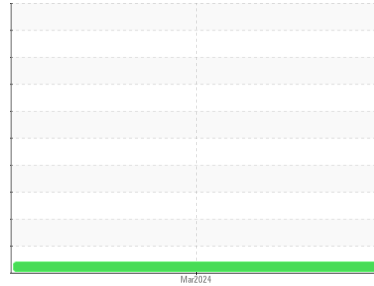


# OIL ANALYSIS REPORT



Area  
**Off-Road**  
Machine Id  
**E453**  
Component  
**Swing Drive**  
Fluid  
**GEAR OIL SAE 80W90 (--- GAL)**

### Sample Rating Trend



### VIS DEBRIS



### DIAGNOSIS

#### ▲ 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

Moderate concentration of visible dirt/debris present in the oil.

#### 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>PCA0090479</b>  | ---      | ---      |
| Sample Date   | Client Info |             | <b>22 Mar 2024</b> | ---      | ---      |
| Machine Age   | hrs         | Client Info | <b>10810</b>       | ---      | ---      |
| Oil Age       | hrs         | Client Info | <b>10810</b>       | ---      | ---      |
| Oil Changed   |             | Client Info | <b>N/A</b>         | ---      | ---      |
| Sample Status |             |             | <b>ABNORMAL</b>    | ---      | ---      |

### CONTAMINATION

|       | method    | limit/base | current    | history1 | history2 |
|-------|-----------|------------|------------|----------|----------|
| Water | WC Method | >0.2       | <b>NEG</b> | ---      | ---      |

### WEAR METALS

|          | method | limit/base       | current      | history1 | history2 |
|----------|--------|------------------|--------------|----------|----------|
| Iron     | ppm    | ASTM D5185m >400 | <b>25</b>    | ---      | ---      |
| Chromium | ppm    | ASTM D5185m >10  | <b>0</b>     | ---      | ---      |
| Nickel   | ppm    | ASTM D5185m >10  | <b>1</b>     | ---      | ---      |
| Titanium | ppm    | ASTM D5185m      | <b>0</b>     | ---      | ---      |
| Silver   | ppm    | ASTM D5185m      | <b>&lt;1</b> | ---      | ---      |
| Aluminum | ppm    | ASTM D5185m >25  | <b>1</b>     | ---      | ---      |
| Lead     | ppm    | ASTM D5185m >50  | <b>&lt;1</b> | ---      | ---      |
| Copper   | ppm    | ASTM D5185m >200 | <b>&lt;1</b> | ---      | ---      |
| Tin      | ppm    | ASTM D5185m >10  | <b>&lt;1</b> | ---      | ---      |
| Vanadium | ppm    | ASTM D5185m      | <b>0</b>     | ---      | ---      |
| Cadmium  | ppm    | ASTM D5185m      | <b>0</b>     | ---      | ---      |

### ADDITIVES

|            | method | limit/base        | current      | history1 | history2 |
|------------|--------|-------------------|--------------|----------|----------|
| Boron      | ppm    | ASTM D5185m 400   | <b>&lt;1</b> | ---      | ---      |
| Barium     | ppm    | ASTM D5185m 200   | <b>&lt;1</b> | ---      | ---      |
| Molybdenum | ppm    | ASTM D5185m 12    | <b>&lt;1</b> | ---      | ---      |
| Manganese  | ppm    | ASTM D5185m       | <b>&lt;1</b> | ---      | ---      |
| Magnesium  | ppm    | ASTM D5185m 12    | <b>11</b>    | ---      | ---      |
| Calcium    | ppm    | ASTM D5185m 150   | <b>36</b>    | ---      | ---      |
| Phosphorus | ppm    | ASTM D5185m 1650  | <b>715</b>   | ---      | ---      |
| Zinc       | ppm    | ASTM D5185m 125   | <b>16</b>    | ---      | ---      |
| Sulfur     | ppm    | ASTM D5185m 22500 | <b>30926</b> | ---      | ---      |

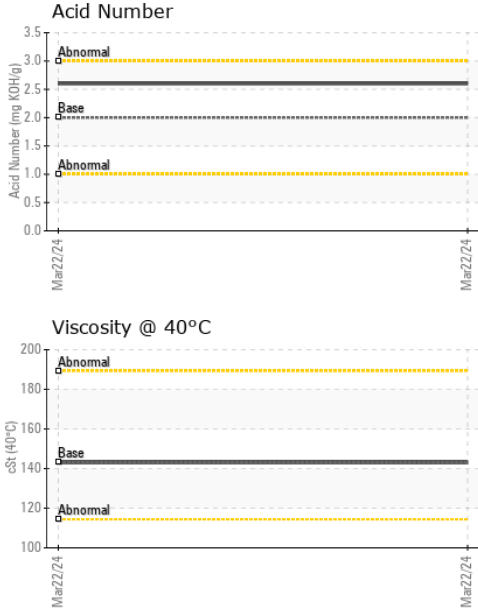
### CONTAMINANTS

|           | method | limit/base       | current  | history1 | history2 |
|-----------|--------|------------------|----------|----------|----------|
| Silicon   | ppm    | ASTM D5185m >50  | <b>2</b> | ---      | ---      |
| Sodium    | ppm    | ASTM D5185m >170 | <b>2</b> | ---      | ---      |
| Potassium | ppm    | ASTM D5185m >20  | <b>6</b> | ---      | ---      |

### FLUID DEGRADATION

|                  | method   | limit/base      | current     | history1 | history2 |
|------------------|----------|-----------------|-------------|----------|----------|
| Acid Number (AN) | mg KOH/g | ASTM D8045 2.00 | <b>2.60</b> | ---      | ---      |

# OIL ANALYSIS REPORT

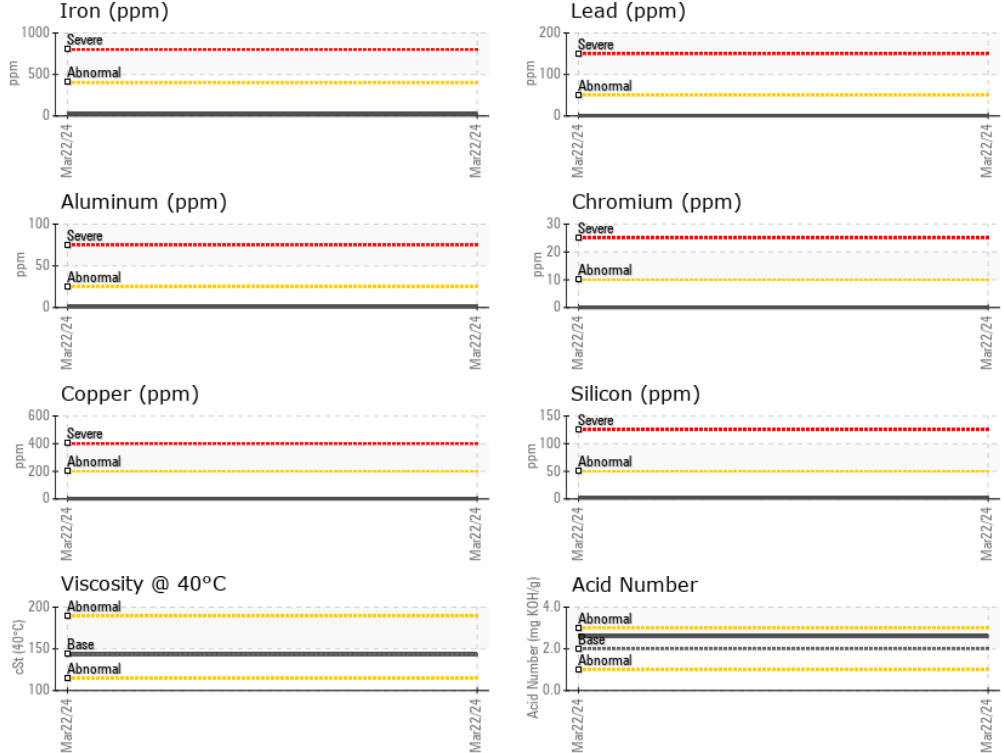


| VISUAL           | method | limit/base | current | history1 | history2 |
|------------------|--------|------------|---------|----------|----------|
| White Metal      | scalar | *Visual    | NONE    | NONE     | ---      |
| Yellow Metal     | scalar | *Visual    | NONE    | NONE     | ---      |
| Precipitate      | scalar | *Visual    | NONE    | NONE     | ---      |
| Silt             | scalar | *Visual    | NONE    | NONE     | ---      |
| Debris           | scalar | *Visual    | NONE    | ▲ MODER  | ---      |
| Sand/Dirt        | scalar | *Visual    | NONE    | NONE     | ---      |
| Appearance       | scalar | *Visual    | NORML   | NORML    | ---      |
| Odor             | scalar | *Visual    | NORML   | NORML    | ---      |
| Emulsified Water | scalar | *Visual    | >0.2    | NEG      | ---      |
| Free Water       | scalar | *Visual    |         | NEG      | ---      |

| FLUID PROPERTIES | method | limit/base | current | history1 | history2 |
|------------------|--------|------------|---------|----------|----------|
| Visc @ 40°C      | cSt    | ASTM D445  | 143     | ---      | ---      |

| SAMPLE IMAGES | method | limit/base | current | history1 | history2 |
|---------------|--------|------------|---------|----------|----------|
| Color         |        |            |         | no image | no image |
| Bottom        |        |            |         | no image | no image |

## GRAPHS



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PCA0090479  
**Lab Number** : 06129523  
**Unique Number** : 10943674  
**Test Package** : MOB 2  
**Received** : 26 Mar 2024  
**Tested** : 27 Mar 2024  
**Diagnosed** : 29 Mar 2024 - Don Baldrige

**WIN Waste Innovations - Shop # - Taunton**  
 565 WINTHROP ST  
 TAUNTON, MA  
 US 02780  
 Contact: Dave Wilson  
 dwilson@win-waste.com

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)

T:  
F: