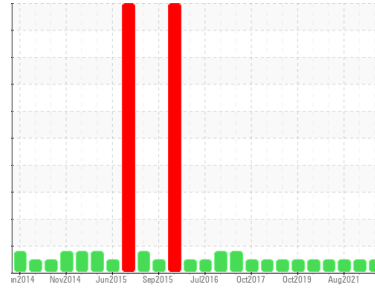




OIL ANALYSIS REPORT

Sample Rating Trend



NORMAL



Machine Id
STBD GBOX (S/N 121575)

Component
Starboard Gearbox

Fluid
MOBIL DELVAC 1640 (76 LTR)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil.

Fluid Condition

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

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			WC0711998	WC0611582	WC0611604
Sample Date	Client Info			11 Dec 2023	17 Dec 2021	28 Aug 2021
Machine Age	hrs	Client Info		0	7175	6745
Oil Age	hrs	Client Info		0	900	470
Oil Changed	Client Info			N/A	Changed	Not Changed
Sample Status				NORMAL	NORMAL	NORMAL

CONTAMINATION		method	limit/base	current	history1	history2
Water	WC Method		>0.2	NEG	NEG	NEG

WEAR METALS		method	limit/base	current	history1	history2
PQ		ASTM D8184*		0	7	5
Iron	ppm	ASTM D5185(m)	>150	11	21	19
Chromium	ppm	ASTM D5185(m)	>10	0	<1	<1
Nickel	ppm	ASTM D5185(m)	>10	<1	<1	<1
Titanium	ppm	ASTM D5185(m)		0	0	0
Silver	ppm	ASTM D5185(m)		<1	<1	0
Aluminum	ppm	ASTM D5185(m)	>5	1	2	1
Lead	ppm	ASTM D5185(m)	>65	8	6	4
Copper	ppm	ASTM D5185(m)	>80	78	71	48
Tin	ppm	ASTM D5185(m)	>8	4	4	2
Antimony	ppm	ASTM D5185(m)	>5	0	<1	<1
Vanadium	ppm	ASTM D5185(m)		0	0	0
Beryllium	ppm	ASTM D5185(m)		0	0	0
Cadmium	ppm	ASTM D5185(m)		0	0	0

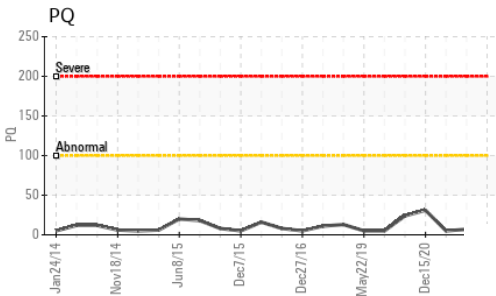
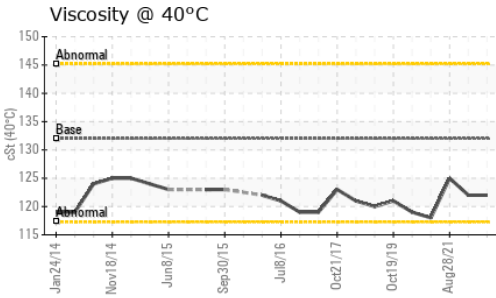
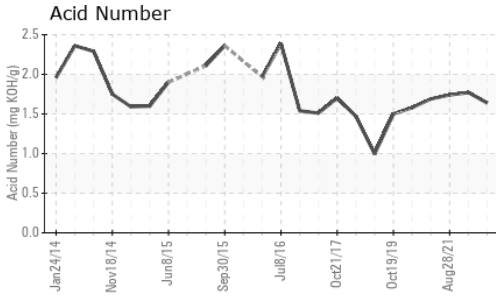
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185(m)		2	1	1
Barium	ppm	ASTM D5185(m)		<1	0	0
Molybdenum	ppm	ASTM D5185(m)		<1	<1	<1
Manganese	ppm	ASTM D5185(m)		0	<1	<1
Magnesium	ppm	ASTM D5185(m)		220	229	230
Calcium	ppm	ASTM D5185(m)		3953	3660	3686
Phosphorus	ppm	ASTM D5185(m)		925	951	971
Zinc	ppm	ASTM D5185(m)		1054	1027	1022
Sulfur	ppm	ASTM D5185(m)		8117	8702	8769
Lithium	ppm	ASTM D5185(m)		<1	<1	<1

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>20	6	6	5
Sodium	ppm	ASTM D5185(m)		1	<1	<1
Potassium	ppm	ASTM D5185(m)	>20	0	<1	<1

FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D974*		1.64	1.77	1.74



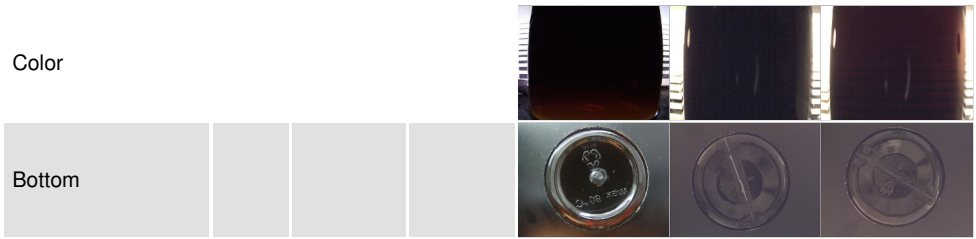
OIL ANALYSIS REPORT



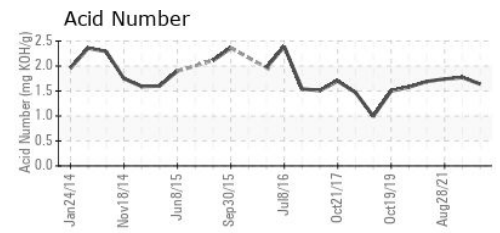
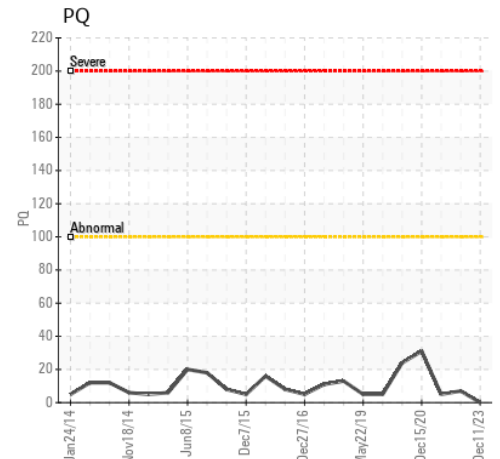
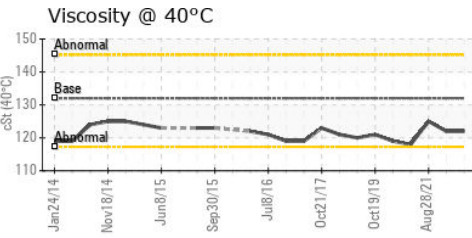
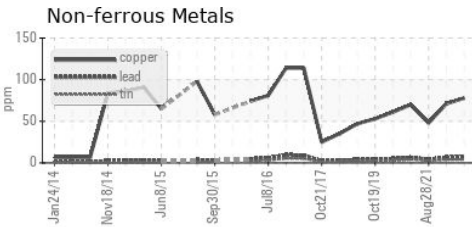
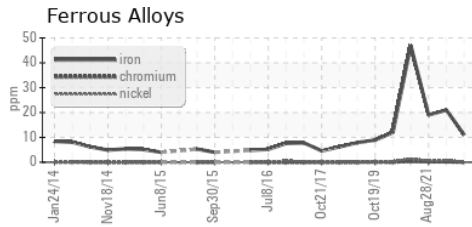
VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	Visual*	NONE	NONE	NONE
Yellow Metal	scalar	Visual*	NONE	NONE	NONE
Precipitate	scalar	Visual*	NONE	NONE	NONE
Silt	scalar	Visual*	NONE	NONE	NONE
Debris	scalar	Visual*	NONE	NONE	NONE
Sand/Dirt	scalar	Visual*	NONE	NONE	NONE
Appearance	scalar	Visual*	NORML	NORML	NORML
Odor	scalar	Visual*	NORML	NORML	NORML
Emulsified Water	scalar	Visual*	>0.2	NEG	NEG
Free Water	scalar	Visual*		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D7279(m)	132	122	125

SAMPLE IMAGES	method	limit/base	current	history1	history2
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GRAPHS



Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9 Canadian Coast Guard - CCGS Constable Carriere
Sample No. : WC0711998 **Received** : 18 Dec 2023 867 Lakeshore Road
Lab Number : 02603927 **Diagnosed** : 18 Dec 2023 Burlington, ON
Unique Number : 5697012 **Diagnostician** : Wes Davis CA L7R 4A6
Test Package : MAR 2 (Additional Tests: TAN Man) Contact: Chief Engineer

To discuss this sample report, contact Customer Service at 1-800-268-2131.
 Test denoted (*) outside scope of accreditation, (m) method modified, (e) tested at external lab.
 Validity of results and interpretation are based on the sample and information as supplied.