

Machine Id HITACHI 350LC 1FFDDR70CLF940874 Component Pump Drive Fluid JOHN DEERE ENGINE OIL PLUS 50 II 15W40 (--- GAL)

RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
Besample at the next service interval to monitor	Sample Number		Client Info		JR0202557	JR0175132	JR0151131
	Sample Date		Client Info		27 Feb 2024	24 May 2023	14 Oct 2022
	Machine Age	hrs	Client Info		3560	2538	1983
	Oil Age	hrs	Client Info		1285	2538	0
	Filter Age	hrs	Client Info		0	0	0
	Oil Changed		Client Info		Not Changd	N/A	N/A
	Filter Changed		Client Info		N/A	N/A	N/A
	Sample Status				ATTENTION	NORMAL	NORMAL
WEAR	PQ		ASTM D8184		24	16	11
All component wear rates are normal.	Iron	ppm	ASTM D5185m	>500	15	40	85
	Chromium	ppm	ASTM D5185m	>15	0	<1	1
	Nickel	ppm	ASTM D5185m	>10	0	0	0
	Titanium	ppm	ASTM D5185m		0	0	<1
	Silver	ppm	ASTM D5185m		0	0	0
	Aluminum	ppm	ASTM D5185m	>20	0	2	6
	Lead	ppm	ASTM D5185m		0	0	0
	Copper	ppm	ASTM D5185m	>35	0	0	<1
	Tin	ppm	ASTM D5185m	>4	0	0	0
	Vanadium	ppm	ASTM D5185m		0	0	0
	White Metal	scalar	*Visual	NONE	NONE	MODER	MODER
	Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
CONTAMINATION There is no indication of any contamination in the oil.	Silicon	ppm	ASTM D5185m	>75	3	12	31
	Potassium	ppm	ASTM D5185m	>20	0	2	3
	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	Sodium	ppm	ASTM D5185m		3	0	0
The oil viscosity is higher than normal. This plus the additive levels indicates the addition of a different brand, or type of oil. Confirm oil type.	Boron	ppm	ASTM D5185m		<mark>)</mark> 29	319	269
	Barium	ppm	ASTM D5185m		0	3	0
	Molybdenum	ppm	ASTM D5185m		<mark>)</mark> 30	275	252
	Manganese	ppm	ASTM D5185m		0	<1	2
	Magnesium	ppm	ASTM D5185m		<mark>)</mark> 87	791	739
	Calcium	ppm	ASTM D5185m		e 220	1584	1647
	Phosphorus	ppm	ASTM D5185m		2065	1026	1014
	Zinc	ppm	ASTM D5185m		e 150	1143	1132
	Sulfur	ppm	ASTM D5185m		21525	3978	5434

Visc @ 40°C

cSt

ASTM D445 117

Submitted By: Steven Bass

71.3

130

65.4



: WearCheck USA - 501 Madison Ave., Cary, NC 27513 Laboratory **JRE - GARNER** : JR0202557 : 29 Feb 2024 4161 AUBURN CHURCH RD Sample No. Received Lab Number : 06104593 :01 Mar 2024 GARNER, NC Tested Unique Number : 10902823 : 04 Mar 2024 - Don Baldridge US 27529 Diagnosed Test Package : CONST (Additional Tests: PQ) Contact: RALEIGH SHOP Certificate L2367 To discuss this sample report, contact Customer Service at 1-800-237-1369. sean.betts@jamesriverequipment.com;catherine.anastasio@wearcheck.com * - Denotes test methods that are outside of the ISO 17025 scope of accreditation. T: (919)614-2260 Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012) F: (919)779-5432

Page 2 of 2