



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
JOHN DEERE 700L 1T0700LXVNF420842
 Component
Diesel Engine
 Fluid
JOHN DEERE ENGINE OIL PLUS 50 II 15W40 (28 GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		JR0218473	JR0214750	JR0199256
Sample Date		Client Info		09 Jul 2024	19 Apr 2024	26 Jan 2024
Machine Age	hrs	Client Info		3468	2950	2446
Oil Age	hrs	Client Info		518	504	501
Filter Age	hrs	Client Info		518	504	501
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	NORMAL	ATTENTION

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>51	14	10	11
Chromium	ppm	ASTM D5185m	>11	<1	<1	<1
Nickel	ppm	ASTM D5185m	>5	2	0	1
Titanium	ppm	ASTM D5185m		<1	0	0
Silver	ppm	ASTM D5185m	>3	<1	0	0
Aluminum	ppm	ASTM D5185m	>31	5	4	4
Lead	ppm	ASTM D5185m	>26	<1	0	<1
Copper	ppm	ASTM D5185m	>26	2	3	<1
Tin	ppm	ASTM D5185m	>4	<1	<1	<1
Vanadium	ppm	ASTM D5185m		<1	0	<1
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

There is no indication of any contamination in the oil.

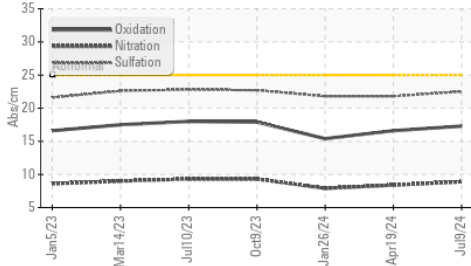
Silicon	ppm	ASTM D5185m	>22	8	6	5
Potassium	ppm	ASTM D5185m	>20	3	<1	2
Fuel		WC Method	>2.1	<1.0	<1.0	0.7
Water		WC Method	>0.21	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844	>3	0.4	0.3	0.3
Nitration	Abs/cm	*ASTM D7624	>20	8.9	8.4	7.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	22.5	21.8	21.8
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	>0.21	NEG	NEG	NEG

FLUID CONDITION

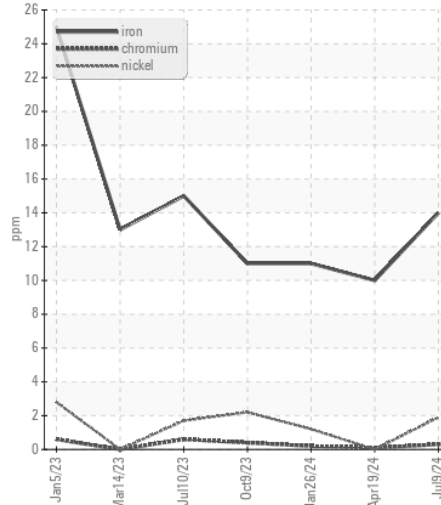
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m	>31	<1	3	2
Boron	ppm	ASTM D5185m		222	246	170
Barium	ppm	ASTM D5185m		0	2	<1
Molybdenum	ppm	ASTM D5185m		263	217	150
Manganese	ppm	ASTM D5185m		<1	1	<1
Magnesium	ppm	ASTM D5185m		827	794	525
Calcium	ppm	ASTM D5185m		1522	1524	2229
Phosphorus	ppm	ASTM D5185m		977	913	988
Zinc	ppm	ASTM D5185m		1153	1086	1165
Sulfur	ppm	ASTM D5185m		3106	3419	3196
Oxidation	Abs/.1mm	*ASTM D7414	>25	17.3	16.6	15.4
Base Number (BN)	mg KOH/g	ASTM D2896	13.6	8.2	8.7	8.8
Visc @ 100°C	cSt	ASTM D445	15.4	13.4	13.1	11.5

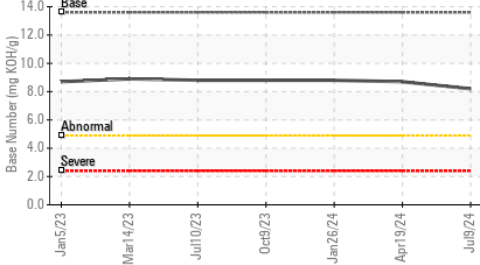
FT-IR (Direct Trend)



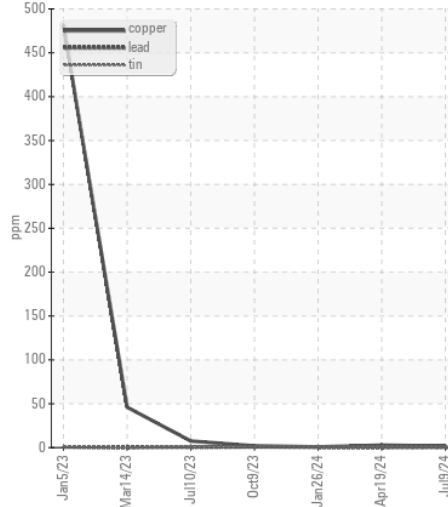
Ferrous Alloys



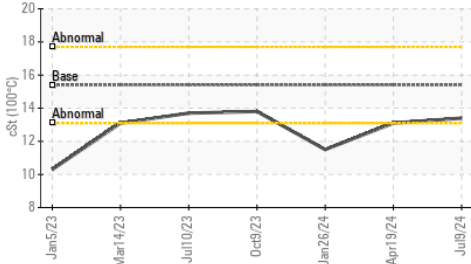
Base Number



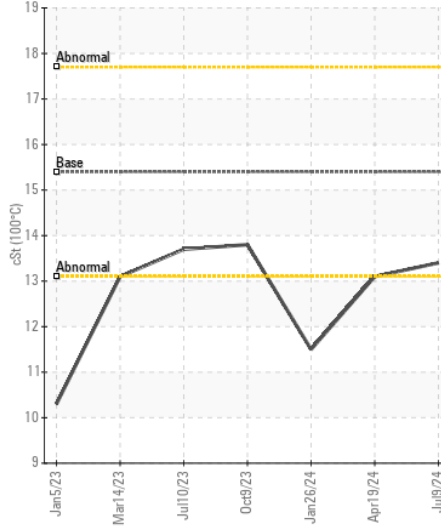
Non-ferrous Metals



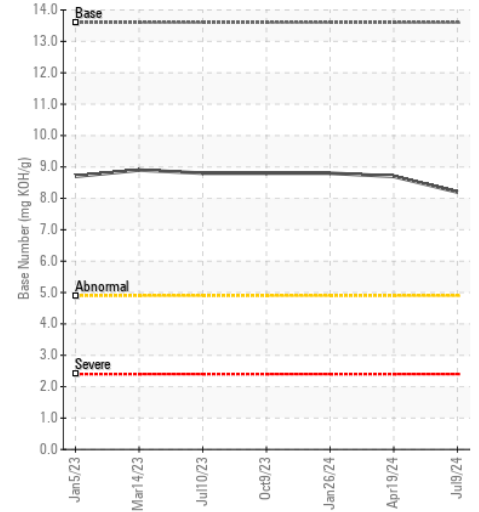
Viscosity @ 100°C



Viscosity @ 100°C



Base Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
 Sample No. : JR0218473
 Lab Number : 06233073
 Unique Number : 11116566
 Test Package : CONST (Additional Tests: TBN)

Received : 11 Jul 2024
 Tested : 11 Jul 2024
 Diagnosed : 11 Jul 2024 - Wes Davis

B & S SITE DEVELOPMENT
 7800 PINEY BRANCH LANE
 BRISTOW, VA
 US 20136

Contact: DANNY HUFF
 dhuff@bandssite.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)

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