



# VOLVO PENTA

## OIL ANALYSIS REPORT

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

Area  
**THOMAS BENEDETTI [AJD/502644]**  
Machine Id  
**VOLVO PENTA 3020310223 - STERNDRIVE**  
Component  
**Starboard Gearbox**  
Fluid  
**GEAR OIL SAE 75W90 (--- QTS)**

### RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>VPA060469</b>	VPA043138	---
Sample Date		Client Info		<b>21 Feb 2024</b>	24 Apr 2023	---
Machine Age	hrs	Client Info		<b>1564</b>	1445	---
Oil Age	hrs	Client Info		<b>0</b>	0	---
Filter Age	hrs	Client Info		<b>0</b>	0	---
Oil Changed		Client Info		<b>N/A</b>	N/A	---
Filter Changed		Client Info		<b>N/A</b>	N/A	---
Sample Status				<b>NORMAL</b>	NORMAL	---

### WEAR

All component wear rates are normal.

PQ		ASTM D8184		<b>14</b>	12	---
Iron	ppm	ASTM D5185m	>150	<b>12</b>	8	---
Chromium	ppm	ASTM D5185m	>10	<b>&lt;1</b>	<1	---
Nickel	ppm	ASTM D5185m	>10	<b>&lt;1</b>	<1	---
Titanium	ppm	ASTM D5185m		<b>0</b>	0	---
Silver	ppm	ASTM D5185m		<b>&lt;1</b>	0	---
Aluminum	ppm	ASTM D5185m	>5	<b>&lt;1</b>	<1	---
Lead	ppm	ASTM D5185m	>65	<b>0</b>	0	---
Copper	ppm	ASTM D5185m	>80	<b>&lt;1</b>	<1	---
Tin	ppm	ASTM D5185m	>8	<b>0</b>	0	---
Vanadium	ppm	ASTM D5185m		<b>0</b>	0	---
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	---

