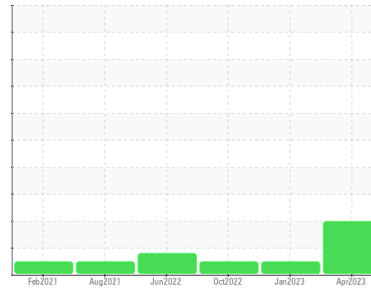


# OIL ANALYSIS REPORT

Sample Rating Trend



ISO



Machine Id  
**KAESER SFC 55 7180975 (S/N 1024)**

Component  
**Compressor**

Fluid  
**KAESER SIGMA (OEM) S-460 (--- GAL)**

## DIAGNOSIS

### Recommendation

The filter change at the time of sampling has been noted. 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>KC107711</b>	KC108084	KC107851
Sample Date	Client Info	<b>17 Apr 2023</b>	16 Jan 2023	14 Oct 2022
Machine Age	hrs	<b>27700</b>	25563	23514
Oil Age	hrs	<b>2200</b>	2000	6413
Oil Changed	Client Info	<b>Not Changed</b>	Changed	Not Changed
Sample Status		<b>ABNORMAL</b>	NORMAL	NORMAL

## WEAR METALS

method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185m >50	<b>0</b>	0	0
Chromium	ppm	ASTM D5185m >10	<b>0</b>	0	0
Nickel	ppm	ASTM D5185m >3	<b>0</b>	0	0
Titanium	ppm	ASTM D5185m >3	<b>0</b>	0	0
Silver	ppm	ASTM D5185m >2	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m >10	<b>&lt;1</b>	0	0
Lead	ppm	ASTM D5185m >10	<b>0</b>	0	0
Copper	ppm	ASTM D5185m >50	<b>&lt;1</b>	9	11
Tin	ppm	ASTM D5185m >10	<b>0</b>	0	0
Vanadium	ppm	ASTM D5185m	<b>0</b>	0	0
Cadmium	ppm	ASTM D5185m	<b>0</b>	0	0

## ADDITIVES

method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185m	<b>0</b>	0	0
Barium	ppm	ASTM D5185m 90	<b>0</b>	1	1
Molybdenum	ppm	ASTM D5185m	<b>0</b>	0	0
Manganese	ppm	ASTM D5185m	<b>0</b>	0	0
Magnesium	ppm	ASTM D5185m 90	<b>28</b>	<1	<1
Calcium	ppm	ASTM D5185m 2	<b>&lt;1</b>	0	0
Phosphorus	ppm	ASTM D5185m	<b>2</b>	3	7
Zinc	ppm	ASTM D5185m	<b>0</b>	0	0

## CONTAMINANTS

method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185m >25	<b>&lt;1</b>	1	2
Sodium	ppm	ASTM D5185m	<b>3</b>	0	0
Potassium	ppm	ASTM D5185m >20	<b>0</b>	<1	<1
Water	%	ASTM D6304 >0.05	<b>0.014</b>	0.005	0.005
ppm Water	ppm	ASTM D6304 >500	<b>145.7</b>	52.7	58.0

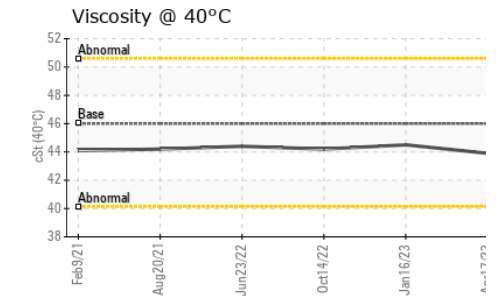
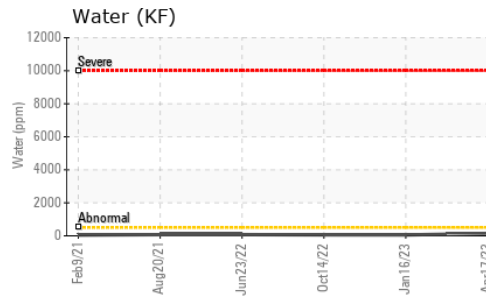
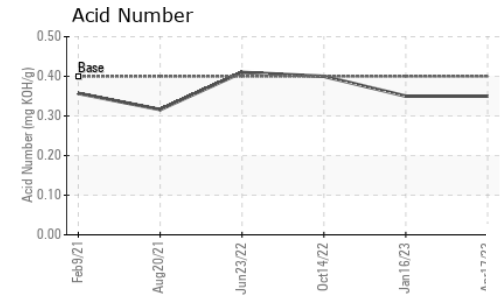
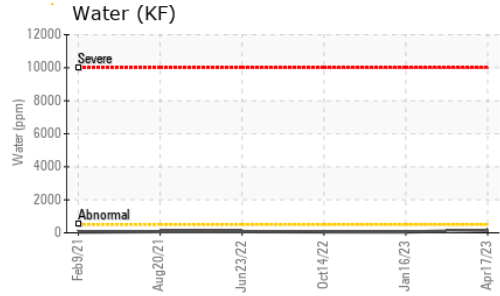
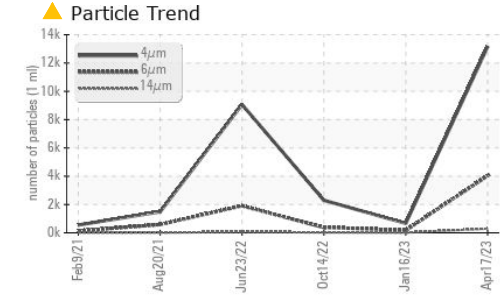
## FLUID CLEANLINESS

method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	<b>13159</b>	666	2298
Particles >6µm	ASTM D7647 >1300	<b>▲ 4039</b>	176	383
Particles >14µm	ASTM D7647 >80	<b>▲ 295</b>	10	24
Particles >21µm	ASTM D7647 >20	<b>▲ 69</b>	3	8
Particles >38µm	ASTM D7647 >4	<b>▲ 6</b>	1	0
Particles >71µm	ASTM D7647 >3	<b>1</b>	0	0
Oil Cleanliness	ISO 4406 (c) >--/17/13	<b>▲ 21/19/15</b>	17/15/10	18/16/12

## FLUID DEGRADATION

method	limit/base	current	history1	history2	
Acid Number (AN)	mg KOH/g	ASTM D8045 0.4	<b>0.35</b>	0.35	0.40

# OIL ANALYSIS REPORT

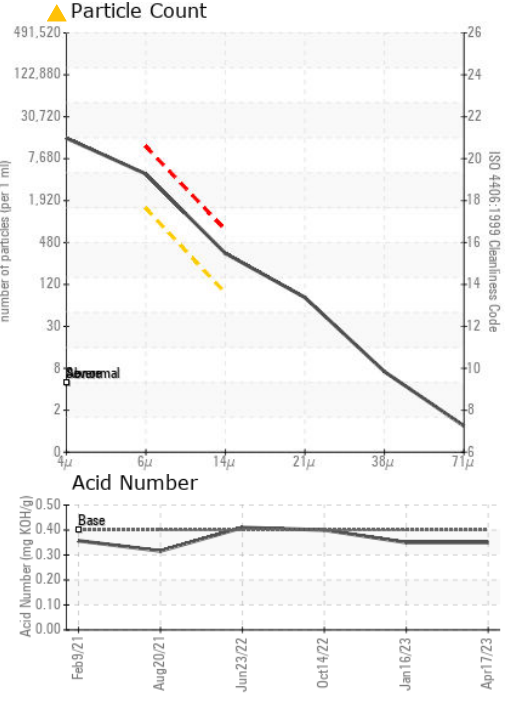
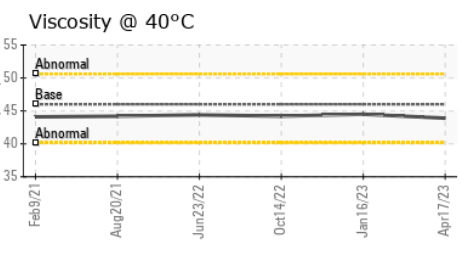
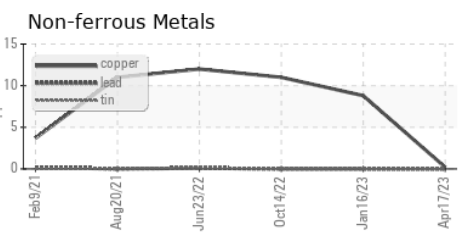
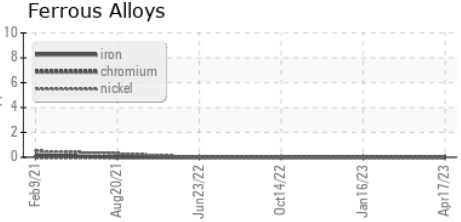


VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance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

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445 46	43.9	44.5	44.2

SAMPLE IMAGES	method	limit/base	current	history1	history2
Color					
Bottom					

## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : KC107711  
**Lab Number** : 05828472  
**Unique Number** : 10441965  
**Test Package** : IND 2  
**Received** : 24 Apr 2023  
**Tested** : 25 Apr 2023  
**Diagnosed** : 27 Apr 2023 - Jonathan Hester

**NORMAN NOBLE**  
 5340 AVION PKWY  
 HIGHLAND HEIGHTS, OH  
 US 44143  
 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)