



# OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	ABNORMAL
FLUID CONDITION	ABNORMAL

Machine Id  
**CUMMINS 59 OAKLAND**  
 Component  
**Diesel Engine**  
 Fluid  
**TOTAL FINA RUBIA TIR 7900 15W40 (--- LTR)**

## RECOMMENDATION

The oil change at the time of sampling has been noted. We recommend an early resample to monitor this condition.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		WC0888828	WC0787116	WC0665496
Sample Date		Client Info		13 Feb 2024	17 Feb 2023	10 Apr 2022
Machine Age	hrs	Client Info		444	396	371
Oil Age	hrs	Client Info		48	0	0
Filter Age	hrs	Client Info		48	0	0
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				ABNORMAL	NORMAL	NORMAL

## WEAR

Metal levels are typical for a new component breaking in.

Iron	ppm	ASTM D5185(m)	>90	2	2	2
Chromium	ppm	ASTM D5185(m)	>20	0	0	0
Nickel	ppm	ASTM D5185(m)	>2	0	0	0
Titanium	ppm	ASTM D5185(m)	>2	0	<1	<1
Silver	ppm	ASTM D5185(m)	>2	0	0	0
Aluminum	ppm	ASTM D5185(m)	>20	2	2	1
Lead	ppm	ASTM D5185(m)	>40	0	<1	0
Copper	ppm	ASTM D5185(m)	>330	<1	<1	<1
Tin	ppm	ASTM D5185(m)	>15	0	0	0
Vanadium	ppm	ASTM D5185(m)		0	0	0

## CONTAMINATION

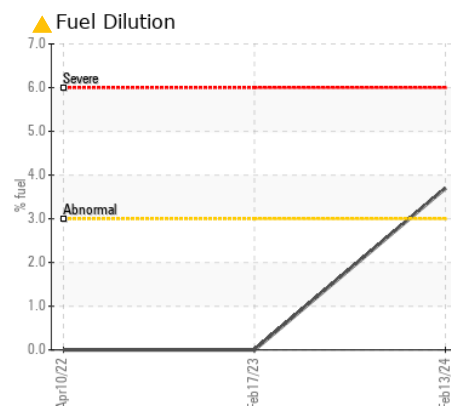
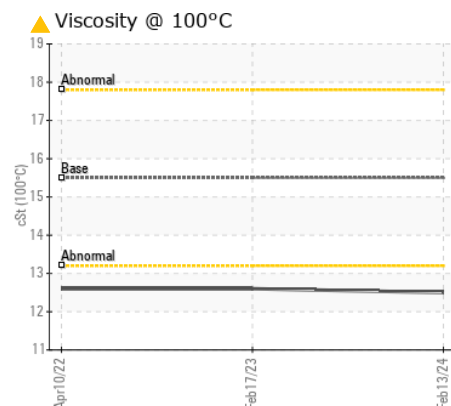
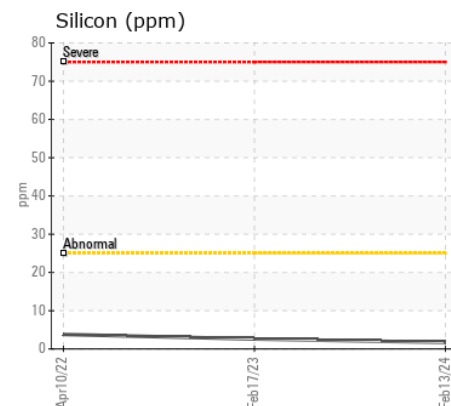
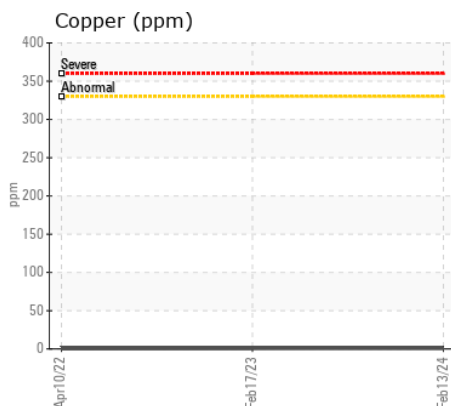
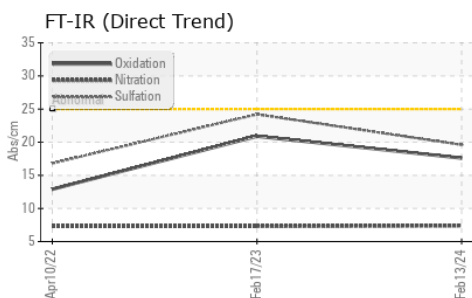
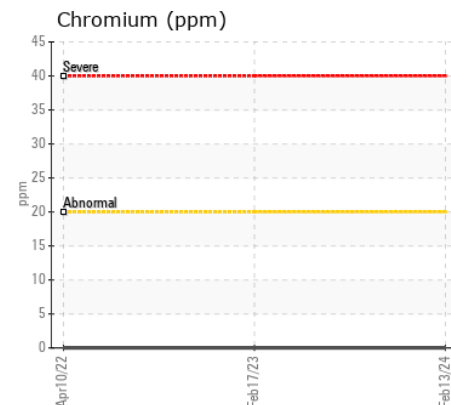
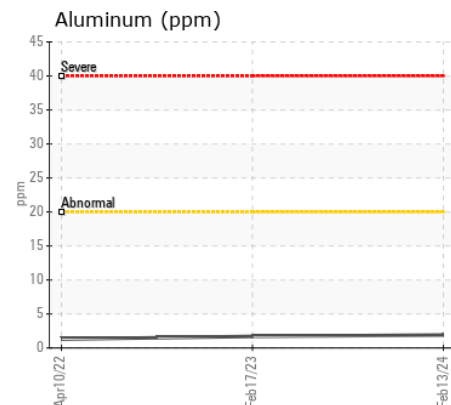
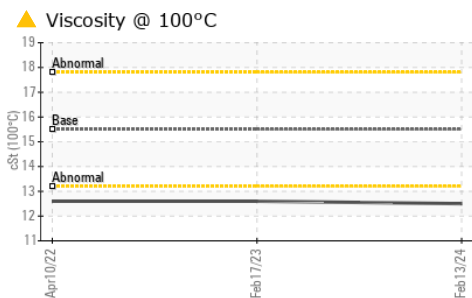
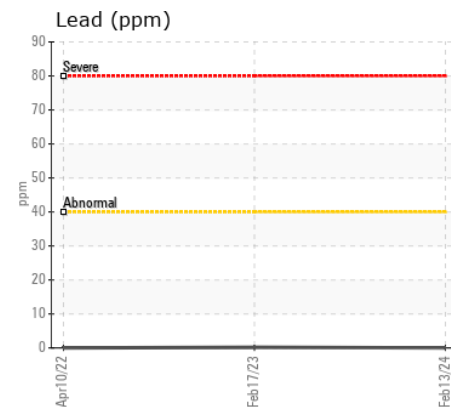
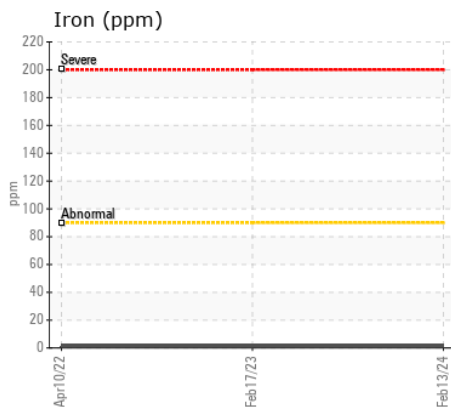
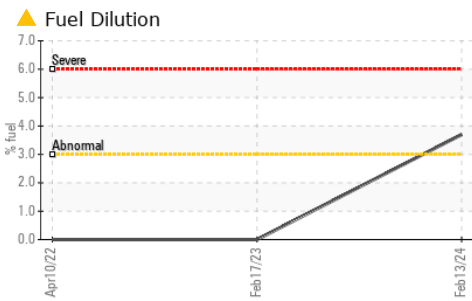
There is a moderate amount of fuel present in the oil. Tests confirm the presence of fuel in the oil.

Silicon	ppm	ASTM D5185(m)	>25	2	3	4
Potassium	ppm	ASTM D5185(m)	>20	<1	<1	1
Fuel	%	ASTM D7593*	>3.0	▲ 3.7	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	ASTM D7844*	>6	0	0	0
Nitration	Abs/cm	ASTM D7624*	>20	7.4	7.3	7.3
Sulfation	Abs/.1mm	ASTM D7415*	>30	19.6	24.2	16.8
Emulsified Water	scalar	Visual*	>0.2	NEG	NEG	NEG

## FLUID CONDITION

Fuel is present in the oil and is lowering the viscosity. The oil is no longer serviceable due to the presence of contaminants.

Sodium	ppm	ASTM D5185(m)		2	3	2
Boron	ppm	ASTM D5185(m)		66	64	70
Barium	ppm	ASTM D5185(m)		0	0	0
Molybdenum	ppm	ASTM D5185(m)		66	61	62
Manganese	ppm	ASTM D5185(m)		0	<1	<1
Magnesium	ppm	ASTM D5185(m)		65	54	52
Calcium	ppm	ASTM D5185(m)	3290	2127	2218	2230
Phosphorus	ppm	ASTM D5185(m)	1200	933	949	1071
Zinc	ppm	ASTM D5185(m)	1400	1133	1133	1109
Sulfur	ppm	ASTM D5185(m)	4000	2842	2829	3019
Oxidation	Abs/.1mm	ASTM D7414*	>25	17.6	20.9	12.9
Visc @ 100°C	cSt	ASTM D7279(m)	15.5	▲ 12.5	12.6	12.6



ISO 17025:2017  
Accredited  
Laboratory

**Laboratory** : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9  
**Sample No.** : WC0888828 **Received** : 15 Apr 2024  
**Lab Number** : 02628725 **Tested** : 16 Apr 2024  
**Unique Number** : 5761857 **Diagnosed** : 16 Apr 2024 - Wes Davis  
**Test Package** : MOB 1 ( Additional Tests: FuelDilution, PercentFuel )

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.

**GenWorx Power Systems Inc.**  
 785 Westney Road, Unit 4  
 Ajax, ON  
 CA L1S 7G1  
 Contact: J Curtis  
 jcurtis@genworx.ca

T:  
F: