CONST

WEAR CHECK

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	SEVERE
FLUID CONDITION	SEVERE

Area
OKLAHOMA/102/EG - OTHER SERVICE
Machine Id
87.21 - TORQUE HUB [OKLAHOMA^102^EG - OTHER SERVICE]
Component
Diesel Engine
Fluid
MOBIL DELVAC 1300 SUPER15W40 (--- GAL)

RECOMMENDATION

We advise that you check the fuel injection system. The oil change at the time of sampling has been noted. We recommend an early resample to monitor this condition.

WEAR

All component wear rates are normal.

CONTAMINATION

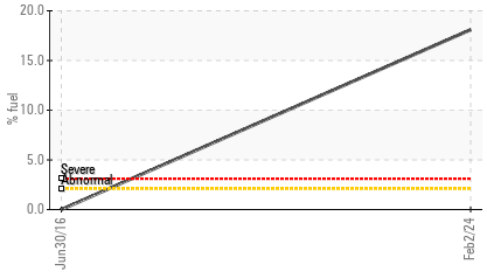
There is a high amount of fuel present in the oil. Tests confirm the presence of fuel in the oil.

FLUID CONDITION

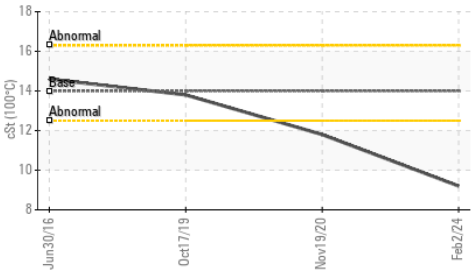
The BN result indicates that there is suitable alkalinity remaining in the oil. Fuel is present in the oil and is lowering the viscosity. The oil is no longer serviceable due to the presence of contaminants.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		**WC0886928**	WC0501450	WC0337659
Sample Date		Client Info		**02 Feb 2024**	19 Nov 2020	17 Oct 2019
Machine Age	hrs	Client Info		**563**	130	5287
Oil Age	hrs	Client Info		**250**	250	134
Filter Age	hrs	Client Info		**250**	250	134
Oil Changed		Client Info		**Changed**	Changed	N/A
Filter Changed		Client Info		**Changed**	Changed	N/A
Sample Status				**SEVERE**	NORMAL	NORMAL
Iron	ppm	ASTM D5185m	>51	**16**	12	9
Chromium	ppm	ASTM D5185m	>11	**<1**	<1	<1
Nickel	ppm	ASTM D5185m	>5	**<1**	<1	<1
Titanium	ppm	ASTM D5185m		**0**	0	0
Silver	ppm	ASTM D5185m	>3	**0**	0	0
Aluminum	ppm	ASTM D5185m	>31	**1**	<1	2
Lead	ppm	ASTM D5185m	>26	**0**	<1	0
Copper	ppm	ASTM D5185m	>26	**2**	<1	1
Tin	ppm	ASTM D5185m	>4	**<1**	<1	<1
Vanadium	ppm	ASTM D5185m		**0**	0	0
White Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Silicon	ppm	ASTM D5185m	>22	**4**	4	7
Potassium	ppm	ASTM D5185m	>20	**2**	<1	2
Fuel	%	ASTM D3524	>2.1	▲ **18.1**	<1.0	<1.0
Water		WC Method	>0.21	**NEG**	NEG	NEG
Glycol		WC Method		**NEG**	NEG	NEG
Soot %	%	*ASTM D7844	>3	**0.1**	0.1	0.1
Nitration	Abs/cm	*ASTM D7624	>20	**10.2**	8.2	6.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	**19.7**	23	21.1
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	>0.21	**NEG**	NEG	NEG
Sodium	ppm	ASTM D5185m	>31	**3**	2	5
Boron	ppm	ASTM D5185m	0	**45**	60	62
Barium	ppm	ASTM D5185m	0	**0**	0	<1
Molybdenum	ppm	ASTM D5185m	0	**14**	40	42
Manganese	ppm	ASTM D5185m		**<1**	<1	1
Magnesium	ppm	ASTM D5185m	0	**498**	482	525
Calcium	ppm	ASTM D5185m		**1057**	1611	1608
Phosphorus	ppm	ASTM D5185m		**535**	690	681
Zinc	ppm	ASTM D5185m		**636**	867	839
Sulfur	ppm	ASTM D5185m		**1971**	1926	2379
Oxidation	Abs/.1mm	*ASTM D7414	>25	**18.1**	21.8	19.7
Base Number (BN)	mg KOH/g	ASTM D2896	9.4	**7.4**	9.8	10
Visc @ 100°C	cSt	ASTM D445	14	▲ **9.2**	11.8	13.8

