



**National Communications authority
Federal Republic of Somalia**

Guidelines for Maritime Radio Spectrum Licenses

19 January 2021

1 INTRODUCTION

Maritime equipment is required to support the safe navigation of vessels and to make distress calls from coast stations/vessels in emergency situations. It enables communication between vessels and coast stations, port / harbour authorities and with other vessels as well. Available maritime radio station licenses are classified as follows:

- a) Ship Radio Station
 - i) Ship Radio Station (SOLAS)
 - ii) Ship Radio Stations (Non-SOLAS)
 - iii) Ship Radio Station (Portable)
- b) Maritime Navigational Aids and Radar Radio Station
- c) Coastal Radio station
 - i) International coastal station
 - ii) Somali-only coastal station
 - iii) Coastal Station Radio (Training School)

The sections below detail the licensing requirement and technical parameters relating to each licensing category. Annex A to these guidelines provides the templates of the licenses alongwith the specific terms and conditions and technical schedule(s).

2. SUMMARY OF LICENSEE'S RESPONSIBILITIES

Licensees of all categories of Maritime Radio Station licences are generally responsible to ensure that:

- i) equipment is deployed, operated and maintained to meet the regulations and the terms of the license and to prevent undue interference
- ii) relevant operational staff of the licensee are trained and certified by the licensee to be competent to undertake their roles
- iii) records of the systems included within the license are maintained, which shall be made available to NCA for inspection on request
- iv) the license is current and renewed in a timely manner
- v) the connection of any coastal station with any fixed or mobile telecommunications networks or with any other private telecommunications network is allowed provided that the licensee holds a separate individual or a class license for the same.

3. SHIP RADIO STATION LICENSES

This section provides information on the technical considerations for the issuing of ship radio station licenses. There are three sub- categories of this license:

Ship Radio Station (SOLAS): This license is issued to vessels having more than 300 GT, and sailing in regional and international waters, which are required as per the SOLAS convention to carry GMDSS equipment. These include the vessels registered in the Somalia and the vessels registered by other administrations that are visiting Somalia to operate for more than 3 months.

Owners of the SOLAS Vessels are required to register their vessels on the ITU Maritime mobile Access and Retrieval System (MARS) database and should complete the MARS section of the application form provided in the **Annex C**. The data that is registered on the MARS database can only be submitted to ITU through the administration having jurisdiction over the station concerned i.e. NCA.

Ship radio Station (Non-SOLAS): This license is issued to vessels having less than 300 GT, and sailing only in national waters, which are not required as per the SOLAS convention to carry GMDSS equipment. These include the vessels registered in the Somalia and the vessels registered by other administrations that are visiting Somalia to operate for more than 3 months.

Ship Radio Station (Portable) license: This license is issued for operation of portable VHF or VHF/DSC radio transceiver equipment, which is not designed to be permanently installed on a vessel, and which may be used on a number of different vessels. This license is usually available for operating portable radio over fleet of non-SOLAS vessels **within sea Area A1.**

3.1 Overview

The ship radio station (SOLAS) license covers the following equipment that may be used on-board a SOLAS vessel:

- I. Digital Selective Calling (DSC) equipment associated with the Global Maritime Distress & Safety System (GMDSS), including hand held VHF DSC radio.
- II. Mobile maritime communications equipment operating in HF, MF and VHF bands including handheld Radios
- III. Satellite communications equipment (Ship Earth Stations).
- IV. Radar and Search and Rescue Radar Transponders (SARTs).
- V. Low powered, on-board maritime UHF communications equipment.
- VI. 406 MHz and 1.6 GHz Emergency Position Indicating Radio Beacons (EPIRBs)

For Non- SOLAS option the following equipment may be used on-board the vessel:

- I. VHF maritime Mobile communication equipment.
- II. Digital Selective Calling (DSC) equipment associated with the Global Maritime Distress & Safety System (GMDSS).
- III. Radar and Search and Rescue Transponders (SARTs).
- IV. 406 MHz and 1.6 GHz Emergency Position Indicating Radio Beacons (EPIRBs)

For Portable option, operation of one or more handheld portable VHF or VHF/DSC radio transceiver equipment is allowed that will not be permanently installed on a vessel, and hence may be used on a number of different vessels. Equipment operation on land under this license is not allowed.

All equipment on board a ship will be covered by the ship radio station license including equipment that is on-board a survival craft of the ship.

3.2 Global Mobile Distress and Safety System (GMDSS)

All vessels sailing in international waters are required to carry certain radio equipment in order to ensure the safety of life at sea. As per the international SOLAS convention of which Somalia is a signatory besides other countries, SOLAS vessels are required to fulfil the GMDSS equipment carriage requirements. The Global Mobile Distress and Safety System (GMDSS) is an internationally agreed set of safety procedures, types of equipment, and communication protocols which are used to increase safety and make it easier to rescue distressed ships, boats and aircraft.

The GMDSS equipment is intended to enable and support:

- alerting of a distress condition, (including position),
- search and rescue,
- maritime safety information and
- general communications

GMDSS requirements depend upon the ship's sea areas of operation, and the type of vessel. Non-SOLAS vessels such as recreational vessels do not need to comply with GMDSS radio requirements, but will typically use DSC VHF radios. Vessels under 300 gross tonnage are not subject to GMDSS requirements.

GMDSS services are available by sea areas, which define the radio equipment that GMDSS ships must carry.

