**WEAR** CONTAMINATION **FLUID CONDITION** 

**NORMAL NORMAL ATTENTION** 

Machine Id **\$120408B** 

Component Diesel Engine

ECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History
Resample at the next service interval to monitor.	Sample Number		Client Info		WC0772582		
	Sample Date		Client Info		06 Mar 2023		
	Machine Age	hrs	Client Info		469		
	Oil Age	hrs	Client Info		0		
	Filter Age	hrs	Client Info		0		
	Oil Changed		Client Info		Changed		
	Filter Changed		Client Info		Changed		
	Sample Status				ATTENTION		
/EAR	Iron	ppm	ASTM D5185m	>100	4		
	Chromium	ppm	ASTM D5185m	>20	<1		
All component wear rates are normal.	Nickel	ppm	ASTM D5185m		0		
	Titanium	ppm	ASTM D5185m		<1		
	Silver	ppm	ASTM D5185m	>3	0		
	Aluminum	ppm	ASTM D5185m		<1		
	Lead	ppm	ASTM D5185m		<1		
	Copper	ppm	ASTM D5185m	>330	<1		
	Tin	ppm	ASTM D5185m	>15	0		
	Vanadium	ppm	ASTM D5185m		0		
	White Metal	scalar	*Visual	NONE	NONE		
	Yellow Metal	scalar	*Visual	NONE	NONE		
CONTAMINATION	Silicon		ASTM D5185m	. 05			
		ppm			5		
uel content negligible. There is no indication of any contamination in	Potassium Fuel	ppm o/	ASTM D5185m		<1 0.5		
the oil.		%	ASTM D3524		0.5		
	Water		WC Method	>0.2	NEG		
	Glycol Soot %	%	*ASTM D7844	. 2	NEG 0.1		
	Nitration	Abs/cm	*ASTM D7624	>20	7.9		
	Sulfation	Abs/.1mm	*ASTM D7024		22.5		
	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		*Visual	>0.2	NEG		
FLUID CONDITION	Coellina		ACTM DE40E	. 44	•		
	Sodium	ppm	ASTM D5185m	>44	3		
The oil viscosity is lower than normal. The BN result indicates that there is suitable alkalinity remaining in the oil. Confirm oil type.	Boron	ppm	ASTM D5185m		68		
	Barium Molybdenum	ppm	ASTM D5185m ASTM D5185m		0 43		
	Manganese	ppm	ASTM D5185m	100	43 <1		
	Magnesium	ppm		150			
	•	ppm	ASTM D5185m		497 1605		
	Calcium Phosphorus	ppm	ASTM D5185m ASTM D5185m		1695 1029		
	Zinc	ppm	ASTM D5185m		1029		
	Sulfur	ppm	ASTM D5165III	1350	3382		
	Oxidation	ppm Abe/ 1mm	*ASTM D5185m		21.5		
	Base Number (BN)	Abs/.1mm	ASTM D7414 ASTM D2896		10.87		
	Visc @ 40°C	cSt	ASTM D2696 ASTM D445		69.9		
		cSt	ASTM D445		69.9 ▲ 10.7		
	VISC @ 100 C	Scale	ASTM D2270		141		

Contact/Location: CHUCK WISHARD - HIAPLA





Certificate L2367

Laboratory Sample No. Lab Number

: 05796714 : 10386398 **Unique Number** 

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 Recieved : 20 Mar 2023 : WC0772582 Diagnosed : 23 Mar 2023 Diagnostician : Doug Bogart

Test Package : MOB 2 ( Additional Tests: FuelDilution, KV40, PercentFuel, VI ) 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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