



ASCENDUM

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL



Area
Ascendum Machinery/250 Hour CSA
Machine Id
CATERPILLAR D5M 1145 (S/N 5ES00650)
Component
Rear Left Final Drive
Fluid
VOLVO PREMIUM GEAR OIL 85W-140 GL-5 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		ASC0007032	VCP0007311	---
Sample Date		Client Info		17 Apr 2024	27 Feb 2023	---
Machine Age	hrs	Client Info		4070	270	---
Oil Age	hrs	Client Info		4070	0	---
Filter Age	hrs	Client Info		0	0	---
Oil Changed		Client Info		Not Chngd	Not Chngd	---
Filter Changed		Client Info		Not Chngd	N/A	---
Sample Status				NORMAL	ABNORMAL	---

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>800	539	▲ 1250	---
Chromium	ppm	ASTM D5185m	>10	4	8	---
Nickel	ppm	ASTM D5185m	>5	<1	2	---
Titanium	ppm	ASTM D5185m	>15	2	8	---
Silver	ppm	ASTM D5185m	>2	0	<1	---
Aluminum	ppm	ASTM D5185m	>75	27	● 133	---
Lead	ppm	ASTM D5185m	>10	3	1	---
Copper	ppm	ASTM D5185m	>75	2	2	---
Tin	ppm	ASTM D5185m	>8	<1	0	---
Vanadium	ppm	ASTM D5185m		<1	<1	---
White Metal	scalar	*Visual	NONE	NONE	MODER	---
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	---

CONTAMINATION

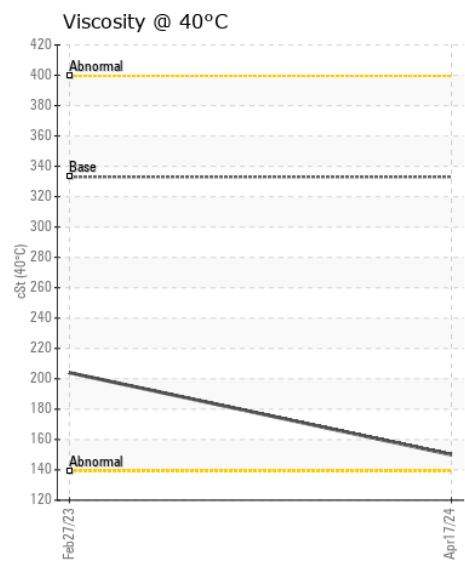
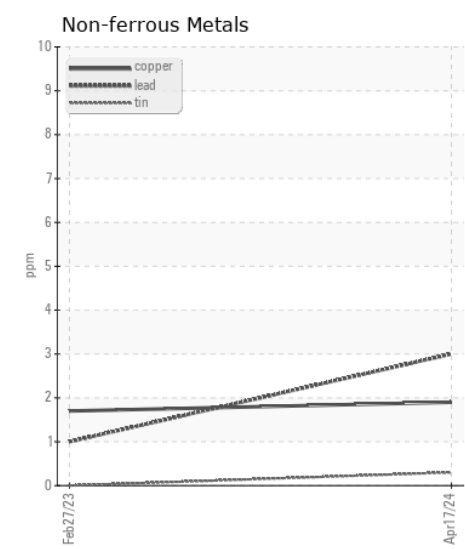
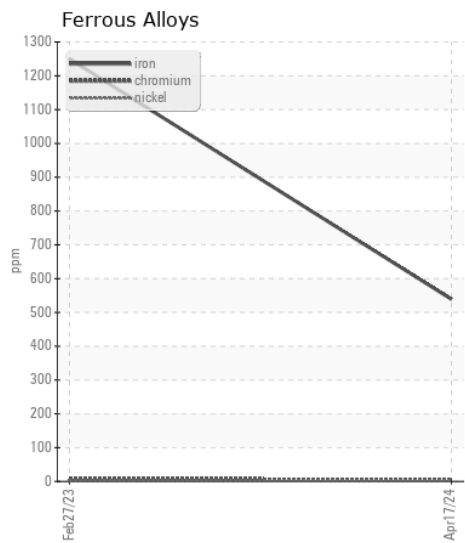
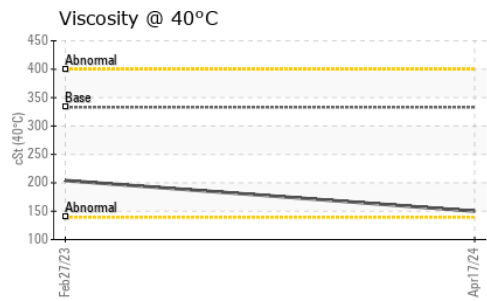
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>400	78	▲ 341	---
Potassium	ppm	ASTM D5185m	>20	4	14	---
Water		WC Method	>0.2	NEG	NEG	---
Silt	scalar	*Visual	NONE	LIGHT	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	>0.2	NEG	NEG	---

FLUID CONDITION

The condition of the oil is acceptable for the time in service.

Sodium	ppm	ASTM D5185m		5	14	---
Boron	ppm	ASTM D5185m	111	73	172	---
Barium	ppm	ASTM D5185m	0.0	<1	0	---
Molybdenum	ppm	ASTM D5185m	0.9	1	<1	---
Manganese	ppm	ASTM D5185m	0.0	5	10	---
Magnesium	ppm	ASTM D5185m	39	12	19	---
Calcium	ppm	ASTM D5185m	93	87	99	---
Phosphorus	ppm	ASTM D5185m	920	1034	852	---
Zinc	ppm	ASTM D5185m	104	77	50	---
Sulfur	ppm	ASTM D5185m	20179	21911	19722	---
Visc @ 40°C	cSt	ASTM D445	333	150	204	---



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : ASC0007032
Lab Number : 06158054
Unique Number : 10993477
Test Package : CONST

TRIANGLE GRADING AND PAVING INC
 1521 Huffman Mill Rd
 BURLINGTON, NC
 US 27216
 Contact: ADAM CORBETT
 wacorbett@trianglegradingpaving.com

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)