



OIL ANALYSIS REPORT

WEAR	SEVERE
CONTAMINATION	ABNORMAL
FLUID CONDITION	NORMAL



Area
Mobile Fleet
Machine Id
5214 5214
Component
Hydraulic System
Fluid
MOBIL HYDRAULIC 10W (38 GAL)

RECOMMENDATION

The filter change at the time of sampling has been noted. We advise that you inspect for the source(s) of wear. We recommend an early resample to monitor this condition.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		WC0918624	WC0861920	WC0867199
Sample Date		Client Info		15 Mar 2024	05 Jan 2024	20 Oct 2023
Machine Age	hrs	Client Info		11984	11449	10920
Oil Age	hrs	Client Info		1064	529	2002
Filter Age	hrs	Client Info		525	529	2002
Oil Changed		Client Info		Not Changed	Not Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				SEVERE	SEVERE	SEVERE

WEAR

The iron level is severe.

Iron	ppm	ASTM D5185m	>20	▲ 103	▲ 85	▲ 145
Chromium	ppm	ASTM D5185m	>10	0	0	<1
Nickel	ppm	ASTM D5185m	>10	0	0	<1
Titanium	ppm	ASTM D5185m		<1	0	<1
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>10	3	2	2
Lead	ppm	ASTM D5185m	>10	0	0	<1
Copper	ppm	ASTM D5185m	>75	5	4	9
Tin	ppm	ASTM D5185m	>10	<1	0	0
Vanadium	ppm	ASTM D5185m		0	0	0
White Metal	scalar	*Visual	NONE	NONE	NONE	LIGHT
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

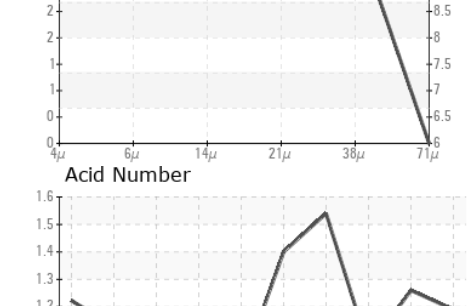
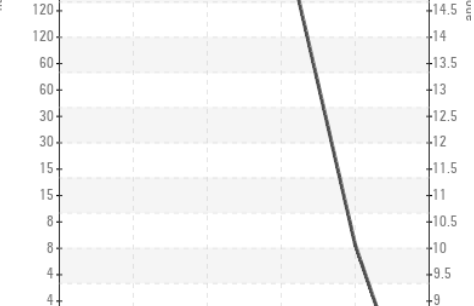
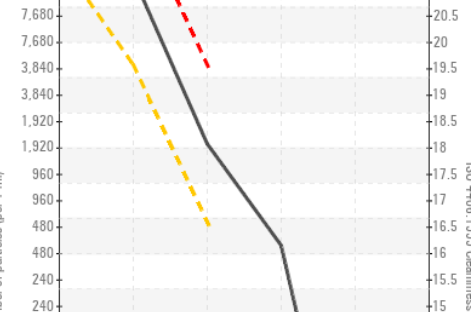
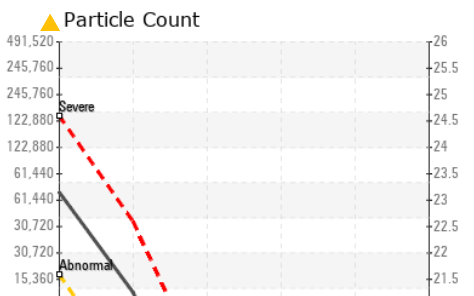
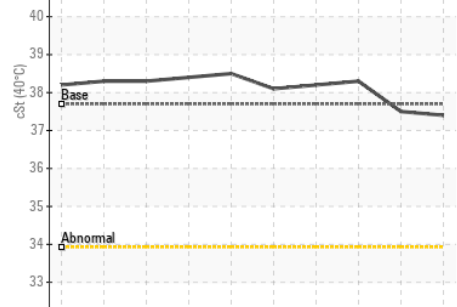
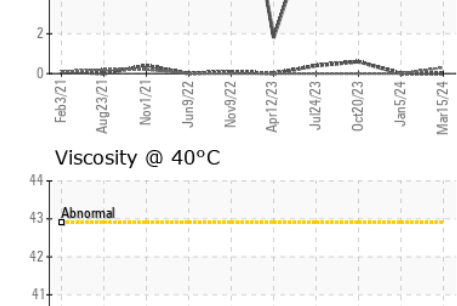
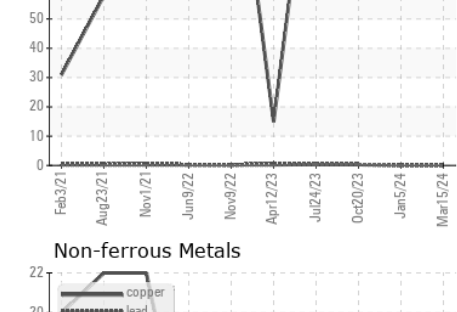
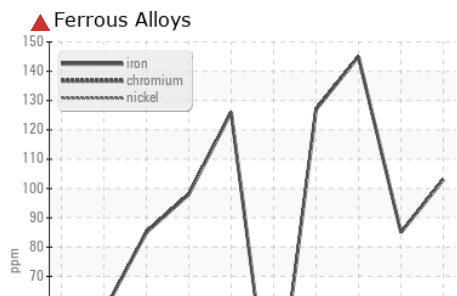
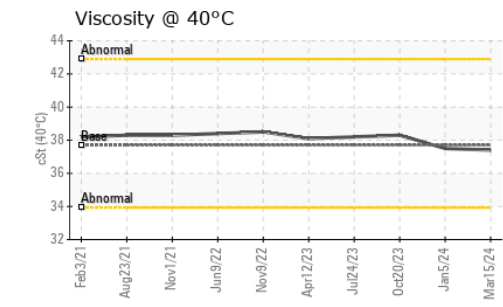
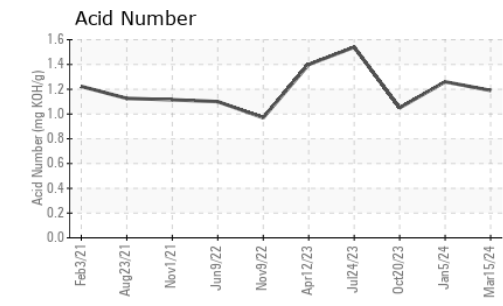
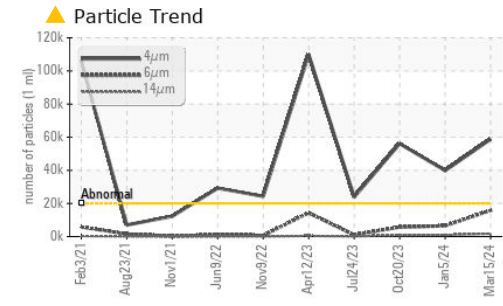
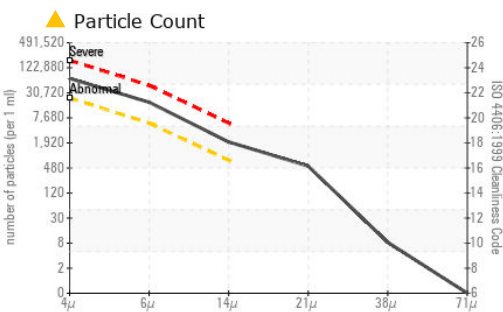
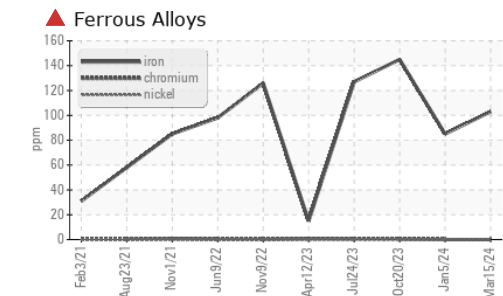
There is a high amount of particulates present in the oil.

Silicon	ppm	ASTM D5185m	>20	11	8	14
Potassium	ppm	ASTM D5185m	>20	0	0	2
Water		WC Method	>0.1	NEG	NEG	NEG
Particles >4µm		ASTM D7647	>20000	▲ 58779	● 39816	▲ 56049
Particles >6µm		ASTM D7647	>5000	▲ 15807	● 6485	▲ 5723
Particles >14µm		ASTM D7647	>640	▲ 1773	● 920	▲ 777
Particles >21µm		ASTM D7647	>160	▲ 469	● 289	▲ 245
Particles >38µm		ASTM D7647	>40	7	7	7
Particles >71µm		ASTM D7647	>10	0	0	0
Oil Cleanliness		ISO 4406 (c)	>21/19/16	▲ 23/21/18	● 22/20/17	▲ 23/20/17
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	LIGHT
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

FLUID CONDITION

The AN level is acceptable for this fluid.

Sodium	ppm	ASTM D5185m		<1	<1	0
Boron	ppm	ASTM D5185m		4	0	1
Barium	ppm	ASTM D5185m		0	0	9
Molybdenum	ppm	ASTM D5185m		2	<1	2
Manganese	ppm	ASTM D5185m		2	<1	2
Magnesium	ppm	ASTM D5185m		689	659	578
Calcium	ppm	ASTM D5185m		284	241	311
Phosphorus	ppm	ASTM D5185m		1096	1124	993
Zinc	ppm	ASTM D5185m		1275	1148	1215
Sulfur	ppm	ASTM D5185m		7322	5929	6748
Acid Number (AN)	mg KOH/g	ASTM D8045		1.19	1.26	1.05
Visc @ 40°C	cSt	ASTM D445	37.7	37.4	37.5	38.3



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0918624
Lab Number : 06123534
Unique Number : 10937685
Test Package : CONST
Received : 20 Mar 2024
Tested : 25 Mar 2024
Diagnosed : 25 Mar 2024 - Jonathan Hester

CAROLINA SUNROCK
 PO BOX 25
 BUTNER, NC
 US 27509
 Contact: Leigh Dennis
 rdennis@thesunrockgroup.com
 T: (919)575-4505
 F: (919)575-0162

Certificate L2367
 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)