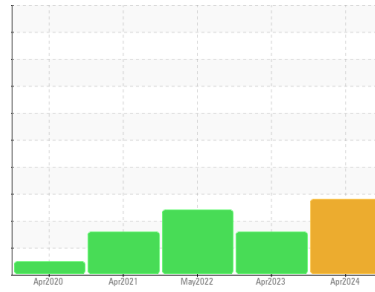




# OIL ANALYSIS REPORT

Sample Rating Trend



DIRT



Machine Id

**77AY01**

Component

**Hydraulic System**

Fluid

**KLUBER KLUBEROIL 4 UH1-68 N (10 GAL)**

## DIAGNOSIS

### Recommendation

No corrective action is recommended at this time. Resample at the next service interval to monitor.

### Wear

All component wear rates are normal.

### Contamination

There is a moderate amount of silt (particulates < 14 microns in size) present in the oil. Elemental level of silicon (Si) above normal.

### 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>WC0907811</b>	WC0792585	WC0664347
Sample Date	Client Info		<b>03 Apr 2024</b>	29 Apr 2023	08 May 2022
Machine Age	yrs	Client Info	<b>0</b>	0	0
Oil Age	yrs	Client Info	<b>0</b>	0	0
Oil Changed	Client Info		<b>N/A</b>	N/A	N/A
Sample Status			<b>ABNORMAL</b>	ABNORMAL	ABNORMAL

## WEAR METALS

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

## ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	<b>0</b>	0	1
Barium	ppm	ASTM D5185m	<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m	<b>0</b>	0	0
Manganese	ppm	ASTM D5185m	<b>0</b>	<1	<1
Magnesium	ppm	ASTM D5185m	<b>&lt;1</b>	4	1
Calcium	ppm	ASTM D5185m	<b>5</b>	0	1
Phosphorus	ppm	ASTM D5185m	<b>722</b>	673	686
Zinc	ppm	ASTM D5185m	<b>4</b>	1	4
Sulfur	ppm	ASTM D5185m	<b>776</b>	974	638

## CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >15	<b>▲ 53</b>	▲ 17	9
Sodium	ppm	ASTM D5185m	<b>&lt;1</b>	<1	0
Potassium	ppm	ASTM D5185m >20	<b>&lt;1</b>	1	0
Water	%	ASTM D6304 >0.05	<b>0.003</b>	0.001	0.001
ppm Water	ppm	ASTM D6304 >500	<b>36</b>	13.2	4.0

## FLUID CLEANLINESS

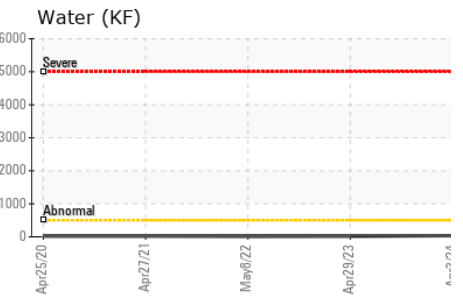
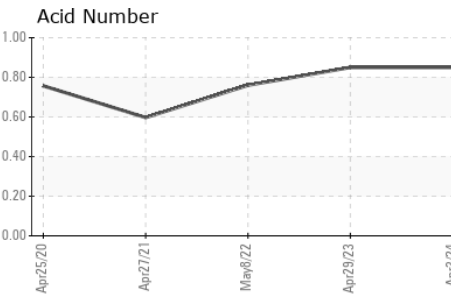
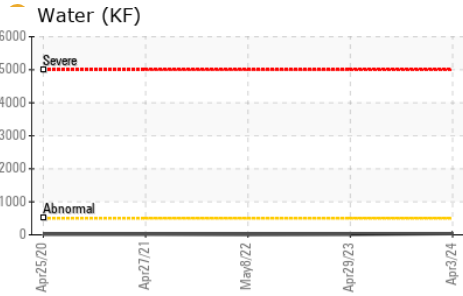
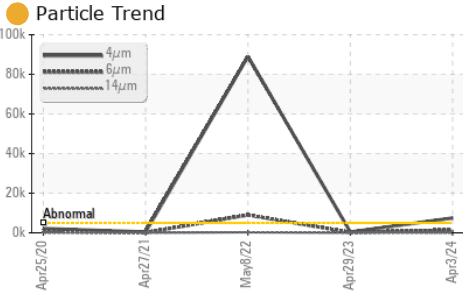
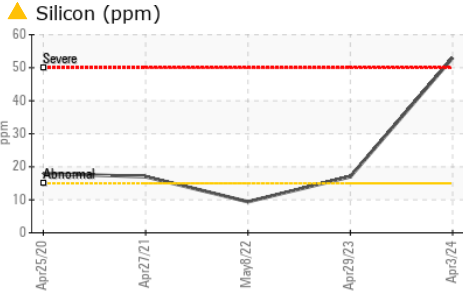
	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>5000	<b>● 7473</b>	390	▲ 88978
Particles >6µm	ASTM D7647	>1300	<b>● 1400</b>	152	▲ 9016
Particles >14µm	ASTM D7647	>160	<b>67</b>	15	▲ 273
Particles >21µm	ASTM D7647	>40	<b>16</b>	5	▲ 89
Particles >38µm	ASTM D7647	>10	<b>0</b>	0	▲ 11
Particles >71µm	ASTM D7647	>3	<b>0</b>	0	0
Oil Cleanliness	ISO 4406 (c)	>19/17/14	<b>● 20/18/13</b>	16/14/11	▲ 24/20/15

