



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area
[05W46818]

Machine Id
HITACHI 245LC-6 HCMDFD60P00700165

Component
Pump Drive

Fluid
JOHN DEERE ENGINE OIL PLUS 50 II 15W40 (2 QTS)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		JR0217792	JR0183769	JR0146567
Sample Date		Client Info		24 May 2024	08 Sep 2023	27 Sep 2022
Machine Age	hrs	Client Info		4461	4461	3937
Oil Age	hrs	Client Info		1000	524	1000
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		Changed	N/A	Changed
Filter Changed		Client Info		N/A	N/A	N/A
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

PQ	UOM	Method	Limit/Abn	Current	History1	History2
PQ		ASTM D8184		16	16	10
Iron	ppm	ASTM D5185m	>500	44	34	35
Chromium	ppm	ASTM D5185m	>15	1	<1	<1
Nickel	ppm	ASTM D5185m	>10	<1	0	0
Titanium	ppm	ASTM D5185m		<1	<1	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>20	7	4	5
Lead	ppm	ASTM D5185m		0	0	<1
Copper	ppm	ASTM D5185m	>35	<1	0	<1
Tin	ppm	ASTM D5185m	>4	<1	0	<1
Vanadium	ppm	ASTM D5185m		<1	0	<1
White Metal	scalar	*Visual	NONE	NONE	NONE	LIGHT
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

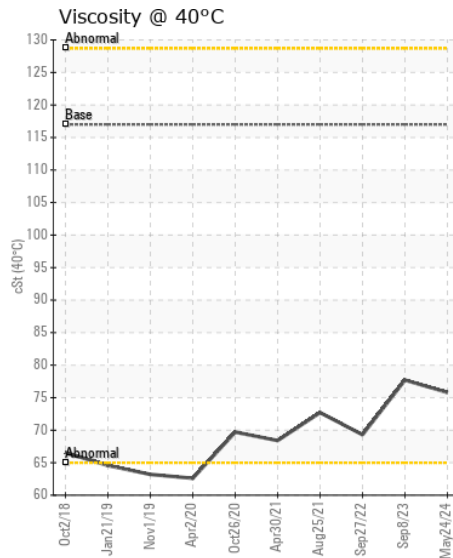
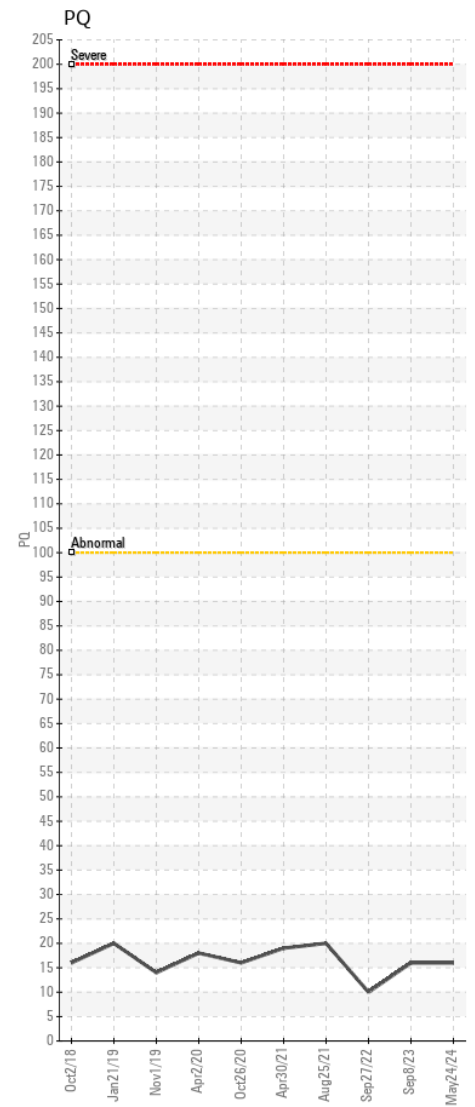
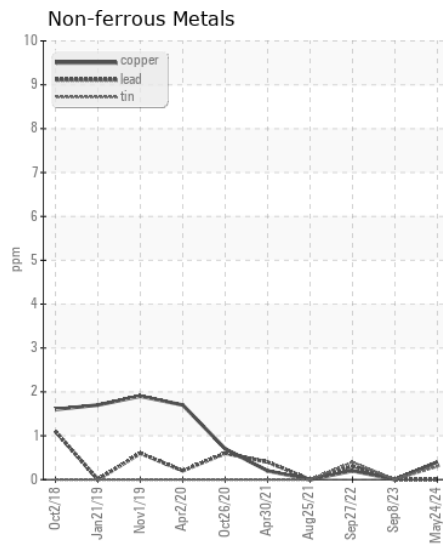
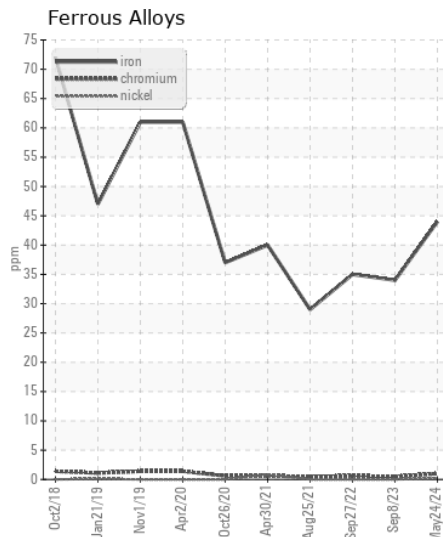
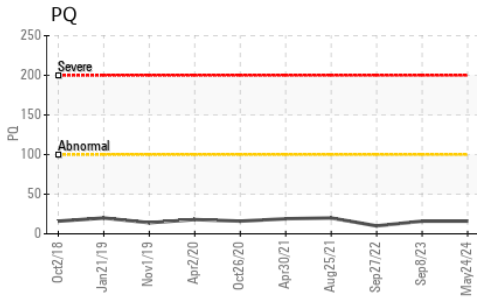
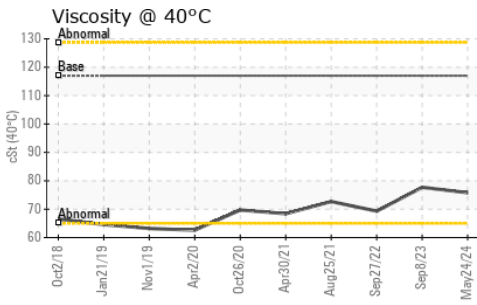
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>75	16	18	14
Potassium	ppm	ASTM D5185m	>20	3	<1	1
Water		WC Method	>0.2	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	>0.2	NEG	NEG	NEG

FLUID CONDITION

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

Sodium	ppm	ASTM D5185m		<1	2	4
Boron	ppm	ASTM D5185m		349	318	324
Barium	ppm	ASTM D5185m		3	0	1
Molybdenum	ppm	ASTM D5185m		265	249	249
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m		828	842	786
Calcium	ppm	ASTM D5185m		1421	1443	1481
Phosphorus	ppm	ASTM D5185m		1057	926	933
Zinc	ppm	ASTM D5185m		1112	1069	1065
Sulfur	ppm	ASTM D5185m		4473	3906	3906
Visc @ 40°C	cSt	ASTM D445	117	75.8	77.7	69.3



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : JR0217792 **Received** : 29 May 2024
Lab Number : 06194723 **Tested** : 31 May 2024
Unique Number : 11056846 **Diagnosed** : 31 May 2024 - Wes Davis
Test Package : CONST (Additional Tests: PQ)

JRE - MANASSAS PARK
 9107 OWENS DRIVE
 MANASSAS PARK, VA
 US 20111

Contact: DON VEST
 dvest@jamesriverequipment.com
 T: (703)631-8500
 F: (703)631-4715

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)