



TRAAP

Texas Refinery Advanced Analysis Program

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
CATERPILLAR 966H 966H-L05 A6D02689
 Component
Rear Differential
 Fluid
CHEVRON DELO TORQFORCE SAE 30 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		TR06196010	TR06119692	---
Sample Date		Client Info		20 May 2024	21 Feb 2024	---
Machine Age	hrs	Client Info		17655	17442	---
Oil Age	hrs	Client Info		0	0	---
Filter Age	hrs	Client Info		0	0	---
Oil Changed		Client Info		Not Changd	Not Changd	---
Filter Changed		Client Info		Not Changd	Not Changd	---
Sample Status				NORMAL	NORMAL	---

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>500	28	27	---
Chromium	ppm	ASTM D5185m	>3	<1	<1	---
Nickel	ppm	ASTM D5185m	>3	0	0	---
Titanium	ppm	ASTM D5185m	>2	0	0	---
Silver	ppm	ASTM D5185m	>2	0	0	---
Aluminum	ppm	ASTM D5185m	>30	<1	2	---
Lead	ppm	ASTM D5185m	>13	0	0	---
Copper	ppm	ASTM D5185m	>103	3	3	---
Tin	ppm	ASTM D5185m	>5	0	0	---
Vanadium	ppm	ASTM D5185m		<1	0	---
White Metal	scalar	*Visual	NONE	NONE	NONE	---
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	---

CONTAMINATION

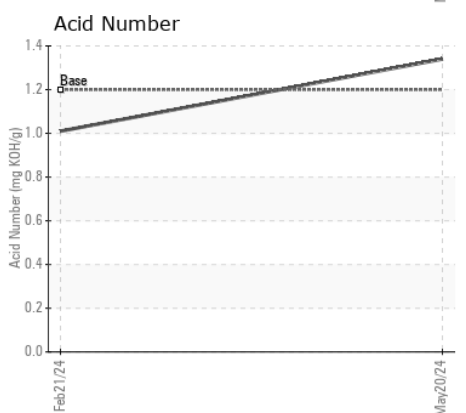
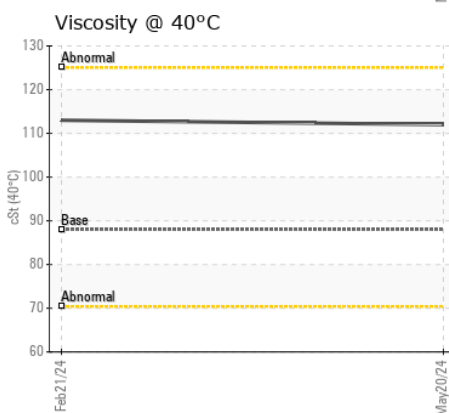
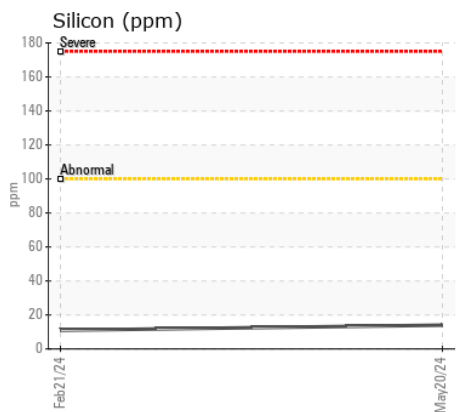
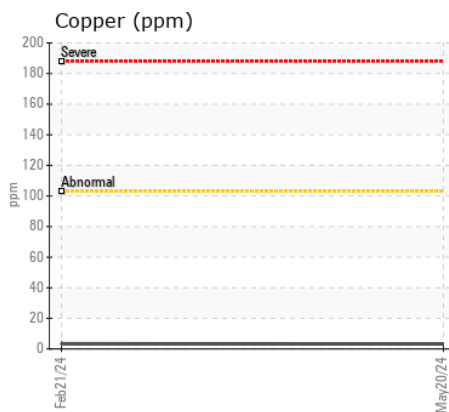
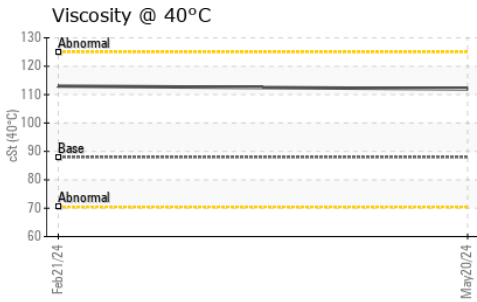
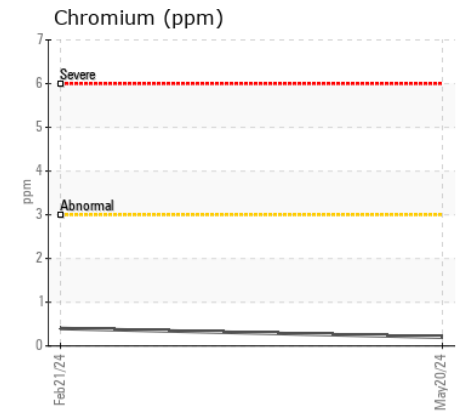
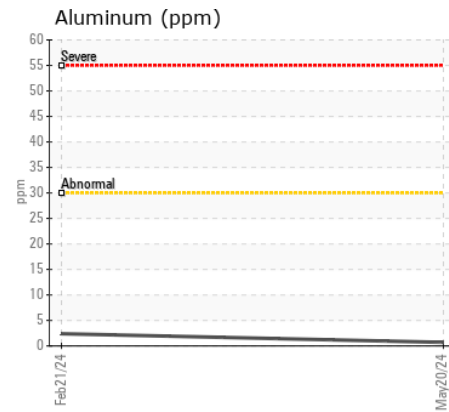
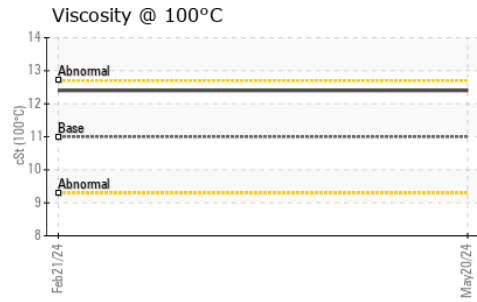
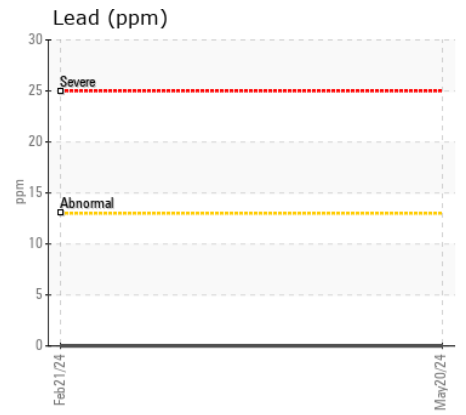
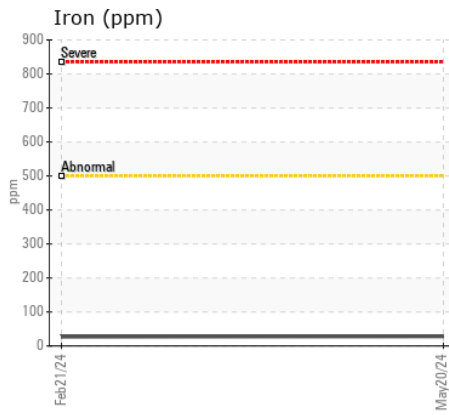
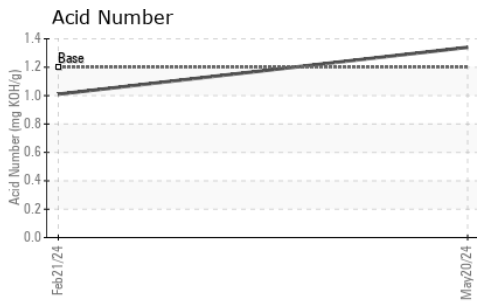
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>100	14	11	---
Potassium	ppm	ASTM D5185m	>20	0	<1	---
Water		WC Method	>.2	NEG	NEG	---
Silt	scalar	*Visual	NONE	NONE	NONE	---
Debris	scalar	*Visual	NONE	NONE	NONE	---
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	---
Appearance	scalar	*Visual	NORML	NORML	NORML	---
Odor	scalar	*Visual	NORML	NORML	NORML	---
Emulsified Water	scalar	*Visual	>.2	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		1	0	---
Boron	ppm	ASTM D5185m	4	6	6	---
Barium	ppm	ASTM D5185m		0	0	---
Molybdenum	ppm	ASTM D5185m		4	4	---
Manganese	ppm	ASTM D5185m		<1	0	---
Magnesium	ppm	ASTM D5185m	13	16	16	---
Calcium	ppm	ASTM D5185m	4000	3276	3190	---
Phosphorus	ppm	ASTM D5185m	990	886	874	---
Zinc	ppm	ASTM D5185m	1310	1062	1045	---
Sulfur	ppm	ASTM D5185m	3010	5322	5121	---
Acid Number (AN)	mg KOH/g	ASTM D8045	1.2	1.34	1.01	---
Visc @ 40°C	cSt	ASTM D445	88	112	113	---
Visc @ 100°C	cSt	ASTM D445	11	12.4	12.4	---
Viscosity Index (VI)	Scale	ASTM D2270	110	101	100	---



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : TR06196010 **Received** : 30 May 2024
Lab Number : 06196010 **Tested** : 02 Jun 2024
Unique Number : 11058133 **Diagnosed** : 02 Jun 2024 - Wes Davis
Test Package : MOB 2 (Additional Tests: KV100, VI)

BARR-TECH COMPOSTING
 9117 KALLENBERGER RD N
 SPRAGUE, WA
 US 99032
 Contact: RON GROGAN

To discuss this sample report, contact Customer Service at 1-800-827-0711.

* - 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)

T: (509)590-0437

F: