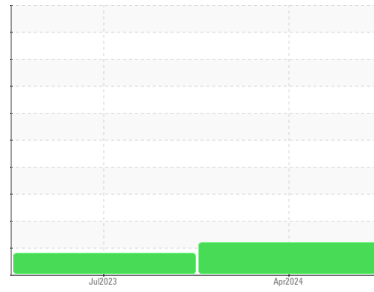


OIL ANALYSIS REPORT

Sample Rating Trend



FUEL



Machine Id
4600
 Component
Diesel Engine
 Fluid
LEAHY WOLF PREMIUM 15W40 (7 GAL)

DIAGNOSIS

Recommendation

The oil change at the time of sampling has been noted. Resample at the next service interval to monitor.

Wear

Metal levels are typical for a new component breaking in.

Contamination

Light fuel dilution occurring.

Fluid Condition

The BN result indicates that there is suitable alkalinity remaining in the oil. Fuel is present in the oil and is lowering the viscosity. The condition of the oil is suitable for further service.

SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	PCA0122004	LW0007443	---
Sample Date	Client Info	19 Apr 2024	05 Jul 2023	---
Machine Age	hrs	228	0	---
Oil Age	hrs	199	0	---
Oil Changed	Client Info	Changed	Changed	---
Sample Status		ABNORMAL	MARGINAL	---

CONTAMINATION

method	limit/base	current	history1	history2
Water	WC Method >0.2	NEG	NEG	---
Glycol	WC Method	NEG	NEG	---

WEAR METALS

method	limit/base	current	history1	history2
Iron	ppm ASTM D5185m >100	8	8	---
Chromium	ppm ASTM D5185m >20	0	0	---
Nickel	ppm ASTM D5185m >4	0	<1	---
Titanium	ppm ASTM D5185m	<1	<1	---
Silver	ppm ASTM D5185m >3	0	<1	---
Aluminum	ppm ASTM D5185m >20	1	<1	---
Lead	ppm ASTM D5185m >40	0	<1	---
Copper	ppm ASTM D5185m >330	0	2	---
Tin	ppm ASTM D5185m >15	0	0	---
Vanadium	ppm ASTM D5185m	0	0	---
Cadmium	ppm ASTM D5185m	0	0	---

ADDITIVES

method	limit/base	current	history1	history2
Boron	ppm ASTM D5185m	6	7	---
Barium	ppm ASTM D5185m	0	0	---
Molybdenum	ppm ASTM D5185m	58	60	---
Manganese	ppm ASTM D5185m	0	<1	---
Magnesium	ppm ASTM D5185m	947	829	---
Calcium	ppm ASTM D5185m	1189	1191	---
Phosphorus	ppm ASTM D5185m	1057	1026	---
Zinc	ppm ASTM D5185m	1242	1169	---
Sulfur	ppm ASTM D5185m	3720	3310	---

CONTAMINANTS

method	limit/base	current	history1	history2
Silicon	ppm ASTM D5185m >25	20	14	---
Sodium	ppm ASTM D5185m	2	0	---
Potassium	ppm ASTM D5185m >20	0	3	---
Fuel	% ASTM D3524 >5	▲ 2.8	▲ 2.6	---

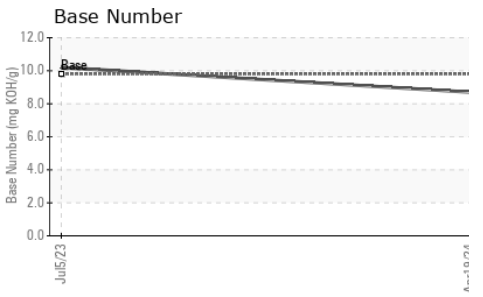
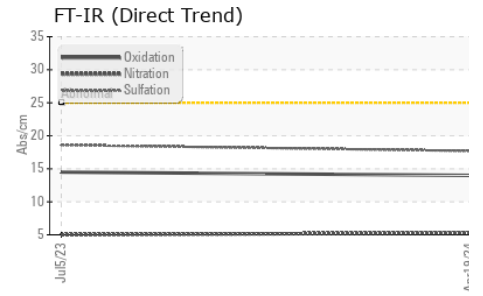
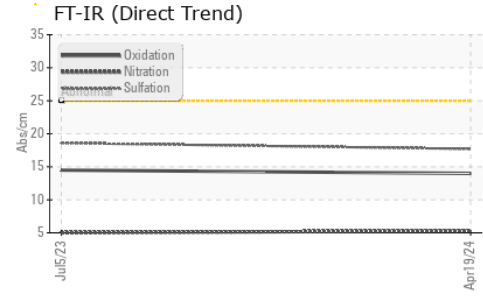
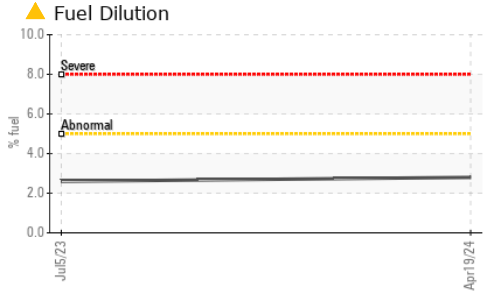
INFRA-RED

method	limit/base	current	history1	history2
Soot %	% *ASTM D7844 >3	0.1	0.1	---
Nitration	Abs/cm *ASTM D7624 >20	5.3	5.0	---
Sulfation	Abs/.1mm *ASTM D7415 >30	17.7	18.6	---

FLUID DEGRADATION

method	limit/base	current	history1	history2
Oxidation	Abs/.1mm *ASTM D7414 >25	14.0	14.5	---
Base Number (BN)	mg KOH/g ASTM D2896 9.8	8.7	10.2	---

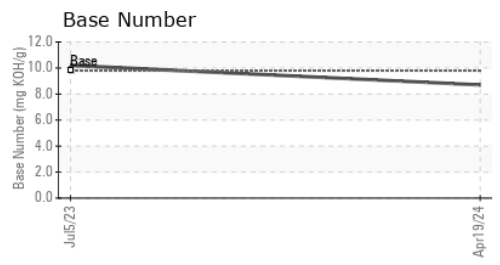
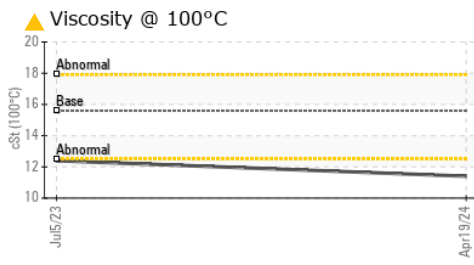
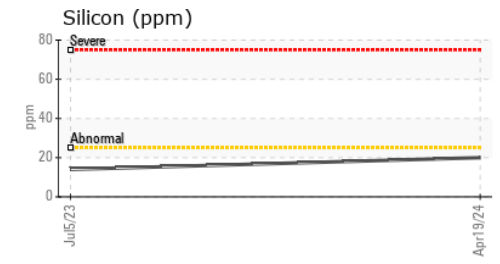
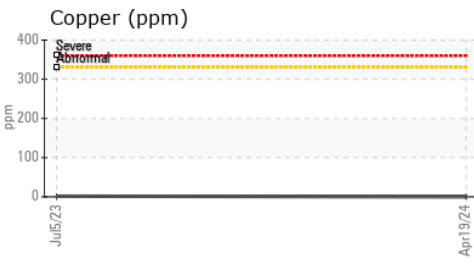
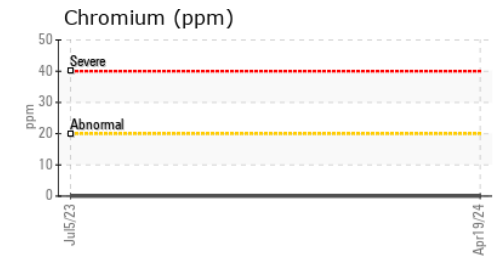
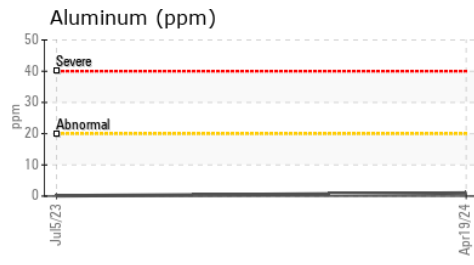
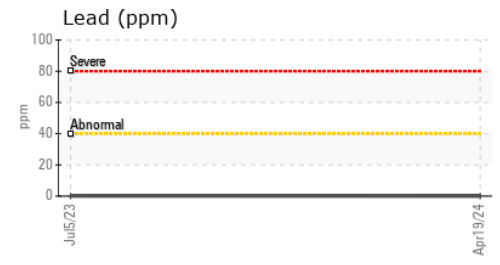
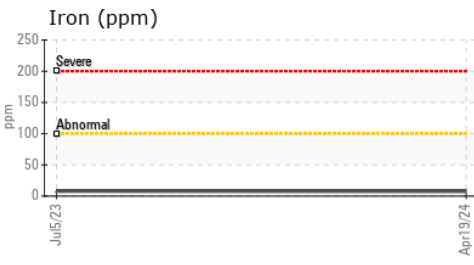
OIL ANALYSIS REPORT



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	15.6	▲ 11.4	12.4	---

GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PCA0122004 **Received** : 25 Apr 2024
Lab Number : 06160066 **Tested** : 29 Apr 2024
Unique Number : 10995489 **Diagnosed** : 29 Apr 2024 - Wes Davis
Test Package : MOB 1 (Additional Tests: FuelDilution, PercentFuel, TBN)

K5 CONSTRUCTION CORPORATION
 6301 S EAST AVENUE
 HODGKINS, IL
 US 60525

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)

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