



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
JOHN DEERE 160G 1FF160GXJNF058862
Component
Pump Drive
Fluid
JOHN DEERE ENGINE OIL PLUS 50 II 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		JR0220213	JR0215410	JR0204119
Sample Date		Client Info		07 Jul 2024	07 May 2024	07 Feb 2024
Machine Age	hrs	Client Info		949	913	0
Oil Age	hrs	Client Info		36	913	500
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		Changed	Changed	Not Changd
Filter Changed		Client Info		N/A	N/A	N/A
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

PQ		ASTM D8184		17	19	14
Iron	ppm	ASTM D5185m	>151	30	75	48
Chromium	ppm	ASTM D5185m	>11	0	1	<1
Nickel	ppm	ASTM D5185m	>10	0	0	0
Titanium	ppm	ASTM D5185m		<1	<1	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>21	3	10	6
Lead	ppm	ASTM D5185m	>51	0	<1	0
Copper	ppm	ASTM D5185m	>51	<1	<1	<1
Tin	ppm	ASTM D5185m	>4	0	<1	0
Vanadium	ppm	ASTM D5185m		0	0	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

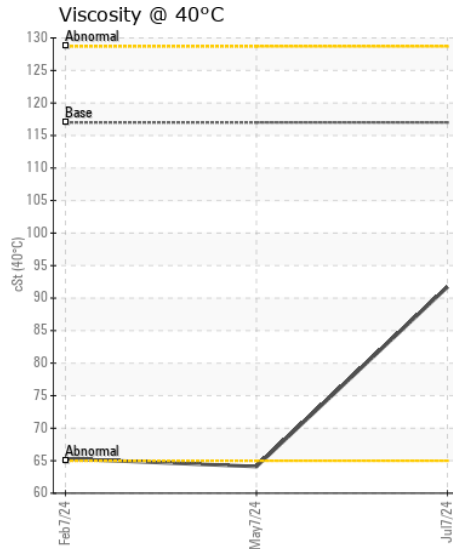
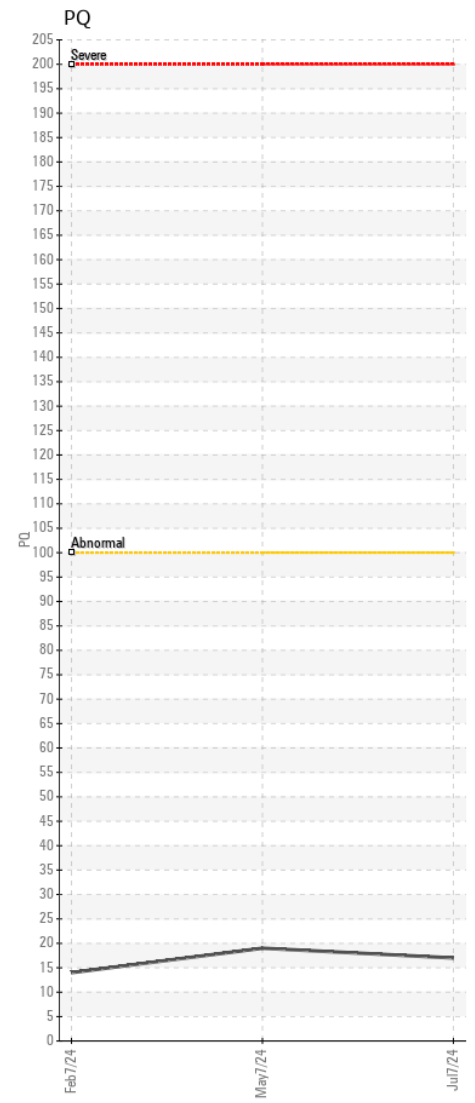
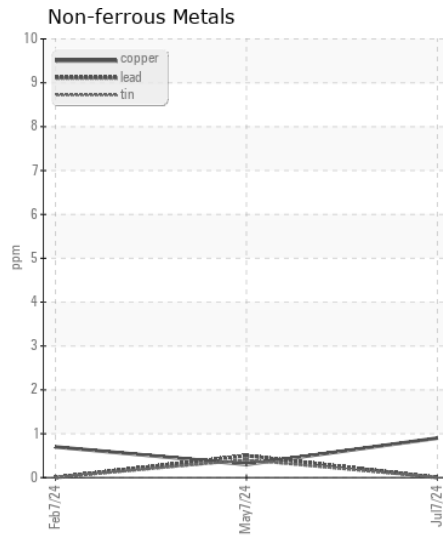
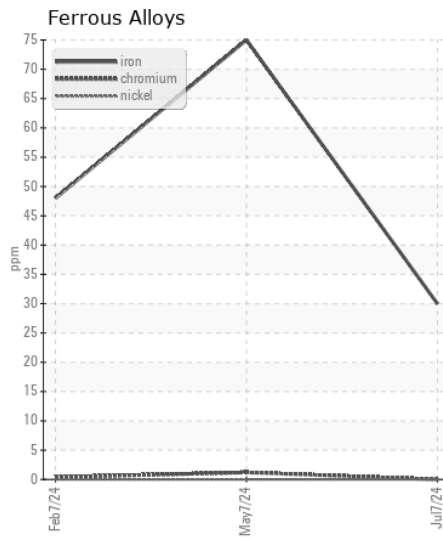
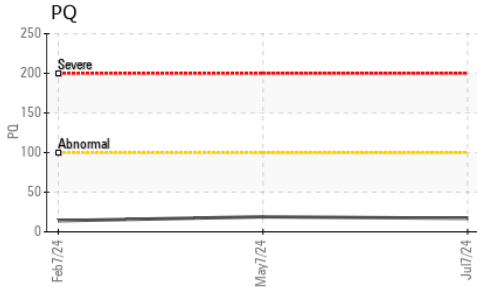
