



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL



Machine Id
JOHN DEERE 410E 1DW410ETAKF697801
Component
Hydraulic System
Fluid
TDH FLUID SAE 75W80 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		JR0185950	JR0163427	JR0130536
Sample Date		Client Info		06 Sep 2023	04 Apr 2023	25 Apr 2022
Machine Age	hrs	Client Info		6142	5168	3970
Oil Age	hrs	Client Info		6142	5168	0
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		Not Chngd	Not Chngd	Changed
Filter Changed		Client Info		Not Chngd	Not Chngd	Changed
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

Test	UOM	Method	Limit/Abn	Current	History1	History2
PQ		ASTM D8184	>50	15	11	20
Iron	ppm	ASTM D5185m	>71	5	5	8
Chromium	ppm	ASTM D5185m	>11	<1	<1	2
Nickel	ppm	ASTM D5185m	>6	0	0	0
Titanium	ppm	ASTM D5185m		0	0	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>11	1	1	2
Lead	ppm	ASTM D5185m	>13	0	0	<1
Copper	ppm	ASTM D5185m	>21	1	<1	1
Tin	ppm	ASTM D5185m	>5	0	0	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

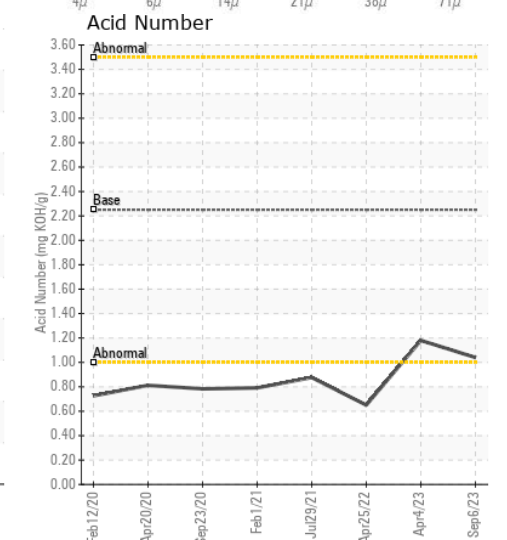
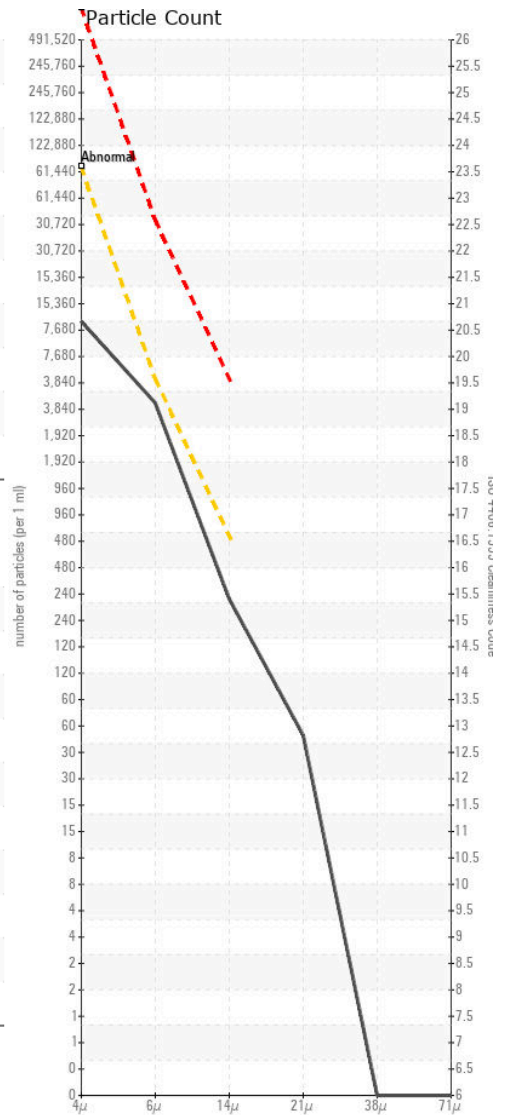
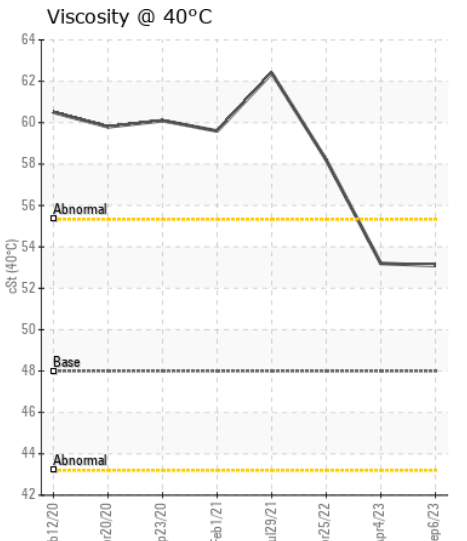
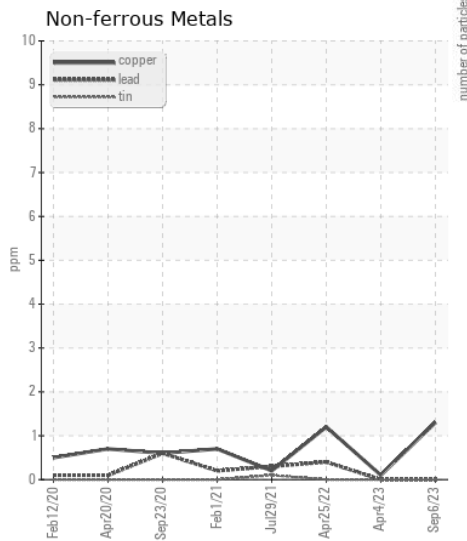
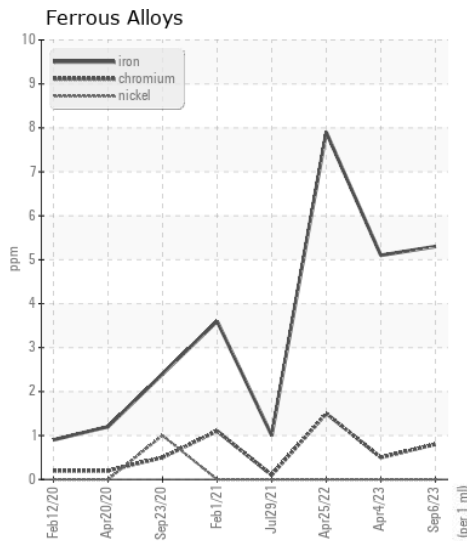
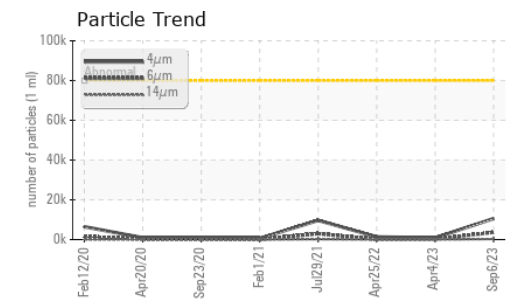
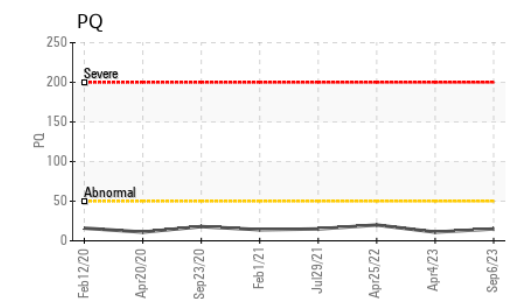
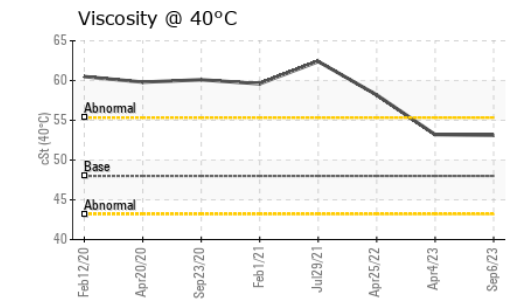
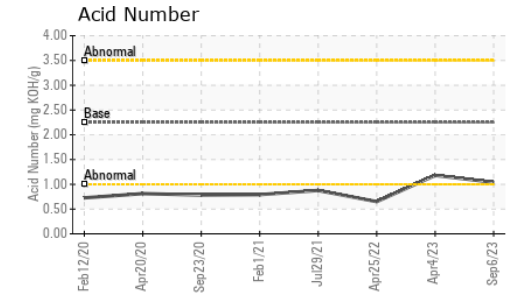
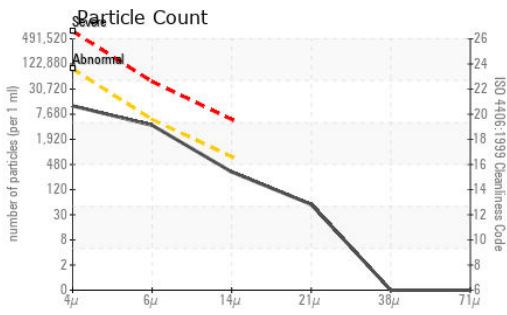
The amount and size of particulates present in the system are acceptable. There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>24	7	7	3
Potassium	ppm	ASTM D5185m	>20	0	0	1
Water		WC Method	>0.075	NEG	NEG	NEG
Particles >4µm		ASTM D7647	>80000	10584	893	1359
Particles >6µm		ASTM D7647	>5000	3637	220	117
Particles >14µm		ASTM D7647	>640	280	14	15
Particles >21µm		ASTM D7647	>160	47	1	6
Particles >38µm		ASTM D7647	>40	0	0	0
Particles >71µm		ASTM D7647	>10	0	0	0
Oil Cleanliness		ISO 4406 (c)	>23/19/16	21/19/15	17/15/11	18/14/11
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

