

COMPETENCY MAPPING

STCW Table: Table A – IV/2

Title: Specification of minimum standard of competence for GMDSS Radio Operators

Guidance on the development of Assessment Scenario:

- Assessment mapping is made in generic to adapt to any kind of simulator available in an Assessment Center.
- Under Performance Standard, the GMDSS equipment can be replaced with any specific radio equipment to be used on a particular KUP.
- Under Performance Criteria, only those applicable criteria to the performance standard depending on the scenario given shall apply.
- Under Scoring procedure, all the checklist and rubrics showing the total score earned by the candidate shall be in separate form.
- Under Method of Assessment, the method used in performing the KUP shall apply.
- Under Level of Simulation, the KUP is defined as to what level it is addressed.
- For the broadcasting part, please refer to the guidelines below:

Example:

KUPs for broadcasting:

Set 1:

C1 KUP4/KUP5/KUP6

C2 KUP1/Broadcasting

or

Set 2:

C1 KUP1/KUP5/KUP6

C2 KUP3/Broadcasting

Levels of Simulation

Familiarization	Familiar with the equipment, layout procedures, and routine task.
Operational	The task relates to the inputs and outputs and their relationship and has to do with the performance of a function.
Functional	The task relates to the functions or activities performed by the system without reference to which of the elements of the system perform those functions.
Management	Relates to the management of the combination of systems to perform a given job.
Communication	Relates to effective communication between human resources to report, get feedback, or to execute a task.
Emergency	Task performed in circumstances where there is variation or deviation from an expected scenario or situation.
Crisis	Task performed when the emergency has developed into a crisis.



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FUNTION: RADIOCOMMUNICATIONS AT THE OPERATIONAL LEVEL								
C1	Transmit and receive information using GMDSS subsystems and equipment and fulfilling the functional requirements of GMDSS	C1.1 In addition to the requirements of the Radio Regulations, a knowledge of: .1 search and rescue radio communications , including procedures in the International Aeronautical and Maritime Search and Rescue (IAMSAR) Manual	At the end of the assessment, the candidate must be able to transmit and receive search and rescue radio communication	Effectiveness and efficiency of transmission and reception of communication s complies with international regulations and procedures	Operate the <u>MF-DSC equipment</u> effectively and efficiently following the procedure below: <ul style="list-style-type: none"> Click MF/HF DSC equipment Switch ON the equipment (within 30secs after reading the instruction) Wait for all ships call distress RELAY ALL Upon receipt of distress relay, click SILENT, click RELAY, then select YES Select RELAY AREA Press SEND Wait for the completion of transmission when Tx Frequency is shown (2182 KHz) Press QUIT 	Checklist	Practical simulator & Theoretical Examination	Operational



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				* The <u>GMDSS equipment</u> can be replaced with any available radio equipment that can capture the particular KUP.				
		.2 the means to prevent the transmission of false distress alerts and the procedures to mitigate the effects of such alerts	At the end of the assessment, the candidate must be able to prevent the transmission of false distress alerts and mitigate the effect of such alert;	Effectiveness and efficiency of transmission and reception of communication s complies with international regulations and procedures	Operate the <u>MF Radiotelex equipment</u> effectively and efficiently following the procedure below: <ul style="list-style-type: none"> • Click MF DSC equipment • Select mode function and set "TLX-COAST" • Open RADIOTELEX • Switch ON • Switch ON the Printer • Click message • Click new • Construct cancellation message to be sent • Click Options, then save • Click terminal, then type file name (C1KUP2 Last name), then save. • Click call and select "Broadcast FEC" 	Checklist	Practical simulator & Theoretical Examination	Operational



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			Correctness of messages relevant to the safety and security of the ship and persons on board and protection of the marine environment are constructed in English language	<ul style="list-style-type: none"> • Select ITU distress/safety channel and select channel "1" (2174.5KHz) • Click CALL • After radio connection, click OPTIONS, then select "send file" • Click on TERMINAL and select constructed message • After sending message, click on "DE", then BREAK the connection • CALL ENDED <p>Use English language that is relevant to cancellation of false distress alerts following the prescribed format below:</p> <p>All Stations This is (VESSEL NAME), (CALL SIGN) MMSI _____ POSITION _____ Please cancel my distress alert of EPIRB at (DATE), (TIME UTC).</p> <p>Master (CALL SIGN)</p>			



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				(DATE/TIME UTC) NNNN <i>* The <u>GMDSS equipment</u> can be replaced with any available radio equipment that can capture the particular KUP.</i>				
		.3 ship reporting systems	At the end of the assessment, the candidate must be able to report to ship reporting system and radio medical services using GMDSS subsystem and equipment in English language and IMO Standard Marine Communication Phrases and vocabulary.	Effectiveness and efficiency of transmission and reception of communications complies with international regulations and procedures	Operate the <u>INMARSAT-C equipment</u> effectively and efficiently following the procedure below: <ul style="list-style-type: none"> • Click INMARSAT C EQUIPMENT • Switch ON button • Switch ON Printer equipment • Click on Message • Click NEW • Select NEW MESSAGE • Select ASCII-7 bits • Construct deviation report • After constructing message, click "TO", • then select NEW 	Checklist	Practical simulator & Theoretical Examination	Operational



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			Correctness of messages relevant to the safety and security of the ship and persons on board and protection of the marine environment are constructed in English language	<ul style="list-style-type: none"> Type your name and "C1 KUP3", then type the AMVER email address amvermsg@amver.org Then press send Change E-mail service provider to "VIZADA SKYFILE C 01" Tick/check Confirmation Click Send <p>Use English language that is relevant to ship reporting system following the prescribed format below:</p> <p>AMVER/DR// A/(vessel name)/(call sign)// B/131300Z// /(date/time utc) C/2212N/05050W// (position) E/245// (ships course) F/150// (ships speed) I/LOS ANGELES/3342N/11816W/ 200300Z MAR// (arrival place/arrival posn/ETA) X/CHANGE OF PORT OF CALL// (reason for deviation)</p>			



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				Z/EOR// * The <u>GMDSS equipment</u> can be replaced with any available radio equipment that can capture the particular KUP.			
	.4 radio medical services		Effectiveness and efficiency of transmission and reception of communications complies with international regulations and procedures	Operate the <u>INMARSAT F-77 equipment</u> effectively and efficiently by following the procedure as follows: <ul style="list-style-type: none"> • Click INMARSAT F77 equipment • Switch ON • Click on the handset assignment and select FLEET77 • The equipment will show your Ocean Region (in case that the equipment does not show your ocean region, Click on MENU, Select AREA then select your OCEAN REGION) • Press DISTRESS BUTTON for 5 secs • Select LAND EARTH STATION 	Checklist	Practical simulator & Theoretical Examination	Operational



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				Correctness of messages relevant to the safety and security of the ship and persons on board and protection of the marine environment are constructed in English language	<p>LES VIZADA</p> <ul style="list-style-type: none"> • Wait for the RINGING • Once distress is connected, pick up the phone, speak and broadcast the message <p>Use English language that is relevant to radio medical services following the prescribed format as follows:</p> <p>Company/ships name and nationality Patients occupation/rank Name/sex Birthday Patients condition at onset of illness Current symptoms, medication, injection, treatment and questions Pre-existing conditions Type of medical kit, names/qtty of medication onboard Ships position Port of call</p> <p><i>* the <u>GMDSS equipment</u> can be replaced with any available radio</i></p>			



