MOB II

Dura-Check Fluid Analysis

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
CATERPILLAR 299D3 SL8301 (S/N JDY904881)
Component
Diesel Engine
Fluid
DURALENE Dura-Max Xtreme 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

WEAR

All component wear rates are normal.

CONTAMINATION

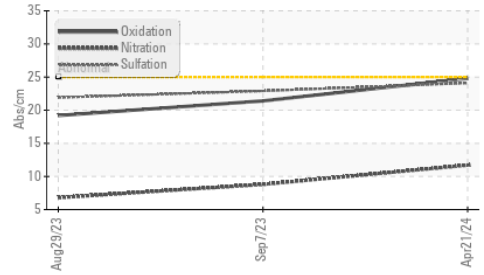
There is no indication of any contamination in the oil.

FLUID CONDITION

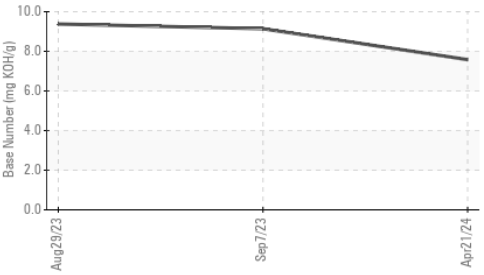
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		DC0035635	DC0027485	DC0027488
Sample Date		Client Info		21 Apr 2024	07 Sep 2023	29 Aug 2023
Machine Age	hrs	Client Info		1069	0	5391
Oil Age	hrs	Client Info		500	0	5391
Filter Age	hrs	Client Info		500	0	0
Oil Changed		Client Info		Changed	N/A	N/A
Filter Changed		Client Info		Changed	N/A	N/A
Sample Status				NORMAL	MARGINAL	MARGINAL
Iron	ppm	ASTM D5185m	>100	34	16	13
Chromium	ppm	ASTM D5185m	>20	1	0	0
Nickel	ppm	ASTM D5185m	>2	1	0	0
Titanium	ppm	ASTM D5185m	>2	<1	0	0
Silver	ppm	ASTM D5185m	>2	0	0	0
Aluminum	ppm	ASTM D5185m	>25	4	3	2
Lead	ppm	ASTM D5185m	>40	1	<1	<1
Copper	ppm	ASTM D5185m	>330	25	18	3
Tin	ppm	ASTM D5185m	>15	1	<1	<1
Vanadium	ppm	ASTM D5185m		<1	<1	<1
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Silicon	ppm	ASTM D5185m	>25	15	8	5
Potassium	ppm	ASTM D5185m	>20	3	<1	2
Fuel		WC Method	>5	<1.0	▲ 4.6	▲ 3.6
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844	>3	0.5	0.3	0.3
Nitration	Abs/cm	*ASTM D7624	>20	11.7	8.8	6.8
Sulfation	Abs/.1mm	*ASTM D7415	>30	24.1	22.9	21.9
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	NEG	NEG	NEG
Sodium	ppm	ASTM D5185m		5	4	5
Boron	ppm	ASTM D5185m		31	47	59
Barium	ppm	ASTM D5185m		0	0	0
Molybdenum	ppm	ASTM D5185m		46	49	41
Manganese	ppm	ASTM D5185m		1	<1	<1
Magnesium	ppm	ASTM D5185m		504	528	513
Calcium	ppm	ASTM D5185m		1647	1829	1832
Phosphorus	ppm	ASTM D5185m		968	915	941
Zinc	ppm	ASTM D5185m		1142	1156	1142
Sulfur	ppm	ASTM D5185m		3252	3309	3724
Oxidation	Abs/.1mm	*ASTM D7414	>25	24.8	21.4	19.2
Base Number (BN)	mg KOH/g	ASTM D2896		7.58	9.14	9.38
Visc @ 100°C	cSt	ASTM D445		12.8	12.3	12.4

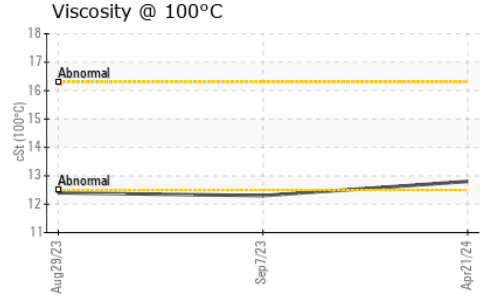
FT-IR (Direct Trend)



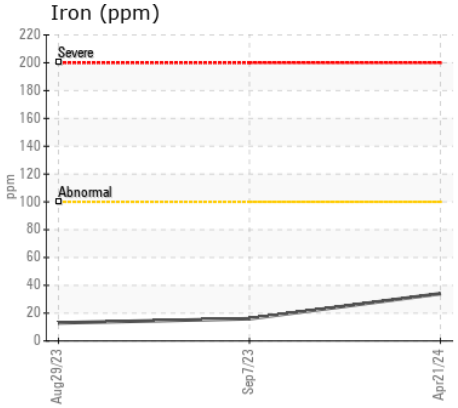
Base Number



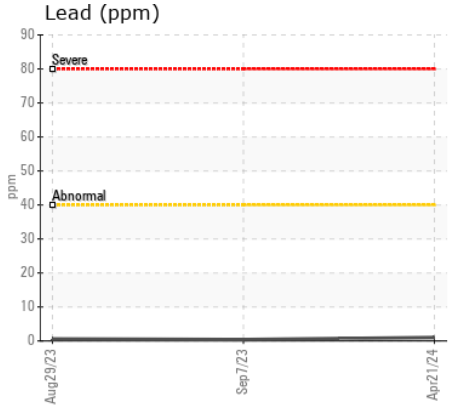
Viscosity @ 100°C



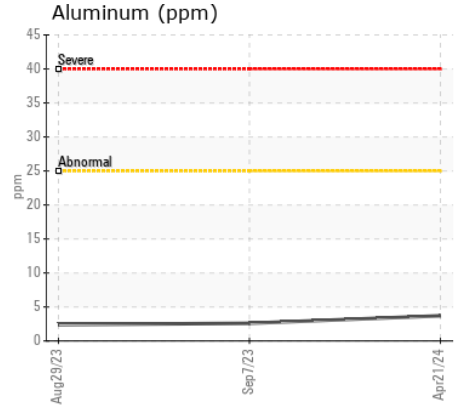
Iron (ppm)



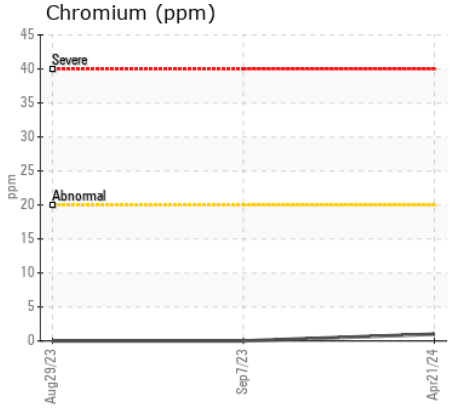
Lead (ppm)



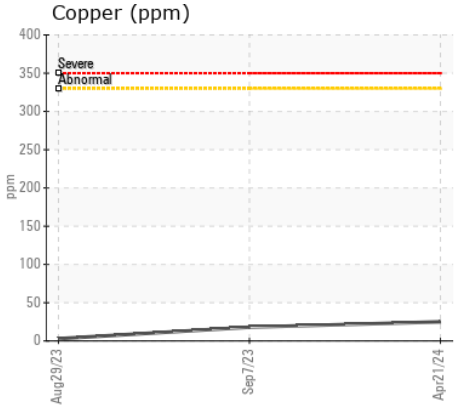
Aluminum (ppm)



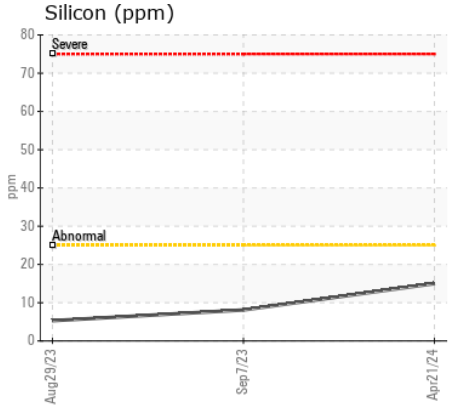
Chromium (ppm)



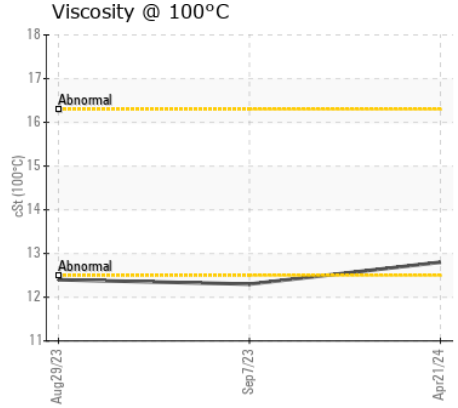
Copper (ppm)



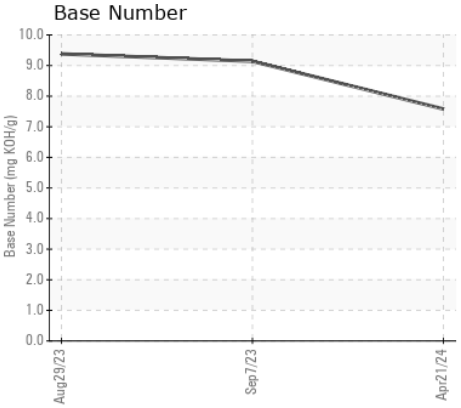
Silicon (ppm)



Viscosity @ 100°C



Base Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : DC0035635
Lab Number : 06160574
Unique Number : 10995997
Test Package : MOB 2

Received : 25 Apr 2024
Tested : 26 Apr 2024
Diagnosed : 26 Apr 2024 - Wes Davis

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)

COMER CONSTRUCTION
2100 SLADE LANE
FOREST HILL, MD
US 21050
Contact: RANDY SLADE
rslade@comerconstruction.com
T:
F: (410)638-0289