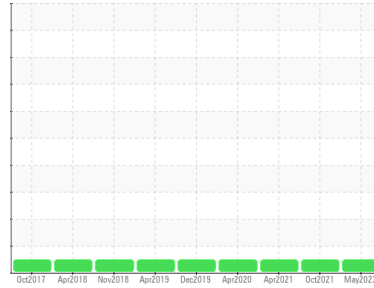




# OIL ANALYSIS REPORT

Sample Rating Trend

**NORMAL**



Area  
**[199031]**  
 Machine Id  
**MRP G TUBR**  
 Component  
**Bearing**  
 Fluid  
**MOBIL DTE OIL HVY MEDIUM (--- GAL)**

## DIAGNOSIS

### Recommendation

Resample at the next service interval to monitor.  
 NOTE: Please provide information regarding reservoir capacity, filter type and micron rating with next sample.

### Wear

All component wear rates are normal.

### Contamination

The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.

### Fluid Condition

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

## SAMPLE INFORMATION

| method        | limit/base  | current            | history1    | history2    |
|---------------|-------------|--------------------|-------------|-------------|
| Sample Number | Client Info | <b>WC0455572</b>   | WC0327922   | WC0316801   |
| Sample Date   | Client Info | <b>10 May 2023</b> | 06 Oct 2021 | 08 Apr 2021 |
| Machine Age   | hrs         | Client Info        | 0           | 0           |
| Oil Age       | hrs         | Client Info        | 0           | 0           |
| Oil Changed   | Client Info | <b>N/A</b>         | N/A         | N/A         |
| Sample Status |             | <b>NORMAL</b>      | NORMAL      | NORMAL      |

## WEAR METALS

| method    | limit/base  | current            | history1     | history2 |
|-----------|-------------|--------------------|--------------|----------|
| PQ        | ASTM D8184* | <b>0</b>           | 0            | 0        |
| Iron      | ppm         | ASTM D5185(m) >63  | <b>&lt;1</b> | <1       |
| Chromium  | ppm         | ASTM D5185(m) >20  | <b>0</b>     | 0        |
| Nickel    | ppm         | ASTM D5185(m) >20  | <b>&lt;1</b> | <1       |
| Titanium  | ppm         | ASTM D5185(m)      | <b>0</b>     | 0        |
| Silver    | ppm         | ASTM D5185(m)      | <b>0</b>     | <1       |
| Aluminum  | ppm         | ASTM D5185(m) >2   | <b>&lt;1</b> | 0        |
| Lead      | ppm         | ASTM D5185(m) >161 | <b>43</b>    | 35       |
| Copper    | ppm         | ASTM D5185(m) >13  | <b>1</b>     | <1       |
| Tin       | ppm         | ASTM D5185(m) >27  | <b>0</b>     | 0        |
| Antimony  | ppm         | ASTM D5185(m)      | <b>&lt;1</b> | <1       |
| Vanadium  | ppm         | ASTM D5185(m)      | <b>0</b>     | 0        |
| Beryllium | ppm         | ASTM D5185(m)      | <b>0</b>     | 0        |
| Cadmium   | ppm         | ASTM D5185(m)      | <b>1</b>     | <1       |

## ADDITIVES

| method     | limit/base | current       | history1     | history2 |
|------------|------------|---------------|--------------|----------|
| Boron      | ppm        | ASTM D5185(m) | <b>0</b>     | <1       |
| Barium     | ppm        | ASTM D5185(m) | <b>0</b>     | 0        |
| Molybdenum | ppm        | ASTM D5185(m) | <b>0</b>     | 0        |
| Manganese  | ppm        | ASTM D5185(m) | <b>0</b>     | 0        |
| Magnesium  | ppm        | ASTM D5185(m) | <b>0</b>     | <1       |
| Calcium    | ppm        | ASTM D5185(m) | <b>0</b>     | <1       |
| Phosphorus | ppm        | ASTM D5185(m) | <b>113</b>   | 106      |
| Zinc       | ppm        | ASTM D5185(m) | <b>45</b>    | 51       |
| Sulfur     | ppm        | ASTM D5185(m) | <b>1931</b>  | 1858     |
| Lithium    | ppm        | ASTM D5185(m) | <b>&lt;1</b> | <1       |

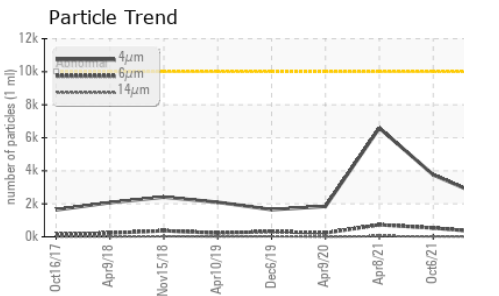
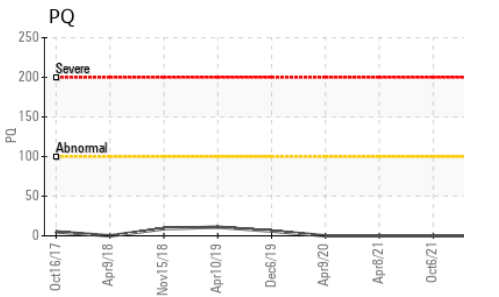
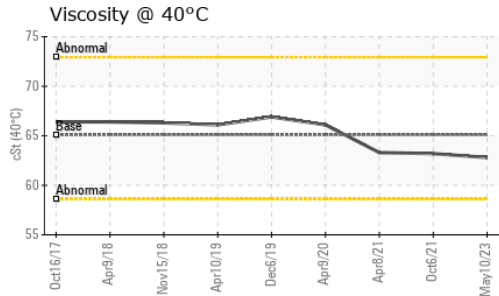
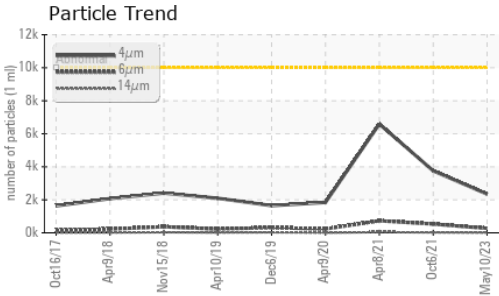
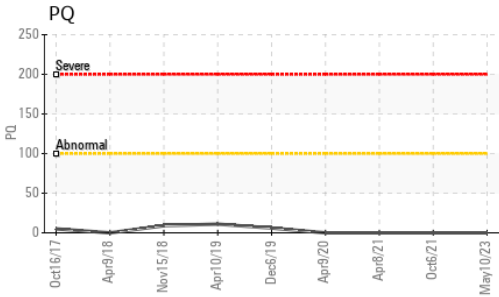
## CONTAMINANTS

| method    | limit/base | current           | history1     | history2 |
|-----------|------------|-------------------|--------------|----------|
| Silicon   | ppm        | ASTM D5185(m) >12 | <b>&lt;1</b> | 1        |
| Sodium    | ppm        | ASTM D5185(m)     | <b>&lt;1</b> | 0        |
| Potassium | ppm        | ASTM D5185(m) >20 | <b>0</b>     | 0        |

## FLUID CLEANLINESS

| method          | limit/base   | current   | history1        | history2 |
|-----------------|--------------|-----------|-----------------|----------|
| Particles >4µm  | ASTM D7647   | >10000    | <b>2346</b>     | 3755     |
| Particles >6µm  | ASTM D7647   | >2500     | <b>271</b>      | 534      |
| Particles >14µm | ASTM D7647   | >160      | <b>13</b>       | 24       |
| Particles >21µm | ASTM D7647   | >40       | <b>5</b>        | 5        |
| Particles >38µm | ASTM D7647   | >10       | <b>0</b>        | 0        |
| Particles >71µm | ASTM D7647   | >3        | <b>0</b>        | 0        |
| Oil Cleanliness | ISO 4406 (c) | >20/18/14 | <b>18/15/11</b> | 19/16/12 |

# OIL ANALYSIS REPORT

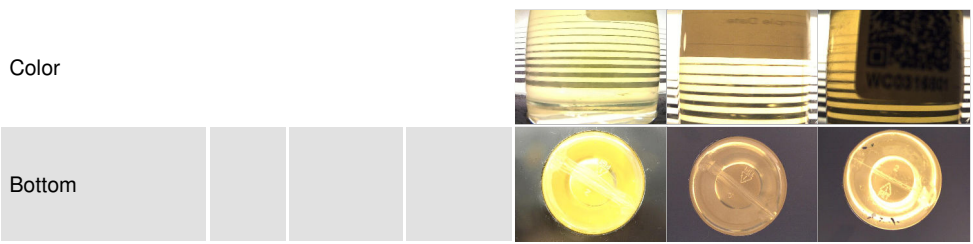


| FLUID DEGRADATION | method   | limit/base | current     | history1 | history2 |
|-------------------|----------|------------|-------------|----------|----------|
| Acid Number (AN)  | mg KOH/g | ASTM D974* | <b>0.10</b> | 0.12     | 0.14     |

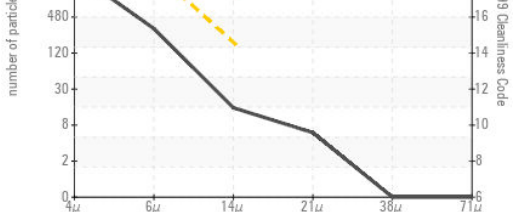
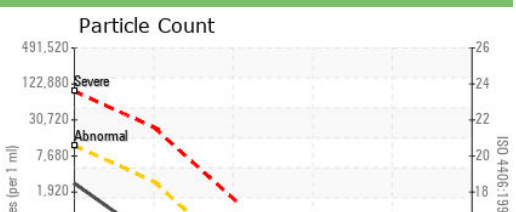
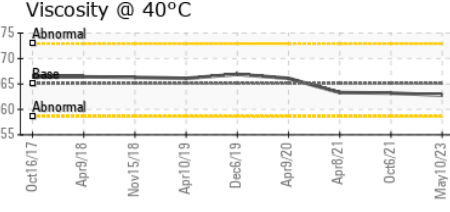
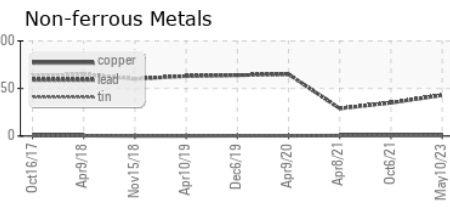
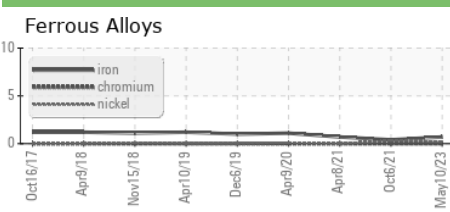
| VISUAL           | method | limit/base | current | history1 | history2 |
|------------------|--------|------------|---------|----------|----------|
| White Metal      | scalar | Visual*    | NONE    | NONE     | NONE     |
| Yellow Metal     | scalar | Visual*    | NONE    | NONE     | NONE     |
| Precipitate      | scalar | Visual*    | NONE    | NONE     | NONE     |
| Silt             | scalar | Visual*    | NONE    | NONE     | NONE     |
| Debris           | scalar | Visual*    | NONE    | NONE     | VLITE    |
| Sand/Dirt        | scalar | Visual*    | NONE    | NONE     | NONE     |
| Appearance       | scalar | Visual*    | NORML   | NORML    | NORML    |
| Odor             | scalar | Visual*    | NORML   | NORML    | NORML    |
| Emulsified Water | scalar | Visual*    | >2      | NEG      | NEG      |
| Free Water       | scalar | Visual*    |         | NEG      | NEG      |

| FLUID PROPERTIES | method | limit/base    | current     | history1 | history2 |
|------------------|--------|---------------|-------------|----------|----------|
| Visc @ 40°C      | cSt    | ASTM D7279(m) | <b>62.8</b> | 63.2     | 63.3     |

| SAMPLE IMAGES | method | limit/base | current | history1 | history2 |
|---------------|--------|------------|---------|----------|----------|
|---------------|--------|------------|---------|----------|----------|



## GRAPHS



**Laboratory** : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9  
**Sample No.** : WC0455572  
**Lab Number** : 02563187  
**Unique Number** : 5592228  
**Test Package** : IND 2 ( Additional Tests: PRTCOUNT, TAN Man )  
**Received** : 09 Jun 2023  
**Diagnosed** : 14 Jun 2023  
**Diagnostician** : Kevin Marson

**NEWFOUNDLAND POWER INC.**  
 50 DUFFY PLACE, PO BOX 8910  
 ST. JOHNS, NL  
 CA A1B 3P6  
 Contact: Paul Martin  
 pmartin@newfoundlandpower.com  
 T: (709)737-2926

To discuss this sample report, contact Customer Service at 1-800-268-2131.  
 Test denoted (\*) outside scope of accreditation, (m) method modified, (e) tested at external lab.  
 Validity of results and interpretation are based on the sample and information as supplied.