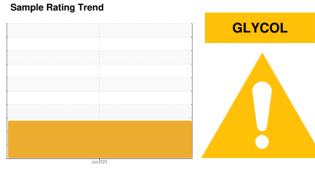


OIL ANALYSIS REPORT

(72586Z) Walgreens - Tractor [Walgreens - Tractor] 136A624025

Diesel Engine

PETRO CANADA DURON SHP 10W30 (11 GAL)



DIAGNOSIS

Recommendation

No corrective action is recommended at this time. Resample at the next service interval to monitor.

Wear

The copper level is abnormal. The tin level is abnormal. In the absence of other significant wear metals, suspect copper due to sources other than wear (i.e. cooling core). All other metal levels are typical for a new component breaking in.

Contamination

Sodium and/or potassium levels are high. Test for glycol is negative.

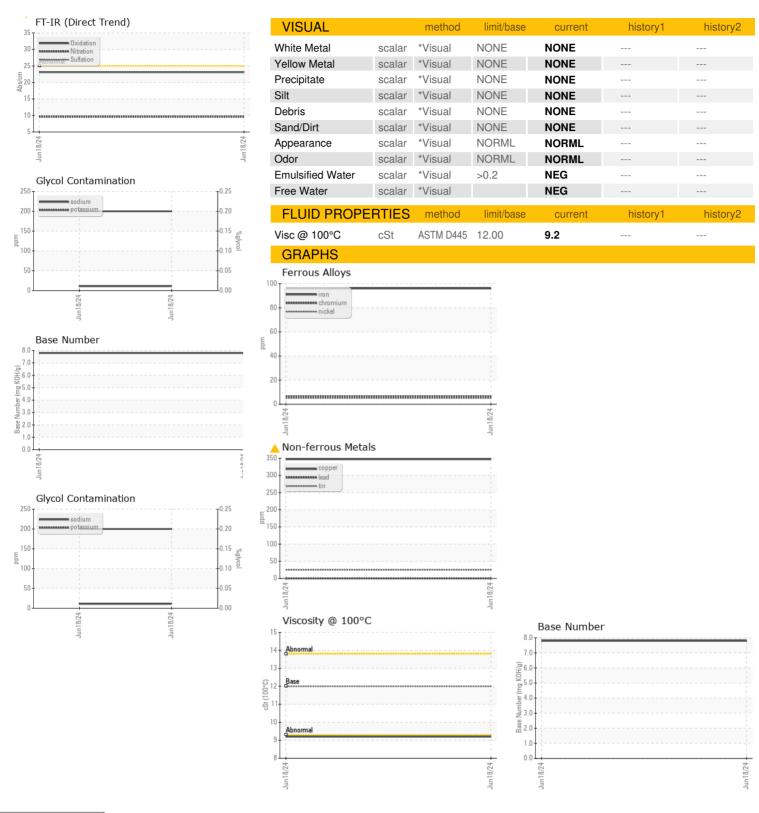
Fluid Condition

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

GAL)			,	Jun 2024		
SAMPLE INFOR	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		PCA0128189		
Sample Date		Client Info		18 Jun 2024		
Machine Age	mls	Client Info		29788		
Oil Age	mls	Client Info		29788		
Oil Changed		Client Info		Not Changd		
Sample Status				ABNORMAL		
CONTAMINAT	ION	method	limit/base	current	history1	history2
Water		WC Method	>0.2	NEG		
WEAR METAL	S	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>80	96		
Chromium	ppm	ASTM D5185m	>5	7		
Nickel	ppm	ASTM D5185m	>2	5		
Titanium	ppm	ASTM D5185m		<1		
Silver	ppm	ASTM D5185m	>3	1		
Aluminum	ppm	ASTM D5185m	>30	76		
Lead	ppm	ASTM D5185m	>30	0		
Copper	ppm	ASTM D5185m	>150	<u>▲</u> 347		
Tin	ppm	ASTM D5185m	>5	<u>^</u> 25		
Vanadium	ppm	ASTM D5185m		<1		
Cadmium	ppm	ASTM D5185m		0		
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	2	32		
Barium	ppm	ASTM D5185m	0	0		
Molybdenum	ppm	ASTM D5185m	50	43		
Manganese	ppm	ASTM D5185m	0	7		
Magnesium	ppm	ASTM D5185m	950	595		
Calcium		AOTH DELOE	1050			
	ppm	ASTM D5185m	1050	1852		
Phosphorus	ppm	ASTM D5185m	995	771		
Phosphorus Zinc	ppm	ASTM D5185m ASTM D5185m	995 1180	771 947		
Phosphorus Zinc Sulfur	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m	995 1180 2600	771 947 2482	 	
Phosphorus Zinc Sulfur CONTAMINAN	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method	995 1180 2600 limit/base	771 947 2482 current		 history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon	ppm ppm ppm TS	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m	995 1180 2600 limit/base	771 947 2482 current	 history1	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium	ppm ppm ppm TS ppm	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m	995 1180 2600 limit/base >20	771 947 2482 current 10 11	 history1 	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium	ppm ppm ppm TS ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m	995 1180 2600 limit/base >20	771 947 2482 current 10 11 200	 history1	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel	ppm ppm ppm TS ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524	995 1180 2600 limit/base >20	771 947 2482 current 10 11 200 <1.0	history1	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol	ppm ppm ppm TS ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982	995 1180 2600 limit/base >20 >20 >5	771 947 2482 current 10 11 ▲ 200 <1.0 NEG	 history1 	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol INFRA-RED	ppm ppm ppm TS ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982 method	995 1180 2600 limit/base >20 >20 >5	771 947 2482 current 10 11 ▲ 200 <1.0 NEG current	history1	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol INFRA-RED Soot %	ppm ppm ppm TS ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m Method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982 method *ASTM D7844	995 1180 2600 limit/base >20 >20 >5 limit/base >3	771 947 2482 current 10 11 ▲ 200 <1.0 NEG current 0.7	 history1 	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol INFRA-RED Soot % Nitration	ppm ppm ppm TS ppm ppm ppm % %	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982 method *ASTM D7844 *ASTM D7844	995 1180 2600 limit/base >20 >20 >5 limit/base >3 >20	771 947 2482 current 10 11 ▲ 200 <1.0 NEG current 0.7 9.6	history1 history1 history1	history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol INFRA-RED Soot % Nitration Sulfation	ppm ppm ppm TS ppm ppm ppm % %	ASTM D5185m ASTM D5185m ASTM D5185m Method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982 method *ASTM D7844	995 1180 2600 limit/base >20 >20 >5 limit/base >3 >20	771 947 2482 current 10 11 ▲ 200 <1.0 NEG current 0.7	history1 history1 history1	history2 history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol INFRA-RED Soot % Nitration	ppm ppm ppm TS ppm ppm ppm % %	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982 method *ASTM D7844 *ASTM D7844	995 1180 2600 limit/base >20 >20 >5 limit/base >3 >20	771 947 2482 current 10 11 ▲ 200 <1.0 NEG current 0.7 9.6	history1 history1 history1	history2 history2
Phosphorus Zinc Sulfur CONTAMINAN Silicon Sodium Potassium Fuel Glycol INFRA-RED Soot % Nitration Sulfation	ppm ppm ppm TS ppm ppm ppm % %	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D3524 *ASTM D2982 method *ASTM D7844 *ASTM D7624 *ASTM D7415	995 1180 2600 limit/base >20 >20 >5 limit/base >3 >20 >3 >20 >30	771 947 2482 current 10 11 200 <1.0 NEG current 0.7 9.6 23.1	history1 history1 history1	history2 history2



OIL ANALYSIS REPORT







Certificate 12367

Laboratory Sample No.

: PCA0128189 Lab Number : 06222989 Unique Number : 11101186

To discuss this sample report, contact Customer Service at 1-800-237-1369.

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 Received

: 27 Jun 2024 **Tested** : 01 Jul 2024

Diagnosed : 01 Jul 2024 - Jonathan Hester Test Package: FLEET (Additional Tests: FuelDilution, Glycol, PercentFuel)

US 29697 Contact: Sonny Boucher sboucher@transervice.com T: (864)226-2304

101 Alliance Parkway

Willamston, SC

F: (864)226-2329

Transervice - Shop 1373 - Berkeley-Anderson/Pendergrass

 st - 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)