



VOLVO

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL



Area
[993]
Machine ID
VOLVO L90H 626329
Component
Diesel Engine
Fluid
MOBIL 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		VCP438062	VCP295345	VCP337600
Sample Date		Client Info		20 May 2024	24 Jul 2023	08 Dec 2022
Machine Age	hrs	Client Info		3525	1943	826
Oil Age	hrs	Client Info		0	0	0
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		N/A	Changed	N/A
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>200	12	17	32
Chromium	ppm	ASTM D5185m	>20	1	1	2
Nickel	ppm	ASTM D5185m	>5	<1	0	0
Titanium	ppm	ASTM D5185m		<1	0	0
Silver	ppm	ASTM D5185m	>2	1	0	0
Aluminum	ppm	ASTM D5185m	>30	4	3	11
Lead	ppm	ASTM D5185m	>40	<1	<1	1
Copper	ppm	ASTM D5185m	>20	2	4	10
Tin	ppm	ASTM D5185m	>20	2	1	3
Vanadium	ppm	ASTM D5185m		<1	<1	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

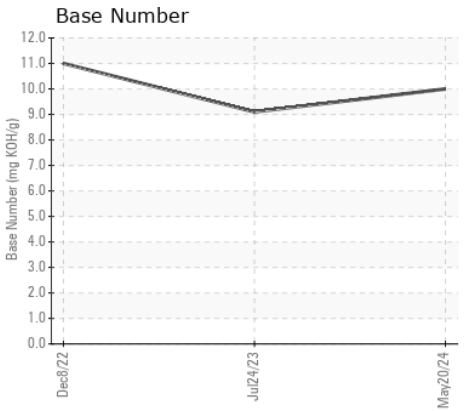
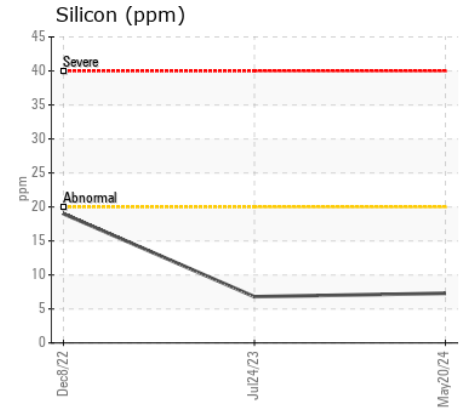
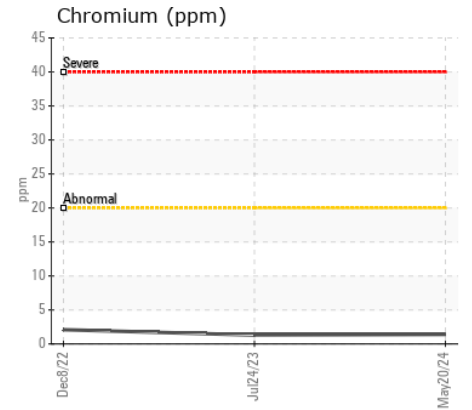
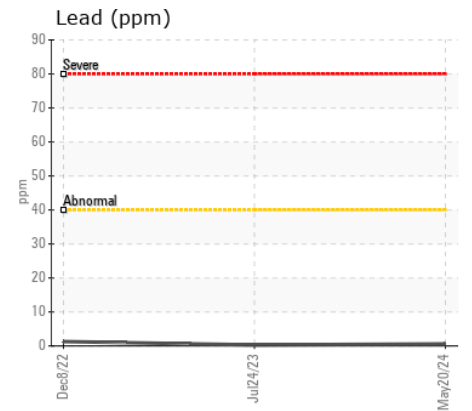
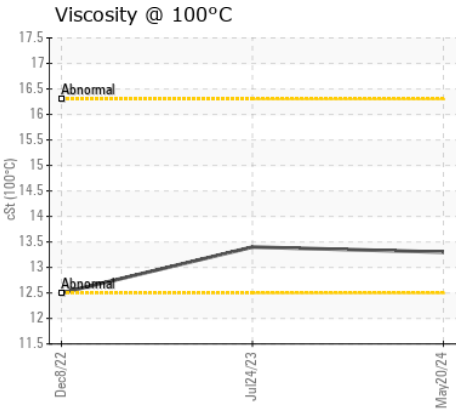
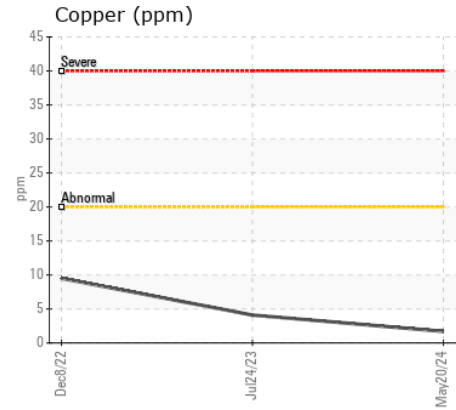
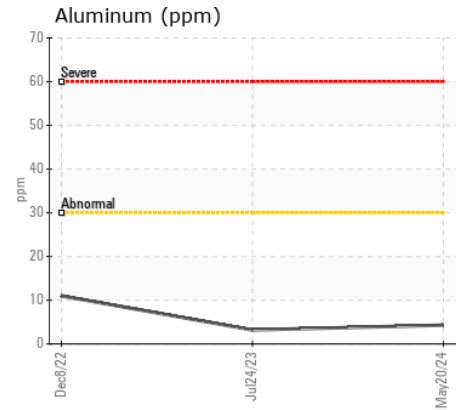
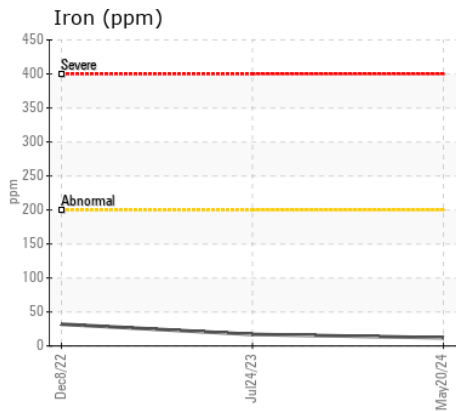
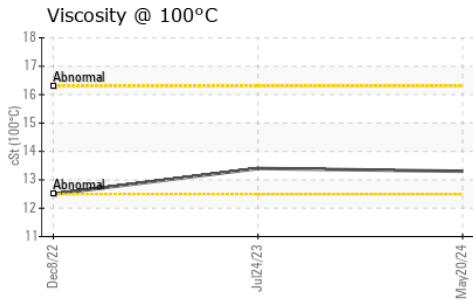
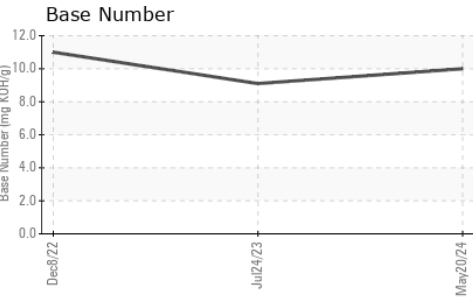
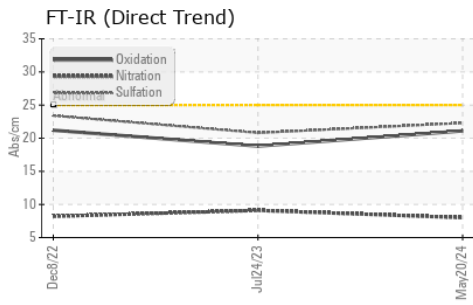
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>20	7	7	19
Potassium	ppm	ASTM D5185m	>20	2	0	2
Fuel		WC Method	>6.0	<1.0	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844	>3	0.2	0.3	0.2
Nitration	Abs/cm	*ASTM D7624	>20	8.0	9.1	8.2
Sulfation	Abs/.1mm	*ASTM D7415	>30	22.3	20.8	23.4
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	>0.2	NEG	NEG	NEG

FLUID CONDITION

The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m	>118	4	3	2
Boron	ppm	ASTM D5185m		33	23	40
Barium	ppm	ASTM D5185m		0	0	0
Molybdenum	ppm	ASTM D5185m		41	37	42
Manganese	ppm	ASTM D5185m		1	<1	5
Magnesium	ppm	ASTM D5185m		503	472	592
Calcium	ppm	ASTM D5185m		1697	1879	1656
Phosphorus	ppm	ASTM D5185m		967	949	994
Zinc	ppm	ASTM D5185m		1159	1165	1172
Sulfur	ppm	ASTM D5185m		3293	3456	4124
Oxidation	Abs/.1mm	*ASTM D7414	>25	21.1	18.8	21.2
Base Number (BN)	mg KOH/g	ASTM D2896		10.0	9.1	11.0
Visc @ 100°C	cSt	ASTM D445		13.3	13.4	12.5



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : VCP438062 **Received** : 29 May 2024
Lab Number : 06193666 **Tested** : 30 May 2024
Unique Number : 11050418 **Diagnosed** : 30 May 2024 - Wes Davis
Test Package : MOB 1 (Additional Tests: TBN)

VCES- VOLVO CONSTRUCTION EQUIPMENT
 12345 MAPLEVIEW STREET
 LAKESIDE, CA
 US 92040
 Contact: Mark Stewart
 mark.stewart@vcesvolvo.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)

T: X
 F: X