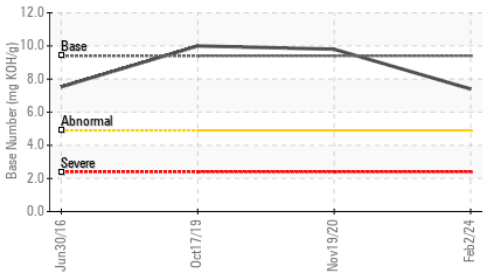
Fuel Dilution



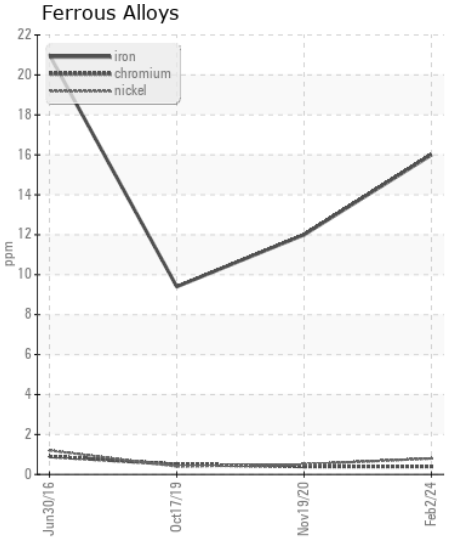
Viscosity @ 100°C



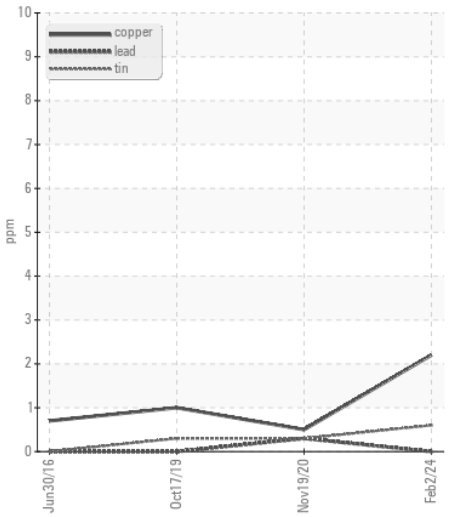
Base Number



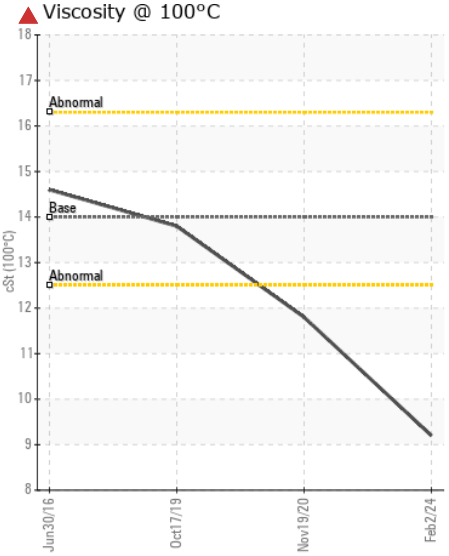
Ferrous Alloys



Non-ferrous Metals



Viscosity @ 100°C



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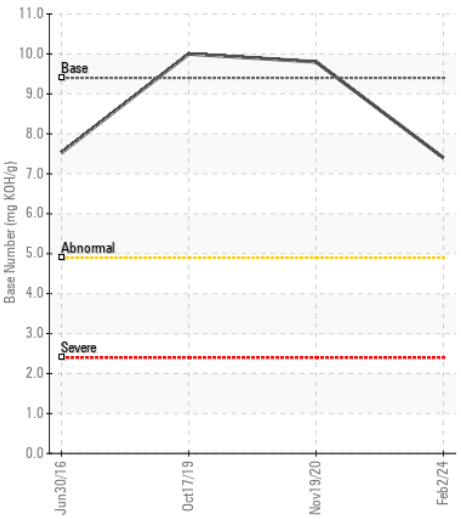

Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0886928
Lab Number : 06098110
Unique Number : 10896340
Test Package : CONST (Additional Tests: FuelDilution, PercentFuel, TBN)

Received : 23 Feb 2024
Tested : 27 Feb 2024
Diagnosed : 27 Feb 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)

SHERWOOD CONSTRUCTION CO INC
3219 WEST MAY ST
WICHITA, KS
US 67213
Contact: DOUG KING
doug.king@sherwood.net
T: (316)617-3161
F: x: