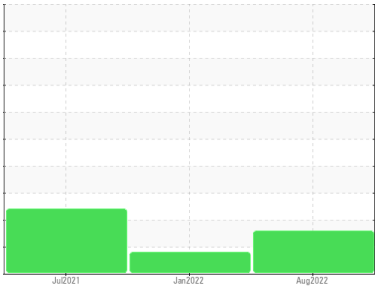
KAESER COMPRESSORS®
Built for a lifetime.

PROBLEM SUMMARY

Sample Rating Trend

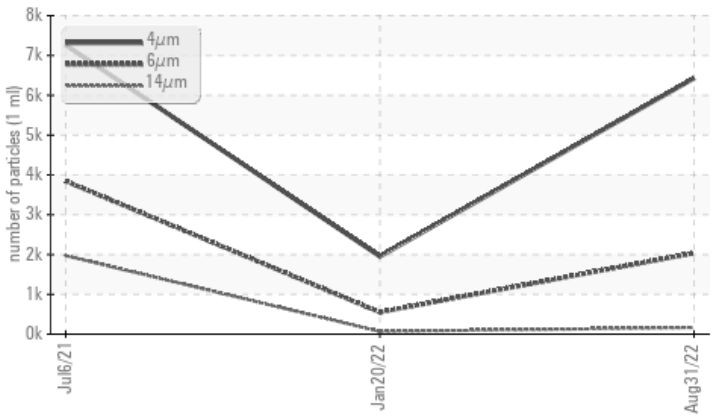


ISO

Machine Id
KAESER 3256899
Component
Compressor
Fluid
KAESER SIGMA (OEM) M-460 (--- GAL)

COMPONENT CONDITION SUMMARY

▲ Particle Trend



RECOMMENDATION

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

PROBLEMATIC TEST RESULTS

Sample Status				**ABNORMAL**	MARGINAL	ABNORMAL
Particles >6µm		ASTM D7647	>1300	▲ **2036**	549	▲ 3843
Particles >14µm		ASTM D7647	>80	▲ **166**	67	▲ 1973
Particles >21µm		ASTM D7647	>20	▲ **39**	17	▲ 737
Oil Cleanliness		ISO 4406 (c)	>--/17/13	▲ **20/18/15**	16/13	▲ 19/18

Customer Id: CITSIL
Sample No.: KCP48415
Lab Number: 05640369
Test Package: IND 2

To manage this report scan the QR code

To discuss the diagnosis or test data:
Jonathan Hester +1 919-379-4092 x4092
jhester@wearcheckusa.com

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

RECOMMENDED ACTIONS

Action	Status	Date	Done By	Description
Change Fluid	---	---	?	Oil and filter change at the time of sampling has been noted.
Change Filter	---	---	?	Oil and filter change at the time of sampling has been noted.

HISTORICAL DIAGNOSIS

20 Jan 2022 Diag: Jonathan Hester

WEAR

No corrective action is recommended at this time. Resample at the next service interval to monitor.The copper level has decreased, but is still abnormal. There is no indication of any contamination in the oil. The amount and size of particulates present in the system are acceptable. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

view report

06 Jul 2021 Diag: Angela Borella

WEAR

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

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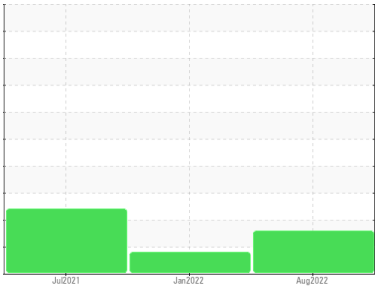
OIL ANALYSIS REPORT

Sample Rating Trend



ISO

Machine Id
KAESER 3256899
Component
Compressor
Fluid
KAESER SIGMA (OEM) M-460 (--- GAL)

DIAGNOSIS

Recommendation
Oil and 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	history 1	history 2
Sample Number			**KCP48415**	KCP48586	KCP33307
Sample Date			**31 Aug 2022**	20 Jan 2022	06 Jul 2021
Machine Age	hrs		**0**	4322	4322
Oil Age	hrs		**0**	0	4322
Oil Changed			**Changed**	Not Changd	Changed
Sample Status			**ABNORMAL**	MARGINAL	ABNORMAL

WEAR METALS		method	limit/base	current	history 1	history 2
Iron	ppm	ASTM D5185m	>50	**0**	0	0
Chromium	ppm	ASTM D5185m	>10	**0**	0	0
Nickel	ppm	ASTM D5185m	>3	**0**	0	0
Titanium	ppm	ASTM D5185m	>3	**0**	0	0
Silver	ppm	ASTM D5185m	>2	**<1**	0	<1
Aluminum	ppm	ASTM D5185m	>10	**<1**	0	<1
Lead	ppm	ASTM D5185m	>10	**<1**	<1	0
Copper	ppm	ASTM D5185m	>50	**39**	▲ 81	▲ 113
Tin	ppm	ASTM D5185m	>10	**0**	0	0
Antimony	ppm	ASTM D5185m		**---**	0	0
Vanadium	ppm	ASTM D5185m		**0**	0	0
Cadmium	ppm	ASTM D5185m		**0**	0	0

ADDITIVES		method	limit/base	current	history 1	history 2
Boron	ppm	ASTM D5185m	0	**0**	0	8
Barium	ppm	ASTM D5185m	90	**0**	0	0
Molybdenum	ppm	ASTM D5185m	0	**0**	0	0
Manganese	ppm	ASTM D5185m		**0**	0	0
Magnesium	ppm	ASTM D5185m	100	**<1**	0	0
Calcium	ppm	ASTM D5185m	0	**0**	0	0
Phosphorus	ppm	ASTM D5185m	0	**<1**	0	4
Zinc	ppm	ASTM D5185m	0	**0**	0	0
Sulfur	ppm	ASTM D5185m	23500	**11444**	11583	10254

CONTAMINANTS		method	limit/base	current	history 1	history 2
Silicon	ppm	ASTM D5185m	>25	**<1**	<1	0
Sodium	ppm	ASTM D5185m		**0**	0	<1
Potassium	ppm	ASTM D5185m	>20	**<1**	0	0
Water	%	ASTM D6304	>0.05	**0.009**	0.004	0.010
ppm Water	ppm	ASTM D6304	>500	**92.3**	45.2	108.3

FLUID CLEANLINESS		method	limit/base	current	history 1	history 2
Particles >4µm		ASTM D7647		**6427**	1951	7264
Particles >6µm		ASTM D7647	>1300	▲ **2036**	549	▲ 3843
Particles >14µm		ASTM D7647	>80	▲ **166**	67	▲ 1973
Particles >21µm		ASTM D7647	>20	▲ **39**	17	▲ 737
Particles >38µm		ASTM D7647	>4	**1**	0	▲ 32
Particles >71µm		ASTM D7647	>3	**0**	0	0
Oil Cleanliness		ISO 4406 (c)	>--/17/13	▲ **20/18/15**	16/13	▲ 19/18

FLUID DEGRADATION		method	limit/base	current	history 1	history 2
Acid Number (AN)	mg KOH/g	ASTM D8045	1.0	**0.44**	0.41	0.392

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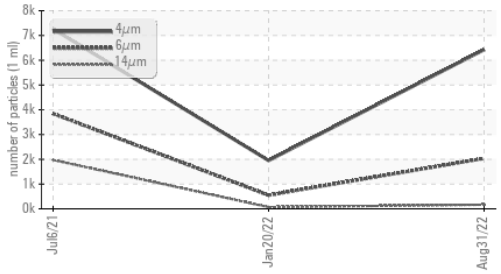
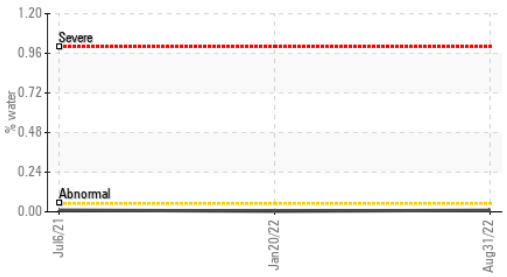
OIL ANALYSIS REPORT

Particle Trend

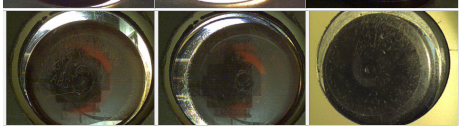


Water



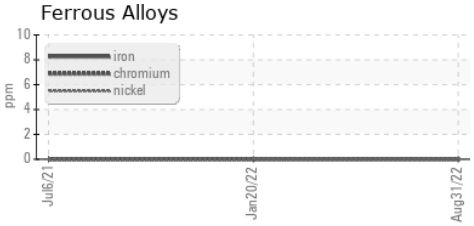
VISUAL		method	limit/base	current	history 1	history 2
White Metal	scalar	*Visual	NONE	**NONE**	NONE	LIGHT
Yellow Metal	scalar	*Visual	NONE	**NONE**	NONE	NONE
Precipitate	scalar	*Visual	NONE	**NONE**	NONE	NONE
Silt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Debris	scalar	*Visual	NONE	**NONE**	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	**NONE**	NONE	NONE
Appearance	scalar	*Visual	NORML	**NORML**	NORML	NORML
Odor	scalar	*Visual	NORML	**NORML**	NORML	NORML
Emulsified Water	scalar	*Visual	>0.05	**NEG**	NEG	NEG
Free Water	scalar	*Visual		**NEG**	NEG	NEG

FLUID PROPERTIES		method	limit/base	current	history 1	history 2
Visc @ 40°C	cSt	ASTM D445	45	**46.0**	46.6	45.6

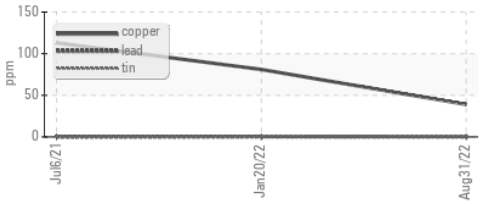
SAMPLE IMAGES	method	limit/base	current	history 1	history 2
Color					
Bottom					

GRAPHS

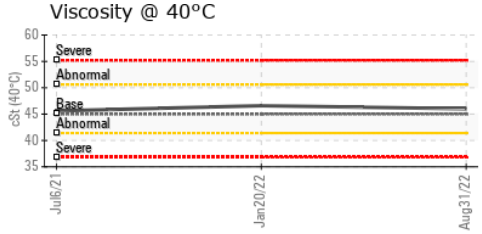
Ferrous Alloys



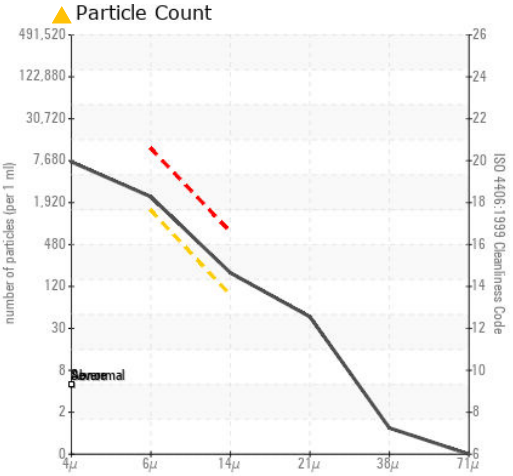
Non-ferrous Metals



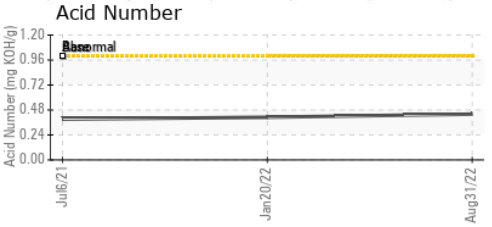
Viscosity @ 40°C



Particle Count



Acid Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : KCP48415 **Received** : 13 Sep 2022
Lab Number : 05640369 **Diagnosed** : 15 Sep 2022
Unique Number : 10129899 **Diagnostician** : Jonathan Hester
Test Package : IND 2 (Additional Tests: KF, PrtCount)

CITY OF TACOMA PARK CITY WORKS DEPT
31 OSWEGO AVE
SILVER SPRINGS, MD
USA 20910
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)

T:
F: