



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
INTERNATIONAL 5012890
Component
Diesel Engine
Fluid
VALVOLINE 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		IL0035103	IL05966155	IL05887252
Sample Date		Client Info		12 Dec 2023	25 Sep 2023	20 Jun 2023
Machine Age	mls	Client Info		0	234411	321047
Oil Age	mls	Client Info		0	0	0
Filter Age	mls	Client Info		0	0	0
Oil Changed		Client Info		Changed	N/A	N/A
Filter Changed		Client Info		Changed	N/A	N/A
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>100	25	39	38
Chromium	ppm	ASTM D5185m	>20	<1	1	<1
Nickel	ppm	ASTM D5185m	>4	<1	<1	<1
Titanium	ppm	ASTM D5185m		0	<1	<1
Silver	ppm	ASTM D5185m	>3	0	0	0
Aluminum	ppm	ASTM D5185m	>20	6	7	7
Lead	ppm	ASTM D5185m	>40	1	<1	0
Copper	ppm	ASTM D5185m	>330	1	4	2
Tin	ppm	ASTM D5185m	>15	1	<1	<1
Vanadium	ppm	ASTM D5185m		<1	0	<1
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

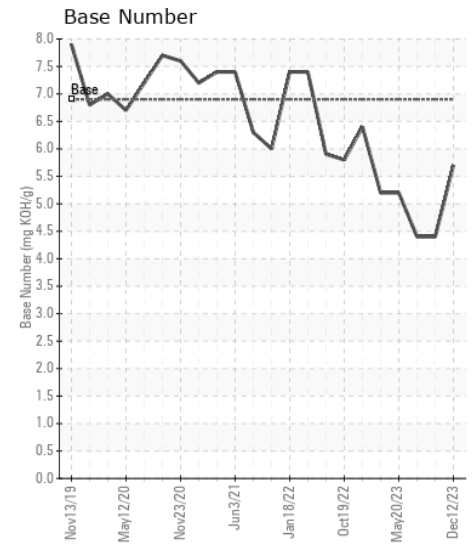
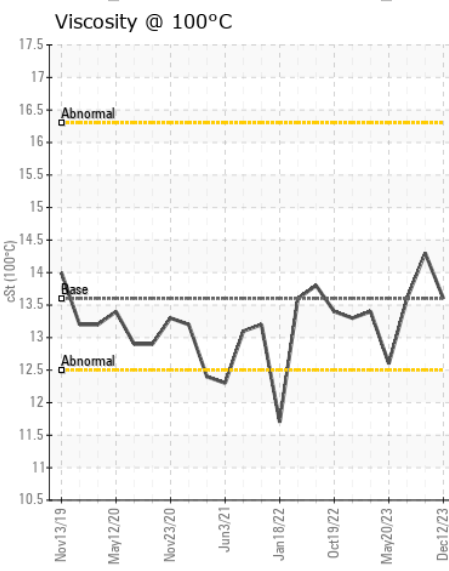
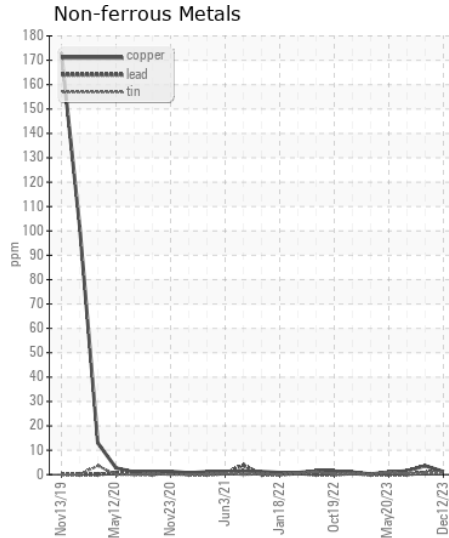
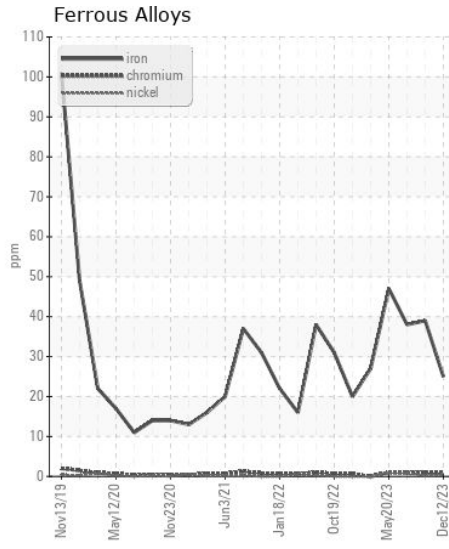
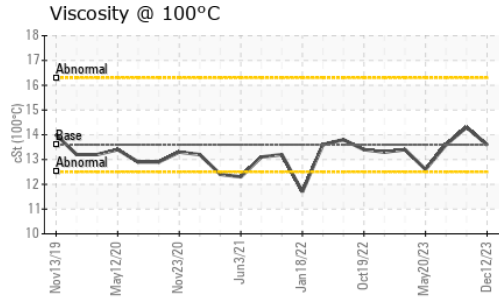
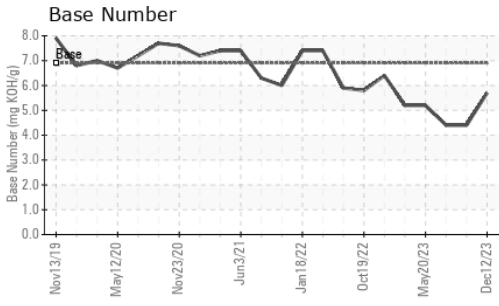
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>25	7	9	10
Potassium	ppm	ASTM D5185m	>20	3	8	8
Fuel		WC Method	>5	<1.0	<1.0	<1.0
Water		WC Method	>0.2	NEG	NEG	NEG
Glycol		WC Method		NEG	NEG	NEG
Soot %	%	*ASTM D7844	>3	0.9	0.8	0.9
Nitration	Abs/cm	*ASTM D7624	>20	13.9	14.6	15.0
Sulfation	Abs/.1mm	*ASTM D7415	>30	28.7	30.8	34.1
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	NEG

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.

Sodium	ppm	ASTM D5185m		2	7	1
Boron	ppm	ASTM D5185m	39	85	79	52
Barium	ppm	ASTM D5185m	1	0	0	0
Molybdenum	ppm	ASTM D5185m	49	97	108	98
Manganese	ppm	ASTM D5185m	1	<1	2	<1
Magnesium	ppm	ASTM D5185m	616	708	834	584
Calcium	ppm	ASTM D5185m	1554	1651	1786	1613
Phosphorus	ppm	ASTM D5185m	899	1054	1158	1072
Zinc	ppm	ASTM D5185m	1069	1387	1460	1358
Sulfur	ppm	ASTM D5185m	2624	3478	3446	3075
Oxidation	Abs/.1mm	*ASTM D7414	>25	28.4	32.2	34.1
Base Number (BN)	mg KOH/g	ASTM D2896	6.9	5.7	4.4	4.4
Visc @ 100°C	cSt	ASTM D445	13.6	13.6	14.3	13.6



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : IL0035103 **Recieved** : 12 Jan 2024
Lab Number : 06058963 **Diagnosed** : 15 Jan 2024
Unique Number : 10830345 **Diagnostician** : Don Baldrige
Test Package : FLEET

TAMPA IDEALEASE
 5951 ORIENT ROAD
 TAMPA, FL
 US 33610-9565
 Contact: Russ Cook
 russcook@idealease.com
 T: (813)626-9285
 F: (844)270-1356

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)