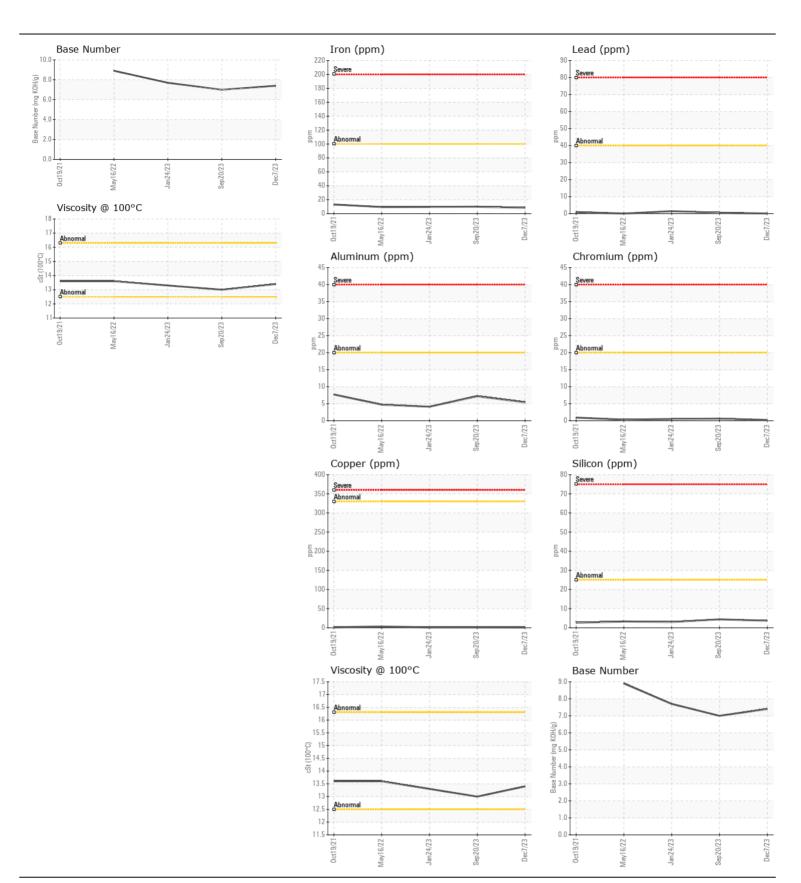
WEAR CONTAMINATION FLUID CONDITION

NORMAL NORMAL

Machine Id **62690**

Component Diesel Engine

DECOMMENDATION	T4	11014	Mada	Line D/Al-	(0	I Baka o od	Liberto
RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current DC0031769	History1	History2
Resample at the next service interval to monitor. Please specify the component make and model with your next sample.	Sample Number		Client Info		07 Dec 2023	DC0031569	DC0026885
	Sample Date Machine Age	hrs	Client Info		5276	20 Sep 2023 5042	24 Jan 2023 4706
	Oil Age	hrs	Client Info		250	300	0
	Filter Age	hrs	Client Info		250	300	0
	Oil Changed	1113	Client Info		Changed	Changed	Changed
	Filter Changed		Client Info		Changed	Changed	Changed
	Sample Status				NORMAL	NORMAL	NORMAL
VEAR	Iron	ppm	ASTM D5185m	>100	8	10	10
	Chromium	ppm	ASTM D5185m	>20	<1	<1	<1
All component wear rates are normal.	Nickel	ppm	ASTM D5185m	>4	0	0	<1
	Titanium	ppm	ASTM D5185m		0	<1	0
	Silver	ppm	ASTM D5185m	>3	0	0	0
	Aluminum	ppm	ASTM D5185m	>20	5	7	4
	Lead	ppm	ASTM D5185m	>40	0	<1	1
	Copper	ppm	ASTM D5185m		<1	1	1
	Tin	ppm	ASTM D5185m	>15	<1	1	<1
	Vanadium	ppm	ASTM D5185m		<1	0	0
	White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
	Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
CONTAMINATION	Silicon	ppm	ASTM D5185m	>25	4	4	3
CONTAMINATION	Potassium	ppm	ASTM D5185m		1	2	2
There is no indication of any contamination in the oil.	Fuel	ррпп	WC Method		<1.0	<1.0	<1.0
	Water		WC Method		NEG	NEG	NEG
	Glycol		WC Method	7 0.2	NEG	NEG	NEG
	Soot %	%	*ASTM D7844	>3	0.6	0.6	0.6
	Nitration	Abs/cm	*ASTM D7624	>20	6.7	6.9	7.2
	Sulfation	Abs/.1mm	*ASTM D7415	>30	16.6	16.4	17.2
	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	NORMI
	Odor	scalar	*Visual	NORML	NORML	NORML	NORMI
	Emulsified Water	scalar	*Visual	>0.2	NEG	NEG	NEG
THE CONDITION							
LUID CONDITION	Sodium	ppm	ASTM D5185m		<1	2	1
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.	Boron	ppm	ASTM D5185m		2	2	5
	Barium	ppm	ASTM D5185m		0	0	0
	Molybdenum	ppm	ASTM D5185m		4	1	5
	Manganese	ppm	ASTM D5185m		0	<1	<1
	Magnesium Calcium	ppm	ASTM D5185m		65	42	64
		ppm	ASTM D5185m		2186	2134	2438
	Phosphorus	ppm	ASTM D5185m		920 1096	912	898
	Zinc	ppm	ASTM D5185m			1068	1108
	Sulfur Oxidation	ppm Abs/1mm	*ASTM D5185m	> 2F	3735	3874	4427
	Base Number (BN)	Abs/.1mm		>20	9.2 7.4	8.9 7.0	9.8 7.7
	Dase Mullipel (DIN)	ilig KOn/g	A3 1 W D2090		1.4	7.0	1.1







Certificate L2367

Laboratory Sample No. Lab Number **Unique Number**

: 06056500

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : DC0031769

Recieved Diagnosed : 10822449 Test Package : MOB 1 (Additional Tests: TBN)

: 11 Jan 2024 Diagnostician : Wes Davis

: 10 Jan 2024

FRANCIS O DAY 14900 SOUTHLAWN LN ROCKVILLE, MD US 20850

Contact: JAMIE FORESTER

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)

T: F: