WEAR CONTAMINATION FLUID CONDITION

ABNORMAL

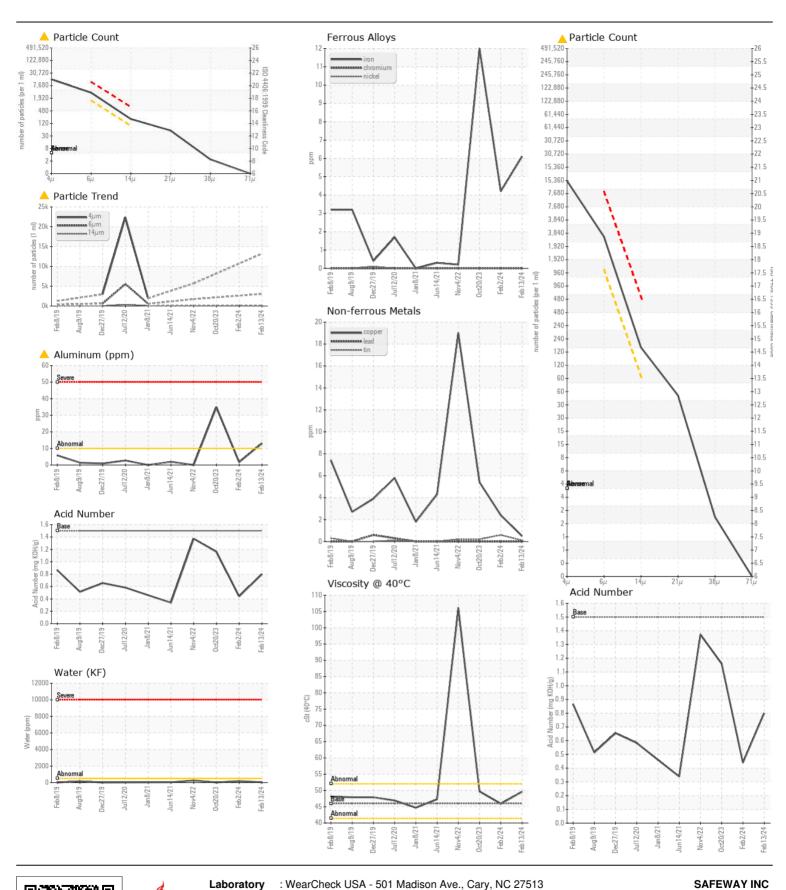
ABNORMAL

NORMAL

Machine Id

## KAESER CSD 100S 6134144 (S/N 1183)

Component Compressor Fluid							
KAESER SIGMA (OEM) FG-460 ( GAL)							
RECOMMENDATION	Test	UOM	Method	Limit/Abn	Current	History1	History2
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.	Sample Number		Client Info		KCPA010685	KCP42491	KCPA000133
	Sample Date		Client Info		13 Feb 2024	02 Feb 2024	20 Oct 2023
	Machine Age	hrs	Client Info		46448	46448	43925
	Oil Age	hrs	Client Info		0	0	0
	Filter Age	hrs	Client Info		0	0	0
	Oil Changed		Client Info		N/A	Changed	N/A
	Filter Changed		Client Info		Changed	Changed	Changed
	Sample Status				ABNORMAL	ABNORMAL	ABNORMAL
WEAR	Iron	ppm	ASTM D5185m	>50	6	4	12
	Chromium	ppm	ASTM D5185m	>10	0	0	0
The copper level has decreased, but is still abnormal. All other component wear rates are normal.	Nickel	ppm	ASTM D5185m	>3	0	0	0
	Titanium	ppm	ASTM D5185m	>3	0	0	0
	Silver	ppm	ASTM D5185m	>2	0	0	0
	Aluminum	ppm	ASTM D5185m	>10	<u> </u>	2	<b>△</b> 35
	Lead	ppm	ASTM D5185m	>10	0	0	0
	Copper	ppm	ASTM D5185m	>50	<1	2	5
	Tin	ppm	ASTM D5185m	>10	<1	<1	<1
	Vanadium	ppm	ASTM D5185m		0	0	0
	White Metal	scalar	*Visual	NONE	NONE	MODER	NONE
	Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
CONTAMINATION	Silicon	ppm	ASTM D5185m	>25	0	0	<1
There is a high amount of particulates present in the oil.	Potassium	ppm	ASTM D5185m	>20	0	4	2
	Water	%	ASTM D6304	>0.05	0.004	0.019	0.003
	ppm Water	ppm	ASTM D6304	>500	42	192	25.8
	Particles >4μm		ASTM D7647		13213		
	Particles >6μm		ASTM D7647		<b>△</b> 3052		
	Particles >14μm		ASTM D7647		<u> </u>		
	Particles >21µm		ASTM D7647		<b>48</b>		
	Particles >38µm		ASTM D7647		2		
	Particles >71μm		ASTM D7647		0		
	Oil Cleanliness		ISO 4406 (c)		21/19/15		
	Silt	scalar	*Visual	NONE	NONE	NONE	NONE
	Debris	scalar	*Visual	NONE	LIGHT	▲ MODER	▲ MODER
	Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
	Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
	Odor Emulsified Water	scalar scalar	*Visual *Visual	NORML >0.05	NORML NEG	NORML NEG	NORML NEG
ELUID CONDITION	Sodium		ASTM D5185m				
FLUID CONDITION		ppm	ASTM D5185m		<1 0	15	1
The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.	Boron	ppm			0	0	0
	Barium Molybdenum	ppm	ASTM D5185m ASTM D5185m		0	27	0
	,	ppm	ASTM D5185m		0	0	<1
	Manganese Magnesium	ppm	ASTM D5165III		<1	51	2
	Calcium	ppm	ASTM D5185m		0	0	<1
	Phosphorus	ppm	ASTM D5185m	500	264	25	419
	Zinc	ppm	ASTM D5185m	300	91	7	172
	Sulfur	ppm	ASTM D5185m		1558	16043	1886
	Acid Number (AN)	mg KOH/g	ASTM D8045	1.5	0.80	0.44	1.16
	Visc @ 40°C	cSt	ASTM D445		49.6	45.9	49.7
	1.55 @ 10 0	001			.5.0		.5.7





Lab Number

Laboratory Sample No.

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : KCPA010685

Received : 06088771

**Tested** Unique Number : 10876216 Diagnosed

Test Package : IND 2 ( Additional Tests: KF, PrtCount ) 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.

: 15 Feb 2024 : 15 Feb 2024 - Don Baldridge

: 14 Feb 2024

Contact: JEANNE WOLTER jeanne.wolter@safeway.com T:

F: Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)

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