



# OIL ANALYSIS REPORT

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



Area  
**AMR-Sedalia**  
 Machine Id  
**233141 LIEBHERR LH50M 1203-75764**  
 Component  
**Gearbox**  
 Fluid  
**LIEBHERR GEAR BASIC 90 LS (1 GAL)**

## RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>DJJ0019070</b>	DJJ0003468	DJJ0006232
Sample Date		Client Info		<b>09 Apr 2024</b>	24 Nov 2021	25 Aug 2021
Machine Age	hrs	Client Info		<b>14835</b>	11100	10566
Oil Age	hrs	Client Info		<b>250</b>	250	250
Filter Age	hrs	Client Info		<b>0</b>	0	0
Oil Changed		Client Info		<b>Changed</b>	Changed	Changed
Filter Changed		Client Info		<b>N/A</b>	N/A	N/A
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

## WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>200	<b>23</b>	4	5
Chromium	ppm	ASTM D5185m	>10	<b>&lt;1</b>	<1	<1
Nickel	ppm	ASTM D5185m	>10	<b>0</b>	<1	<1
Titanium	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Silver	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Aluminum	ppm	ASTM D5185m	>25	<b>&lt;1</b>	0	<1
Lead	ppm	ASTM D5185m	>50	<b>&lt;1</b>	<1	0
Copper	ppm	ASTM D5185m	>200	<b>&lt;1</b>	<1	<1
Tin	ppm	ASTM D5185m	>10	<b>0</b>	0	0
Vanadium	ppm	ASTM D5185m		<b>&lt;1</b>	<1	0
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	VLITE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE

## CONTAMINATION

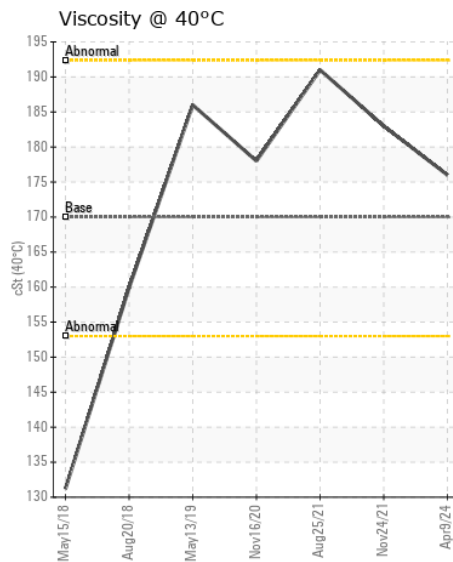
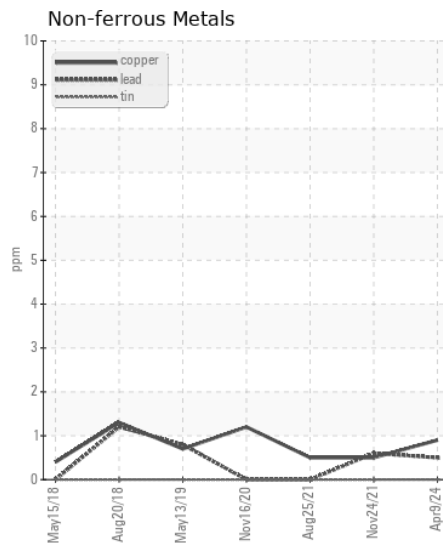
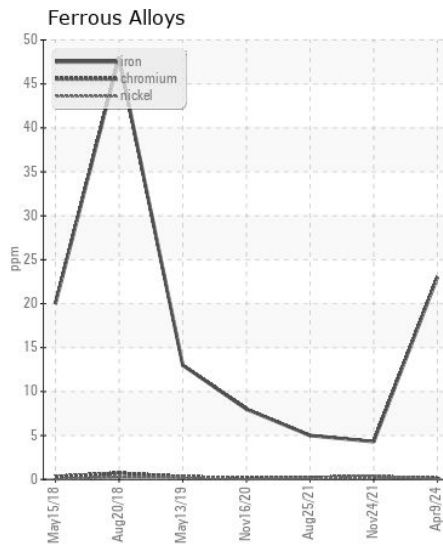
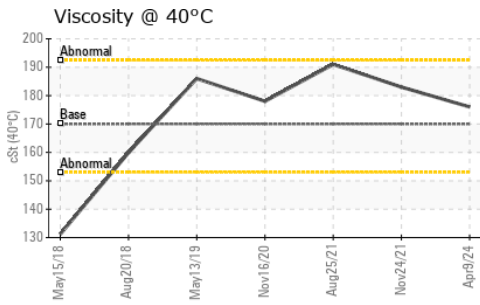
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>50	<b>1</b>	1	1
Potassium	ppm	ASTM D5185m	>20	<b>2</b>	8	6
Water		WC Method	>0.2	<b>NEG</b>	NEG	NEG
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 condition of the oil is acceptable for the time in service.

Sodium	ppm	ASTM D5185m		<b>5</b>	2	3
Boron	ppm	ASTM D5185m	0	<b>0</b>	20	28
Barium	ppm	ASTM D5185m	0	<b>4</b>	0	0
Molybdenum	ppm	ASTM D5185m	0	<b>0</b>	<1	0
Manganese	ppm	ASTM D5185m	0	<b>&lt;1</b>	0	0
Magnesium	ppm	ASTM D5185m	<1	<b>4</b>	<1	0
Calcium	ppm	ASTM D5185m	<1	<b>42</b>	7	3
Phosphorus	ppm	ASTM D5185m	2143	<b>1609</b>	2134	2100
Zinc	ppm	ASTM D5185m	<1	<b>38</b>	13	14
Sulfur	ppm	ASTM D5185m	23468	<b>44504</b>	31208	22632
Visc @ 40°C	cSt	ASTM D445	170	<b>176</b>	183	191



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : DJJ0019070  
**Lab Number** : 06150725  
**Unique Number** : 10980803  
**Test Package** : CONST

**Received** : 16 Apr 2024  
**Tested** : 17 Apr 2024  
**Diagnosed** : 18 Apr 2024 - Don Baldrige

**ADVANTAGE METALS RECYCLING - SEDALIA**  
 300 N IRON AVE  
 SEDALIA, MO  
 US 65301

Contact: SCOTT TUTTLE  
 scott.tuttle@advantagerecycling.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)

T: (660)827-1873  
 F: (660)827-5304