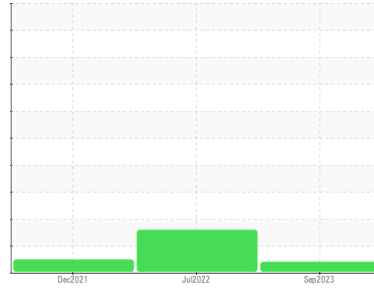




OIL ANALYSIS REPORT

Sample Rating Trend



VISCOSITY



Area

MAIN PLANT

Machine Id

GEA S6

Component

Refrigeration Compressor

Fluid

CHEVRON CAPELLA OIL WF 68 (80 GAL)

DIAGNOSIS

Recommendation

We recommend that you drain the oil from the component if this has not already been done. Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil. The amount and size of particulates present in the system are acceptable.

Fluid Condition

The oil viscosity is higher than normal. Confirmed. The AN level is acceptable for this fluid.

SAMPLE INFORMATION

method	limit/base	current	history1	history2	
Sample Number	Client Info	USP0006520	USP221321	USP221319	
Sample Date	Client Info	28 Sep 2023	01 Jul 2022	07 Dec 2021	
Machine Age	hrs	Client Info	19310	0	0
Oil Age	hrs	Client Info	0	0	0
Oil Changed	Client Info	N/A	N/A	N/A	
Sample Status		ABNORMAL	ABNORMAL	NORMAL	

WEAR METALS

method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185m >8	17	18	12
Chromium	ppm	ASTM D5185m >2	0	0	0
Nickel	ppm	ASTM D5185m	0	0	0
Titanium	ppm	ASTM D5185m	0	0	0
Silver	ppm	ASTM D5185m >2	0	<1	0
Aluminum	ppm	ASTM D5185m >3	0	0	<1
Lead	ppm	ASTM D5185m >2	0	0	0
Copper	ppm	ASTM D5185m >8	0	0	0
Tin	ppm	ASTM D5185m >4	0	0	0
Antimony	ppm	ASTM D5185m	---	---	0
Vanadium	ppm	ASTM D5185m	0	0	0
Cadmium	ppm	ASTM D5185m	0	0	0

ADDITIVES

method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185m	0	<1	0
Barium	ppm	ASTM D5185m	0	0	0
Molybdenum	ppm	ASTM D5185m	0	0	0
Manganese	ppm	ASTM D5185m	0	0	0
Magnesium	ppm	ASTM D5185m 0	0	0	0
Calcium	ppm	ASTM D5185m	0	0	0
Phosphorus	ppm	ASTM D5185m	0	<1	0
Zinc	ppm	ASTM D5185m	1	4	1
Sulfur	ppm	ASTM D5185m	172	186	146

CONTAMINANTS

method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185m >15	<1	<1	<1
Sodium	ppm	ASTM D5185m	1	0	0
Potassium	ppm	ASTM D5185m >20	1	0	0
Water	%	ASTM D6304 >0.01	0.002	0.001	0.001
ppm Water	ppm	ASTM D6304 >100	16	7.6	3.4

FLUID CLEANLINESS

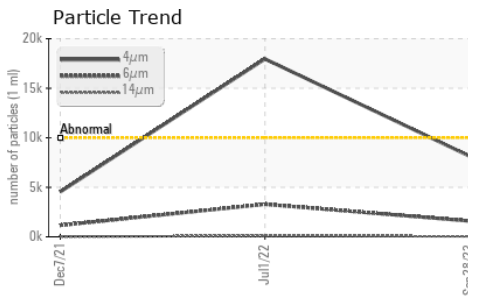
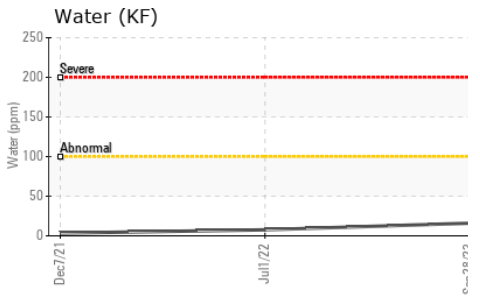
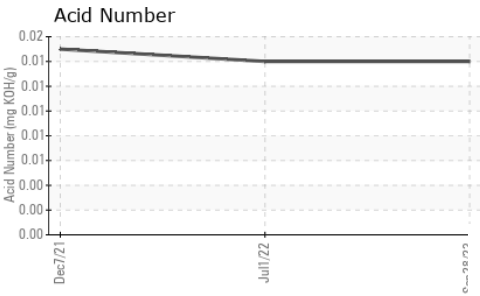
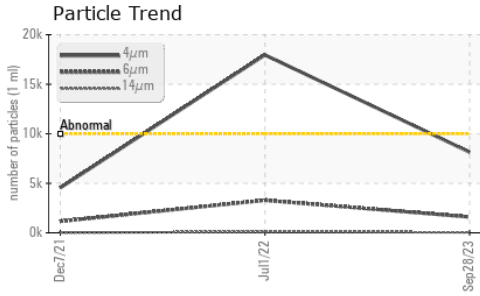
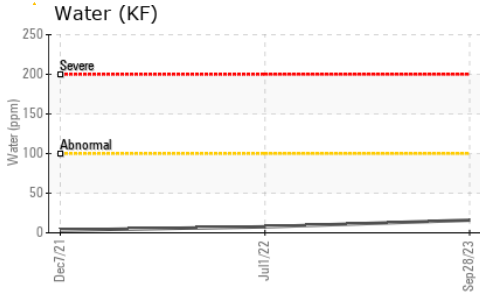
method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647 >10000	8139	● 17958	4539
Particles >6µm	ASTM D7647 >2500	1601	● 3289	1159
Particles >14µm	ASTM D7647 >320	45	95	15
Particles >21µm	ASTM D7647 >80	7	9	4
Particles >38µm	ASTM D7647 >20	0	0	0
Particles >71µm	ASTM D7647 >4	0	0	0
Oil Cleanliness	ISO 4406 (c) >20/18/15	20/18/13	● 21/19/14	19/17/11

FLUID DEGRADATION

method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g ASTM D974	0.014	0.014	0.015



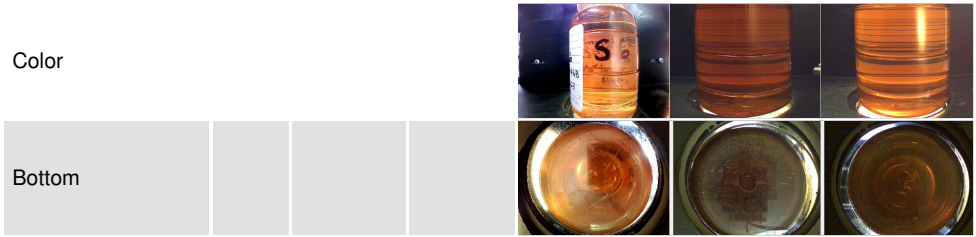
OIL ANALYSIS REPORT



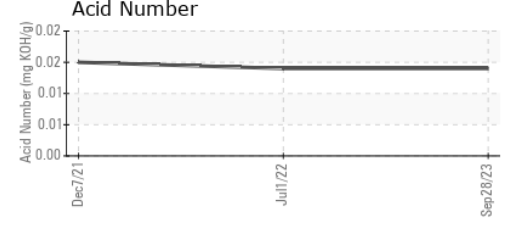
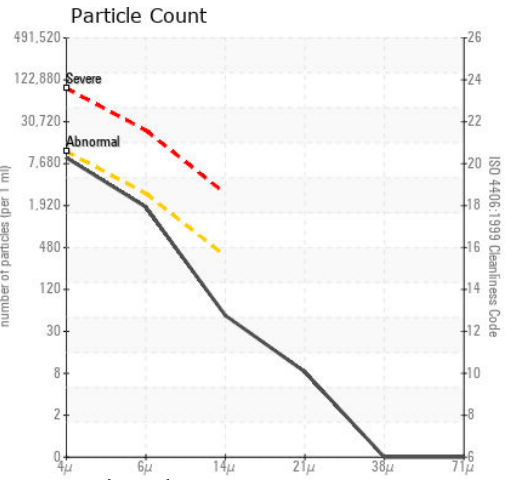
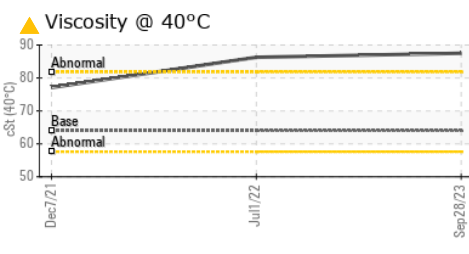
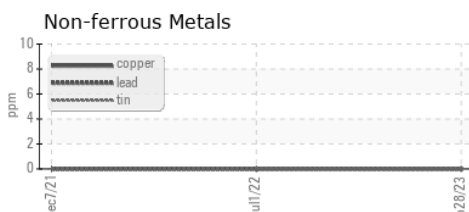
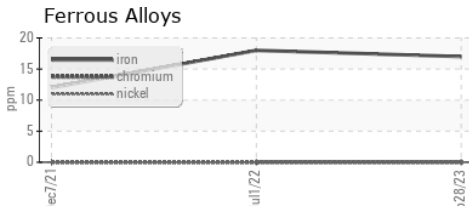
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.01	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	64.0 ▲ 87.5	▲ 86.28	77.1

SAMPLE IMAGES	method	limit/base	current	history1	history2
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GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : USP0006520 **Received** : 25 Apr 2024
Lab Number : 06160420 **Tested** : 26 Apr 2024
Unique Number : 10995843 **Diagnosed** : 29 Apr 2024 - Doug Bogart
Test Package : IND 2

LINEAGE LOGISTICS
 614 INTERMODAL WAY
 QUINCY, WA
 US 98848
 Contact:

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)