

LIEBHERR

CONSTRUCTION EQUIPMENT



LIEBHERR LH50M 1216-108671 - Hydraulic System

Sample No: LH0258757

Oil Type: LIEBHERR HYDRAULIC HVI



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SAMPLE INFORMATION

Sample Number	LH0258757	LH0272498	LH0263995	LH0272540
Sample Date	23 Feb 2024	17 Jan 2024	14 Dec 2023	01 Nov 2023
Machine Hours	20036	19562	19125	18598
Oil Hours	0	0	0	0
Oil Changed	Not Changd	Not Changd	Not Changd	Not Changd
Sample Status	NORMAL	NORMAL	NORMAL	NORMAL



OIL CONDITION

Visc @ 40°C	cSt	41.8	41.49	43.4	41.5
Acid Number (AN)	mg KOH/g	0.65	1.27	0.68	0.72



CONTAMINATION

Water	%	NEG	NEG	NEG	NEG
Particles >4µm		396	1254	1993	1621
Particles >6µm		76	248	377	507
Particles >14µm		6	14	22	34
ISO 4406:1999 (c)		16/13/10	17/15/11	18/16/12	18/16/12
Silicon	ppm	1	1	<1	<1
Sodium	ppm	1	2	4	2
Potassium	ppm	2	<1	0	0



WEAR METALS

Iron	ppm	41	36	34	31
Copper	ppm	4	3	3	2
Lead	ppm	0	2	<1	0
Tin	ppm	0	1	<1	0
Aluminum	ppm	2	<1	0	0
Chromium	ppm	<1	1	<1	<1
Molybdenum	ppm	1	1	1	<1
Nickel	ppm	0	<1	0	0
Titanium	ppm	<1	<1	<1	<1
Silver	ppm	0	0	0	0
Manganese	ppm	0	<1	<1	<1
Vanadium	ppm	0	<1	<1	0



ADDITIVES

Calcium	ppm	567	585	518	522
Magnesium	ppm	15	12	2	14
Zinc	ppm	580	625	506	534
Phosphorus	ppm	423	470	405	446
Barium	ppm	0	0	0	0
Boron	ppm	3	5	3	3

Diagnosis

Resample at the next service interval to monitor. All component wear rates are normal. The amount and size of particulates present in the system are acceptable. There is no indication of any contamination in the oil. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

Depot: LEC0008
 Unique No: 10915579
 Signed: Don Baldrige
 Report Date: 10 Mar 2024

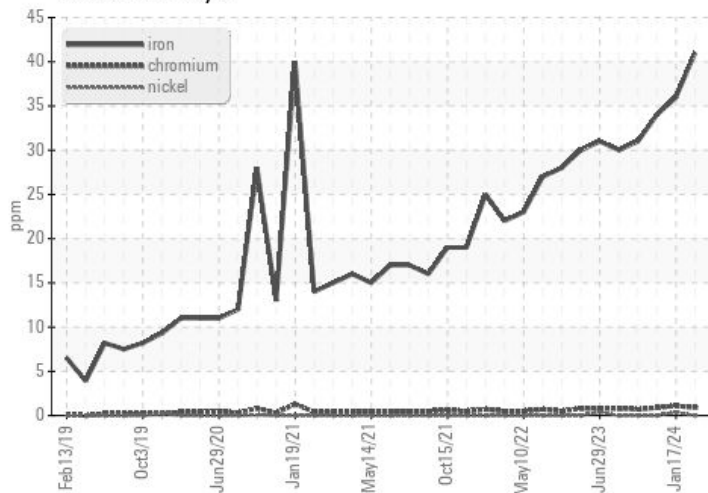
LIEBHERR

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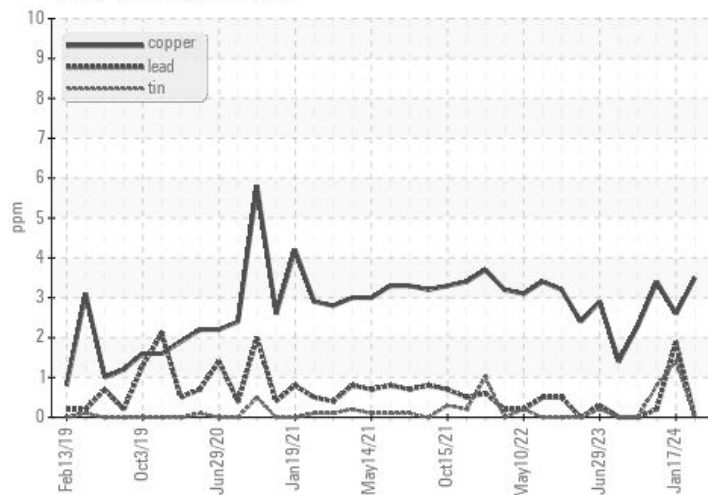


