OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
1447
Component
Front Diesel Engine
Fluid
MOBIL 1 5W30 (--- QTS)

RECOMMENDATION

Resample at the next service interval to monitor. Please specify the component make and model with your next sample.

WEAR

All component wear rates are normal.

CONTAMINATION

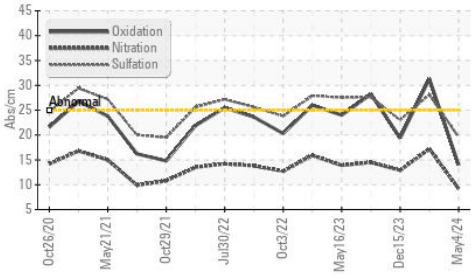
There is no indication of any contamination in the oil.

FLUID CONDITION

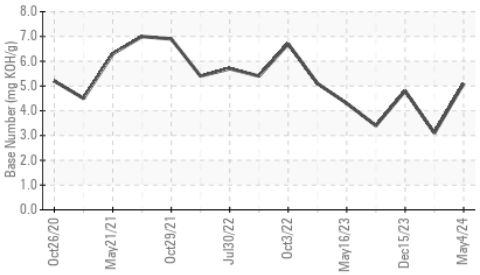
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		**WC0827791**	WC0827835	WC0827686
Sample Date		Client Info		**04 May 2024**	24 Feb 2024	15 Dec 2023
Machine Age	mls	Client Info		**95220**	91794	0
Oil Age	mls	Client Info		**0**	0	0
Filter Age	mls	Client Info		**0**	0	0
Oil Changed		Client Info		**Changed**	Changed	Changed
Filter Changed		Client Info		**Changed**	Changed	Changed
Sample Status				**NORMAL**	NORMAL	NORMAL
Iron	ppm	ASTM D5185m	>100	**10**	72	18
Chromium	ppm	ASTM D5185m	>20	**<1**	3	<1
Nickel	ppm	ASTM D5185m	>4	**<1**	2	<1
Titanium	ppm	ASTM D5185m		**<1**	<1	0
Silver	ppm	ASTM D5185m	>3	**0**	0	0
Aluminum	ppm	ASTM D5185m	>20	**3**	12	3
Lead	ppm	ASTM D5185m	>40	**0**	<1	0
Copper	ppm	ASTM D5185m	>330	**16**	130	25
Tin	ppm	ASTM D5185m	>15	**<1**	<1	0
Vanadium	ppm	ASTM D5185m		**<1**	0	0
White Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Silicon	ppm	ASTM D5185m	>25	**9**	19	9
Potassium	ppm	ASTM D5185m	>20	**2**	10	<1
Fuel		WC Method	>5	**<1.0**	<1.0	<1.0
Water		WC Method	>0.2	**NEG**	NEG	NEG
Glycol		WC Method		**NEG**	NEG	NEG
Soot %	%	*ASTM D7844	>3	**0**	0.1	0.1
Nitration	Abs/cm	*ASTM D7624	>20	**9.2**	17.2	12.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	**19.6**	28.1	23.0
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		**4**	11	6
Boron	ppm	ASTM D5185m	94	**62**	26	39
Barium	ppm	ASTM D5185m	0.0	**0**	0	<1
Molybdenum	ppm	ASTM D5185m	0.0	**69**	107	77
Manganese	ppm	ASTM D5185m		**0**	34	1
Magnesium	ppm	ASTM D5185m	1388	**482**	709	580
Calcium	ppm	ASTM D5185m	820	**1111**	790	1059
Phosphorus	ppm	ASTM D5185m	720	**657**	693	714
Zinc	ppm	ASTM D5185m	780	**778**	867	823
Sulfur	ppm	ASTM D5185m	2240	**2689**	2039	2457
Oxidation	Abs/.1mm	*ASTM D7414	>25	**14.0**	31.3	19.4
Base Number (BN)	mg KOH/g	ASTM D2896		**5.1**	3.1	4.8
Visc @ 100°C	cSt	ASTM D445	11.3	**9.7**	11.4	10.0

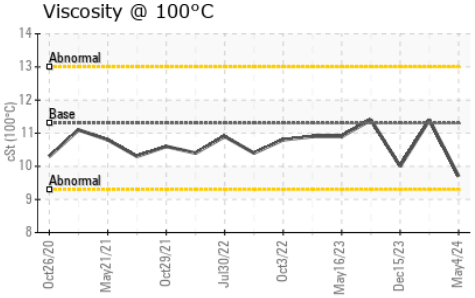
FT-IR (Direct Trend)



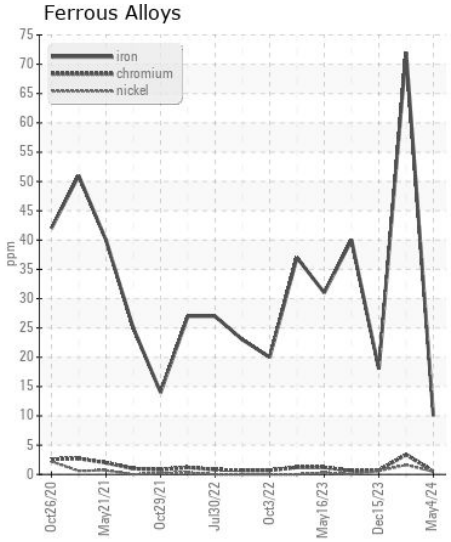
Base Number



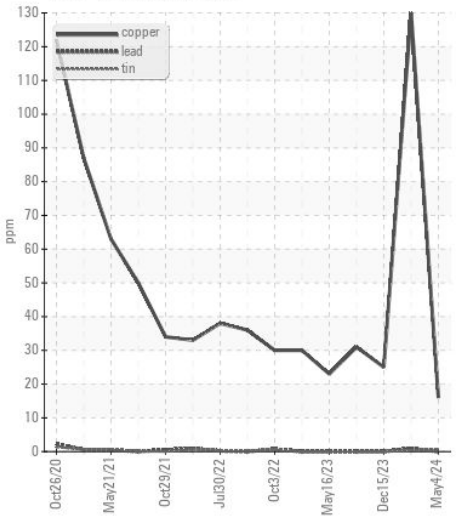
Viscosity @ 100°C



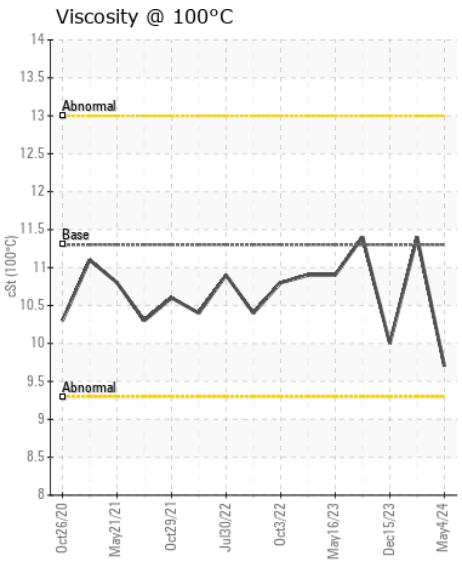
Ferrous Alloys



Non-ferrous Metals



Viscosity @ 100°C



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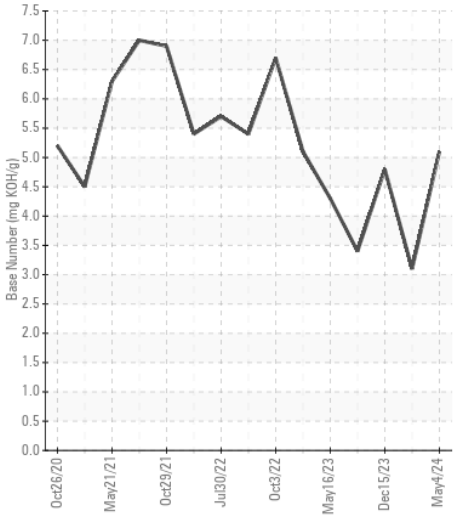

Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0827791
Lab Number : 06178543
Unique Number : 11029869
Test Package : FLEET

Received : 14 May 2024
Tested : 15 May 2024
Diagnosed : 15 May 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)

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