

# **OIL ANALYSIS REPORT**

Sample Rating Trend



E

Area [GTT224-364] TRANE U04G06636(2) Component Chiller

YORK TYPE H (--- GAL)

### Recommendation

We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition.

#### Wear

The high zinc level and dark color of the oil indicates corrosion.

#### Contamination

There is no indication of any contamination in the oil.

#### Fluid Condition

The AN level is acceptable for this fluid. The oil is no longer serviceable.

SAMPLE INFORM	IATION	method	limit/base	current	history1	history2
Sample Number		Client Info		GTT0002342		
Sample Date		Client Info		01 Apr 2024		
Machine Age	hrs	Client Info		0		
Oil Age	hrs	Client Info		0		
Oil Changed		Client Info		N/A		
Sample Status				ATTENTION		
WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185(m)	>8	7		
Chromium	ppm	ASTM D5185(m)	>2	0		
Nickel	ppm	ASTM D5185(m)		0		
Titanium	ppm	ASTM D5185(m)		0		
Silver	ppm	ASTM D5185(m)	>2	0		
Aluminum	ppm	ASTM D5185(m)	>3	0		
Lead	ppm	ASTM D5185(m)	>2	0		
Copper	ppm	ASTM D5185(m)	>8	4		
Tin	ppm	ASTM D5185(m)	>4	<1		
Antimony	ppm	ASTM D5185(m)		0		
Vanadium	ppm	ASTM D5185(m)		0		
Beryllium	ppm	ASTM D5185(m)		0		
Cadmium	ppm	ASTM D5185(m)		0		
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185(m)	0	6		
Barium	ppm	ASTM D5185(m)	0	0		
Molybdenum	ppm	ASTM D5185(m)	0	0		
Manganese	ppm	ASTM D5185(m)	0	0		
Magnesium	ppm	ASTM D5185(m)	0	<1		
Calcium	ppm	ASTM D5185(m)	0	0		
Phosphorus	ppm	ASTM D5185(m)	10	6		
Zinc	ppm	ASTM D5185(m)	0	<mark> </mark> 43		
Sulfur	ppm	ASTM D5185(m)	35	7		
Lithium	ppm	ASTM D5185(m)		<1		
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>15	7		
Sodium	ppm	ASTM D5185(m)		0		
Potassium	ppm	ASTM D5185(m)	>20	1		
ppm Water	ppm	ASTM D6304*	>300	29		
FLUID DEGRADA	TION	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D974*	0.02	0.13		



## **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				
FLUID PROPERTIES		method	limit/base	current	history1	history2		
Visc @ 40°C	cSt	ASTM D7279(m)	68.0	65.3				
SAMPLE IMAGES		method	limit/base	current	history1	history2		
Color					no image	no image		
Bottom					no image	no image		
GRAPHS								



Lab Number : 02627162 Tested : 10 Apr 2024 : 10 Apr 2024 - Bill Quesnel Unique Number : 5760294 Diagnosed CA M5W 6G9 Test Package : IND 2 (Additional Tests: KV40) Contact: Service Manager To discuss this sample report, contact Customer Service at 1-905-847-9300 Ext 26. aplondon@carmichael-eng.ca Test denoted (\*) outside scope of accreditation, (m) method modified, (e) tested at external lab. Damages: Seller shall in no event be liable for special, incidental, or consequential damages, of a commercial nature, resulting from any cause.

: 05 Apr 2024

Received

Report Id: GTT0000633 [WCAMIS] 02627162 (Generated: 04/10/2024 18:12:02) Rev: 1

Sample No. : GTT0002342

Contact/Location: Service Manager - GTT0000633

Carmichael Engineering Ltd.

Page 2 of 2

T:

F:

2389 Scanlan St

London, ON