OIL ANALYSIS REPORT

DIAZ VOLVO PENTA 2006002401 - PORT DIESEL ENGINE

Sample No: VPA056255

Oil Type: VOLVO ULTRA DIESEL ENGINE OIL 15W40 VDS-3

| Sample Number | | VPA056255 | | |
|---|--|---|---|------|
| Sample Date | | 16 Jun 2023 | | |
| Machine Hours | | 1340 | | |
| Oil Hours | | 0 | | |
| Oil Changed | | Not Changd | | |
| Sample Status | | NORMAL | | |
| | | | | |
| OIL CONDITION | | | | |
| Visc @ 100°C | cSt | 13.6 | | |
| Base Number (BN) | mg KOH/g | 9.5 | | |
| Oxidation (PA) | % | 70 | | |
| CONTRAMINATION | | | | |
| CONTAMINATION | | | | |
| Soot % | % | 0.6 | | |
| Nitration (PA) | % | 61 | | |
| Sulfation (PA) | % | 68 | | |
| Glycol | % | NEG | | |
| Fuel | % | <1.0 | | |
| Silicon | ppm | 6 | | |
| Sodium | ppm | 2 | | |
| Potassium | ppm | <1 | | |
| WEAR METALS | | | | |
| | | | | |
| Iron | ppm | 6 | | |
| - | | | | |
| | ppm | 2 | | |
| Lead | ppm | <1 | | |
| Lead Tin | ppm ppm | ■<1 ■<1 | | |
| Lead Tin Aluminum | ppm ppm ppm | □ <1 □ <1 □ 0 | | |
| Copper Lead Tin Aluminum Chromium | ppm ppm | □ <1 □ <1 □ 0 □ <1 | | |
| Lead Tin Aluminum Chromium Molybdenum | ppm ppm ppm | <pre><1 </pre> < 1 0 < 1 58 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel | ppm ppm ppm ppm | <pre><1 </pre> < 1 0 < 1 58 0 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium | ppm ppm ppm ppm ppm | <pre><1 </pre> < 1 0 < 1 58 0 0 0 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium | ppm ppm ppm ppm ppm | <pre><1 </pre> < 1 0 < 1 58 0 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver | ppm ppm ppm ppm ppm ppm | <pre><1 </pre> < 1 0 < 1 58 0 0 0 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese | ppm ppm ppm ppm ppm ppm ppm | <pre><1 </pre> <1 0 <1 58 0 0 0 0 0 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium | ppm ppm ppm ppm ppm ppm ppm ppm | <pre><1 </pre> <1 0 <1 58 0 0 0 0 <1 | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium ADDITIVES | ppm ppm ppm ppm ppm ppm ppm ppm | <pre><1 </pre> <pre>< 1 </pre> <pre>58 </pre> <pre>0 </pre> <pre>0 </pre> <pre>0 </pre> <pre></pre> <pre><td></td><td></td></pre> | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium ADDITIVES Calcium | ppm ppm ppm ppm ppm ppm ppm ppm ppm | <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <pre> 1021 </pre> </pre> | | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium ADDITIVES Calcium Magnesium | ppm ppm ppm ppm ppm ppm ppm ppm ppm | <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> <1 </pre> <pre> 1021 </pre> | Image: Section of the section of t | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium ADDITIVES Calcium Magnesium Zinc | ppm ppm ppm ppm ppm ppm ppm ppm ppm ppm | <pre><1</pre> | Image: Section of the section of t | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium ADDITIVES Calcium Magnesium Zinc Phosphorus | ppm ppm ppm ppm ppm ppm ppm ppm ppm ppm | <pre><1</pre> | Image: Section of the section of t | |
| Lead Tin Aluminum Chromium Molybdenum Nickel Titanium Silver Manganese Vanadium ADDITIVES Calcium Magnesium | ppm ppm ppm ppm ppm ppm ppm ppm ppm ppm | <pre><1</pre> | Image: Section of the section of t | |



314 LEGION AVE ANNAPOLIS, MD US 21401 Contact: Service Manager FULLKEELMARINESERIVES@GMAIL.COM T: (410)507-3542

VOLVO PENTA

Diagnosis

Resample at the next service interval to monitor.All component wear rates are normal. There is no indication of any contamination in the oil. The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is acceptable for the time in service.

 Unique No:
 10538664

 Signed:
 Don Baldridge

 Report Date:
 04 Jul 2023

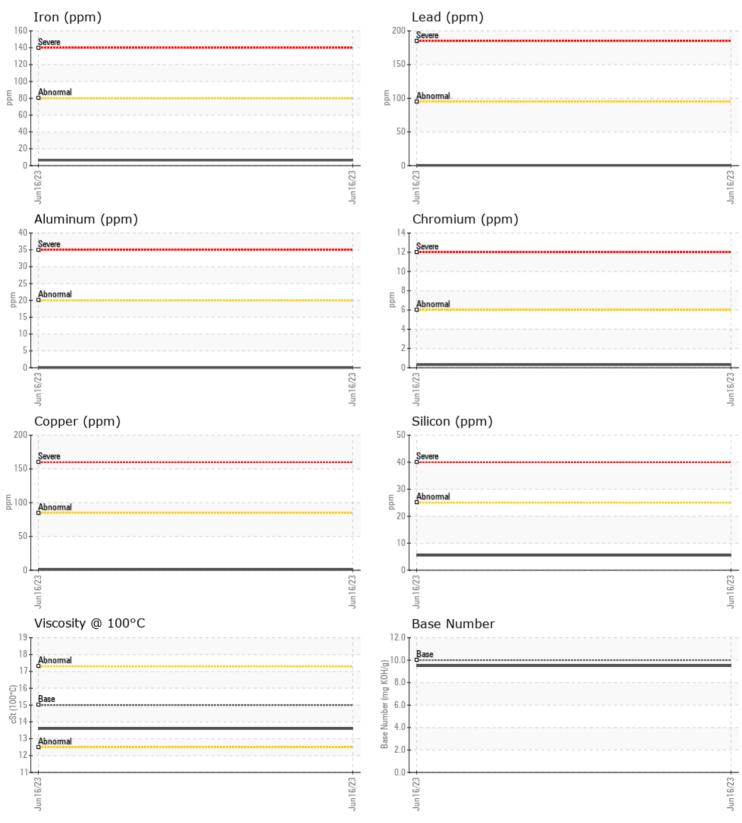
Contact/Location: Service Manager - VP1298996

VP1298996

OIL ANALYSIS REPORT



GRAPHS



Report Id: VP1298996 [WUSCAR] 05888181 (Generated: 07/04/2023 16:17:49) Rev: 1

Contact/Location: Service Manager - VP1298996