



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
MCCLOSKEY 86949 - VARIABLE SPEED

Component
Diesel Engine

Fluid
DIESEL ENGINE OIL SAE 40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		VPA054172	VPA056298	VPA040775
Sample Date		Client Info		17 May 2024	22 Feb 2024	19 Jun 2023
Machine Age	hrs	Client Info		377	290	3930
Oil Age	hrs	Client Info		377	290	100
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	ABNORMAL	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>100	7	29	27
Chromium	ppm	ASTM D5185m	>20	0	1	<1
Nickel	ppm	ASTM D5185m	>4	<1	1	0
Titanium	ppm	ASTM D5185m		<1	<1	<1
Silver	ppm	ASTM D5185m	>3	<1	<1	0
Aluminum	ppm	ASTM D5185m	>20	2	2	<1
Lead	ppm	ASTM D5185m	>40	0	<1	0
Copper	ppm	ASTM D5185m	>330	9	30	<1
Tin	ppm	ASTM D5185m	>15	<1	3	<1
Vanadium	ppm	ASTM D5185m		<1	<1	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

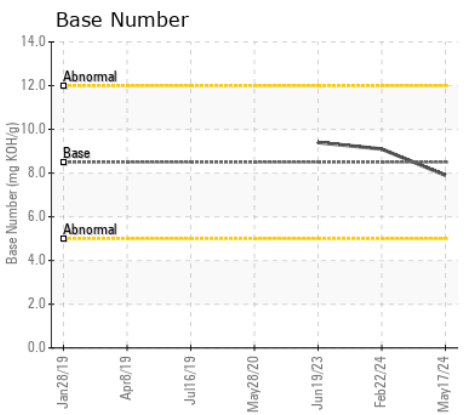
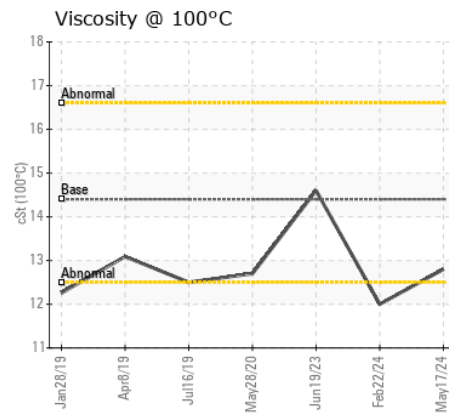
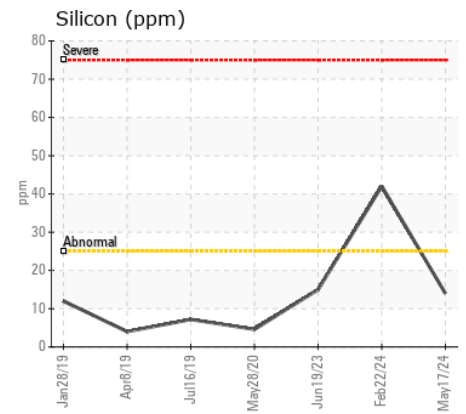
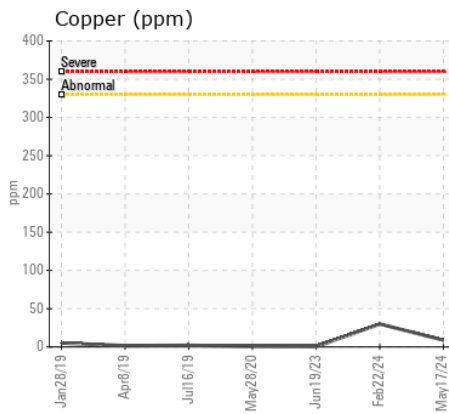
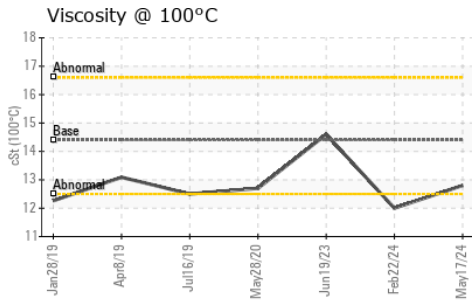
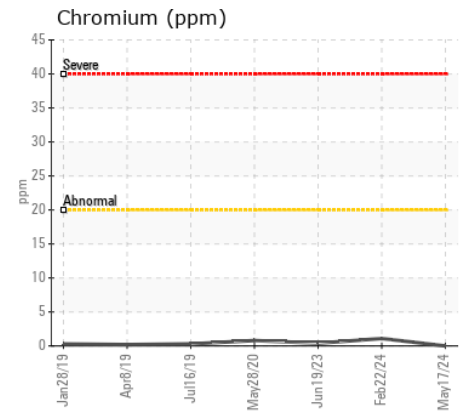
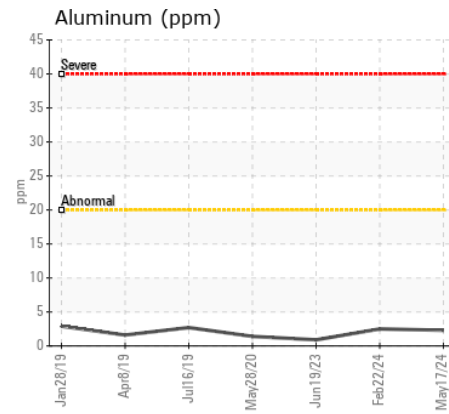
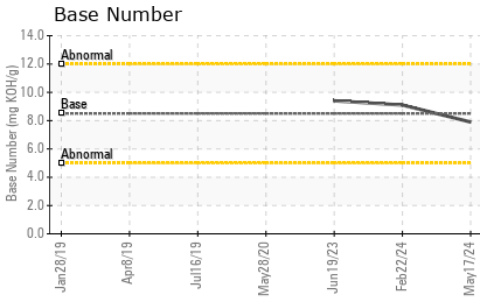
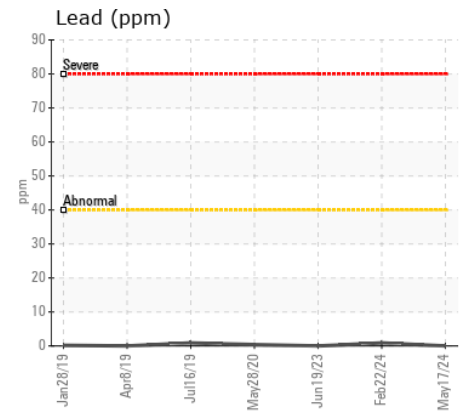
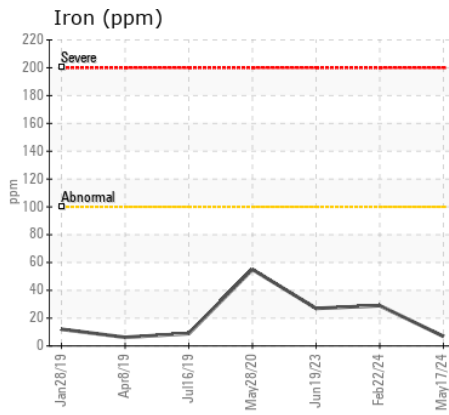
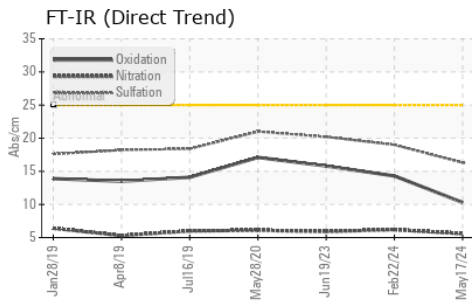
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>25	14	▲ 42	15
Potassium	ppm	ASTM D5185m	>20	7	6	1
Fuel		WC Method	>5	<1.0	0.8	<1.0
Water		WC Method	>0.2	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	5.6	6.2	5.9
Sulfation	Abs/.1mm	*ASTM D7415	>30	16.3	19.0	20.2
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

