



OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	ABNORMAL
FLUID CONDITION	NORMAL

Machine Id  
**MCQUAY VA MEDICAL CENTER CHILLER 1 (S/N STNU110700045)**

Component  
**Refrigeration Compressor**

Fluid  
**EMKARATE RL 32H (--- GAL)**

**RECOMMENDATION**

No corrective action is recommended at this time. Resample at the next service interval to monitor.

**WEAR**

All component wear rates are normal.

**CONTAMINATION**

There is a trace of moisture present in the oil. Elemental level of silicon (Si) above normal.

**FLUID CONDITION**

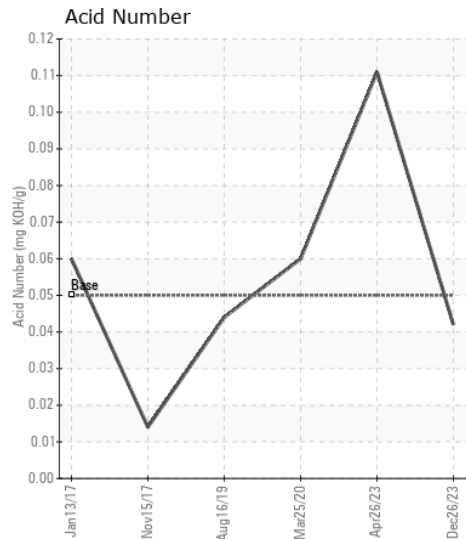
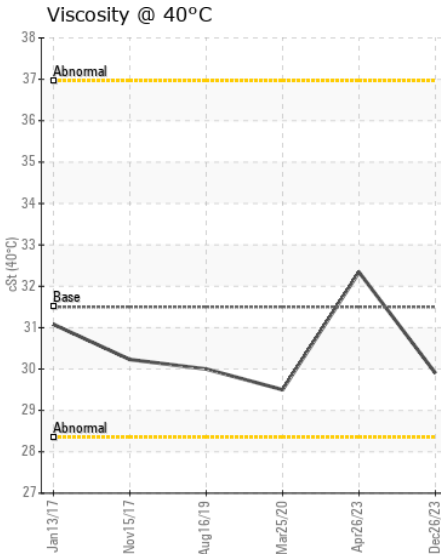
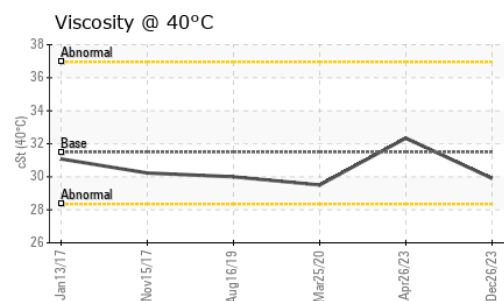
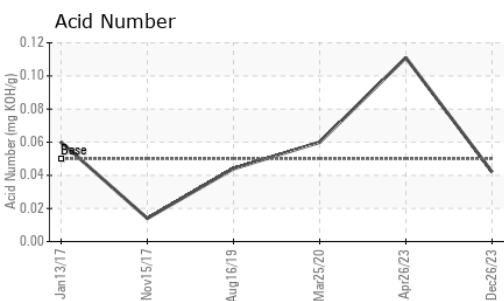
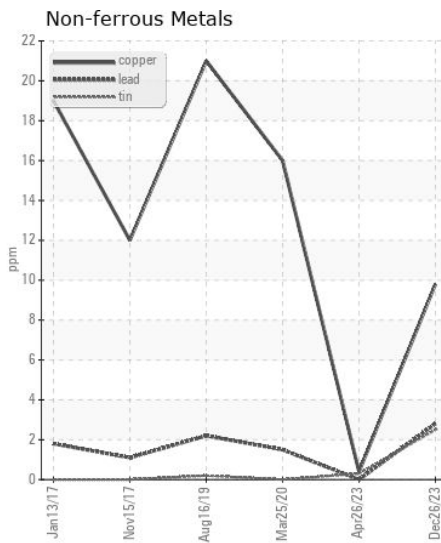
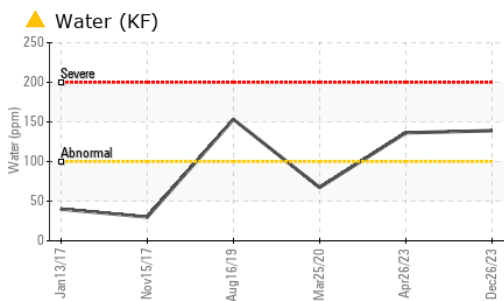
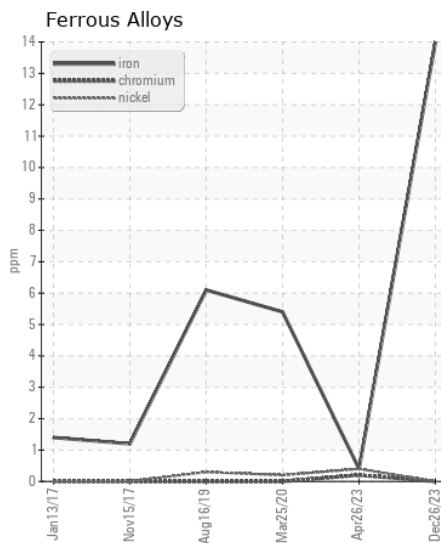
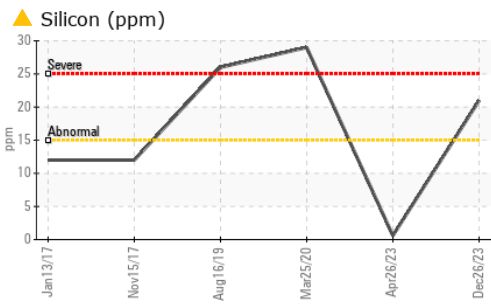
The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>WC0814472</b>	WCI2277797	WCI2309363
Sample Date		Client Info		<b>26 Dec 2023</b>	26 Apr 2023	25 Mar 2020
Machine Age	hrs	Client Info		<b>17800</b>	0	0
Oil Age	hrs	Client Info		<b>0</b>	3	0
Filter Age	hrs	Client Info		<b>0</b>	3	3
Oil Changed		Client Info		<b>Not Changd</b>	Not Changd	N/A
Filter Changed		Client Info		<b>Not Changd</b>	Not Changd	Not Changd
Sample Status				<b>ABNORMAL</b>	MARGINAL	ABNORMAL

Iron	ppm	ASTM D5185m	>8	<b>14</b>	<1	5
Chromium	ppm	ASTM D5185m	>2	<b>0</b>	<1	0
Nickel	ppm	ASTM D5185m		<b>0</b>	<1	<1
Titanium	ppm	ASTM D5185m		<b>0</b>	0	0
Silver	ppm	ASTM D5185m	>2	<b>0</b>	<1	0
Aluminum	ppm	ASTM D5185m	>3	<b>&lt;1</b>	0	<1
Lead	ppm	ASTM D5185m	>2	<b>3</b>	0	2
Copper	ppm	ASTM D5185m	>8	<b>10</b>	<1	16
Tin	ppm	ASTM D5185m	>4	<b>2</b>	<1	0
Vanadium	ppm	ASTM D5185m		<b>0</b>	<1	0
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE

Silicon	ppm	ASTM D5185m	>15	<b>▲ 21</b>	<1	<b>▲ 29</b>
Potassium	ppm	ASTM D5185m	>20	<b>2</b>	<1	0
Water	%	ASTM D6304	>0.01	<b>▲ 0.013</b>	<b>▲ 0.013</b>	0.006
ppm Water	ppm	ASTM D6304	>100	<b>▲ 139</b>	<b>▲ 136.3</b>	67.3
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Appearance	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Odor	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Emulsified Water	scalar	*Visual	>0.01	<b>NEG</b>	NEG	NEG

Sodium	ppm	ASTM D5185m		<b>0</b>	17	<1
Boron	ppm	ASTM D5185m	0	<b>0</b>	4	<1
Barium	ppm	ASTM D5185m	0	<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m	0	<b>0</b>	0	0
Manganese	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Magnesium	ppm	ASTM D5185m	0	<b>0</b>	2	0
Calcium	ppm	ASTM D5185m	0	<b>0</b>	2	0
Phosphorus	ppm	ASTM D5185m	5	<b>4</b>	441	0
Zinc	ppm	ASTM D5185m	10	<b>4</b>	6	8
Sulfur	ppm	ASTM D5185m	50	<b>32</b>	958	32
Acid Number (AN)	mg KOH/g	ASTM D974	.05	<b>0.042</b>	0.111	0.06
Visc @ 40°C	cSt	ASTM D445	31.5	<b>29.9</b>	32.34	29.5



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : WC0814472 **Received** : 10 Jan 2024  
**Lab Number** : 06056766 **Diagnosed** : 11 Jan 2024  
**Unique Number** : 10822715 **Diagnostician** : Don Baldrige  
**Test Package** : IND 2

**DAIKIN APPLIED**  
 5021 HOWERTON WAY SUITE P  
 BOWIE, MD  
 US 20715  
 Contact: ANDREW TURLINGTON  
 andrew.turlington@daikinapplied.com  
 T: (301)735-1440  
 F: (301)735-1838

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)