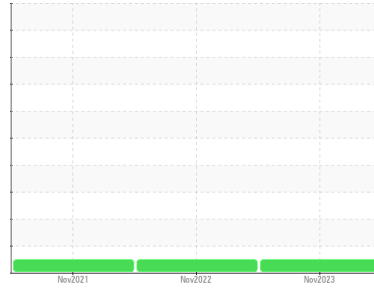




# OIL ANALYSIS REPORT

Sample Rating Trend



**NORMAL**



Machine Id  
**RG2.2**  
 Component  
**Reduction Gear**  
 Fluid  
**{not provided} (--- 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. Please specify the brand, type, and viscosity of the oil on your next sample.

### Wear

All component wear rates are normal.

### Contamination

There is no indication of any contamination 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>KFS0004114</b>  | KFS0002772  | KFS0000381  |
| Sample Date   | Client Info |             | <b>17 Nov 2023</b> | 10 Nov 2022 | 11 Nov 2021 |
| Machine Age   | hrs         | Client Info | <b>0</b>           | 0           | 0           |
| Oil Age       | hrs         | Client Info | <b>0</b>           | 0           | 0           |
| Oil Changed   | Client Info |             | <b>N/A</b>         | N/A         | N/A         |
| Sample Status |             |             | <b>NORMAL</b>      | NORMAL      | NORMAL      |

## CONTAMINATION

|       | method    | limit/base | current    | history1 | history2 |
|-------|-----------|------------|------------|----------|----------|
| Water | WC Method | >0.1       | <b>NEG</b> | NEG      | NEG      |

## WEAR METALS

|          | method | limit/base       | current      | history1 | history2 |
|----------|--------|------------------|--------------|----------|----------|
| Iron     | ppm    | ASTM D5185m >150 | <b>11</b>    | 4        | 15       |
| Chromium | ppm    | ASTM D5185m >10  | <b>&lt;1</b> | 0        | 0        |
| Nickel   | ppm    | ASTM D5185m >10  | <b>&lt;1</b> | 0        | 0        |
| Titanium | ppm    | ASTM D5185m      | <b>&lt;1</b> | 0        | 0        |
| Silver   | ppm    | ASTM D5185m      | <b>0</b>     | <1       | 0        |
| Aluminum | ppm    | ASTM D5185m >25  | <b>2</b>     | <1       | 0        |
| Lead     | ppm    | ASTM D5185m >100 | <b>0</b>     | 0        | 0        |
| Copper   | ppm    | ASTM D5185m >50  | <b>&lt;1</b> | <1       | 0        |
| Tin      | ppm    | ASTM D5185m >10  | <b>0</b>     | 0        | 0        |
| Antimony | ppm    | ASTM D5185m >5   | <b>---</b>   | ---      | 0        |
| Vanadium | ppm    | ASTM D5185m      | <b>0</b>     | 0        | 0        |
| Cadmium  | ppm    | ASTM D5185m      | <b>&lt;1</b> | 0        | 0        |

## ADDITIVES

|            | method | limit/base  | current      | history1 | history2 |
|------------|--------|-------------|--------------|----------|----------|
| Boron      | ppm    | ASTM D5185m | <b>11</b>    | 16       | 28       |
| Barium     | ppm    | ASTM D5185m | <b>2</b>     | 10       | 3        |
| Molybdenum | ppm    | ASTM D5185m | <b>&lt;1</b> | 0        | 0        |
| Manganese  | ppm    | ASTM D5185m | <b>&lt;1</b> | <1       | 0        |
| Magnesium  | ppm    | ASTM D5185m | <b>1</b>     | 0        | 0        |
| Calcium    | ppm    | ASTM D5185m | <b>2</b>     | 2        | 0        |
| Phosphorus | ppm    | ASTM D5185m | <b>297</b>   | 397      | 357      |
| Zinc       | ppm    | ASTM D5185m | <b>0</b>     | 7        | 4        |
| Sulfur     | ppm    | ASTM D5185m | <b>6933</b>  | 7616     | 4784     |

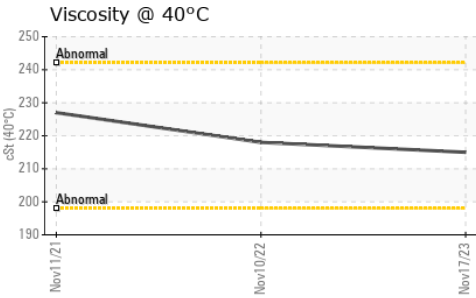
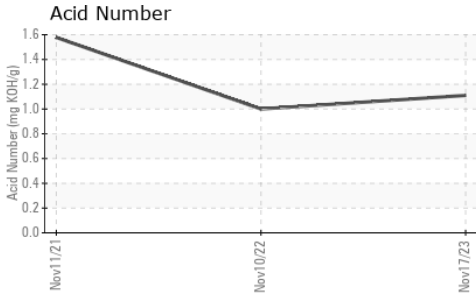
## CONTAMINANTS

|           | method | limit/base      | current  | history1 | history2 |
|-----------|--------|-----------------|----------|----------|----------|
| Silicon   | ppm    | ASTM D5185m >50 | <b>3</b> | 1        | 0        |
| Sodium    | ppm    | ASTM D5185m     | <b>1</b> | <1       | 0        |
| Potassium | ppm    | ASTM D5185m >20 | <b>1</b> | 0        | 0        |

## FLUID DEGRADATION

|                  | method   | limit/base | current     | history1 | history2 |
|------------------|----------|------------|-------------|----------|----------|
| Acid Number (AN) | mg KOH/g | ASTM D8045 | <b>1.11</b> | 1.00     | 1.578    |

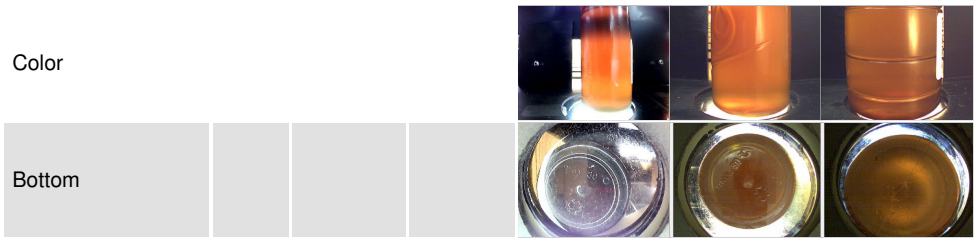
# OIL ANALYSIS REPORT



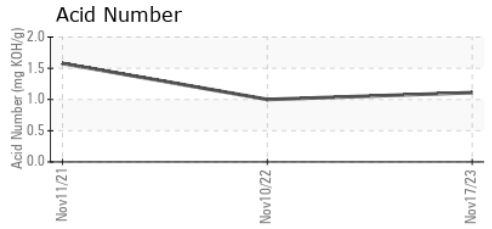
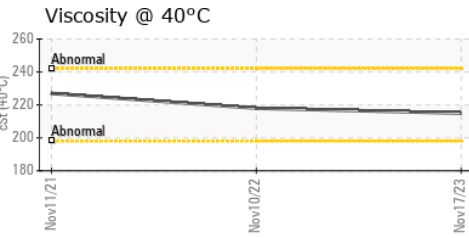
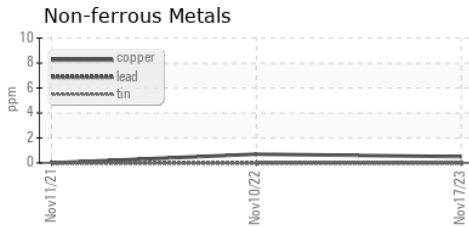
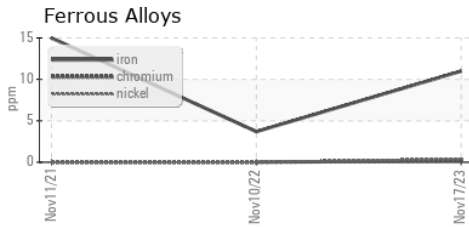
| VISUAL           | method | limit/base | current | history1     | history2 |       |
|------------------|--------|------------|---------|--------------|----------|-------|
| White Metal      | scalar | *Visual    | NONE    | <b>NONE</b>  | NONE     | VLITE |
| Yellow Metal     | scalar | *Visual    | NONE    | <b>NONE</b>  | NONE     | NONE  |
| Precipitate      | scalar | *Visual    | NONE    | <b>NONE</b>  | NONE     | NONE  |
| Silt             | scalar | *Visual    | NONE    | <b>NONE</b>  | NONE     | NONE  |
| Debris           | scalar | *Visual    | NONE    | <b>NONE</b>  | NONE     | VLITE |
| 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    | >0.1    | <b>NEG</b>   | NEG      | NEG   |
| Free Water       | scalar | *Visual    |         | <b>NEG</b>   | NEG      | NEG   |

| FLUID PROPERTIES | method | limit/base | current    | history1 | history2 |
|------------------|--------|------------|------------|----------|----------|
| Visc @ 40°C      | cSt    | ASTM D445  | <b>215</b> | 218      | 227      |

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



## GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : KFS0004114 **Received** : 24 Nov 2023  
**Lab Number** : **06017472** **Tested** : 28 Nov 2023  
**Unique Number** : 10756616 **Diagnosed** : 28 Nov 2023 - Wes Davis  
**Test Package** : IND 2

**LANDMARK CERAMICS/US TILE**  
 1427 N MAIN ST  
 MOUNT PLEASANT, TN  
 US 38474  
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 T:  
 F: (931)981-6879

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)