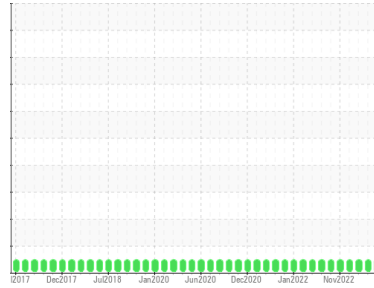




# OIL ANALYSIS REPORT

Sample Rating Trend

**NORMAL**



Area  
**JERRY A TINKEY**  
 Machine Id  
**[JERRY A TINKEY] 001 516506-1**  
 Component  
**Port Main Engine**  
 Fluid  
**CHEVRON DELO 710 LE (--- GAL)**

## 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 INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			<b>MW0063298</b>	MW0046601	MW0026953
Sample Date	Client Info			<b>01 Dec 2023</b>	01 Oct 2023	01 Apr 2023
Machine Age	hrs	Client Info		<b>71777</b>	71674	71085
Oil Age	hrs	Client Info		<b>71777</b>	71674	71085
Oil Changed	Client Info			<b>Not Changed</b>	Not Changed	Not Changed
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

CONTAMINATION		method	limit/base	current	history1	history2
Fuel	WC Method	>4.0		<b>&lt;1.0</b>	<1.0	<1.0
Water	WC Method	>0.1		<b>NEG</b>	NEG	NEG
Glycol	WC Method			<b>NEG</b>	NEG	NEG

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>75	<b>8</b>	7	10
Chromium	ppm	ASTM D5185m	>8	<b>&lt;1</b>	<1	1
Nickel	ppm	ASTM D5185m	>2	<b>0</b>	<1	0
Titanium	ppm	ASTM D5185m	>3	<b>&lt;1</b>	<1	0
Silver	ppm	ASTM D5185m	>2	<b>0</b>	0	0
Aluminum	ppm	ASTM D5185m	>15	<b>&lt;1</b>	2	1
Lead	ppm	ASTM D5185m	>18	<b>1</b>	2	0
Copper	ppm	ASTM D5185m	>80	<b>9</b>	9	9
Tin	ppm	ASTM D5185m	>14	<b>2</b>	2	1
Vanadium	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Cadmium	ppm	ASTM D5185m		<b>0</b>	<1	0

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		<b>50</b>	43	47
Barium	ppm	ASTM D5185m		<b>0</b>	9	0
Molybdenum	ppm	ASTM D5185m		<b>46</b>	54	49
Manganese	ppm	ASTM D5185m		<b>0</b>	0	<1
Magnesium	ppm	ASTM D5185m		<b>31</b>	22	20
Calcium	ppm	ASTM D5185m		<b>3292</b>	3251	3520
Phosphorus	ppm	ASTM D5185m		<b>32</b>	48	10
Zinc	ppm	ASTM D5185m	10	<b>37</b>	21	7
Sulfur	ppm	ASTM D5185m		<b>2198</b>	2955	2700

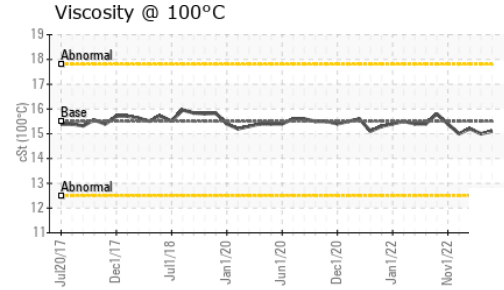
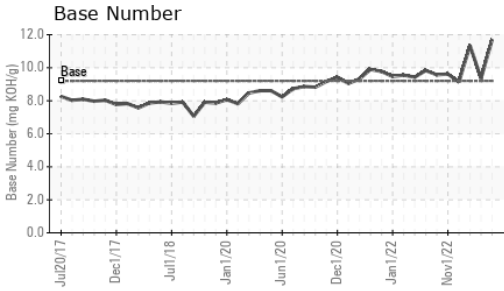
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>20	<b>4</b>	4	3
Sodium	ppm	ASTM D5185m	>75	<b>3</b>	2	3
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	3	2

INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844	>3	<b>1.4</b>	1.5	1.2
Nitration	Abs/cm	*ASTM D7624	>20	<b>7.5</b>	7.8	7.5
Sulfation	Abs/.1mm	*ASTM D7415	>30	<b>17.0</b>	17.1	15.4

FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	<b>7.2</b>	7.3	7.2
Base Number (BN)	mg KOH/g	ASTM D2896	9.2	<b>11.70</b>	9.35	11.35



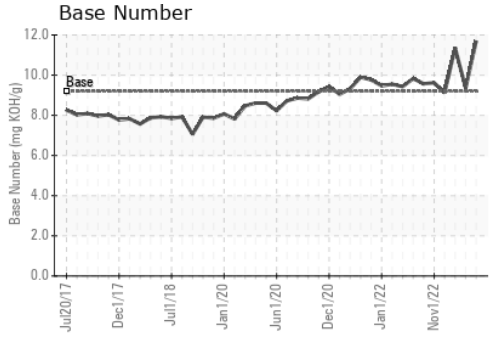
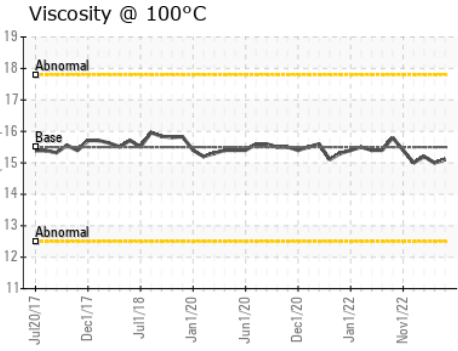
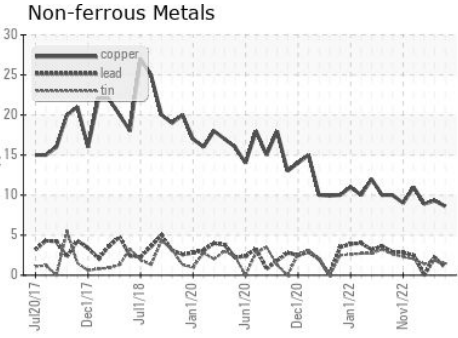
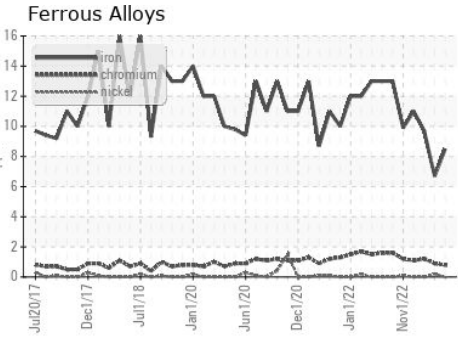
# OIL ANALYSIS REPORT



VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2	
Visc @ 100°C	cSt	ASTM D445	15.5	<b>15.1</b>	15.0	15.2

## GRAPHS



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : MW0063298 **Received** : 07 Dec 2023  
**Lab Number** : **06028812** **Diagnosed** : 11 Dec 2023  
**Unique Number** : 10778603 **Diagnostician** : Don Baldrige  
**Test Package** : MAR 2

**INGRAM BARGE**  
 900 S 3RD ST  
 PADUCAH, KY  
 US 42003

Contact: ZACH BURKHART  
 zachary.burkhart@ingrambarge.com  
 T:  
 F: (615)695-3697

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