The GMDSS equipment requirements (including duplication of equipment) for all passenger ships as well as cargo ships of 300 gross tonnage and upwards on international voyages are detailed in the table below:

Table 1. Equipment requirements for SOLAS ships – by sea area

Equipment	A1	A2	A3 Inmarsat solution	A3 HF solution	A4
VHF with DSC	X	X	X	X	X
DSC watch receiver channel 70	X	X	X	X	X
MF telephony with MF DSC		X	X		
DSC watch receiver MF 2187,5 kHz		X	X		
Inmarsat ship earth station with EGC receiver			X		
MF/HF telephony with DSC and NBDP				X	X
DSC watch receiver MF/HF				X	X
Duplicated VHF with DSC			X	X	X
Duplicated Inmarsat SES			X	X	
Duplicated MF/HF telephony with DSC and NBDP					X
NAVTEX receiver 518 kHz	X	X	X	X	X
EGC receiver	X (Note 1)	X (Note 1)	X	X	X
Float-free satellite EPIRB	X	X	X	X	X(Note 4)
Radar transponder (SART)	X (Note 2)	X (Note 2)	X(Note 2)	X(Note 2)	X(Note 2)
Hand held GMDSS VHF transceivers	X (Note 3)	X (Note 3)	X(Note 3)	X(Note 3)	X(Note 3)
“Distress panel” (SOLAS chapter IV/6.4 and 6.6)	X	X	X	X	X
Automatic updating of position to all relevant radio communication equipment.	X	X	X	X	X
Two-way-on-scene radiocommunication on 121,5 or 123,1 MHz from the navigating bridge.(SOLAS chapter IV/7.5)	X	X	X	X	X

Notes:

- 1) Outside NAVTEX coverage area.
- 2) Cargo ships between 300 and 500 gt.: 1 set. Cargo ships of 500 gt. and upwards and passenger ships: 2 sets.
- 3) Cargo ships between 300 and 500 gt.: 2 sets. Cargo ships of 500 gt. and upwards and passenger ships: 3 sets.
- 4) Inmarsat E-EPIRB cannot be utilized in sea area A4.

3.3 MARS

The Maritime Mobile Access and Retrieval System (MARS) database is an ITU initiative that provides a resource to support safety and tracking services in the maritime sector, particularly to support search and rescue. The database holds information on:

- Ship stations (including those that participate in the Global Maritime Distress and Safety System (GMDSS))
- Coast stations
- Addresses of Accounting Authorities
- Addresses of administrations which notify information
- MMSI assigned to Search and Rescue (SAR) aircraft
- MMSI assigned to AIS Aids to Navigation (AtoN).

To ensure the safety of life at sea, NCA supports this ITU initiative. Hence, applicants for Ship Radio Station (SOLAS) licenses are mandated to register their vessels on the ITU MARS database. Applicants with non-SOLAS vessels are not mandated to comply with this requirement however, they may also request to register their vessels on the MARS database. Please note that the data to be registered on the MARS database can only be submitted to ITU through the administration having jurisdiction over the vessel concerned i.e. NCA.

3.4 Eligibility criteria

Eligible persons who may apply for Ship Radio Station Licenses are:

- I) An Owner or an authorised representative of a vessel registered in Somalia
- II) An owner or an authorised representative of a vessel registered in another country or state, which will operate in Somalia waters under the sponsorship of a local registered company for more than 3 months.

The Ship Radio Station (Portable) license is only available for Somalia registered vessels.

3.5 Summary of Licensee's responsibilities

Holders of ship station licenses are required to hold a marine radio operator's certificate of proficiency issued by a recognized Somali training and certification agency or any of the internationally recognized organizations to operate a radio on board any type of SOLAS vessel. Additionally Operation of Maritime radio equipment in Somalia require a call sign and an MMSI for identification purposes.

The licensees are also required to settle accounts with the Somali registered maritime accounting authorities regarding telecommunications charges for non-emergency radio telephone and telex calls from ships into the international subscriber networks, which facilitate the effective collection and distribution of telecommunications charges for these services. Radio operators under Ship Radio Station (Non-SOLAS) license do not require to hold radio operator's certificate of proficiency.

3.6 Technical details

The table below provides information on the applicable frequency band(s) and associated technical details for equipment licensed under ship Radio station licenses:

Table 2. Ship Stations – technical details

National usage	Licenses Required	Frequency bands	Standards/References	Channelling/modulation	Transmit power limit
MF and HF Maritime mobile communications including DSC	Ship Radio Station (SOLAS)	415 kHz – 27.5 MHz	e.g. ETSI EN 300373, EN 300338, EN 300067	Most frequencies are Duplex and intended for ship to shore use. Some bands do have simplex channels which can be used for either ship to shore or inter-ship working. SSB is for telephony transmission and reception (J3E). FSK or SSB of keyed sub-carrier is used for DSC in accordance with ITU-R M.493-13 (EN 300 373).	Below 4MHz 400 Watts; 4 MHz – 27.5 MHz 1500 Watts

VHF maritime mobile communications (including DSC)	Ship Radio Station (SOLAS) Ship Radio Station (non SOLAS)	156 – 163 MHz	e.g. ETSI EN 300 162, EN 301 025	Channel Plan and parameters shall be in accordance with the relevant sections of the ITU Radio Regulations Articles 5, 19, 30-33, 50-54, 57-58, Appendices 13-16, and Appendix 18.	25 Watts
Radar for radionavigation (Note 1)	Ship Radio Station (SOLAS) Ship Radio Station (non SOLAS) (Only in sea Area A1)	2900-3100 MHz 5460-5650 MHz 9200-9500 MHz	ITU-R M.1313 IEC 62252, IEC 62388	IEC 62388	100 Watts
VHF Portable mobile communications (including optional associated equipment for class D DSC) (Note 2)	Ship Radio Station (SOLAS) Ship Radio Station (non SOLAS) Ship Radio Station (portable)	156 – 163 MHz	e.g. ETSI EN 301178	Channel Plan and parameters shall be in accordance with the relevant sections of the ITU Radio Regulations Articles 5, 19, 30-33, 50-54, 57-58, Appendices 13-16, and App	5 Watts
AIS in VHF band	Ship Radio Station (SOLAS) Ship Radio Station (non SOLAS)	156 – 163 MHz	The equipment shall be in accordance with Rec. ITU-R M.1371	Channel Plan and parameters shall be in accordance with the relevant sections of the ITU Radio Regulations Articles 5, 19, 30-33, 50-54, 57-58, Appendices 13-16, and Appendix 18.	12.5 Watts maximum carrier power
UHF on-board mobile communications	Ship Radio Station (SOLAS)	457.515 – 467.5875 MHz	ITU-R M.1174	25 kHz or 12.5 kHz channel spacing	2 Watts
Radar Transponder	Ship Radio Station (SOLAS) Ship Radio Station (non SOLAS)	9.3 – 9.5 GHz (Note 3)	ETSI EN302248, IEC 62252, IEC 62388, ITU-R SM. 329 and SM. 1541	PON modulation	80 dBW peak equivalent isotropically radiated power

Note 1: The SOLAS convention requires all ships of 3000 gross tonnage and upwards to have 3 GHz radar or, if required by Somalia, separate 9 GHz radar.

Note 2: VHF Portable DSC equipment is not allowed under Ship Radio (SOLAS) or ship Radio (non-SOLAS) station licenses.

Note 3: Radars which are not capable of triggering Search and Rescue Transponders (SARTs) or Radar Beacons (Racons) although permitted for use on non-SOLAS vessels such as pleasure vessels are not permitted for use on SOLAS vessels.

In respect of satellite earth stations on board SOLAS vessels the following will apply:

National usage	Frequency bands	Standard/ reference	Transmit power limit
Earth Station on board vessels	14.00-14.5 GHz (Uplink) ⁴	ITU-R Resolution 902 ⁵	16.3 dBW (towards the horizon)
	29.5-30 GHz (Uplink)	ECC Decision (13) 01 ⁶	55-60 dBW (from Earth station Equipment)
Transportable Earth Stations on board vessels (used for GMDSS)	5 925-6 425 MHz (uplink)	ITU-R Resolution 902 ⁴	20.8 dBW (towards the horizon)
Satellite EPIRB	1 644.3-1 644.5 MHz & 1 645.5-1 646.5 MHz ⁷	ITU-R Recommendation M.632-3	0 dBW (with tolerance + 2 to -3 dB)

3.7 Operational requirements

Relevant operator qualifications are required to use any combination of the maritime radio equipment installed on SOLAS vessels.

A qualification may be obtained from any accredited training provider in Somalia or abroad.

It should also be noted that under ITU Radio Regulations, Article S47, administrations may inspect the Ship Radio Station license and the radio operator's qualifications. Licenses and operator qualifications should therefore be carried on Somalia or foreign registered vessels at all times.

4. NAVIGATIONAL AIDS AND RADAR STATION LICENSE

This section provides information on the technical considerations for the issuing of licenses for following Maritime Navigational Aids and Radar equipment:

a) DGPS (Differential Global Positioning System)

Differential Global Positioning System (DGPS) is used to provide more accurate position information provides an enhancement to GPS (Global Positioning System) and provides improved location accuracy to about 10 cm in the case of best implementations. DGPS uses a network of fixed, ground-based reference stations to broadcast the difference between the positions indicated by the satellite systems and their known fixed positions. These stations broadcast the difference between the measured satellite position and the actual position so that receiver stations can correct their positions by the same amount. The digital correction signal is typically broadcast locally over ground-based transmitters of shorter range.

b) Radar

Marine radars are usually used by ships for collision avoidance and navigation purposes and their use onboard ships is covered under the ship radio station licenses as discussed above.

Shore based radar (for example the one deployed at Vessel Traffic Centres) is used with automatic radar plotting aid (ARPA) capabilities and provides collision avoidance or traffic regulation of ships in the surveillance area.

⁴Transmission in the band 14.25 to 14.5 GHz (Earth to space) is allowed when more than 125 km from the coast of Somalia in accordance with ITU Resolution 902.

⁵Provisions relating to earth stations located on board vessels which operate in fixed-satellite service networks in the uplink bands 5 925-6 425 MHz and 14-14.5 GHz (WRC-03) [ITU Resolution 902].

⁶The harmonised use, free circulation and exemption from individual licensing of Earth Stations On Mobile Platforms (ESOMPs) within the frequency bands 17.3-20.2 GHz and 27.5-30.0 GHz [ECC Decision (13) 01].

⁷Transmission characteristics of a satellite emergency position-indicating radio beacon (satellite epirb) system operating through geostationary satellites in the 1.6 ghz band [ITU-R Recommendation M.632-3]

c) Beacons

Maritime beacons are used for navigation purposes. A radar beacon (racon) is a receiver/ transmitter device which when triggered by a radar, automatically returns a distinctive signal which provides information on the range, bearing and identification of the racon that can be displayed. Beacon devices may be mounted on fixed structures or on floating aids anchored at fixed positions for navigational purposes.

d) Ship Radar Target Enhancers

Radar target enhancers produce an amplified version of the received pulse to enhance visibility on radar screens

e) AIS (Automatic Identification System)

AIS is used for the safe navigation of vessels e.g. collision avoidance. This is a data system whereby ships transmit information relating to the vessel to other AIS stations repetitively and also on interrogation by other AIS stations, thereby making themselves known to other ships and shore stations. They also receive information from other ships and other AIS stations (shore stations etc.).

Shore stations transmit their own position information, including the MMSI and are able to interrogate ships and change the ships reporting rates for example, in response to commands sent.

The icons of the AIS stations in the vicinity are normally displayed on a live chart (e.g. on board ships and in the shore stations) with labels against each icon detailing information such as MMSI, position, speed over ground, etc thus enabling shore stations (including Ports) to monitor and control traffic and thus aiding ships in collision avoidance.

4.1 Eligibility criteria

Eligible persons who may apply for a license for Maritime Navigational Aids and Radar Station License:

- a) an authorised representative of the Government agency responsible for the Coast Guard operations
- b) an authorised representative of a Somali harbour or port authority, including contractors working in ports and are registered in Somalia.

4.2 Technical details

The technical requirements for the use of different types of navigational aids and radar equipment are as follows:

a) DGPS

The 400 MHz band in addition to Private Mobile Radio (PMR) has also been allocated for DGPS service. DGPS is used as navigational aid for vessels in maritime communication. Navigational aids license covers the deployment and operation of such a station in offshore/onshore locations.

b) Radar

There are various bands between 283.5MHz and 9500MHz frequency range allocated to the maritime radio navigational aids (navaids) , hence the technical parameters are decided on case by case basis.

c) Beacons

Radar beacons operate on frequencies between 9320 and 9500 MHz or 2900 and 3100 MHz. The technical requirements are given in the table below:

Table 3. Navigational Beacons – technical details

Frequency bands	2.9 – 3.1 GHz	9.3 – 9.5 GHz
Standards / References etc.	ITU-R M.824 IALA -1	ITU-R M.824
Channelling / modulation	QON modulation	QON modulation
Transmit power limit	50 W (17 dBW)	50 W (17 dBW)

d) Ship Radar Target Enhancers

Ship Radar Target Enhancers operate in the 2.9 to 3.1 GHz and 9.3 to 9.5 GHz bands and can operate at a maximum transmitter power of 10 W. In this regard, ITU-R M.1176 is followed.

e) AIS

The table below provides information on the technical requirements for shore-based AIS in the VHF band:

Table 4. AIS – technical details

Frequency band	161.975 MHz, 162.025 MHz
Channelling modulation	25 kHz channels using GMSK / FM modulation Only G2B(DSC) on 156.525 MHz
Maximum transmit power	12.5 Watt
Other essential requirements	The channels and parameters shall be in accordance with the relevant sections of the ITU Radio Regulations Articles 5, 19, 30-33, 50-54, 57-58, Appendices 13-16 and 18.
Equipment requirements	Equipment parameters should comply with ITU-R M.1371

f) Other Radionavigation Equipment

Other radio navigation systems may operate in the frequency bands noted below, in which case the following standards and criteria will apply:

Table 5. Other radionavigation – technical details

Frequency bands	Standards/References etc.	Channelling/modulation	Transmit power limit
283.5 – 315 kHz	ITU-R M.823 and ITU-R M.588	Channelling integer multiple of 500 Hz if transmitting GNSS differential correction signals	The radiated power shall be the minimum value necessary to give the desired field strength at the service range, not exceeding 50uV/m
156.513 – 156.537 MHz	ITU-R M.1371	GMSK / FM G2B (DSC) on 156.525 MHz 25 kHz	12.5 W
161.963 – 161.988 MHz	ITU-R M.1371	GMSK / FM 25 kHz	
162.013 – 162.037 MHz	ITU-R M.1371	GMSK / FM 25 kHz	12.5 W
162.437 – 162.462 MHz	N/A	12.5 kHz, FID, GID	25 W
163.0125 – 163.03125 MHz	N/A	12.5 kHz, FID, GID	25 W

5. COASTAL RADIO STATION LICENSE

This section provides information on the technical considerations for the issuing of licenses for Coastal Radio Stations. There are following different sub-categories of coastal radio station licenses available:

- a) **Coastal Station Radio (International).** This license authorises the use of maritime radio station to support mainly the port operations and ship movement services, where messages relate mainly to the operational handling, the movement and the safety of ships and, in an emergency to the safety of persons. Additionally provision of other services such as public correspondence, Facsimile, Data etc is allowed provided that the licensee holds an appropriate (individual or class) license. This license only covers the coast station whereas all vessels should be covered by their own ship radio station license. The frequencies are assigned from the internationally allocated set of frequencies.
- b) **Coastal Station Radio (Private).** This license is available to allow organisations such as fishing vessel fleet operators, marinas and yacht clubs etc. to communicate with their vessels on commercial matters using individually assigned maritime channels. The channels assigned to this service are national maritime mobile channels rather than international channels and hence there is no requirements for users to hold a Maritime Radio Operator's Certificate and Authority to Operate. The license covers the base stations and any number of associated mobiles used from vessels. Individual vessels need not to hold both a ship radio station license and radio operator's certificate of proficiency, unless they are fitted with a radio which uses international maritime mobile channels.
- c) **Coastal Station Radio (Training School).** The Coastal Station Radio (Training School) license authorises the installation and use of a maritime radio base station on land for the purpose of training and examination of maritime radio operators. It should be noted that the equipment can be only used indoors and transmissions must not radiate beyond the walls of the building in which it is being used.

5.1 Eligibility criteria

The applicants for each category of coastal station license must meet the criteria listed below:

- a) International: An organizations or its authorised nominee operating port, harbour or Oil and Gas offshore platform in Somalia.
- b) Private: An organisation or its authorised nominee whose business is registered in Somalia, and which has a valid reason to communicate from a fixed land base station location with its associated vessels.
- c) Training School: a business registered in Somalia whose business concerns training in maritime radio services

5.2 Technical details

Technical requirements for the use of different types of Coast Station radio equipment are as follows:

Table 6. Coastal station radio – technical details

Frequency bands	MF/HF bands: 415 – 27500 kHz	VHF band: 156 – 163 MHz
Standards/References etc.	EN 300 373, EN 300 338 and EN 300 067	EN 301 929, EN 300 338 and EN 300 086
Channelling/modulation	The channel plan, parameters, classes of emission and operation must be in accordance with the relevant sections of the ITU Radio Regulations Articles 5, 19, 30 – 34, 50 – 58, Appendices 13-15, Appendix 17 and Appendix 25. Channels not licensed should be disabled.	For international channels in accordance with ITU Radio Regulations Appendix 18: with 25 kHz channel spacings. For non-international channels: 25 kHz, 12.5 kHz and 6.25 kHz channel spacings are permitted subject to equipment availability.
Transmit power limit	See information above	Maximum eirp of 25 W

Some of the channels used by coastal stations are identified for a specific purpose e.g.

- A) Ch 16 (156.80 MHz) & Ch 70 – reserved for DSC (156.525 MHz) are used for Distress, Safety and calling. Both channels are monitored by ships and coast guard stations.
- B) Ch 3, 6, 12, 13, 14 and 68 are assigned to the Government Organizations for port operations and ship movement services.
- C) Ch 10, Ch 23, Ch 84, Ch 86 are used for Maritime Safety Information (MSI) broadcasts.
- D) Ch 80 (157.025 MHz) is reserved for marinas.

6. IDENTIFICATION OF TRANSMISSION:

There are mainly two different methods used for the identification of transmission from shore or ship radio stations:

- a) Call Sign
- b) MMSI

Each method of identification is being explained in detail below:

6.1 Call Signs

The call sign uniquely identifies a vessel while establishing communications. The call sign remains with the vessel for the duration of its life regardless of changes of ownership or even vessel name. The call sign is surrendered if the vessel ceases to be classed as a Somali vessel or is lost or destroyed. Call signs cannot be transferred between vessels.

The approach adopted in Somalia is aligned with the ITU Radio Regulations. The call sign differentiates, through the call sign format, between different types of ships (SOLAS or non-SOLAS). All maritime call signs consist of the prefix which defines the geographic area (6OA and T5A for Somalia) and a suffix which is unique for the individual application as indicated by the Ministry of Ports and marine transport Somalia and Somali Maritime Administration.

6.1 MMSI

A Maritime Mobile Service Identity (MMSI) number is used to uniquely identify a ship station, coast station, ship and coastal earth stations, group call, search and rescue, and navigational aids (e.g. AIS).

The MMSI is issued by NCA, which is also notified to ITU. MMSI database is also made available to the national Coastguard authorities to assist in their Search and Rescue operations.

ANNEX A: LICENSE TEMPLATES AND TERMS & CONDITIONS



**National Communications authority
Federal Republic of Somalia**

LICENSE

For the Provision of

Ship Radio Station (SOLAS) license

Issued by:

National Communications Authority (NCA)

Issued to:

[Company Name]

13th January, 2021

License Number: **NCA-XXXX/2021**

LICENSE

For the Provision of

Ship Radio Station (SOLAS) license

WHEREAS [**Company Name**] requested authorization to provide Ship Radio Station Services in Somalia under the authority of the National Communications Authority (NCA).

AND WHEREAS, in accordance with mandate and the policy of the Ministry of Post, Telecommunications & Technology, the National Communications Authority, with principal responsibility for Radio Spectrum Licensing, **MAY GRANT** a Ship Radio Station license.

NOW, THEREFORE, by Article 41 of Communication Act of October 02, 2017 and pursuant to section 2 of its regulations, the National Communications Authority hereby grants a Ship Radio Station license [**Company Name**]

The [**Company Name**] is hereby authorized to establish, install and operate a Ship Radio Station in Somalia for the specified term of this License and subject to the provisions of the Spectrum Regulations and the License terms and conditions overleaf.

Call Sign:

MMSI:

Dated: 13 January 2021

Specific Terms & Conditions

1. Scope

- 1.1 The terms and conditions authorises the Licensee to establish, install and use following radio transmitting and receiving equipment on-board the SOLAS vessel in sea area A1 and beyond:
- a) DSC equipment associated with the GMDSS;
 - b) Mobile maritime communications equipment operating in HF, MF and VHF bands;
 - c) Satellite communications equipment including EPIRB
 - d) Radar and SART
 - e) Low powered, on-board maritime UHF communications equipment.
 - f) Automatic identification System
- 1.2 The license covers all equipment on board the vessel including equipment that is in a survival craft of the vessel.

2. Equipment operation

- 2.1 The licensee shall ensure that:
- a) the equipment on-board is only used by persons authorised by the licensee. In the event of an emergency where there is a risk to life, the equipment may be used by any person.
 - b) a marine radio operator's certificate of proficiency, issued from a local or an internationally recognized authority, is held by any person who operates the radio equipment on board.
 - c) before transmitting on a frequency, the frequency is not in use by monitoring, except for transmission of signals of distress.
 - d) when a radio communication causes interference to a communication already in progress, the interfering station must cease transmission at the request of communicating party, except for transmission of signals of distress.
 - e) except in cases of distress, communications between ship stations or between ship stations and aircraft stations must not interfere with public coast stations. The ship station which causes interference must stop transmitting or change frequency upon the first request of the affected coast station.