FLUID CONDITION

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

Sodium	ppm	ASTM D5185m	>21	2	1	0
Boron	ppm	ASTM D5185m	10	0	0	<1
Barium	ppm	ASTM D5185m	10	7	0	0
Molybdenum	ppm	ASTM D5185m	10	<1	<1	<1
Manganese	ppm	ASTM D5185m		0	<1	0
Magnesium	ppm	ASTM D5185m	100	75	66	8
Calcium	ppm	ASTM D5185m	3500	2113	1666	319
Phosphorus	ppm	ASTM D5185m	1150	804	684	599
Zinc	ppm	ASTM D5185m	1150	1022	880	817
Sulfur	ppm	ASTM D5185m	5000	3064	2485	1376
Acid Number (AN)	mg KOH/g	ASTM D8045	2.25	1.04	1.18	0.65
Visc @ 40°C	cSt	ASTM D445	48	53.1	53.2	58.2



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : JR0185950 **Received** : 07 Sep 2023
Lab Number : 05944482 **Tested** : 08 Sep 2023
Unique Number : 10635094 **Diagnosed** : 09 Sep 2023 - Don Baldrige
Test Package : CONST (Additional Tests: PQ)

JRE - GARNER
 4161 AUBURN CHURCH RD
 GARNER, NC
 US 27529

To discuss this sample report, contact Customer Service at 1-800-237-1369.

Contact: RALEIGH SHOP
 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