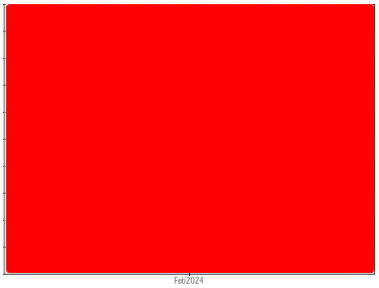
OIL DIAGNOSTICS

PROBLEM SUMMARY

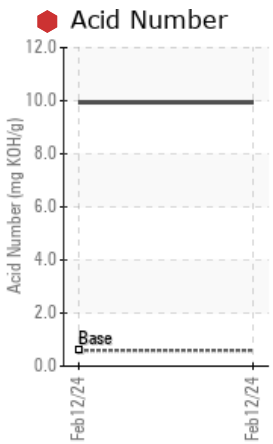
Sample Rating Trend

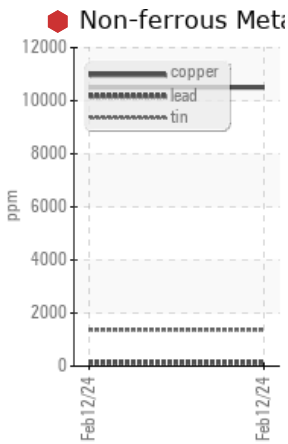


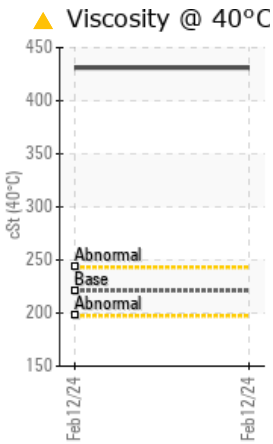
WEAR

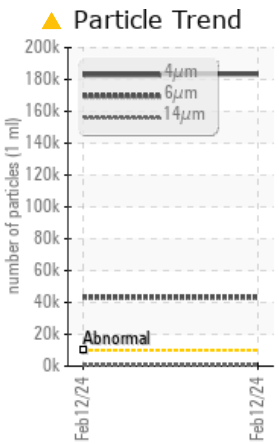
Area
PHASE 2 PH 2
Machine Id
HT 30
Component
Gearbox
Fluid
PETRO CANADA PURITY FG SYNTH EP GEAR 220 (--- GAL)

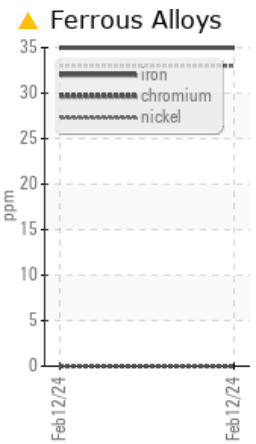
COMPONENT CONDITION SUMMARY











RECOMMENDATION

Recommend drain oil if not already done and flush before refilling with oil. We advise that you inspect for the source(s) of wear. We recommend an early resample to monitor this condition.

PROBLEMATIC TEST RESULTS

Sample Status				**SEVERE**	---	---
Nickel	ppm	ASTM D5185m	>15	▲ **33**	---	---
Lead	ppm	ASTM D5185m	>100	▲ **128**	---	---
Copper	ppm	ASTM D5185m	>200	⬢ **10501**	---	---
Tin	ppm	ASTM D5185m	>25	⬢ **1365**	---	---
Particles >4µm		ASTM D7647	>10000	▲ **183421**	---	---
Particles >6µm		ASTM D7647	>2500	▲ **43234**	---	---
Oil Cleanliness		ISO 4406 (c)	>20/18/16	▲ **25/23/16**	---	---
Acid Number (AN)	mg KOH/g	ASTM D8045	0.59	⬢ **9.941**	---	---
Visc @ 40°C	cSt	ASTM D445	221	▲ **431.1**	---	---

Customer Id: KRAMASIOW
Sample No.: PCA0111033
Lab Number: 06090131
Test Package: IND 2

To manage this report scan the QR code

To discuss the diagnosis or test data:
Doug Bogart +1 (800)237-1369 x4016
dougb@wearcheckusa.com

To change component or sample information:
Customer Service +1 1-800-237-1369
customerservice@wearcheck.com

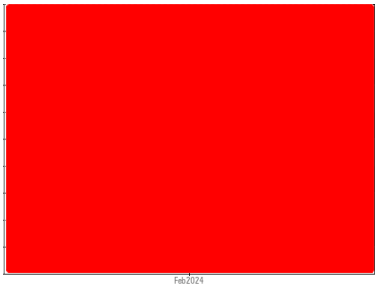
RECOMMENDED ACTIONS

Action	Status	Date	Done By	Description
Inspect Wear Source	---	---	?	We advise that you inspect for the source(s) of wear.
Change Fluid	---	---	?	Recommend drain oil if not already done and flush with cleaner before refilling with oil.
Flush System	---	---	?	Recommend drain oil if not already done and flush with cleaner before refilling with oil.
Resample	---	---	?	We recommend an early resample to monitor this condition.