3. Identification of Transmission:

- 3.1 The Licensee shall use one of the following methods of identification for all transmissions:
- (a) the vessel call sign indicated in the license;
 - (b) an MMSI indicated in the license;
 - (c) the vessel name, vessel owner, vessel registration number or port of registry;
 - (d) For survival craft station with a reference to its parent vessel, no identification is required for automatically transmitted distress signals. Transmissions other than distress or emergency signals must be identified by the call sign of the parent vessel followed by two digits (other than the digits 0 or 1 in cases where they immediately follow a letter).
- 3.2 The call sign / MMSI shall remain with the vessel, and shall be surrendered on the sale, change of flag, transfer, destruction or loss of the vessel.

4. Technical conditions

- 4.1 the equipment categories covered by the ship station license shall operate within the frequency bands and with the transmitter power limits specified in the table below:

National usage	Frequency bands	Transmit power limit
MF and HF mobile communications	415 kHz – 27.5 MHz	Below 4MHz 400 Watts; 4 MHz – 27.5 MHz 1500 Watts
VHF mobile communications	156 – 163 MHz	25 Watts
VHF portable mobile communications	156 – 163 MHz	5 Watts
SART	9.3 – 9.5 GHz	80 dBW peak (EIRP)
Radar	2900-3100 MHz 5460-5650 MHz 9200-9500 MHz	100 kW
Automatic Identification System	156 – 163 MHz	12.5 Watts
UHF on-board mobile communications	457.515 – 467.5875 MHz	2 Watts
ESoV	14.00-14.5 GHz (Uplink)	16.3 dBW (towards the horizon)
	29.5-30 GHz (Uplink)	55-60 dBW (from Earth station Equipment)
Mobile Satellite Terminals (used for GMDSS)	1626.5 – 1645.5 MHz (Uplink)	1626.5 – 1645.5 MHz (Uplink)
Satellite EPIRB	1 644.3-1 644.5 MHz & 1 645.5-1 646.5 MHz	0 dBW (with tolerance + 2 to -3 dB)

4.2 ESoV terminals may transmit in the band 14.25 to 14.5 GHz when 125 km away from the coast of Somalia.

5. Definitions

- a) **AIS:** Automatic Identification System (AIS) is an automatic tracking system used on ships and by vessel traffic services for identifying and locating vessels by electronically exchanging data with other nearby ships, AIS base stations, and satellites
- b) **DSC:** Digital selective calling (DSC) is primarily intended to initiate calls and is used in conjunction with MF / HF and VHF calls. DSC distress alerts, which consist of a preformatted distress message, are used to initiate emergency communications with ships and rescue coordination centers.
- c) **ESESoV:** Earth Station on-board vessel (ESoV) is the earth station mounted on-board the vessel.
- d) **EPIRB:** EPIRB (Emergency Position-Indicating Radio Beacon) is a tracking transmitter which aid in the detection and location of boats, aircraft, and people in distress.
- e) **Frequency Band:** a contiguous block of the radio spectrum which starts at a frequency and ends at another
- f) **GMDSS:** The Global Maritime Distress and Safety System (GMDSS) is an internationally agreed-upon set of safety procedures, types of equipment, and communication protocols used to increase safety and make it easier to rescue distressed ships, boats and aircraft.
- g) **License:** The permission issued by the General Manager NCA to an individual or class of individuals to own or operate a telecommunications network, provide telecommunications services, or use radio frequency spectrum and it does not constitute a contract or bilateral agreement.
- h) **Licensee:** A person who holds a License pursuant to the provisions of the Telecom Law and the executive by-law.



LICENSE

For the Provision of

Ship Radio Station (non-SOLAS) license

Issued by:

National Communications Authority (NCA)

Issued to:

[Company Name]

13th January, 2021

License Number: **NCA-XXXX/2021**

LICENSE

For the Provision of

Ship Radio Station (non-SOLAS) license

WHEREAS [**Company Name**] requested authorization to provide Ship Radio Station (non-SOLAS) Services in Somalia under the authority of the National Communications Authority (NCA).

AND WHEREAS, in accordance with mandate and the policy of the Ministry of Post, Telecommunications & Technology, the National Communications Authority, with principal responsibility for Radio Spectrum Licensing, **MAY GRANT** a Ship Radio Station (non-SOLAS) Station license.

NOW, THEREFORE, by Article 41 of Communication Act of October 02, 2017 and pursuant to section 2 of its regulations, the National Communications Authority hereby grants a Ship Radio Station (non-SOLAS) Station license [**Company Name**]

The [**Company Name**] is hereby authorized to establish, install and operate a Ship Radio Station (non-SOLAS) Station in Somalia for the specified term of this License and subject to the provisions of the Spectrum Regulations and the License terms and conditions overleaf.

