WEAR CONTAMINATION FLUID CONDITION

NORMAL NORMAL NORMAL

Machine Id

## **VOLVO ECR235E 314675**

Diesel Engine

VOLVO VDS-4.5 Premium Motor Oil 15W40 (--- GAL)

RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History?
RECOMMENDATION		UOIVI		LIIIIII/ADII			History2
Resample at the next service interval to monitor.	Sample Number Sample Date		Client Info		ASC0001746 10 Jun 2024		
	Machine Age	hrs	Client Info		2097		
	Oil Age	hrs	Client Info		2097		
	Filter Age	hrs	Client Info		0		
	Oil Changed	1113	Client Info		Changed		
	Filter Changed		Client Info		Changed		
	Sample Status		Onorte into		NORMAL		
WEAR	Iron	ppm	ASTM D5185m	>100	14		
All component wear rates are normal.	Chromium	ppm	ASTM D5185m	>20	<1		
	Nickel	ppm	ASTM D5185m	>2	<1		
	Titanium	ppm	ASTM D5185m		<1		
	Silver	ppm	ASTM D5185m	>2	0		
	Aluminum	ppm	ASTM D5185m	>25	4		
	Lead	ppm	ASTM D5185m	>40	<1		
	Copper	ppm	ASTM D5185m	>330	1		
	Tin	ppm	ASTM D5185m	>15	<1		
	Vanadium	ppm	ASTM D5185m		0		
	White Metal	scalar	*Visual	NONE	NONE		
	Yellow Metal	scalar	*Visual	NONE	NONE		
					_		
CONTAMINATION	Silicon	ppm	ASTM D5185m		5		
There is no indication of any contamination in the oil.	Potassium	ppm	ASTM D5185m		9		
	Fuel		WC Method		<1.0		
	Water		WC Method	>0.2	NEG		
	Glycol	0/	WC Method	0	NEG		
	Soot %	%	*ASTM D7844		0.2		
	Nitration	Abs/cm	*ASTM D7624		10.0		
	Sulfation	Abs/.1mm	*ASTM D7415		23.7		
	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	Sodium	ppm	ASTM D5185m		<1		
	Boron	ppm	ASTM D5185m		91		
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is acceptable for the time in service.	Barium	ppm	ASTM D5185m		0		
	Molybdenum	ppm	ASTM D5185m		2		
	Manganese	ppm	ASTM D5185m		0		
	Magnesium	ppm	ASTM D5185m		31		
	Calcium	ppm	ASTM D5185m		2348		
	Phosphorus	ppm	ASTM D5185m		927		
	Zinc	ppm	ASTM D5185m		1261		
	Sulfur	ppm	ASTM D5185m		3748		
	Oxidation	Abs/.1mm	*ASTM D7414	>25	20.8		
			ASTM D2896		6.4		
	Base Number (BN)	ma kuhia	ASTIVITIZATE				





Laboratory Sample No.

Lab Number : 06209893

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : ASC0001746

Received **Tested** Unique Number : 11082757 Diagnosed Test Package: MOBCE (Additional Tests: TBN)

: 14 Jun 2024 : 17 Jun 2024 : 17 Jun 2024 - Angela Borella

Contact: Service Manager

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)

138 HILLCREST DR

ADVANCE, NC

US 27006

T: F: