

OIL ANALYSIS REPORT

Sample Rating Trend VISCOSITY

2590712 (S/N 1100) Component

Compressor

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

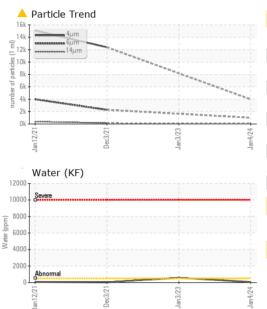
Sample Date Client Info 04 Jan 2024 03 Jan 2023 03 Dec 20 Machine Age hrs Client Info 26723 25966 24759 Oil Age hrs Client Info N/A Changed Changed Sample Status Client Info N/A ABNORMAL ABNORMAL ABNORMAL WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D585m >10 <1 0 0 Nickel ppm ASTM D585m >3 0 <1 0 0 Aluminum ppm ASTM D585m >3 <1 0 0 0 Aluminum ppm ASTM D585m >10 0	SAMPLE INFORM	IATION	method	limit/base	current	history1	history2
Sample Date Info 04 Jan 2024 03 Jan 2023 03 Dec 20 Machine Age hrs Client Info 26723 25966 24759 Oil Age hrs Client Info N/A Changed Changed Sample Status Client Info N/A ABNORMAL ABNORMAL ABNORMAL WEAR METALS method imit/base current history1 history1 Iron ppm ASTM D5185m >50 0 0 3 Iron ppm ASTM D5185m >3 -1 0 0 Nickel ppm ASTM D5185m >3 -1 0 0 Aluminum ppm ASTM D5185m >10 0 0 0 Capper ppm ASTM D5185m >10 0 0 0 Autiminum ppm ASTM D5185m 0 0 0 0 Autiminum ppm ASTM D5185m 0 0 0 0 <t< td=""><td>Sample Number</td><td></td><td>Client Info</td><td></td><th>KCPA010679</th><td>KCP40354D</td><td>KCP39314</td></t<>	Sample Number		Client Info		KCPA010679	KCP40354D	KCP39314
Oil Age hrs Client Info 0 1207 20537 Oil Changed Client Info N/A ABNORMAL ABNORMAL ABNORMAL ABNORMAL WEAR METALS method limibbase current history1 history1 Iron ppm ASTM D5185m >50 0 0 3 Chromium ppm ASTM D5185m >3 0 <1	Sample Date		Client Info		04 Jan 2024	03 Jan 2023	03 Dec 2021
Oil Changed Client Info N/A Changed Changed Changed ABNORMAL	Machine Age	hrs	Client Info		26723	25966	24759
Sample Status method limit/base current history1 ABNORMAL ABNORMAL	Oil Age	hrs	Client Info		0	1207	20537
WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5165m >50 0 0 3 Chromium ppm ASTM D5165m >3 <1	Oil Changed		Client Info		N/A	Changed	Changed
Iron ppm ASTM D5185m >50 0 0 3 Chromium ppm ASTM D5185m >3 0 <1	Sample Status				ABNORMAL	ABNORMAL	ABNORMAL
Chromium ppm ASTM D5185m >10 <1	WEAR METALS		method	limit/base	current	history1	history2
Nickel ppm ASTM D5185m >3 0 <1 0 Titanium ppm ASTM D5185m >3 <1	Iron	ppm	ASTM D5185m	>50	0	0	3
Titanium ppm ASTM D5185m >3 <1 0 0 Silver ppm ASTM D5185m >2 0 0 0 Aluminum ppm ASTM D5185m >10 2 0 ▲ 15 Lead ppm ASTM D5185m >10 0 0 0 0 Copper ppm ASTM D5185m >10 0 0 0 0 Antimony ppm ASTM D5185m >10 0 0 0 0 Cadadium ppm ASTM D5185m 0 0 0 0 0 Addium ppm ASTM D5185m 0 0 0 0 0 Barium ppm ASTM D5185m 0	Chromium	ppm	ASTM D5185m	>10	<1	0	0
Silver ppm ASTM D5185m >2 0 0 0 Aluminum ppm ASTM D5185m >10 2 0 ▲ 15 Lead ppm ASTM D5185m >10 0 0 0 0 Copper ppm ASTM D5185m >10 0 0 0 0 Antimony ppm ASTM D5185m 0 0 0 0 0 Vanadium ppm ASTM D5185m 0 0 0 0 0 Actimony ppm ASTM D5185m 0 0 0 0 0 Additium ppm ASTM D5185m 90 0	Nickel	ppm	ASTM D5185m	>3	0	<1	0
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Molybdenum ppm ASTM D5185m 0 0 0 Manganese ppm ASTM D5185m 90 <1	Barium		ASTM D5185m	90	0	22	0
Manganese ppm ASTM D5185m 0 <1 34 2 Calcium ppm ASTM D5185m 2 0 0 0 Phosphorus ppm ASTM D5185m 2 0 0 0 Phosphorus ppm ASTM D5185m 25 46 402 Zinc ppm ASTM D5185m 3 4 329 Sulfur ppm ASTM D5185m 3 4 329 Sulfur ppm ASTM D5185m 3 4 329 Solicon ppm ASTM D5185m 25 0 <1	Molybdenum	ppm	ASTM D5185m		0	0	0
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Sulfur ppm ASTM D5185m 13620 17167 1392 CONTAMINANTS method limit/base current history1 history1 Silicon ppm ASTM D5185m >25 0 <1 <1 Sodium ppm ASTM D5185m >20 1 <1 <1 0 Sodium ppm ASTM D5185m >20 1 <1 0 Potassium ppm ASTM D5185m >20 1 <1 0 Water % ASTM D6304 >0.05 0.0066 0.058 0.003 ppm Water ppm ASTM D6304 >500 62 585.3 32.5 FLUID CLEANLINESS method limit/base current history1 history1 Particles >4µm ASTM D7647 >1300 1009 42881 Particles >14µm ASTM D7647 >20 37 43 Particles >38µm ASTM D7647	Phosphorus	ppm	ASTM D5185m		55	46	402
CONTAMINANTS method limit/base current history1 history1 Silicon ppm ASTM D5185m >25 0 <1	Zinc	ppm	ASTM D5185m		3	4	329
Silicon ppm ASTM D5185m >25 0 <1	Sulfur	ppm	ASTM D5185m		13620	17167	1392
Sodium ppm ASTM D5185m 0 <1	CONTAMINANTS		method	limit/base	current	history1	history2
Sodium ppm ASTM D5185m 0 <1 3 Potassium ppm ASTM D5185m >20 1 <1	Silicon	ppm	ASTM D5185m	>25	0	<1	<1
Potassium ppm ASTM D5185m >20 1 <1 0 Water % ASTM D6304 >0.05 0.006 ▲ 0.058 0.003 ppm Water ppm ASTM D6304 >500 62 ▲ 585.3 32.5 FLUID CLEANLINESS method limit/base current history1 history1 Particles >4µm ASTM D7647 3979 12387 Particles >6µm ASTM D7647 >1300 1009 2281 Particles >14µm ASTM D7647 >80 101 ▲ 145 Particles >21µm ASTM D7647 >20 ▲ 37 ▲ 43 Particles >38µm ASTM D7647 >4 3 Particles >71µm ASTM D7647 >3 0 0 Oil Cleanliness ISO 4406 (c) >/17/13 19/17/14 18/14	Sodium		ASTM D5185m			<1	3
Water % ASTM D6304 >0.05 0.006 ▲ 0.058 0.003 ppm Water ppm ASTM D6304 >500 62 ▲ 585.3 32.5 FLUID CLEANLINESS method limit/base current history1 history1 Particles >4µm ASTM D7647 3979 12387 Particles >6µm ASTM D7647 >1300 1009 4 2281 Particles >14µm ASTM D7647 >80 ▲ 101 ▲ 145 Particles >21µm ASTM D7647 >20 ▲ 37 ▲ 43 Particles >38µm ASTM D7647 >4 4 3 Particles >71µm ASTM D7647 >3 0 0 Oil Cleanliness ISO 4406 (c) >/17/13 ▲ 19/17/14 ▲ 18/14				>20	-		
ppm Water ppm ASTM D6304 >500 62 ▲ 585.3 32.5 FLUID CLEANLINESS method limit/base current history1 history1 Particles >4µm ASTM D7647 3979 12387 Particles >6µm ASTM D7647 >1300 1009 4 2281 Particles >14µm ASTM D7647 >80 101 4 43 Particles >21µm ASTM D7647 >20 377 4 43 Particles >38µm ASTM D7647 >4 4 3 Particles >38µm ASTM D7647 >4 4 3 Particles >71µm ASTM D7647 >3 0 4 18/14 FLUID DEGRADATION method limit/base current history1 history1	Water		ASTM D6304	>0.05			0.003
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Particles >14µm ASTM D7647 >80 ▲ 101 ▲ 145 Particles >21µm ASTM D7647 >20 ▲ 37 ▲ 43 Particles >38µm ASTM D7647 >4 4 3 Particles >71µm ASTM D7647 >3 0 0 Oil Cleanliness ISO 4406 (c) >/17/13 ▲ 19/17/14 ▲ 18/14 FLUID DEGRADATION method limit/base current history1 history1	Particles >4µm		ASTM D7647		3979		12387
Particles >14µm ASTM D7647 >80 ▲ 101 ▲ 145 Particles >21µm ASTM D7647 >20 ▲ 37 ▲ 43 Particles >38µm ASTM D7647 >4 4 3 Particles >71µm ASTM D7647 >3 0 0 Oil Cleanliness ISO 4406 (c) >/17/13 ▲ 19/17/14 ▲ 18/14 FLUID DEGRADATION method limit/base current history1 history1	Particles >6µm		ASTM D7647	>1300	1009		2281
Particles >38μm ASTM D7647 >4 4 3 Particles >71μm ASTM D7647 >3 0 0 Oil Cleanliness ISO 4406 (c) >/17/13 ▲ 19/17/14 ▲ 18/14 FLUID DEGRADATION method limit/base current history1 history1			ASTM D7647	>80	1 01		1 45
Particles >38μm ASTM D7647 >4 4 3 Particles >71μm ASTM D7647 >3 0 0 Oil Cleanliness ISO 4406 (c) >/17/13 ▲ 19/17/14 ▲ 18/14 FLUID DEGRADATION method limit/base current history1 history1	Particles >21µm		ASTM D7647	>20	3 7		4 3
Oil Cleanliness ISO 4406 (c) >/17/13 ▲ 19/17/14 ▲ 18/14 FLUID DEGRADATION method limit/base current history1 history1	Particles >38µm		ASTM D7647	>4	4		3
FLUID DEGRADATION method limit/base current history1 history			ASTM D7647	>3	0		0
	Oil Cleanliness		ISO 4406 (c)	>/17/13	19/17/14		▲ 18/14
	FLUID DEGRADA	TION	method	limit/base	current	history1	history2
Acid Number (AN) mg KOH/g ASTM D8045 0.4 0.35 0.36 0.898	Acid Number (AN)	mg KOH/g	ASTM D8045	0.4	0.35	0.36	0.898

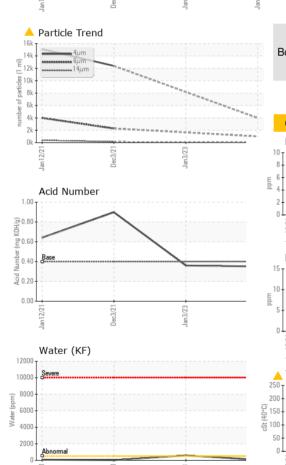
Report Id: BLANEWNC [WUSCAR] 06058733 (Generated: 01/16/2024 14:43:47) Rev: 1

Contact/Location: AMBER ? - BLANEWNC

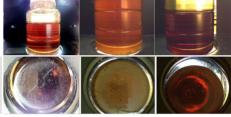


OIL ANALYSIS REPORT





VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	LIGHT	NONE	NONE
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	A MODER	LIGHT
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 PROPERT	IES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	46	4 54.51	50.8	▲ 75.3
SAMPLE IMAGES		method	limit/base	current	history1	history2
Color				a.		



Bottom

