



0	1	2	3	4
NORMAL		ABNORMAL		CRITICAL

Overall report severity based on comments.

Account Information		Component Information	Sample Information
		Component ID: 22RAM2500 E Secondary ID: Component Type: DIESEL ENGINE Manufacturer: DODGE INDUSTRIAL Model: RAM 2500 Sump Capacity:	Lab Number: S-069199 Lab Location: Salt Lake City Data Analyst: ARF Sampled: 30-Oct-2023 Received: 03-Nov-2023 Completed: 09-Nov-2023
Filter Information		Miscellaneous Information	Product Information
Filter Type: Information Requested Micron Rating: 0			Product Manufacturer: SHELL Product Name: ROTELLA T6 FULL SYNTHETIC Viscosity Grade: SAE 5W40
Comments	Viscosity is SIGNIFICANTLY LOW. Causes include contamination, incorrectly identified viscosity grade, or adding a different viscosity grade to the component. Increased component wear possible. If grade is misidentified, it can be updated in HORIZON. Is the FLUID VISCOSITY GRADE correctly identified? FUEL DILUTION is at a MODERATE LEVEL; Copper is at a MINOR LEVEL; COPPER is most likely LEACHING into the oil via the OIL COOLER core tubing. This typically DOES NOT REQUIRE MAINTENANCE ACTION unless there is evidence of COOLANT in the oil. Please provide this units sump capacity with next sample. Maintenance action indicated at time of submission (fluid/filter change, filtration, etc.) will have corrected the issue this system is exhibiting. No further maintenance action is recommended at this time.		

	Wear Metals (ppm)										Contaminant Metals (ppm)			Multi-Source Metals (ppm)						Additive Metals (ppm)				
Sample #	Iron	Chromium	Nickel	Aluminum	Copper	Lead	Tin	Cadmium	Silver	Vanadium	Silicon	Sodium	Potassium	Titanium	Molybdenum	Antimony	Manganese	Lithium	Boron	Magnesium	Calcium	Barium	Phosphorus	Zinc
1	40	1	0	3	54	0	1	0	0	0	13	4	5	0	23	0	1	0	76	195	1754	1	871	970

Sample Information								Contaminants			Fluid Properties					
Sample #	Date Sampled	Date Received	Lube Time	Unit Time	Lube Change	Lube Added	Filter Change	Fuel Dilution	Soot	Water	Viscosity 40°C	Viscosity 100 °C	Acid Number	Base No. D4739	Oxidation	Nitration
			h	h	Lube Change	gal	Filter Change	%	%	%	cSt	cSt	mg KOH / g	mg KOH / g	abs / cm	abs / 0.1mm
1	30-Oct-2023	03-Nov-2023	4743	9315	Yes	0	Yes	4.7 - GC	<.1	<.1 - FTIR		10.2		4.05	12	8

Particle Count (particles/mL)										Additional Testing	
Sample #	ISO Code	> 4	> 6	> 10	> 14	> 21	> 38	> 70	> 100	Test Method	
	Based On 4/6/14	particles / mL	particles / mL	particles / mL	particles / mL	particles / mL	particles / mL	particles / mL	particles / mL		
1	/ /										

Comments are advisory only and are based on the assumption that the sample and data submitted are valid. Results relate only to the items tested. Missing fluid or component information limits the evaluation. No warranty is expressed or implied. Measurement uncertainty available upon request.