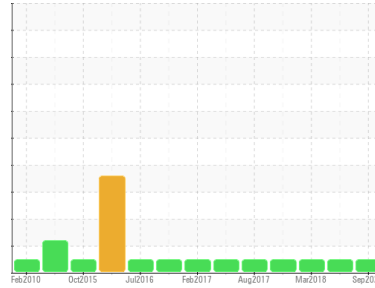




OIL ANALYSIS REPORT

Sample Rating Trend



NORMAL



Machine Id
7708

Component
Diesel Engine

Fluid
CHEVRON DELO 400 MULTIGRADE 15W40 (--- 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		KL0013231	KLMFA23165	KLMFA23884
Sample Date	Client Info		06 Sep 2023	03 Aug 2018	02 Mar 2018
Machine Age	mls	Client Info	48511	13762	13024
Oil Age	mls	Client Info	0	13762	13024
Oil Changed	Client Info		N/A	Not Changd	Not Changd
Sample Status			NORMAL	NORMAL	NORMAL

CONTAMINATION

	method	limit/base	current	history1	history2
Fuel	WC Method	>5	<1.0	<1.0	<1.0
Glycol	WC Method		NEG	NEG	NEG

WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >100	20	22	17
Chromium	ppm	ASTM D5185m >20	<1	<1	<1
Nickel	ppm	ASTM D5185m >4	<1	<1	0
Titanium	ppm	ASTM D5185m	<1	<1	<1
Silver	ppm	ASTM D5185m >3	0	0	0
Aluminum	ppm	ASTM D5185m >20	1	2	2
Lead	ppm	ASTM D5185m >40	5	65	24
Copper	ppm	ASTM D5185m >330	7	13	15
Tin	ppm	ASTM D5185m >15	3	<1	2
Antimony	ppm	ASTM D5185m	---	<1	3
Vanadium	ppm	ASTM D5185m	0	0	0
Cadmium	ppm	ASTM D5185m	0	0	0

ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m 151	2	108	151
Barium	ppm	ASTM D5185m 0.4	6	1	<1
Molybdenum	ppm	ASTM D5185m 250	72	54	64
Manganese	ppm	ASTM D5185m	3	<1	<1
Magnesium	ppm	ASTM D5185m 0	1118	473	440
Calcium	ppm	ASTM D5185m 2046	1211	1487	1517
Phosphorus	ppm	ASTM D5185m 1043	1215	808	838
Zinc	ppm	ASTM D5185m 943	1467	952	1004
Sulfur	ppm	ASTM D5185m 5012	3742	2247	2305

CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >25	17	10	12
Sodium	ppm	ASTM D5185m	6	5	5
Potassium	ppm	ASTM D5185m >20	5	0	4

INFRA-RED

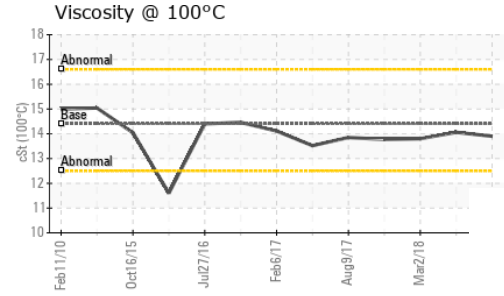
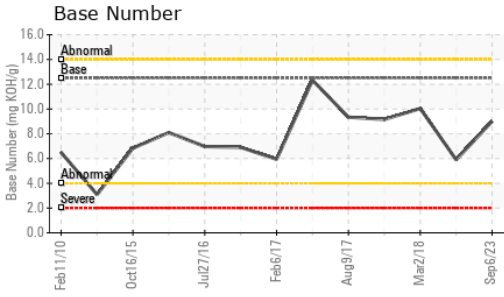
	method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844 >3	0.1	0.6	0.2
Nitration	Abs/cm	*ASTM D7624 >20	5.5	10.7	7.
Sulfation	Abs/.1mm	*ASTM D7415 >30	18.0	25.4	20.

FLUID DEGRADATION

	method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414 >25	14.0	25.9	16.
Base Number (BN)	mg KOH/g	ASTM D2896 12.5	9.0	5.9	10.04



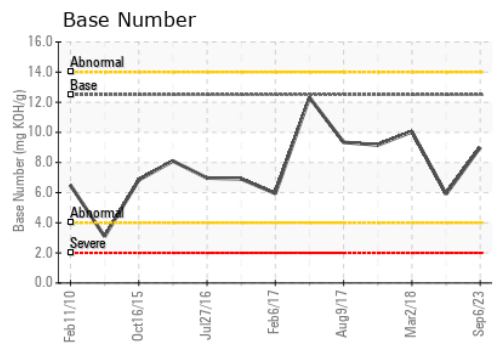
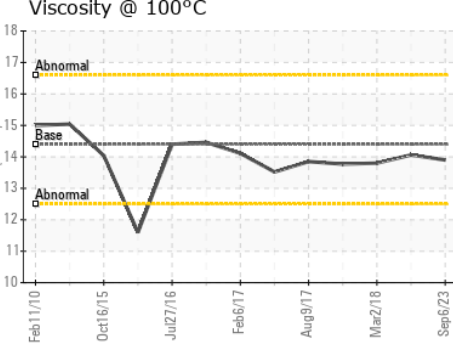
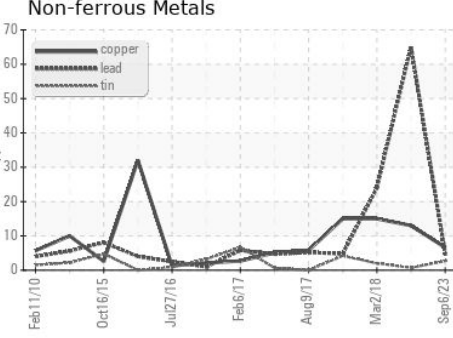
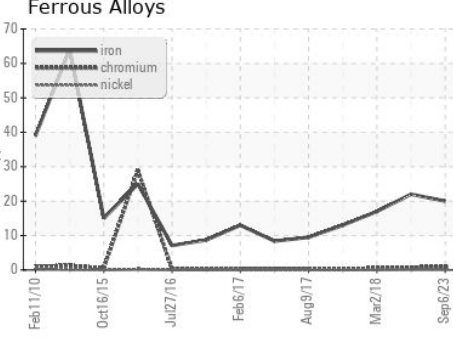
OIL ANALYSIS REPORT



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	>0.2	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2	
Visc @ 100°C	cSt	ASTM D445	14.4	13.9	14.06	13.8

GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : KL0013231 **Received** : 02 Oct 2023
Lab Number : **05966130** **Diagnosed** : 03 Oct 2023
Unique Number : 10672681 **Diagnostician** : Don Baldrige
Test Package : FLEET

VILLAGE OF RUIDOSO
 313 CREE MEADOWS DR
 RUIDOSO, NM
 US 88355
 Contact: JERRY PARSONS
 jerryparsons@ruidoso-nm.gov
 T: (575)257-1702
 F: x:

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)