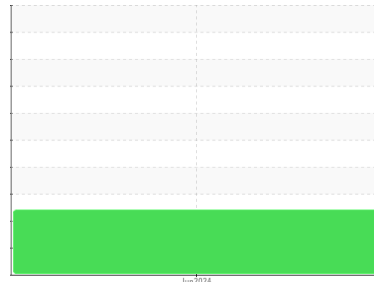




# OIL ANALYSIS REPORT

Sample Rating Trend



Machine Id  
**JCB 940RTFL 256274 (S/N 2365469)**  
 Component  
**Diesel Engine**  
 Fluid  
**JCB 5W40 (4 GAL)**

## DIAGNOSIS

**Recommendation**  
 We advise that you check the air filter, air induction system, and any areas where dirt may enter the component. Resample at the next service interval to monitor.

**Wear**  
 All component wear rates are normal.

**Contamination**  
 Elemental levels of silicon (Si) and aluminum (Al) indicate alumina-silicate (coarse dirt) ingress.

**Fluid Condition**  
 The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is acceptable for the time in service.

## SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	<b>JCB005498</b>	---	---
Sample Date	Client Info	<b>20 Jun 2024</b>	---	---
Machine Age	hrs Client Info	<b>7995</b>	---	---
Oil Age	hrs Client Info	<b>500</b>	---	---
Oil Changed	Client Info	<b>Not Chngd</b>	---	---
Sample Status		<b>ABNORMAL</b>	---	---

## CONTAMINATION

method	limit/base	current	history1	history2
Fuel	WC Method >5	<b>&lt;1.0</b>	---	---
Water	WC Method >0.2	<b>NEG</b>	---	---
Glycol	WC Method	<b>NEG</b>	---	---

## WEAR METALS

method	limit/base	current	history1	history2
Iron ppm	ASTM D5185m >125	<b>37</b>	---	---
Chromium ppm	ASTM D5185m >5	<b>3</b>	---	---
Nickel ppm	ASTM D5185m >4	<b>0</b>	---	---
Titanium ppm	ASTM D5185m	<b>2</b>	---	---
Silver ppm	ASTM D5185m >3	<b>0</b>	---	---
Aluminum ppm	ASTM D5185m >25	<b>19</b>	---	---
Lead ppm	ASTM D5185m >15	<b>0</b>	---	---
Copper ppm	ASTM D5185m >125	<b>4</b>	---	---
Tin ppm	ASTM D5185m >4	<b>0</b>	---	---
Vanadium ppm	ASTM D5185m	<b>0</b>	---	---
Cadmium ppm	ASTM D5185m	<b>0</b>	---	---

## ADDITIVES

method	limit/base	current	history1	history2
Boron ppm	ASTM D5185m	<b>157</b>	---	---
Barium ppm	ASTM D5185m	<b>0</b>	---	---
Molybdenum ppm	ASTM D5185m	<b>26</b>	---	---
Manganese ppm	ASTM D5185m	<b>&lt;1</b>	---	---
Magnesium ppm	ASTM D5185m	<b>144</b>	---	---
Calcium ppm	ASTM D5185m	<b>2624</b>	---	---
Phosphorus ppm	ASTM D5185m	<b>1219</b>	---	---
Zinc ppm	ASTM D5185m	<b>1512</b>	---	---
Sulfur ppm	ASTM D5185m	<b>4572</b>	---	---

## CONTAMINANTS

method	limit/base	current	history1	history2
Silicon ppm	ASTM D5185m >50	<b>▲ 49</b>	---	---
Sodium ppm	ASTM D5185m	<b>6</b>	---	---
Potassium ppm	ASTM D5185m >20	<b>7</b>	---	---

## INFRA-RED

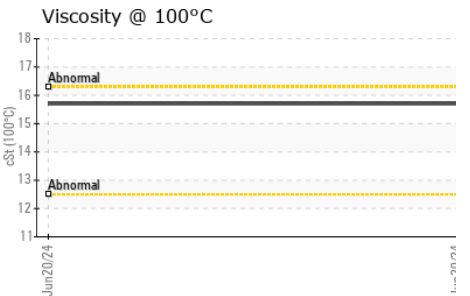
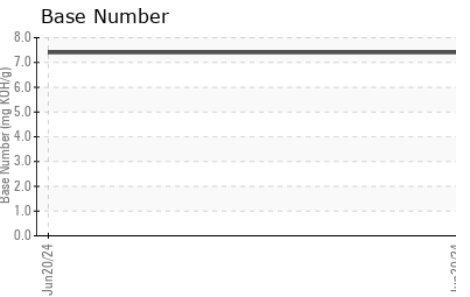
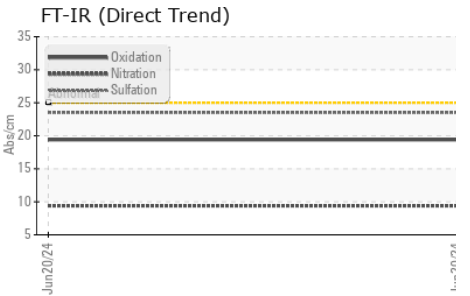
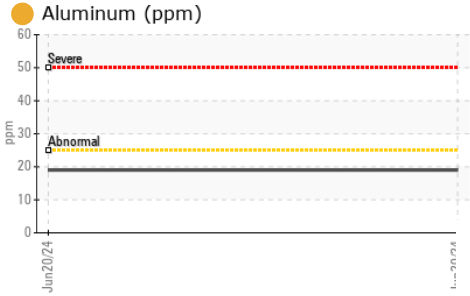
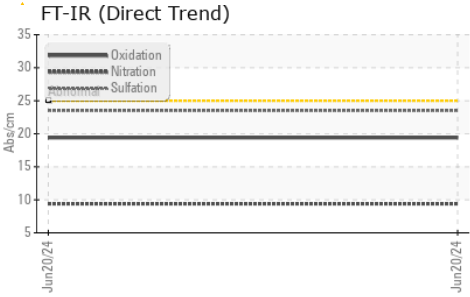
method	limit/base	current	history1	history2
Soot %	*ASTM D7844 >3	<b>0.1</b>	---	---
Nitration	*ASTM D7624 >20	<b>9.4</b>	---	---
Sulfation	*ASTM D7415 >30	<b>23.5</b>	---	---

## FLUID DEGRADATION

method	limit/base	current	history1	history2
Oxidation	Abs/.1mm *ASTM D7414 >25	<b>19.4</b>	---	---
Base Number (BN)	mg KOH/g ASTM D2896	<b>7.4</b>	---	---



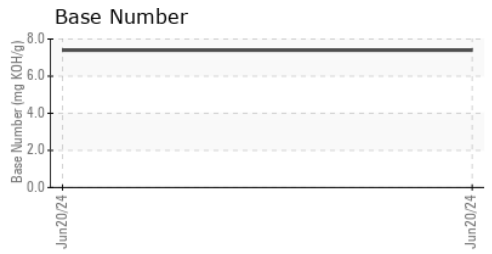
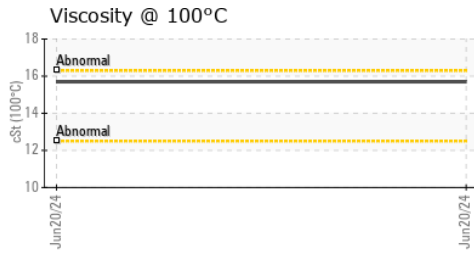
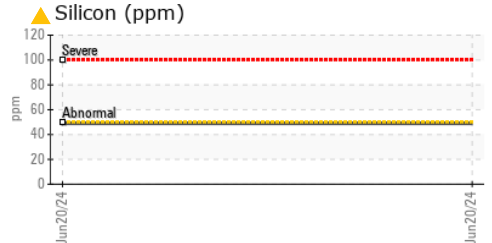
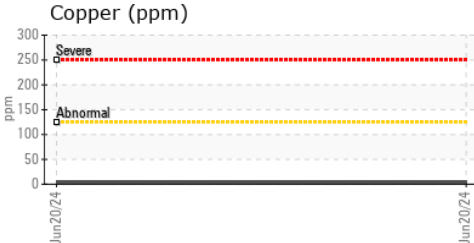
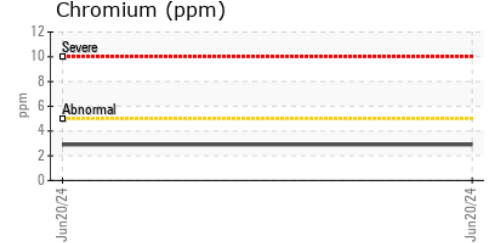
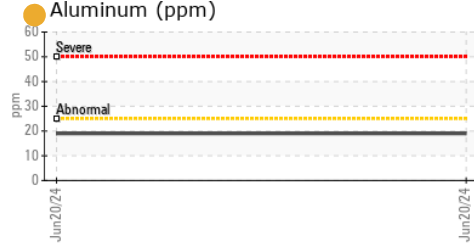
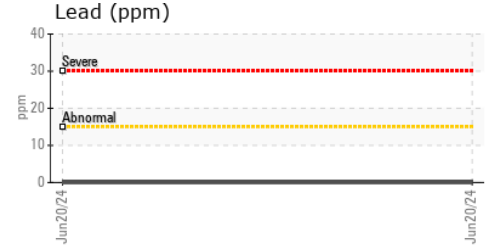
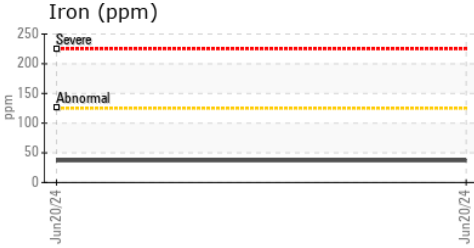
# OIL ANALYSIS REPORT



VISUAL	method	limit/base	current	history1	history2	
White Metal	scalar	*Visual	NONE	NONE	---	---
Yellow Metal	scalar	*Visual	NONE	NONE	---	---
Precipitate	scalar	*Visual	NONE	NONE	---	---
Silt	scalar	*Visual	NONE	NONE	---	---
Debris	scalar	*Visual	NONE	NONE	---	---
Sand/Dirt	scalar	*Visual	NONE	NONE	---	---
Appearance	scalar	*Visual	NORML	NORML	---	---
Odor	scalar	*Visual	NORML	NORML	---	---
Emulsified Water	scalar	*Visual	>0.2	NEG	---	---
Free Water	scalar	*Visual		NEG	---	---

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	15.7	---	---
Viscosity Index (VI)	Scale	ASTM D2270	162	---	---

### GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : JCB005498      **Received** : 24 Jun 2024  
**Lab Number** : 06218036      **Tested** : 25 Jun 2024  
**Unique Number** : 11096233      **Diagnosed** : 25 Jun 2024 - Sean Felton  
**Test Package** : MOB 1 ( Additional Tests: TBN, VI )

**HOOPER INC**  
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 MIFFLINTOWN, PA  
 US 17059  
 Contact: NATE SANDERS  
 nksanders@hooper.com

To discuss this sample report, contact Customer Service at 1-800-237-1369.  
 \* - Denotes test methods that are outside of the ISO 17025 scope of accreditation.  
 Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)