



OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area
PCS - PORTABLE CRUSHING SERVICES

Machine Id
KOMATSU TH05 - PCS

Component
Diesel Engine

Fluid
CHEVRON DELO 400 SDE SAE 15W40 (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		KL0014743	KL0013783	KL0014076
Sample Date		Client Info		09 Jul 2024	10 Apr 2024	10 Jan 2024
Machine Age	hrs	Client Info		6066	5762	5276
Oil Age	hrs	Client Info		840	536	50
Filter Age	hrs	Client Info		840	536	50
Oil Changed		Client Info		Not Changd	Not Changd	Changed
Filter Changed		Client Info		Not Changd	Not Changd	Changed
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>100	63	38	2
Chromium	ppm	ASTM D5185m	>20	2	2	0
Nickel	ppm	ASTM D5185m	>4	0	1	0
Titanium	ppm	ASTM D5185m		0	<1	0
Silver	ppm	ASTM D5185m	>3	0	0	0
Aluminum	ppm	ASTM D5185m	>20	3	4	2
Lead	ppm	ASTM D5185m	>40	0	<1	0
Copper	ppm	ASTM D5185m	>330	9	7	2
Tin	ppm	ASTM D5185m	>15	0	1	0
Vanadium	ppm	ASTM D5185m		0	<1	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

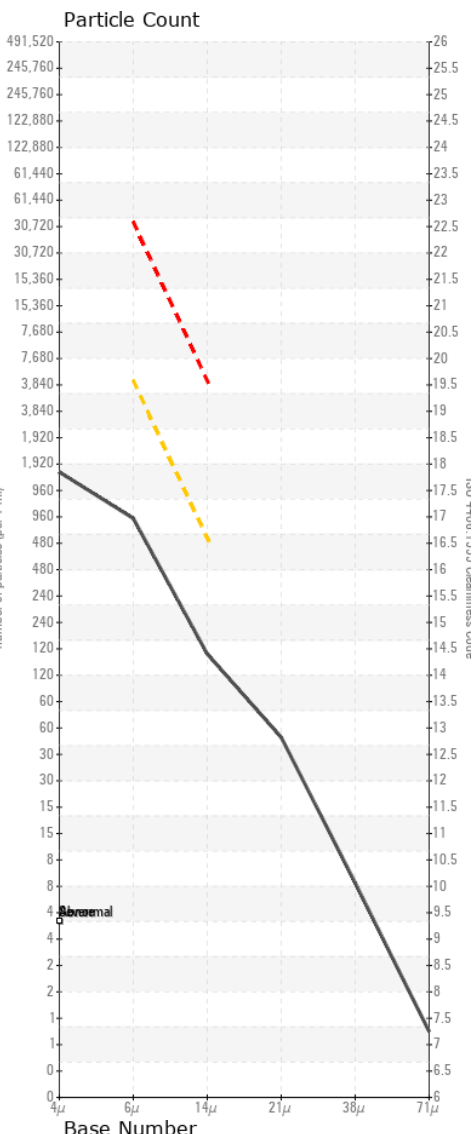
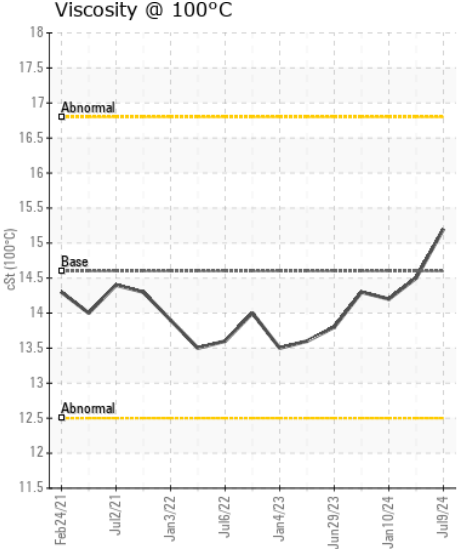
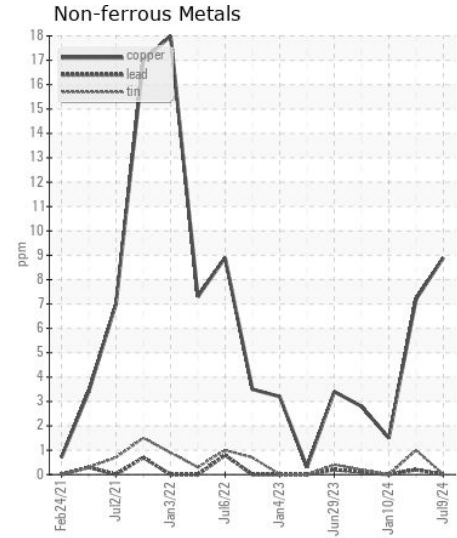
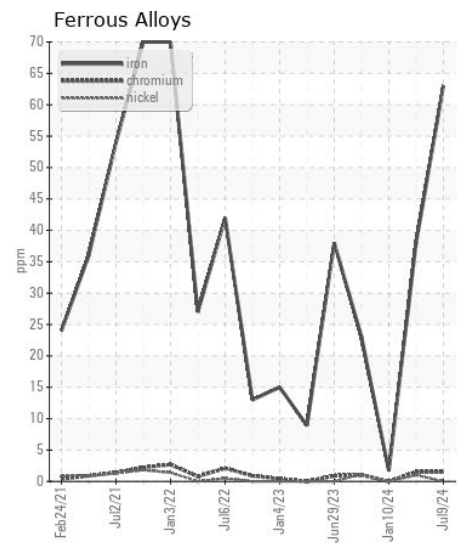
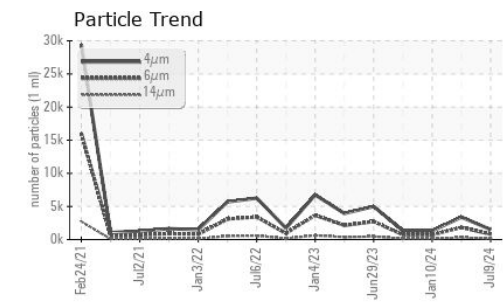
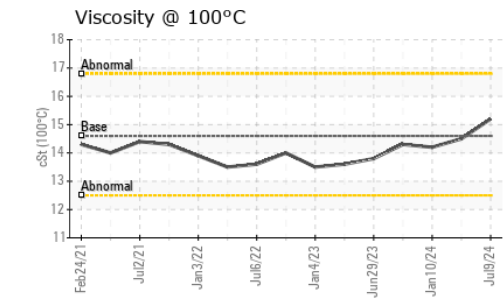
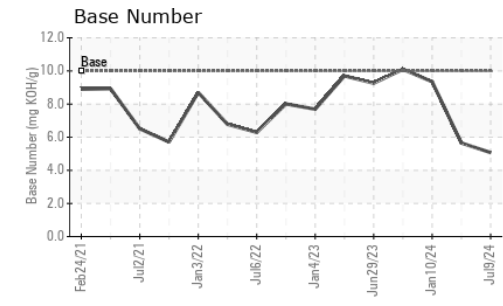
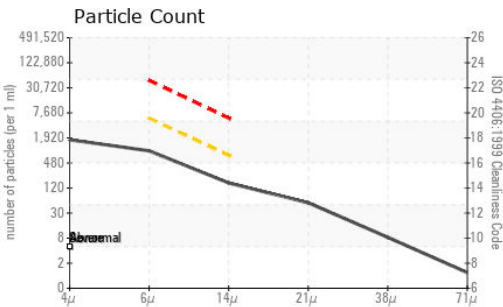
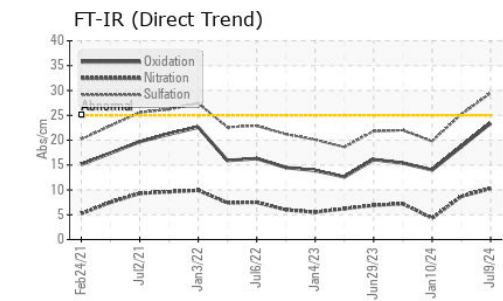
The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.

