

LIEBHERR

CONSTRUCTION EQUIPMENT



LIEBHERR A924C064062-1049 - Splitter Box

Sample No: LH0274198

Oil Type: LIEBHERR GEAR BASIC 90 LS



MARCEL DUVAL FER ET METAUX INC.
 661 RANG STE-MARIE
 ST. SEBASTIEN, QC
 CA J0J 2C0
 Contact: Service Manager



SAMPLE INFORMATION

Sample Number	LH0274198	LH0261035	LH0203732	LH0168145
Sample Date	26 Oct 2023	14 Jun 2023	06 Aug 2021	31 Jul 2020
Machine Hours	13784	13298	11114	10114
Oil Hours	0	0	0	0
Oil Changed	Changed	Changed	Changed	Changed
Sample Status	NORMAL	NORMAL	NORMAL	NORMAL



OIL CONDITION

Visc @ 40°C	cSt	156	171	172	89.9
-------------	-----	------------	-----	-----	-------------

T:
F:



CONTAMINATION

Silicon	ppm	4	2	2	5
Sodium	ppm	1	<1	2	<1
Potassium	ppm	<1	0	<1	1

Diagnosis

Confirm the source of the lubricant being utilized for top-up/fill. Resample at the next service interval to monitor. All component wear rates are normal. There is no indication of any contamination in the oil. Additive levels indicate the addition of a different brand, or type of oil. The condition of the oil is acceptable for the time in service.



WEAR METALS

Iron	ppm	97	21	77	103
Copper	ppm	<1	<1	<1	1
Lead	ppm	0	0	<1	0
Tin	ppm	0	0	0	0
Aluminum	ppm	<1	<1	<1	<1
Chromium	ppm	<1	<1	<1	1
Molybdenum	ppm	0	0	0	<1
Nickel	ppm	<1	<1	<1	<1
Titanium	ppm	0	<1	0	0
Silver	ppm	<1	<1	0	0
Manganese	ppm	<1	<1	<1	<1
Vanadium	ppm	0	0	0	0



ADDITIVES

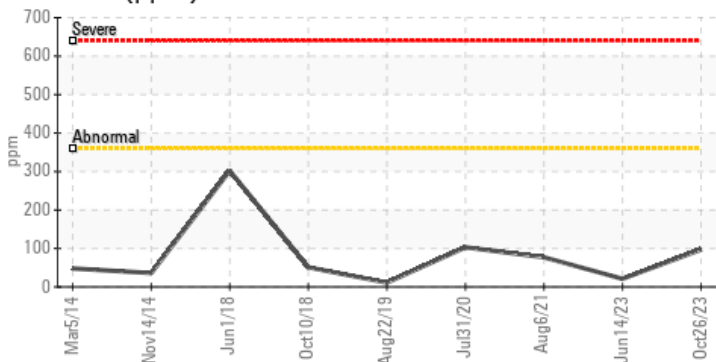
Calcium	ppm	16	13	24	23
Magnesium	ppm	1	<1	1	3
Zinc	ppm	38	19	41	46
Phosphorus	ppm	2055	2320	2356	1296
Barium	ppm	<1	0	0	0
Boron	ppm	32	25	27	271

Depot: MARSTS
Unique No: 5669810
Signed: Wes Davis
Report Date: 30 Oct 2023

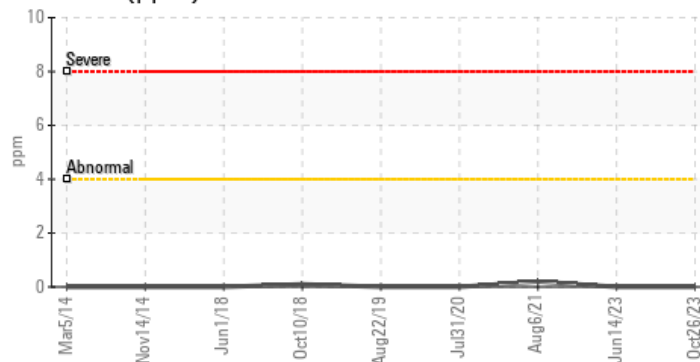


GRAPHS

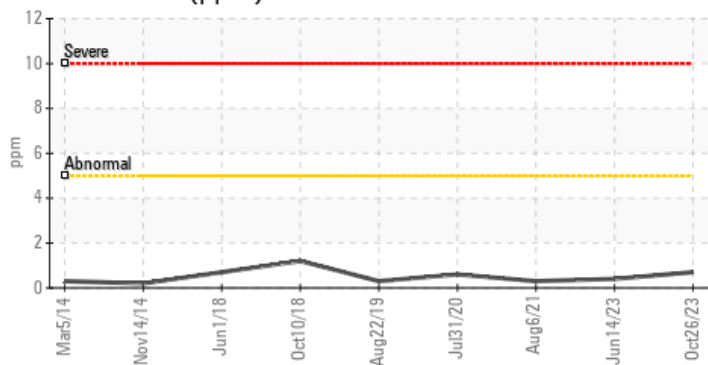
Iron (ppm)



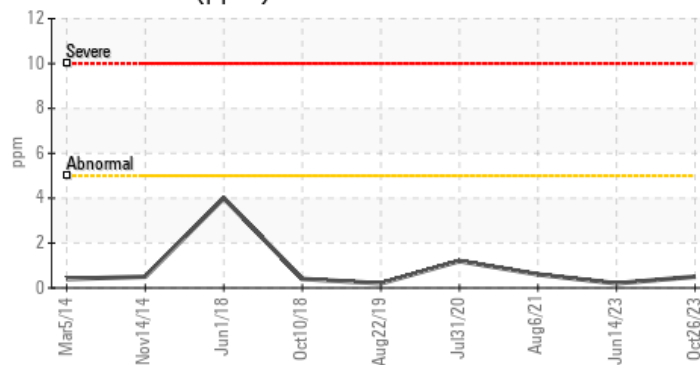
Lead (ppm)



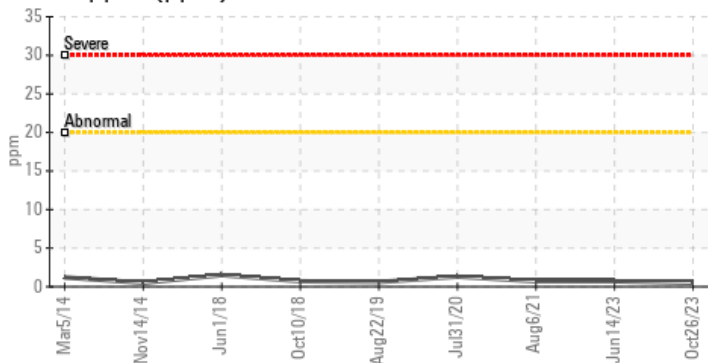
Aluminum (ppm)



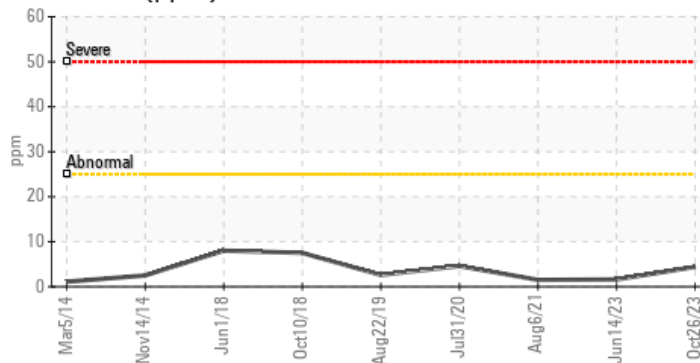
Chromium (ppm)



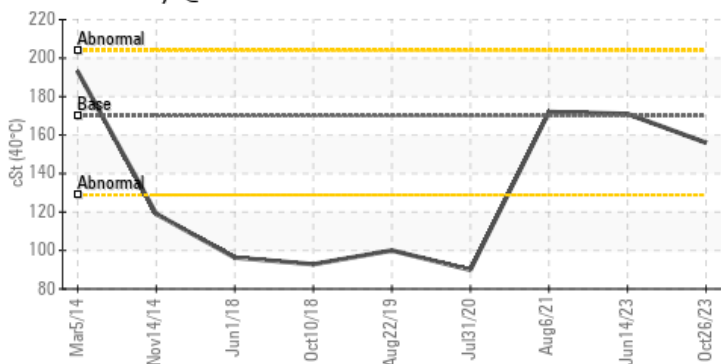
Copper (ppm)



Silicon (ppm)



Viscosity @ 40°C



Additives

