



WEAR CHECK

OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Machine Id
PETERBILT 348 RTK9844 TK (S/N 2NP3XJ0X8HM443144)

Component
Diesel Engine

Fluid
DIESEL ENGINE OIL SAE 40 (9 QTS)

RECOMMENDATION

Resample at the next service interval to monitor. The fluid was not specified, however, a fluid match indicates that this fluid is (GENERIC) DIESEL ENGINE OIL SAE 40. Please confirm.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		ARI06124513	ARI05636243	ARI05050489
Sample Date		Client Info		20 Mar 2024	07 Sep 2022	24 Aug 2020
Machine Age	hrs	Client Info		10461	8041	3065
Oil Age	hrs	Client Info		0	0	0
Filter Age	hrs	Client Info		0	0	0
Oil Changed		Client Info		N/A	N/A	N/A
Filter Changed		Client Info		N/A	N/A	N/A
Sample Status				NORMAL	ATTENTION	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>110	11	6	7
Chromium	ppm	ASTM D5185m	>4	<1	<1	<1
Nickel	ppm	ASTM D5185m	>2	<1	<1	2
Titanium	ppm	ASTM D5185m		<1	0	<1
Silver	ppm	ASTM D5185m	>2	0	<1	<1
Aluminum	ppm	ASTM D5185m	>25	3	2	9
Lead	ppm	ASTM D5185m	>45	<1	<1	2
Copper	ppm	ASTM D5185m	>85	3	<1	1
Tin	ppm	ASTM D5185m	>4	<1	<1	0
Vanadium	ppm	ASTM D5185m		<1	<1	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

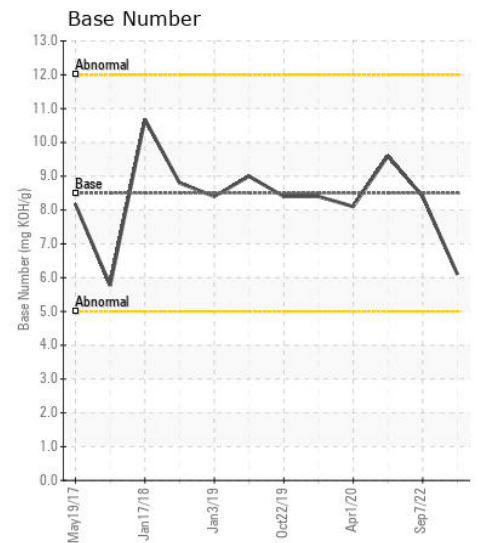
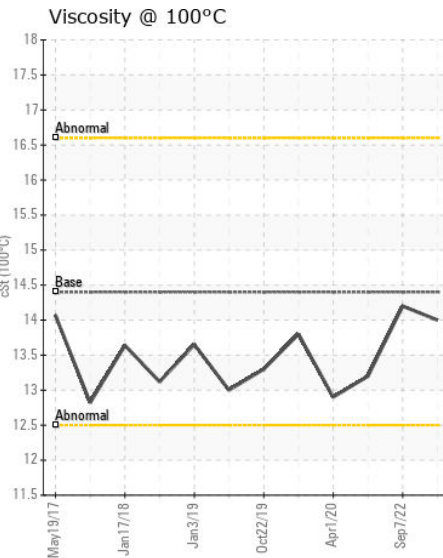
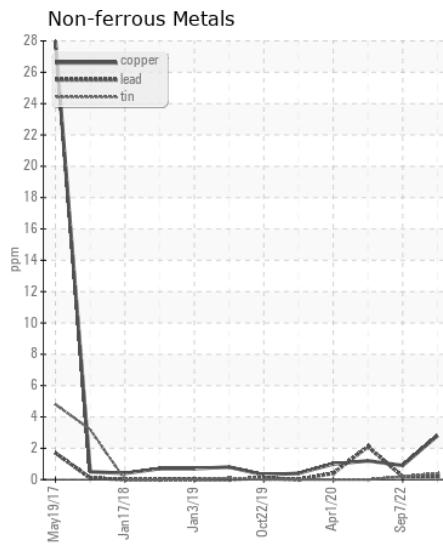
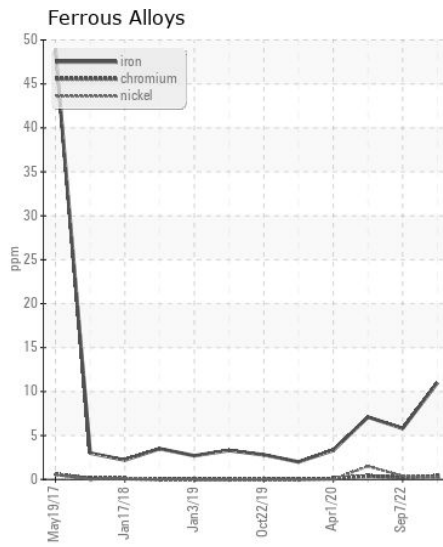
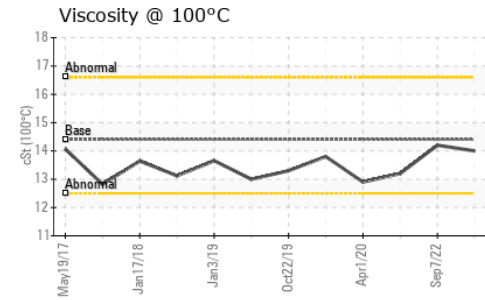
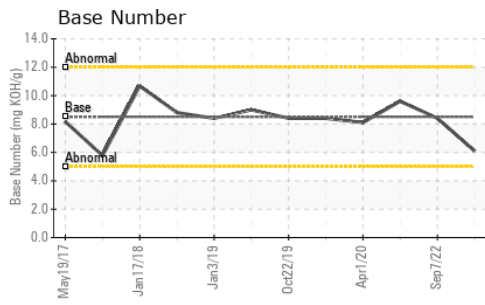
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>30	5	3	6
Potassium	ppm	ASTM D5185m	>20	6	6	<1
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	0.4	0.3	0.3
Nitration	Abs/cm	*ASTM D7624	>20	9.2	8.4	7.2
Sulfation	Abs/.1mm	*ASTM D7415	>30	24.0	22.8	23.3
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	>216	1	2	3
Boron	ppm	ASTM D5185m	250	86	166	297
Barium	ppm	ASTM D5185m	10	1	0	0
Molybdenum	ppm	ASTM D5185m	100	4	14	110
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m	450	201	92	596
Calcium	ppm	ASTM D5185m	3000	2098	1992	1493
Phosphorus	ppm	ASTM D5185m	1150	843	908	754
Zinc	ppm	ASTM D5185m	1350	1049	1103	823
Sulfur	ppm	ASTM D5185m	4250	3573	3215	2060
Oxidation	Abs/.1mm	*ASTM D7414	>25	18.8	19.4	17.4
Base Number (BN)	mg KOH/g	ASTM D2896	8.5	6.1	8.4	9.6
Visc @ 100°C	cSt	ASTM D445	14.4	14.0	14.2	13.2



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513

Sample No. : ARI06124513

Lab Number : 06124513

Unique Number : 10938664

Test Package : CONST (Additional Tests: TBN)

Received : 21 Mar 2024

Tested : 21 Mar 2024

Diagnosed : 21 Mar 2024 - Wes Davis

INSITUFORM TECHNOLOGIES, INC

17988 EDISON AVE.

CHESTERFIELD, MO

US 63005

Contact: JOHN SLOAN

ARICHTER@INSITUFORM.COM

T: (314)280-7555

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)