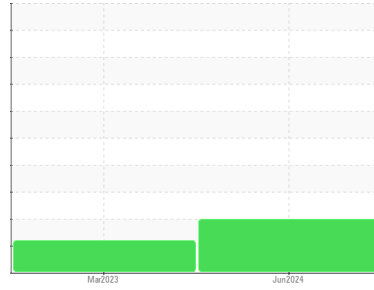




# OIL ANALYSIS REPORT

## Sample Rating Trend



**WATER**



Machine Id  
**7717593 (S/N 1147)**  
 Component  
**Compressor**  
 Fluid  
**KAESER SIGMA (OEM) S-460 (--- QTS)**

### DIAGNOSIS

#### Recommendation

Oil and filter change at the time of sampling has been noted. We were unable to perform a particle count due to a high concentration of particles present in this sample. We recommend an early resample in 500 hours to monitor this condition.

#### Wear

All component wear rates are normal.

#### Contamination

Moderate concentration of visible dirt/debris present in the oil. There is a light concentration of water present in the oil.

#### Fluid Condition

The AN level is acceptable for this fluid. The condition of the oil is acceptable for the time in service.

### SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	<b>KCPA019172</b>	KCPA001429	---
Sample Date	Client Info	<b>13 Jun 2024</b>	21 Mar 2023	---
Machine Age	hrs	Client Info	<b>5561</b>	2675
Oil Age	hrs	Client Info	<b>5561</b>	0
Oil Changed	Client Info	<b>Changed</b>	N/A	---
Sample Status		<b>ABNORMAL</b>	ATTENTION	---

### WEAR METALS

method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >50	<b>0</b>	0
Chromium	ppm	ASTM D5185m >10	<b>0</b>	0
Nickel	ppm	ASTM D5185m >3	<b>0</b>	0
Titanium	ppm	ASTM D5185m >3	<b>&lt;1</b>	0
Silver	ppm	ASTM D5185m >2	<b>0</b>	0
Aluminum	ppm	ASTM D5185m >10	<b>&lt;1</b>	<1
Lead	ppm	ASTM D5185m >10	<b>0</b>	0
Copper	ppm	ASTM D5185m >50	<b>11</b>	7
Tin	ppm	ASTM D5185m >10	<b>0</b>	0
Vanadium	ppm	ASTM D5185m	<b>&lt;1</b>	0
Cadmium	ppm	ASTM D5185m	<b>0</b>	0

### ADDITIVES

method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	<b>0</b>	0
Barium	ppm	ASTM D5185m 90	<b>0</b>	0
Molybdenum	ppm	ASTM D5185m	<b>0</b>	0
Manganese	ppm	ASTM D5185m	<b>&lt;1</b>	0
Magnesium	ppm	ASTM D5185m 90	<b>1</b>	<1
Calcium	ppm	ASTM D5185m 2	<b>0</b>	0
Phosphorus	ppm	ASTM D5185m	<b>1</b>	8
Zinc	ppm	ASTM D5185m	<b>11</b>	17
Sulfur	ppm	ASTM D5185m	<b>19929</b>	19151

### CONTAMINANTS

method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >25	<b>2</b>	<1
Sodium	ppm	ASTM D5185m	<b>2</b>	<1
Potassium	ppm	ASTM D5185m >20	<b>0</b>	0
Water	%	ASTM D6304 >0.05	<b>▲ 0.125</b>	0.004
ppm Water	ppm	ASTM D6304 >500	<b>▲ 1250</b>	44.7

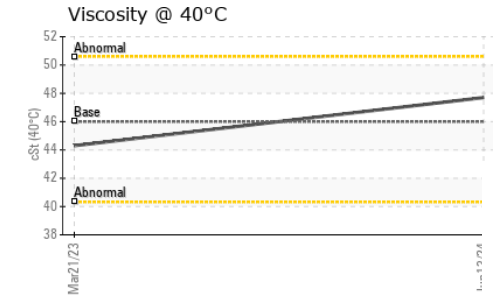
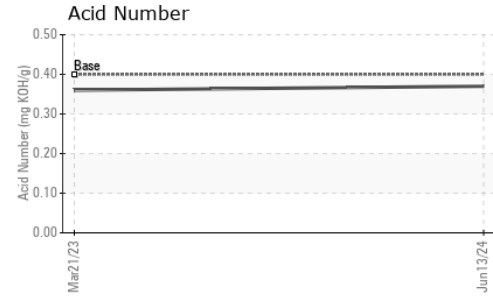
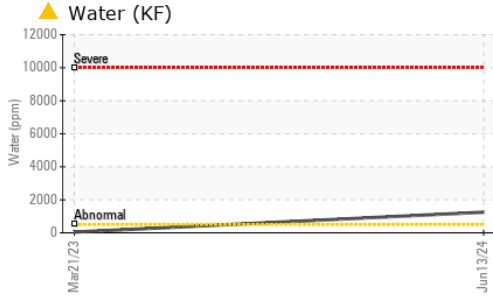
### FLUID CLEANLINESS

