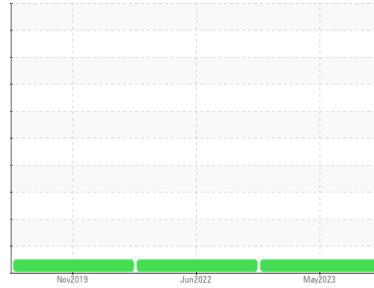




OIL ANALYSIS REPORT

Area
Watkins Block Truck Shop Omaha
 Machine Id
208 [Watkins Block Truck Shop Omaha]
 Component
Front Diesel Engine
 Fluid
PETRO CANADA 10W30 (--- GAL)

Sample Rating Trend



NORMAL



DIAGNOSIS

Recommendation

Resample at the next service interval to monitor.

Wear

Metal levels are typical for a new component breaking in.

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		SBP0002229	SBP0000263	SBP22426040
Sample Date	Client Info		18 May 2023	13 Jun 2022	11 Nov 2019
Machine Age	mls	Client Info	69717	56790	10044
Oil Age	mls	Client Info	12843	11048	5352
Oil Changed	Client Info		Changed	Changed	Changed
Sample Status			NORMAL	NORMAL	NORMAL

CONTAMINATION

	method	limit/base	current	history1	history2
Fuel	WC Method	>3.0	<1.0	<1.0	<1.0
Water	WC Method	>0.2	NEG	NEG	NEG
Glycol	WC Method		NEG	NEG	0.0

WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >120	12	12	9
Chromium	ppm	ASTM D5185m >20	<1	<1	0
Nickel	ppm	ASTM D5185m >5	<1	0	0
Titanium	ppm	ASTM D5185m >2	<1	0	0
Silver	ppm	ASTM D5185m >2	<1	0	0
Aluminum	ppm	ASTM D5185m >20	3	5	8
Lead	ppm	ASTM D5185m >40	<1	1	0
Copper	ppm	ASTM D5185m >330	2	2	170
Tin	ppm	ASTM D5185m >15	2	1	1
Vanadium	ppm	ASTM D5185m	<1	0	0
Cadmium	ppm	ASTM D5185m	0	0	0

ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	26	23	222
Barium	ppm	ASTM D5185m	0	0	0
Molybdenum	ppm	ASTM D5185m	39	14	109
Manganese	ppm	ASTM D5185m	1	<1	0
Magnesium	ppm	ASTM D5185m	882	730	643
Calcium	ppm	ASTM D5185m	1269	1342	1454
Phosphorus	ppm	ASTM D5185m	916	740	763
Zinc	ppm	ASTM D5185m	1131	896	807
Sulfur	ppm	ASTM D5185m	3345	2822	---

CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >25	6	5	10
Sodium	ppm	ASTM D5185m	4	4	1
Potassium	ppm	ASTM D5185m >20	9	11	16
Chlorine	ppm	ASTM D5185m	---	---	0

INFRA-RED

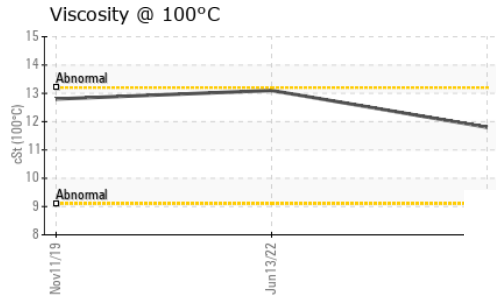
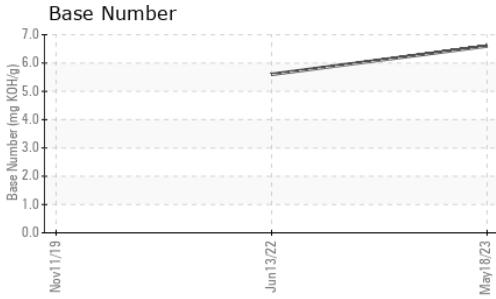
	method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844 >4	0.3	0.3	---
Nitration	Abs/cm	*ASTM D7624 >20	9.6	9.9	---
Sulfation	Abs/.1mm	*ASTM D7415 >30	21.4	22.9	---

FLUID DEGRADATION

	method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414 >25	16.0	16.9	18
Base Number (BN)	mg KOH/g	ASTM D2896	6.6	5.6	---



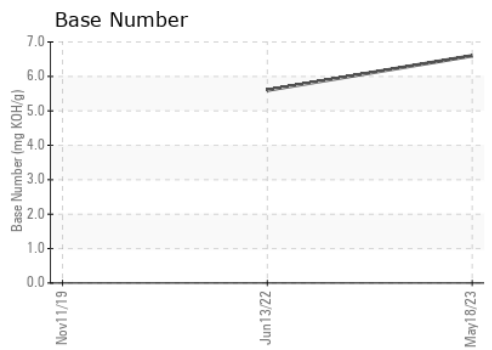
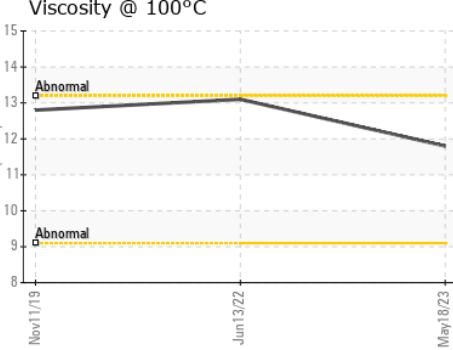
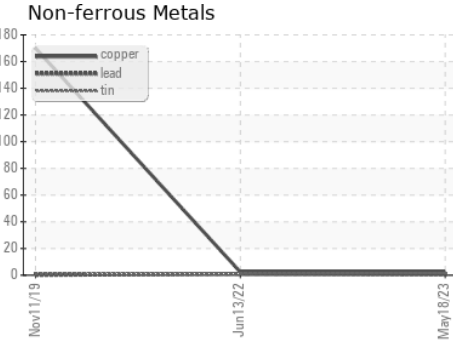
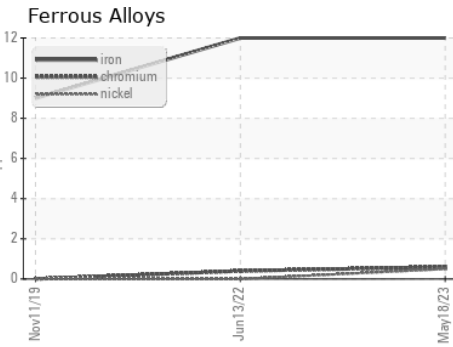
OIL ANALYSIS REPORT



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

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	11.8	13.1	12.8

GRAPHS



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : SBP0002229 **Received** : 25 May 2023
Lab Number : **05857062** **Diagnosed** : 26 May 2023
Unique Number : 10486417 **Diagnostician** : Wes Davis
Test Package : FLEET

Watkins Block Truck Shop Omaha - 602227
 14306 Giles Rd
 Omaha, NE
 US 68138
 Contact: Dave Hozba
 daveh@watkinsconcreteblock.com
 T: (402)894-6518
 F:

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)