



# VOLVO

## OIL ANALYSIS REPORT

WEAR	<b>ABNORMAL</b>
CONTAMINATION	<b>ABNORMAL</b>
FLUID CONDITION	<b>NORMAL</b>



Area

**[9123]**

Machine Id

**VOLVO EC350EL 314038**

Component

**Front Left Final Drive**

Fluid

**VOLVO PREMIUM GEAR OIL 85W-140 GL-5 (--- GAL)**

### RECOMMENDATION

We advise that you check all areas where dirt can enter the system. Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		VCP314361	---	---
Sample Date		Client Info		06 Oct 2021	---	---
Machine Age	hrs	Client Info		1414	---	---
Oil Age	hrs	Client Info		0	---	---
Filter Age	hrs	Client Info		0	---	---
Oil Changed		Client Info		N/A	---	---
Filter Changed		Client Info		N/A	---	---
Sample Status				ABNORMAL	---	---

### WEAR

Gear wear is indicated. All other metal levels are typical for a new component breaking in.

Iron	ppm	ASTM D5185m	>500	▲ 1339	---	---
Chromium	ppm	ASTM D5185m	>10	▲ 19	---	---
Nickel	ppm	ASTM D5185m		1	---	---
Titanium	ppm	ASTM D5185m		5	---	---
Silver	ppm	ASTM D5185m		0	---	---
Aluminum	ppm	ASTM D5185m	>25	▲ 81	---	---
Lead	ppm	ASTM D5185m	>25	0	---	---
Copper	ppm	ASTM D5185m	>50	2	---	---
Tin	ppm	ASTM D5185m	>10	0	---	---
Vanadium	ppm	ASTM D5185m		<1	---	---
White Metal	scalar	*Visual	NONE	LIGHT	---	---
Yellow Metal	scalar	*Visual	NONE	NONE	---	---

### CONTAMINATION

Elemental levels of silicon (Si) and aluminum (Al) indicate alumina-silicate (coarse dirt) ingress.

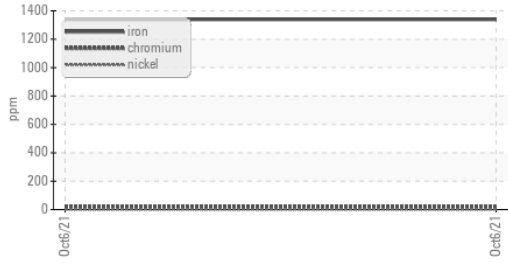
Silicon	ppm	ASTM D5185m	>75	▲ 230	---	---
Potassium	ppm	ASTM D5185m	>20	12	---	---
Water		WC Method	>0.2	NEG	---	---
Silt	scalar	*Visual	NONE	NONE	---	---
Debris	scalar	*Visual	NONE	NONE	---	---
Sand/Dirt	scalar	*Visual	NONE	NONE	---	---
Appearance	scalar	*Visual	NORML	NORML	---	---
Odor	scalar	*Visual	NORML	NORML	---	---
Emulsified Water	scalar	*Visual	>0.2	NEG	---	---

### FLUID CONDITION

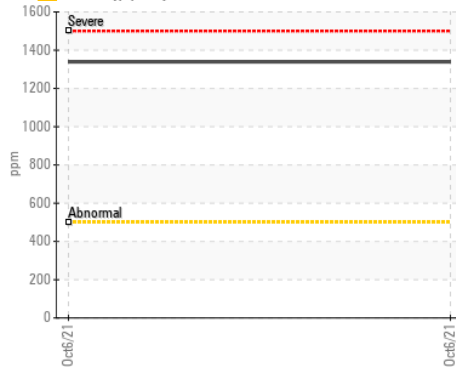
The condition of the oil is acceptable for the time in service.

Sodium	ppm	ASTM D5185m		7	---	---
Boron	ppm	ASTM D5185m	111	93	---	---
Barium	ppm	ASTM D5185m	0.0	1	---	---
Molybdenum	ppm	ASTM D5185m	0.9	0	---	---
Manganese	ppm	ASTM D5185m	0.0	11	---	---
Magnesium	ppm	ASTM D5185m	39	6	---	---
Calcium	ppm	ASTM D5185m	93	13	---	---
Phosphorus	ppm	ASTM D5185m	920	1751	---	---
Zinc	ppm	ASTM D5185m	104	18	---	---
Sulfur	ppm	ASTM D5185m	20179	37642	---	---
Visc @ 40°C	cSt	ASTM D445	333	153	---	---

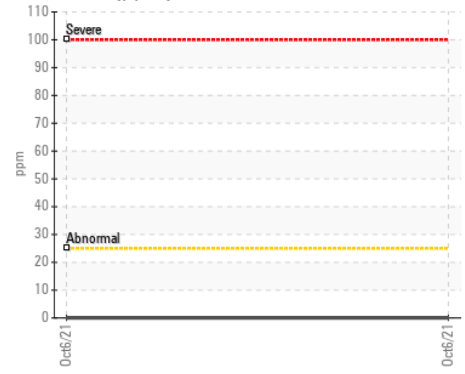
▲ Ferrous Alloys



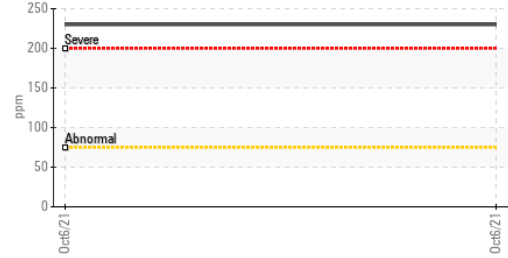
▲ Iron (ppm)



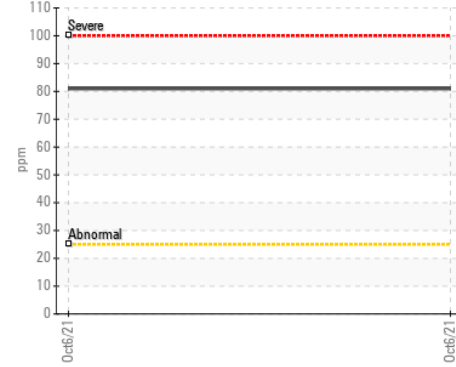
▲ Lead (ppm)



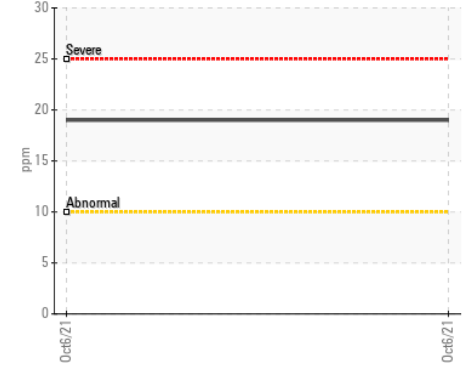
▲ Silicon (ppm)



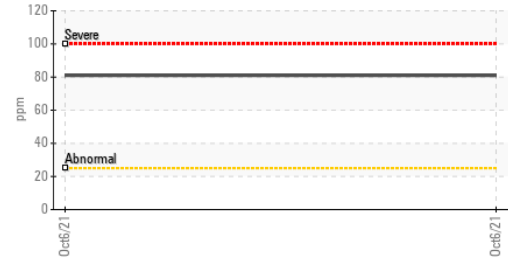
▲ Aluminum (ppm)



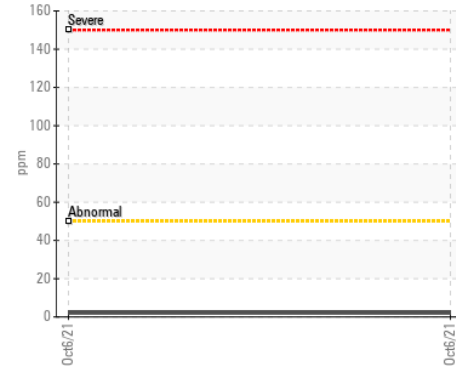
▲ Chromium (ppm)



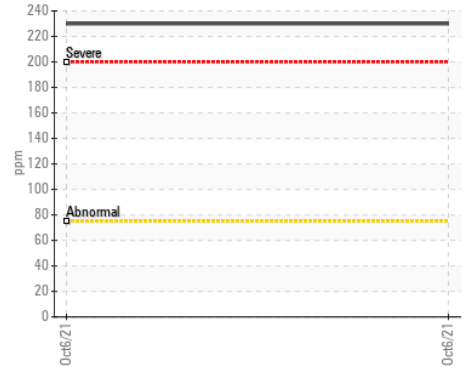
▲ Aluminum (ppm)



▲ Copper (ppm)



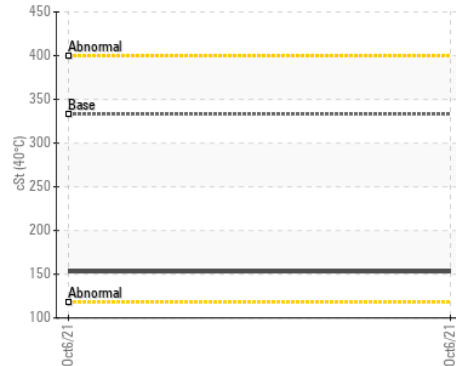
▲ Silicon (ppm)



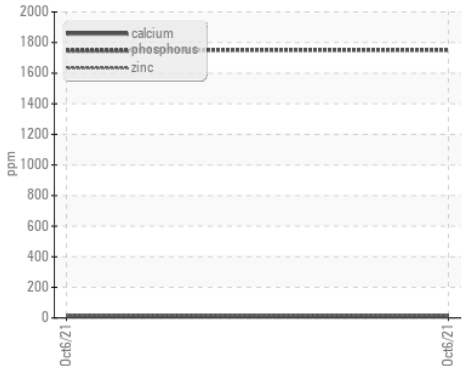
Viscosity @ 40°C



Viscosity @ 40°C



▲ Additives



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : VCP314361 **Received** : 12 Oct 2021  
**Lab Number** : 05372244 **Diagnosed** : 13 Oct 2021  
**Unique Number** : 9696355 **Diagnostician** : Don Baldrige  
**Test Package** : MOB 1

**MCCLEUNG-LOGAN EQUIPMENT CO - RICHMOND**  
 1345 MOUNTAIN ROAD  
 GLEN ALLEN, VA  
 US 23060  
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 F: (804)266-1611

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)