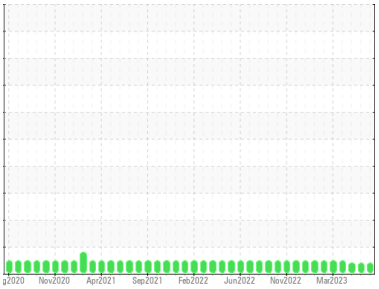
PROBLEM SUMMARY

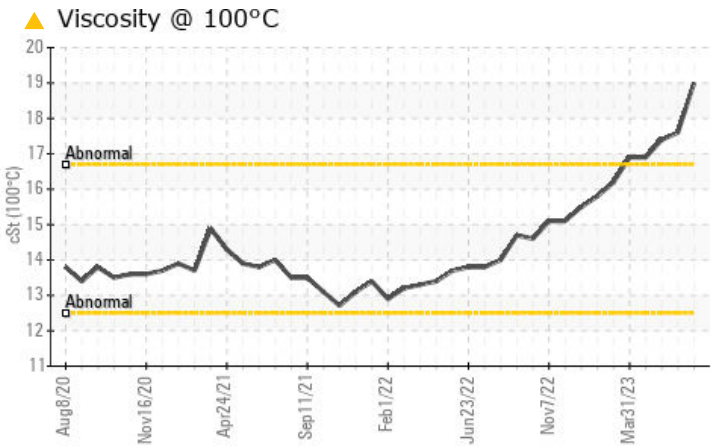
Sample Rating Trend



VISCOSITY

Area
Findlay
Machine Id
[Findlay] Oil - Port Genset
Component
Port Genset
Fluid
Marathon 15W40 (35 GAL)

COMPONENT CONDITION SUMMARY



RECOMMENDATION

Resample at the next service interval to monitor. (Customer Sample Comment: C.Kemper)

PROBLEMATIC TEST RESULTS

Sample Status				ATTENTION	ATTENTION	ATTENTION
Visc @ 100°C	cSt	ASTM D445		**19.0**	17.6	17.4

Customer Id: MARCAT
Sample No.: WC0769467
Lab Number: 05903425
Test Package: IND 2

To manage this report scan the QR code

To discuss the diagnosis or test data:
Doug Bogart +1 (800)237-1369 x4016
dougb@wearcheckusa.com

To change component or sample information:
Customer Service +1 1-800-237-1369
customerservice@wearcheck.com

RECOMMENDED ACTIONS

There are no recommended actions for this sample.

HISTORICAL DIAGNOSIS

15 Jun 2023 Diag: Don Baldridge

VISCOSITY

The oil filtered at the time of sampling has been noted. The filter change at the time of sampling has been noted. Resample at the next service interval to monitor.All component wear rates are normal. There is no indication of any contamination in the oil. The oil viscosity is higher than normal. The BN result indicates that there is suitable alkalinity remaining in the oil.

view report

23 May 2023 Diag: Don Baldridge

VISCOSITY

Resample at the next service interval to monitor.All component wear rates are normal. There is no indication of any contamination in the oil. The oil viscosity is higher than normal. The BN result indicates that there is suitable alkalinity remaining in the oil.

view report

21 Apr 2023 Diag: Jonathan Hester

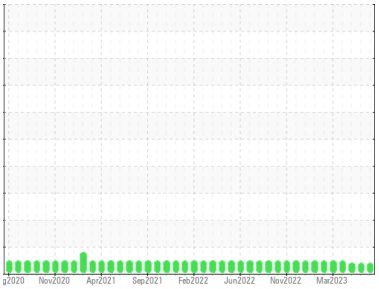
NORMAL

Resample at the next service interval to monitor.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.

view report

OIL ANALYSIS REPORT

Sample Rating Trend



VISCOSITY

Area
Findlay
Machine Id
[Findlay] Oil - Port Genset
Component
Port Genset
Fluid
Marathon 15W40 (35 GAL)

DIAGNOSIS

Recommendation
Resample at the next service interval to monitor. (Customer Sample Comment: C.Kemper)

Wear
All component wear rates are normal.

Contamination
There is no indication of any contamination in the oil.

Fluid Condition
The oil viscosity is higher than normal. The BN result indicates that there is suitable alkalinity remaining in the oil.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number		Client Info		**WC0769467**	WC0769463	WC0769531
Sample Date		Client Info		**15 Jul 2023**	15 Jun 2023	23 May 2023
Machine Age	hrs	Client Info		**8441**	7997	7807
Oil Age	hrs	Client Info		**8258**	7845	7655
Oil Changed		Client Info		**Not Changd**	Filtered	Oil Added
Sample Status				**ATTENTION**	ATTENTION	ATTENTION

CONTAMINATION		method	limit/base	current	history1	history2
Fuel		WC Method	>4.0	**<1.0**	<1.0	<1.0
Glycol		WC Method		**NEG**	NEG	NEG

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>25	**25**	21	21
Chromium	ppm	ASTM D5185m	>5	**1**	1	1
Nickel	ppm	ASTM D5185m	>5	**0**	<1	<1
Titanium	ppm	ASTM D5185m		**<1**	0	<1
Silver	ppm	ASTM D5185m	>5	**0**	<1	<1
Aluminum	ppm	ASTM D5185m	>10	**0**	<1	2
Lead	ppm	ASTM D5185m	>10	**2**	2	3
Copper	ppm	ASTM D5185m	>20	**5**	4	5
Tin	ppm	ASTM D5185m	>5	**<1**	1	1
Vanadium	ppm	ASTM D5185m		**<1**	0	<1
Cadmium	ppm	ASTM D5185m		**0**	0	<1

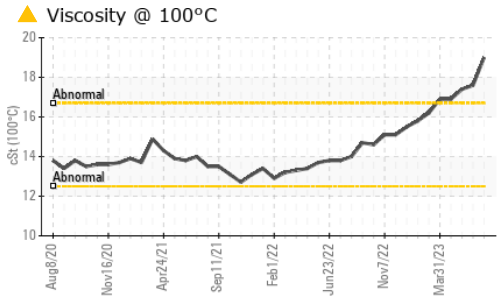
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		**49**	52	48
Barium	ppm	ASTM D5185m		**0**	0	0
Molybdenum	ppm	ASTM D5185m		**55**	53	51
Manganese	ppm	ASTM D5185m		**<1**	<1	<1
Magnesium	ppm	ASTM D5185m		**1168**	1176	1129
Calcium	ppm	ASTM D5185m		**1673**	1653	1627
Phosphorus	ppm	ASTM D5185m		**1072**	1134	1020
Zinc	ppm	ASTM D5185m		**1344**	1459	1291
Sulfur	ppm	ASTM D5185m		**3730**	4142	3408

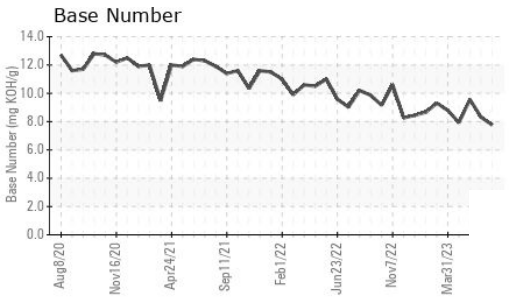
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>25	**3**	4	4
Sodium	ppm	ASTM D5185m		**12**	9	9
Potassium	ppm	ASTM D5185m	>20	**3**	6	4

INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844		**0.3**	0.3	0.3
Nitration	Abs/cm	*ASTM D7624	>20	**18.2**	16.3	16.8
Sulfation	Abs/.1mm	*ASTM D7415	>30	**31.1**	30.1	30.3

FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	**40.9**	38.1	37.5
Base Number (BN)	mg KOH/g	ASTM D2896		**7.77**	8.31	9.56

OIL ANALYSIS REPORT



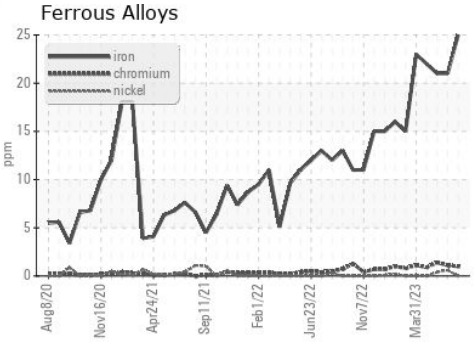


VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Precipitate	scalar	*Visual	NONE	**NONE**	NONE	NONE
Silt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Debris	scalar	*Visual	NONE	**NONE**	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Appearance	scalar	*Visual	NORML	**NORML**	NORML	NORML
Odor	scalar	*Visual	NORML	**NORML**	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	**NEG**	NEG	NEG
Free Water	scalar	*Visual		**NEG**	NEG	NEG

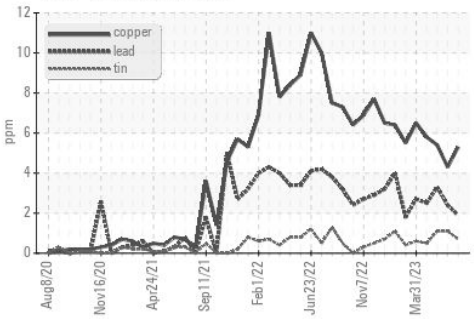
FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445		▲ **19.0**	▲ 17.6	▲ 17.4

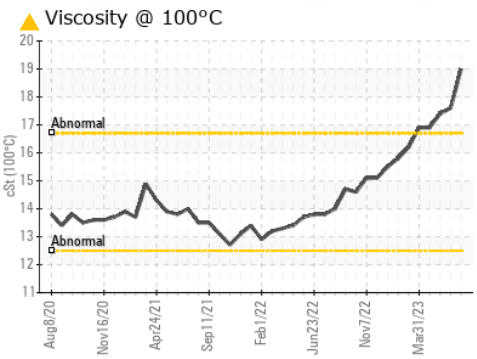
GRAPHS

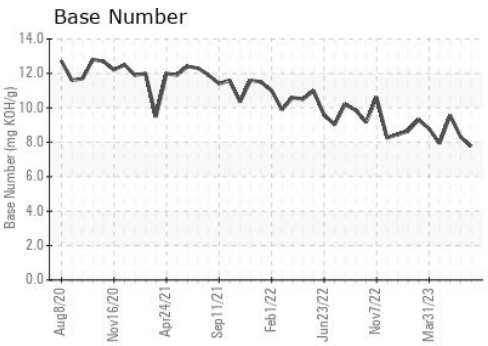
Ferrous Alloys



Non-ferrous Metals







Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0769467
Lab Number : 05903425
Unique Number : 10564781
Test Package : IND 2

Received : 20 Jul 2023
Diagnosed : 25 Jul 2023
Diagnostician : Doug Bogart

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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