



# Chief Engineer's Handover

Quality Assurance into the 21st  
Century and beyond

TSM Form  
No. 078

**Note:**

Ref TGM 2.2.8

1. This checklist and all items listed as below have to be filled entirely by the outgoing Chief Engineer along with all the reports as mentioned therein.
2. Completed checklist should be sent to Crewing dept for sharing with the On-signing Chief Engineer at least 7 days in advance. Any subsequent changes should be included in the section provided and discussed at the time of actual handover.
3. Both the incoming and outgoing Chief Engineer to call Vessel Manager after handover is completed.

<b>Vessel</b>	:	RIVERSIDE	<b>Date</b>	:	16 FEB 2021
<b>Port</b>	:	BRASIL			
Dear Sirs,					
This is to certify that as of		12 NOON	hours on	16 FEB 2021	
I,	SAMEER DIKHIT		have handed over over position Chief Engineer on the		
RIVERSIDE (Vessel Name)		to	LLOYD V D ALMEIDA		
to our mutual satisfaction.					
<b>The Following are said to be onboard at this time: 07feb2021</b>					
1.	Bunkers	VLSFO	MT	LSMGO	MT
		1085.50		169.82	
2.	Lube oils				
	Main engine cylinder oil	2200 Liters			
	Auxiliary engines system oil	10300 liters			
3.	Fresh water	209 m3			
All engine log books, maintenance records, voyage reports and consumption logs are up to date as is the oil record book for the engine room. Enclosed please find -					
1. Appendix A - General information					
2. Appendix B - Technical					
3. Appendix C - Environmental					

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4. Attachments

- TSM Form 094C – PSC readiness verification checklist prior arrival port. (Latest completed)
- Usernames/passwords
- LO inventory
- Bunker survey

Master's confirmation on the status of environmental compliance equipment as mentioned in Appendix B of this hand-over notes. Master must sign in the adjacent box, for having read and endorsed the comments.

Master to scan App C section and send this via email to [Environmental.compliance@thome.com.sg](mailto:Environmental.compliance@thome.com.sg)

Signature:

Name:

Date:

Yours Faithfully

Outgoing Chief Engineer

Incoming Chief Engineer

Date:

16 Feb 2021



**Appendix A - General information**

**Urgent / important matters that require immediate follow up.**

List down a short summary of items that require immediate attention and/or action by the onsigners upon taking over.

1. Both fire pumps seals are leaking, port side fire pump vibrating due to worn out bearing sleeve. VM informed and requisition raised. Spares to be delivered at upcoming discharge port Brasil
2. Incinerator non functional due to damage to primary and secondary burner, to flame eye of both burner and to ignition transformer, internal wall small section partly collapsed. VM informed, ECD informed. Flag & class informed. Requisition raised. Presently sludge management is being done by transfer to ROT via approved IOPP line, this is done with permission from owners and VM.
3. No1 Economiser circ pump mechanical seal and parts received are of different design. VM informed. Mail sent for follow up with maker.

**Ship specific peculiarities, design and recurrent issues**

Include details that are unique about the ship, her equipment, fittings.



**Voyage information**

List down a short summary of the current voyage.

Voyage No.: 06L

Cargo: EAGLE FORD 50, WTI MIDLAND

Load port / ETA:

Discharge port / ETA: 14 feb 1200

Charter party speed: 12.5kts

FO/GO consumption per day: 31.5t per day for 12.5 kts speed, as per C/P

Sufficient fuel with safety margin up to the next bunkering port ref. to TGM 2.10.11.6.3? Yes / No - yes

Sufficient lube oil for until next supply port ref. to TGM 2.10.11.6.3? Yes / No - yes

Other information:

**Owners instructions**

List down a short summary of owners specific instructions.

1. No comingling allowed of VLSFO bunkers. Settling and service tanks to be inspected, and cleaned (if required) before use of next VLSFO bunkers
2. Strict control over use of additive ADERCO 2055G for VLSFO, and ADERCO L-1050 additive for LSMGO

Initial first time use of ADERCO dosage will be 2 ltr. Aderco 2055G per 55 MT of VLSFO, This will be applicable prior to first bunkering only during the first time use of ADERCO.

For the subsequent bunkering routine dosage please use ONLY 1 ltr. Aderco 2055G per 55 MT of VLSFO.

The LSMGO dosing of ADERCO L-1050 is to be dosed directly into the bunker tank before bunkering at a rate of

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1ltr ADERCO L-1050 to 30MT of LSMGO bunker.

NOTE: There is no need to use extra L-1050 initially when changing from Octamar LI5 to Aderco L-1050, just dose 1 tlr per 30 MT.

Stern tube oil – MELINA S30, Same as ME system oil.

**Username and passwords**

List down or attach separately.

CE cabin pc – no password

ECR pc- pw=thome

ME performance PC, pw= ecr

**Updates and changes**

List all updates and changes after the submission of the handover forms one-week prior handover, till the actual handover. Updated handover notes including changes will be shared with the on-signer during actual handover.

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### Appendix B – Technical overview

The following checklist is to be used as a reminder in the preparation of handover, notes prior to being relieved. The checklist and associated documents is to be signed by the outgoing Chief Engineer and the incoming Chief Engineer. A copy of all pages is to be forwarded to TSM Singapore marked attention, Vessel Manager.

Information should include:

- The status of all stores / spares relevant to the items
- Operational abnormalities or peculiarities experienced whilst on board

No	Items	YES	NO	Detailed remarks
<b>Critical Equipment – Any malfunction or concerns with the following?</b>				
1.	Any inoperable critical equipment	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Any inoperable LSA FFA?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Incomplete critical spares?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Any due/overdue shore servicing?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Any other concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Condition of Class (COC) / Flag dispensation</b>				
1.	Any active COC and status	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Any active Flag dispensation and status	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Any other concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.		<input type="checkbox"/>	<input type="checkbox"/>	
<b>Continuous survey</b>				
1.	Surveys due / upcoming	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Annual Survey done on 26.05.2020
2.	Survey reports prepared for completed CMS items	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Planned maintenance system</b>				
1.	Any overdue jobs	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Any postponed jobs	<input checked="" type="checkbox"/>	<input type="checkbox"/>	ME Exh valve 05units postponed in AMOS

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No	Items	YES	NO	Detailed remarks
				(#4 unit is done). Exh v/v Overhauling interval is 12000hrs as per AMOS. As per Owners exh v/v to be done at 6000hrs interval. So the job needs to be planned as per opportunity.
3.	Any urgent requisitions?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	788-21-0027 Incinerator 788-21-0026 Incinerator Wall 788-21-0012 Fire pump mechanical seals 788-21-0023 Fire pump sleeve bearing
4.	Any other concerns	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Technical deficiency list (ref. to Ocean Manager)</b>				
1.	Any overdue defect?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	-No 1 Economizer circ pump mech seal leakage. VM informed. Spares received are of new design, VM requested via mail to follow up with maker for matching spares.
2.	Any postponed defect?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Any defect for follow up?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Same as above
4.	Any other concerns	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Fuel oil system</b>				
1.	Any fuel oil system (tanks, pumps, piping) related concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Fuel quality concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Fuel oil analysis due/overdue?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Fuel system check concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	

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No	Items	YES	NO	Detailed remarks
5.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Lube oil system</b>				
1.	Any lube oil system (tanks, pumps, piping) related concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Lube oil available for next 3 months or intended voyage whichever is greater	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
3.	LO analysis due/overdue?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	LO samples landed 15dec 2020, Next samples to be landed by 15mar 2021
4.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Main propulsion system - Any malfunction or concerns with the following?</b>				
1.	Safety systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Engine performance	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Last performance on 06 Jan 2021
3.	Cylinder liner / piston/ piston rings	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Last scavenge inspection done: 04-Jan-2021
4.	Drain oil analysis concerns	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Crankshafts and bearings	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
6.	Pneumatic, electronic and control system issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
7.	Turbocharger performance concerns	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
8.	Auxiliary components (FOV, exh. valves, starting valves, OMD etc)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
9.	Lack of essential spares? (ref. to TGM 2.10.11.A8)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
10.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Power generating system - Any malfunction or concerns with the following</b>				
1.	Safety systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Aux engine performance	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Last performance for AE1, AE2, AE3 - 08

