



WEAR	<b>NORMAL</b>
CONTAMINATION	<b>NORMAL</b>
FLUID CONDITION	<b>NORMAL</b>

Area  
**IAN**  
Machine Id  
**IAN**  
Component  
**Starboard Reduction Gear**  
Fluid  
**CHEVRON MEROPA 320 (100 GAL)**

**RECOMMENDATION**

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>MW0065481</b>	MW0051019	MW0050877
Sample Date		Client Info		<b>15 Mar 2024</b>	22 Oct 2023	02 Oct 2023
Machine Age	hrs	Client Info		<b>5807</b>	78975	3249
Oil Age	hrs	Client Info		<b>5807</b>	3728	3249
Filter Age	hrs	Client Info		<b>0</b>	0	3249
Oil Changed		Client Info		<b>Not Changd</b>	Not Changd	Not Changd
Filter Changed		Client Info		<b>None</b>	None	Not Changd
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

**WEAR**

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>150	<b>27</b>	14	16
Chromium	ppm	ASTM D5185m	>10	<b>&lt;1</b>	0	0
Nickel	ppm	ASTM D5185m	>10	<b>0</b>	0	0
Titanium	ppm	ASTM D5185m		<b>&lt;1</b>	0	<1
Silver	ppm	ASTM D5185m		<b>0</b>	0	<1
Aluminum	ppm	ASTM D5185m	>25	<b>3</b>	0	<1
Lead	ppm	ASTM D5185m	>100	<b>&lt;1</b>	0	0
Copper	ppm	ASTM D5185m	>50	<b>10</b>	6	7
Tin	ppm	ASTM D5185m	>10	<b>&lt;1</b>	0	<1
Vanadium	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE

**CONTAMINATION**

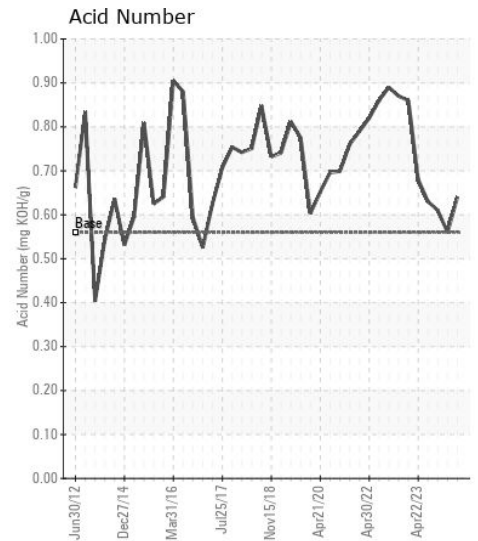
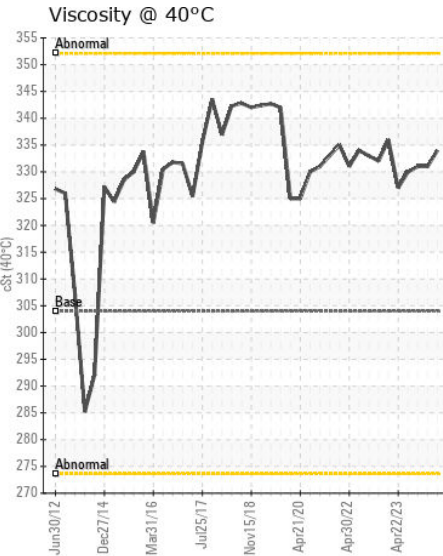
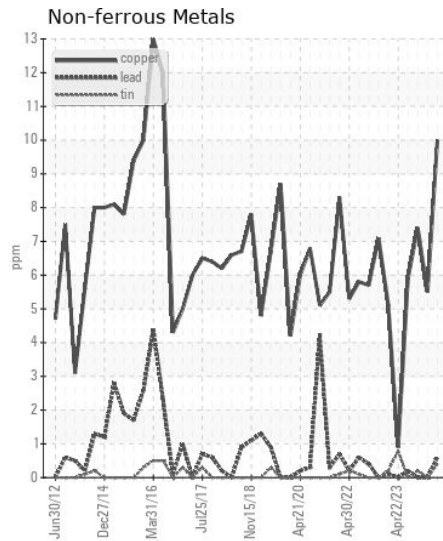
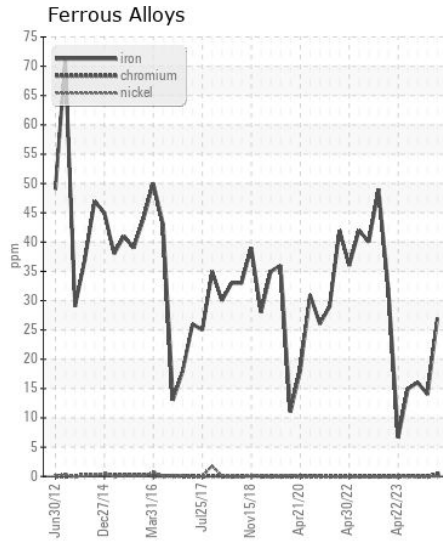
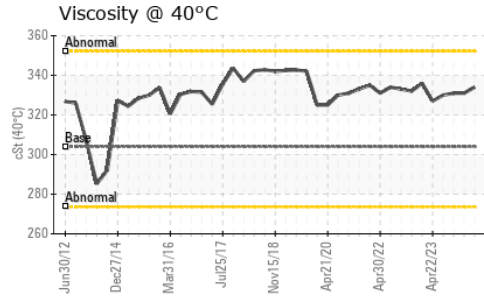
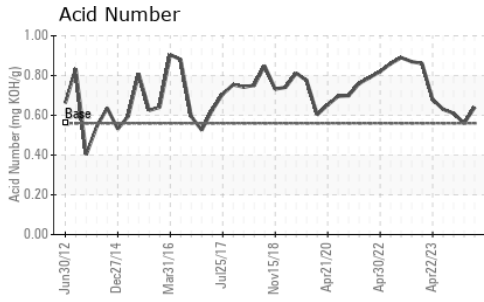
There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>50	<b>2</b>	<1	<1
Potassium	ppm	ASTM D5185m	>20	<b>3</b>	0	<1
Water		WC Method	>0.1	<b>NEG</b>	NEG	NEG
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Appearance	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Odor	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	<b>NEG</b>	NEG	NEG

**FLUID CONDITION**

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

Sodium	ppm	ASTM D5185m		<b>8</b>	4	8
Boron	ppm	ASTM D5185m	20	<b>1</b>	<1	<1
Barium	ppm	ASTM D5185m		<b>2</b>	0	0
Molybdenum	ppm	ASTM D5185m	0	<b>5</b>	3	4
Manganese	ppm	ASTM D5185m		<b>&lt;1</b>	<1	<1
Magnesium	ppm	ASTM D5185m		<b>2</b>	<1	0
Calcium	ppm	ASTM D5185m	25	<b>18</b>	7	7
Phosphorus	ppm	ASTM D5185m	235	<b>345</b>	243	237
Zinc	ppm	ASTM D5185m		<b>10</b>	0	0
Sulfur	ppm	ASTM D5185m		<b>10162</b>	5883	6083
Acid Number (AN)	mg KOH/g	ASTM D8045	0.56	<b>0.64</b>	0.56	0.61
Visc @ 40°C	cSt	ASTM D445	304	<b>334</b>	331	331



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : MW0065481  
**Lab Number** : 06125103  
**Unique Number** : 10939254  
**Test Package** : MAR 2

**Received** : 21 Mar 2024  
**Tested** : 24 Mar 2024  
**Diagnosed** : 24 Mar 2024 - Wes Davis

**AMERICAN RIVER TRANSPORTATION CO.**  
P.O. BOX 2889  
ST. LOUIS, MO  
US 63111  
Contact: BRIAN GRIEWING  
brian.griewing@adm.com

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)

T:  
F: (314)481-5278