method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	---	3751	---
Particles >6µm	ASTM D7647 >1300	---	1085	---
Particles >14µm	ASTM D7647 >80	---	● 89	---
Particles >21µm	ASTM D7647 >20	---	● 31	---
Particles >38µm	ASTM D7647 >4	---	3	---
Particles >71µm	ASTM D7647 >3	---	0	---
Oil Cleanliness	ISO 4406 (c) >--/17/13	---	● 19/17/14	---

### FLUID DEGRADATION

method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045 0.4	<b>0.37</b>	0.36

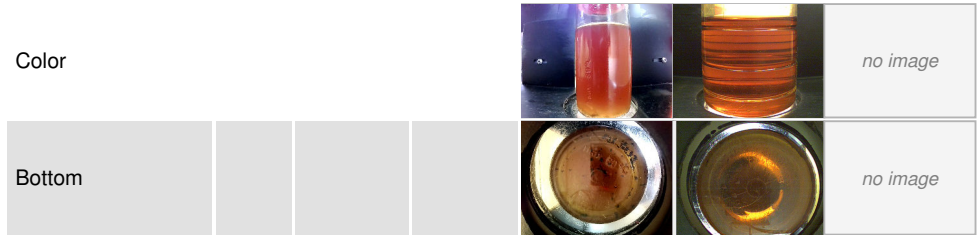
# OIL ANALYSIS REPORT



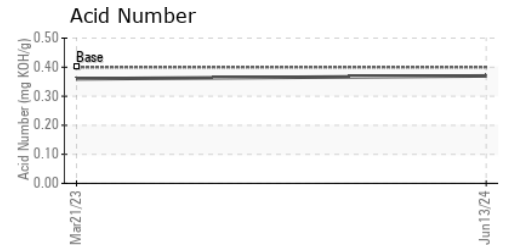
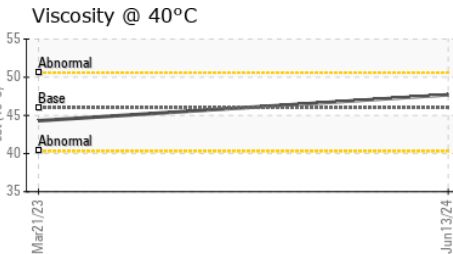
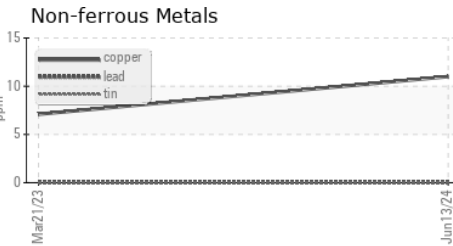
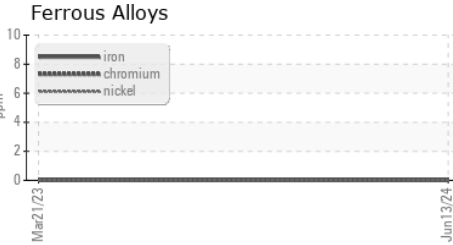
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	---
Yellow Metal	scalar	*Visual	NONE	NONE	---
Precipitate	scalar	*Visual	NONE	NONE	---
Silt	scalar	*Visual	NONE	NONE	---
Debris	scalar	*Visual	NONE	▲ MODER	LIGHT
Sand/Dirt	scalar	*Visual	NONE	NONE	---
Appearance	scalar	*Visual	NORML	NORML	---
Odor	scalar	*Visual	NORML	NORML	---
Emulsified Water	scalar	*Visual	>0.05	▲ 0.2%	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	46	47.7	44.3

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.** : KCPA019172 **Received** : 17 Jun 2024  
**Lab Number** : 06212413 **Tested** : 19 Jun 2024  
**Unique Number** : 11085277 **Diagnosed** : 19 Jun 2024 - Don Baldrige  
**Test Package** : IND 2 ( Additional Tests: KF, PrtCount )

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)

**ALAFACURE**  
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 US 35040

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