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.

Sodium	ppm	ASTM D5185m	>216	2	2	1
Boron	ppm	ASTM D5185m	250	51	29	112
Barium	ppm	ASTM D5185m	10	2	2	0
Molybdenum	ppm	ASTM D5185m	100	24	68	58
Manganese	ppm	ASTM D5185m		1	4	<1
Magnesium	ppm	ASTM D5185m	450	277	862	724
Calcium	ppm	ASTM D5185m	3000	2053	1170	1429
Phosphorus	ppm	ASTM D5185m	1150	1029	955	1009
Zinc	ppm	ASTM D5185m	1350	1172	1175	1207
Sulfur	ppm	ASTM D5185m	4250	4325	3356	3755
Oxidation	Abs/.1mm	*ASTM D7414	>25	10.3	14.3	15.8
Base Number (BN)	mg KOH/g	ASTM D2896	8.5	7.9	9.1	9.4
Visc @ 100°C	cSt	ASTM D445	14.4	12.8	● 12.0	14.6



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : VPA054172 **Received** : 03 Jun 2024
Lab Number : 06197385 **Tested** : 11 Jun 2024
Unique Number : 11059508 **Diagnosed** : 11 Jun 2024 - Jonathan Hester
Test Package : MOB 1 (Additional Tests: TBN)

MCCOURT & SONS EQUIPMENT INC
 5141 HWY 71 W
 LA GRANGE, TX
 US 78945
 Contact: WAYNE BESEDA
 wklesel@mccourtandsons.com
 T: (979)242-5298
 F:

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)