM D5185m		<b>7</b>	4	2
Potassium	ppm	ASTM D5185m	>20	<b>2</b>	0	0

INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844	>3	<b>1.6</b>	1	1.3
Nitration	Abs/cm	*ASTM D7624	>20	<b>14.3</b>	11.9	13.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>27.4</b>	22.6	27.8

FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>30.6</b>	25.0	28.1
Base Number (BN)	mg KOH/g	ASTM D2896	8.5	<b>7.0</b>	6.8	9.2

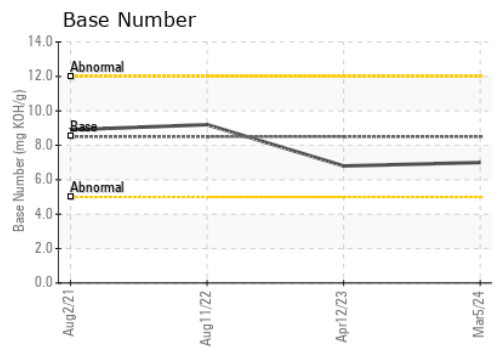
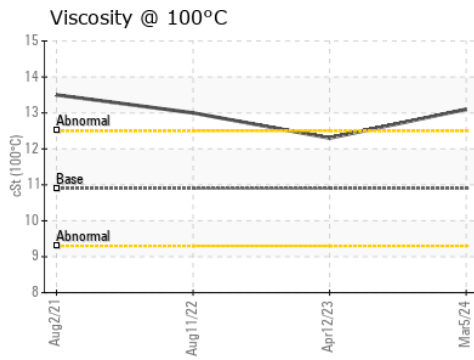
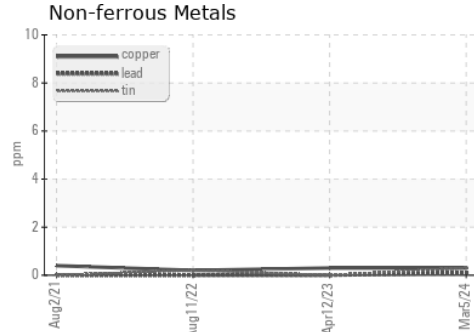
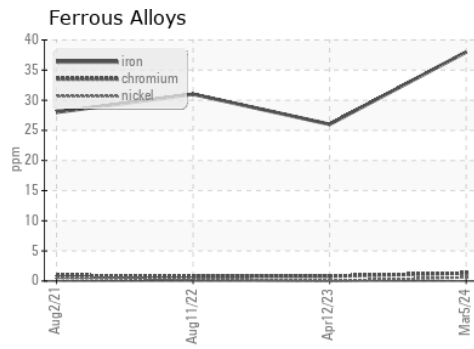
# OIL ANALYSIS REPORT



VISUAL	method	limit/base	current	history1	history2
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	history1	history2	
Visc @ 100°C	cSt	ASTM D445	10.9	<b>13.1</b>	12.3	13.0

## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PCA0101234 **Received** : 18 Mar 2024  
**Lab Number** : **06121381** **Tested** : 19 Mar 2024  
**Unique Number** : 10930214 **Diagnosed** : 20 Mar 2024 - Don Baldrige  
**Test Package** : FLEET

**McLane Company - High Plains - 600HP**  
 1717 East Loop 289  
 LUBBOCK, TX  
 US 79403  
 Contact: RITA GARCIA  
 rita.garcia@mcclaneco.com  
 T: (806)766-2902  
 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)