WEAR CONTAMINATION **FLUID CONDITION**

NORMAL SEVERE ABNORMAL

Machine Id

1661

Component

Component Diesel Engine							
{not provided} (GAL)							
RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
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. Please specify the component make and model with your next sample. Please specify the brand, type, and viscosity of the oil on your next sample.	Sample Number		Client Info		WC0916538		
	Sample Date		Client Info		20 May 2024		
	Machine Age	mls	Client Info		466817		
	Oil Age	mls	Client Info		24073		
	Filter Age	mls	Client Info		24073		
	Oil Changed		Client Info		Changed		
	Filter Changed		Client Info		Changed		
	Sample Status				SEVERE		
NEAD.				400			
WEAR All component wear rates are normal.	Iron	ppm	ASTM D5185m		40		
	Chromium	ppm	ASTM D5185m		1		
	Nickel	ppm	ASTM D5185m	>4	<1		
	Titanium	ppm	ASTM D5185m	0	0		
	Silver	ppm	ASTM D5185m		<1		
	Aluminum	ppm	ASTM D5185m		3		
	Lead	ppm	ASTM D5185m		3		
	Copper	ppm	ASTM D5185m		1		
	Tin	ppm	ASTM D5185m	>15	<1		
	Vanadium White Metal	ppm	ASTM D5185m	NONE	0 NONE		
		scalar	*Visual	NONE	NONE		
	Yellow Metal	scalar	*Visual	NONE	NONE		
CONTAMINATION There is a high amount of fuel present in the oil. Tests confirm the presence of fuel in the oil.	Silicon	ppm	ASTM D5185m	>25	5		
	Potassium	ppm	ASTM D5185m		5		
	Fuel	%	ASTM D3524		43.7		
	Water		WC Method	>0.2	NEG		
	Glycol		WC Method		NEG		
	Soot %	%	*ASTM D7844	>3	0.6		
	Nitration	Abs/cm	*ASTM D7624	>20	11.7		
	Sulfation	Abs/.1mm	*ASTM D7415	>30	25.1		
	Silt	scalar	*Visual	NONE	NONE		
	Debris	scalar	*Visual	NONE	NONE		
	Sand/Dirt	scalar	*Visual	NONE	NONE		
	Appearance	scalar	*Visual	NORML	NORML		
	Odor	scalar	*Visual	NORML	NORML		
	Emulsified Water	scalar	*Visual	>0.2	NEG		
TI LUD CONDITION	O - diam-		AOTM DE405				
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.	Sodium	ppm	ASTM D5185m ASTM D5185m		3		
	Boron Barium	ppm	ASTM D5185m		17 0		
	Molybdenum	ppm			61		
	Manganese	ppm	ASTM D5185m ASTM D5185m		1		
	Magnesium	ppm	ASTM D5185m		745		
	Calcium	ppm	ASTM D5185m		745 1411		
	Phosphorus	ppm	ASTM D5185m		1074		
	Zinc	ppm	ASTM D5185m		1074		
	21110	ppm	MOTIVI DOTOSIII		1204		

Sulfur

Oxidation

Visc @ 100°C cSt

ppm ASTM D5185m

Base Number (BN) mg KOH/g ASTM D2896

Abs/.1mm *ASTM D7414 >25

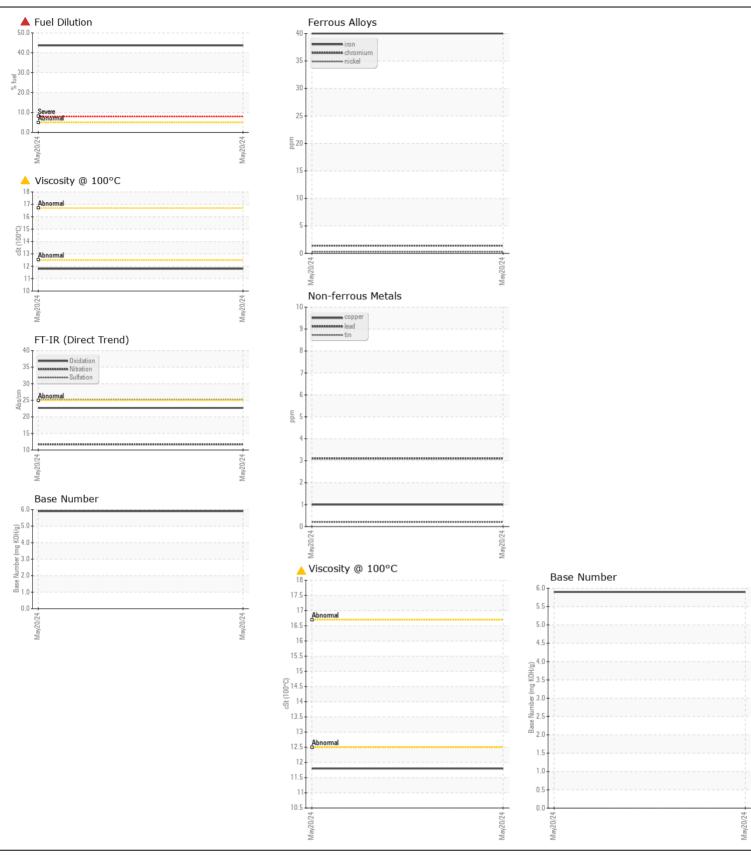
ASTM D445

3567

22.7

5.9

11.8







Certificate L2367

Laboratory Sample No.

Lab Number : 06212882 Unique Number : 11085746

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : WC0916538

To discuss this sample report, contact Customer Service at 1-800-237-1369.

Received **Tested** Diagnosed

: 17 Jun 2024 : 20 Jun 2024

: 20 Jun 2024 - Wes Davis Test Package: FLEET (Additional Tests: FuelDilution, PercentFuel)

US 72206 Contact: DENNIS CATES denniscates@carcotrans.com T: (800)967-0777

Contact/Location: DENNIS CATES - CARLIT

CARCO TRANSPORTATION

LITTLE ROCK, AR

3403 EAST ROOSEVELT ROAD

* - 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)