



OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area
[A34461]
 Machine Id
JOHN DEERE 450K 1T0450KXPMF390627
 Component
Hydraulic System
 Fluid
JOHN DEERE HYDRAU (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		WE0006583	WE0005612	---
Sample Date		Client Info		12 Jan 2024	20 Sep 2023	---
Machine Age	hrs	Client Info		1062	1012	---
Oil Age	hrs	Client Info		50	1012	---
Filter Age	hrs	Client Info		50	1012	---
Oil Changed		Client Info		Not Changd	Not Changd	---
Filter Changed		Client Info		Not Changd	Not Changd	---
Sample Status				NORMAL	ABNORMAL	---

WEAR

All component wear rates are normal.

PQ	UOM	Method	Limit/Abn	Current	History1	History2
Iron	ppm	ASTM D5185m	>20	0	0	---
Chromium	ppm	ASTM D5185m	>10	<1	<1	---
Nickel	ppm	ASTM D5185m	>10	0	<1	---
Titanium	ppm	ASTM D5185m		0	0	---
Silver	ppm	ASTM D5185m		0	1	---
Aluminum	ppm	ASTM D5185m	>10	2	1	---
Lead	ppm	ASTM D5185m	>10	0	7	---
Copper	ppm	ASTM D5185m	>75	0	1	---
Tin	ppm	ASTM D5185m	>10	0	2	---
Vanadium	ppm	ASTM D5185m		0	1	---
White Metal	scalar	*Visual	NONE	NONE	NONE	---
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	---

CONTAMINATION

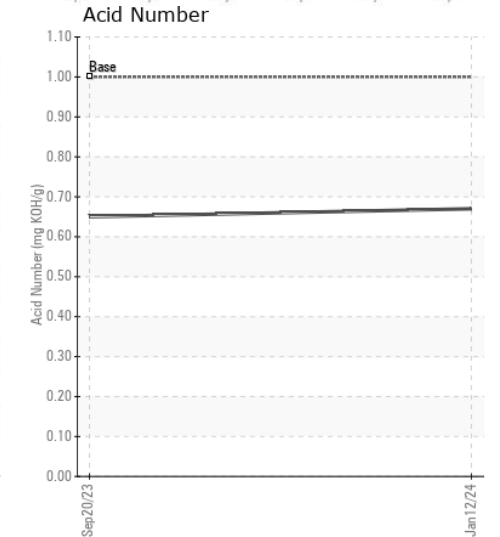
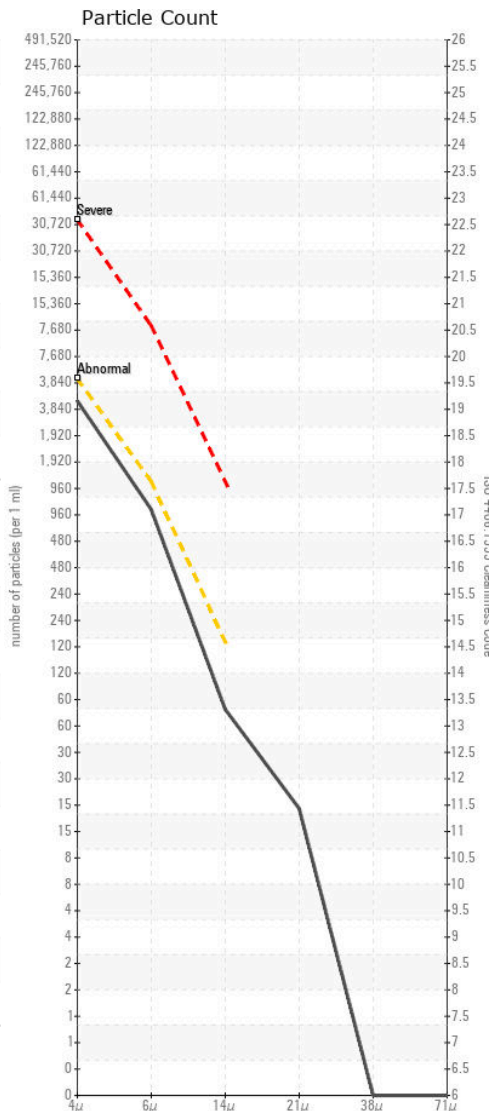
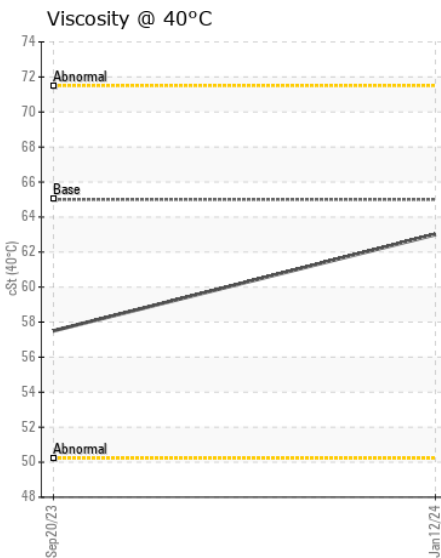
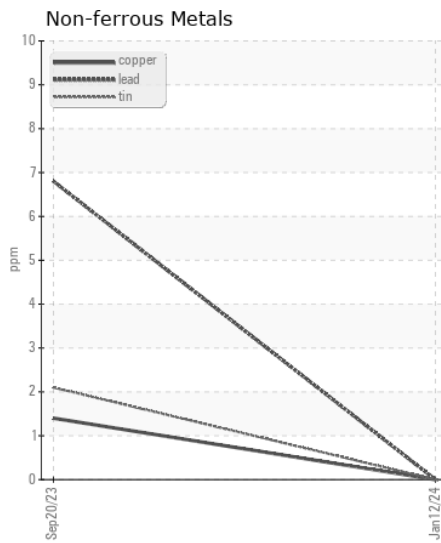
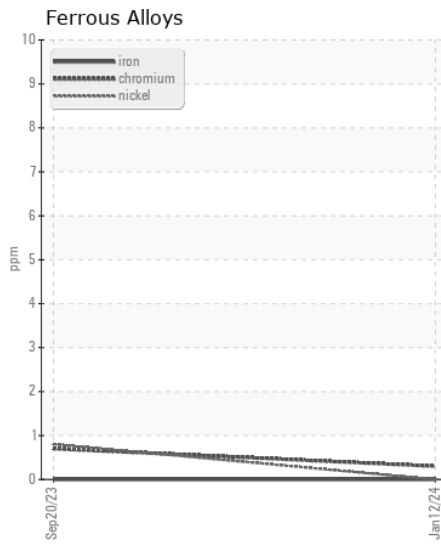
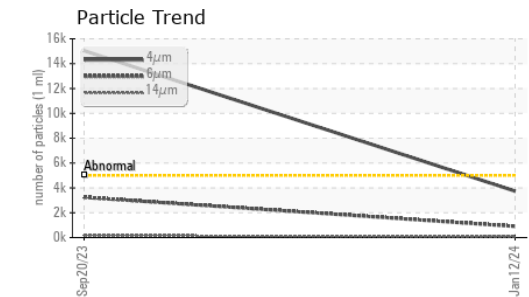
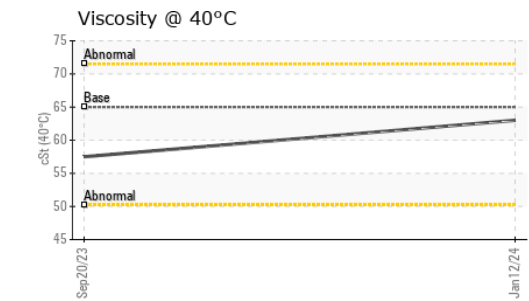
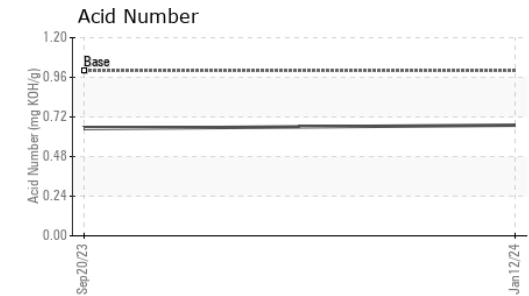
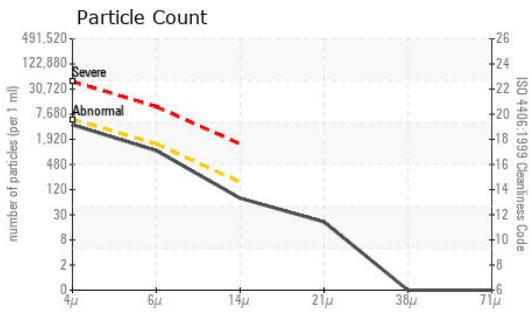
The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.

Silicon	ppm	ASTM D5185m	>20	0	2	---
Potassium	ppm	ASTM D5185m	>20	<1	93	---
Water		WC Method	>0.1	NEG	NEG	---
Particles >4µm		ASTM D7647	>5000	3739	▲ 15046	---
Particles >6µm		ASTM D7647	>1300	902	▲ 3239	---
Particles >14µm		ASTM D7647	>160	66	▲ 168	---
Particles >21µm		ASTM D7647	>40	18	32	---
Particles >38µm		ASTM D7647	>10	0	0	---
Particles >71µm		ASTM D7647	>3	0	0	---
Oil Cleanliness		ISO 4406 (c)	>19/17/14	19/17/13	▲ 21/19/15	---
Silt	scalar	*Visual	NONE	NONE	NONE	---
Debris	scalar	*Visual	NONE	NONE	NONE	---
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	---
Appearance	scalar	*Visual	NORML	NORML	NORML	---
Odor	scalar	*Visual	NORML	NORML	NORML	---
Emulsified Water	scalar	*Visual	>0.1	NEG	NEG	---

FLUID CONDITION

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m		0	39	---
Boron	ppm	ASTM D5185m		0	<1	---
Barium	ppm	ASTM D5185m		3	0	---
Molybdenum	ppm	ASTM D5185m		0	<1	---
Manganese	ppm	ASTM D5185m		0	0	---
Magnesium	ppm	ASTM D5185m		1	20	---
Calcium	ppm	ASTM D5185m	87	98	0	---
Phosphorus	ppm	ASTM D5185m	727	715	337	---
Zinc	ppm	ASTM D5185m	900	842	72	---
Sulfur	ppm	ASTM D5185m	1500	1835	1853	---
Acid Number (AN)	mg KOH/g	ASTM D8045	1.0	0.67	0.65	---
Visc @ 40°C	cSt	ASTM D445	65	63.0	57.5	---



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WE0006583 **Received** : 17 Jan 2024
Lab Number : 06063517 **Diagnosed** : 19 Jan 2024
Unique Number : 10834899 **Diagnostician** : Wes Davis
Test Package : CONST (Additional Tests: PQ)

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)

WARRIOR TRACTOR AND EQUIPMENT - HUNTSVILLE
 25135 ONE AVIATION WAY SW
 MADISON, AL
 US 35756
 Contact: TODD MITCHELL
 t_mitchell@warriortractor.com
 T: (256)233-1914
 F: (256)233-1971