



OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area

Propulsion/Steering

Machine Id

Bow Thruster #1 (S/N T-13232)

Component

1 Bow Thruster

Fluid

MOBIL MOBILGEAR 600 XP ISO 68 (785 LTR)

RECOMMENDATION

Resample at the next service interval to monitor. Please contact your representative for information regarding the proper sampling kits for your service. NOTE: We recommend using MAR 2 test kits, this testkit includes Particle Count to determine the ISO cleanliness of the fluid. this testkit includes AN to determine the suitability of the oil for continued use.

WEAR

All component wear rates are normal.

CONTAMINATION

There is no indication of any contamination in the component(unconfirmed).

FLUID CONDITION

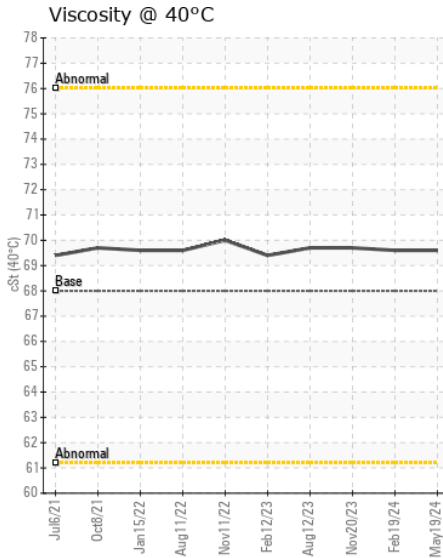
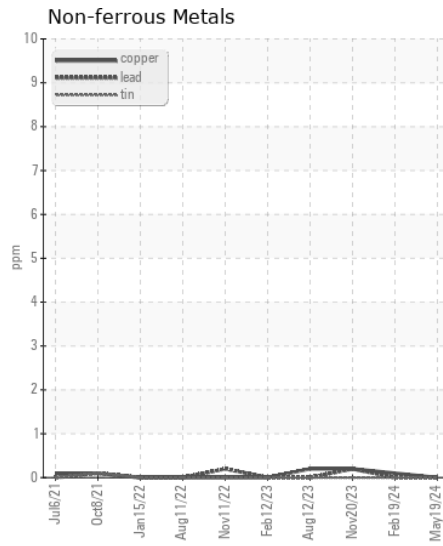
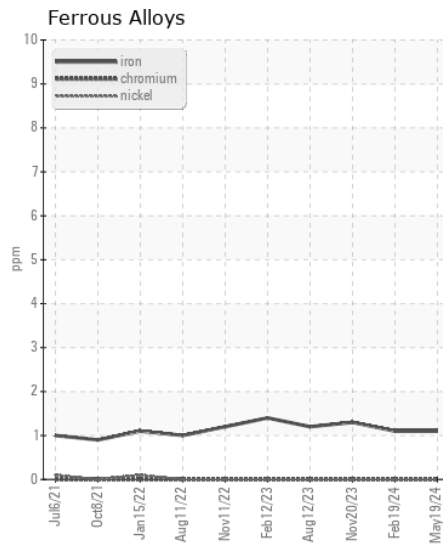
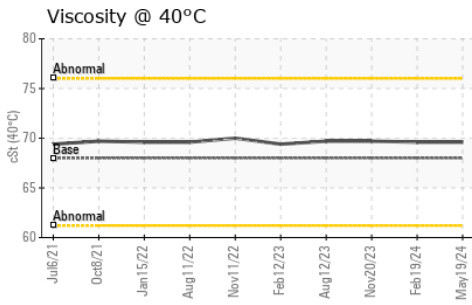
The condition of the oil is acceptable for the time in service (unconfirmed).

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		WC0850488	WC0850502	WC0850509
Sample Date		Client Info		19 May 2024	19 Feb 2024	20 Nov 2023
Machine Age	hrs	Client Info		59333	58386	57422
Oil Age	hrs	Client Info		947	0	12432
Filter Age	hrs	Client Info		0	0	4270
Oil Changed		Client Info		Not Changed	Not Changed	Not Changed
Filter Changed		Client Info		Not Changed	Not Changed	Not Changed
Sample Status				NORMAL	NORMAL	NORMAL

Iron	ppm	ASTM D5185(m)	>90	1	1	1
Chromium	ppm	ASTM D5185(m)	>10	0	0	0
Nickel	ppm	ASTM D5185(m)	>10	0	0	0
Titanium	ppm	ASTM D5185(m)		0	0	0
Silver	ppm	ASTM D5185(m)		0	0	<1
Aluminum	ppm	ASTM D5185(m)	>10	0	0	0
Lead	ppm	ASTM D5185(m)	>20	0	0	<1
Copper	ppm	ASTM D5185(m)	>20	0	<1	<1
Tin	ppm	ASTM D5185(m)	>15	0	0	0
Vanadium	ppm	ASTM D5185(m)		0	0	0
White Metal	scalar	Visual*	NONE	NONE	NONE	NONE
Yellow Metal	scalar	Visual*	NONE	NONE	NONE	NONE

Silicon	ppm	ASTM D5185(m)	>7	0	0	<1
Potassium	ppm	ASTM D5185(m)	>20	<1	<1	0
Water		WC Method	>0.2	NEG	NEG	NEG
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

Sodium	ppm	ASTM D5185(m)		<1	<1	<1
Boron	ppm	ASTM D5185(m)		7	6	9
Barium	ppm	ASTM D5185(m)		0	0	<1
Molybdenum	ppm	ASTM D5185(m)		0	0	0
Manganese	ppm	ASTM D5185(m)		0	0	0
Magnesium	ppm	ASTM D5185(m)		<1	<1	0
Calcium	ppm	ASTM D5185(m)		3	3	4
Phosphorus	ppm	ASTM D5185(m)		320	310	324
Zinc	ppm	ASTM D5185(m)		8	7	8
Sulfur	ppm	ASTM D5185(m)		10621	10684	10760
Visc @ 40°C	cSt	ASTM D7279(m)	68	69.6	69.6	69.7



Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9 **Horizon Maritime Services Ltd. - Horizon Enabler**
Sample No. : WC0850488 **Received** : 07 Jun 2024 87 Water Street, 2nd Floor
Lab Number : 02640536 **Tested** : 07 Jun 2024 St. John's, NL
Unique Number : 5789698 **Diagnosed** : 07 Jun 2024 - Wes Davis CA A1C 1A5
Test Package : MAR 1 **Contact:** Stephen Nowlan
 Cheng.Enabler@northsea.no

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.