



# OIL ANALYSIS REPORT

Sample Rating Trend



ISO



Machine Id

**8321430 (S/N 1161)**

Component

**Compressor**

Fluid

**KAESER SIGMA (OEM) M-460 (--- GAL)**

## DIAGNOSIS

### Recommendation

Oil and filter change at the time of sampling has been noted. No corrective action is recommended at this time. Resample at the next service interval to monitor.

### Wear

All component wear rates are normal.

### Contamination

There is a high amount of particulates present 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	<b>KCPA014405</b>	---	---
Sample Date	Client Info	<b>12 Jun 2024</b>	---	---
Machine Age	hrs	Client Info	<b>3580</b>	---
Oil Age	hrs	Client Info	<b>2154</b>	---
Oil Changed	Client Info	<b>Changed</b>	---	---
Sample Status		<b>ABNORMAL</b>	---	---

## WEAR METALS

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

## ADDITIVES

method	limit/base	current	history1	history2		
Boron	ppm	ASTM D5185m	0	<b>0</b>	---	---
Barium	ppm	ASTM D5185m	90	<b>&lt;1</b>	---	---
Molybdenum	ppm	ASTM D5185m	0	<b>&lt;1</b>	---	---
Manganese	ppm	ASTM D5185m		<b>&lt;1</b>	---	---
Magnesium	ppm	ASTM D5185m	100	<b>10</b>	---	---
Calcium	ppm	ASTM D5185m	0	<b>0</b>	---	---
Phosphorus	ppm	ASTM D5185m	0	<b>0</b>	---	---
Zinc	ppm	ASTM D5185m	0	<b>126</b>	---	---
Sulfur	ppm	ASTM D5185m	23500	<b>19553</b>	---	---

## CONTAMINANTS

method	limit/base	current	history1	history2		
Silicon	ppm	ASTM D5185m	>25	<b>&lt;1</b>	---	---
Sodium	ppm	ASTM D5185m		<b>0</b>	---	---
Potassium	ppm	ASTM D5185m	>20	<b>1</b>	---	---
Water	%	ASTM D6304	>0.05	<b>0.011</b>	---	---
ppm Water	ppm	ASTM D6304	>500	<b>119</b>	---	---

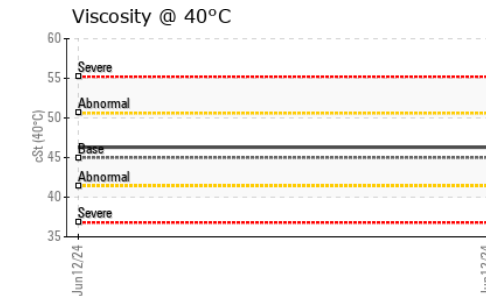
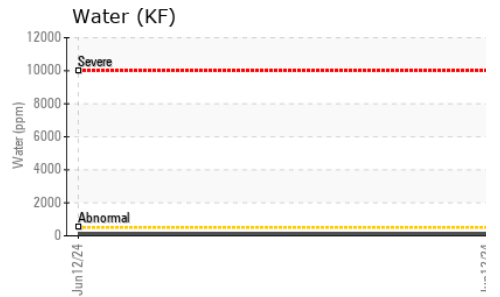
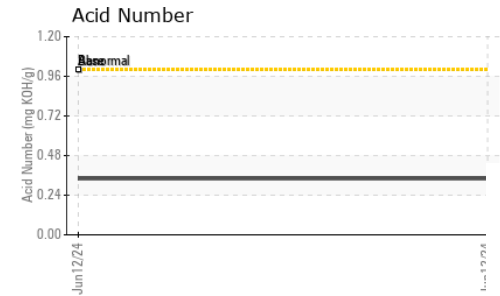
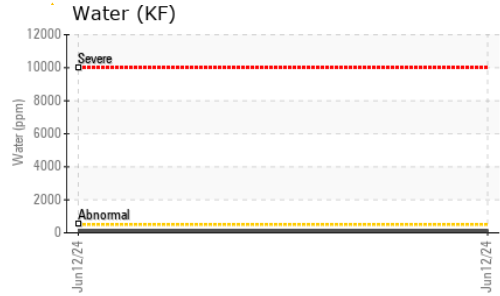
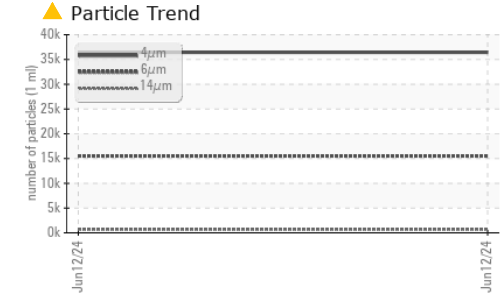
## FLUID CLEANLINESS

method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	<b>36434</b>	---	---
Particles >6µm	ASTM D7647	>1300	<b>▲ 15520</b>	---
Particles >14µm	ASTM D7647	>80	<b>▲ 678</b>	---
Particles >21µm	ASTM D7647	>20	<b>▲ 86</b>	---
Particles >38µm	ASTM D7647	>4	<b>▲ 5</b>	---
Particles >71µm	ASTM D7647	>3	<b>0</b>	---
Oil Cleanliness	ISO 4406 (c)	>--/17/13	<b>▲ 22/21/17</b>	---

