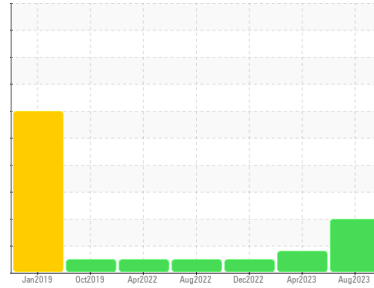


OIL ANALYSIS REPORT



Area
KEMP QUARRIES / RIVER VALLEY ARKOMA
Machine Id
OHT102
Component
Front Right Final Drive
Fluid
MOBIL MOBILUBE HD 80W90 (--- GAL)

Sample Rating Trend



WEAR



DIAGNOSIS

▲ Recommendation

No corrective action is recommended at this time. The oil change at the time of sampling has been noted. Resample at the next service interval to monitor.

▲ Wear

Bearing and/or bushing wear is indicated.

Contamination

There is no indication of any contamination in the oil.

▲ Fluid Condition

Additive levels indicate the addition of a different brand, or type of oil. Confirm oil type. The condition of the oil is acceptable for the time in service.

SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	PCA0083941	PCA0070398	PCA0070473
Sample Date	Client Info	22 Aug 2023	20 Apr 2023	09 Dec 2022
Machine Age	hrs	29115	28531	27903
Oil Age	hrs	29115	28531	27510
Oil Changed	Client Info	Changed	Changed	Not Changed
Sample Status		ABNORMAL	ABNORMAL	NORMAL

WEAR METALS

method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185m >800	130	156	236
Chromium	ppm	ASTM D5185m >10	<1	1	2
Nickel	ppm	ASTM D5185m >5	<1	1	0
Titanium	ppm	ASTM D5185m >15	<1	0	<1
Silver	ppm	ASTM D5185m >2	0	0	0
Aluminum	ppm	ASTM D5185m >75	<1	0	3
Lead	ppm	ASTM D5185m >10	2	0	0
Copper	ppm	ASTM D5185m >75	▲ 158	▲ 84	45
Tin	ppm	ASTM D5185m >8	5	3	2
Vanadium	ppm	ASTM D5185m	<1	0	0
Cadmium	ppm	ASTM D5185m	<1	0	0

ADDITIVES

method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185m	93	288	211
Barium	ppm	ASTM D5185m	0	0	0
Molybdenum	ppm	ASTM D5185m	2	10	14
Manganese	ppm	ASTM D5185m	1	2	2
Magnesium	ppm	ASTM D5185m	5	3	<1
Calcium	ppm	ASTM D5185m	▲ 3508	39	20
Phosphorus	ppm	ASTM D5185m	951	998	971
Zinc	ppm	ASTM D5185m	▲ 1084	20	19
Sulfur	ppm	ASTM D5185m	▲ 6687	19601	23695

CONTAMINANTS

method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185m >400	18	8	8
Sodium	ppm	ASTM D5185m	<1	<1	<1
Potassium	ppm	ASTM D5185m >20	1	<1	0

VISUAL

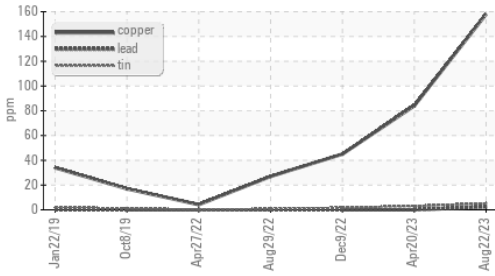
method	limit/base	current	history1	history2	
White Metal	scalar	*Visual NONE	LIGHT	NONE	NONE
Yellow Metal	scalar	*Visual NONE	NONE	MODER	MODER
Precipitate	scalar	*Visual NONE	NONE	NONE	NONE
Silt	scalar	*Visual NONE	NONE	NONE	NONE
Debris	scalar	*Visual NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual NONE	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
Free Water	scalar	*Visual	NEG	NEG	NEG

FLUID PROPERTIES

method	limit/base	current	history1	history2	
Visc @ 40°C	cSt	ASTM D445 136	190	138	138

OIL ANALYSIS REPORT

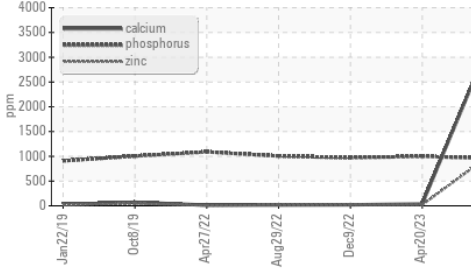
▲ Non-ferrous Metals



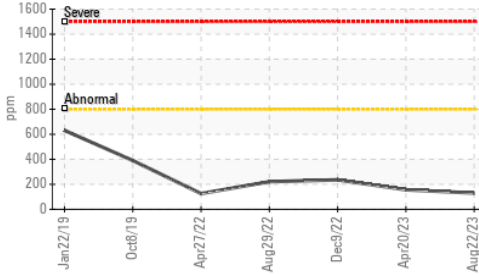
SAMPLE IMAGES	method	limit/base	current	history1	history2
Color			no image	no image	no image
Bottom			no image	no image	no image

