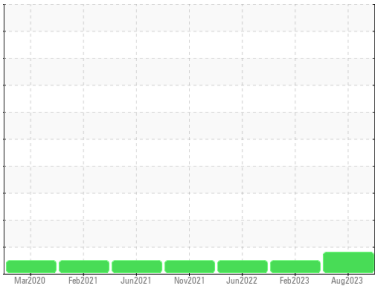
ASCENDUM

PROBLEM SUMMARY

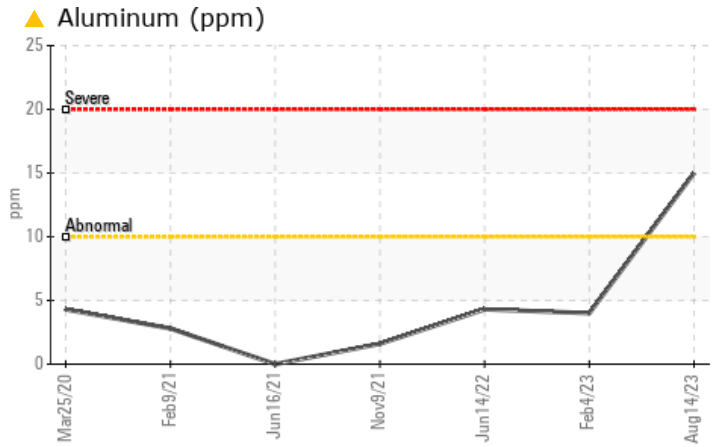
Area
Ascendum Machinery
Machine Id
VOLVO EC200EL 310063
Component
Diesel Engine
Fluid
VOLVO VDS-4.5 Premium Motor Oil 15W40 (--- GAL)

Sample Rating Trend



WEAR

COMPONENT CONDITION SUMMARY



RECOMMENDATION

Oil and filter change at the time of sampling has been noted. No corrective action is recommended at this time. Resample at the next service interval to monitor.

PROBLEMATIC TEST RESULTS

Sample Status				**ABNORMAL**	NORMAL	NORMAL
Aluminum	ppm	ASTM D5185m	>10	▲ **15**	4	4

Customer Id: NOVCHANC
Sample No.: ASC0000091
Lab Number: 05925924
Test Package: MOBCE

To manage this report scan the QR code

To discuss the diagnosis or test data:
Don Baldridge +1
don.b505@comcast.net

To change component or sample information:
Customer Service +1 1-800-237-1369
customerservice@wearcheck.com

RECOMMENDED ACTIONS

Action	Status	Date	Done By	Description
Change Fluid	---	---	?	Oil and filter change at the time of sampling has been noted.
Change Filter	---	---	?	Oil and filter change at the time of sampling has been noted.

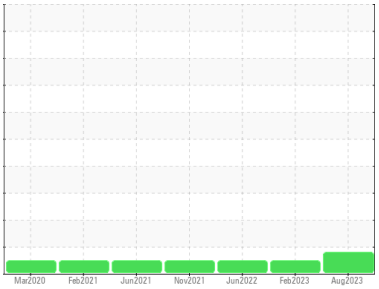
HISTORICAL DIAGNOSIS

ASCENDUM

OIL ANALYSIS REPORT

Area
Ascendum Machinery
Machine Id
VOLVO EC200EL 310063
Component
Diesel Engine
Fluid
VOLVO VDS-4.5 Premium Motor Oil 15W40 (--- GAL)

Sample Rating Trend



WEAR

DIAGNOSIS

▲ Recommendation
Oil and filter change at the time of sampling has been noted. No corrective action is recommended at this time. Resample at the next service interval to monitor.

▲ Wear
The aluminum level is abnormal. All other component wear rates are normal.

Contamination
There is no indication of any contamination in the oil.

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.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number		Client Info		**ASC0000091**	VCP0007109	VCP0000572
Sample Date		Client Info		**14 Aug 2023**	04 Feb 2023	14 Jun 2022
Machine Age	hrs	Client Info		**4517**	3870	3293
Oil Age	hrs	Client Info		**647**	577	769
Oil Changed		Client Info		**Changed**	Changed	Changed
Sample Status				**ABNORMAL**	NORMAL	NORMAL

CONTAMINATION		method	limit/base	current	history1	history2
Fuel		WC Method	>6.0	**<1.0**	<1.0	<1.0
Glycol		WC Method		**NEG**	NEG	NEG

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>100	**54**	8	16
Chromium	ppm	ASTM D5185m	>10	**2**	<1	<1
Nickel	ppm	ASTM D5185m	>10	**<1**	<1	<1
Titanium	ppm	ASTM D5185m		**0**	<1	<1
Silver	ppm	ASTM D5185m	>2	**0**	0	0
Aluminum	ppm	ASTM D5185m	>10	▲ **15**	4	4
Lead	ppm	ASTM D5185m	>20	**<1**	<1	0
Copper	ppm	ASTM D5185m	>15	**6**	1	2
Tin	ppm	ASTM D5185m	>10	**2**	<1	2
Antimony	ppm	ASTM D5185m		**---**	---	---
Vanadium	ppm	ASTM D5185m		**0**	<1	0
Cadmium	ppm	ASTM D5185m		**0**	<1	0

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		**4**	35	30
Barium	ppm	ASTM D5185m		**0**	0	0
Molybdenum	ppm	ASTM D5185m		**66**	58	40
Manganese	ppm	ASTM D5185m		**1**	<1	<1
Magnesium	ppm	ASTM D5185m		**889**	719	480
Calcium	ppm	ASTM D5185m		**1344**	1357	1601
Phosphorus	ppm	ASTM D5185m		**1024**	984	834
Zinc	ppm	ASTM D5185m		**1341**	1220	1040
Sulfur	ppm	ASTM D5185m		**3709**	3428	2694

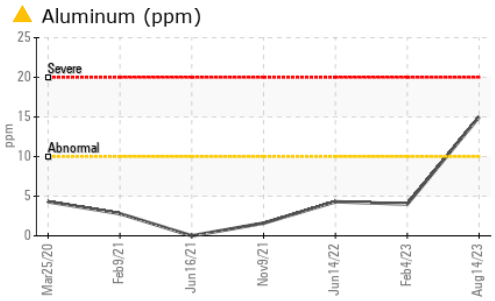
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>20	**17**	7	8
Sodium	ppm	ASTM D5185m		**2**	2	2
Potassium	ppm	ASTM D5185m	>20	**1**	<1	0

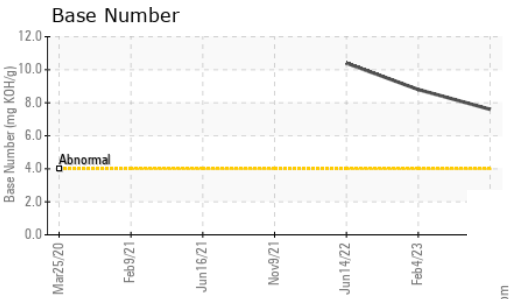
INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844	>3	**0.7**	0.1	0.4
Nitration	Abs/cm	*ASTM D7624	>20	**10.5**	8.0	8.6
Sulfation	Abs/.1mm	*ASTM D7415	>30	**21.0**	19.2	22.6

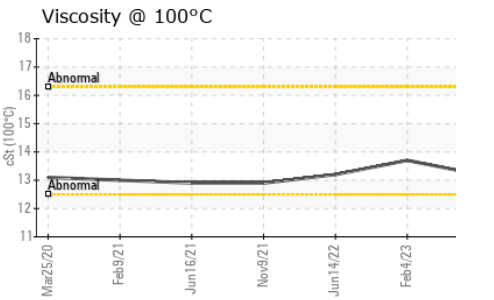
FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	**17.9**	16.2	21.1
Base Number (BN)	mg KOH/g	ASTM D2896		**7.6**	8.8	10.4

