

WEAR CONTAMINATION FLUID CONDITION **NORMAL NORMAL NORMAL**

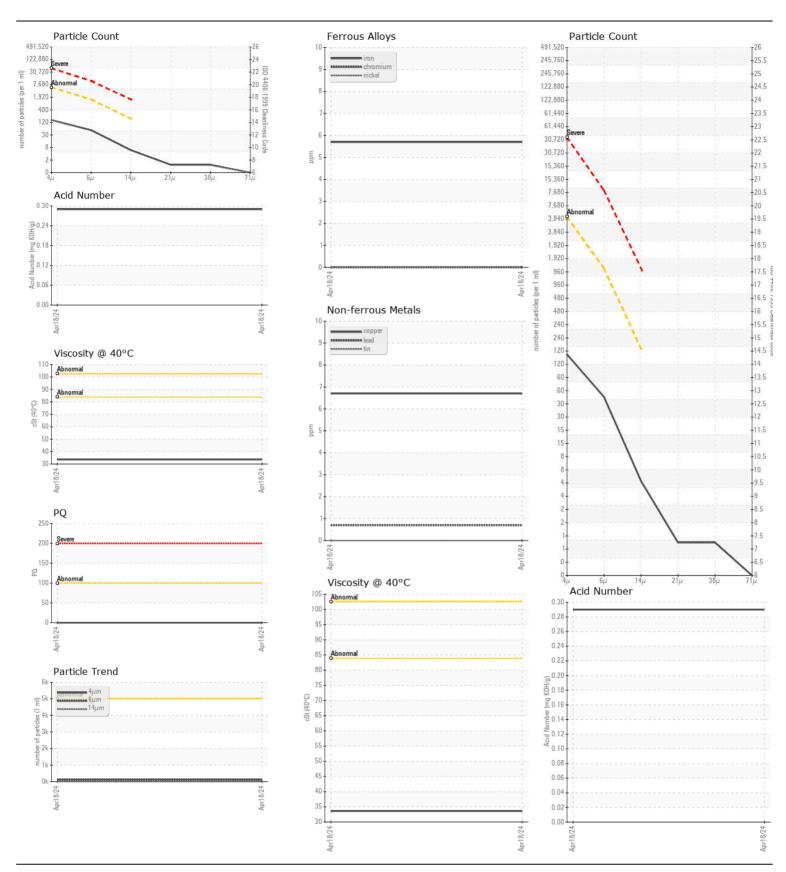
Chem-Ecol

170831 EA (S/N GH-9151A)

Unknown Component

{not provided} (--- GAL)

RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
Little or no information is provided as to the component and lubricant being tested. Recommendations are therefore generic in nature and may not apply to the current application. Please forward information as to equipment type, reservoir capacity, lubricant type and any pertinent information to allow for a more accurate assessment. Resample at the next service interval to monitor. NOTE: Please provide information regarding reservoir capacity, filter type and micron rating with	Sample Number	COM	Client Info	Lillio / toll	PP		
	Sample Date		Client Info		18 Apr 2024		
	Machine Age	hrs	Client Info		0		
	Oil Age	hrs	Client Info		0		
	Filter Age	hrs	Client Info		0		
	Oil Changed	0	Client Info		N/A		
next sample. Please specify the brand, type, and viscosity of the oil on your next	Filter Changed		Client Info		N/A		
sample. Please provide more complete information on your next sample.	Sample Status				NORMAL		
WEAR Component wear rates appear to be normal (unconfirmed).	PQ		ASTM D8184*		0		
	Iron	ppm	ASTM D5185(m)		6		
	Chromium	ppm	ASTM D5185(m)		0		
	Nickel	ppm	ASTM D5185(m)		0		
	Titanium	ppm	ASTM D5185(m)		0		
	Silver	ppm	ASTM D5185(m)		0		
	Aluminum	ppm	ASTM D5185(m)		0		
	Lead	ppm	ASTM D5185(m)		<1		
	Copper	ppm	ASTM D5185(m)		7		
	Tin	ppm	ASTM D5185(m)		0		
	Vanadium	ppm	ASTM D5185(m)		0		
	White Metal	scalar	Visual*	NONE	NONE		
	Yellow Metal	scalar	Visual*	NONE	NONE		
CONTAMINATION	Silicon	nnm	ASTM D5185(m)		-1		
CONTAMINATION	Potassium	ppm	ASTM D5185(III)	> 20	<1 <1		
The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.	Water	ppm	WC Method	>20	NEG		
	Particles >4µm		ASTM D7647	>5000	137		
	Particles >6µm		ASTM D7647		45		
	Particles >14μm		ASTM D7647		5		
	Particles >21μm		ASTM D7647	>40	1		
	Particles >38µm		ASTM D7647		1		
	Particles >71µm		ASTM D7647		0		
	Oil Cleanliness		ISO 4406 (c)		14/13/10		
	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*		NEG		
EL LUD AGNIDITION							
FLUID CONDITION	Sodium	ppm	ASTM D5185(m)		0		
Viscosity of sample indicates oil is within ISO 32 range, advise investigate. The AN level is acceptable for this fluid. The condition of the sample is suitable for further service.	Boron	ppm	ASTM D5185(m)		<1		
	Barium	ppm	ASTM D5185(m)		0		
	Molybdenum	ppm	ASTM D5185(m)		0		
	Manganese	ppm	ASTM D5185(m)		0		
	Magnesium	ppm	ASTM D5185(m)		6		
	Calcium	ppm	ASTM D5185(m)		42		
	Phosphorus Zinc	ppm	ASTM D5185(m) ASTM D5185(m)		218 251		
	Sulfur	ppm	ASTM D5185(III)		2594		
	Acid Number (AN)	ppm mg KOH/g	ASTM D3163(III) ASTM D974*		0.29		
	Visc @ 40°C	cSt	ASTM D7279(m)		33.6		
	VISC @ 40 C	COL	79 INI 01219(III)		33.0		





CALA ISO 17025:2017 Accredited

Laboratory

Laboratory Lab Number

Sample No.

: PP

: WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9 : 02630201

Unique Number : 5763333

Received **Tested** Diagnosed Test Package: IND 2 (Additional Tests: PQ, PRTCOUNT)

: 19 Apr 2024 : 23 Apr 2024

: 23 Apr 2024 - Kevin Marson

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HIBERNIA MGMT & DEVELOPMENT CO. LTD

To discuss this sample report, contact Customer Service at 1-800-268-2131. Test denoted (*) outside scope of accreditation, (m) method modified, (e) tested at external lab. Validity of results and interpretation are based on the sample and information as supplied.

F: (709)753-2728 Contact/Location: Michelle Jefford - HIBSTJ