HISTORICAL DIAGNOSIS

OIL ANALYSIS REPORT

Sample Rating Trend



WEAR

Area
PHASE 2 PH 2
Machine Id
HT 30
Component
Gearbox
Fluid
PETRO CANADA PURITY FG SYNTH EP GEAR 220 (--- GAL)

DIAGNOSIS

Recommendation
Recommend drain oil if not already done and flush before refilling with oil. We advise that you inspect for the source(s) of wear. We recommend an early resample to monitor this condition.

Wear
Bearing and/or gear wear is indicated.

Contamination
There is a high amount of silt (particulates < 14 microns in size) present in the oil.

Fluid Condition
The AN level is above the recommended limit. The oil viscosity is higher than normal. The oil is no longer serviceable.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number		Client Info		**PCA0111033**	---	---
Sample Date		Client Info		**12 Feb 2024**	---	---
Machine Age	hrs	Client Info		**0**	---	---
Oil Age	hrs	Client Info		**0**	---	---
Oil Changed		Client Info		**Not Changd**	---	---
Sample Status				**SEVERE**	---	---

CONTAMINATION		method	limit/base	current	history1	history2
Water		WC Method	>0.2	**NEG**	---	---

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>200	**35**	---	---
Chromium	ppm	ASTM D5185m	>15	**0**	---	---
Nickel	ppm	ASTM D5185m	>15	▲ **33**	---	---
Titanium	ppm	ASTM D5185m		**0**	---	---
Silver	ppm	ASTM D5185m		**<1**	---	---
Aluminum	ppm	ASTM D5185m	>25	**<1**	---	---
Lead	ppm	ASTM D5185m	>100	▲ **128**	---	---
Copper	ppm	ASTM D5185m	>200	● **10501**	---	---
Tin	ppm	ASTM D5185m	>25	● **1365**	---	---
Vanadium	ppm	ASTM D5185m		**0**	---	---
Cadmium	ppm	ASTM D5185m		**0**	---	---

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		**61**	---	---
Barium	ppm	ASTM D5185m		**0**	---	---
Molybdenum	ppm	ASTM D5185m		**4**	---	---
Manganese	ppm	ASTM D5185m		**<1**	---	---
Magnesium	ppm	ASTM D5185m		**0**	---	---
Calcium	ppm	ASTM D5185m		**7**	---	---
Phosphorus	ppm	ASTM D5185m		**443**	---	---
Zinc	ppm	ASTM D5185m		**23**	---	---
Sulfur	ppm	ASTM D5185m		**6073**	---	---

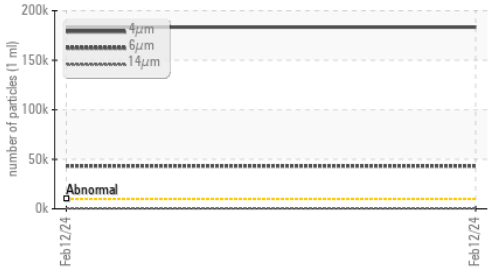
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>50	**1**	---	---
Sodium	ppm	ASTM D5185m		**0**	---	---
Potassium	ppm	ASTM D5185m	>20	**0**	---	---

FLUID CLEANLINESS		method	limit/base	current	history1	history2
Particles >4µm		ASTM D7647	>10000	▲ **183421**	---	---
Particles >6µm		ASTM D7647	>2500	▲ **43234**	---	---
Particles >14µm		ASTM D7647	>640	**521**	---	---
Particles >21µm		ASTM D7647	>160	**113**	---	---
Particles >38µm		ASTM D7647	>40	**2**	---	---
Particles >71µm		ASTM D7647	>10	**0**	---	---
Oil Cleanliness		ISO 4406 (c)	>20/18/16	▲ **25/23/16**	---	---

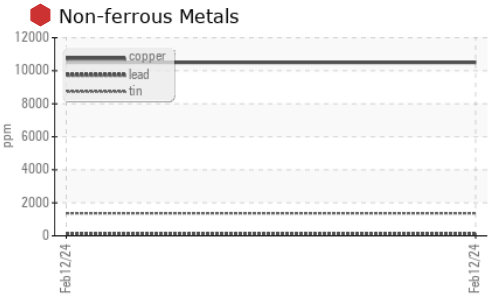
FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045	0.59	● **9.941**	---	---

OIL ANALYSIS REPORT

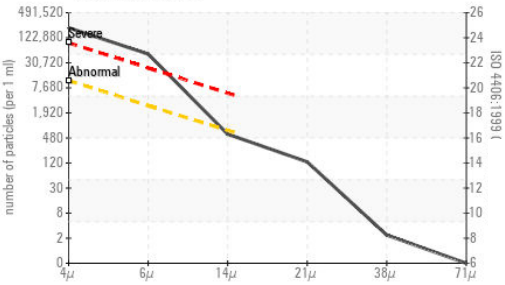
Particle Trend



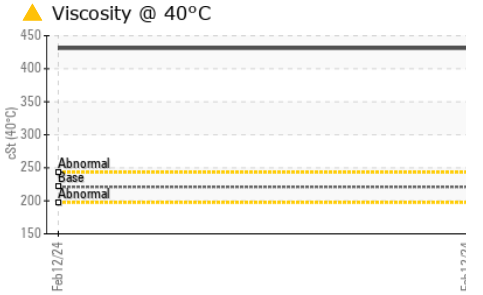
Non-ferrous Metals



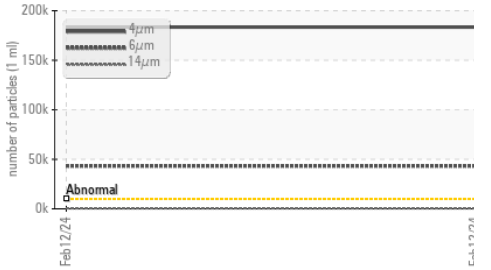
Particle Count



Viscosity @ 40°C



Particle Trend



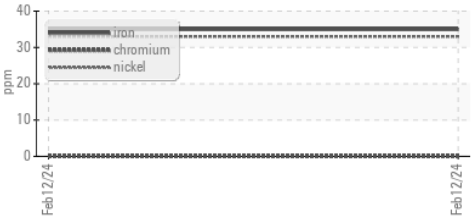
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	**NONE**	---	---
Yellow Metal	scalar	*Visual	NONE	**NONE**	---	---
Precipitate	scalar	*Visual	NONE	**NONE**	---	---
Silt	scalar	*Visual	NONE	**NONE**	---	---
Debris	scalar	*Visual	NONE	**NONE**	---	---
Sand/Dirt	scalar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

FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	221	▲ **431.1**	---	---

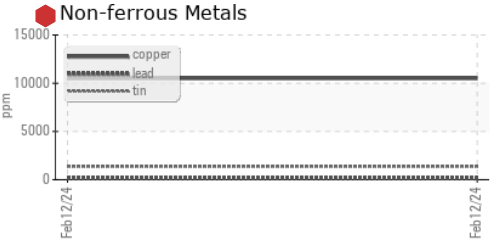
SAMPLE IMAGES	method	limit/base	current	history1	history2
Color				*no image*	*no image*
Bottom				*no image*	*no image*

GRAPHS

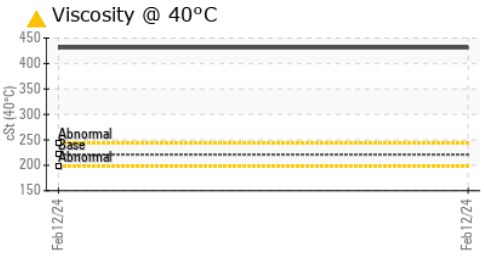
Ferrous Alloys



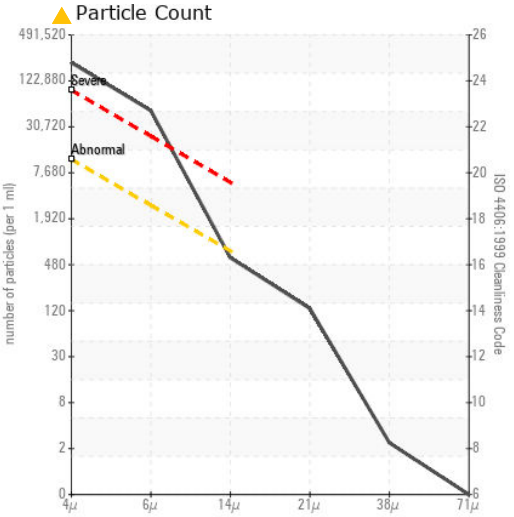
Non-ferrous Metals



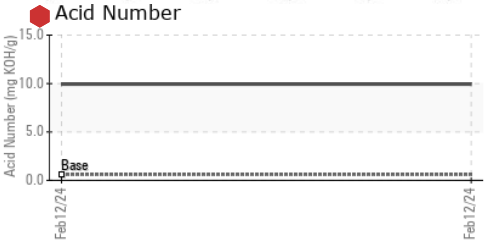
Viscosity @ 40°C



Particle Count



Acid Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PCA0111033
Lab Number : 06090131
Unique Number : 10882984
Test Package : IND 2 (Additional Tests: PrtCount)

Received : 15 Feb 2024
Tested : 19 Feb 2024
Diagnosed : 19 Feb 2024 - Doug Bogart

KraftHeinz - Mason City - Plant 8360
1022 12TH ST
MASON CITY, IA
US 50401
Contact: Service Manager
T:
F: (641)421-2936

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)