

LIEBHERR

CONSTRUCTION EQUIPMENT



[(340369)] LIEBHERR R920 045718-1705 - Hydraulic System

Sample No: LH0285096

Oil Type: PETRO CANADA HYDREX XV ALL SEASON HYDRAULIC OIL



SAMPLE INFORMATION

Sample Number	LH0285096	LH0274849	LH0251811	LH0242551
Sample Date	25 Jan 2024	06 Oct 2023	14 Mar 2023	03 Nov 2022
Machine Hours	5338	4924	0	3329
Oil Hours	0	0	0	0
Oil Changed	Changed	Changed	Not Changd	Not Changd
Sample Status	NORMAL	ATTENTION	ABNORMAL	NORMAL

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OIL CONDITION

Visc @ 40°C	cSt	44.5	42.8	43.1	43.2



CONTAMINATION

Water	%	NEG	NEG	NEG	NEG
Particles >4µm		11373	28266	6333	10986
Particles >6µm		2897	5887	1561	2187
Particles >14µm		131	111	72	108
ISO 4406:1999 (c)		21/19/14	22/20/14	20/18/13	21/18/14
Silicon	ppm	4	7	5	6
Sodium	ppm	2	3	3	3
Potassium	ppm	1	<1	<1	<1

Diagnosis

Resample at the next service interval to monitor. All component wear rates are normal. The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable. The condition of the oil is acceptable for the time in service.



WEAR METALS

Iron	ppm	7	12	10	11
Copper	ppm	4	7	6	6
Lead	ppm	<1	1	2	2
Tin	ppm	0	0	0	<1
Aluminum	ppm	<1	<1	<1	1
Chromium	ppm	<1	<1	<1	<1
Molybdenum	ppm	0	0	0	0
Nickel	ppm	0	<1	0	<1
Titanium	ppm	0	0	0	0
Silver	ppm	0	<1	0	0
Manganese	ppm	0	0	<1	<1
Vanadium	ppm	0	0	0	0



ADDITIVES

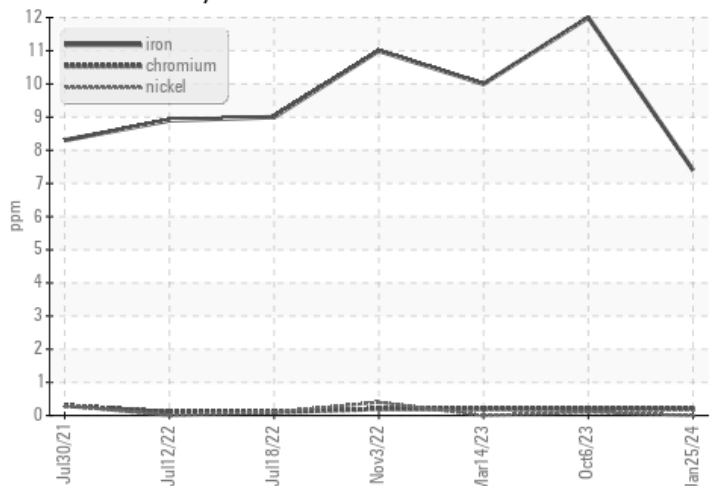
Calcium	ppm	639	1200	1314	1325
Magnesium	ppm	4	6	6	6
Zinc	ppm	768	714	701	673
Phosphorus	ppm	614	570	628	616
Barium	ppm	0	<1	0	0
Boron	ppm	<1	2	<1	1

Depot: CLOPEM
 Unique No: 5722869
 Signed: Wes Davis
 Report Date: 06 Feb 2024

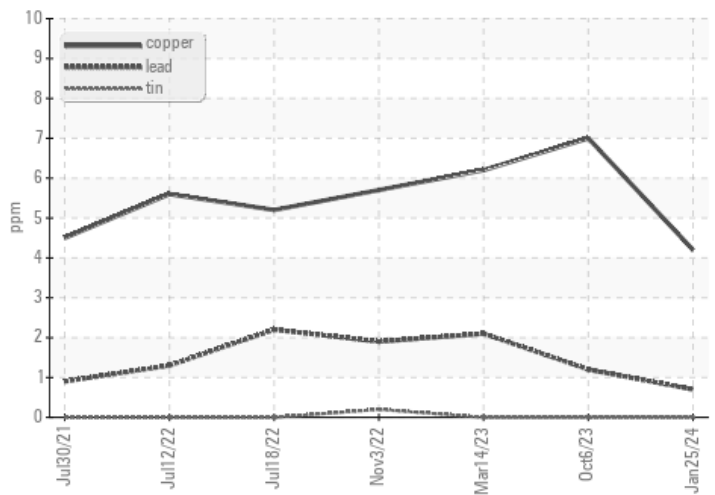


GRAPHS

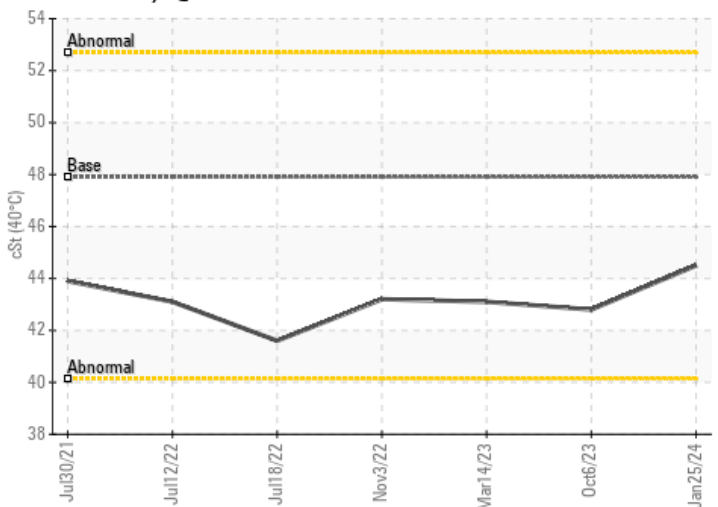
Ferrous Alloys



Non-ferrous Metals



Viscosity @ 40°C



Particle Count

