OIL ANALYSIS REPORT

STAVE H15081 YANMAR 4J144-HTE - DIESEL ENGINE

Sample No: VPA059692

Oil Type: SHELL ROTELLA T 15W40

SAMPLE INFORMATION Sample Number VPA059692 Sample Date 13 Oct 2023 Machine Hours 2919 0 **Oil Hours** Oil Changed N/A NORMAL Sample Status **OIL CONDITION** Visc @ 100°C cSt 14.2 Base Number (BN) mg KOH/g 8.8 Oxidation (PA) % 69 CONTAMINATION % Soot % 0.1 % Nitration (PA) 48 Sulfation (PA) % 59 % NEG Glycol Fuel % <1.0 Silicon ppm 13 Sodium 2 ppm Potassium ppm **4** WEAR METALS ------

Iron	ppm	6	 	
Copper	ppm	 <1	 	
Lead	ppm	0	 	
Tin	ppm	□ <1	 	
Aluminum	ppm	2	 	
Chromium	ppm	0	 	
Molybdenum	ppm	55	 	
Nickel	ppm	0	 	
Titanium	ppm	0	 	
Silver	ppm	0	 	
Manganese	ppm	0	 	
Vanadium	maa	0	 	

ADDITIVES

Calcium	ppm	1859	 	
Magnesium	ppm	307	 	
Zinc	ppm	🔲 1080	 	
Phosphorus	ppm	879	 	
Barium	ppm	0	 	
Boron	ppm	265	 	

Walstrom Marine - 767948

501 Bay Street HARBOR SPRINGS, MI US 49740 Contact: MARK LEWIS mlewis@walstrom.com T: F:

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 suitable for further service.

 Depot:
 VP154879

 Unique No:
 10700727

 Signed:
 Angela Borella

 Report Date:
 20 Oct 2023

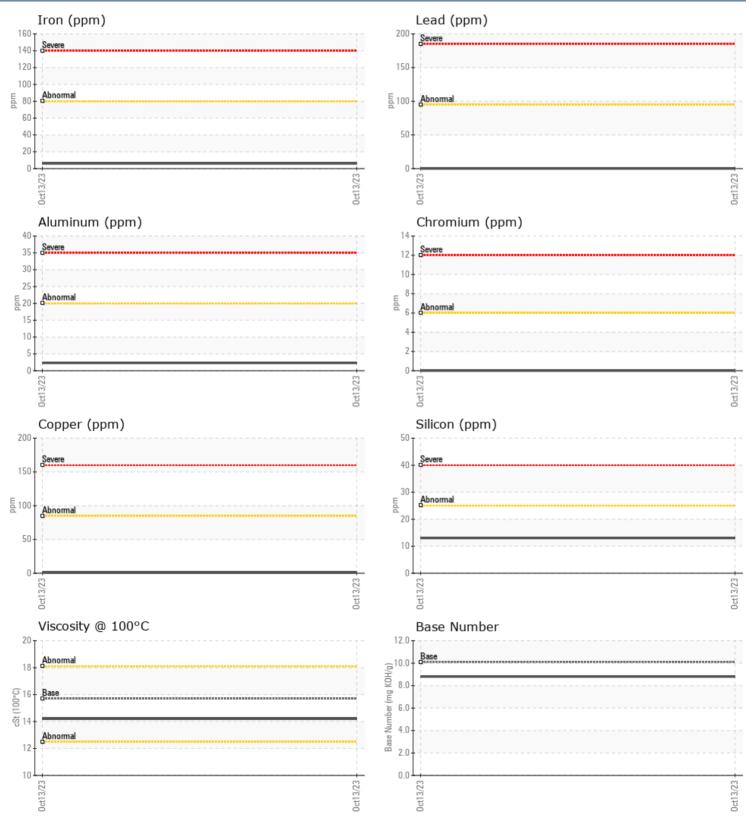
Contact/Location: MARK LEWIS - VP154879



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GRAPHS



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