CONST

WEAR CHECK

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	ABNORMAL
FLUID CONDITION	NORMAL

Machine Id
CATERPILLAR D6K2 LGPAC 002098 (S/N OJTR01139)
Component
Hydraulic System
Fluid
CASTROL DUAL RANGE HV HYD OIL ISO 46 (17 GAL)

RECOMMENDATION

The filter change at the time of sampling has been noted. We recommend an early resample to monitor this condition.

WEAR

All component wear rates are normal.

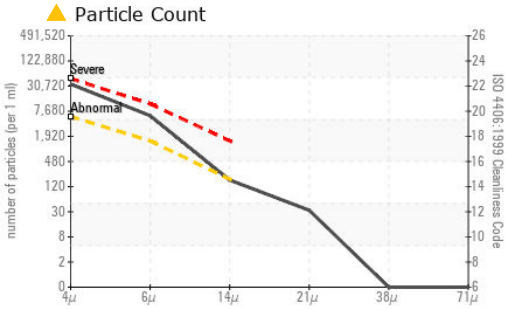
CONTAMINATION

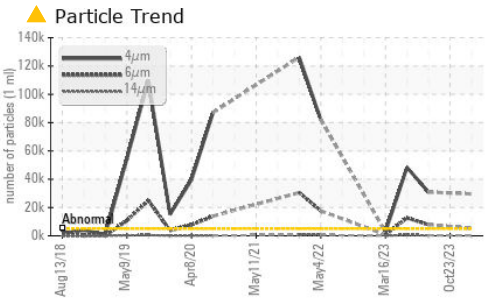
There is a moderate amount of silt (particulates < 14 microns in size) present in the oil.

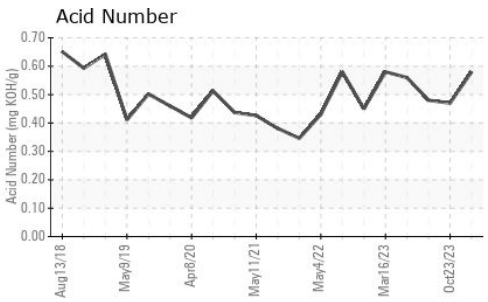
FLUID CONDITION

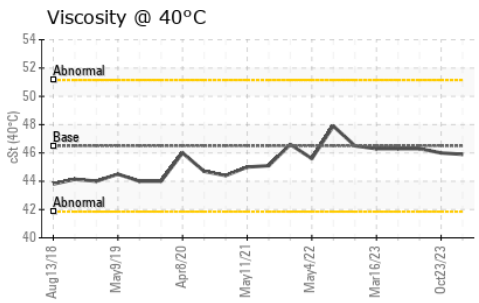
The AN level is acceptable for this fluid. The oil is still serviceable provided that the contaminant(s) can be reduced to acceptable levels.

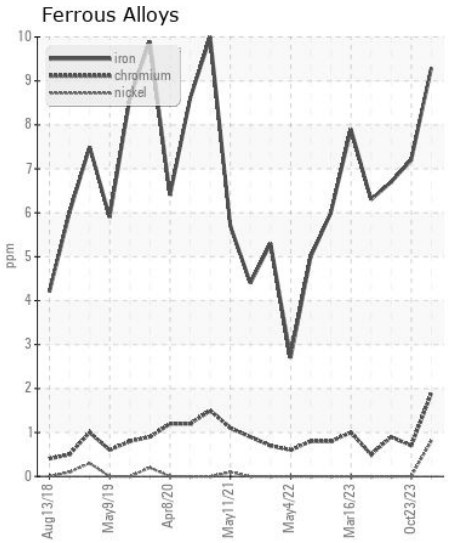
Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		WC0856310	WC0823945	WC0724634
Sample Date		Client Info		22 Mar 2024	23 Oct 2023	03 Aug 2023
Machine Age	hrs	Client Info		10200	9661	9232
Oil Age	hrs	Client Info		1500	429	69
Filter Age	hrs	Client Info		539	429	69
Oil Changed		Client Info		Changed	Not Changd	Not Changd
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				ABNORMAL	ABNORMAL	ABNORMAL
Iron	ppm	ASTM D5185m	>20	9	7	7
Chromium	ppm	ASTM D5185m	>10	2	<1	<1
Nickel	ppm	ASTM D5185m	>10	<1	0	0
Titanium	ppm	ASTM D5185m		1	0	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>10	4	1	3
Lead	ppm	ASTM D5185m	>10	1	0	<1
Copper	ppm	ASTM D5185m	>75	2	1	<1
Tin	ppm	ASTM D5185m	>10	1	0	0
Vanadium	ppm	ASTM D5185m		<1	0	0
White Metal	scalar	*Visual	NONE	NONE	▲ MODER	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Silicon	ppm	ASTM D5185m	>20	8	7	7
Potassium	ppm	ASTM D5185m	>20	2	2	1
Water		WC Method	>0.1	NEG	NEG	NEG
Particles >4µm		ASTM D7647	>5000	▲ 29566	---	▲ 30836
Particles >6µm		ASTM D7647	>1300	▲ 5233	---	▲ 7859
Particles >14µm		ASTM D7647	>160	152	---	● 285
Particles >21µm		ASTM D7647	>40	29	---	47
Particles >38µm		ASTM D7647	>10	0	---	2
Particles >71µm		ASTM D7647	>3	0	---	1
Oil Cleanliness		ISO 4406 (c)	>19/17/14	▲ 22/20/14	---	▲ 22/20/15
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
Sodium	ppm	ASTM D5185m		0	0	0
Boron	ppm	ASTM D5185m		19	19	20
Barium	ppm	ASTM D5185m		0	0	2
Molybdenum	ppm	ASTM D5185m		4	3	3
Manganese	ppm	ASTM D5185m		<1	0	0
Magnesium	ppm	ASTM D5185m		54	57	59
Calcium	ppm	ASTM D5185m		735	740	762
Phosphorus	ppm	ASTM D5185m		473	406	461
Zinc	ppm	ASTM D5185m		521	550	580
Sulfur	ppm	ASTM D5185m		1387	1577	1584
Acid Number (AN)	mg KOH/g	ASTM D8045		0.58	0.47	0.48
Visc @ 40°C	cSt	ASTM D445	46.5	45.9	46.0	46.3

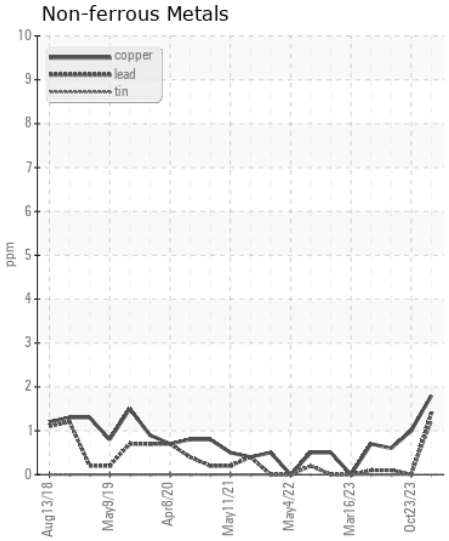


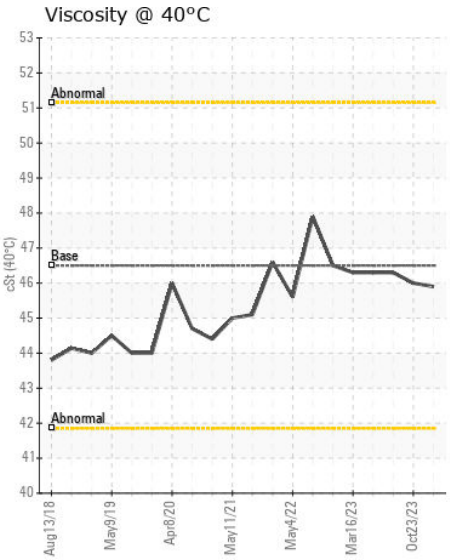


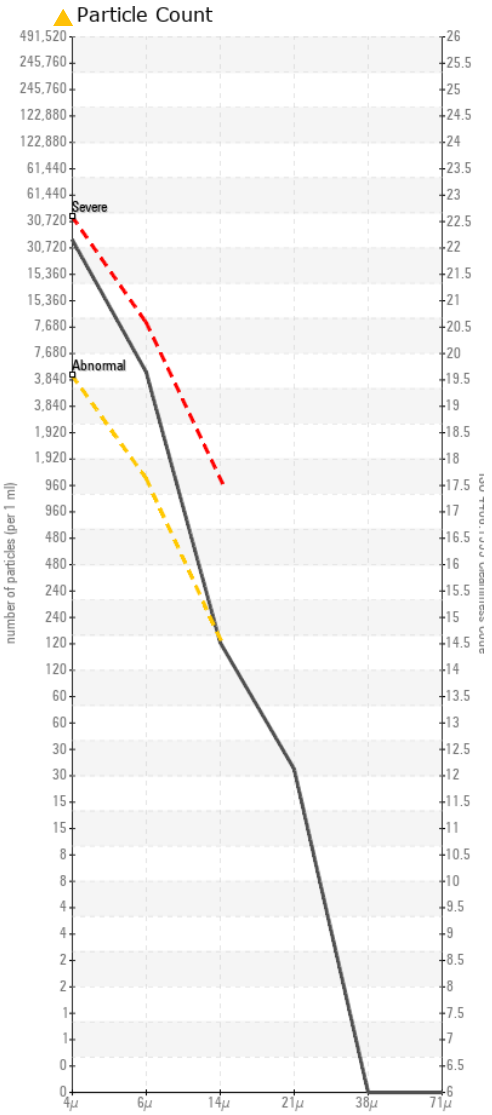


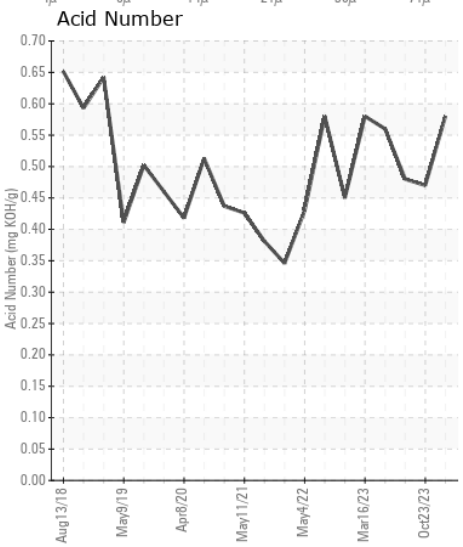












Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0856310
Lab Number : 06147274
Unique Number : 10977352
Test Package : CONST

Received : 12 Apr 2024
Tested : 15 Apr 2024
Diagnosed : 15 Apr 2024 - Wes Davis

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)

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