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				<i>equipment that can capture the particular KUP.</i>				
	.5 use of the International Code of Signals and the IMO Standard Marine Communication Phrases		Correctness of messages relevant to the safety and security of the ship and persons on board and protection of the marine environment are constructed in English language	Use Standard Marine Communication Phrases (SMCP) properly Use International Code of Signals effectively	Rubrics	Practical simulator & Theoretical Examination	Operational	
	.6 the English language both written and spoken, for the communication of information relevant to the safety of life at sea			Speak English language clearly Apply marine vocabulary	Rubrics	Practical simulator & Theoretical Examination	Operational	
C2	Provide radio services in emergencies	C2.1 The provision of radio services in emergencies such as: .1 abandon ship	At the end of the assessment, the candidate must be able to:	Efficient and effective response in emergencies using radio communication s are provided	Operate the <u>INMARSAT C equipment</u> effectively and efficiently following the procedure below: • Click INMARSAT C EQUIPMENT	Checklist	Practical simulator & Theoretical Examination	Operational



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			<p>provide radio services in emergencies during abandon ship, fire onboard and in partial or full breakdown of radio installations.</p>	<ul style="list-style-type: none"> • Switch ON • Switch ON Printer equipment • Click on Message • Click NEW, then • select NEW DISTRESS MESSAGE • Construct Distress message: <p>MAYDAY THIS IS MV _____ Call sign _____ MMSI _____ MAYDAY MMSI _____, MV _____, Call sign _____</p> <p>POSITION (Vessel's position) AT (Time in UTC) Type of accident: <u>(ABANDONSHIP)</u> IMMEDIATE ASSISTANCE REQUIRED No. of Crew:24 Good weather and visibility</p> <ul style="list-style-type: none"> • Click SEND • Select LES Santa Paula 			



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					<ul style="list-style-type: none"> Click SEND <p><i>* the GMDSS equipment can be replaced with any available radio equipment that can capture the particular KUP.</i></p>			
		.2 fire on board ship		Efficient and effective response in emergencies using radio communications are provided	<p>Operate the <u>MF/HF DSC equipment</u> effectively and efficiently following the procedure below:</p> <ul style="list-style-type: none"> Click HF DSC equipment Select ALERT Select Nature of Distress (Fire and Explosion) Select DSC channel (8414.5KHz) LIFT the lid of distress button PUSH distress button for 3 secs <p><i>* the GMDSS equipment can be replaced with any available radio equipment that can capture the particular KUP.</i></p>	Checklist	Practical simulator & Theoretical Examination	Operational



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		.3 partial or full breakdown of radio installations	Efficient and effective response in emergencies using radio communications are provided	Operate <u>portable VHF equipment</u> effectively and efficiently following the procedure as follows: <ul style="list-style-type: none"> • Click on VHF PORTABLE • Switch ON the equipment • Broadcast the message MAYDAY, MAYDAY, MAYDAY, THIS IS MOTOR VESSEL _____, _____, _____ Call sign _____ MMSI _____ MAYDAY MOTOR VESSEL _____ Call sign _____ MMSI _____ Position Latitude ____ Degrees ____ Minutes ____ North Longitude ____ Degrees ____ Minutes West Nature of distress (<u>ABANDONSHIP</u>) I Need Immediate assistance No. of crew: 24 Over.	Checklist	Practical simulator & Theoretical Examination	Operational



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				* the <u>GMDSS equipment</u> can be replaced with any available radio equipment that can capture the particular KUP.			
	(Broadcasting)			Use Standard Marine Communication Phrases (SMCP) properly Use International Code of Signals effectively Speak English language clearly Apply marine vocabulary	Rubrics	Practical simulator & Theoretical Examination	Operational
	C2.2 Preventive measures for the safety of the ship and personnel in connection with hazards related to radio equipment, including non-ionizing radiation hazards	This KUP is demonstrated if the candidate has successfully passed the theoretical examination in the MARINA Competency Assessment System under Competence 2, KUP .2 – Preventive measures for the safety of the ship and personnel in connection with hazards related to radio equipment, including non-ionizing radiation hazards.					