Silicon	ppm	ASTM D5185m	>25	7	7	4
Potassium	ppm	ASTM D5185m	>20	16	16	0
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	2.3	1.7	0.3
Nitration	Abs/cm	*ASTM D7624	>20	10.3	8.7	4.3
Sulfation	Abs/.1mm	*ASTM D7415	>30	29.5	25.2	19.8
Particles >4µm		ASTM D7647		1514	3384	1305
Particles >6µm		ASTM D7647	>5000	825	1844	711
Particles >14µm		ASTM D7647	>640	140	314	121
Particles >21µm		ASTM D7647	>160	47	106	41
Particles >38µm		ASTM D7647	>40	7	16	6
Particles >71µm		ASTM D7647	>10	1	2	1
Oil Cleanliness		ISO 4406 (c)	>19/16	17/14	18/15	17/14
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		18	14	0
Boron	ppm	ASTM D5185m		112	263	400
Barium	ppm	ASTM D5185m		0	1	0
Molybdenum	ppm	ASTM D5185m		97	100	84
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m		407	397	360
Calcium	ppm	ASTM D5185m		1816	1642	1416
Phosphorus	ppm	ASTM D5185m	760	1118	1110	999
Zinc	ppm	ASTM D5185m	800	1377	1305	1201
Sulfur	ppm	ASTM D5185m	3000	3975	3949	3751
Oxidation	Abs/.1mm	*ASTM D7414	>25	23.4	18.7	14.0
Base Number (BN)	mg KOH/g	ASTM D2896	10	5.07	5.65	9.35
Visc @ 100°C	cSt	ASTM D445	14.6	15.2	14.5	14.2



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : KL0014743
Lab Number : 06238007
Unique Number : 11126841
Test Package : MOB 2 (Additional Tests: PrtCount)

PIKES PEAK PERFORMANCE PRODUCTS
 7888 BULLET RD
 PEYTON, CO
 US 80831

Received : 16 Jul 2024
Tested : 17 Jul 2024
Diagnosed : 18 Jul 2024 - Don Baldridge

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