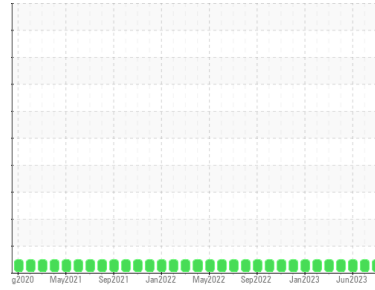




OIL ANALYSIS REPORT

Sample Rating Trend



NORMAL



Area
Kenova
 Machine Id
[Kenova] Oil - Port Reduction Gear
 Component
Port Reduction Gear
 Fluid
Reduction Gear Oil (35 GAL)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor. (Customer Sample Comment: ADAM FIELDS)

Wear

All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil.

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		WC0719052	WC0735539	WC0735178
Sample Date	Client Info		30 Aug 2023	30 Jul 2023	06 Jun 2023
Machine Age	hrs	Client Info	36527	35936	34985
Oil Age	hrs	Client Info	10709	10118	9168
Oil Changed	Client Info		N/A	Not Changd	Not Changd
Sample Status			NORMAL	NORMAL	NORMAL

WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >150	26	16	18
Chromium	ppm	ASTM D5185m >10	<1	<1	0
Nickel	ppm	ASTM D5185m >10	<1	<1	0
Titanium	ppm	ASTM D5185m	<1	<1	0
Silver	ppm	ASTM D5185m	1	<1	0
Aluminum	ppm	ASTM D5185m >25	6	2	2
Lead	ppm	ASTM D5185m >100	<1	<1	<1
Copper	ppm	ASTM D5185m >50	3	2	2
Tin	ppm	ASTM D5185m >10	<1	<1	<1
Vanadium	ppm	ASTM D5185m	0	0	0
Cadmium	ppm	ASTM D5185m	<1	0	0

ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	20	14	14
Barium	ppm	ASTM D5185m	2	0	0
Molybdenum	ppm	ASTM D5185m	28	25	23
Manganese	ppm	ASTM D5185m	<1	<1	<1
Magnesium	ppm	ASTM D5185m	273	212	216
Calcium	ppm	ASTM D5185m	4387	3636	3413
Phosphorus	ppm	ASTM D5185m	1129	933	876
Zinc	ppm	ASTM D5185m	1302	1058	1015
Sulfur	ppm	ASTM D5185m	11734	9280	9937

CONTAMINANTS

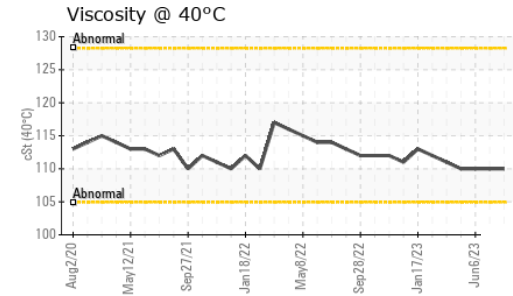
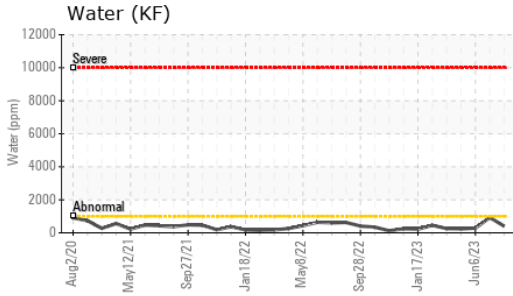
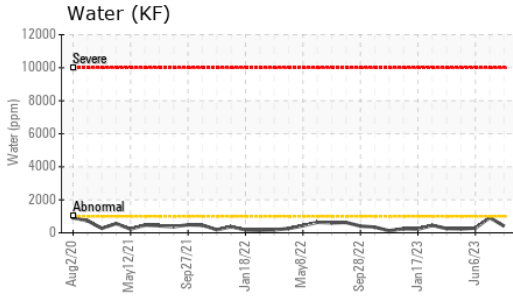
	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >50	6	4	4
Sodium	ppm	ASTM D5185m	2	0	3
Potassium	ppm	ASTM D5185m >20	2	<1	0
Water	%	ASTM D6304 >0.1	0.040	0.092	0.028
ppm Water	ppm	ASTM D6304 >1000	409.8	924.4	281.7

FLUID DEGRADATION

	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045	1.05	0.790	0.897



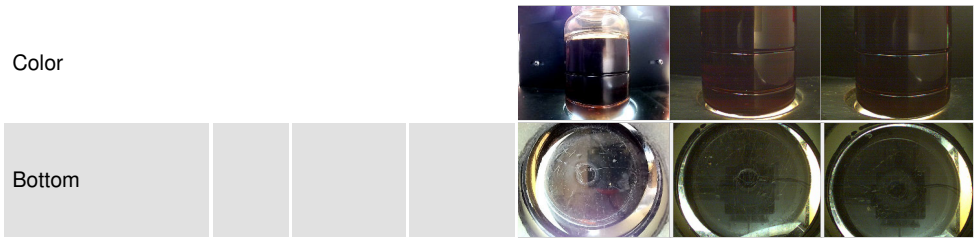
OIL ANALYSIS REPORT



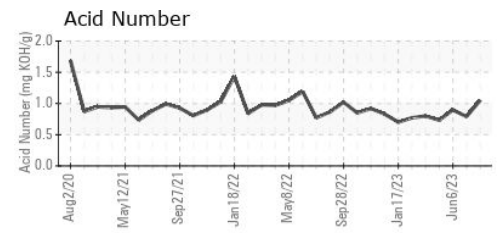
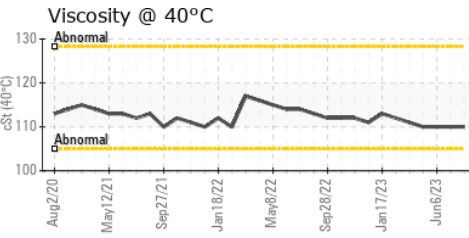
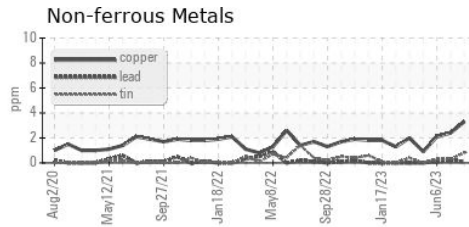
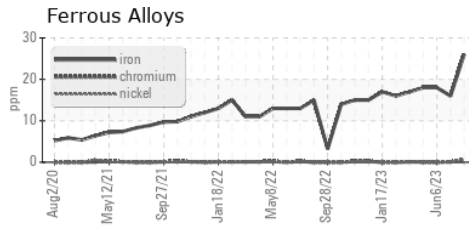
VISUAL	method	limit/base	current	history1	history2	
White Metal	scalar	*Visual	NONE	LIGHT	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	LIGHT
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	110	110	110

SAMPLE IMAGES	method	limit/base	current	history1	history2
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GRAPHS



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0719052 **Received** : 25 Sep 2023
Lab Number : 05960714 **Diagnosed** : 27 Sep 2023
Unique Number : 10661927 **Diagnostician** : Don Baldrige
Test Package : IND 2 (Additional Tests: KF)

MARATHON PETROLEUM CO.
 101 12TH ST
 CATLETTSBURG, KY
 US 41169
 Contact: CORY GUMBERT
 cagumbert@marathonpetroleum.com
 T: (606)585-3950
 F: x:

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)