

OIL ANALYSIS REPORT

VOLVO PENTA

NADINE URUIOLI 2300439 VOLVO PENTA 5102093818G - CENTER DIESEL ENGINE

Sample No: VPA051747

Oil Type: VOLVO ULTRA DIESEL ENGINE OIL 15W40 VDS-3

SAMPLE INFORMATION

Sample Number	VPA051747	---	---	---
Sample Date	28 Aug 2023	---	---	---
Machine Hours	200	---	---	---
Oil Hours	200	---	---	---
Oil Changed	Changed	---	---	---
Sample Status	ABNORMAL	---	---	---

OIL CONDITION

Visc @ 100°C	cSt	▲ 12.0	---	---	---
Base Number (BN)	mg KOH/g	■ 9.3	---	---	---
Oxidation (PA)	%	■ 53	---	---	---

CONTAMINATION

Soot %	%	■ 0.1	---	---	---
Nitration (PA)	%	■ 48	---	---	---
Sulfation (PA)	%	■ 49	---	---	---
Glycol	%	■ NEG	---	---	---
Fuel	%	▲ 3.5	---	---	---
Silicon	ppm	■ 5	---	---	---
Sodium	ppm	■ 2	---	---	---
Potassium	ppm	■ 0	---	---	---

WEAR METALS

Iron	ppm	■ 7	---	---	---
Copper	ppm	■ 8	---	---	---
Lead	ppm	■ <1	---	---	---
Tin	ppm	■ <1	---	---	---
Aluminum	ppm	■ 3	---	---	---
Chromium	ppm	■ 0	---	---	---
Molybdenum	ppm	■ 61	---	---	---
Nickel	ppm	■ 0	---	---	---
Titanium	ppm	■ 0	---	---	---
Silver	ppm	■ 0	---	---	---
Manganese	ppm	■ <1	---	---	---
Vanadium	ppm	<1	---	---	---

ADDITIVES

Calcium	ppm	■ 1177	---	---	---
Magnesium	ppm	■ 907	---	---	---
Zinc	ppm	■ 1204	---	---	---
Phosphorus	ppm	■ 1027	---	---	---
Barium	ppm	■ 0	---	---	---
Boron	ppm	■ 5	---	---	---

Helmut's Marine Service

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Contact: NADINE URUIOLI

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T: x:

F: x:

Diagnosis

Oil and filter change at the time of sampling has been noted. Resample at the next service interval to monitor. All component wear rates are normal. Light fuel dilution occurring. Fuel is present in the oil and is lowering the viscosity. The BN result indicates that there is suitable alkalinity remaining in the oil.

Depot: VP152741

Unique No: 10634964

Signed: Jonathan Hester

Report Date: 11 Sep 2023

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GRAPHS

