LESLIE EQUIPMENT CO.

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	ABNORMAL
FLUID CONDITION	NORMAL

Area
Store 9 - Marietta
Machine Id
JOHN DEERE 850K D-33 (S/N T0850KXCBE214718)
Component
Hydraulic System
Fluid
JOHN DEERE ENGINE OIL PLUS 50 II 15W40 (28 GAL)

RECOMMENDATION

No corrective action is recommended at this time. The filter change at the time of sampling has been noted. Resample at the next service interval to monitor.

WEAR

All component wear rates are normal for time on oil.

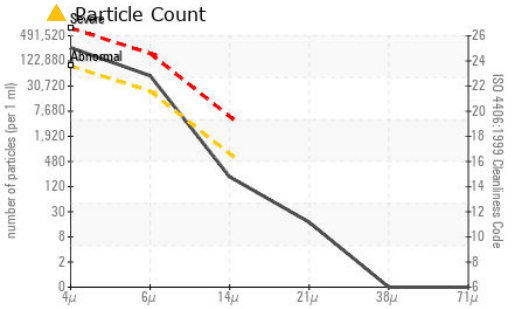
CONTAMINATION

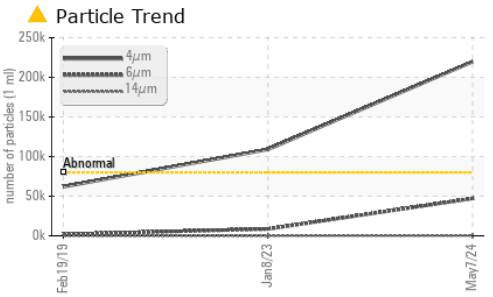
There is a high amount of silt (particulates < 14 microns in size) present in the oil.

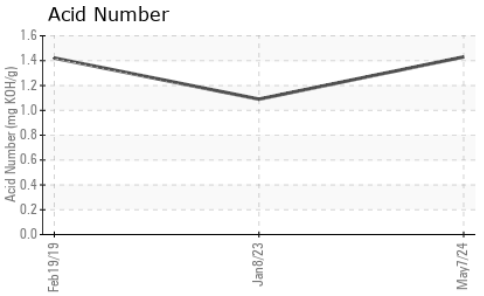
FLUID CONDITION

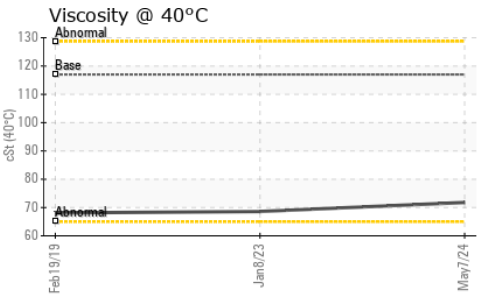
The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

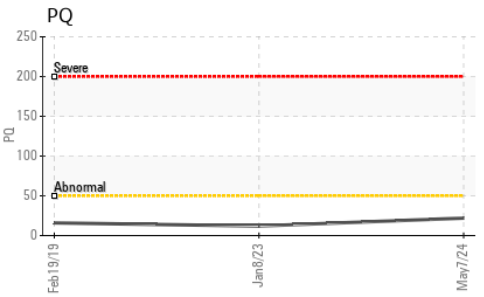
Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		LEC0049423	LEC0032482	LECP175470
Sample Date		Client Info		07 May 2024	08 Jan 2023	19 Feb 2019
Machine Age	hrs	Client Info		9366	8675	6788
Oil Age	hrs	Client Info		9366	8675	6788
Filter Age	hrs	Client Info		800	500	600
Oil Changed		Client Info		Not Changd	Not Changd	Not Changd
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				ABNORMAL	ATTENTION	NORMAL
PQ		ASTM D8184	>50	22	12	16
Iron	ppm	ASTM D5185m	>23	19	10	15
Chromium	ppm	ASTM D5185m	>9	2	1	4
Nickel	ppm	ASTM D5185m	>5	0	<1	<1
Titanium	ppm	ASTM D5185m		<1	<1	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>9	12	5	9
Lead	ppm	ASTM D5185m	>28	0	0	<1
Copper	ppm	ASTM D5185m	>51	2	2	8
Tin	ppm	ASTM D5185m	>5	<1	0	<1
Vanadium	ppm	ASTM D5185m		0	0	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Silicon	ppm	ASTM D5185m	>31	29	11	19
Potassium	ppm	ASTM D5185m	>20	2	3	4
Water		WC Method	>0.075	NEG	NEG	NEG
Particles >4µm		ASTM D7647	>80000	▲ 219741	● 108983	61887
Particles >6µm		ASTM D7647	>20000	▲ 47139	8633	1926
Particles >14µm		ASTM D7647	>640	181	32	26
Particles >21µm		ASTM D7647	>160	15	3	7
Particles >38µm		ASTM D7647	>40	0	0	0
Particles >71µm		ASTM D7647	>10	0	0	0
Oil Cleanliness		ISO 4406 (c)	>23/21/16	▲ 25/23/15	● 24/20/12	23/18/12
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.075	NEG	NEG	NEG
Sodium	ppm	ASTM D5185m	>21	1	0	2
Boron	ppm	ASTM D5185m		332	242	52
Barium	ppm	ASTM D5185m		1	0	0
Molybdenum	ppm	ASTM D5185m		68	61	14
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m		290	232	169
Calcium	ppm	ASTM D5185m		985	938	1257
Phosphorus	ppm	ASTM D5185m		759	626	698
Zinc	ppm	ASTM D5185m		838	757	763
Sulfur	ppm	ASTM D5185m		2757	2212	2637
Acid Number (AN)	mg KOH/g	ASTM D8045		1.43	1.09	1.421
Visc @ 40°C	cSt	ASTM D445	117	71.8	68.6	68.1

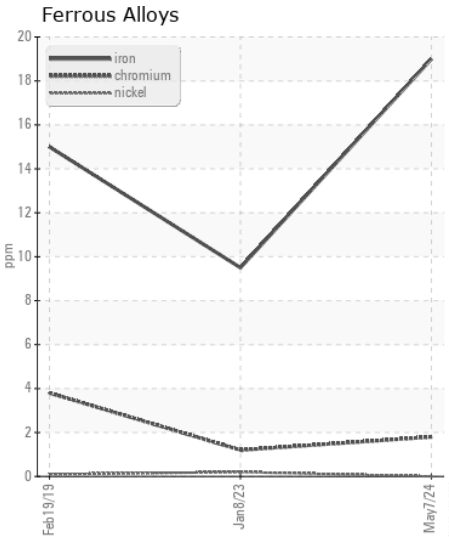


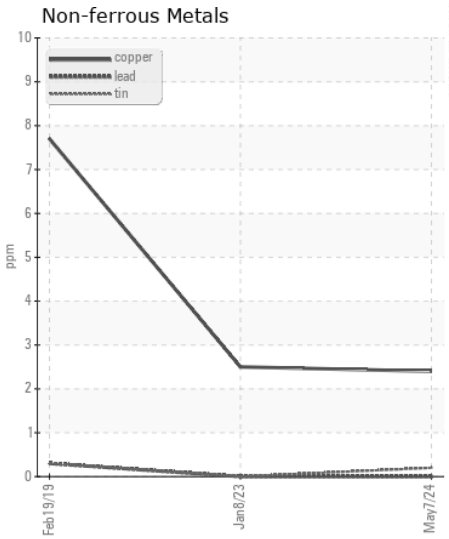


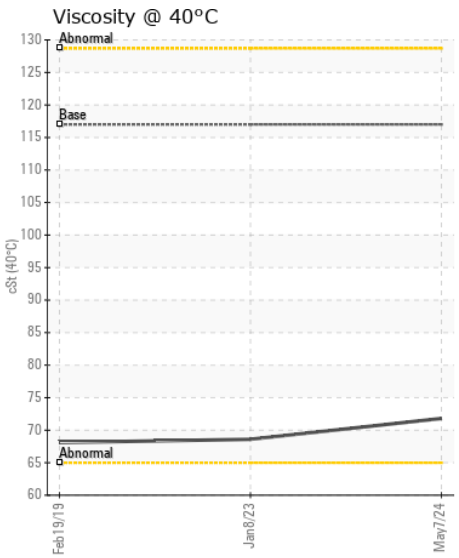


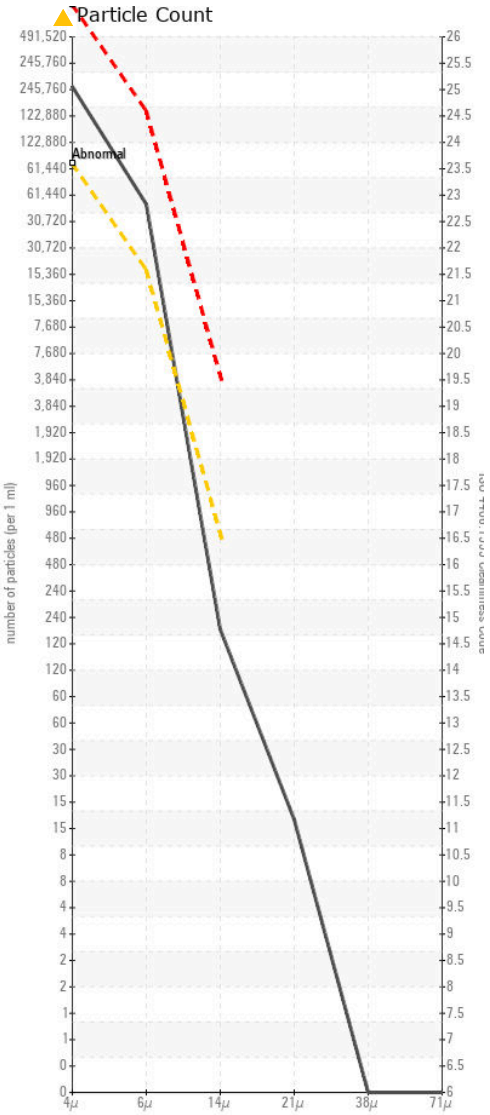


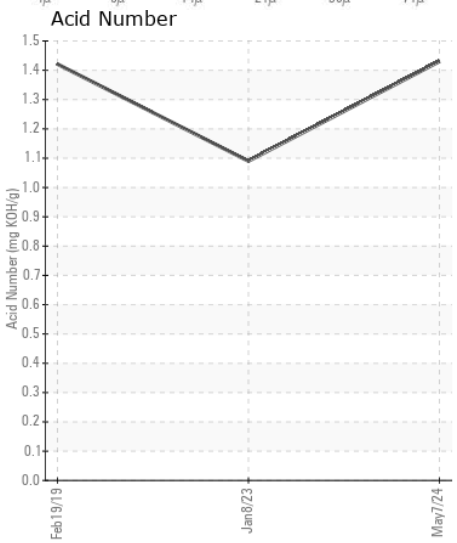












Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : LEC0049423 **Received** : 14 May 2024
Lab Number : 06178595 **Tested** : 15 May 2024
Unique Number : 11029921 **Diagnosed** : 16 May 2024 - Don Baldridge
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)

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