ASCENDUM

OIL ANALYSIS REPORT



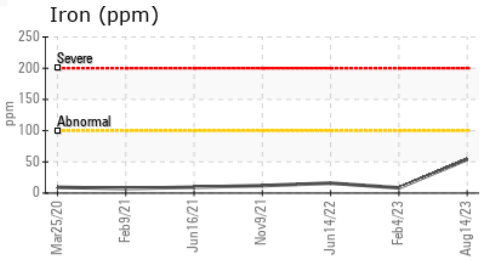


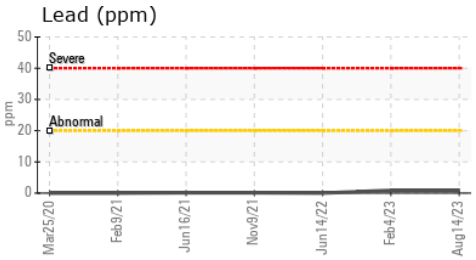


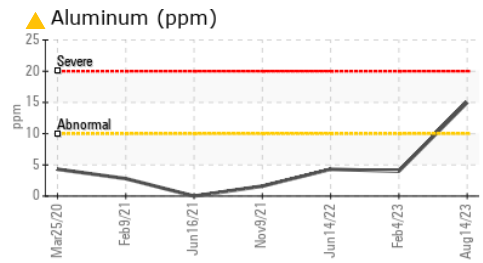
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Precipitate	scalar	*Visual	NONE	**NONE**	NONE	NONE
Silt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Debris	scalar	*Visual	NONE	**NONE**	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Appearance	scalar	*Visual	NORML	**NORML**	NORML	NORML
Odor	scalar	*Visual	NORML	**NORML**	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	**NEG**	NEG	NEG
Free Water	scalar	*Visual		**NEG**	NEG	NEG

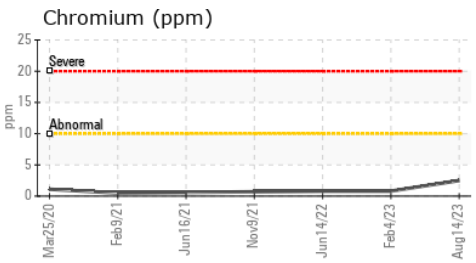
FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445		**13.2**	13.7	13.2

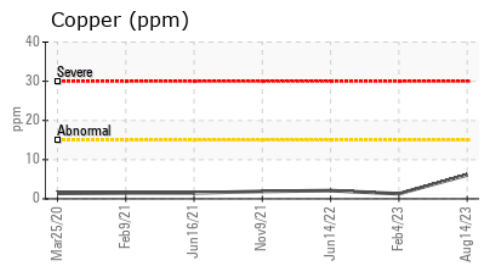
GRAPHS

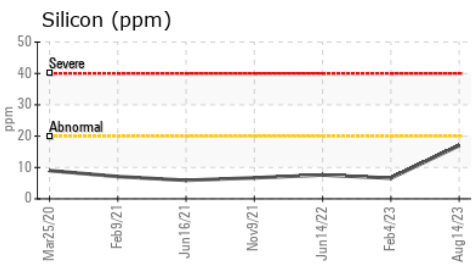


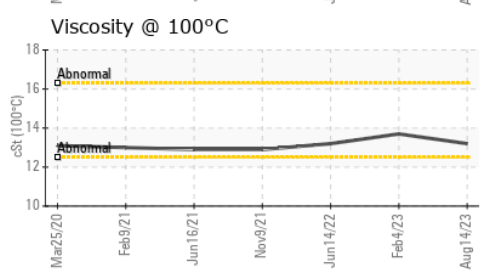


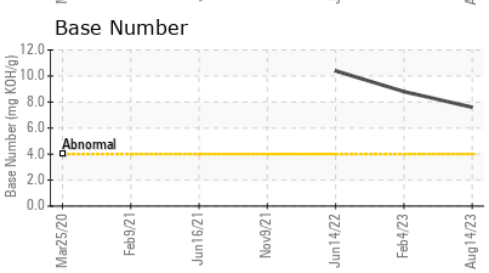












Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : ASC0000091 **Received** : 16 Aug 2023
Lab Number : 05925924 **Diagnosed** : 17 Aug 2023
Unique Number : 10605871 **Diagnostician** : Don Baldridge
Test Package : MOBCE (Additional Tests: TBN)

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)

EGGER TIMBERPAK
1801 COTTONWOOD ST
CHARLOTTE, NC
US 28206
Contact: Service Manager

T:
F:

Report Id: NOVCHANC [WUSCAR] 05925924 (Generated: 08/18/2023 11:37:28) Rev: 1

Submitted By: CHRISTOPHER CANIPE