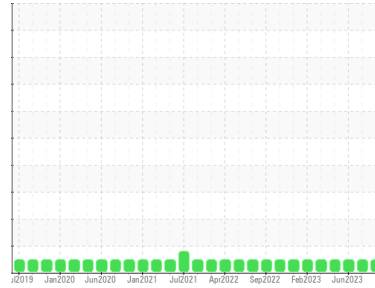




COOLANT REPORT

Sample Rating Trend

NORMAL



Area
Kentucky
 Machine Id
[Kentucky] Coolant - Port Main Engine (Jacket)
 Component
Coolant
 Fluid
CATERPILLAR ELC (--- GAL)

DIAGNOSIS

Recommendation

The fluid is suitable for further service.

Corrosion

All metal levels are normal indicating no corrosion in the cooling system.

Contaminants

There is no indication of any contamination in the coolant.

Coolant Condition

Glycol and nitrite levels are acceptable. The pH level of this fluid is within the acceptable limits.

SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		WC0769172	WC0769206	WC0769523
Sample Date	Client Info		25 Aug 2023	06 Jul 2023	09 Jun 2023
Machine Age	hrs	Client Info	9756	8984	8469
Oil Age	hrs	Client Info	0	8984	0
Oil Changed	Client Info		N/A	N/A	Not Changd
Sample Status			NORMAL	NORMAL	NORMAL

PHYSICAL TEST RESULTS

	method	limit/base	current	history1	history2
Specific Gravity	*ASTM D1298		1.066	1.065	1.065
pH	Scale 0-14 ASTM D1287		7.84	7.65	7.61
Nitrites	ppm AP-053:2009		412	224	488
Reserve Alkalinity	Scale 0-20 *ASTM D1121		---	---	---
Percentage Glycol	% ASTM D3321		49.0	48.0	48.0
Freezing Point	°F ASTM D3321		-33	-31	-31
Total Dissolved Solids			348.0	339.5	337.0
Carboxylate			fail	pass	fail

CORROSION INHIBITORS

	method	limit/base	current	history1	history2
Silicon	ppm ASTM D6130	0	30	35	29
Phosphorus	ppm ASTM D6130	0	0	0	0
Boron	ppm ASTM D6130	0	21	28	7
Molybdenum	ppm ASTM D6130	950	910	952	1188

CORROSION

	method	limit/base	current	history1	history2
Iron	ppm ASTM D6130	>15	10	1	<1
Aluminum	ppm ASTM D6130	>10	1	<1	0
Copper	ppm ASTM D6130	>10	3	2	<1
Lead	ppm ASTM D6130	>10	<1	<1	0
Tin	ppm ASTM D6130	>10	<1	1	0
Zinc	ppm ASTM D6130		1	<1	0

CONTAMINANTS

	method	limit/base	current	history1	history2
Chlorine	ppm ASTM D6130		27	28	0

CARRIER SALTS

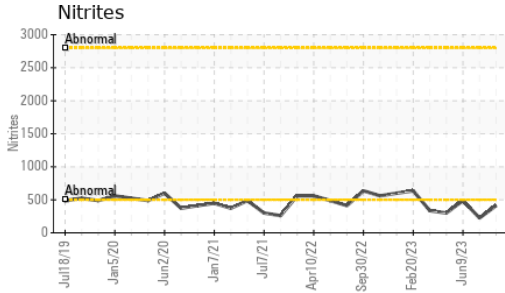
	method	limit/base	current	history1	history2
Sodium	ppm ASTM D6130		5256	6001	5723
Potassium	ppm ASTM D6130		5	106	0


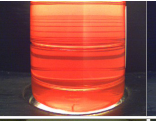

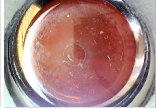


SCALE POTENTIAL

	method	limit/base	current	history1	history2
Calcium	ppm ASTM D6130		14	10	11
Magnesium	ppm ASTM D6130		5	6	6

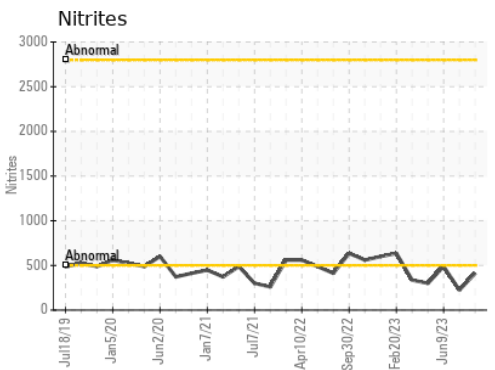
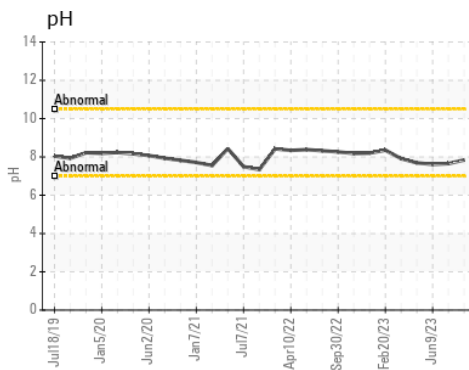
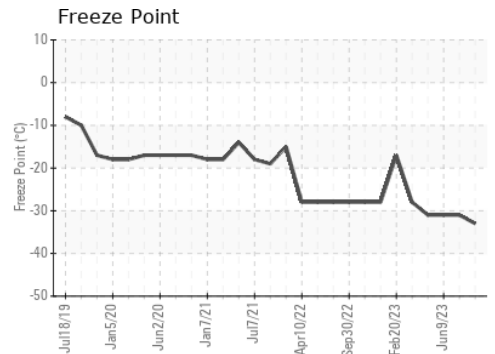
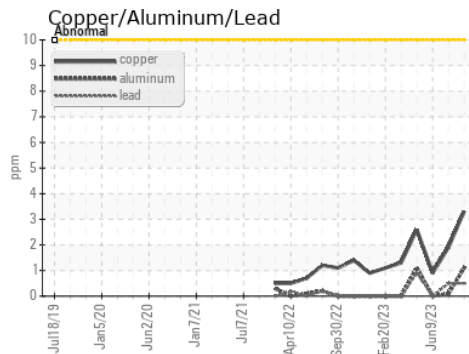
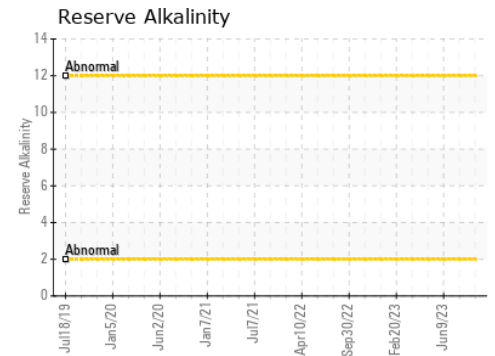
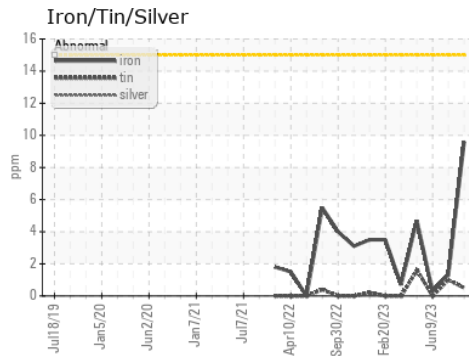


COOLANT REPORT



VISUAL	method	limit/base	current	history1	history2
Coolant Color	*Visual		LtRed	Red	LtRed
Coolant Appearance	*Visual	Clear	hazy	normal	normal
Color					
Bottom					

GRAPHS



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : WC0769172 **Received** : 30 Aug 2023
Lab Number : 05938490 **Diagnosed** : 04 Sep 2023
Unique Number : 10629102 **Diagnostician** : Doug Bogart
Test Package : COOL- (Additional Tests: COOL, ICP)

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)