OIL ANALYSIS REPORT

360 OIL DIAGNOSTICS | TECHNICAL EXPERTISE

NORMAL

Area
Nickelson
Machine Id
Sany SY365 SY036MCB00618 Nickelson
Component
Left Final Drive
Fluid
CITGO PREMIUM GEAR 80W90 (--- GAL)

| | Sep2022 | Jun2023 | Oct2023 | Dec2023 | Feb2024 | Apr2024 |

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 condition of the oil is acceptable for the time in service.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number		Client Info		**PCA0115503**	LW0008312	LW0008243
Sample Date		Client Info		**04 Apr 2024**	28 Feb 2024	19 Dec 2023
Machine Age	hrs	Client Info		**2845**	2576	2158
Oil Age	hrs	Client Info		**2845**	2576	2158
Oil Changed		Client Info		**Not Changd**	Not Changd	Not Changd
Sample Status				**NORMAL**	ABNORMAL	ABNORMAL

CONTAMINATION		method	limit/base	current	history1	history2
Water		WC Method	>0.2	**NEG**	NEG	NEG

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>500	**297**	278	297
Chromium	ppm	ASTM D5185m	>10	**8**	4	7
Nickel	ppm	ASTM D5185m	>10	**1**	0	0
Titanium	ppm	ASTM D5185m		**2**	<1	<1
Silver	ppm	ASTM D5185m		**0**	0	0
Aluminum	ppm	ASTM D5185m	>25	**23**	9	6
Lead	ppm	ASTM D5185m	>25	**1**	3	0
Copper	ppm	ASTM D5185m	>50	**4**	2	1
Tin	ppm	ASTM D5185m	>10	**<1**	0	0
Vanadium	ppm	ASTM D5185m		**<1**	0	0
Cadmium	ppm	ASTM D5185m		**<1**	0	0

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		**57**	49	4
Barium	ppm	ASTM D5185m		**5**	3	9
Molybdenum	ppm	ASTM D5185m		**<1**	0	0
Manganese	ppm	ASTM D5185m		**5**	3	5
Magnesium	ppm	ASTM D5185m		**9**	2	3
Calcium	ppm	ASTM D5185m		**52**	22	28
Phosphorus	ppm	ASTM D5185m		**900**	796	539
Zinc	ppm	ASTM D5185m		**34**	12	40
Sulfur	ppm	ASTM D5185m		**24916**	19365	17202

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>75	**45**	22	16
Sodium	ppm	ASTM D5185m		**12**	7	14
Potassium	ppm	ASTM D5185m	>20	**5**	<1	2

VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	**NONE**	⚠ HEAVY	MODER
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	**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	0.2%
Free Water	scalar	*Visual		**NEG**	NEG	NEG

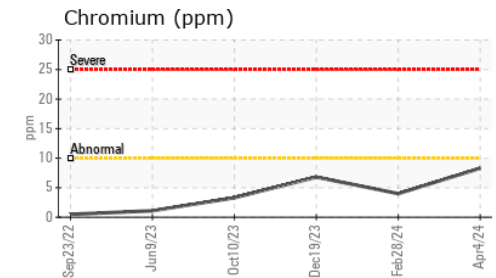**OIL DIAGNOSTICS** — 360 TECHNICAL EXPERTISE

Viscosity @ 40°C
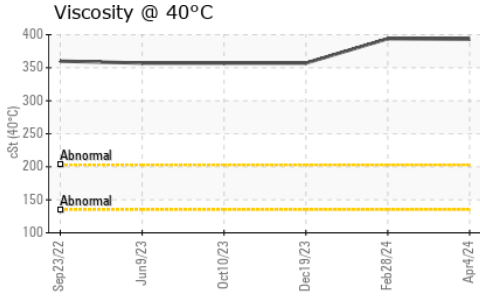
FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	**393**	394	357

