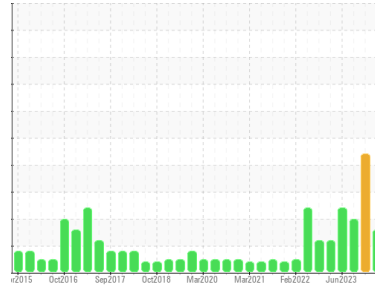




# OIL ANALYSIS REPORT

Sample Rating Trend



ISO



Area  
**RP-109**  
 Machine Id  
**B57043 SILO LOADING SCREW**  
 Component  
**Gearbox**  
 Fluid  
**PETRO CANADA ENDURATEX EP 320 (--- QTS)**

## DIAGNOSIS

### Recommendation

We recommend you service the filters on this component. We recommend an early resample to monitor this condition. NOTE: Please provide information regarding reservoir capacity, filter type and micron rating with next sample.

### Wear

All component wear rates are normal.

### Contamination

There is a moderate amount of silt (particulates < 14 microns in size) present in the oil. The system cleanliness is above the acceptable limit for the target ISO 4406 cleanliness code.

### Fluid Condition

The AN level is acceptable for this fluid. The oil is still serviceable provided that the contaminant(s) can be reduced to acceptable levels.

## SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		<b>WC0908038</b>	WC0872427	WC0842518
Sample Date	Client Info		<b>21 Mar 2024</b>	11 Dec 2023	08 Sep 2023
Machine Age	mls	Client Info	<b>0</b>	0	0
Oil Age	mls	Client Info	<b>0</b>	0	0
Oil Changed	Client Info		<b>Not Chngd</b>	N/A	Not Chngd
Sample Status			<b>ABNORMAL</b>	SEVERE	ABNORMAL

## CONTAMINATION

	method	limit/base	current	history1	history2
Water	WC Method	>0.2	<b>NEG</b>	NEG	NEG

## WEAR METALS

	method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185m	>200	<b>8</b>	6	21
Chromium	ppm	ASTM D5185m	>15	<b>0</b>	<1	0
Nickel	ppm	ASTM D5185m	>15	<b>0</b>	<1	0
Titanium	ppm	ASTM D5185m		<b>0</b>	<1	<1
Silver	ppm	ASTM D5185m		<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m	>25	<b>0</b>	1	4
Lead	ppm	ASTM D5185m	>100	<b>0</b>	0	0
Copper	ppm	ASTM D5185m	>200	<b>0</b>	<1	0
Tin	ppm	ASTM D5185m	>25	<b>0</b>	0	0
Vanadium	ppm	ASTM D5185m		<b>0</b>	0	0
Cadmium	ppm	ASTM D5185m		<b>0</b>	0	0

## ADDITIVES

	method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185m	55	<b>23</b>	23	16
Barium	ppm	ASTM D5185m	0	<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m	0	<b>0</b>	0	0
Manganese	ppm	ASTM D5185m	0	<b>0</b>	0	0
Magnesium	ppm	ASTM D5185m	0	<b>0</b>	<1	<1
Calcium	ppm	ASTM D5185m	0	<b>0</b>	1	2
Phosphorus	ppm	ASTM D5185m	240	<b>428</b>	405	455
Zinc	ppm	ASTM D5185m	1	<b>14</b>	0	20
Sulfur	ppm	ASTM D5185m	13700	<b>6563</b>	6230	6381

## CONTAMINANTS

	method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185m	>50	<b>3</b>	3	7
Sodium	ppm	ASTM D5185m		<b>0</b>	<1	2
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	2	<1

## FLUID CLEANLINESS

	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>10000	<b>▲ 76644</b>	▲ 139560	▲ 62561
Particles >6µm	ASTM D7647	>2500	<b>▲ 8671</b>	▲ 34858	▲ 11144
Particles >14µm	ASTM D7647	>320	<b>● 391</b>	▲ 2030	● 588
Particles >21µm	ASTM D7647	>80	<b>84</b>	▲ 405	▲ 164
Particles >38µm	ASTM D7647	>20	<b>1</b>	3	9
Particles >71µm	ASTM D7647	>4	<b>0</b>	0	2
Oil Cleanliness	ISO 4406 (c)	>20/18/15	<b>▲ 23/20/16</b>	▲ 24/22/18	▲ 23/21/16

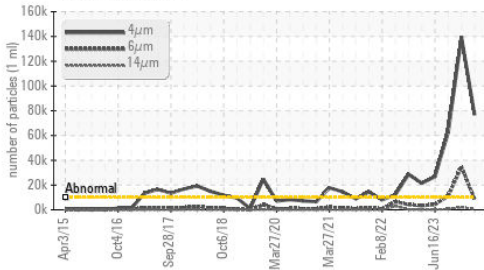
## FLUID DEGRADATION

	method	limit/base	current	history1	history2	
Acid Number (AN)	mg KOH/g	ASTM D8045	0.4	<b>1.05</b>	0.96	0.87

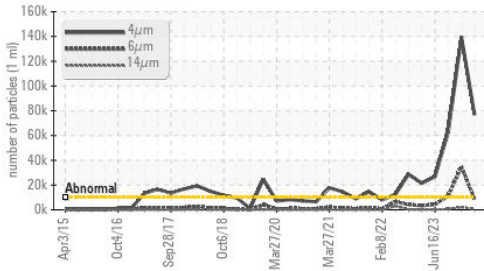


# OIL ANALYSIS REPORT

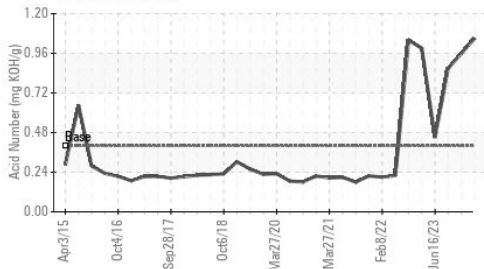
▲ Particle Trend



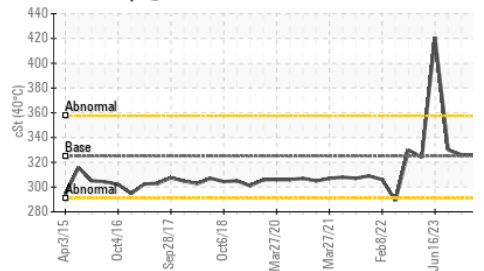
▲ Particle Trend



Acid Number



Viscosity @ 40°C

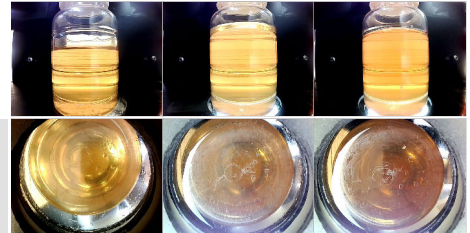


VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	LIGHT	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445 325	326	326	330

SAMPLE IMAGES	method	limit/base	current	history1	history2
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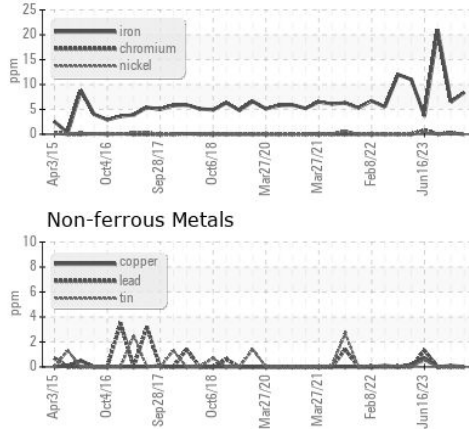
Color



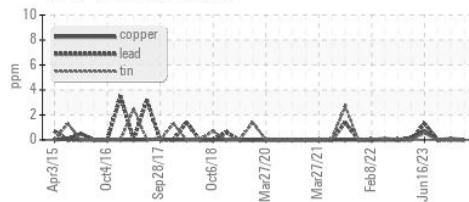
Bottom

## GRAPHS

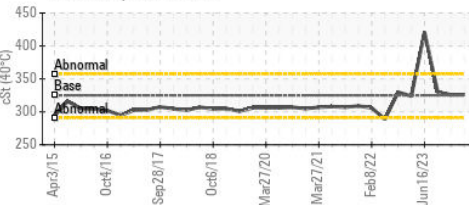
Ferrous Alloys



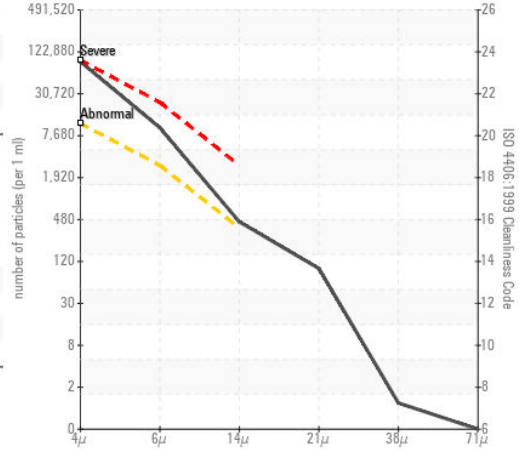
Non-ferrous Metals



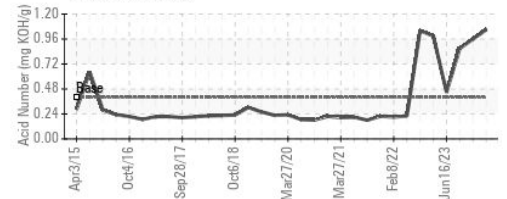
Viscosity @ 40°C



▲ Particle Count



Acid Number



Certificate L2367

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

Sample No. : WC0908038

Lab Number : 06130596

Unique Number : 10950061

Test Package : IND 2 ( Additional Tests: PrtCount )

Received : 27 Mar 2024

Tested : 28 Mar 2024

Diagnosed : 28 Mar 2024 - Wes Davis

HORMEL FOODS - AUSTIN

1101 NORTH MAIN ST

AUSTIN, MN

US 55912

Contact: RYAN LOWE

rslowe@hormel.com

T: (507)437-5674

F: (507)437-9805

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)