



WEAR	ATTENTION
CONTAMINATION	ABNORMAL
FLUID CONDITION	ABNORMAL

Machine Id
HITACHI 350LC-6 1FFDDR70KHF940224
 Component
Hydraulic System
 Fluid
HITACHI HYDRAULIC SUPER EX 46HN (--- GAL)

RECOMMENDATION

Oil and filter change at the time of sampling has been noted. Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		JR0212804	JR0156768	JR0090768
Sample Date		Client Info		30 May 2024	03 Jan 2023	21 Jun 2021
Machine Age	hrs	Client Info		7770	5675	4088
Oil Age	hrs	Client Info		7770	5675	0
Filter Age	hrs	Client Info		7770	0	0
Oil Changed		Client Info		Changed	Changed	Not Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				ABNORMAL	ABNORMAL	ABNORMAL

WEAR

The iron level is marginal.

PQ	UOM	Method	Limit/Abn	Current	History1	History2
Iron	ppm	ASTM D5185m	>20	17	8	8
Chromium	ppm	ASTM D5185m	>10	4	5	10
Nickel	ppm	ASTM D5185m	>10	0	0	0
Titanium	ppm	ASTM D5185m		<1	0	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>10	5	3	2
Lead	ppm	ASTM D5185m	>10	<1	<1	<1
Copper	ppm	ASTM D5185m	>75	3	3	3
Tin	ppm	ASTM D5185m	>10	<1	<1	<1
Vanadium	ppm	ASTM D5185m		0	0	0
White Metal	scalar	*Visual	NONE	NONE	▲ LIGHT	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

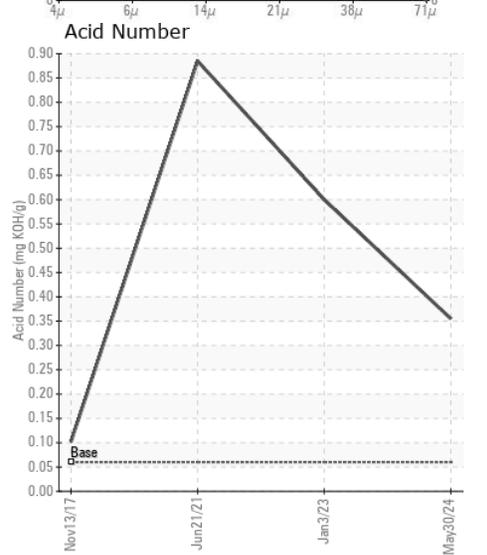
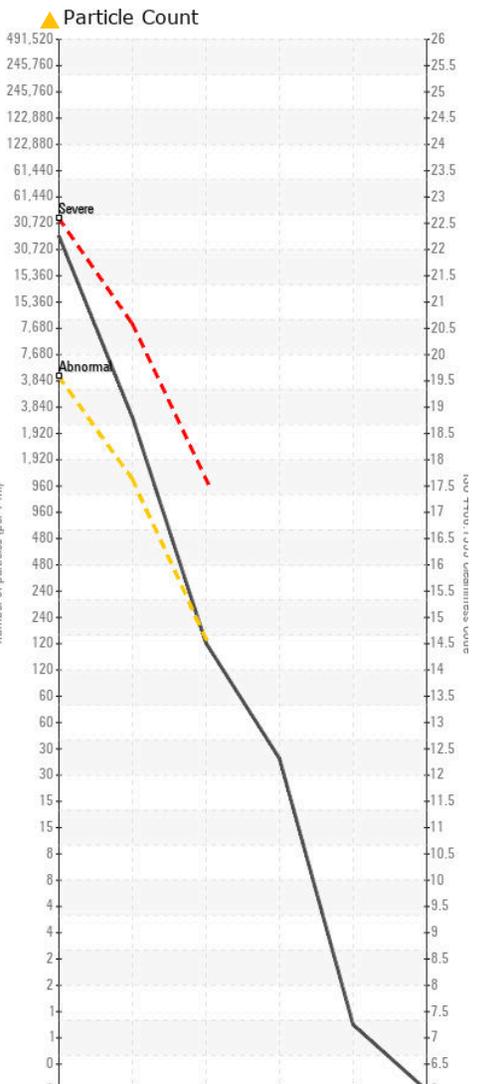
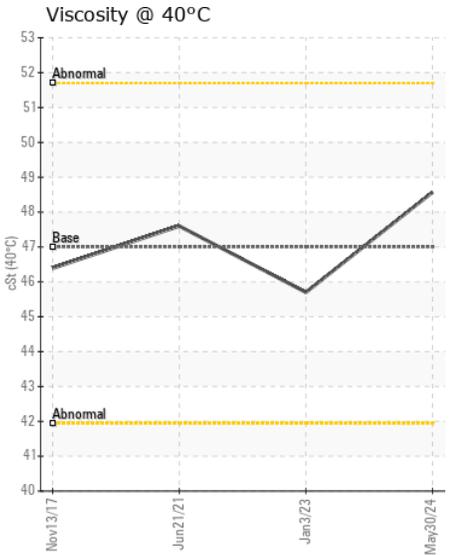
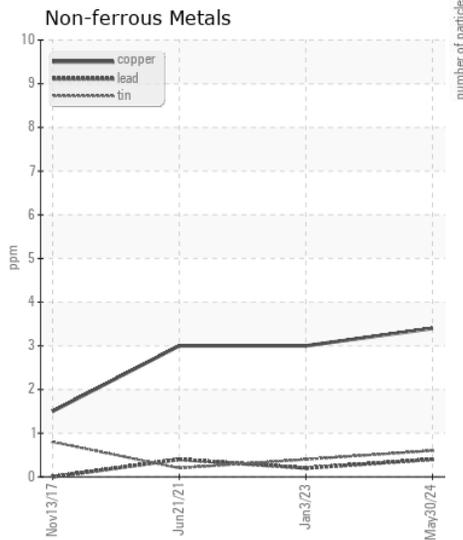
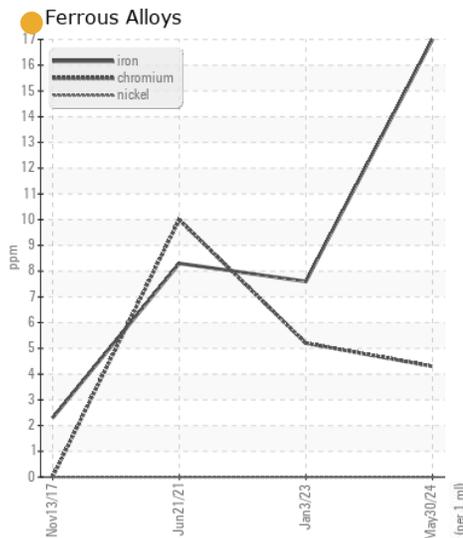
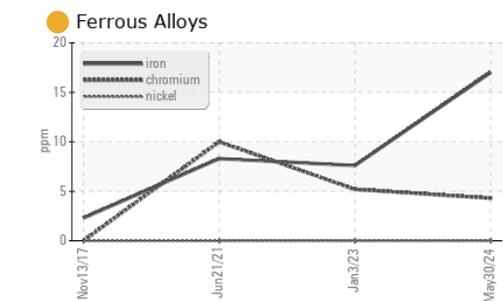
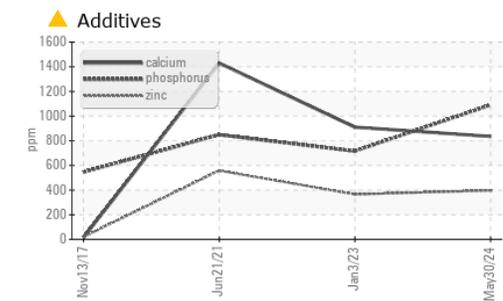
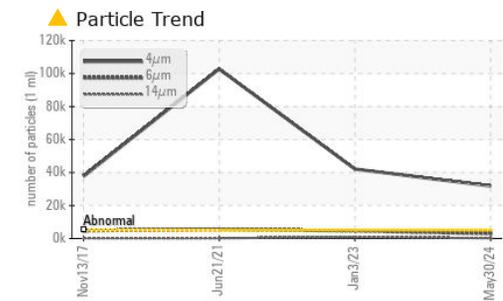
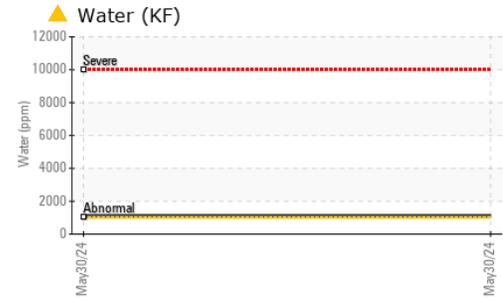
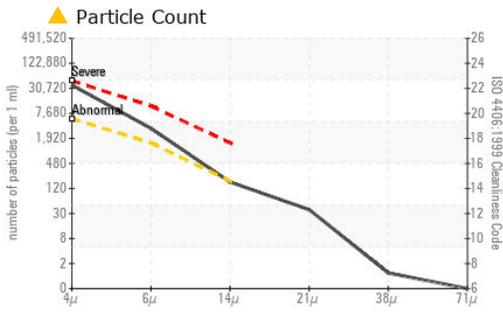
There is a high amount of silt (particulates < 14 microns in size) present in the oil. There is a light concentration of water present in the oil.

Silicon	ppm	ASTM D5185m	>20	12	6	8
Potassium	ppm	ASTM D5185m	>20	2	0	0
Water	%	ASTM D6304	>0.1	▲ 0.109	---	---
ppm Water	ppm	ASTM D6304	>1000	▲ 1090	---	---
Particles >4µm		ASTM D7647	>5000	▲ 31832	▲ 42101	▲ 102774
Particles >6µm		ASTM D7647	>1300	▲ 2931	▲ 4583	▲ 5519
Particles >14µm		ASTM D7647	>160	151	▲ 858	158
Particles >21µm		ASTM D7647	>40	33	▲ 288	38
Particles >38µm		ASTM D7647	>10	1	▲ 11	2
Particles >71µm		ASTM D7647	>3	0	0	0
Oil Cleanliness		ISO 4406 (c)	>19/17/14	▲ 22/19/14	▲ 23/19/17	▲ 24/20/14
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	LIGHT	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	0.2%	NEG	NEG

FLUID CONDITION

Zinc level above manufacturer's recommendations. Additive levels indicate the addition of a different brand, or type of oil. Confirm oil type. The AN level is acceptable for this fluid.

Sodium	ppm	ASTM D5185m		1	<1	4
Boron	ppm	ASTM D5185m		9	10	55
Barium	ppm	ASTM D5185m		<1	0	0
Molybdenum	ppm	ASTM D5185m		<1	<1	<1
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m		5	5	6
Calcium	ppm	ASTM D5185m		835	910	1430
Phosphorus	ppm	ASTM D5185m	827	1090	716	849
Zinc	ppm	ASTM D5185m	0	397	365	558
Sulfur	ppm	ASTM D5185m	13	3186	1921	3121
Acid Number (AN)	mg KOH/g	ASTM D8045	0.06	0.355	0.60	0.885
Visc @ 40°C	cSt	ASTM D445	47	48.57	45.7	47.6



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : JR0212804 **Received** : 31 May 2024
Lab Number : 06197220 **Tested** : 31 May 2024
Unique Number : 11059343 **Diagnosed** : 31 May 2024 - Doug Bogart
Test Package : CONST (Additional Tests: KF, PQ)

JRE - GARNER
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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)