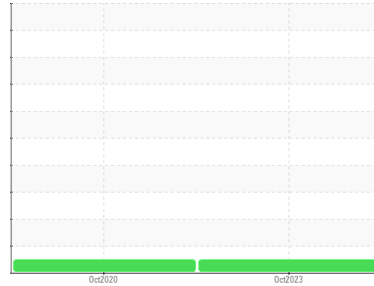




# OIL ANALYSIS REPORT

Sample Rating Trend



**NORMAL**



Machine Id  
**212**  
 Component  
**Hydraulic System**  
 Fluid  
**NOT GIVEN (--- GAL)**

## DIAGNOSIS

### Recommendation

Resample at the next service interval to monitor. Please specify the brand, type, and viscosity of the oil on your next sample.

### Wear

All component wear rates are normal.

### Contamination

The amount and size of particulates present in the system are acceptable. There is no indication of any contamination in the oil.

### Fluid Condition

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

## SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		<b>WC0854099</b>	WC0512301	---
Sample Date	Client Info		<b>31 Oct 2023</b>	27 Oct 2020	---
Machine Age	hrs	Client Info	<b>0</b>	0	---
Oil Age	hrs	Client Info	<b>0</b>	0	---
Oil Changed	Client Info		<b>N/A</b>	N/A	---
Sample Status			<b>NORMAL</b>	NORMAL	---

## WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >20	<b>2</b>	3	---
Chromium	ppm	ASTM D5185m >20	<b>0</b>	<1	---
Nickel	ppm	ASTM D5185m >20	<b>0</b>	0	---
Titanium	ppm	ASTM D5185m	<b>0</b>	<1	---
Silver	ppm	ASTM D5185m	<b>0</b>	<1	---
Aluminum	ppm	ASTM D5185m >20	<b>&lt;1</b>	0	---
Lead	ppm	ASTM D5185m >20	<b>2</b>	2	---
Copper	ppm	ASTM D5185m >20	<b>1</b>	2	---
Tin	ppm	ASTM D5185m >20	<b>&lt;1</b>	<1	---
Antimony	ppm	ASTM D5185m	<b>---</b>	0	---
Vanadium	ppm	ASTM D5185m	<b>0</b>	0	---
Cadmium	ppm	ASTM D5185m	<b>&lt;1</b>	<1	---

## ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	<b>3</b>	6	---
Barium	ppm	ASTM D5185m	<b>0</b>	0	---
Molybdenum	ppm	ASTM D5185m	<b>2</b>	3	---
Manganese	ppm	ASTM D5185m	<b>&lt;1</b>	<1	---
Magnesium	ppm	ASTM D5185m	<b>36</b>	32	---
Calcium	ppm	ASTM D5185m	<b>3128</b>	3357	---
Phosphorus	ppm	ASTM D5185m	<b>1246</b>	1290	---
Zinc	ppm	ASTM D5185m	<b>1274</b>	1229	---
Sulfur	ppm	ASTM D5185m	<b>4696</b>	4367	---

## CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >15	<b>4</b>	3	---
Sodium	ppm	ASTM D5185m	<b>1</b>	0	---
Potassium	ppm	ASTM D5185m >20	<b>2</b>	2	---

## FLUID CLEANLINESS

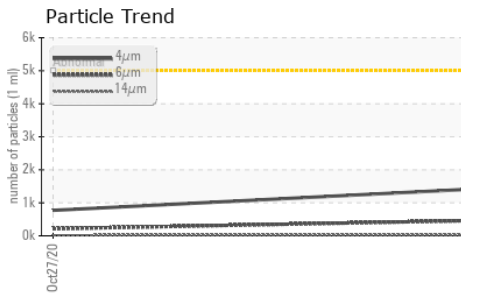
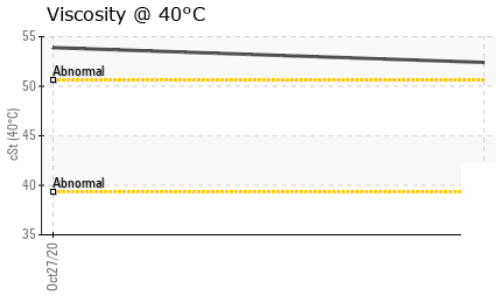
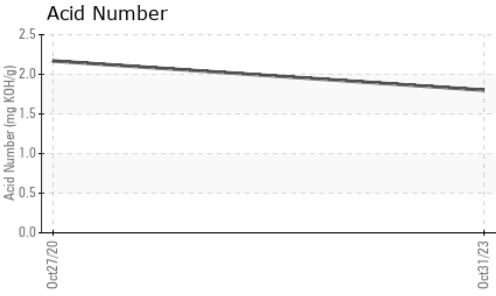
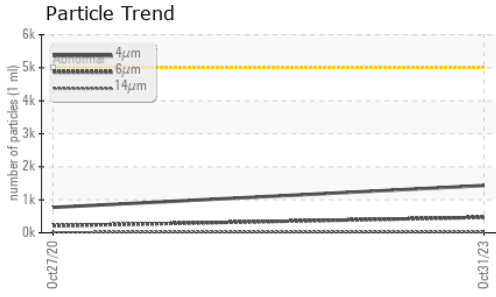
	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>5000	<b>1433</b>	772	---
Particles >6µm	ASTM D7647	>1300	<b>469</b>	213	---
Particles >14µm	ASTM D7647	>160	<b>24</b>	17	---
Particles >21µm	ASTM D7647	>40	<b>4</b>	3	---
Particles >38µm	ASTM D7647	>10	<b>0</b>	0	---
Particles >71µm	ASTM D7647	>3	<b>0</b>	0	---
Oil Cleanliness	ISO 4406 (c)	>19/17/14	<b>18/16/12</b>	17/15/11	---

## FLUID DEGRADATION

	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045	<b>1.80</b>	2.169	---



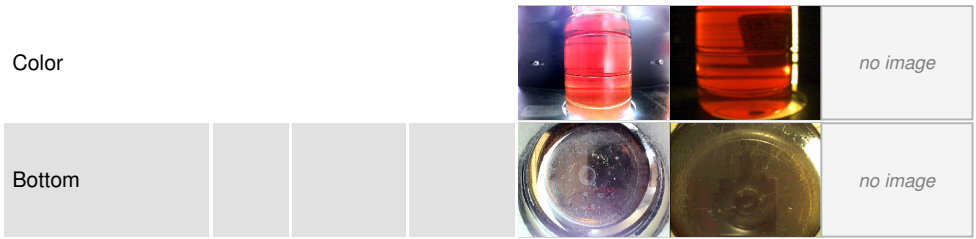
# OIL ANALYSIS REPORT



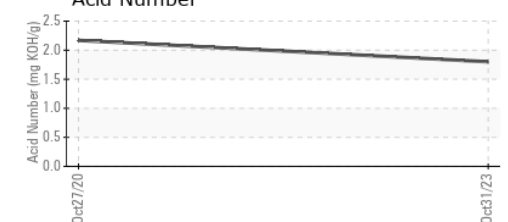
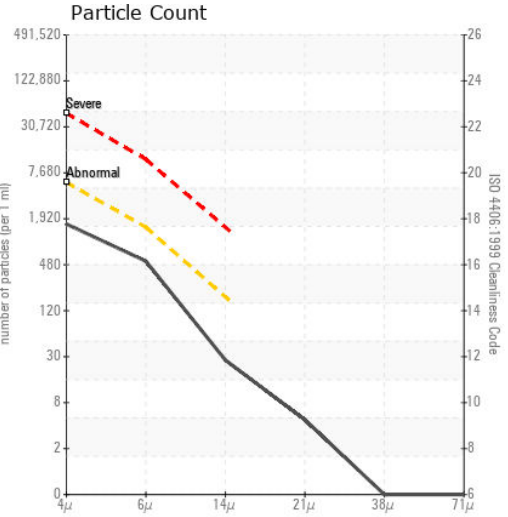
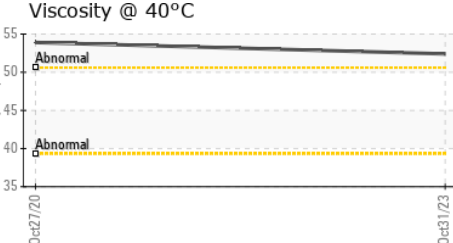
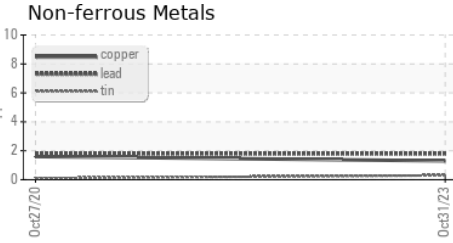
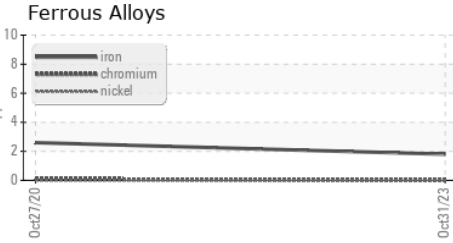
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	---
Yellow Metal	scalar	*Visual	NONE	NONE	---
Precipitate	scalar	*Visual	NONE	NONE	---
Silt	scalar	*Visual	NONE	NONE	---
Debris	scalar	*Visual	NONE	NONE	---
Sand/Dirt	scalar	*Visual	NONE	NONE	---
Appearance	scalar	*Visual	NORML	NORML	---
Odor	scalar	*Visual	NORML	NORML	---
Emulsified Water	scalar	*Visual	>0.05	NEG	---
Free Water	scalar	*Visual		NEG	---

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	<b>52.4</b>	53.9	---

SAMPLE IMAGES	method	limit/base	current	history1	history2
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## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : WC0854099 **Received** : 01 Nov 2023  
**Lab Number** : **05995541** **Diagnosed** : 02 Nov 2023  
**Unique Number** : 10723901 **Diagnostician** : Don Baldrige  
**Test Package** : PLANT

**ENGINEERED MECHANICAL SYSTEM**  
 118 PARMENAS LN  
 CHATTANOOGA, TN  
 US 37405  
 Contact: DAVID HUSKY  
 dhusky@emsfab.com

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)