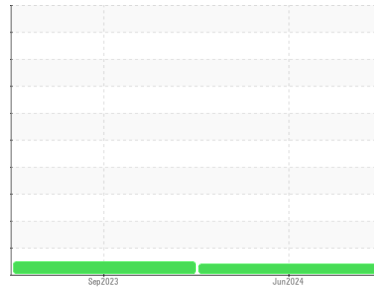




OIL ANALYSIS REPORT

Sample Rating Trend



VISCOSITY



Area

[73574331]

Machine Id

KAESER 8459890

Component

Compressor

Fluid

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

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 no indication of any contamination in the oil. The amount and size of particulates present in the system are acceptable.

Fluid Condition

The oil viscosity is higher than normal. The AN level is acceptable for this fluid.

SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		KC129384	KC124591	---
Sample Date	Client Info		03 Jun 2024	26 Sep 2023	---
Machine Age	hrs	Client Info	7805	3923	---
Oil Age	hrs	Client Info	0	0	---
Oil Changed	Client Info		Changed	N/A	---
Sample Status			MARGINAL	NORMAL	---

WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >50	0	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	6	12	---
Tin	ppm	ASTM D5185m >10	0	0	---
Vanadium	ppm	ASTM D5185m	0	0	---
Cadmium	ppm	ASTM D5185m	0	0	---

ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m 0	0	0	---
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	<1	4	---
Calcium	ppm	ASTM D5185m 0	0	0	---
Phosphorus	ppm	ASTM D5185m 0	2	3	---
Zinc	ppm	ASTM D5185m 0	0	0	---

CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >25	<1	<1	---
Sodium	ppm	ASTM D5185m	<1	1	---
Potassium	ppm	ASTM D5185m >20	0	<1	---
Water	%	ASTM D6304 >0.05	0.007	0.005	---
ppm Water	ppm	ASTM D6304 >500	71	58.7	---

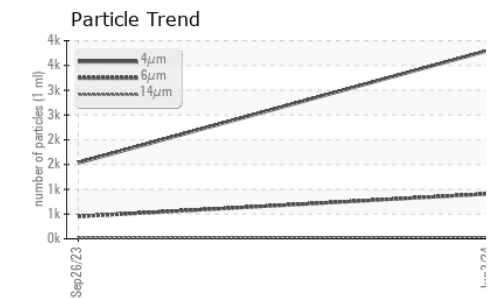
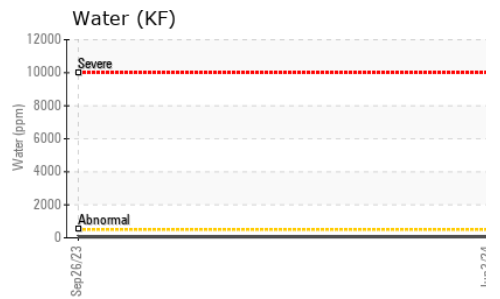
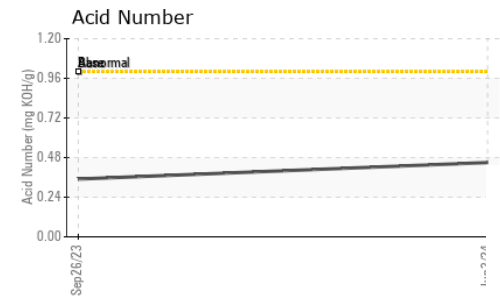
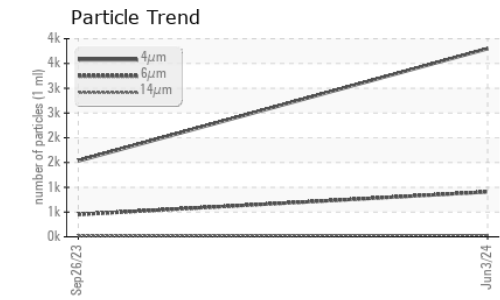
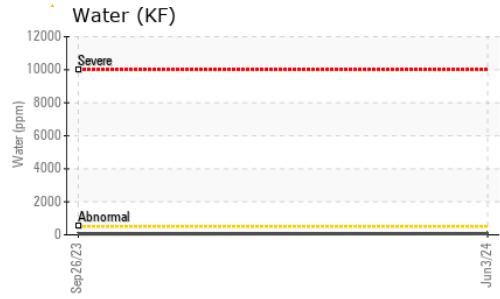
FLUID CLEANLINESS

	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647		3800	1532	---
Particles >6µm	ASTM D7647	>1300	908	450	---
Particles >14µm	ASTM D7647	>80	35	17	---
Particles >21µm	ASTM D7647	>20	6	4	---
Particles >38µm	ASTM D7647	>4	0	0	---
Particles >71µm	ASTM D7647	>3	0	0	---
Oil Cleanliness	ISO 4406 (c)	>--/17/13	19/17/12	18/16/11	---

FLUID DEGRADATION

	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045 1.0	0.45	0.35	---

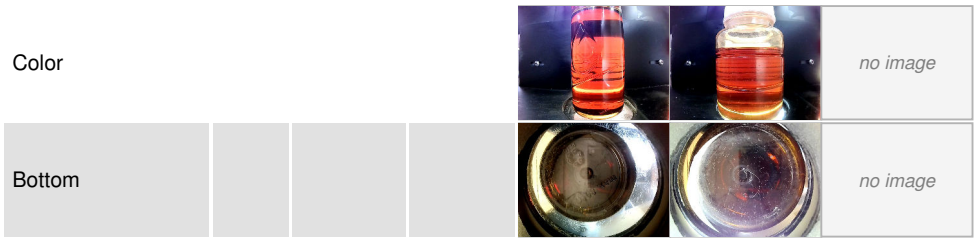
OIL ANALYSIS REPORT



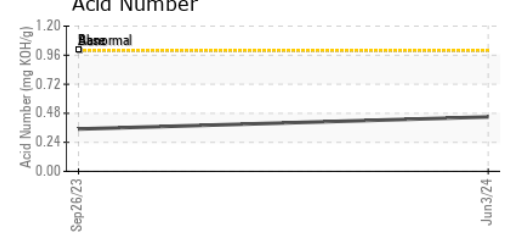
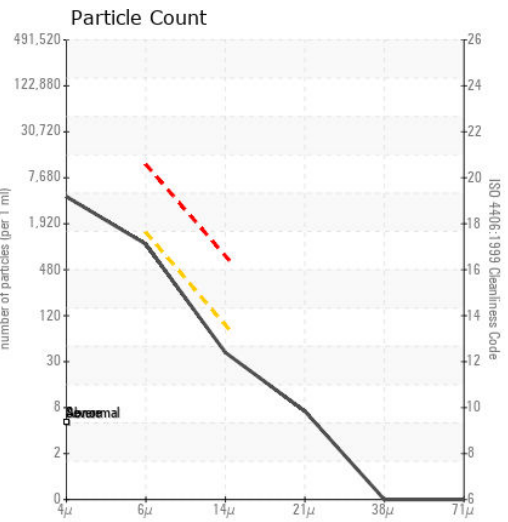
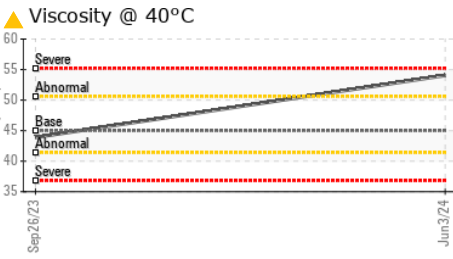
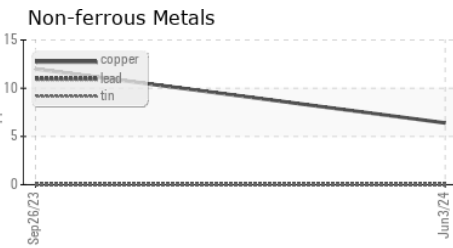
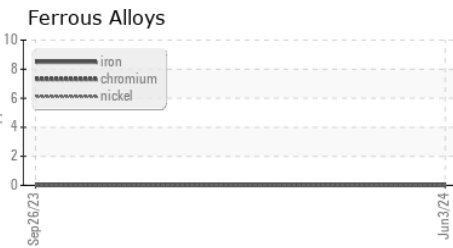
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	---
Yellow Metal	scalar	*Visual	NONE	NONE	---
Precipitate	scalar	*Visual	NONE	NONE	---
Silt	scalar	*Visual	NONE	NONE	---
Debris	scalar	*Visual	NONE	NONE	---
Sand/Dirt	scalar	*Visual	NONE	NONE	---
Appearance	scalar	*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	▲ 54.05	43.9

SAMPLE IMAGES	method	limit/base	current	history1	history2
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GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : KC129384
Lab Number : 06202064
Unique Number : 11069525
Test Package : IND 2
Received : 06 Jun 2024
Tested : 13 Jun 2024
Diagnosed : 18 Jun 2024 - Jonathan Hester

ALCON RESEARCH LLC
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 BELMONT, CA
 US 94002
 Contact: MICHAEL GOTTESMAN
 MICHAEL.GOTTESMAN@ALCON.COM

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)