SAMPLE IMAGES	method	limit/base	current	history1	history2
Color			*no image*	*no image*	*no image*
Bottom			*no image*	*no image*	*no image*

GRAPHS

Iron (ppm)

Lead (ppm)

Aluminum (ppm)

Chromium (ppm)

Copper (ppm)

Silicon (ppm)

Viscosity @ 40°C

Additives (calcium, phosphorus, zinc)
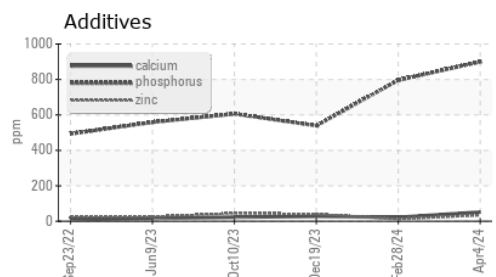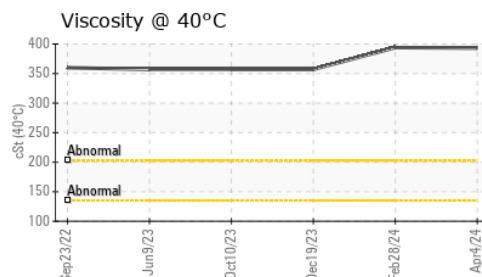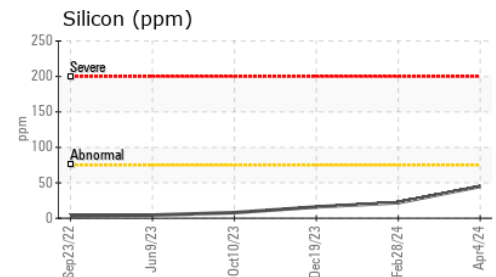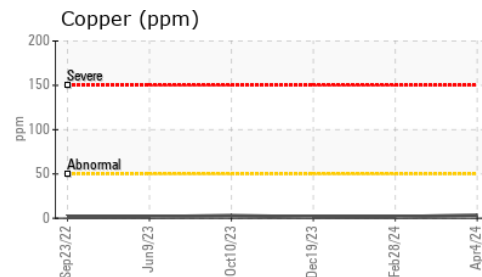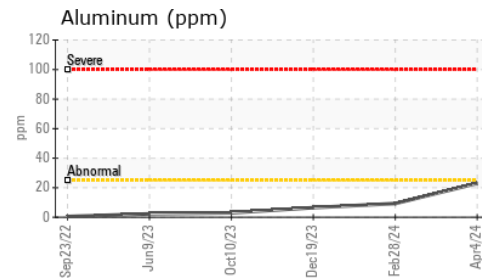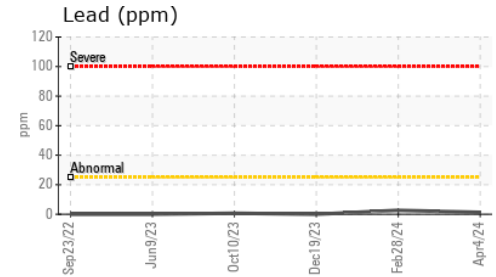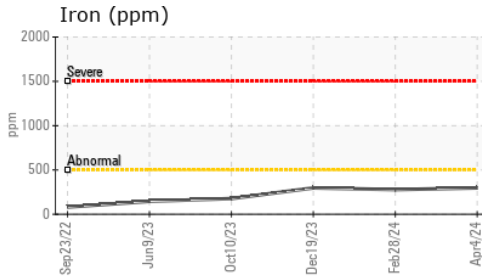
Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513

Sample No. : PCA0115503	**Received**	: 09 Apr 2024	
Lab Number : 06143404	**Tested**	: 10 Apr 2024	
Unique Number : 10968212	**Diagnosed**	: 12 Apr 2024 - Jonathan Hester	
Test Package : MOB 1			

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To discuss this sample report, contact Customer Service at 1-800-237-1369.
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Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)