



TRAAP

Texas Refinery Advanced Analysis Program

# OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id  
**CHRYSLER 2C4RC1BG4GR279855**  
 Component  
**Gasoline Engine**  
 Fluid  
**TRC PRO-SPEC SINGLE-VIS 30W (5 QTS)**

## RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		TR06237083	TR05379236	TR05299549
Sample Date		Client Info		24 Jun 2024	13 Oct 2021	11 Jul 2021
Machine Age	mls	Client Info		80080	60842	57772
Oil Age	mls	Client Info		4000	3300	3400
Filter Age	mls	Client Info		4000	3300	3400
Oil Changed		Client Info		Changed	Changed	Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	NORMAL	NORMAL

## WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>150	9	5	5
Chromium	ppm	ASTM D5185m	>20	<1	<1	<1
Nickel	ppm	ASTM D5185m	>5	0	0	0
Titanium	ppm	ASTM D5185m		0	0	<1
Silver	ppm	ASTM D5185m	>2	0	0	0
Aluminum	ppm	ASTM D5185m	>40	3	2	0
Lead	ppm	ASTM D5185m	>50	0	0	<1
Copper	ppm	ASTM D5185m	>155	3	7	7
Tin	ppm	ASTM D5185m	>10	0	0	0
Vanadium	ppm	ASTM D5185m		0	0	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

## CONTAMINATION

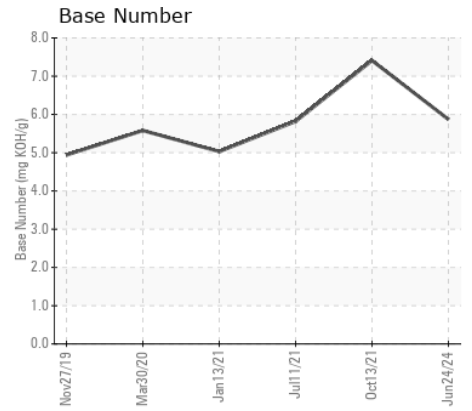
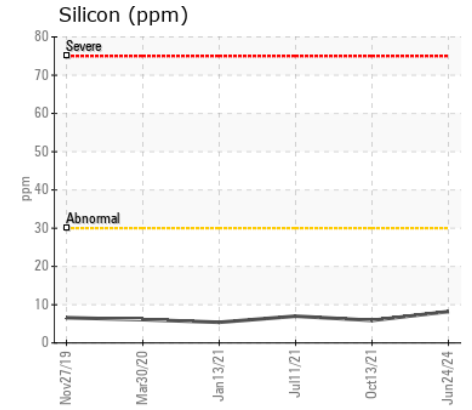
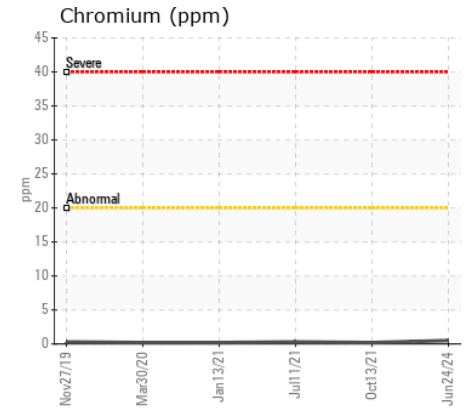
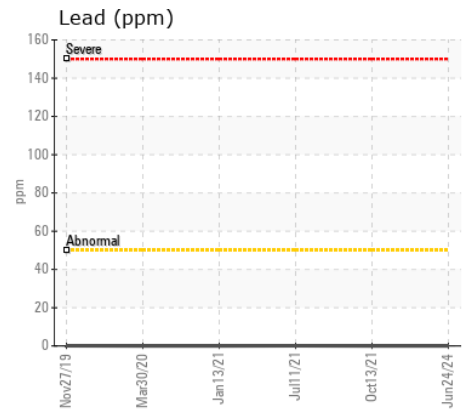
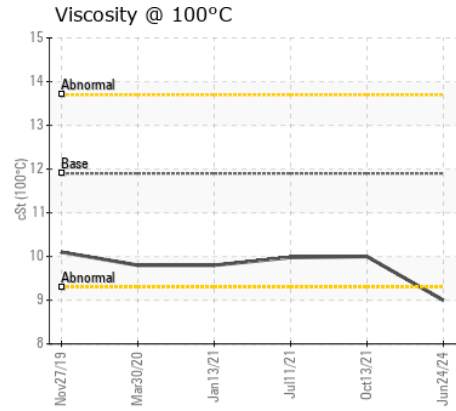
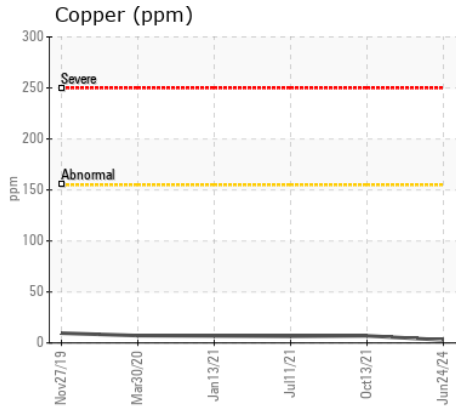
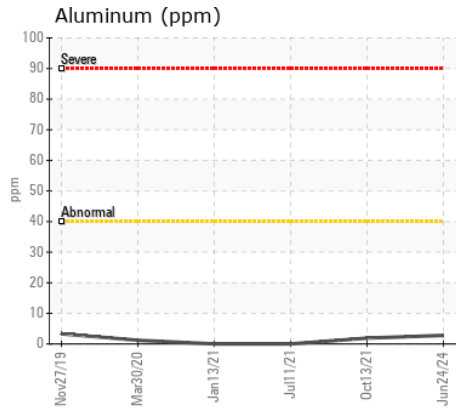
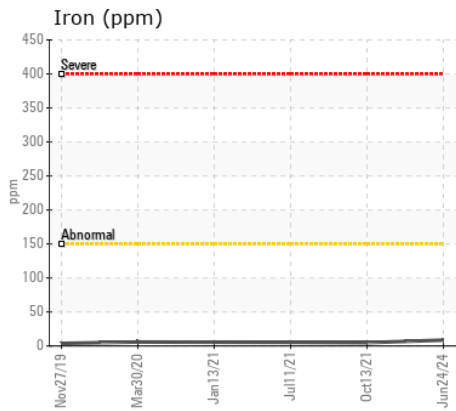
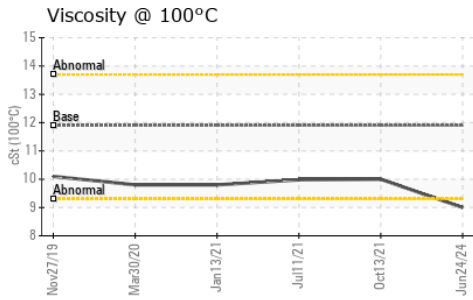
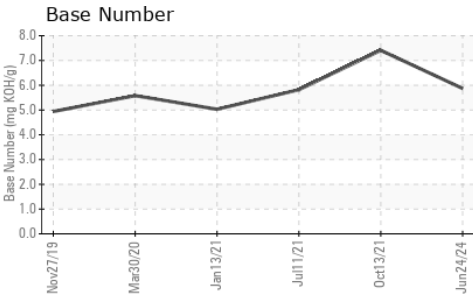
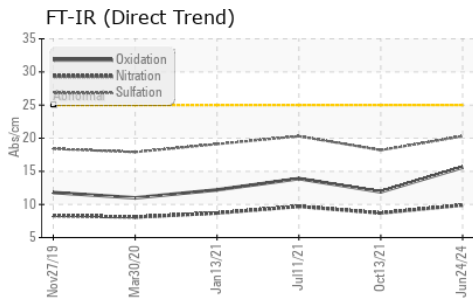
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>30	8	6	7
Potassium	ppm	ASTM D5185m	>20	1	5	1
Fuel	%	ASTM D3524	>4.0	<1.0	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844		0	0	0.1
Nitration	Abs/cm	*ASTM D7624	>20	9.9	8.7	9.7
Sulfation	Abs/.1mm	*ASTM D7415	>30	20.3	18.2	20.3
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	NEG	NEG	NEG

## 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.

Sodium	ppm	ASTM D5185m	>400	<1	<1	2
Boron	ppm	ASTM D5185m		49	40	43
Barium	ppm	ASTM D5185m		0	<1	<1
Molybdenum	ppm	ASTM D5185m		141	160	153
Manganese	ppm	ASTM D5185m		0	<1	<1
Magnesium	ppm	ASTM D5185m		456	420	352
Calcium	ppm	ASTM D5185m		1236	1434	1496
Phosphorus	ppm	ASTM D5185m		643	650	609
Zinc	ppm	ASTM D5185m		811	780	747
Sulfur	ppm	ASTM D5185m		1909	1710	1656
Oxidation	Abs/.1mm	*ASTM D7414	>25	15.6	11.9	13.9
Base Number (BN)	mg KOH/g	ASTM D2896		5.87	7.41	5.82
Visc @ 100°C	cSt	ASTM D445	11.9	9.0	10.0	9.98



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : TR06237083  
**Lab Number** : 06237083  
**Unique Number** : 11125917  
**Test Package** : MOB 2 ( Additional Tests: FuelDilution, PercentFuel )

**Received** : 15 Jul 2024  
**Tested** : 17 Jul 2024  
**Diagnosed** : 17 Jul 2024 - Don Baldridge

**HARLAN MUNNING**  
 212 COUNTY RD 1  
 MT LAKE, MN  
 US 56159  
 Contact: HARLAN MUNNING

To discuss this sample report, contact Customer Service at 1-800-827-0711.

\* - 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)

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F: