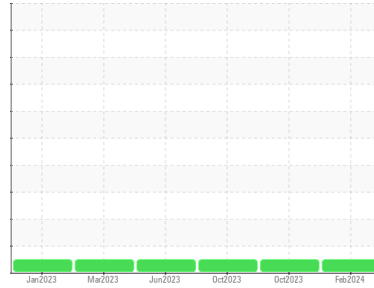


# OIL ANALYSIS REPORT

Sample Rating Trend

**NORMAL**



Area  
**(89936X) Walgreens - Tractor**  
 Machine Id  
**[Walgreens - Tractor] 136A68142**  
 Component  
**Diesel Engine**  
 Fluid  
**PETRO CANADA DURON SHP 10W30 (11 GAL)**

## DIAGNOSIS

**Recommendation**  
 Resample at the next service interval to monitor.

**Wear**  
 All component wear rates are normal.

**Contamination**  
 There is no indication of any contamination in the oil.

**Fluid Condition**  
 The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

## SAMPLE INFORMATION

| method        | limit/base  | current            | history1      | history2    |        |
|---------------|-------------|--------------------|---------------|-------------|--------|
| Sample Number | Client Info | <b>PCA0112841</b>  | PCA0103772    | PCA0103782  |        |
| Sample Date   | Client Info | <b>19 Feb 2024</b> | 31 Oct 2023   | 23 Oct 2023 |        |
| Machine Age   | mls         | Client Info        | <b>684310</b> | 662985      | 660036 |
| Oil Age       | mls         | Client Info        | <b>21325</b>  | 35614       | 32665  |
| Oil Changed   | Client Info | <b>Not Changed</b> | Changed       | Not Changed |        |
| Sample Status |             | <b>NORMAL</b>      | NORMAL        | NORMAL      |        |

## CONTAMINATION

| method | limit/base     | current        | history1 | history2 |
|--------|----------------|----------------|----------|----------|
| Fuel   | WC Method >5   | <b>&lt;1.0</b> | <1.0     | <1.0     |
| Water  | WC Method >0.2 | <b>NEG</b>     | NEG      | NEG      |
| Glycol | WC Method      | <b>NEG</b>     | NEG      | NEG      |

## WEAR METALS

| method   | limit/base           | current      | history1 | history2 |
|----------|----------------------|--------------|----------|----------|
| Iron     | ppm ASTM D5185m >80  | <b>11</b>    | 20       | 16       |
| Chromium | ppm ASTM D5185m >5   | <b>&lt;1</b> | <1       | <1       |
| Nickel   | ppm ASTM D5185m >2   | <b>0</b>     | <1       | 0        |
| Titanium | ppm ASTM D5185m      | <b>0</b>     | 0        | 0        |
| Silver   | ppm ASTM D5185m >3   | <b>0</b>     | 0        | 0        |
| Aluminum | ppm ASTM D5185m >30  | <b>6</b>     | 7        | 6        |
| Lead     | ppm ASTM D5185m >30  | <b>0</b>     | 0        | 0        |
| Copper   | ppm ASTM D5185m >150 | <b>1</b>     | 2        | 2        |
| Tin      | ppm ASTM D5185m >5   | <b>&lt;1</b> | <1       | <1       |
| Vanadium | ppm ASTM D5185m      | <b>0</b>     | 0        | 0        |
| Cadmium  | ppm ASTM D5185m      | <b>0</b>     | 0        | 0        |

## ADDITIVES

| method     | limit/base           | current      | history1 | history2 |
|------------|----------------------|--------------|----------|----------|
| Boron      | ppm ASTM D5185m 2    | <b>2</b>     | 4        | 2        |
| Barium     | ppm ASTM D5185m 0    | <b>0</b>     | 0        | 0        |
| Molybdenum | ppm ASTM D5185m 50   | <b>57</b>    | 62       | 56       |
| Manganese  | ppm ASTM D5185m 0    | <b>&lt;1</b> | <1       | <1       |
| Magnesium  | ppm ASTM D5185m 950  | <b>922</b>   | 1028     | 877      |
| Calcium    | ppm ASTM D5185m 1050 | <b>997</b>   | 1188     | 1043     |
| Phosphorus | ppm ASTM D5185m 995  | <b>984</b>   | 1101     | 964      |
| Zinc       | ppm ASTM D5185m 1180 | <b>1200</b>  | 1423     | 1166     |
| Sulfur     | ppm ASTM D5185m 2600 | <b>2789</b>  | 3107     | 2560     |

## CONTAMINANTS

| method    | limit/base          | current  | history1 | history2 |
|-----------|---------------------|----------|----------|----------|
| Silicon   | ppm ASTM D5185m >20 | <b>4</b> | 5        | 4        |
| Sodium    | ppm ASTM D5185m     | <b>1</b> | 4        | 2        |
| Potassium | ppm ASTM D5185m >20 | <b>2</b> | 4        | 2        |

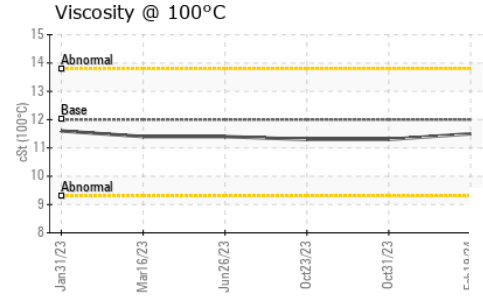
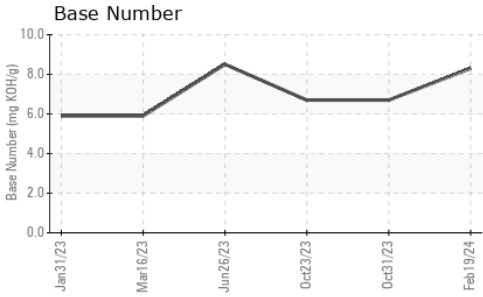
## INFRA-RED

| method    | limit/base               | current     | history1 | history2 |
|-----------|--------------------------|-------------|----------|----------|
| Soot %    | % *ASTM D7844 >3         | <b>0.3</b>  | 0.5      | 0.5      |
| Nitration | Abs/cm *ASTM D7624 >20   | <b>7.4</b>  | 8.7      | 8.8      |
| Sulfation | Abs/.1mm *ASTM D7415 >30 | <b>18.8</b> | 21.0     | 21.0     |

## FLUID DEGRADATION

| method           | limit/base               | current     | history1 | history2 |
|------------------|--------------------------|-------------|----------|----------|
| Oxidation        | Abs/.1mm *ASTM D7414 >25 | <b>15.3</b> | 17.3     | 17.6     |
| Base Number (BN) | mg KOH/g ASTM D2896      | <b>8.3</b>  | 6.7      | 6.7      |

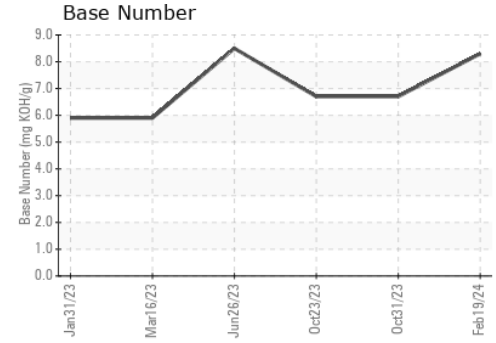
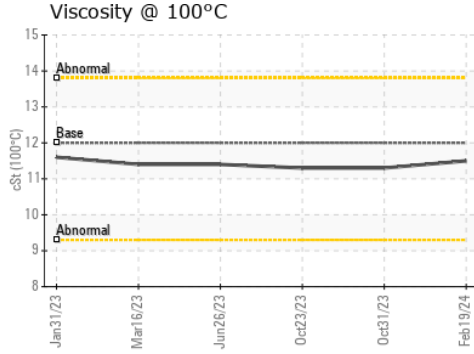
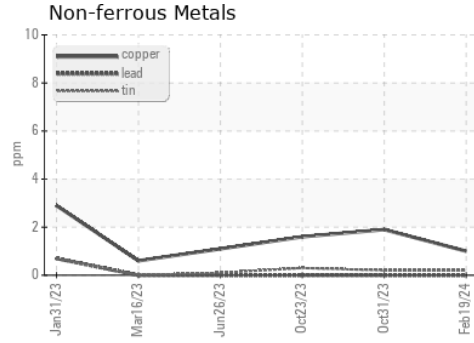
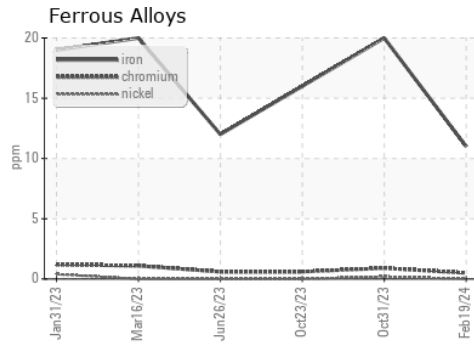
# OIL ANALYSIS REPORT



| 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     | NONE     |
| Sand/Dirt        | scalar | *Visual    | NONE    | NONE     | NONE     |
| Appearance       | scalar | *Visual    | NORML   | NORML    | NORML    |
| Odor             | scalar | *Visual    | NORML   | NORML    | NORML    |
| Emulsified Water | scalar | *Visual    | >0.2    | NEG      | NEG      |
| Free Water       | scalar | *Visual    |         | NEG      | NEG      |

| FLUID PROPERTIES | method | limit/base | current | history1    | history2 |      |
|------------------|--------|------------|---------|-------------|----------|------|
| Visc @ 100°C     | cSt    | ASTM D445  | 12.00   | <b>11.5</b> | 11.3     | 11.3 |

## GRAPHS



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PCA0112841  
**Lab Number** : **06097584**  
**Unique Number** : 10890437  
**Test Package** : FLEET

**Received** : 22 Feb 2024  
**Tested** : 23 Feb 2024  
**Diagnosed** : 23 Feb 2024 - Wes Davis

**Transervice - Shop 1364 - Berkeley-Mt. Vernon**  
 5100 Lake Terrace NE  
 Mt. Vernon, IL  
 US 62864  
 Contact: Erien White  
 ewhite@transervice.com  
 T: (618)244-8726  
 F: (618)244-8791

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)