



Machine Id
TENNESSEE MERCHANT
Component
2 Steering
Fluid
CERTIFIED HOC XTREME 46 (--- GAL)

RECOMMENDATION

We recommend that you drain the fluid and perform a filter service on this component if not already done. We recommend an early resample to monitor this condition.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		MW0044722	---	---
Sample Date		Client Info		05 Jul 2024	---	---
Machine Age	hrs	Client Info		7855	---	---
Oil Age	hrs	Client Info		2000	---	---
Filter Age	hrs	Client Info		100	---	---
Oil Changed		Client Info		Not Changd	---	---
Filter Changed		Client Info		Not Changd	---	---
Sample Status				SEVERE	---	---

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>50	22	---	---
Chromium	ppm	ASTM D5185m	>15	<1	---	---
Nickel	ppm	ASTM D5185m	>5	0	---	---
Titanium	ppm	ASTM D5185m		2	---	---
Silver	ppm	ASTM D5185m		0	---	---
Aluminum	ppm	ASTM D5185m	>5	0	---	---
Lead	ppm	ASTM D5185m	>10	0	---	---
Copper	ppm	ASTM D5185m	>50	<1	---	---
Tin	ppm	ASTM D5185m	>5	0	---	---
Vanadium	ppm	ASTM D5185m		0	---	---
White Metal	scalar	*Visual	NONE	NONE	---	---
Yellow Metal	scalar	*Visual	NONE	NONE	---	---

CONTAMINATION

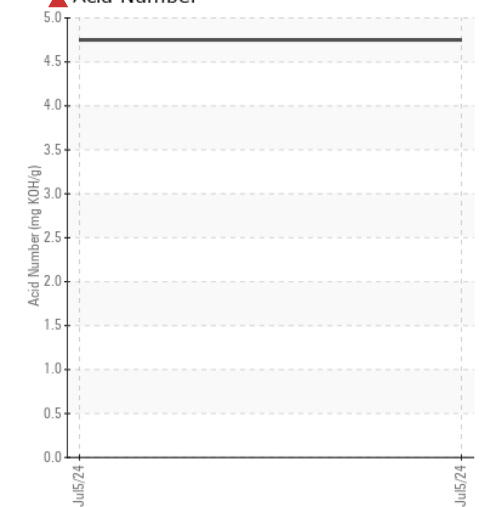
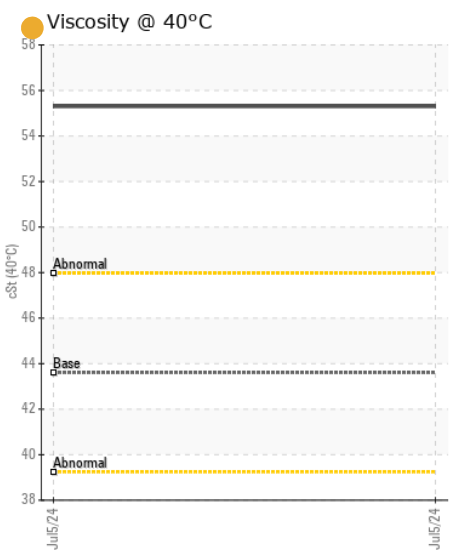
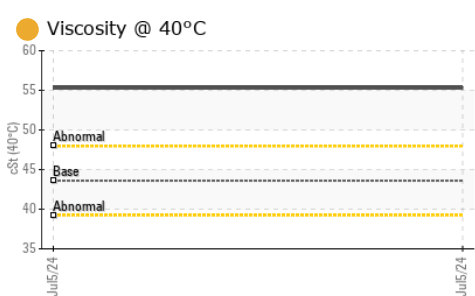
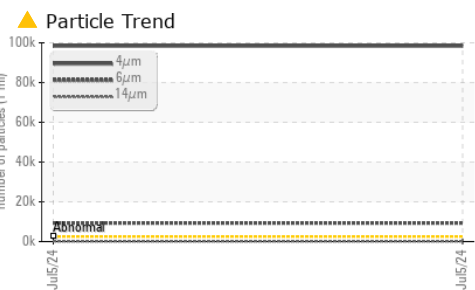
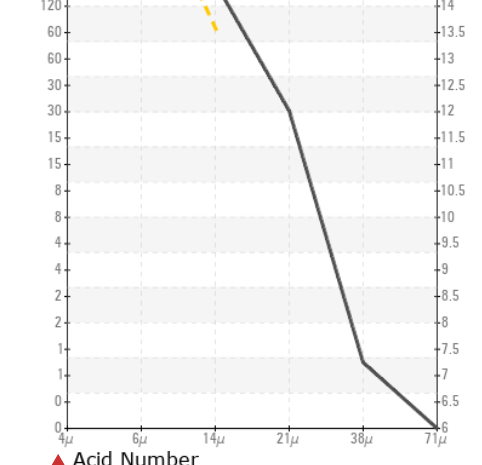
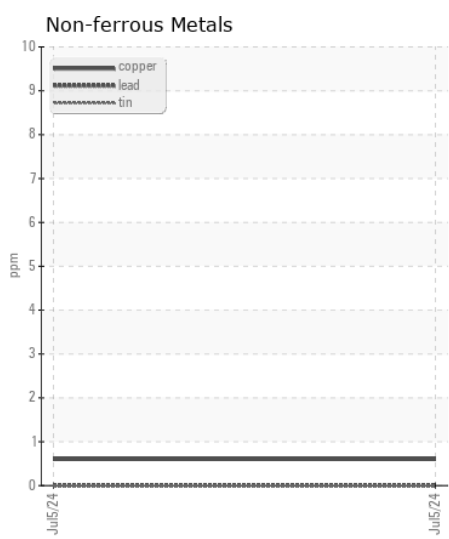
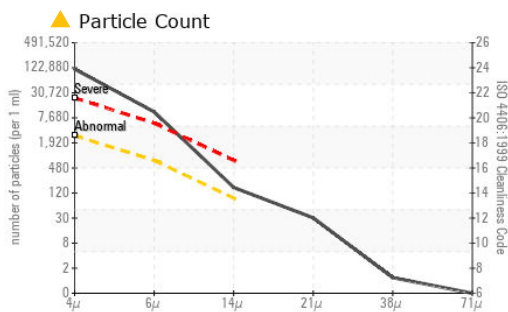
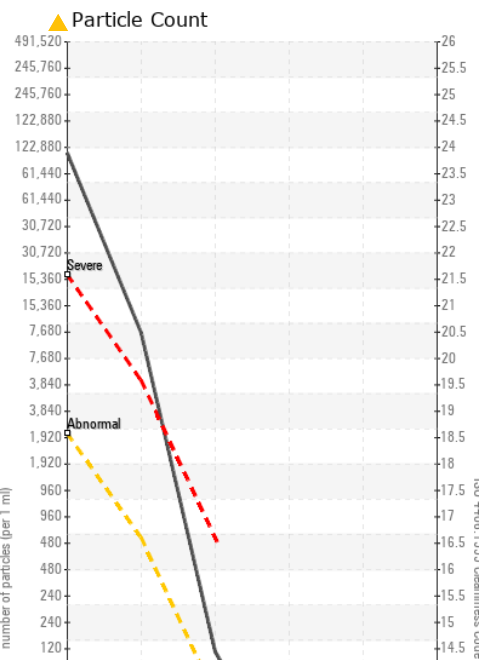
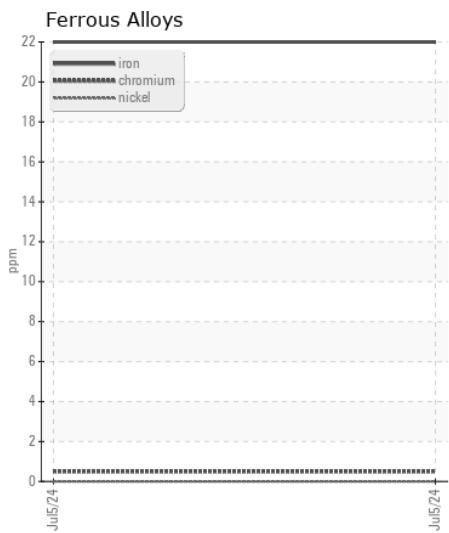
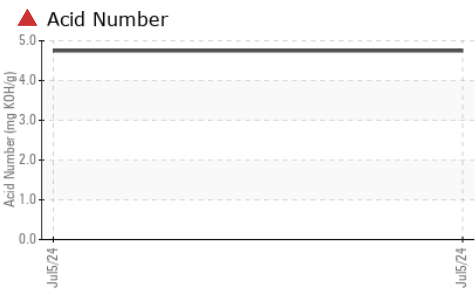
There is a high amount of particulates present in the fluid.

Silicon	ppm	ASTM D5185m	>15	<1	---	---
Potassium	ppm	ASTM D5185m	>20	<1	---	---
Water		WC Method	>0.2	NEG	---	---
Particles >4µm		ASTM D7647	>2500	▲ 98419	---	---
Particles >6µm		ASTM D7647	>640	▲ 9326	---	---
Particles >14µm		ASTM D7647	>80	▲ 144	---	---
Particles >21µm		ASTM D7647	>20	▲ 27	---	---
Particles >38µm		ASTM D7647	>4	1	---	---
Particles >71µm		ASTM D7647	>3	0	---	---
Oil Cleanliness		ISO 4406 (c)	>18/16/13	▲ 24/20/14	---	---
Silt	scalar	*Visual	NONE	NONE	---	---
Debris	scalar	*Visual	NONE	NONE	---	---
Sand/Dirt	scalar	*Visual	NONE	NONE	---	---
Appearance	scalar	*Visual	NORML	NORML	---	---
Odor	scalar	*Visual	NORML	NORML	---	---
Emulsified Water	scalar	*Visual	>0.2	NEG	---	---

FLUID CONDITION

The AN level is above the recommended limit. The fluid viscosity is higher than normal. The fluid is no longer serviceable.

Sodium	ppm	ASTM D5185m		<1	---	---
Boron	ppm	ASTM D5185m		0	---	---
Barium	ppm	ASTM D5185m		0	---	---
Molybdenum	ppm	ASTM D5185m		8	---	---
Manganese	ppm	ASTM D5185m		0	---	---
Magnesium	ppm	ASTM D5185m		0	---	---
Calcium	ppm	ASTM D5185m		7	---	---
Phosphorus	ppm	ASTM D5185m		61	---	---
Zinc	ppm	ASTM D5185m		105	---	---
Sulfur	ppm	ASTM D5185m		405	---	---
Acid Number (AN)	mg KOH/g	ASTM D8045		▲ 4.75	---	---
Visc @ 40°C	cSt	ASTM D445	43.6	● 55.3	---	---



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : MW0044722 **Received** : 12 Jul 2024
Lab Number : 06234808 **Tested** : 15 Jul 2024
Unique Number : 11123642 **Diagnosed** : 15 Jul 2024 - Don Baldridge
Test Package : MAR 2 (Additional Tests: PrtCount)

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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)