



CONSTRUCTION EQUIPMENT

HORST EXCAVATING VOLVO EC460CL 110503 - REAR RIGHT FINAL DRIVE



Sample No: VCP148656
Oil Type: VOLVO PREMIUM GEAR OIL 85W-140 GL-5
Job No: HORST EXCAVATING



SAMPLE INFORMATION

Sample Number	VCP148656	VCP135517	---	---
Sample Date	18 Dec 2015	06 Apr 2012	---	---
Machine Hours	3899	1163	---	---
Oil Hours	0	1000	---	---
Oil Changed	Not Chngd	Changed	---	---
Sample Status	ABNORMAL	ABNORMAL	---	---

HIGHWAY EQUIPMENT AND SUPPLY CO
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OIL CONDITION

Visc @ 40°C	cSt	160.6	198.4	---	---
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CONTAMINATION

Silicon	ppm	▲ 268	▲ 165	---	---
Sodium	ppm	■ 8	■ 18	---	---
Potassium	ppm	■ 20	■ 13	---	---

Diagnosis

We advise that you check all areas where dirt can enter the system. Resample at the next service interval to monitor. Moderate concentration of visible metal present. Bearing and/or gear wear is indicated. Elemental levels of silicon (Si) and aluminum (Al) indicate alumina-silicate (coarse dirt) ingress. The condition of the oil is acceptable for the time in service.



WEAR METALS

Iron	ppm	▲ 868	■ 497	---	---
Copper	ppm	▲ 101	■ 47	---	---
Lead	ppm	■ 6	■ 6	---	---
Tin	ppm	■ 0	■ 4	---	---
Aluminum	ppm	▲ 54	▲ 38	---	---
Chromium	ppm	▲ 11	■ 12	---	---
Molybdenum	ppm	■ 0	■ <1	---	---
Nickel	ppm	4	3	---	---
Titanium	ppm	4	3	---	---
Silver	ppm	0	0	---	---
Manganese	ppm	■ 9	■ 9	---	---
Vanadium	ppm	0	<1	---	---



ADDITIVES

Calcium	ppm	232	■ 103	---	---
Magnesium	ppm	■ 9	■ 18	---	---
Zinc	ppm	■ 101	■ 77	---	---
Phosphorus	ppm	■ 882	■ 960	---	---
Barium	ppm	■ 1	■ 5	---	---
Boron	ppm	■ 99	■ 55	---	---

Depot: INSEPH
Unique No: 7255530
Signed: Jonathan Hester
Report Date: 07 Jan 2016



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GRAPHS

