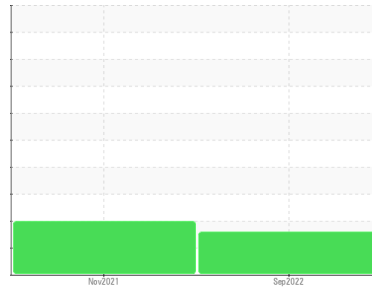


PROBLEM SUMMARY

Sample Rating Trend



ISO



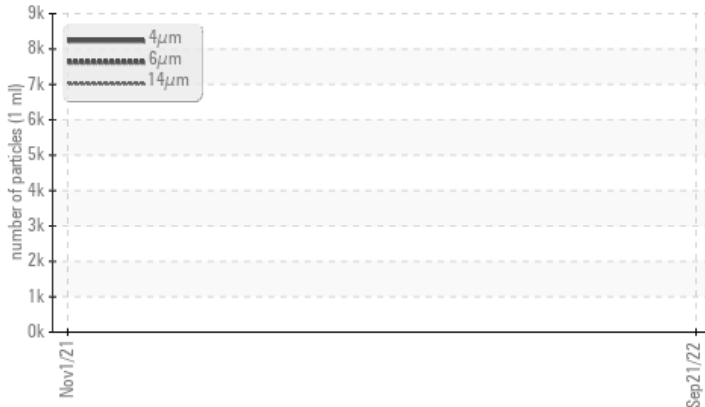
Machine Id
KAESER 4738400

Component
Compressor

Fluid
KAESER SIGMA (OEM) M-460 (--- QTS)

COMPONENT CONDITION SUMMARY

▲ Particle Trend



RECOMMENDATION

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.

PROBLEMATIC TEST RESULTS

Sample Status	ASTM D7647	ASTM D7647	ABNORMAL	ABNORMAL	---
Particles >6µm	>1300	▲ 2317	---	---	---
Particles >14µm	>80	▲ 192	---	---	---
Particles >21µm	>20	▲ 40	---	---	---
Oil Cleanliness	ISO 4406 (c)	>--/17/13	▲ 20/18/15	---	---

Customer Id: ZERSANCA
Sample No.: KCP50146
Lab Number: 05648923
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

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

01 Nov 2021 Diag: Angela Borella

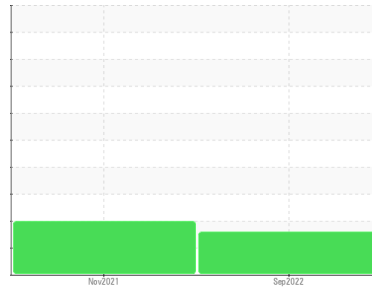
WATER



Oil and filter change at the time of sampling has been noted. Resample at the next service interval to monitor. We were unable to perform a particle count due to a high concentration of particles present in this sample. All component wear rates are normal. There is a light concentration of water present in the oil. Moderate concentration of visible dirt/debris present in the oil. The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

view report





Machine Id
KAESER 4738400

Component
Compressor
Fluid
KAESER SIGMA (OEM) M-460 (--- QTS)

DIAGNOSIS

▲ Recommendation

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.

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			KCP50146	KCP39905	---
Sample Date			21 Sep 2022	01 Nov 2021	---
Machine Age	hrs		48797	42175	---
Oil Age	hrs		48000	4000	---
Oil Changed			Changed	Changed	---
Sample Status			ABNORMAL	ABNORMAL	---

WEAR METALS

	method	limit/base	current	history 1	history 2
Iron	ppm	ASTM D5185m >50	<1	0	---
Chromium	ppm	ASTM D5185m >10	0	0	---
Nickel	ppm	ASTM D5185m >3	0	0	---
Titanium	ppm	ASTM D5185m >3	0	0	---
Silver	ppm	ASTM D5185m >2	0	0	---
Aluminum	ppm	ASTM D5185m >10	0	0	---
Lead	ppm	ASTM D5185m >10	0	0	---
Copper	ppm	ASTM D5185m >50	13	19	---
Tin	ppm	ASTM D5185m >10	0	0	---
Antimony	ppm	ASTM D5185m	---	0	---
Vanadium	ppm	ASTM D5185m	0	0	---
Cadmium	ppm	ASTM D5185m	0	0	---

ADDITIVES

	method	limit/base	current	history 1	history 2
Boron	ppm	ASTM D5185m 0	0	<1	---
Barium	ppm	ASTM D5185m 90	0	0	---
Molybdenum	ppm	ASTM D5185m 0	0	0	---
Manganese	ppm	ASTM D5185m	0	0	---
Magnesium	ppm	ASTM D5185m 100	0	0	---
Calcium	ppm	ASTM D5185m 0	0	0	---
Phosphorus	ppm	ASTM D5185m 0	12	1	---
Zinc	ppm	ASTM D5185m 0	23	40	---
Sulfur	ppm	ASTM D5185m 23500	20587	16991	---

CONTAMINANTS

	method	limit/base	current	history 1	history 2
Silicon	ppm	ASTM D5185m >25	2	0	---
Sodium	ppm	ASTM D5185m	0	<1	---
Potassium	ppm	ASTM D5185m >20	0	0	---
Water	%	ASTM D6304 >0.05	0.043	▲ 0.484	---
ppm Water	ppm	ASTM D6304 >500	435.9	▲ 4840	---

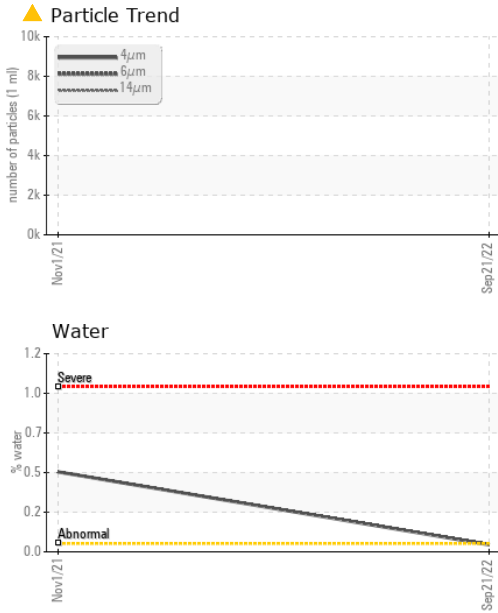
FLUID CLEANLINESS

	method	limit/base	current	history 1	history 2
Particles >4µm	ASTM D7647		8906	---	---
Particles >6µm	ASTM D7647	>1300	▲ 2317	---	---
Particles >14µm	ASTM D7647	>80	▲ 192	---	---
Particles >21µm	ASTM D7647	>20	▲ 40	---	---
Particles >38µm	ASTM D7647	>4	2	---	---
Particles >71µm	ASTM D7647	>3	0	---	---
Oil Cleanliness	ISO 4406 (c)	>--/17/13	▲ 20/18/15	---	---

FLUID DEGRADATION

	method	limit/base	current	history 1	history 2
Acid Number (AN)	mg KOH/g	ASTM D8045 1.0	0.45	0.424	---

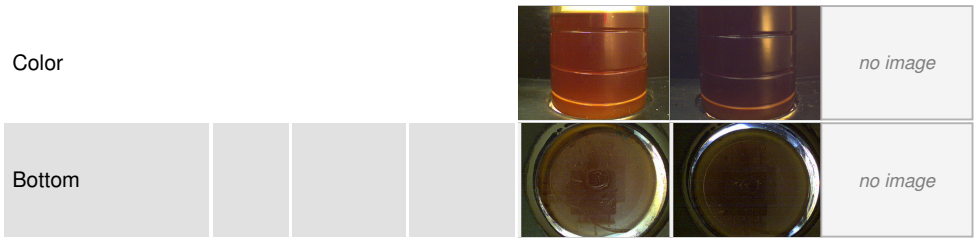
OIL ANALYSIS REPORT



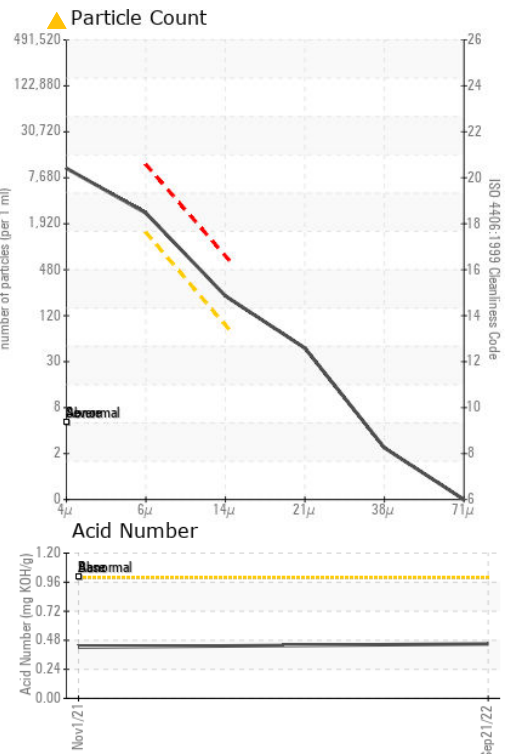
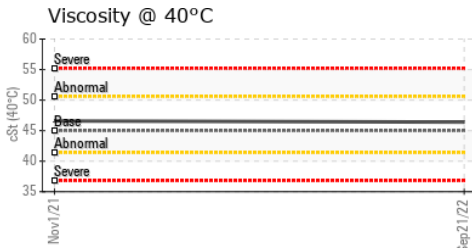
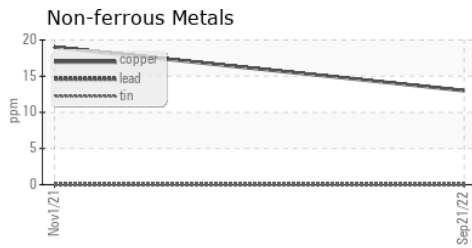
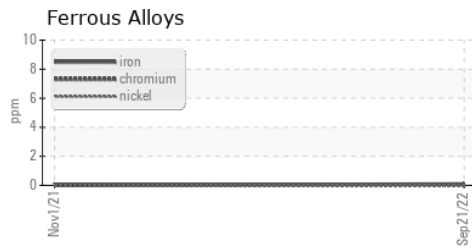
VISUAL	method	limit/base	current	history 1	history 2
White Metal	scalar	*Visual	NONE	NONE	---
Yellow Metal	scalar	*Visual	NONE	NONE	---
Precipitate	scalar	*Visual	NONE	NONE	---
Silt	scalar	*Visual	NONE	NONE	---
Debris	scalar	*Visual	NONE	LIGHT	▲ MODER
Sand/Dirt	scalar	*Visual	NONE	NONE	---
Appearance	scalar	*Visual	NORML	NORML	---
Odor	scalar	*Visual	NORML	NORML	---
Emulsified Water	scalar	*Visual	>0.05	NEG	▲ 0.2%
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history 1	history 2
Visc @ 40°C	cSt	ASTM D445	45	46.4	46.6

SAMPLE IMAGES	method	limit/base	current	history 1	history 2
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GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : KCP50146 **Received** : 22 Sep 2022
Lab Number : 05648923 **Diagnosed** : 26 Sep 2022
Unique Number : 10143462 **Diagnostician** : Angela Borella
Test Package : IND 2 (Additional Tests: KF, PrtCount)

ZERO WASTE ENERGY
 685 LOS ESTEROS RD
 SAN JOSE, CA
 USA 95134
 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)