

# **OIL ANALYSIS REPORT**

#### Sample Rating Trend

### NORMAL

## Machine Id 3579C Component **Natural Gas Engine** CHEVRON DELO 400 NG (48 QTS)

### DIAGNOSIS

#### Recommendation

Resample at the next service interval to monitor.

#### Wear

All component wear rates are normal.

#### Contamination

There is no indication of any contamination in the oil.

### 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.





## 

SAMPLE INFORM	VIATION	method	limit/base	current	history1	history2
Sample Number		Client Info		GFL0089288	GFL0056598	GFL0052318
Sample Date		Client Info		25 Aug 2023	20 Mar 2023	09 Aug 2022
Machine Age	hrs	Client Info		5219	4132	2834
Oil Age	hrs	Client Info		0	1377	481
Oil Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	NORMAL	NORMAL
WEAR METAL	S	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>50	18	11	7
Chromium	ppm	ASTM D5185m	>4	2	2	<1
Nickel	ppm	ASTM D5185m	>2	<1	<1	0
Titanium	ppm	ASTM D5185m		<1	0	0
Silver	ppm	ASTM D5185m	>3	0	0	0
Aluminum	ppm	ASTM D5185m	>9	6	3	2
Lead	ppm	ASTM D5185m	>30	7	6	3
Copper	ppm	ASTM D5185m	>35	<1	<1	<1
Tin	ppm	ASTM D5185m	>4	<1	1	<1
Vanadium	ppm	ASTM D5185m		0	<1	<1
Cadmium	ppm	ASTM D5185m		0	0	0
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		14	10	11
Barium	ppm	ASTM D5185m		0	0	0
Molybdenum	ppm	ASTM D5185m		64	56	51
Manganese	ppm	ASTM D5185m		1	<1	<1
Magnesium	ppm	ASTM D5185m		658	606	531
Calcium	ppm	ASTM D5185m		1932	1785	1542
Phosphorus	ppm	ASTM D5185m	800	860	752	655
Zinc	ppm	ASTM D5185m	880	1116	1051	919
Sulfur	ppm	ASTM D5185m		3259	3106	2317
CONTAMINAN	TS	method	limit/base	current	history1	history2
Silicon						
	ppm	ASTM D5185m	>+100	11	5	12
Sodium	ppm ppm	ASTM D5185m ASTM D5185m	>+100	11 8	5 7	12 7
Sodium Potassium	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m	>+100 >20	11 8 <1	5 7 1	12 7 2
Sodium Potassium INFRA-RED	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method	>+100 >20 limit/base	11 8 <1 current	5 7 1 history1	12 7 2 history2
Sodium Potassium INFRA-RED Soot %	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method *ASTM D7844	>+100 >20 limit/base	11 8 <1 current 0	5 7 1 history1 0.1	12 7 2 history2 0
Sodium Potassium INFRA-RED Soot % Nitration	ppm ppm ppm % Abs/cm	ASTM D5185m ASTM D5185m ASTM D5185m *ASTM D7844 *ASTM D7624	>+100 >20 limit/base >20	11 8 <1 current 0 11.5	5 7 1 <u>history1</u> 0.1 12.2	12 7 2 history2 0 11.5
Sodium Potassium INFRA-RED Soot % Nitration Sulfation	ppm ppm ppm % Abs/cm Abs/.1mm	ASTM D5185m ASTM D5185m ASTM D5185m *ASTM D7844 *ASTM D7624 *ASTM D7415	>+100 >20 limit/base >20 >30	11 8 <1 current 0 11.5 24.3	5 7 1 history1 0.1 12.2 24.8	12 7 2 history2 0 11.5 22.3
Sodium Potassium INFRA-RED Soot % Nitration Sulfation FLUID DEGRAE	ppm ppm ppm % Abs/cm Abs/1mm OATION	ASTM D5185m ASTM D5185m ASTM D5185m *ASTM D7844 *ASTM D7624 *ASTM D7415 method	>+100 >20 limit/base >20 >20 >30	11 8 <1 current 0 11.5 24.3 current	5 7 1 history1 0.1 12.2 24.8 history1	12 7 2 history2 0 11.5 22.3 history2
Sodium Potassium INFRA-RED Soot % Nitration Sulfation FLUID DEGRAD Oxidation	ppm ppm ppm % Abs/cm Abs/1mm Abs/1mm	ASTM D5185m ASTM D5185m ASTM D5185m *ASTM D7844 *ASTM D7844 *ASTM D7415 method *ASTM D7414	>+100 >20 limit/base >20 >30 limit/base >25	11 8 <1 current 0 11.5 24.3 current 20.8	5 7 1 history1 0.1 12.2 24.8 history1 20.0	12 7 2 history2 0 11.5 22.3 history2 19.8



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VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	LIGHT	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	>0.1	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
	DTIEC	mothod	limit/baco	ourropt	history1	history?
		methou	IIIIII/Dase	Current	TIIStOLYT	TIIStOLYZ
Visc @ 100°C	cSt	ASTM D445	15.8	15.0	14.7	15.2
GRAPHS						



pr10/20

an 19 Dec7





0

20

18

10°C) 14 15

10

8

