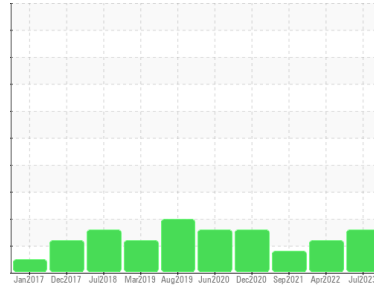




# PROBLEM SUMMARY

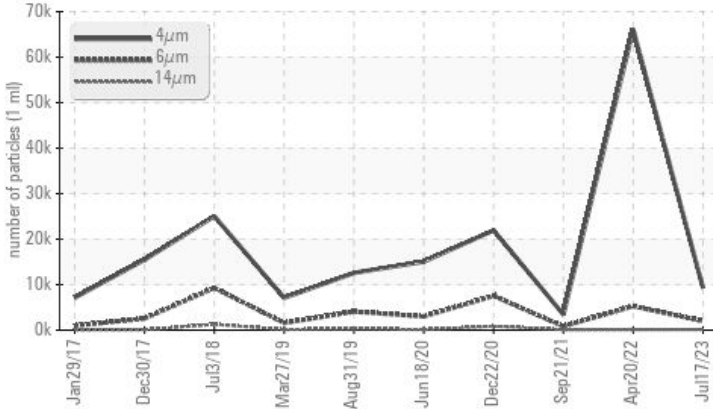
Sample Rating Trend



Machine Id  
**KAESER CSD 75 2306137 (S/N 1004)**  
 Component  
**Compressor**  
 Fluid  
**KAESER SIGMA (OEM) S-460 (--- GAL)**

## COMPONENT CONDITION SUMMARY

▲ Particle Trend



## RECOMMENDATION

The filter change at the time of sampling has been noted. Resample at the next service interval to monitor.

## PROBLEMATIC TEST RESULTS

Sample Status			ATTENTION	ABNORMAL	ATTENTION
Particles >6µm	ASTM D7647	>1300	▲ 1991	▲ 5263	844
Particles >14µm	ASTM D7647	>80	▲ 121	▲ 116	▲ 87
Particles >21µm	ASTM D7647	>20	▲ 30	▲ 32	▲ 25
Oil Cleanliness	ISO 4406 (c)	>--/17/13	▲ 20/18/14	▲ 20/14	▲ 17/14

Customer Id: GENWEN  
 Sample No.: KCPA004617  
 Lab Number: 05903803  
 Test Package: IND 2



To manage this report scan the QR code

To discuss the diagnosis or test data:  
 Angela Borella +1 800-237-1369  
[angela.borella@wearcheckusa.com](mailto:angela.borella@wearcheckusa.com)

To change component or sample information:  
 Customer Service +1 1-800-237-1369  
[customerservice@wearcheck.com](mailto:customerservice@wearcheck.com)

## RECOMMENDED ACTIONS

*There are no recommended actions for this sample.*

## HISTORICAL DIAGNOSIS

### 20 Apr 2022 Diag: Don Baldrige

ISO



No corrective action is recommended at this time. The filter change at the time of sampling has been noted. Resample at the next service interval to monitor. All component wear rates are normal. There is a high amount of particulates present in the oil. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

view report



### 21 Sep 2021 Diag: Don Baldrige

ISO



Oil and filter change at the time of sampling has been noted. Resample at the next service interval to monitor. All component wear rates are normal. There is a moderate amount of particulates present in the oil. The AN level is acceptable for this fluid. The condition of the oil is acceptable for the time in service.

view report



### 22 Dec 2020 Diag: Angela Borella

ISO



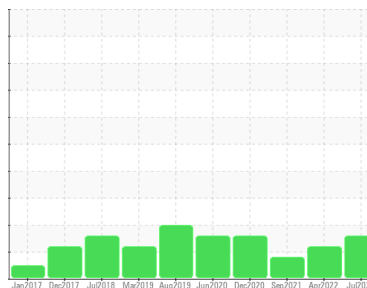
The filter change at the time of sampling has been noted. Resample at the next service interval to monitor. All component wear rates are normal. There is a high amount of particulates present in the oil. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

view report



# OIL ANALYSIS REPORT

Sample Rating Trend



ISO



Machine Id  
**KAESER CSD 75 2306137 (S/N 1004)**

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 moderate amount of particulates 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>KCPA004617</b>	KCP44353	KCP36330
Sample Date	Client Info			<b>17 Jul 2023</b>	20 Apr 2022	21 Sep 2021
Machine Age	hrs	Client Info		<b>57024</b>	51055	49425
Oil Age	hrs	Client Info		<b>0</b>	2000	4392
Oil Changed	Client Info			<b>N/A</b>	Not Changd	Changed
Sample Status				<b>ATTENTION</b>	ABNORMAL	ATTENTION

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>50	<b>&lt;1</b>	1	<1
Chromium	ppm	ASTM D5185m	>10	<b>0</b>	0	0
Nickel	ppm	ASTM D5185m	>3	<b>0</b>	<1	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>	<1	3
Lead	ppm	ASTM D5185m	>10	<b>0</b>	0	0
Copper	ppm	ASTM D5185m	>50	<b>9</b>	5	3
Tin	ppm	ASTM D5185m	>10	<b>0</b>	<1	0
Antimony	ppm	ASTM D5185m		<b>---</b>	---	<1
Vanadium	ppm	ASTM D5185m		<b>0</b>	0	0
Cadmium	ppm	ASTM D5185m		<b>0</b>	0	0

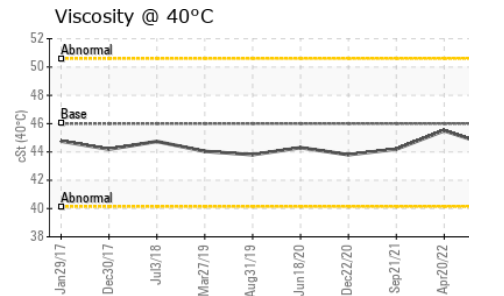
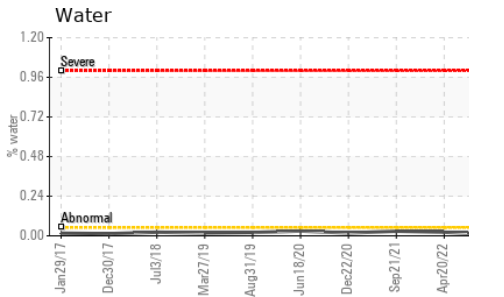
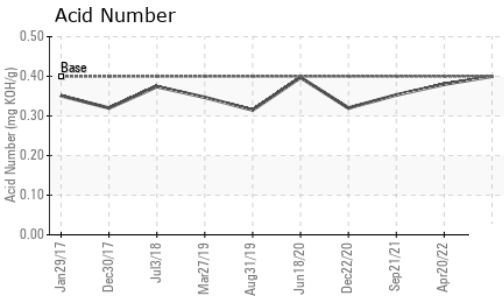
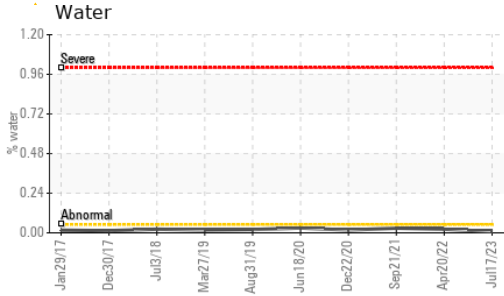
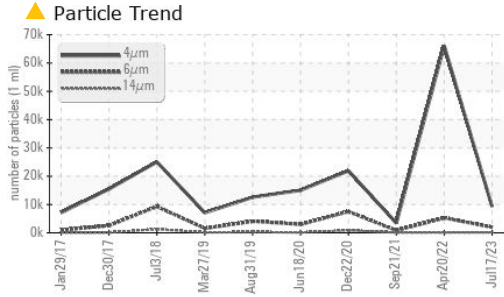
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		<b>0</b>	0	<1
Barium	ppm	ASTM D5185m	90	<b>0</b>	0	12
Molybdenum	ppm	ASTM D5185m		<b>0</b>	0	0
Manganese	ppm	ASTM D5185m		<b>0</b>	<1	<1
Magnesium	ppm	ASTM D5185m	90	<b>11</b>	47	59
Calcium	ppm	ASTM D5185m	2	<b>0</b>	0	<1
Phosphorus	ppm	ASTM D5185m		<b>0</b>	2	5
Zinc	ppm	ASTM D5185m		<b>0</b>	20	0
Sulfur	ppm	ASTM D5185m		<b>23025</b>	15110	16102

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>25	<b>&lt;1</b>	<1	0
Sodium	ppm	ASTM D5185m		<b>3</b>	14	16
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	<1	3
Water	%	ASTM D6304	>0.05	<b>0.008</b>	0.022	0.028
ppm Water	ppm	ASTM D6304	>500	<b>89.2</b>	225.8	284.2

FLUID CLEANLINESS		method	limit/base	current	history1	history2
Particles >4µm		ASTM D7647		<b>9297</b>	66088	3430
Particles >6µm		ASTM D7647	>1300	<b>▲ 1991</b>	▲ 5263	844
Particles >14µm		ASTM D7647	>80	<b>▲ 121</b>	▲ 116	▲ 87
Particles >21µm		ASTM D7647	>20	<b>▲ 30</b>	▲ 32	▲ 25
Particles >38µm		ASTM D7647	>4	<b>2</b>	2	0
Particles >71µm		ASTM D7647	>3	<b>0</b>	0	0
Oil Cleanliness		ISO 4406 (c)	>--/17/13	<b>▲ 20/18/14</b>	▲ 20/14	▲ 17/14

FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045	0.4	<b>0.40</b>	0.38	0.353

# OIL ANALYSIS REPORT

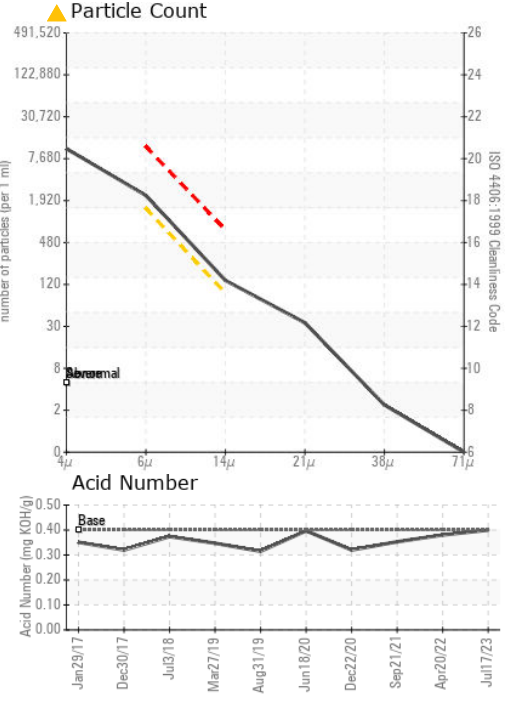
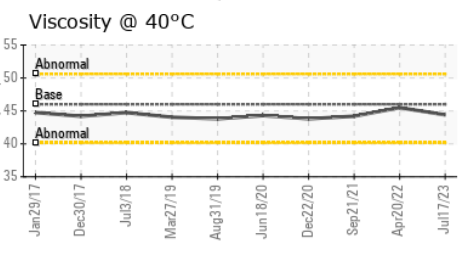
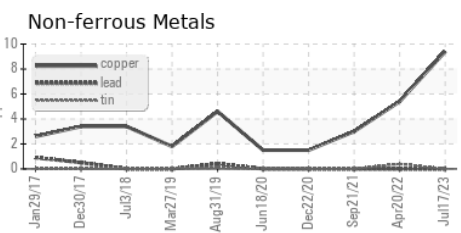
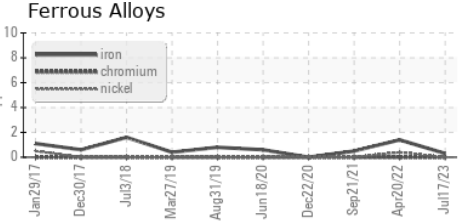


VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	LIGHT	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance	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	44.4	45.5	44.2

SAMPLE IMAGES	method	limit/base	current	history1	history2
Color					
Bottom					

## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : KCPA004617 **Received** : 20 Jul 2023  
**Lab Number** : 05903803 **Diagnosed** : 24 Jul 2023  
**Unique Number** : 10565159 **Diagnostician** : Angela Borella  
**Test Package** : IND 2 ( Additional Tests: KF, PrtCount )

**GENERAL MOTORS**  
 1500 E ROUTE A  
 WENTZVILLE, MO  
 US 63385  
 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)