GRAPHS

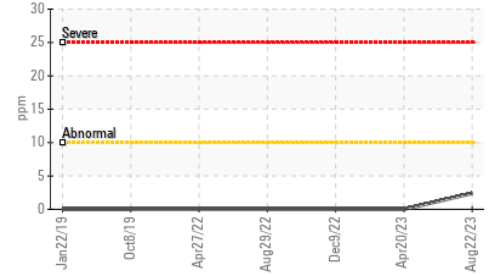
▲ Additives



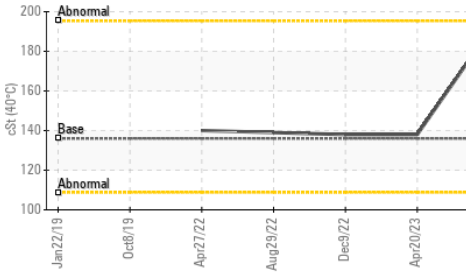
Iron (ppm)



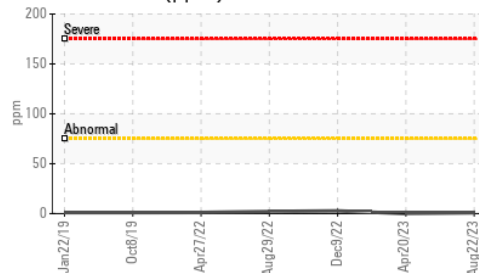
Lead (ppm)



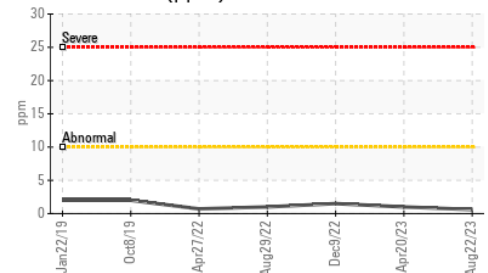
Viscosity @ 40°C



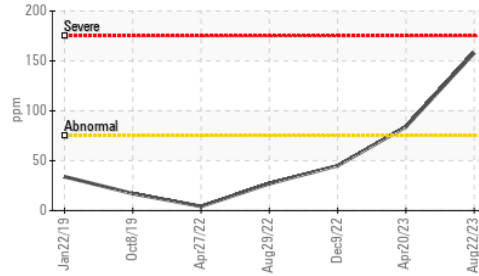
Aluminum (ppm)



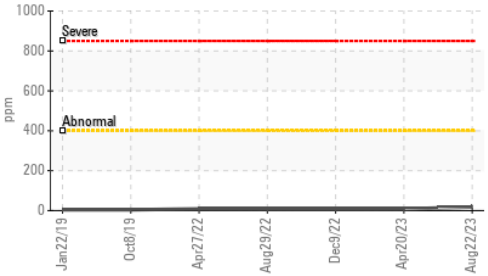
Chromium (ppm)



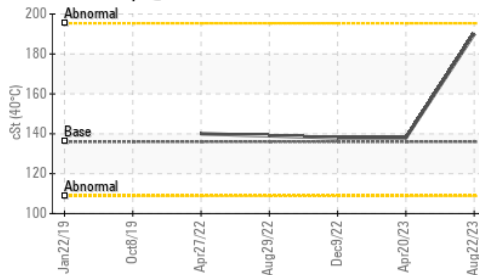
▲ Copper (ppm)



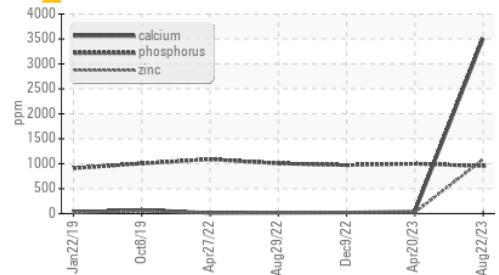
Silicon (ppm)



Viscosity @ 40°C



▲ Additives



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PCA0083941 **Received** : 28 Aug 2023
Lab Number : 05936845 **Diagnosed** : 29 Aug 2023
Unique Number : 10622116 **Diagnostician** : Sean Felton
Test Package : MOB 1

Kemp Quarries - River Valley - Arkoma
 12971 HWY 9a
 Shawnee, OK
 US 74804
 Contact:

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)

arkomashop@kempquarries.net

T:

F: