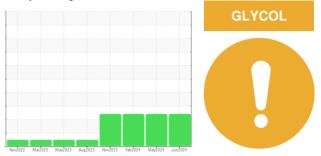


OIL ANALYSIS REPORT

Sample Rating Trend



Machine Id **2312** Component **Diesel Engine** Fluid **CHEVRON 15W40 (--- GAL)**

DIAGNOSIS

Recommendation

No corrective action is recommended at this time. Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

Sodium and/or potassium levels remain high. Test for glycol is negative.

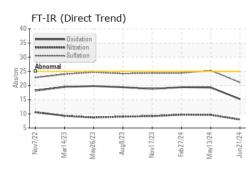
Fluid Condition

The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

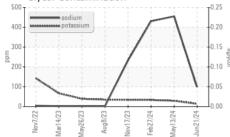
Sample Number Client Info WC0944465 WC0859273 WC085 Sample Date Client Info 21 Jun 2024 13 May 2024 27 Feb Machine Age mls Client Info 138084 128649 108958 Oil Age mls Client Info 0 0 0	
Sample Date Client Info 21 Jun 2024 13 May 2024 27 Feb Machine Age mls Client Info 138084 128649 108958	59291
Machine Age mls Client Info 138084 128649 108958	2024
	3
Oil Changed Client Info Not Change Changed Change	ed
Sample Status ATTENTION ABNORMAL ABNOF	RMAL
CONTAMINATION method limit/base current history1 his	story2
Fuel WC Method >3.0 <1.0	
Water WC Method >0.2 NEG NEG	ż
WEAR METALS method limit/base current history1 his	story2
Iron ppm ASTM D5185m >90 10 23 25	
Chromium ppm ASTM D5185m >20 <1	
Nickel ppm ASTM D5185m >2 0 <1	
Titanium ppm ASTM D5185m >2 7 0 <1	
Silver ppm ASTM D5185m >2 0 0 0	
Aluminum ppm ASTM D5185m >20 6 11 12	
Lead ppm ASTM D5185m >40 <1 2 2	
Copper ppm ASTM D5185m >330 <1 <1 <1	
Tin ppm ASTM D5185m >15 0 0 0	
Vanadium ppm ASTM D5185m 0 <1	
Cadmium ppm ASTM D5185m 0 0 0	
ADDITIVES method limit/base current history1 his	tory2
Boron ppm ASTM D5185m 187 224 203	
Barium ppm ASTM D5185m 0 0 0	
Molybdenum ppm ASTM D5185m 86 202 185	
Manganese ppm ASTM D5185m <1	
Manganese ppm ASTM D5185m <1	
	2
Magnesium ppm ASTM D5185m 688 705 715	2
Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632	2
Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777	
Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 1017 913 882 Sulfur ppm ASTM D5185m 3679 3286 2842	
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Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 1017 913 882 Sulfur ppm ASTM D5185m 3679 3286 2842 CONTAMINANTS method limit/base current history1 hist Silicon ppm ASTM D5185m<>25 8 12 8 Sodium ppm ASTM D5185m<>50 99 4 455 4 431	2 story2
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Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 1017 913 882 Sulfur ppm ASTM D5185m 3679 3286 2842 CONTAMINANTS method limit/base current history1 hist Silicon ppm ASTM D5185m >25 8 12 8 Sodium ppm ASTM D5185m >20 14 29 33 Glycol % *ASTM D2982 NEG NEG NEG INFRA-RED method limit/base current history1 history1	2 story2
Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 1017 913 882 Sulfur ppm ASTM D5185m 3679 3286 2842 CONTAMINANTS method limit/base current history1 hist Silicon ppm ASTM D5185m >25 8 12 8 Sodium ppm ASTM D5185m >20 14 29 33 Glycol % *ASTM D2982 NEG NEG NEG NEG	2 story2 à
Magnesium ppm ASTM D5185m 688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 1017 913 882 Sulfur ppm ASTM D5185m 3679 3286 2842 CONTAMINANTS method limit/base current history1 hist Silicon ppm ASTM D5185m >25 8 12 8 Sodium ppm ASTM D5185m >50 99 ▲ 455 ▲ 431 Potassium ppm ASTM D5185m >20 14 29 ▲ 33 Glycol % *ASTM D7844 >6 0.2 0.3 0.3 Nitration Abs/cm *ASTM D745 >30 21.1 25.3 24.4	2 story2 à
Magnesium ppm ASTM D5185m 6688 705 715 Calcium ppm ASTM D5185m 1550 1659 1632 Phosphorus ppm ASTM D5185m 840 782 777 Zinc ppm ASTM D5185m 1017 913 882 Sulfur ppm ASTM D5185m 3679 3286 2842 CONTAMINANTS method limit/base current history1 hist Silicon ppm ASTM D5185m >25 8 12 8 Sodium ppm ASTM D5185m >20 14 29 33 Glycol % *ASTM D2982 NEG NEG NEG INFRA-RED method limit/base current history1 hist Soot % % *ASTM D7844 >6 0.2 0.3 0.3 Nitration Abs/cm *ASTM D7415 >30 21.1 25.3 24.4	2 story2 story2 story2

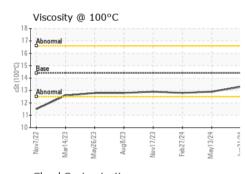


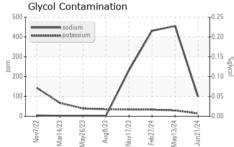
OIL ANALYSIS REPORT





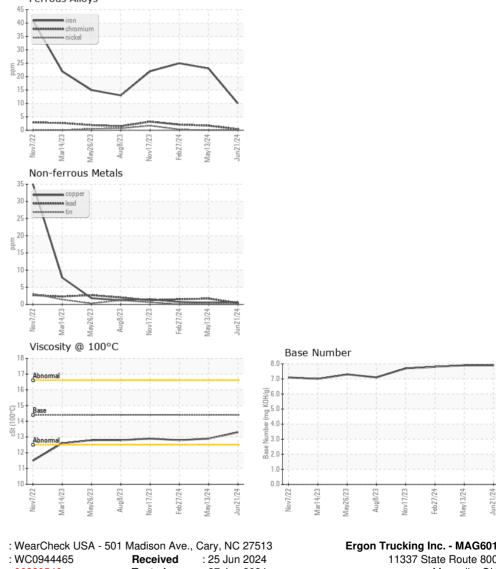






VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
FLUID PROPERT	IES	method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	14.4	13.3	12.9	12.8

GRAPHS Ferrous Alloys



Laboratory Ergon Trucking Inc. - MAG601 Sample No. 11337 State Route 800 Lab Number : 06220546 Tested : 27 Jun 2024 Magnolia, OH US 44643 Unique Number : 11098743 Diagnosed : 27 Jun 2024 - Jonathan Hester Test Package : FLEET (Additional Tests: Glycol) Contact: Eddy Smith Certificate 12367 To discuss this sample report, contact Customer Service at 1-800-237-1369. eddy.smith@ergon.com * - Denotes test methods that are outside of the ISO 17025 scope of accreditation. T: F:

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

Report Id: ERGMAG601 [WUSCAR] 06220546 (Generated: 06/27/2024 16:32:49) Rev: 1

Submitted By: Eddy Smith

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