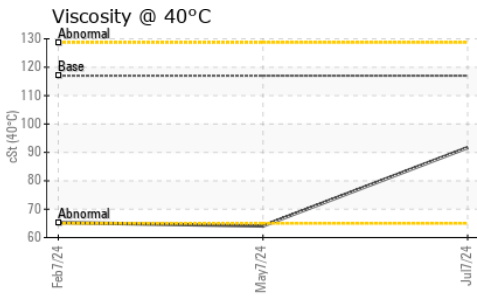
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>31	9	24	19
Potassium	ppm	ASTM D5185m	>20	<1	1	4
Water		WC Method	>0.1	NEG	NEG	NEG
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	>0.1	NEG	NEG	NEG

FLUID CONDITION

The condition of the oil is acceptable for the time in service.

Sodium	ppm	ASTM D5185m	>51	3	5	0
Boron	ppm	ASTM D5185m		261	65	58
Barium	ppm	ASTM D5185m		<1	5	13
Molybdenum	ppm	ASTM D5185m		235	106	107
Manganese	ppm	ASTM D5185m		1	4	2
Magnesium	ppm	ASTM D5185m		740	13	13
Calcium	ppm	ASTM D5185m		1777	3990	3686
Phosphorus	ppm	ASTM D5185m		1008	1132	1094
Zinc	ppm	ASTM D5185m		1116	1264	1254
Sulfur	ppm	ASTM D5185m		4224	9210	8706
Visc @ 40°C	cSt	ASTM D445	117	91.7	64.1	65.3



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : JR0220213 **Received** : 09 Jul 2024
Lab Number : 06231723 **Tested** : 10 Jul 2024
Unique Number : 11115216 **Diagnosed** : 10 Jul 2024 - Wes Davis
Test Package : CONST (Additional Tests: PQ)

CARLTON'S BACKHOE
 9550 STATESVILLE ROAD
 CHARLOTTE, NC
 US 28269
 Contact: LEO

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)

T: (704)547-0211

F: