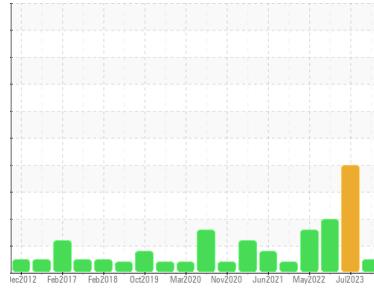


Machine Id
IMM #1 (S/N 14015)

Component
Hydraulic System

Fluid
PETRO CANADA HYDREX AW 46 (1000 LTR)



DIAGNOSIS

Recommendation
Resample at the next service interval to monitor.

Wear
All component wear rates are normal.

Contamination
The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.

Fluid Condition
The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	PC0076981	PC0076951	PC0062452
Sample Date	Client Info	15 Jan 2024	11 Jul 2023	21 Sep 2022
Machine Age	mths	Client Info	0	0
Oil Age	mths	Client Info	0	6
Oil Changed	Client Info	N/A	N/A	N/A
Sample Status		NORMAL	SEVERE	SEVERE

CONTAMINATION

method	limit/base	current	history1	history2
Water	WC Method >0.05	NEG	NEG	NEG

WEAR METALS

method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185(m) >20	0	1	2
Chromium	ppm	ASTM D5185(m) >20	0	0	0
Nickel	ppm	ASTM D5185(m) >20	0	<1	0
Titanium	ppm	ASTM D5185(m)	0	0	0
Silver	ppm	ASTM D5185(m)	0	0	0
Aluminum	ppm	ASTM D5185(m) >20	<1	0	<1
Lead	ppm	ASTM D5185(m) >20	0	0	<1
Copper	ppm	ASTM D5185(m) >20	<1	<1	2
Tin	ppm	ASTM D5185(m) >20	0	0	0
Antimony	ppm	ASTM D5185(m)	0	0	0
Vanadium	ppm	ASTM D5185(m)	0	0	0
Beryllium	ppm	ASTM D5185(m)	0	0	0
Cadmium	ppm	ASTM D5185(m)	0	0	0

ADDITIVES

method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185(m) 0	0	0	<1
Barium	ppm	ASTM D5185(m) 0	0	0	0
Molybdenum	ppm	ASTM D5185(m) 0	0	0	0
Manganese	ppm	ASTM D5185(m) 0	0	0	0
Magnesium	ppm	ASTM D5185(m) 0	<1	<1	0
Calcium	ppm	ASTM D5185(m) 50	57	35	15
Phosphorus	ppm	ASTM D5185(m) 330	335	424	321
Zinc	ppm	ASTM D5185(m) 430	411	329	259
Sulfur	ppm	ASTM D5185(m) 760	785	874	643
Lithium	ppm	ASTM D5185(m)	<1	<1	<1

