

C2 Bridge Checklists

The checklists in section C2 provide a guide to creating appropriate company and/or on board checklists that suit the particular needs of the ship.

Signature blocks are included on some checklists where it is considered appropriate to confirm that the actions have been completed.

C2.1 Steering gear test routines

These routines should be carried out at any time, as required, and if there is doubt as to the performance of the steering gear. Checks of steering equipment may also be required by coastal States prior to entry into their waters.

	Status	Date last checked	Checked by	Remarks
Every watch/after prolonged use of autopilot				
Rudder response to manual steering checked and confirmed from all bridge positions using each steering gear power unit singly and together	<input type="checkbox"/> Yes			
Before entering coastal or congested waters				
Communications between bridge and steering gear compartment checked	<input type="checkbox"/> Yes			
Rudder response to manual steering checked and confirmed from all bridge positions using each steering gear power unit singly and together	<input type="checkbox"/> Yes			
Before departure (no more than 12 hours before departure)				
Communications between bridge and steering gear compartment checked	<input type="checkbox"/> Yes			
Correct operation of the following tested and confirmed:				
• Main steering gear*	<input type="checkbox"/> Yes			
• Auxiliary steering gear	<input type="checkbox"/> Yes			
• Remote steering gear control systems	<input type="checkbox"/> Yes			
• Steering positions on the bridge	<input type="checkbox"/> Yes			
• Emergency power supply	<input type="checkbox"/> Yes			
• All rudder angle indicator repeaters show the correct rudder position	<input type="checkbox"/> Yes			
• Remote steering gear control system power failure alarms	<input type="checkbox"/> Yes			



• Steering gear power unit failure alarms	<input type="checkbox"/> Yes			
• Automatic isolating arrangements and other automatic equipment	<input type="checkbox"/> Yes			
Emergency steering drills				
Emergency steering drills should take place at least every three months and should include direct control from within the steering gear compartment, the communications procedure with the bridge and, where applicable, the operation of alternative power supplies				

* Checks and tests

- Confirm that the full rudder movement matches the required capabilities of the steering gear;
- Check the timing of rudder movement from hard-over to hard-over, using each steering gear power unit singly and together, to make sure it is consistent with previous tests; and
- Visually inspect the steering gear and linkages for leaks or damage.

Changeover procedures

The regular testing of manual steering should be an opportunity for all bridge team members to practise procedures for changing over between different steering modes, as appropriate. Typically, these will include:

- Automatic track-keeping to automatic heading control;
- Automatic heading control to hand steering;
- Hand steering to non-follow-up; and
- Hand steering to emergency steering.

C2.2 Example of a bridge manning matrix

This example of a bridge manning matrix planning tool was developed for a specific ship. It is therefore not suitable for manning levels on all ships and should be adapted.

	Conditions		Master	OOW	Look-out	Helmsman	Pilot	Engine	Helm
Entering and leaving port	All	All						M	H
Restricted waters	All	Clear weather				Option		U	Option
		Restricted visibility						M	H
Coastal waters	All	Clear weather						U	A
		Restricted visibility	Option					Option	H
Ocean waters	Daylight	Clear weather			Option			U	A
		Restricted visibility				Option		U	Option
	Darkness	Clear weather						U	A
		Restricted visibility				Option		U	Option
At anchor	Day	All			Option			U	
	Night	All						U	

Key:	Engine	Helm
Manned	M	
Unmanned	U	
Hand steering		H
Auto		A



C2.3 Familiarisation with bridge equipment

Compass and heading devices	Tick
Location and operation of the standard magnetic compass and azimuth mirror	
Date of last compass swing	
Location of deviation card and compass error log	
Location and operation of magnetic off-course alarm	
Location and operation of the TMC control unit	
Location and operation of gyro compass, repeaters and azimuth mirrors	
Gyro compass error	
Location and operation of off-course alarm	
Radar and radar plotting aids	Tick
Location and operation of radar(s) including operation performance monitors	
Operation of ARPA (or other plotting aids)	
Echo sounder	Tick
Location and operation of echo sounding devices	
Location of echo sounder repeaters	
Location of echo sounder spares and spare recording paper (if not digital unit)	
Speed and distance logs	Tick
Location and operation of speed logs	
Location and operation of speed log repeaters	
Global Maritime Distress and Safety System (GMDSS) including maritime safety information (MSI)	Tick
Location and operation of GMDSS station, isolation of aerials, location of batteries/back-up power	
Location and operation of VHF/MF/HF equipment including digital selective calling (DSC)	
Location and operation of ship earth station (SES)	
Location and operation of NAVTEX receiver	
Location and operation of weather fax receiver and any weather routing program	
Location of spare paper for weather fax receiver	

Location of the GMDSS log	
Location and operation of Emergency Position Indicating Radio Beacon (EPIRB)	
Position fixing systems	Tick
Location and operation of GNSS	
Location and operation of terrestrial radio-navigation systems	
Location of antenna(s)	
General bridge equipment	Tick
Location and operation of the chronometer, master clocks system and stopwatch	
Location of compass error log	
Location of binoculars	
Location of sextant(s)	
Location of log books	
Location and operation of bridge windscreen wipers and clear view screens including water wash	
Internal communications	Tick
Location and operation of internal communications	
Location and operation of emergency internal communications	
Propulsion and steering	Tick
Location of manoeuvring characteristics information and data	
Location and operation of engine telegraph	
Location and use of engine movement recorder	
Location and operation of thruster controls	
Operation of steering, steering changeover and emergency steering systems	
Location and use of rate of turn (ROT) indicator	
Orders and logs	Tick
Location and content of the SMS and Master's standing orders	
Location of Master's daily/night orders	
Location and content of instructions for unmanned spaces	



Passage planning and monitoring	Tick
Location of passage plan for proposed/current passage	
Location of charts for proposed/current passage	
Completion of ECDIS familiarisation (see checklist C2.4)	
Location of navigational publications, light lists, radio signals, digital and/or hard copies	
Location and operation of chart management system	
Location of navigation warnings and weather information	
Location of Notices to Mariners (NMs), digital and/or hard copies	
Automatic Identification System (AIS)	Tick
Location and operation of AIS	
Alarm systems	Tick
Location and operation of BNWAS	
Voyage recording	Tick
Location and operation of VDR or S-VDR	
Recovery/saving data procedure from VDR or S-VDR	
Location and operation of bridge audio recording system	
Location and operation of the course recorder	
Location of spare recording paper for course recorder, and other spares (if electro mechanical)	
Location of LRIT equipment	
Location of bridge procedures manual, SMS and ship specific procedures	
Navigation lights, shapes and signalling equipment	Tick
Location and operation of navigation and signal light controls and alarm panel	
Location of bridge operated deck lighting	
Location of spare bulbs for navigation lights and equipment	
Location and operation of daylight signalling lamp	
Location of mains sockets and batteries	
Understand the recharging procedure for back-up battery supplies	

Location of flags, shapes and manual sound signalling apparatus	
Location and operation of sound signalling panel	
Emergency equipment and security	Tick
Location of muster point information	
Location of spare lifejackets	
Location of man overboard lifebuoys and methods of release	
Location and operation of fire detection and alarm panel	
Location of fire and general alarm activation points	
Location of emergency fan stop	
Location of watertight door remote controls	
Location of emergency fire pump(s) stop/start	
Location of counter-piracy equipment	
Other	Tick

Bridge team member: Date:

Master’s signature: Date:

The above points are recommendations only. It is essential that the checklist is amended to reflect the bridge equipment installed on board.



C2.4 ECDIS familiarisation

Initial preparation	Tick
Identify whether the vessel is approved to use ECDIS for navigation	
Identify whether there are company procedures for the use of ECDIS and ensure that these are followed	
Identify whether any passwords are needed for the management of the system and, if so, get the details	
Identify how one to one familiarisation is supported, e.g. by a CBT package and/or a built-in mode	
Identify the primary ECDIS equipment and the facilities for back-up (if the back-up is a second ECDIS of a different type to the primary installation, this familiarisation checklist should be completed for both systems)	
Understand the procedures in event of ECDIS failure	
Identify the location of user manuals for ECDIS and its back-up	
Identify the location of base and update media	
Understand the procedures for getting additional chart permits	
Understand the position fixing systems that feed the ECDIS. Decide on the method of switching between sources, e.g. primary and secondary position fixing systems	
Identify what other systems supply ECDIS, such as speed logs, GNSS, gyro compass, radar/ARPA (acquired targets, radar picture overlay), AIS and echo sounder. For each one, identify the reference framework, e.g. ground, water or ship stabilised	
Identify where to find maintenance records related to the ECDIS and service reports, non-conformity reports and inspection, validation reports	
Identify the power supply modes and their specifications such as uninterruptible power supply (UPS) duration	
Basic operation	Tick
Identify how to switch the ECDIS on and off	
Identify the function(s), position and general operation of the physical controls and switches, including cursor control, and the access and selection of menu items	
Understand how to access the main menu and select menu options	
Identify the methods for setting day/night viewing modes, brightness, contrast and colour correction	
Identify how to switch between traditional and simplified symbols	

Identify how to put equipment in route monitoring mode and route planning mode	
Identify the methods for scrolling and zooming charts, including the current scale of displayed charts and setting the display to a particular scale	
Identify how to select the display base and standard display	
Identify how to display other information from ENC's, including the display of All Other Information	
Identify how to check that information concerning own ship, e.g. dimensions, is correct	
Identify how to select the safety contour and safety depth	
Identify how to select two or four colour contour mode	
Identify how to select deep and shallow area display options	
Identify how to set all other safety parameters	
Identify how alarms and other alerts are given by the ECDIS and understand the procedure needed to acknowledge them	
Electronic charts	Tick
Identify how to access the chart directory and to identify whether charts are ENC's, RNC's or unofficial (private)	
Identify how to select a chart for display on the screen	
Identify how to load new chart licence keys	
Identify how to load base data	
Identify how to check the update status of loaded charts	
Identify how to update charts using the normal cumulative update procedures	
Identify how to apply non-cumulative or electronically transmitted updates	
Find out how to apply manual updates	
Navigation tools and functions	Tick
Identify how to display the legend of general information	
Identify how to select information about an object using a pick report/chart query	
Identify how category zone of confidence (CATZOC) information can be displayed	
Identify how to access the presentation library	
Identify what marine information overlays (MIO's) are available and how to access them	



Identify the single operator action needed to remove MIOs from the display	
Identify the single operator action needed to set the standard display setting	
Identify how to view, add, edit and delete NMs	
Identify how to access all navigational elements and parameters, such as past track, vectors, position lines (LOP) and anti-grounding cone (AGC)	
Identify the facilities provided for the measurement of range and bearing (e.g. EBLs and VRMs) and how they are to be used	
Identify the method(s) used for inserting parallel index lines	
Identify what other navigational tools are available and how to access them	
Identify how to change to using the ECDIS back-up system	
Identify the procedure for identifying and reacting to sensor/GNSS failure	
Identify how to switch chart text (text for charted objects) on and off	
Route planning	Tick
Identify how to load existing routes and enable for editing	
Identify how to initiate a new route plan	
Identify how to initiate and plan alternate routes	
Identify how to save route plan	
Identify how to add, delete and graphically adjust the position of waypoints	
Identify how to add, edit and delete critical points	
Identify how to display time varying objects relevant for the timing of the planned voyage	
Identify all the features available for planning routes, such as use of straight and curved segments, wheel over positions, turn radius, and inserting pilotage aids	
Identify the ship's procedures for displaying MSI, Temporary and Preliminary (T&P) notices and other relevant notes into the passage plan	
Identify how to use the facilities for checking the planned route	
Identify how to load the planned route and alternatives into the back-up system	
If RCDS mode is available, identify how to use it where ENC's are not available and as appropriate	

