

# LIEBHERR

## CONSTRUCTION EQUIPMENT



### [[SEAGATE TERMINALS]] - Swing Drive

Sample No: LH0273461

Oil Type: LIEBHERR GEAR BASIC 90 LS



#### Sample Information

Sample Number	LH0273461	LH0200586	---	---
Sample Date	10 May 2024	02 Mar 2022	---	---
Machine Hours	1901	415	---	---
Oil Hours	0	415	---	---
Oil Changed	Changed	Changed	---	---
Sample Status	NORMAL	NORMAL	---	---

#### LIEBHERR EQUIPMENT SOURCE

10119 RESIDENCY ROAD  
 MANASSAS, VA  
 US 20110  
 Contact: TOM HEINEY  
 tom.heiney@liebherr.com  
 T: (703)392-0111  
 F: (703)331-5604



#### Oil Condition

Visc @ 40°C	cSt	● 196	● 170	---	---
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#### Contamination

Water	%	NEG	NEG	---	---
Silicon	ppm	● 5	● 1	---	---
Sodium	ppm	● 3	● 4	---	---
Potassium	ppm	● 0	● <1	---	---

#### Diagnosis

Resample at the next service interval to monitor. All component wear rates are normal. There is no indication of any contamination in the oil. The condition of the oil is acceptable for the time in service.



#### Wear Metals

Iron	ppm	● 187	● 54	---	---
Copper	ppm	● 55	● 13	---	---
Lead	ppm	● 0	● 0	---	---
Tin	ppm	● 2	● <1	---	---
Aluminum	ppm	● 0	● <1	---	---
Chromium	ppm	● <1	● <1	---	---
Molybdenum	ppm	● 0	● <1	---	---
Nickel	ppm	● 0	● <1	---	---
Titanium	ppm	0	0	---	---
Silver	ppm	0	<1	---	---
Manganese	ppm	● 2	● <1	---	---
Vanadium	ppm	0	0	---	---



#### Additives

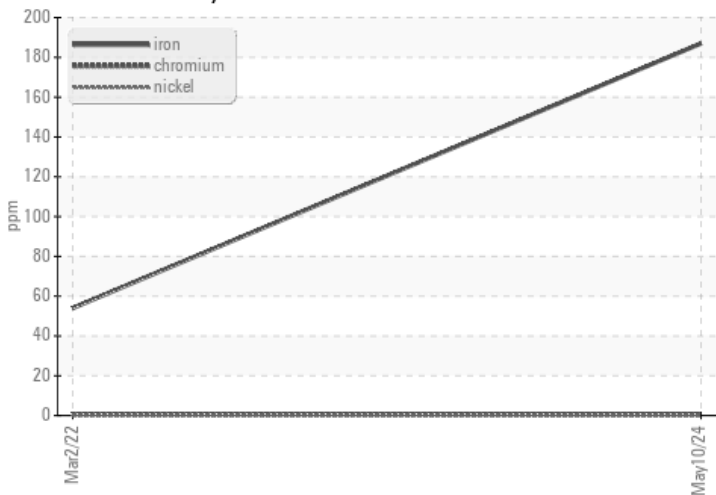
Calcium	ppm	● 34	● 136	---	---
Magnesium	ppm	● 0	● 0	---	---
Zinc	ppm	● 17	● 50	---	---
Phosphorus	ppm	● 2407	● 2315	---	---
Barium	ppm	● 0	● 0	---	---
Boron	ppm	● 5	● 6	---	---

Depot: LIEBHERRVA  
 Unique No: 11044865  
 Signed: Sean Felton  
 Report Date: 24 May 2024

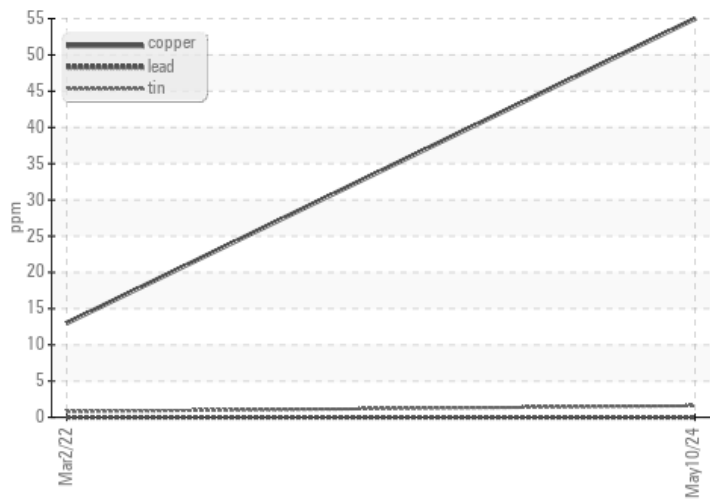


### Graphs

#### Ferrous Alloys



#### Non-ferrous Metals



#### Viscosity @ 40°C