GRAPHS

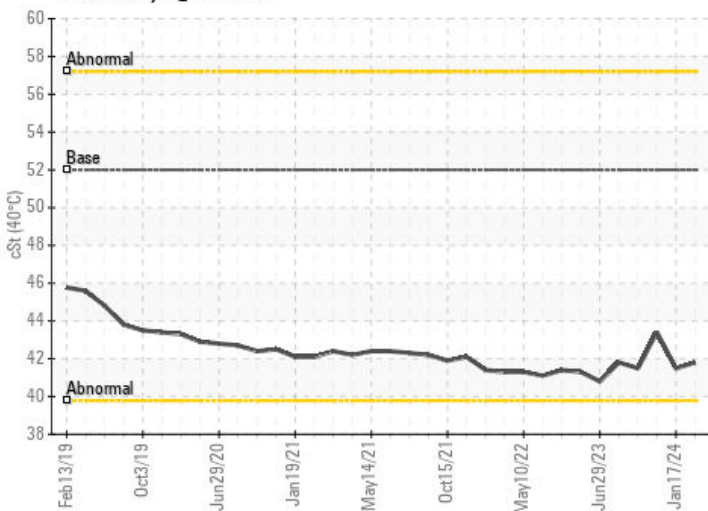
Ferrous Alloys



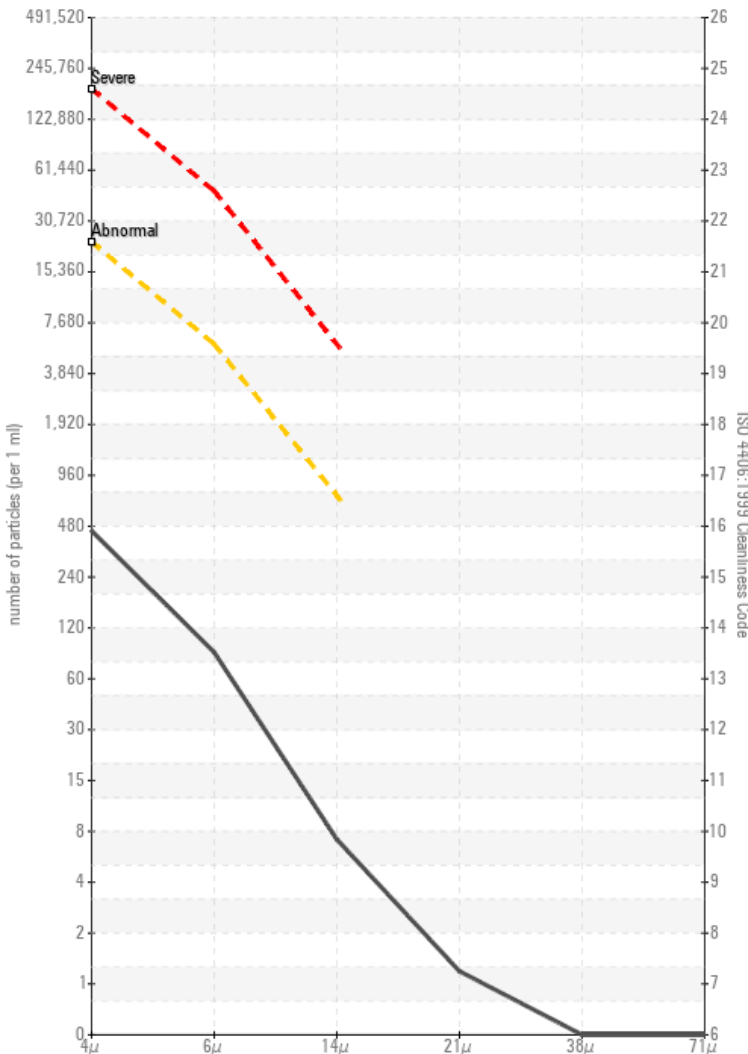
Non-ferrous Metals



Viscosity @ 40°C



Particle Count



Acid Number