Route monitoring	Tick
Identify how to load a pre-planned route	
Identify how to select the primary or an alternative route, and how to distinguish between them on the display	
Identify the single operator action that selects the charted display of own ship's position	
Identify the available display orientation modes, and how to switch between them (e.g. north up, head up or course up)	
Identify the available display motion modes and how to select them and change the parameters, such as the position of own ship on the display when relative motion is selected	
If radar or AIS targets can be displayed on the ECDIS, identify what target vector modes are available and how to switch between and differentiate them	
Identify how to create time labels along the ship's track	
Become familiar with the route monitoring display, including the display of position, heading, course, speed and time	
Identify how to set the length of own ship's vector and intermediate time marks	
Identify how to display radar and AIS MIOs, if available	
Identify how to use the ECDIS as the input to a track-keeping autopilot. (This will require reference to the autopilot handbook)	
Identify how to input lines of position (LOP) to form the reference for an estimated position (EP)	
Identify how to configure the ECDIS to use the above reference for subsequent EP	
Identify how to switch to dead reckoning (DR) mode and to identify when the ECDIS is in DR mode	
Identify how to use the review facilities of the voyage recorder (if appropriate and not essential knowledge before sailing)	

Bridge team member: Date:

Master's signature: Date:



C2.5 ECDIS setup

Action	Status	Remarks
Primary position fixing system set up correctly. Prove the ECDIS is correct by entering a manual fix into the system	<input type="checkbox"/> Yes	
System time configured correctly	<input type="checkbox"/> Yes	
ECDIS setup is replicated on all ECDIS units	<input type="checkbox"/> Yes	
Navigation tools configured correctly	<input type="checkbox"/> Yes	
Safety depth and safety contour settings configured correctly	<input type="checkbox"/> Yes	
System units configured correctly	<input type="checkbox"/> Yes	
All relevant overlays loaded	<input type="checkbox"/> Yes	
Area alerts configured correctly (if system in use allows alarm configuration)	<input type="checkbox"/> Yes	
Docking mode configured correctly	<input type="checkbox"/> Yes	
Navigation alarms configured correctly, including safety frame/anti-grounding cone	<input type="checkbox"/> Yes	
Route alarms configured correctly	<input type="checkbox"/> Yes	
Targets configured correctly	<input type="checkbox"/> Yes	
Preferred radar selected	<input type="checkbox"/> Yes	
Ship data set up correctly	<input type="checkbox"/> Yes	
Audible alarm working correctly	<input type="checkbox"/> Yes	
Chart motion, chart orientation, screen layout, colour palette and additional ENC settings configured correctly	<input type="checkbox"/> Yes	
Correct display setting available for execution of navigation in line with ECDIS check off cards for pilotage and confined waters, and coastal navigation and open ocean	<input type="checkbox"/> Yes	
Correct route loaded for route monitoring	<input type="checkbox"/> Yes	
Correct waypoint and route monitoring information displayed	<input type="checkbox"/> Yes	

Time and date:

OOW signature:

The above points are recommendations only. It is essential that the checklist is amended to reflect the appropriate manufacturer's operating manuals and company procedures.

C2.6 Preparations for departure

Passage plan	Status	Remarks
Berth to berth passage plan for the intended passage prepared and available on the bridge with the route plotted on up-to-date and appropriate scale charts (official paper or electronic)	<input type="checkbox"/> Yes	
Passage plan checked and approved by the Master	<input type="checkbox"/> Yes	
Passage plan briefed to the bridge team	<input type="checkbox"/> Yes	
Route displayed on ECDIS and/or other electronic navigation aids, as appropriate	<input type="checkbox"/> Yes	
Up-to-date charts and nautical publications available	<input type="checkbox"/> Yes	
Latest NMs (week number)	<input type="checkbox"/> Yes	
Equipment checks (tested and ready for use)	Status	Remarks
AIS (voyage data updated and correct)	<input type="checkbox"/> Yes	
Anchors, cables and winches	<input type="checkbox"/> Yes	
Ancillary bridge equipment (e.g. binoculars)	<input type="checkbox"/> Yes	
BNWAS	<input type="checkbox"/> Yes	
Clocks synchronised with engine room	<input type="checkbox"/> Yes	
Controllable pitch propeller controls and indicators	<input type="checkbox"/> Yes	
Course and engine movement recorder/bridge movement book	<input type="checkbox"/> Yes	
Deck power	<input type="checkbox"/> Yes	
ECDIS and/or other electronic navigation aids	<input type="checkbox"/> Yes	
Echo sounder	<input type="checkbox"/> Yes	
Electronic position fixing systems	<input type="checkbox"/> Yes	
Emergency engine stops	<input type="checkbox"/> Yes	
Engine(s)/propulsion (ahead and astern)	<input type="checkbox"/> Yes	
GMDSS communications and GMDSS log	<input type="checkbox"/> Yes	
Gyro/magnetic compass and repeaters, including repeater in steering gear area	<input type="checkbox"/> Yes	
Internal communications (particularly bridge to engine room/bridge to mooring stations)	<input type="checkbox"/> Yes	
LRIT	<input type="checkbox"/> Yes	
Navigation lights, shapes and sound signals	<input type="checkbox"/> Yes	



Radar(s) and ARPA	<input type="checkbox"/> Yes	
RPM and ROT indicators	<input type="checkbox"/> Yes	
Signalling equipment including flags, search lights and signal lamps	<input type="checkbox"/> Yes	
Speed and distance log	<input type="checkbox"/> Yes	
Stabilisers	<input type="checkbox"/> Yes	
Steering gear (checklist C2.1)	<input type="checkbox"/> Yes	
Thrusters	<input type="checkbox"/> Yes	
VDR/S-VDR	<input type="checkbox"/> Yes	
Port and pilotage	Status	Remarks
Master/pilot information exchange checklist completed (checklist C1.1)	<input type="checkbox"/> Yes	
Pilot card prepared (checklist C1.2)	<input type="checkbox"/> Yes	
Pilot boarding time confirmed	<input type="checkbox"/> Yes	
Pilot boarding arrangements ready for disembarkation of the pilot (checklist C1.4)	<input type="checkbox"/> Yes	
Port and VTS channels monitored	<input type="checkbox"/> Yes	
Port, VTS and pilot informed of any special requirements	<input type="checkbox"/> Yes	
Preparations for pilotage complete (checklist C2.8)	<input type="checkbox"/> Yes	
Securing for sea	Status	Remarks
Cargo and cargo handling equipment secure	<input type="checkbox"/> Yes	
Cargo/passenger details available	<input type="checkbox"/> Yes	
Hull openings secure and watertight	<input type="checkbox"/> Yes	
Stability and draught information available	<input type="checkbox"/> Yes	
Watertight doors closed	<input type="checkbox"/> Yes	
Before sailing	Status	Remarks
All crew on board	<input type="checkbox"/> Yes	
Anchors cleared away	<input type="checkbox"/> Yes	
Bridge team fit for duty	<input type="checkbox"/> Yes	
Engine room ready	<input type="checkbox"/> Yes	
Mooring stations manned and ready	<input type="checkbox"/> Yes	
MSI checked and communicated to bridge team	<input type="checkbox"/> Yes	

Pressure on fire main	<input type="checkbox"/> Yes	
Stowaway/security search completed	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	

Time and date:

OOW signature:

The above points are recommendations only. It is essential that the checklist is amended to reflect the appropriate operating manuals and company procedures.



C2.7 Preparations for arrival

Passage plan	Status	Remarks
Pre-arrival documentation complete and sent	<input type="checkbox"/> Yes	
Passage plan updated with additional information received since departure	<input type="checkbox"/> Yes	
Updated passage plan checked and approved by the Master	<input type="checkbox"/> Yes	
Updated passage plan briefed to the bridge team	<input type="checkbox"/> Yes	
Updated passage plan available on the bridge with the route plotted on up-to-date and appropriate scale charts (official paper or electronic)	<input type="checkbox"/> Yes	
Updated route displayed on ECDIS and/or other electronic navigation aids, as appropriate	<input type="checkbox"/> Yes	
Is cargo/ballast rearrangement required?	<input type="checkbox"/> Yes	
Equipment checks (tested and ready for use)	Status	Remarks
Clocks synchronised with engine room	<input type="checkbox"/> Yes	
Controllable pitch propeller controls and indicators	<input type="checkbox"/> Yes	
Deck power	<input type="checkbox"/> Yes	
ECDIS and/or other electronic navigation aids	<input type="checkbox"/> Yes	
Echo sounder	<input type="checkbox"/> Yes	
Electronic position fixing systems	<input type="checkbox"/> Yes	
Emergency engine stops	<input type="checkbox"/> Yes	
Engine(s)/propulsion (ahead and astern)	<input type="checkbox"/> Yes	
Gyro/magnetic compass and repeaters, including repeater in steering gear area	<input type="checkbox"/> Yes	
Internal communications (particularly bridge to engine room/bridge to mooring stations)	<input type="checkbox"/> Yes	
Navigation lights, shapes and sound signals	<input type="checkbox"/> Yes	
RPM and ROT indicators	<input type="checkbox"/> Yes	
Signalling equipment including flags, search lights and signal lamps	<input type="checkbox"/> Yes	
Steering gear (checklist C2.1)	<input type="checkbox"/> Yes	
Thrusters	<input type="checkbox"/> Yes	
Before arrival	Status	Remarks
Anchors cleared and ready for use	<input type="checkbox"/> Yes	

Any stabilisers housed	<input type="checkbox"/> Yes	
Bridge team ready	<input type="checkbox"/> Yes	
Cargo/passenger details available	<input type="checkbox"/> Yes	
Engine room ready	<input type="checkbox"/> Yes	
Ship ready for manoeuvring	<input type="checkbox"/> Yes	
If available, use more than one steering gear power unit	<input type="checkbox"/> Yes	
Manual steering engaged	<input type="checkbox"/> Yes	
Mooring stations manned and ready	<input type="checkbox"/> Yes	
Pressure on fire main	<input type="checkbox"/> Yes	
Stability and draught information verified and available	<input type="checkbox"/> Yes	
Watertight doors closed	<input type="checkbox"/> Yes	
Port and pilotage requirements	Status	Remarks
Master/pilot information exchange (MPX) checklist completed (checklist C1.1)	<input type="checkbox"/> Yes	
Pilot card prepared (checklist C1.2)	<input type="checkbox"/> Yes	
Pilot boarding time confirmed	<input type="checkbox"/> Yes	
Pilot boarding arrangements ready for disembarkation of the pilot (checklist C1.4)	<input type="checkbox"/> Yes	
Port and VTS channels monitored	<input type="checkbox"/> Yes	
Port, VTS and pilot informed of any special requirements	<input type="checkbox"/> Yes	
Preparations for pilotage complete (checklist C2.8)	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	

Time and date:

OOW signature:

The above points are recommendations only. It is essential that the checklist is amended to reflect the appropriate operating manuals and company procedures.



C2.8 Pilotage

Action	Status	Remarks
Appropriate scale charts available with route plotted	<input type="checkbox"/> Yes	
Appropriate flags and navigation lights or shapes displayed	<input type="checkbox"/> Yes	
Bridge appropriately manned to:		
• Maintain a proper look-out	<input type="checkbox"/> Yes	
• Monitor the progress of the ship and navigational safety	<input type="checkbox"/> Yes	
• Monitor communications between pilot, shore, tugs and mooring craft	<input type="checkbox"/> Yes	
• Carry out orders and instructions given by the Master and pilot	<input type="checkbox"/> Yes	
Bridge watch and crew standby arrangements	<input type="checkbox"/> Yes	
ECDIS terminals are set up correctly for navigation in pilotage waters with route displayed (checklist C2.5)	<input type="checkbox"/> Yes	
Engine room and mooring stations regularly updated on pilotage progress	<input type="checkbox"/> Yes	
MPX completed and passage plan agreed by the Master (checklist C1.1)	<input type="checkbox"/> Yes	
Pilot briefed on the pilot card (checklist C1.2) and wheelhouse poster (checklist C1.3) concerning manoeuvring characteristics	<input type="checkbox"/> Yes	
Mooring stations informed of berthing arrangements	<input type="checkbox"/> Yes	
Pilot informed of any propulsion or steering gear defects or limitations	<input type="checkbox"/> Yes	
Pilot informed of ship's heading, speed, engine setting and draught on arrival on the bridge	<input type="checkbox"/> Yes	
Pilot informed of the location of life-saving appliances provided for their use	<input type="checkbox"/> Yes	
Preparation for departure (checklist C2.6) or arrival (checklist C2.7) checks complete	<input type="checkbox"/> Yes	
Working language agreed	<input type="checkbox"/> Yes	

Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	



C2.9 Passage planning

Factors to consider when developing a passage plan and associated route

Appraisal	Tick
Adequacy and reliability of aids to navigation	
Adequacy and reliability of charts and hydrographic data	
Appropriate scale charts for ocean, coastal, harbour and berthing phases	
Guides to port entry	
List of lights	
Local area warnings	
NAVAREA navigational warnings	
New charts and licences ordered as appropriate	
Notices to Mariners	
Planning charts	
List of radio signals	
Routeing and load line charts	
Sailing directions and pilot books	
Tide tables and tidal stream atlases	
Passage requirements	Tick
Anchoring locations	
Any special ship operational requirements for the passage	
Bunker calculations	
Cargo and any special stowage/carriage restrictions	
Communications/GMDSS watchkeeping considerations	
Draught restrictions including air draught and under keel clearance (UKC) requirements	
Helicopter operations	
Load line requirements	
Log book requirements	
Passage reporting requirements	
Passage speed and ETA calculations	
Position fixing intervals	

Reliability of propulsion and steering systems or any known defects affecting navigation or control of vessel	
Routeing and reporting measures	
Safety contours	
Safety depths	
Security concerns	
Ship-to-ship transfers	
Squat	
Strength and stability	
Watch schedules	
Environmental considerations	Tick
Ballast water	
Emission Control Area (ECA) limits and fuel changeover procedures	
MARPOL Special Areas, PSSAs, or national and regional requirements	
Notifications/advice to crew on board	
Weather/conditions	Tick
Abnormal waves	
Currents and tides	
Heavy weather	
Ice	
Swell	
Tropical storms	
Visibility	
Weather routeing	
Winds	
Contingencies	Tick
Emergency anchorages	
Commit points	
Emergency response plans	
Notifications and reporting	
Plan amendments	



Other	Tick

Officer responsible – passage plan completed and checked.

Signature: Date:

Master – passage plan checked and approved.

Signature: Date:

Officer responsible – approved passage plan briefed to the bridge team.

Signature: Date:

C2.10 Navigation in coastal waters

Action	Status	Remarks
Appropriate scale charts available with route plotted	<input type="checkbox"/> Yes	
Bridge manning appropriate to maintain a proper look-out	<input type="checkbox"/> Yes	
ECDIS terminals set up correctly for navigation in coastal waters with route displayed	<input type="checkbox"/> Yes	
Echo sounder checked	<input type="checkbox"/> Yes	
Effects of weather and currents for the area understood	<input type="checkbox"/> Yes	
Engines ready for immediate use	<input type="checkbox"/> Yes	
Gyro/magnetic compass errors checked	<input type="checkbox"/> Yes	
Helmsman is available at immediate notice	<input type="checkbox"/> Yes	
Manual steering checked and ready for use (checklist C2.1). Use more than one steering gear power unit, as appropriate	<input type="checkbox"/> Yes	
Measures taken to comply with environmental requirements and applicable pollution regulations	<input type="checkbox"/> Yes	
MSI is monitored and plotted as appropriate	<input type="checkbox"/> Yes	
Position of the ship is fixed regularly and cross referenced at appropriate intervals	<input type="checkbox"/> Yes	
Proximity to shallow water and the effect of squat monitored	<input type="checkbox"/> Yes	
Radar performance and radar heading line marker alignment checked	<input type="checkbox"/> Yes	
Ship security procedures understood and followed	<input type="checkbox"/> Yes	
Traffic conditions in the area understood	<input type="checkbox"/> Yes	
Vessel reporting requirements understood and followed	<input type="checkbox"/> Yes	
Vessel routing requirements understood and followed	<input type="checkbox"/> Yes	
Weather monitored, particularly in areas prone to restricted visibility	<input type="checkbox"/> Yes	



Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	

C2.11 Navigation in ocean waters

Action	Status	Remarks
Appropriate scale charts available with route plotted	<input type="checkbox"/> Yes	
All measures taken to comply with environmental requirements and applicable pollution prevention regulations	<input type="checkbox"/> Yes	
ECDIS terminals correctly set up for navigation in ocean waters with route displayed (checklist C2.5)	<input type="checkbox"/> Yes	
Bridge manning appropriate for maintaining a proper look-out	<input type="checkbox"/> Yes	
Ship's position confirmed at appropriate intervals	<input type="checkbox"/> Yes	
Changes in weather monitored and regular barometer observations made	<input type="checkbox"/> Yes	
NAVAREA navigational warning broadcasts and other long range weather reports monitored	<input type="checkbox"/> Yes	
Participation in area reporting systems (e.g. Automated Mutual-Assistance Vessel Rescue System (AMVER)) as appropriate	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	



C2.12 Anchoring and anchor watch

Anchoring appraisal and planning	Status	Remarks
Anchoring plan checked and approved by the Master	<input type="checkbox"/> Yes	
Anchoring position identified that addresses the:		
<ul style="list-style-type: none"> • Availability of appropriate space at the anchorage 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • Proximity of navigational hazards including traffic 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • Scope of anchor cable required/available 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • Suitable seabed type and holding conditions 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • Tidal height checked to confirm that sufficient water is available for the duration of the anchorage 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • Tidal stream checked with particular reference to effect on slow speed manoeuvring 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • Weather conditions and available shelter 	<input type="checkbox"/> Yes	
Anchors, cables and winches checked and ready for use	<input type="checkbox"/> Yes	
Engine room and anchor party informed of the time of anchoring	<input type="checkbox"/> Yes	
Intended anchor position of the ship reported to the port authority	<input type="checkbox"/> Yes	
Lights, shapes and sound signalling apparatus checked and ready for use	<input type="checkbox"/> Yes	
Ship ready for manoeuvring	<input type="checkbox"/> Yes	
Security measures required by the Ship Security Plan (SSP)	<input type="checkbox"/> Yes	
While at anchor the OOW should:	Status	Remarks
Check at sufficiently frequent intervals whether the ship is remaining securely at anchor by taking bearings of fixed navigational marks or readily identifiable shore objects	<input type="checkbox"/> Yes	
Identify and plot the ship's position on the appropriate chart as soon as practicable	<input type="checkbox"/> Yes	
Monitor swinging pattern	<input type="checkbox"/> Yes	
Ensure that inspection rounds of the ship are made periodically	<input type="checkbox"/> Yes	

Ensure that a proper look-out is kept	<input type="checkbox"/> Yes	
Ensure that the ship exhibits the appropriate lights and shapes and that appropriate sound signals are made in accordance with all applicable regulations	<input type="checkbox"/> Yes	
Ensure that the state of readiness of the main engines and other machinery is in accordance with the Master's instructions	<input type="checkbox"/> Yes	
Ensure that vessel access control precautions are maintained	<input type="checkbox"/> Yes	
If visibility deteriorates, call the Master	<input type="checkbox"/> Yes	
Modify AIS status	<input type="checkbox"/> Yes	
Call the Master and undertake all necessary measures if the ship drags anchor	<input type="checkbox"/> Yes	
Observe meteorological and tidal conditions and the sea state	<input type="checkbox"/> Yes	
Take measures to protect the environment from pollution by the ship and comply with applicable pollution prevention regulations	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	



C2.13 Restricted visibility

Action	Status	Remarks
Master informed of reduced visibility as required in Master's standing orders and the SMS	<input type="checkbox"/> Yes	
Engine room informed	<input type="checkbox"/> Yes	
Bridge manning levels increased, as necessary (checklist C2.2)	<input type="checkbox"/> Yes	
Look-outs posted	<input type="checkbox"/> Yes	
Hand steering selected	<input type="checkbox"/> Yes	
Engines ready for immediate manoeuvre	<input type="checkbox"/> Yes	
All watertight doors and openings closed	<input type="checkbox"/> Yes	
Equipment preparations	Status	Remarks
AIS	<input type="checkbox"/> Yes	
Echo sounder	<input type="checkbox"/> Yes	
Fog signalling apparatus	<input type="checkbox"/> Yes	
Navigation lights	<input type="checkbox"/> Yes	
Radar, ARPA or other plotting aids	<input type="checkbox"/> Yes	
VHF	<input type="checkbox"/> Yes	
Compliance with COLREGS regulations	Status	Remarks
Rule 19 – Conduct of vessels in restricted visibility	<input type="checkbox"/> Yes	
Rule 35 – Sound signals in restricted visibility	<input type="checkbox"/> Yes	
Rule 5 – Look-out	<input type="checkbox"/> Yes	
Rule 6 – Safe speed	<input type="checkbox"/> Yes	
Contingency planning	Status	Remarks
Consider the possibility of anchoring the ship if in doubt and ship in a suitable depth of water	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	

C2.14 Heavy weather/tropical storm areas

Action	Status	Remarks
Master informed of the weather conditions	<input type="checkbox"/> Yes	
Engine room informed of the weather conditions	<input type="checkbox"/> Yes	
Crew informed of the need to avoid upper deck areas made dangerous by weather	<input type="checkbox"/> Yes	
Safety lines/hand ropes rigged where necessary	<input type="checkbox"/> Yes	
Ship course and speed adjusted as necessary to ease ship/avoid worst of motion	<input type="checkbox"/> Yes	
Ship manoeuvred to minimise risk of broaching, pooping and/or synchronous rolling	<input type="checkbox"/> Yes	
Weather reports monitored	<input type="checkbox"/> Yes	
Weather reports made to appropriate authorities. In the case of tropical storms, danger messages in accordance with SOLAS	<input type="checkbox"/> Yes	
Secure and/or check securing:		
• All weather deck openings (doors/hatches)	<input type="checkbox"/> Yes	
• Anchors and winches	<input type="checkbox"/> Yes	
• Hatch covers, vents and any other openings to cargo holds	<input type="checkbox"/> Yes	
• Cargo (as appropriate)	<input type="checkbox"/> Yes	
• Loose or movable objects in cabins and accommodation	<input type="checkbox"/> Yes	
• Loose or movable objects on deck	<input type="checkbox"/> Yes	
• Loose or movable objects in the engine room	<input type="checkbox"/> Yes	
• Loose or movable objects in the galley	<input type="checkbox"/> Yes	
• Loose or movable objects in the storerooms	<input type="checkbox"/> Yes	
• All ports and deadlights closed	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	



C2.15 Navigation in ice*

Action	Status	Remarks
Master informed of the proximity to ice	<input type="checkbox"/> Yes	
Additional look-outs posted if appropriate	<input type="checkbox"/> Yes	
Engine room informed of the proximity to ice	<input type="checkbox"/> Yes	
Crew informed of the proximity to ice	<input type="checkbox"/> Yes	
All watertight doors closed	<input type="checkbox"/> Yes	
Speed reduced as appropriate in the conditions	<input type="checkbox"/> Yes	
Hand steering engaged if appropriate	<input type="checkbox"/> Yes	
Frequency of sounding tanks and bilges increased	<input type="checkbox"/> Yes	
Ice advisory service broadcasts monitored	<input type="checkbox"/> Yes	
Danger messages transmitted in accordance with SOLAS	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	

* Preparations for navigation in ice for ships operating in polar waters should be in line with the ship's Polar Water Operational Manual (PWOM).

C2.16 Change of watch at sea

Action	Status	Remarks
Enough time allowed for night vision to adjust	<input type="checkbox"/> Yes	
Master's orders understood	<input type="checkbox"/> Yes	
GMDSS log up to date	<input type="checkbox"/> Yes	
Deck log up to date	<input type="checkbox"/> Yes	
Position, course and speed	<input type="checkbox"/> Yes	
Passage plan progress and time to next alter course	<input type="checkbox"/> Yes	
Passage plan look-ahead including hazards for the watch	<input type="checkbox"/> Yes	
Draught, air draught and UKC	<input type="checkbox"/> Yes	
Effect of heel, trim, water density and squat	<input type="checkbox"/> Yes	
Current traffic conditions	<input type="checkbox"/> Yes	
Maritime safety information:		
• Weather	<input type="checkbox"/> Yes	
• Navigational warnings	<input type="checkbox"/> Yes	
Status of navigation and bridge equipment:		
• AIS	<input type="checkbox"/> Yes	
• Autopilot	<input type="checkbox"/> Yes	
• BNWAS	<input type="checkbox"/> Yes	
• Course and engine movement recorder	<input type="checkbox"/> Yes	
• ECDIS	<input type="checkbox"/> Yes	
• Echo sounder	<input type="checkbox"/> Yes	
• GNSS	<input type="checkbox"/> Yes	
• Gyro and magnetic compass	<input type="checkbox"/> Yes	
• Navigation lights, shapes and signals	<input type="checkbox"/> Yes	
• Radar and ARPA	<input type="checkbox"/> Yes	
• VDR/S-VDR	<input type="checkbox"/> Yes	
Status of communications equipment:		
• EPIRB	<input type="checkbox"/> Yes	
• NAVTEX	<input type="checkbox"/> Yes	



• SES	<input type="checkbox"/> Yes	
• VHF/MF/HF	<input type="checkbox"/> Yes	
Status of propulsion and steering equipment:		
• Engine room watch	<input type="checkbox"/> Yes	
• Hand steering tested	<input type="checkbox"/> Yes	
• Main engines and generators	<input type="checkbox"/> Yes	
• Steering system	<input type="checkbox"/> Yes	
Status of watertight doors	<input type="checkbox"/> Yes	
Status of fire zones	<input type="checkbox"/> Yes	
Any special work in progress	<input type="checkbox"/> Yes	

C2.17 Calling the Master

If the Master needs to be called, particularly where there is concern about the safety of the ship, this should be done early enough to allow the Master enough time to understand and respond effectively to the situation.

Failing to call the Master promptly can lead to an increased level of risk of:

- Collision;
- Grounding;
- Safety of life;
- Damage to the environment;
- Ship delays;
- Cargo leaks or spills;
- Property damage;
- Commercial losses; or
- Reputation losses due to delays or damage.

Occasions to call the Master	Status	Remarks
As required by the SMS, Master’s standing orders and daily orders, including:		
• When restricted visibility is encountered or expected	<input type="checkbox"/> Yes	
• When traffic conditions, density or the movements of other vessels are causing concern	<input type="checkbox"/> Yes	
• When a distress alert has been received or a distress signal has been sighted	<input type="checkbox"/> Yes	
• When difficulties in maintaining course are experienced	<input type="checkbox"/> Yes	
• When there is significant difference between the latest observed position and the expected position of the ship	<input type="checkbox"/> Yes	
• In case of failure to sight land, identify a navigation mark or get soundings by the expected time	<input type="checkbox"/> Yes	
• When there is unexpected sighting of land or a navigation mark or unexpected change in soundings	<input type="checkbox"/> Yes	
• When amendments to the passage plan require immediate approval	<input type="checkbox"/> Yes	
• When there is a breakdown of the engines, propulsion machinery remote control, steering gear or any essential navigational equipment, alarm or indicator	<input type="checkbox"/> Yes	



<ul style="list-style-type: none"> • When communications or GMDSS radio equipment malfunctions 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • In heavy weather, if any doubt about the possibility of weather damage 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • When the ship meets hazards to navigation, e.g. ice or a derelict vessel 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • When there are concerns about the ship's security 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • In any emergency situation 	<input type="checkbox"/> Yes	
<ul style="list-style-type: none"> • In any cases when the situation is beyond the experience of the OOW or if there is any doubt about the safety of the ship, or ability to comply with regulatory requirements 	<input type="checkbox"/> Yes	
Other	Status	Remarks
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	
	<input type="checkbox"/> Yes	

C2.18 Pre-operational dynamic positioning

This checklist should complement the detailed DP procedures and checklists required for personnel operating DP vessels.

Item	Status				Remarks
Computers	A	Running		Online	
	B	Running		Online	
	A/B Difference messages				
Thrusters	1	Running		Enabled	
	2	Running		Enabled	
	3	Running		Enabled	
	4	Running		Enabled	
	5	Running		Enabled	
	6	Running		Enabled	
Power and generators	1	Running		Standby	
	2	Running		Standby	
	3	Running		Standby	
	4	Running		Standby	
Bus tie switch	Open/closed				
Equipment class	Consequence analysis enabled				
Control gain	Low/medium/high				Customised/relaxed
Alternative rate of turn (ROT) point	Number selected:			Position:	
Wind sensors	1/2	Available		Selected	Gyro differences checked
Gyros	1	Running		Selected	Repeater checked
	2	Running		Selected	Gyro alarms checked
	3	Running		Selected	
Motion Reference Unit (MRU)	1			MRU differences checked	
	2				
Printer	Running			Paper OK	Outstanding messages checked



Position reference system (PRS)	Differential Global Positioning System (DGPS)	1	Running		Diff available		IMCA differential quality indicator (DQI) factor
			Horizontal dilution of position (HDOP)		AOD (Sec)		
	DGPS	2	Running		Diff available		IMCA DQI Factor
			HDOP		AOD (sec)		
	Taut wires	Port			Deployed		Water depth: m
		Stbd			Deployed		Water depth: m
	Fan beam	Deployed			Range/ bearing (Rng/Brg):		Reflector location
	HPR	1	Running		Pole up/ down		Transponder deployed
		2	Running		Pole up/ down		Transponder deployed
	Communications		VHF:	Working channels:			Tested
UHF:			Channels:			Tested	
Internal						Tested	
Talkback						Tested	
Weather forecast		Time received:					
Signals displayed							
30 minute setting time complete							
Maximum continuous rating (MCR) checklist complete							
Tasks agreed							
Permit to work		Reference number:			Expiry time:		

OOW/DPO Signature: Date:.....

C2.19 False distress alerts

False alert sent on VHF digital selective calling (DSC)	Status	Remarks
VHF DSC reset immediately	<input type="checkbox"/> Yes	
Alert on VHF DSC Channel 70 cancelled	<input type="checkbox"/> Yes	
Broadcast message transmitted to ALL STATIONS on VHF Channel 16 giving the ship's name, call sign and maritime mobile service identity (MMSI) and cancelling the false distress alert	<input type="checkbox"/> Yes	
Details of the false alert and actions to cancel the alert recorded	<input type="checkbox"/> Yes	
False alert sent on MF DSC	Status	Remarks
MF DSC reset immediately	<input type="checkbox"/> Yes	
Alert cancelled on MF DSC 2187.5 kHz	<input type="checkbox"/> Yes	
Broadcast message transmitted to ALL STATIONS on 2182 kHz giving the ship's name, call sign and MMSI and cancelling the false distress alert	<input type="checkbox"/> Yes	
Record details of the false alert and actions to cancel the alert	<input type="checkbox"/> Yes	
False alert sent on HF DSC	Status	Remarks
HF DSC reset immediately	<input type="checkbox"/> Yes	
Alert cancelled on the HF DSC distress frequencies on which it was sent:		
• 4207.5 kHz	<input type="checkbox"/> Yes	
• 6312 kHz	<input type="checkbox"/> Yes	
• 8414.5 kHz	<input type="checkbox"/> Yes	
• 12577 kHz	<input type="checkbox"/> Yes	
• 16804.5 kHz	<input type="checkbox"/> Yes	
Broadcast message transmitted to ALL STATIONS giving the ship's name, call sign and MMSI, and cancelling the false alert on each of the radio-telephony distress frequencies in the bands on which the HF DSC was sent:		
• 4125 kHz	<input type="checkbox"/> Yes	
• 6215 kHz	<input type="checkbox"/> Yes	
• 8291 kHz	<input type="checkbox"/> Yes	
• 12290 kHz	<input type="checkbox"/> Yes	
• 16420 kHz	<input type="checkbox"/> Yes	



Details of the false alert and actions to cancel the alert recorded	<input type="checkbox"/> Yes	
False alert sent via SES	Status	Remarks
Distress priority message sent to cancel the distress alert to the appropriate rescue co-ordination centre (RCC) via coast earth station (CES) through which the false distress alert was sent	<input type="checkbox"/> Yes	
Details of the false alert and actions to cancel the alert recorded	<input type="checkbox"/> Yes	
False alert sent on EPIRB	Status	Remarks
EPIRB reset immediately	<input type="checkbox"/> Yes	
Nearest coast station or an appropriate CES or RCC contacted and distress alert cancelled	<input type="checkbox"/> Yes	
Details of the false alert and actions to cancel the alert recorded	<input type="checkbox"/> Yes	