



OIL ANALYSIS REPORT

Area
GRADER
Machine Id
GRDG105
Component
Front Right Final Drive
Fluid
GEAR OIL SAE 80W90 (--- GAL)

Sample Rating Trend



WEAR



DIAGNOSIS

▲ Recommendation

We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition. The fluid was not specified, however, a fluid match indicates that this fluid is (GENERIC) GEAR OIL SAE 80W90. Please confirm.

▲ Wear

Copper and lead ppm levels are abnormal. Bearing and/or bushing wear is indicated.

Contamination

There is no indication of any contamination in the oil.

Fluid Condition

The oil is no longer serviceable as a result of the abnormal and/or severe wear.

SAMPLE INFORMATION

	method	limit/base	current	history1	history2
Sample Number	Client Info		PC0075015	---	---
Sample Date	Client Info		13 Nov 2023	---	---
Machine Age	hrs	Client Info	3423	---	---
Oil Age	hrs	Client Info	0	---	---
Oil Changed	Client Info		N/A	---	---
Sample Status			ABNORMAL	---	---

CONTAMINATION

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

WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185(m)	>800	9	---
Chromium	ppm	ASTM D5185(m)	>10	0	---
Nickel	ppm	ASTM D5185(m)	>5	<1	---
Titanium	ppm	ASTM D5185(m)	>15	0	---
Silver	ppm	ASTM D5185(m)	>2	<1	---
Aluminum	ppm	ASTM D5185(m)	>75	30	---
Lead	ppm	ASTM D5185(m)	>10	▲ 18	---
Copper	ppm	ASTM D5185(m)	>75	▲ 122	---
Tin	ppm	ASTM D5185(m)	>8	4	---
Antimony	ppm	ASTM D5185(m)	>50	0	---
Vanadium	ppm	ASTM D5185(m)		0	---
Beryllium	ppm	ASTM D5185(m)		0	---
Cadmium	ppm	ASTM D5185(m)		0	---

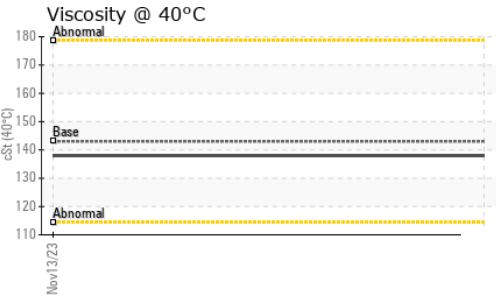
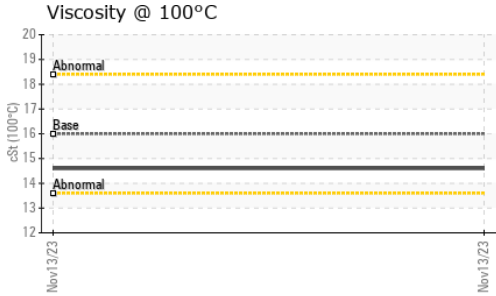
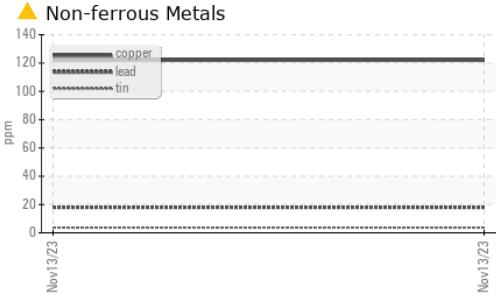
ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185(m)	400	<1	---
Barium	ppm	ASTM D5185(m)	200	2	---
Molybdenum	ppm	ASTM D5185(m)	12	0	---
Manganese	ppm	ASTM D5185(m)		0	---
Magnesium	ppm	ASTM D5185(m)	12	<1	---
Calcium	ppm	ASTM D5185(m)	150	22	---
Phosphorus	ppm	ASTM D5185(m)	1650	561	---
Zinc	ppm	ASTM D5185(m)	125	6	---
Sulfur	ppm	ASTM D5185(m)	22500	21577	---
Lithium	ppm	ASTM D5185(m)		<1	---

CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>400	<1	---
Sodium	ppm	ASTM D5185(m)	>170	<1	---
Potassium	ppm	ASTM D5185(m)	>20	0	---

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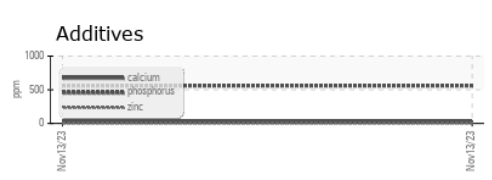
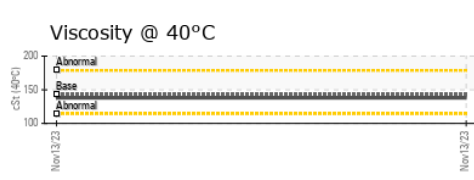
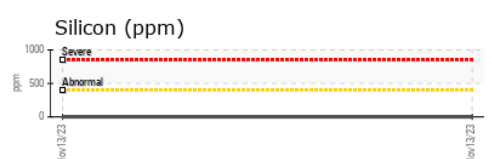
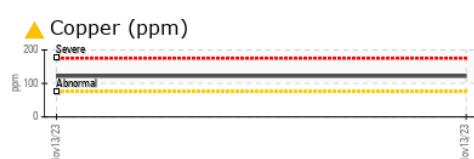
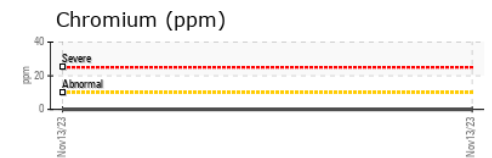
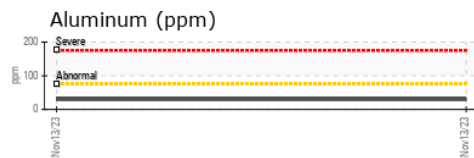
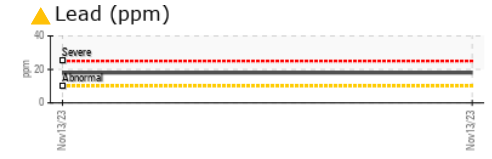


PROPERTY	method	limit/base	current	history1	history2
White Metal	scalar	Visual*	NONE	---	---
Yellow Metal	scalar	Visual*	NONE	---	---
Precipitate	scalar	Visual*	NONE	---	---
Silt	scalar	Visual*	NONE	---	---
Debris	scalar	Visual*	NONE	---	---
Sand/Dirt	scalar	Visual*	NONE	---	---
Appearance	scalar	Visual*	NORML	---	---
Odor	scalar	Visual*	NORML	---	---
Emulsified Water	scalar	Visual*	>0.2	---	---
Free Water	scalar	Visual*	---	---	---

PROPERTY	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D7279(m)	143	---	---
Visc @ 100°C	cSt	ASTM D7279(m)	16.0	---	---
Viscosity Index (VI)	Scale	ASTM D2270*	117	---	---

PROPERTY	method	limit/base	current	history1	history2
Color				no image	no image
Bottom				no image	no image

GRAPHS



Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9
Sample No. : PC0075015
Lab Number : 02601294
Unique Number : 5694379
Test Package : MOB 1 (Additional Tests: KV100, VI)

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 CA
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*To discuss this sample report, contact Customer Service at 1-800-268-2131.
 Test denoted (*) outside scope of accreditation, (m) method modified, (e) tested at external lab.
 Validity of results and interpretation are based on the sample and information as supplied.*