

KAESER COMPRESSORS Built for a lifetime."

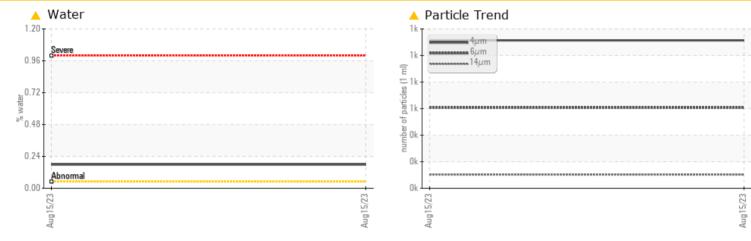
Sample Rating Trend WATER

KAESER 7624277 (S/N 1323)

Compressor

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

COMPONENT CONDITION SUMMARY



RECOMMENDATION

The filter change at the time of sampling has been noted. We advise that you stop the unit and follow the water drain-off procedure for this component. We recommend an early resample in 500 hours to monitor this condition.

PROBLEMATIC TEST RESULTS

| Sample Status | | | | ABNORMAL | | | |
|-----------------|--------|--------------|---------|-------------------|--|--|--|
| Water | % | ASTM D6304 | >0.05 | A 0.179 | | | |
| ppm Water | ppm | ASTM D6304 | >500 | <u> </u> | | | |
| Particles >14µm | | ASTM D7647 | >80 | <u> </u> | | | |
| Particles >21µm | | ASTM D7647 | >20 | A 35 | | | |
| Particles >38µm | | ASTM D7647 | >4 | <u> </u> | | | |
| Oil Cleanliness | | ISO 4406 (c) | >/17/13 | A 17/16/14 | | | |
| Appearance | scalar | *Visual | NORML | 🔺 HAZY | | | |

Customer Id: NEWBUF Sample No.: KCPA006766 Lab Number: 05928797 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 <u>jhester@wearcheckusa.com</u>

To change component or sample information: Customer Service +1 1-800-237-1369 <u>customerservice@wearcheck.com</u> There are no recommended actions for this sample.

HISTORICAL DIAGNOSIS



OIL ANALYSIS REPORT



KAESER 7624277 (S/N 1323)

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

DIAGNOSIS

Recommendation

The filter change at the time of sampling has been noted. We advise that you stop the unit and follow the water drain-off procedure for this component. We recommend an early resample in 500 hours to monitor this condition.

Wear

All component wear rates are normal.

Contamination

Appearance is hazy. There is a moderate amount of particulates present in the oil. There is a light concentration of water present in the oil.

Fluid Condition

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

| Oil Age Oil Changed Sample Status WEAR METALS Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium | hrs hrs ppm ppm ppm ppm ppm ppm ppm ppm | Client Info Client Info Client Info Client Info Client Info Client Info ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | limit/base >50 >10 >3 | KCPA006766 15 Aug 2023 1446 0 N/A ABNORMAL 2 | history1 | history2 |
|--|--|---|--------------------------------|--|--------------------------|--------------------------|
| Machine Age Oil Age Oil Changed Sample Status WEAR METALS Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | hrs ppm ppm ppm ppm ppm ppm ppm ppm | Client Info Client Info Client Info Client Info ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | 1446 0 N/A ABNORMAL current | history1 | history2 |
| Oil Age Oil Changed Sample Status WEAR METALS Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | hrs ppm ppm ppm ppm ppm ppm ppm ppm | Client Info Client Info Method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | 0 N/A ABNORMAL current | history1 | history2 |
| Oil Changed Sample Status WEAR METALS Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm ppm ppm | Client Info method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | N/A ABNORMAL current | history1 | history2 |
| Oil Changed Sample Status WEAR METALS Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm | Method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | ABNORMAL | history1 | history2 |
| Sample Status WEAR METALS Iron Chromium Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm | ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | current | history1 | history2 |
| WEAR METALS Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm | ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | | | |
| Iron Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm | ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >50 >10 >3 | | | |
| Chromium Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm | ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m | >10 >3 | 2 | | |
| Nickel Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm ppm | ASTM D5185m ASTM D5185m ASTM D5185m | >3 | 0 | | |
| Titanium Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm ppm | ASTM D5185m ASTM D5185m | | 0 | | |
| Silver Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm ppm | ASTM D5185m | . 0 | 0 | | |
| Aluminum Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm ppm | | >3 | - | | |
| Lead Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm ppm | | >2 | 0 | | |
| Copper Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm | | >10 | 2 | | |
| Tin Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | • • | ASTM D5185m | >10 | <1 | | |
| Vanadium Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | nnm | | >50 | 7 | | |
| Cadmium ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm | ASTM D5185m | >10 | 0 | | |
| ADDITIVES Boron Barium Molybdenum Manganese Magnesium Calcium | ppm | ASTM D5185m | | 0 | | |
| Boron Barium Molybdenum Manganese Magnesium Calcium | ppm | ASTM D5185m | | 0 | | |
| Barium Molybdenum Manganese Magnesium Calcium | | method | limit/base | current | history1 | history2 |
| Molybdenum Manganese Magnesium Calcium | ppm | ASTM D5185m | 0 | 0 | | |
| Manganese Magnesium Calcium | ppm | ASTM D5185m | 90 | 0 | | |
| Magnesium Calcium | ppm | ASTM D5185m | 0 | 0 | | |
| Magnesium Calcium | ppm | ASTM D5185m | | <1 | | |
| Calcium | ppm | ASTM D5185m | 100 | 11 | | |
| | ppm | ASTM D5185m | 0 | <1 | | |
| | ppm | ASTM D5185m | 0 | 2 | | |
| Zinc | ppm | ASTM D5185m | 0 | 107 | | |
| | ppm | ASTM D5185m | 23500 | 19496 | | |
| CONTAMINANTS | | method | limit/base | current | history1 | history2 |
| Silicon | ppm | ASTM D5185m | >25 | <1 | | |
| | ppm | ASTM D5185m | | 2 | | |
| | ppm | ASTM D5185m | >20 | 4 | | |
| | % | ASTM D6304 | | 0.179 | | |
| | ppm | | >500 | ▲ 1790 | | |
| FLUID CLEANLINE | ESS | method | limit/base | current | history1 | history2 |
| Particles >4µm | | ASTM D7647 | | 1114 | | |
| Particles >6µm | | ASTM D7647 | >1300 | 607 | | |
| Particles >14µm | | ASTM D7647 | >80 | 1 03 | | |
| Particles >21µm | | ASTM D7647 | | ▲ 35 | | |
| Particles >38µm | | ASTM D7647 | >4 | _ 00 ▲ 5 | | |
| Particles >71µm | | ASTM D7647 | | 1 | | |
| Oil Cleanliness | | ISO 4406 (c) | >/17/13 | ▲ 17/16/14 | | |
| FLUID DEGRADAT | | method | limit/base | current | history1 | history2 |
| Acid Number (AN) | | ASTM D8045 | 1.0 | 0.32 | motory | - History2 |



OIL ANALYSIS REPORT

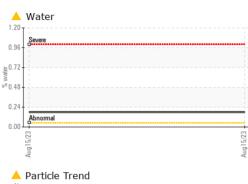
scalar

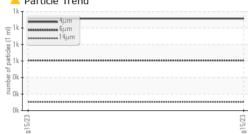
method

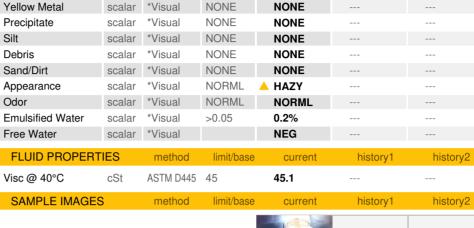
*Visual

VISUAL

White Metal







limit/base

NONE

current

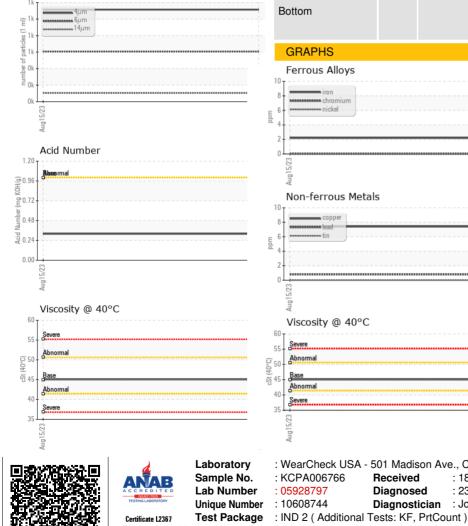
NONE

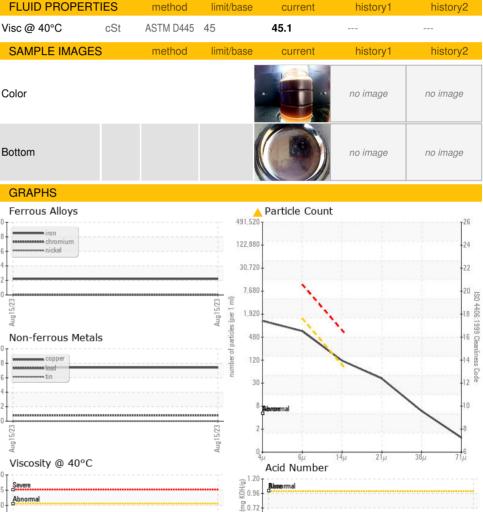
history1

history2









- e 0.48

0.00

Aug1

Acid Nu 0.24

Aug15/23

: 18 Aug 2023

: 23 Aug 2023

Diagnostician : Jonathan Hester

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.

: KCPA006766

: 05928797

60

55

40

35

Base

Seve

Aug 1

Abnorma

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

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

Received

Diagnosed

NEW BERN TRANSPORT/PEPSI CO

2770 WALDEN AVE

Contact: Service Manager

BUFFALO, NY

US 14225