

LIEBHERR

CONSTRUCTION EQUIPMENT



944R - Diesel Engine

Sample No: LH0242790

Oil Type: DIESEL ENGINE OIL SAE 10W30



SAMPLE INFORMATION

Sample Number	LH0242790	---	---	---
Sample Date	14 Aug 2023	---	---	---
Machine Hours	0	---	---	---
Oil Hours	0	---	---	---
Oil Changed	Changed	---	---	---
Sample Status	SEVERE	---	---	---

Gerdau - Mandak Metal Processors Ltd.,
 1 Railway St., P.O. Box 334
 Selkirk, MB
 CA R1A 2B3
 Contact: Santiago Giraldo
 santiago.giraldo@gerdau.com
 T:
 F: (204)482-8241



OIL CONDITION

Visc @ 100°C	cSt	57.3	---	---	---
Oxidation (PA)	%	70	---	---	---



CONTAMINATION

Soot %	%	6	---	---	---
Nitration (PA)	%	113	---	---	---
Sulfation (PA)	%	101	---	---	---
Glycol	%	NEG	---	---	---
Fuel	%	<1.0	---	---	---
Silicon	ppm	11	---	---	---
Sodium	ppm	48	---	---	---
Potassium	ppm	1	---	---	---

Diagnosis

We advise that you check for faulty combustion, plugged air filters, or aftercoolers. The oil change at the time of sampling has been noted. We recommend an early resample to monitor this condition. All component wear rates are normal. There is an abnormal amount of solids and carbon present in the oil. The oil viscosity is higher than normal. The oil is no longer serviceable due to the presence of contaminants.



WEAR METALS

Iron	ppm	36	---	---	---
Copper	ppm	5	---	---	---
Lead	ppm	<1	---	---	---
Tin	ppm	<1	---	---	---
Aluminum	ppm	2	---	---	---
Chromium	ppm	<1	---	---	---
Molybdenum	ppm	56	---	---	---
Nickel	ppm	<1	---	---	---
Titanium	ppm	<1	---	---	---
Silver	ppm	0	---	---	---
Manganese	ppm	<1	---	---	---
Vanadium	ppm	0	---	---	---



ADDITIVES

Calcium	ppm	1039	---	---	---
Magnesium	ppm	969	---	---	---
Zinc	ppm	1213	---	---	---
Phosphorus	ppm	1047	---	---	---
Barium	ppm	<1	---	---	---
Boron	ppm	2	---	---	---

Depot: MANSEL
Unique No: 5631722
Signed: Wes Davis
Report Date: 28 Aug 2023



GRAPHS

