



CONSTRUCTION EQUIPMENT

SW1022719 IAA 5 VOLVO L90H 626385 - DIESEL ENGINE



Sample No: VCP416030
Oil Type: DIESEL ENGINE OIL SAE 15W40
Job No: SW1022719 IAA 5



SAMPLE INFORMATION

Sample Number	VCP416030	VCP409766	VCP379918	VCP353745
Sample Date	15 Aug 2023	16 May 2023	09 Feb 2023	23 Nov 2022
Machine Hours	2405	1820	1170	627
Oil Hours	0	0	0	0
Oil Changed	Changed	Changed	N/A	Changed
Sample Status	NORMAL	NORMAL	NORMAL	NORMAL

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OIL CONDITION

Visc @ 100°C	cSt	13.6	14.1	14.2	12.8
Base Number (BN)	mg KOH/g	9.5	9.9	9.7	11.5
Oxidation (PA)	%	78	75	65	81

CONTAMINATION

Soot %	%	0.7	0.7	0.6	0.7
Nitration (PA)	%	71	73	68	69
Sulfation (PA)	%	60	60	55	66
Glycol	%	NEG	NEG	NEG	NEG
Fuel	%	<1.0	<1.0	<1.0	<1.0
Silicon	ppm	8	6	6	18
Sodium	ppm	2	2	2	4
Potassium	ppm	3	2	<1	<1

Diagnosis

Resample at the next service interval to monitor. Please specify the brand, type, and viscosity of the oil on your next sample. All component wear rates are normal. There is no indication of any contamination in the oil. The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

WEAR METALS

Iron	ppm	19	23	25	48
Copper	ppm	1	2	2	9
Lead	ppm	<1	<1	<1	1
Tin	ppm	<1	1	2	3
Aluminum	ppm	2	1	5	17
Chromium	ppm	1	<1	2	3
Molybdenum	ppm	51	58	62	41
Nickel	ppm	0	<1	<1	0
Titanium	ppm	<1	<1	0	0
Silver	ppm	0	0	0	0
Manganese	ppm	<1	<1	1	5
Vanadium	ppm	<1	0	0	0

ADDITIVES

Calcium	ppm	1624	1496	1235	1564
Magnesium	ppm	683	917	934	610
Zinc	ppm	1224	1365	1310	1134
Phosphorus	ppm	983	1065	1051	936
Barium	ppm	0	0	<1	5
Boron	ppm	19	12	5	42

Depot: VOLVO6174
Unique No: 10616586
Signed: Wes Davis
Report Date: 23 Aug 2023

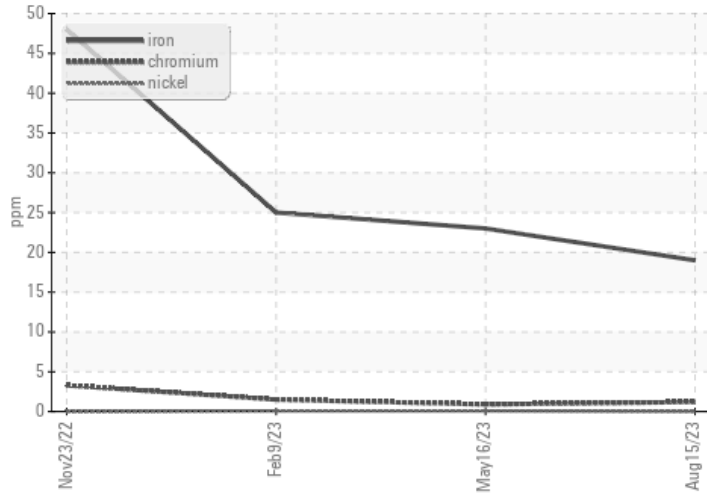


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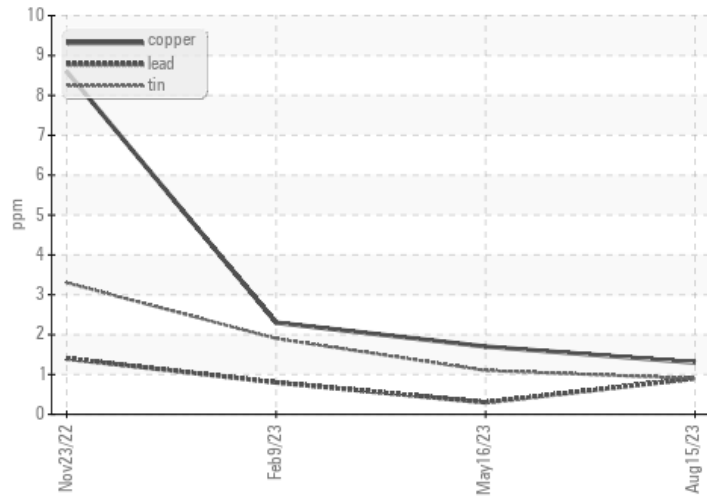


GRAPHS

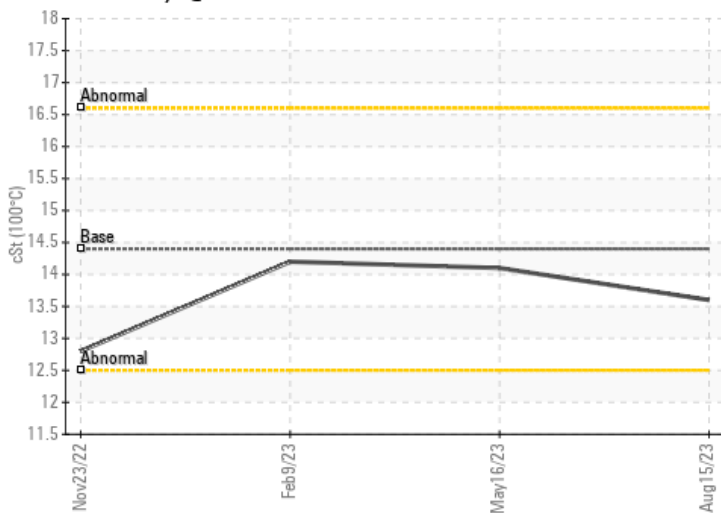
Ferrous Alloys



Non-ferrous Metals



Viscosity @ 100°C



Base Number