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No	Items	YES	NO	Detailed remarks
				Jan 2021  AE1 sump oil renewed on 28-Feb-2020 AE2 Sump oil renewed on 24- April-2020 AE1 Liner O-rings for units 3 & 4 renewed and piston rings renewed on 30-June-2020 due to water leakage from jacket.  AE 3 unit 1,3,5 fuel pumps overhauled, changed all O-rings 25 November 2020 AE 2 all cylinder heads overhauled, changed all O-rings and exhaust valves, valve seats reconditioned 23 December 2020 AE 2 lube oil cooler cleaned, changed all gaskets- 14 December 2020 AE 2 unit 2&3 fuel valves new nozzles installed- 23 December 2020 AE 1 all fuel valves nozzles changed- 06 February 2021
3.	Cylinder liner / piston / piston rings	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Crankshafts and bearings	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Pneumatic, electronic and control system issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
6.	Turbocharger performance	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
7.	Auxiliary components	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
8.	Lack of essential spares? (ref. to TGM 2.10.11.A8)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
9.	Any overhaul due in the next 6 months?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	ME Exh v/v 05units
10.	Any other concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Purifiers- Any malfunction or concerns with the following?</b>				
1.	Lubricating oil purifiers / preheaters	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Last routine for No.1 – 04 Nov 2020 (including vert shaft overhaul)  Last routine for No.2 – 30 Jan 2021(Cleaning and o rings seals renewal). Vert shaft overhaul done on

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No	Items	YES	NO	Detailed remarks
				06 mar 2020
2.	Heavy oil purifiers / preheaters	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Last routine for No.1 - 24 Jan 2021(Cleaning and o rings seals renewal) Last routine for No.2 - 29 Jan 2021(Cleaning and o rings seals renewal)
3.	Diesel oil purifiers / preheaters	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Steam generating plant and system- Any malfunction or concerns with the following?</b>				
1.	Safety systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Boiler performance	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Burners and related components	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Tubes / internals	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Water treatment	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
6.	Water treatment chemicals available for next 3 months or intended voyage whichever is greater	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
7.	Feed / circulating water system	<input type="checkbox"/>	<input checked="" type="checkbox"/>	EGE Circ pump 1, seal to renew, same is mentioned in earlier points
8.	Exhaust gas / composite boiler	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Cleaned/inspected 18 Dec 2020
9.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Sea water cooling system- Any malfunction or concerns with the following?</b>				
1.	Any performance capacity issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Any piping / valves concerns / leakages?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	No temporary repairs
3.	Heat exchangers	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Control systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	

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No	Items	YES	NO	Detailed remarks
5.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>FW cooling, FW generating and domestic FW systems - Any malfunction or concerns with the following?</b>				
1.	Any performance capacity issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Any piping / valves concerns / leakages?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	No temporary repair
3.	Compressors/condensers/evaporators/valves	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Heat exchangers	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Control systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
6.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Compressed air system- Any malfunction or concerns with the following?</b>				
1.	Operational issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Last routine for main air Comp 1 -03 Nov 2020 (intercooler & Air filter cleaning), 10 Nov 2020 ( Safety valve check) Last routine for main air Comp 2- 09 Nov 2020 (intercooler cleaning) Last routine for Deck Air - 04 Nov 2020 (Oil filter and oil changed) Last routine for Control Air- 05 Nov 2020 (Oil filter and oil changed)
2.	System leakages	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Equipment defect	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Lack of spares	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Steering gear- Any malfunction or concerns with the following?</b>				
1.	Operational issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Hydraulic lock alarm on no1 S/G pump, solved with the help of technician on 25dec 2020.

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No	Items	YES	NO	Detailed remarks
2.	Emergency function concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Emergency steering tested on emergency power on 18 Jan 2021
3.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Air conditioning and refrigerating systems- Any malfunction or concerns with the following?</b>				
1.	Operational issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Leakages	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Fresh water generator- Any malfunction or concerns with the following?</b>				
1.	Capacity or performance issues	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Leakages?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Cargo pumping systems- Any malfunction or concerns with the following?</b>				
1.	Safety systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Performance issues	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Leakages?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Control systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Inert gas system / nitrogen plant- Any malfunction or concerns with the following?</b>				
1.	Safety systems	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Performance issues	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Oxygen analyzer	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Calibrated before every IG operation.
4.	Control system	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
5.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	

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No	Items	YES	NO	Detailed remarks
<b>Deck machinery- Any malfunction or concerns with the following?</b>				
1.	Anchor windlasses	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Mooring winches	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Cranes- Any malfunction or concerns with the following?</b>				
1.	Hose handling crane	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Provision crane	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Engine room crane	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
4.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Navigation / communication equipment - Any malfunction or concerns with the following?</b>				
1.	Any equipment performance issue?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Any services due/overdue?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Any other concerns?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Fire detection and extinguishing systems - Any malfunction or concerns with the following?</b>				
1.	Alarm system inoperable?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
2.	Fixed extinguishing systems issues?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Emergency fire pump tested while vessel was in ballast condition and confirmed operating as per makers's design parameters	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Date when emergency fire pump has been tested while vessel was in <b>ballast condition</b> : 16jan 2021
4.	Fixed CO2	<input type="checkbox"/>	<input checked="" type="checkbox"/>	CO2 alarm tested on 23/01/2021
5.	Water system	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Tested on 30/01/2021
6.	Quick closing valves	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Tested on 14/12/2020
7.	Fire flaps / dampers	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Checked on 06/02/2021
8.	Fire detection alarms	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Tested as part of Saturday safety

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No	Items	YES	NO	Detailed remarks
				routine
9.	Other alarms	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Tested as per routines
10.	Lack of spares or any other concern	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
<b>Miscellaneous systems – write down and add cells as required.</b>				
1.	Sewage plant	<input type="checkbox"/>	<input checked="" type="checkbox"/>	New vacuum toilet pump fitted on 12 Jan2021
2.	Bilge separator	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
3.	Incinerator	<input checked="" type="checkbox"/>	<input type="checkbox"/>	Not operational as mentioned in earlier points
4.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
5.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
6.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
<b>Special / precision tools - Please add to the list as applicable</b>				
1.	ME/AE Performance measuring tool (Doctor, PMI, etc.)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	PMI pc in ECR
2.	ME / AE precision measuring tools	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
3.	Pressure / temperature calibrator	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
4.	FRAMO pressure test kit	<input type="checkbox"/>	<input type="checkbox"/>	NA
5.	Stern tube poker gauge	<input checked="" type="checkbox"/>	<input type="checkbox"/>	In CE cabin
6.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
7.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
8.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
9.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	
10.	<i>Add to the list as required</i>	<input type="checkbox"/>	<input type="checkbox"/>	



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**Appendix C – Detailed handover notes for environmental equipment**

Environmental component and description of the current status of operation, maintenance, and repair, for the incinerator, OWS, oil content monitor ("OCM"), oil discharge monitoring equipment ("ODME"), and other pollution prevention procedures or equipment, the status of spare parts for the aforementioned equipment, and an estimation of the day-to-day bilge loads and accumulations.

Environmental equipment	Details
<p>Bilge pump / OWS pump (If different) status to include below details &amp; 3.3 Tanks status – Present pumping capacity &amp; pump condition Spare glands/ seals/ stator / bucket rings, If available (If any spares on order- order No) 3.3 Listed bilge tanks ROB and capacity....M3.</p>	<p>Bilge pump capacity:2.5m3/H, OWS pump:5m3/h OWS Last Monthly operational test done on 12 feb-2021. BHT cleaning needs to be done as at round 8.9m3 there is grayish water that triggers the 15ppm alarm. ECD dept is informed about this via official mails and telephone. And entries have been made in ORB about the same, as adviced by ECD dept.  2.0M3/H, 4.5 M3/H Spare rotor and stator onboard  13.80m3 /30.9M3</p>
<p>Sludge pump status to include below details – Present pumping capacity &amp; pump condition Spare glands/ seals/ stator /, If available (If any spares on order- order No) 3.1 Listed tanks total storage tanks ROB and capacity....M3.</p>	<p>Capacity:5.0M3/H, Present pumping capacity: 4.5M3/H Spare stator onboard  42m3 / Total Capacity:66.55M3</p>
<p>OWS and OCM to include below status: Last filter change/ Last overhaul for separator type OWS (as per AMOS) Spare filter on-board/ spares for separator type (Yes/ No) – Number / description and location of spares (If any Spares on order- order No) Last OWS overboard pipe section inspection</p>	<p>OWS - T2 and T3 chamber filter media renewed 06 Jan 2021  Spare filter media on order. Requisition No 788-21-0016</p>



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<b>Environmental equipment</b>	<b>Details</b>
(OWS piping from the OWS to the overboard via the 3-way valve must be inspected at least once every six months or after every Chief Engineer change whichever is earlier and thereafter Inspection to be recorded in ORB under code "I". Any concerns to be reported immediately to HOC/ECD.) Last OCM calibration Last date: OWS operation test for 30 minutes in recirculation mode BHT to BHT and record under "I" in ORB	20 Oct 2020  Shore calibration done 26 May 2020  12 feb 2021
ODME status, which must include below details (as applicable) Equipment condition: Last de-canting operation date: Last calibration Spares available (Yes/ No) – Number / description and location of spares (If any spares on order- order No)	Good working order NA 26 May 2020 Yes No
Incinerator & 3.1 tanks status Incinerator operation and status Spares for incinerator if available (Yes/ No) – Number / description and location of spares (If any spares on order- order No.) Refractory condition Last date: incinerator ash last landed	Incinerator inoperational. Office informed , VM informed , ECD informed , flag & class informed  Req no 788-21-0027 Incinerator required spares, req no 788-21-0026 incinerator wall  Refractory wall small section to be repaired once spares received.
Bilge water system/ waste oil system, which must include the following status Pipeline condition No connection of sludge and bilge in suction side except common discharge to shore reception	All In good condition  Good. No connection to suction side.

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<b>Environmental equipment</b>	<b>Details</b>
(If any spares on order- order No.)	
Sewage treatment plant, which must include the following status – Equipment condition Spares on board (Yes/ No) – Number / description and location of spares (If any spares on order- order No) Test kit onboard (If on order- order No) Sewage holding tank/ gray water holding tank (cap/ ROB)	Good  Yes  Requisition 788-20-0176 for std-by vacuum pump spares Sewage Holding Tank Capacity:13.15 M3/0 M3
Bilge water/ waste oil- sludge information, as below – Bilge generation / day Sludge generation / day Bilge holding tank condition & last cleaned.	0.2 m3 0.5 m3 Cleaned on 25-May-2020
Does your IOPP certificate Form B has any remarks in Code 3.2.3 for "other acceptable means of disposal" - If yes whether for evaporation - Regeneration or -Transfer from ER sludge/ bilges to slop tank/ ROT	YES  From ER Sludge/Bilges to ROT
Economizer soot wash water – EGE/ soot water tank: Have approved direct overboard through eductor arrangement (record in engine log book) OR Transfer to 3.1 tanks for evaporation & record in ORB- last date: Dry soot disposal – (Record in GRB) Last date:	Scum Holding Tank NO 24.07.2020

CONTROLLED



**TSM Form No. 078**  
**Chief Engineer's Handover**

**Status of minimum spares required for rapid replacement to minimize leakages and reduce waste stream development in machinery spaces (as per below)**

Environmental equipment minimum spares on board		
Item	Min Quantity	ROB
<b>Mechanical seals/ gland packings</b>		
Main SW pump	One pce of mech seal and/ or one set of gland packing of each type of pump	01 set
FWG ejector pump		01 set
ME JCW pump		02 Set
Fire & GS pump		00 set(spares awaited, refer requisition No 788-21-0012)
Scrubber pump (as applicable)		01 set
Deck Seal pump (as applicable)		02 Set
ME FO transfer pump		02 Set
ME FO booster pump		01 set
ME LO pump		01 set
<b>Gland packing &amp; gasket (Assosted for ER bottom platform)</b>		
SW pp sea suction/ Disch vv's	One roll of gland packing (for vv sizes) and one sheet of valve flange gasket (steam/GP/oil)	
Bilge pp suct/ Disch valve		
Service steam line valve		
Sludge pp suct/ Disch valve		
CFW coolers SW valve		
Boiler blow down vv		
Scrubber pump suct/ Disch		
<b>OWS</b>		
Filter (as applicable)	1 set	ROB Filter media 50kg(spares awaited, Requisiiton no 788-21-0016 )
Coalescers (as applicable)		

**Please Note:** If any one of above listed critical component spares are missing, same to be considered in rapid replacement program and order raised under "ECP priority" and order number mentioned in above table.