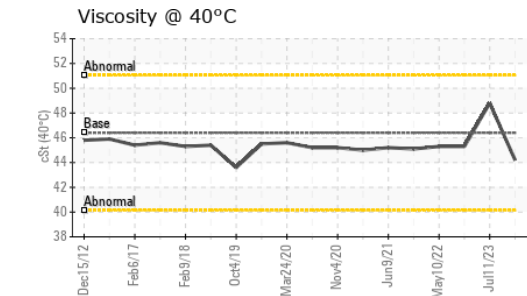
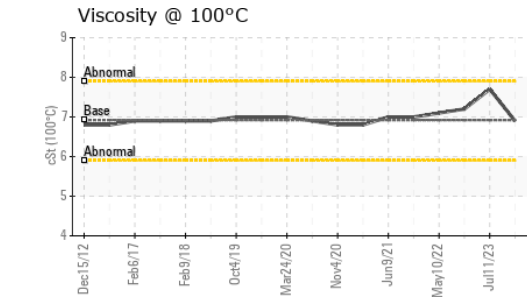
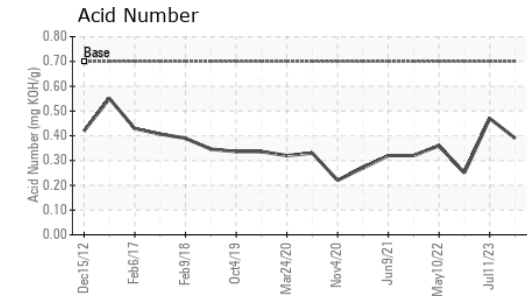
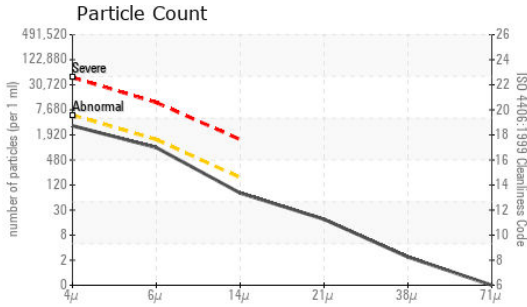
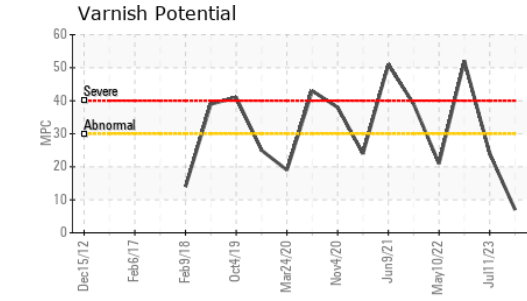
CONTAMINANTS

method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185(m) >15	0	0	<1
Sodium	ppm	ASTM D5185(m)	0	0	<1
Potassium	ppm	ASTM D5185(m) >20	<1	<1	0

FLUID CLEANLINESS

method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647 >5000	2785	64008	9767
Particles >6µm	ASTM D7647 >1300	834	15388	2813
Particles >14µm	ASTM D7647 >160	68	134	107
Particles >21µm	ASTM D7647 >40	16	12	29
Particles >38µm	ASTM D7647 >10	2	0	2
Particles >71µm	ASTM D7647 >3	0	0	0
Oil Cleanliness	ISO 4406 (c) >19/17/14	19/17/13	23/21/14	20/19/14

OIL ANALYSIS REPORT

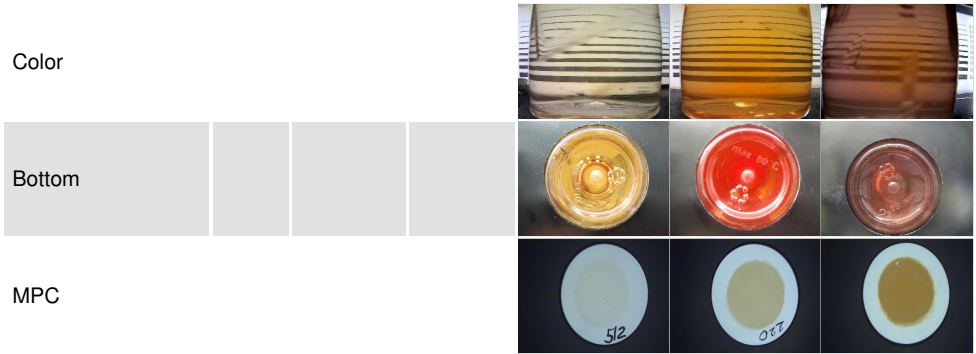


FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D974*	0.70	0.39	0.47	0.25
MPC Varnish Potential	Scale	ASTM D7843(m)*	>15	7	▲ 24	● 52

VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	Visual*	NONE	NONE	NONE	NONE
Yellow Metal	scalar	Visual*	NONE	NONE	NONE	NONE
Precipitate	scalar	Visual*	NONE	NONE	NONE	NONE
Silt	scalar	Visual*	NONE	NONE	NONE	NONE
Debris	scalar	Visual*	NONE	NONE	VLITE	NONE
Sand/Dirt	scalar	Visual*	NONE	NONE	NONE	NONE
Appearance	scalar	Visual*	NORML	NORML	NORML	NORML
Odor	scalar	Visual*	NORML	NORML	NORML	NORML
Emulsified Water	scalar	Visual*	>0.05	NEG	NEG	NEG
Free Water	scalar	Visual*		NEG	NEG	NEG

FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D7279(m)	46.4	44.2	48.8	45.3
Visc @ 100°C	cSt	ASTM D7279(m)	6.92	6.9	7.7	7.2
Viscosity Index (VI)	Scale	ASTM D2270*	104	112	124	119

SAMPLE IMAGES

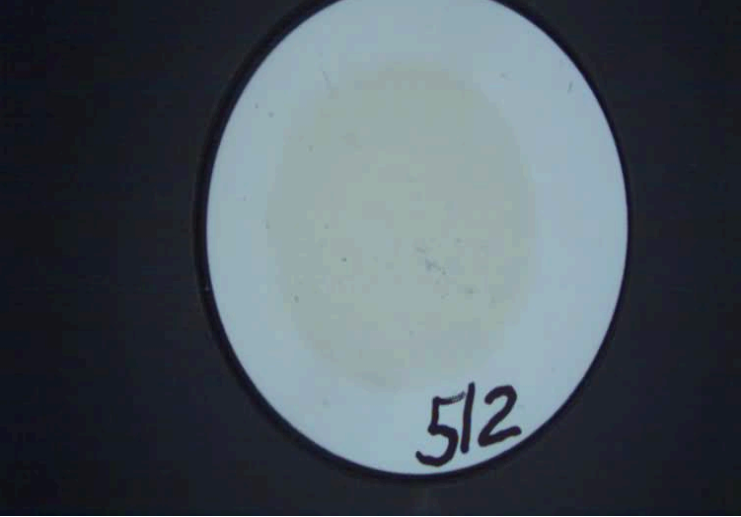


Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9
Sample No. : PC0076981 **Received** : 26 Jan 2024
Lab Number : **02611512** **Diagnosed** : 29 Jan 2024
Unique Number : 5720607 **Diagnostician** : Wes Davis
Test Package : IND 2 (Additional Tests: KV100, MPC, VI)

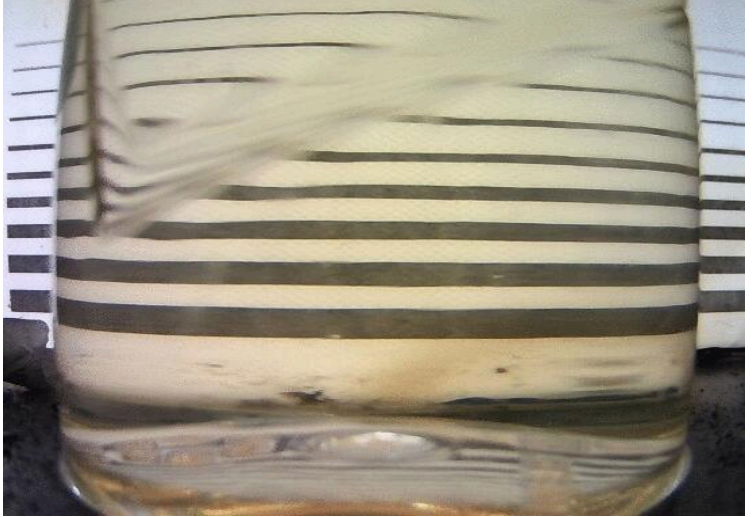
ROPAK PACKAGING CANADA
 2240 WYECROFT RD
 OAKVILLE, ON
 CA L6L 6M1
 Contact: Frank Maio
 Frank.Maio@mauserpackaging.com
 T: (905)465-9019
 F:

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.

MPC (Varnish Test)



Sample Color & Clarity



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