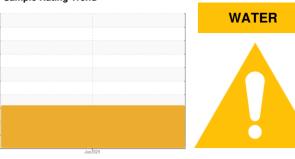


OIL ANALYSIS REPORT

Sample Rating Trend



Machine Id
675
Component
Diesel Engine

DIESEL ENGINE OIL SAE 15W40 (--- GAL)

DIAGNOSIS

Recommendation

We advise that you check for the source of water entry. We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition. The fluid was not specified, however, a fluid match indicates that this fluid is (GENERIC) DIESEL ENGINE OIL SAE 15W40. Please confirm.

A Wear

Iron ppm levels are abnormal. Cylinder, crank, or cam shaft wear is indicated.

Contamination

There is a moderate concentration of water present in the oil. Excessive free water present. Test for glycol is negative.

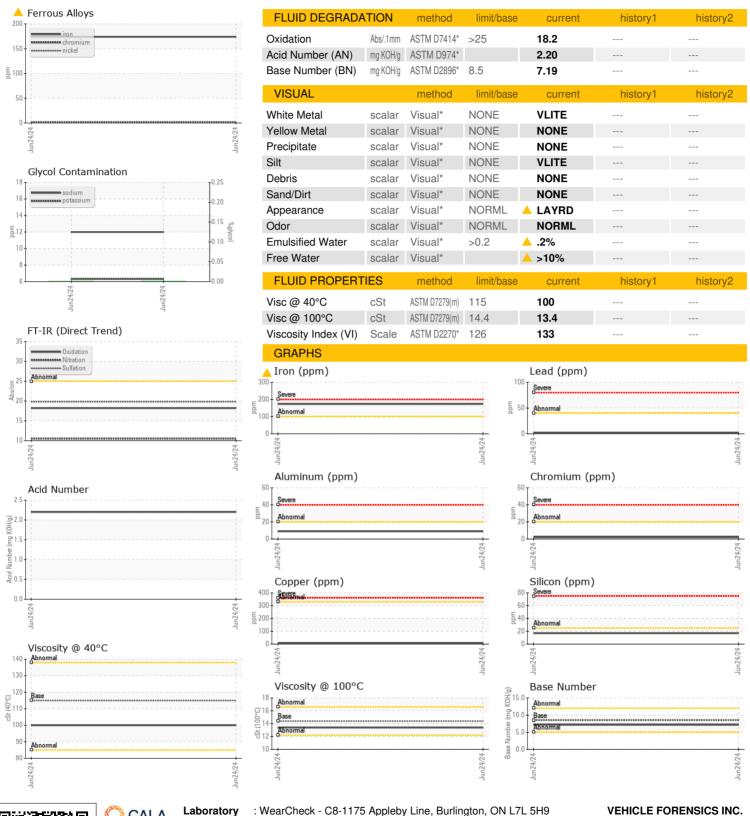
Fluid Condition

The BN result indicates that there is suitable alkalinity remaining in the oil. The AN level is acceptable for this fluid. The oil is no longer serviceable as a result of the abnormal and/or severe wear.

SAMPLE INFORM	ATION	method	limit/base	current	history1	history2
Sample Number		Client Info		WC0904450		
Sample Date		Client Info		24 Jun 2024		
Machine Age	hrs	Client Info		0		
Oil Age	hrs	Client Info		0		
Oil Changed		Client Info		N/A		
Sample Status				ABNORMAL		
CONTAMINATION	l	method	limit/base	current	history1	history2
Fuel		WC Method	>5	<1.0		
Water		WC Method	>0.2	NEG		
WEAR METALS		method	limit/base	current	history1	history2
PQ		ASTM D8184*		0		
ron	ppm	ASTM D5185(m)	>100	<u> </u>		
Chromium	ppm	ASTM D5185(m)	>20	2		
Nickel	ppm	ASTM D5185(m)	>4	2		
Titanium	ppm	ASTM D5185(m)		0		
Silver	ppm	ASTM D5185(m)	>3	0		
Aluminum	ppm	ASTM D5185(m)	>20	9		
Lead	ppm	ASTM D5185(m)	>40	2		
Copper	ppm	ASTM D5185(m)	>330	7		
Γin	ppm	ASTM D5185(m)	>15	<1		
Antimony	ppm	ASTM D5185(m)		0		
Vanadium	ppm	ASTM D5185(m)		0		
Beryllium	ppm	ASTM D5185(m)		0		
Cadmium	ppm	ASTM D5185(m)		0		
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185(m)	250	84		
Barium	ppm	ASTM D5185(m)	10	<1		
Molybdenum	ppm	ASTM D5185(m)	100	22		
Manganese	ppm	ASTM D5185(m)		2		
Magnesium	ppm	ASTM D5185(m)	450	216		
Calcium	ppm	ASTM D5185(m)	3000	1844		
Phosphorus	ppm	ASTM D5185(m)	1150	872		
Zinc	ppm	ASTM D5185(m)	1350	1110		
Sulfur	ppm	ASTM D5185(m)	4250	2330		
Lithium	ppm	ASTM D5185(m)		<1		
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>25	17		
Sodium	ppm	ASTM D5185(m)	>158	12		
Potassium	ppm	ASTM D5185(m)	>20	6		
Glycol	%	ASTM D7922*		0.0		
INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	ASTM D7844*	>3	0.1		
Nitration	Abs/cm	ASTM D7624*	>20	10.5		
Sulfation	Abs/.1mm	ASTM D7415*	>30	19.8		



OIL ANALYSIS REPORT





CALA ISO 17025:2017 Accredited Laboratory

Laboratory Sample No. Lab Number

: WC0904450 Received : 27 Jun 2024

Tested : 27 Jun 2024 : 02644298 Unique Number : 5801837

Diagnosed

: 28 Jun 2024 - Kevin Marson

Test Package : MOB 2 (Additional Tests: Glycol, KV40, PQ, TAN Auto, TAN Man, VI, Visual) Contact: Ryan Cockle ryan@vforensics.ca

To discuss this sample report, contact Customer Service at 1-800-268-2131. Test denoted (*) outside scope of accreditation, (m) method modified, (e) tested at external lab. Validity of results and interpretation are based on the sample and information as supplied.

T: (289)843-7402

PO BOX 40047

CA L2E 0A3

NIAGARA FALLS, ON