## FLUID DEGRADATION

method	limit/base	current	history1	history2		
Acid Number (AN)	mg KOH/g	ASTM D8045	1.0	<b>0.34</b>	---	---

# OIL ANALYSIS REPORT

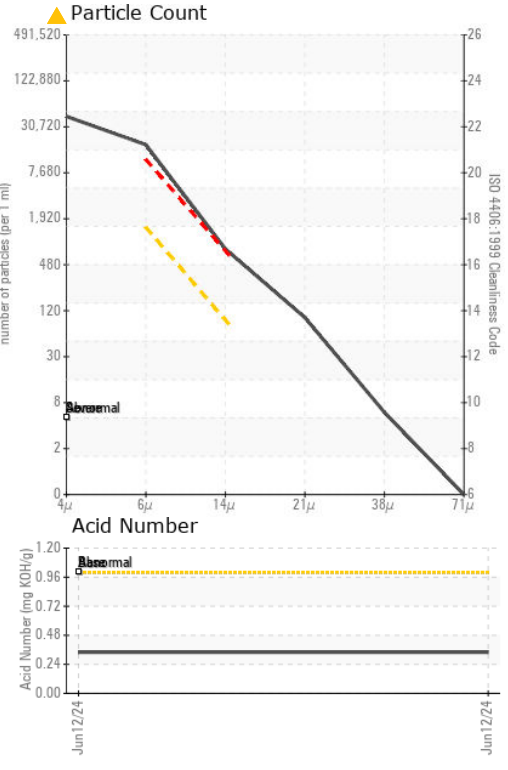
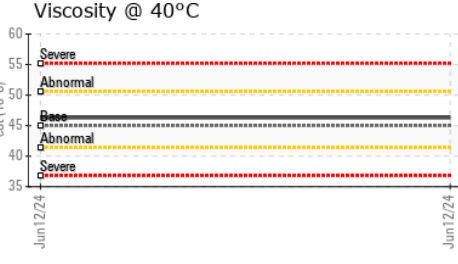
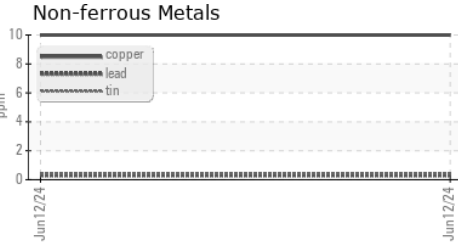
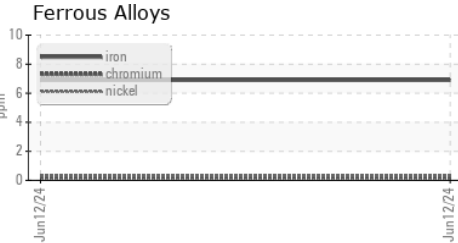


VISUAL	method	limit/base	current	history1	history2	
White Metal	scalar	*Visual	NONE	NONE	---	---
Yellow Metal	scalar	*Visual	NONE	NONE	---	---
Precipitate	scalar	*Visual	NONE	NONE	---	---
Silt	scalar	*Visual	NONE	NONE	---	---
Debris	scalar	*Visual	NONE	NONE	---	---
Sand/Dirt	scalar	*Visual	NONE	NONE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

FLUID PROPERTIES	method	limit/base	current	history1	history2	
Visc @ 40°C	cSt	ASTM D445	45	46.3	---	---

SAMPLE IMAGES	method	limit/base	current	history1	history2
Color					
Bottom					

## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : KCPA014405 **Received** : 18 Jun 2024  
**Lab Number** : 06213481 **Tested** : 19 Jun 2024  
**Unique Number** : 11086345 **Diagnosed** : 20 Jun 2024 - Don Baldrige  
**Test Package** : IND 2 ( Additional Tests: KF, PrtCount )

**FERMENTED SCIENCES II INC**  
 3200 GOLF COURSE DR  
 VENTURA, CA  
 US 93003  
 Contact: Service Manager

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)