### CONTAMINATION

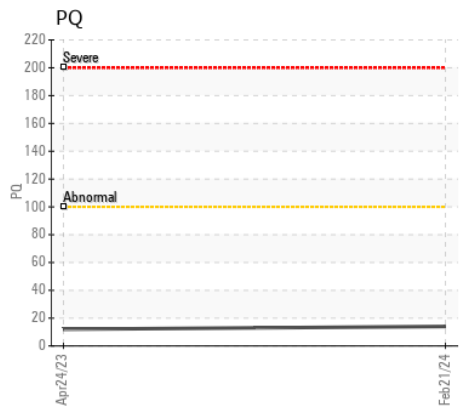
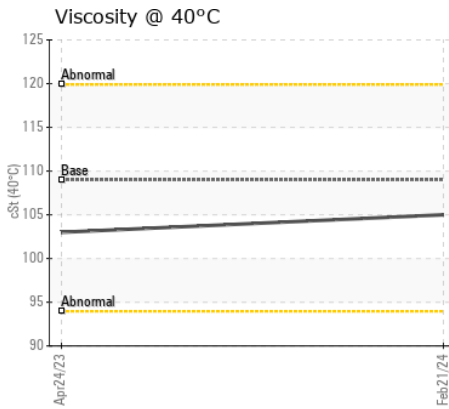
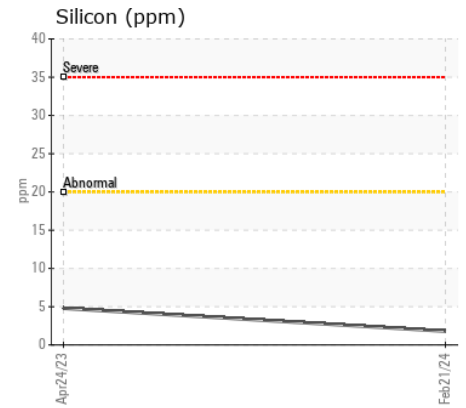
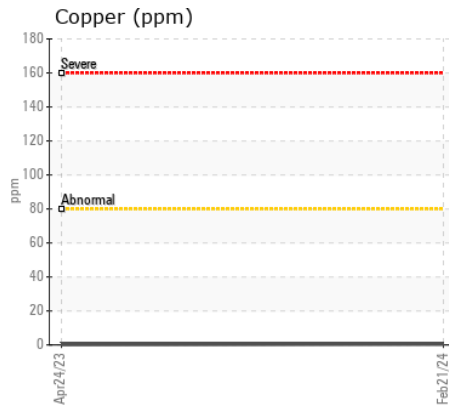
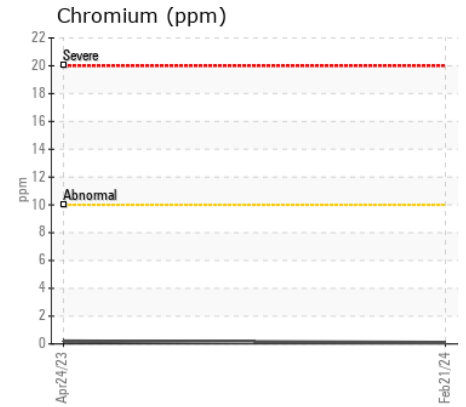
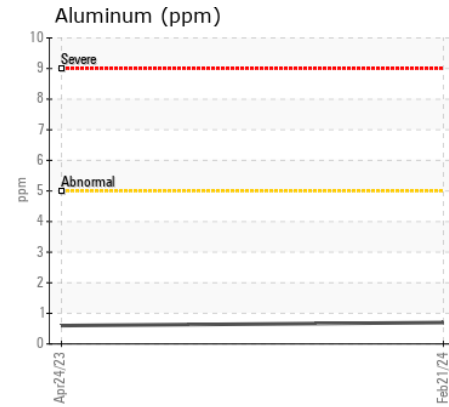
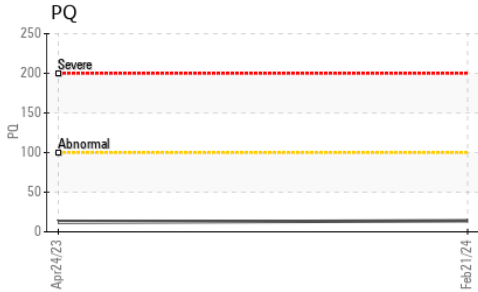
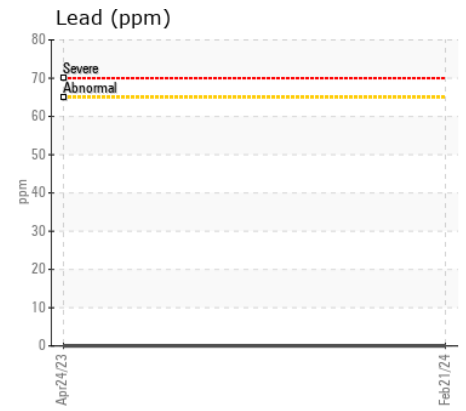
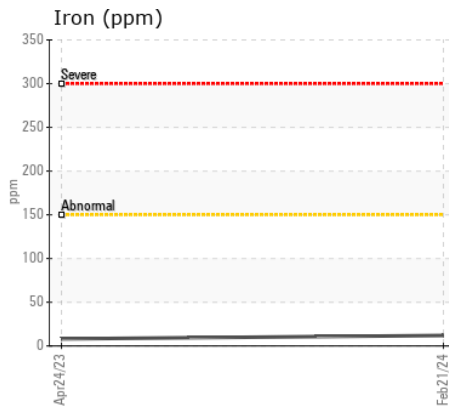
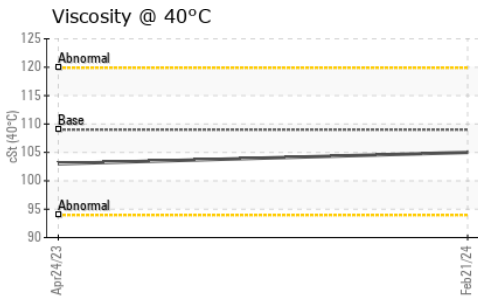
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>20	<b>2</b>	5	---
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	0	---
Water		WC Method	>0.2	<b>NEG</b>	NEG	---
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Sand/Dirt	scalar	*Visual	NONE	<b>NONE</b>	NONE	---
Appearance	scalar	*Visual	NORML	<b>NORML</b>	NORML	---
Odor	scalar	*Visual	NORML	<b>NORML</b>	NORML	---
Emulsified Water	scalar	*Visual	>0.2	<b>NEG</b>	NEG	---

### FLUID CONDITION

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

Sodium	ppm	ASTM D5185m		<b>5</b>	7	---
Boron	ppm	ASTM D5185m	400	<b>315</b>	323	---
Barium	ppm	ASTM D5185m	200	<b>0</b>	0	---
Molybdenum	ppm	ASTM D5185m	12	<b>0</b>	0	---
Manganese	ppm	ASTM D5185m		<b>1</b>	2	---
Magnesium	ppm	ASTM D5185m	12	<b>2</b>	7	---
Calcium	ppm	ASTM D5185m	150	<b>1</b>	1	---
Phosphorus	ppm	ASTM D5185m	1650	<b>1418</b>	1311	---
Zinc	ppm	ASTM D5185m	125	<b>4</b>	7	---
Sulfur	ppm	ASTM D5185m	22500	<b>23611</b>	27076	---
Visc @ 40°C	cSt	ASTM D445	109	<b>105</b>	103	---



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : VPA060469 **Received** : 29 Feb 2024  
**Lab Number** : 06104626 **Tested** : 01 Mar 2024  
**Unique Number** : 10902856 **Diagnosed** : 04 Mar 2024 - Don Baldrige  
**Test Package** : MOB 1 ( Additional Tests: PQ )

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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)