## FLUID DEGRADATION

	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045	<b>0.85</b>	0.85	0.76



# OIL ANALYSIS REPORT



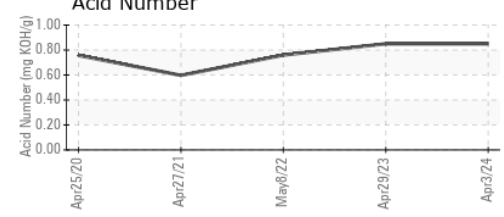
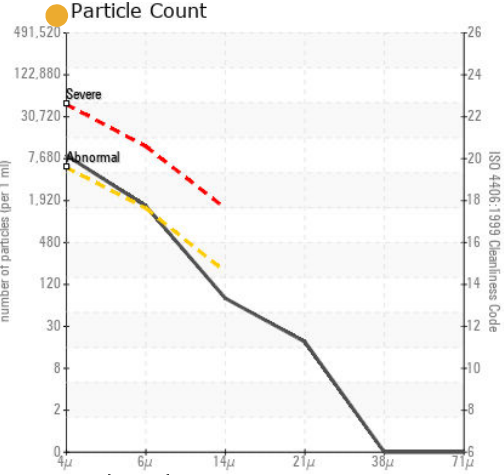
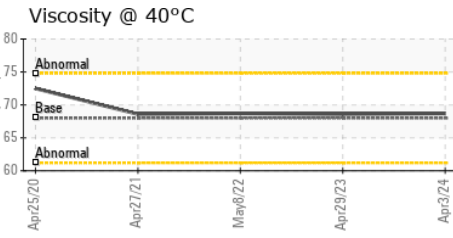
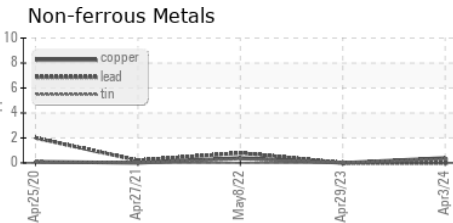
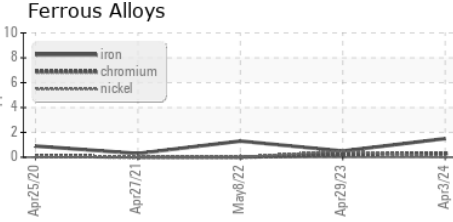
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance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

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	68	68.7	68.6

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



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : WC0907811      **Received** : 08 Apr 2024  
**Lab Number** : 06141327      **Tested** : 09 Apr 2024  
**Unique Number** : 10966135      **Diagnosed** : 10 Apr 2024 - Don Baldrige  
**Test Package** : IND 2 ( Additional Tests: KF )

**GRIFOLS TALECRIS PHARMACEUTICAL**  
 8368 US 70 WEST  
 CLAYTON, NC  
 US 27520  
 Contact: KEN TERRY  
 kenneth.terry@grifols.com  
 T: (919)359-4362  
 F: (919)359-4767

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)