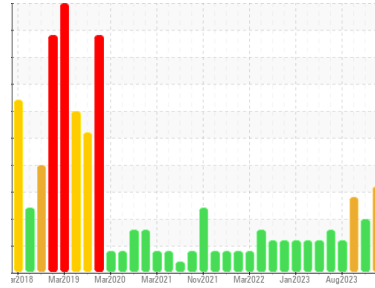




PROBLEM SUMMARY

Sample Rating Trend

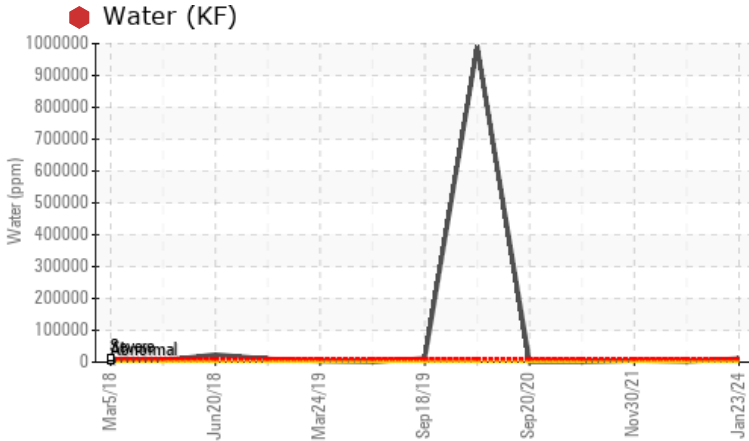


WATER



Machine Id
GROEN PROCESS EQUIP B46485 - KETTLE 1
 Component
Gearbox
 Fluid
PETRO CANADA ENDURATEX SYNTHETIC EP 220 (3 GAL)

COMPONENT CONDITION SUMMARY



RECOMMENDATION

We advise that you check for the source of water entry. We recommend an early resample to monitor this condition.

PROBLEMATIC TEST RESULTS

Sample Status				SEVERE	ABNORMAL	ABNORMAL
Water	%	ASTM D6304	>0.2	🔴 1.13	---	🟡 0.218
ppm Water	ppm	ASTM D6304	>2000	🔴 11330	---	🟡 2180
Emulsified Water	scalar	*Visual	>0.2	🔴 0.2%	NEG	0.2%

Customer Id: ROCROCUS
 Sample No.: WC0885432
 Lab Number: 06075753
 Test Package: IND 2



To manage this report scan the QR code

To discuss the diagnosis or test data:
 Jonathan Hester +1 919-379-4092 x4092
jhester@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
Resample	---	---	?	We recommend an early resample to monitor this condition.
Check Water Access	---	---	?	We advise that you check for the source of water entry.

HISTORICAL DIAGNOSIS

03 Dec 2023 Diag: Angela Borella

ISO



We recommend you service the filters on this component. Resample at the next service interval to monitor. All component wear rates are normal. There is a high amount of particulates present in the oil. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

[view report](#)



04 Oct 2023 Diag: Angela Borella

WATER



We advise that you check for the source of water entry. We advise that you follow the water drain-off procedure for this component. Inspect/change air breather if applicable. We recommend an early resample to monitor this condition. All component wear rates are normal. There is a high amount of silt (particulates < 14 microns in size) present in the oil. There is a light concentration of water present in the oil. The AN level is acceptable for this fluid.

[view report](#)



07 Aug 2023 Diag: Don Baldrige

ISO



We recommend you service the filters on this component if applicable. Resample at the next service interval to monitor. All component wear rates are normal. There is a high amount of silt (particulates < 14 microns in size) present in the oil. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

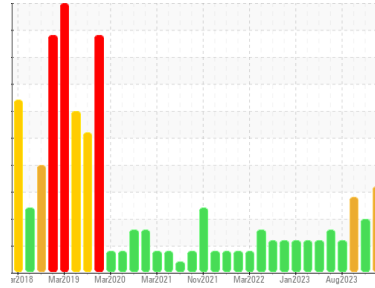
[view report](#)





OIL ANALYSIS REPORT

Sample Rating Trend



WATER



Machine Id
GROEN PROCESS EQUIP B46485 - KETTLE 1

Component
Gearbox
Fluid
PETRO CANADA ENDURATEX SYNTHETIC EP 220 (3 GAL)

DIAGNOSIS

Recommendation

We advise that you check for the source of water entry. We recommend an early resample to monitor this condition.

Wear

All component wear rates are normal.

Contamination

There is a high concentration of water present in the oil. The amount and size of particulates present in the system are acceptable.

Fluid Condition

The AN level is acceptable for this fluid.

SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		WC0885432	WC0872453	WC0850291
Sample Date	Client Info		23 Jan 2024	03 Dec 2023	04 Oct 2023
Machine Age	hrs	Client Info	0	0	0
Oil Age	hrs	Client Info	0	0	0
Oil Changed	Client Info		N/A	N/A	N/A
Sample Status			SEVERE	ABNORMAL	ABNORMAL

WEAR METALS

	method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185m	>200	33	31	31
Chromium	ppm	ASTM D5185m	>10	<1	<1	0
Nickel	ppm	ASTM D5185m	>10	0	0	0
Titanium	ppm	ASTM D5185m		<1	<1	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>25	0	1	0
Lead	ppm	ASTM D5185m	>50	0	0	0
Copper	ppm	ASTM D5185m	>200	0	<1	0
Tin	ppm	ASTM D5185m	>10	<1	0	0
Vanadium	ppm	ASTM D5185m		<1	0	0
Cadmium	ppm	ASTM D5185m		0	0	0

ADDITIVES

	method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185m	33	0	0	0
Barium	ppm	ASTM D5185m	5	0	0	0
Molybdenum	ppm	ASTM D5185m		0	<1	0
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m	5	<1	<1	<1
Calcium	ppm	ASTM D5185m	5	1	3	2
Phosphorus	ppm	ASTM D5185m	437	157	135	145
Zinc	ppm	ASTM D5185m	5	0	0	0
Sulfur	ppm	ASTM D5185m	5000	1012	1065	969

CONTAMINANTS

	method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185m	>50	4	4	4
Sodium	ppm	ASTM D5185m		13	14	16
Potassium	ppm	ASTM D5185m	>20	<1	1	0
Water	%	ASTM D6304	>0.2	1.13	---	▲ 0.218
ppm Water	ppm	ASTM D6304	>2000	11330	---	▲ 2180

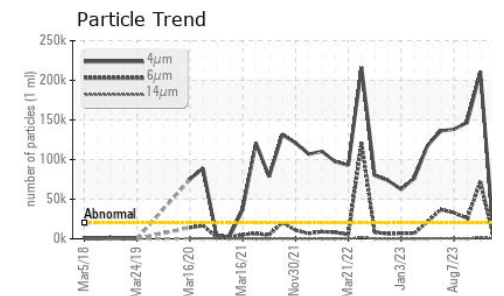
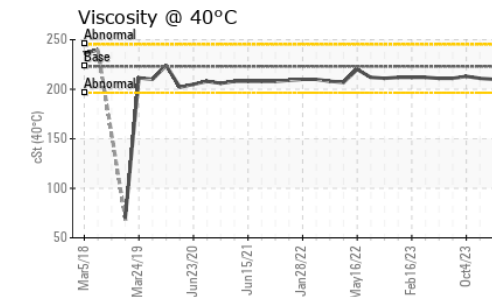
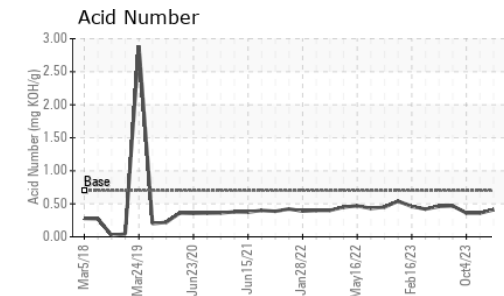
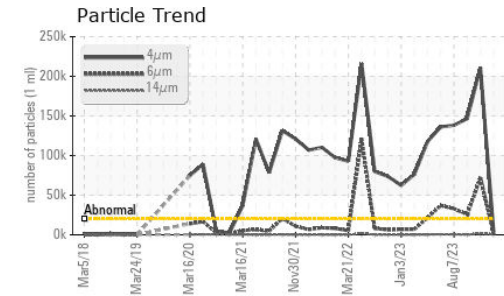
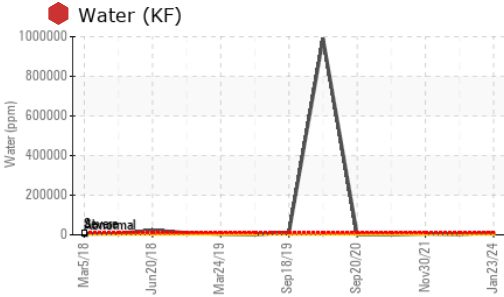
FLUID CLEANLINESS

	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>20000	4411	▲ 210699	▲ 146699
Particles >6µm	ASTM D7647	>5000	2403	▲ 71704	▲ 25505
Particles >14µm	ASTM D7647	>640	409	▲ 1636	127
Particles >21µm	ASTM D7647	>160	138	▲ 236	12
Particles >38µm	ASTM D7647	>40	21	7	3
Particles >71µm	ASTM D7647	>10	2	1	3
Oil Cleanliness	ISO 4406 (c)	>21/19/16	19/18/16	▲ 25/23/18	▲ 24/22/14

FLUID DEGRADATION

	method	limit/base	current	history1	history2	
Acid Number (AN)	mg KOH/g	ASTM D8045	0.7	0.41	0.36	0.36

OIL ANALYSIS REPORT



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0885432
Lab Number : 06075753
Unique Number : 10857844
Test Package : IND 2 (Additional Tests: KF, PrtCount)

Rochelle Foods - PRE
 1001 South Main, P.O. Box 45
 Rochelle, IL
 US 61068
 Contact: JAMES ROBINSON III
 jrobinson3@hormel.com

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.

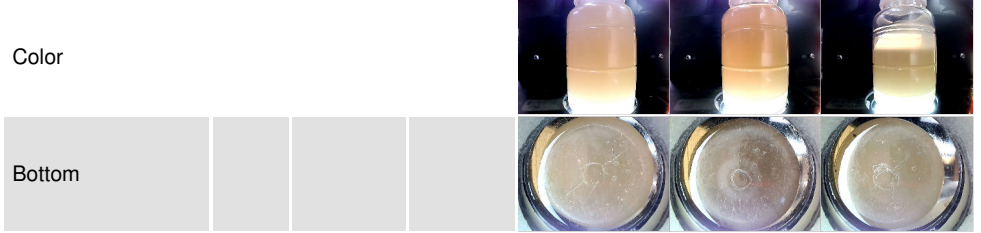
Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)

T:
 F: (815)562-4147

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	0.2%
Free Water	scalar	*Visual	NEG	NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445 223	210	211	213

SAMPLE IMAGES	method	limit/base	current	history1	history2
---------------	--------	------------	---------	----------	----------



GRAPHS