Call Sign:

MMSI:

Dated: 13 January 2021

Specific Terms & Conditions

1. Scope

1.1 The license authorises the Licensee to establish, install and use following radio transmitting and receiving equipment on-board the non-SOLAS vessel within sea Area A1 only:

- a) Mobile maritime communications equipment operating in VHF bands;
- b) DSC equipment associated with the GMDSS;
- c) SART
- d) Automatic identification System

2. Equipment operation

2.1 The licensee shall ensure that:

- a) the equipment on-board is only used by persons authorised by the licensee. In the event of an emergency where there is a risk to life, the equipment may be used by any person.
- b) before transmitting on a frequency, the frequency is not in use by monitoring, except for transmission of signals of distress.
- c) when a radio communication causes interference to a communication already in progress, the interfering station must cease transmission at the request of communicating party, except for transmission of signals of distress.
- d) except in cases of distress, communications between ship stations or between ship stations and aircraft stations must not interfere with public coast stations. The ship station which causes interference must stop transmitting or change frequency upon the first request of the affected coast station.

3. Identification of Transmission:

3.1 The Radio user shall use one of the following methods of identification for all transmissions:

- (a) the vessel call sign indicated in the license;
- (b) an MMSI indicated in the license;
- (c) the vessel name, vessel owner, vessel registration number or port of registry;

3.2 The call sign / MMSI shall remain with the vessel, and shall be surrendered on the sale, change of flag, transfer, destruction or loss of the vessel.

4. Technical conditions

4.1 the equipment categories covered by the ship station license shall operate within the frequency bands and with the transmitter power limits specified in the table below:

National usage	Frequency bands	Transmit power limit
VHF mobile communications	156 – 163 MHz	25 Watts
VHF portable mobile communications	156 – 163 MHz	5 Watts
SART	9.3 – 9.5 GHz	80 dBW peak (EIRP)
Automatic Identification System	156 – 163 MHz	12.5 Watts



**National Communications authority
Federal Republic of Somalia**

LICENSE

For the Provision of

Ship Radio Station (Portable) license

Issued by:

National Communications Authority (NCA)

Issued to:

[Company Name]

13th January, 2021

License Number: **NCA-XXXX/2021**

LICENSE

For the Provision of

Ship Radio Station (Portable) License

WHEREAS [**Company Name**] requested authorization to provide Ship Radio Station (Portable) Services in Somalia under the authority of the National Communications Authority (NCA).

AND WHEREAS, in accordance with mandate and the policy of the Ministry of Post, Telecommunications & Technology, the National Communications Authority, with principal responsibility for Radio Spectrum Licensing, **MAY GRANT** a Ship Radio Station (Portable) license.

NOW, THEREFORE, by Article 41 of Communication Act of October 02, 2017 and pursuant to section 2 of its regulations, the National Communications Authority hereby grants Ship Radio Station (Portable) license [**Company Name**]

The [**Company Name**] is hereby authorized to establish, install and operate a Ship Radio Station (Portable) Station in Somalia for the specified term of this License and subject to the provisions of the Spectrum Regulations and the License terms and conditions overleaf.

Call Sign:

MMSI:

Dated: 13 January 2021

Specific Terms & Conditions

1. Scope

1.1 This license authorises the licensee to use a handheld portable VHF radio transmitting and receiving equipment which is not designed to be permanently installed on a vessel and which may be used on a number of different vessels within sea area A1 only.

2. Equipment operation

2.1 The licensee shall ensure that:

- a) the equipment on-board is only used by persons authorised by the licensee. In the event of an emergency where there is a risk to life, the equipment may be used by any person.
- b) a marine radio operator's certificate of proficiency, issued from an internationally recognized local or foreign authority, is held by any person who operates the radio station on board the vessel
- c) before transmitting on a frequency, the frequency is not in use by monitoring, except for transmission of signals of distress.
- d) when a radio communication causes interference to a communication already in progress, the interfering station must cease transmission at the request of communicating party, except for transmission of signals of distress.
- e) except in cases of distress, communications between ship stations or between ship stations and aircraft stations must not interfere with public coast stations. The ship station which causes interference must stop transmitting or change frequency upon the first request of the affected coast station.
- f) the equipment shall not be used on land.

3. Identification of Transmission:

3.1 The Radio user shall use one of the following methods of identification for all transmissions:

- (d) the vessel call sign indicated in the license;
- (e) an MMSI indicated in the license;
- (f) the vessel name, vessel owner, vessel registration number or port of registry;

4. Technical conditions

4.1 the equipment categories covered by the ship station license shall operate within the frequency bands and with the transmitter power limits specified in the table below:

National usage	Frequency bands	Transmit power limit
VHF Portable mobile communications	156 – 163 MHz	25 Watts

5. Definitions

- a) **DSC:** Digital selective calling (DSC) is primarily intended to initiate calls and is used in conjunction with MF / HF and VHF calls. DSC distress alerts, which consist of a preformatted distress message, are used to initiate emergency communications with ships and rescue coordination centers.
- b) **Frequency Band:** a contiguous block of the radio spectrum which starts at a frequency and ends at another

- c) **License:** The permission issued by the General Manager NCA to an individual or class of individuals to own or operate a telecommunications network, provide telecommunications services, or use radio frequency spectrum and it does not constitute a contract or bilateral agreement.
- d) **Licensee:** A person who holds a License pursuant to the provisions of the Communications Law and the executive by-law.
- e) **MMSI:** Maritime Mobile Service Identity (MMSI) is nine digit ID which is sent in digital format over a radio frequency channel in order to uniquely identify ship stations, ship earth stations, coast stations, coast earth stations, and group calls.
- f) **Sea Area A1:** Territorial sea limits till 22kms (12 nautical miles) from shore.

6. List of Maritime Portable Radio Equipment

This list forms part of the ship radio station (non-SOLAS) License XXXX issued to XXXX, the Licensee on [Date]

Number of Equipment	Equipment Model	Number of Equipment	Equipment Model



**National Communications authority
Federal Republic of Somalia**

LICENSE

For the Provision of

Maritime Navigational Aids and Radar Station License

Issued by:

National Communications Authority (NCA)

Issued to:

[Company Name]

13th January, 2021

License Number: **NCA-XXXX/2021**

LICENSE

For the Provision of

Maritime Navigational Aids and Radar Station License

WHEREAS [**Company Name**] requested authorization to provide Maritime Navigational Aids and Radar Station Services in Somalia under the authority of the National Communications Authority (NCA).

AND WHEREAS, in accordance with mandate and the policy of the Ministry of Post, Telecommunications & Technology, the National Communications Authority, with principal responsibility for Radio Spectrum Licensing, **MAY GRANT** a Maritime Navigational Aids and Radar Station license.

NOW, THEREFORE, by Article 41 of Communication Act of October 02, 2017 and pursuant to section 2 of its regulations, the National Communications Authority hereby grants Maritime Navigational Aids and Radar Station license [**Company Name**]

The [**Company Name**] is hereby authorized to establish, install and operate a Maritime Navigational Aids and Radar Station in Somalia for the specified term of this License and subject to the provisions of the Spectrum Regulations and the License terms and conditions overleaf.

Call Sign:

MMSI:

Dated: 13 January 2021

Specific Terms & Conditions

1. Scope

1.1 These terms and conditions authorises the licensee to establish, install and use the following maritime navigational aids and radar equipment at any fixed onshore/offshore location in Somalia:

- a) DGPS
- b) Radar
- c) Radio beacon
- d) Radar Target Enhancer
- e) Automatic Identification System
- f) Other Navigation aid equipment

2. Equipment operation

2.1 Equipment operation

- a) the equipment on-board is only used by persons authorised by the licensee. In the event of an emergency where there is a risk to life, the equipment may be used by any person.
- b) the equipment is used for the purpose aiding the navigation and/or location of any Ship Station and only to send, receive or re-transmit a message or signal by automatic or non-automatic means in order to indicate to a ship station its position, velocity, or any other relating to this activity, including obstruction warning.
- c) land-to-land communications is not allowed unless in an emergency where there is risk of life or unless specifically allowed in the special conditions.

3. Identification of Transmission

3.1 The Licensee shall use MMSI for identification of transmission from the AIS stations.

4. Definitions

- a) **AIS:** Automatic Identification System (AIS) is an automatic tracking system used on ships and by vessel traffic services for identifying and locating vessels by electronically exchanging data with other nearby ships, AIS base stations, and satellites
- b) **DGPS:** Differential Global Positioning System (DGPS) is an enhancement to Global Positioning System that provides improved location accuracy.
- c) **Frequency Band:** a contiguous block of the radio spectrum which starts at a frequency and ends at another.
- d) **GMDSS:** The Global Maritime Distress and Safety System (GMDSS) is an internationally agreed-upon set of safety procedures, types of equipment, and communication protocols used to increase safety and make it easier to rescue distressed ships, boats and aircraft
- e) **License:** The permission issued by the General Manager to an individual or class of individuals to own or operate a telecommunications network, provide telecommunications services, or use radio frequency spectrum and it does not constitute a contract or bilateral agreement.
- f) **Licensee:** A person who holds a License pursuant to the provisions of the Communications Law and the executive by-law.
- g) **MMSI:** Maritime Mobile Service Identity (MMSI) is nine digit ID which is sent in digital format over a radio frequency channel in order to uniquely identify ship stations, ship earth stations, coast stations, coast earth stations, and group calls.
- h) **Radio Beacon:** A beacon device, which broadcasts a radio signal that is picked up by radio direction finding systems deployed on board ships.



**National Communications authority
Federal Republic of Somalia**

LICENSE

For the Provision of

Coastal Radio Station (International) License

Issued by:

National Communications Authority (NCA)

Issued to:

[Company Name]

13th January, 2021

License Number: **NCA-XXXX/2021**

LICENSE

For the Provision of

Coastal Radio Station (International) License

WHEREAS [**Company Name**] requested authorization to provide Coastal Radio Station (International) Services in Somalia under the authority of the National Communications Authority (NCA).

AND WHEREAS, in accordance with mandate and the policy of the Ministry of Post, Telecommunications & Technology, the National Communications Authority, with principal responsibility for Radio Spectrum Licensing, **MAY GRANT** a Coastal Radio Station (International) License.

NOW, THEREFORE, by Article 41 of Communication Act of October 02, 2017 and pursuant to section 2 of its regulations, the National Communications Authority hereby grants Coastal Radio Station (International) license [**Company Name**]

The [**Company Name**] is hereby authorized to establish, install and work Coastal Radio Station (International) in Somalia for the specified term of this License and subject to the provisions of the Spectrum Regulations and the License terms and conditions overleaf.

Call Sign:

MMSI:

Dated: 13 January 2021

Specific Terms & Conditions

1. Equipment operation

1.1 The licensee shall ensure that:

- a) the equipment is only used by persons authorised by the licensee. In the event of an emergency where there is a risk to life, the equipment may be used by any person.
- b) land-to-land communications is not allowed unless in an emergency where there is risk of life or unless specifically allowed in the special conditions.
- c) continuous transmissions are not allowed unless specifically allowed in the special conditions
- d) connection of any coastal station with any fixed or mobile telecommunications service networks or with any other private telecommunications network is not allowed unless a separate authorization is acquired from NCA.
- e) a marine radio operator's certificate of proficiency, issued from a local or an internationally recognized authority, is held by any person who operates the coastal station.

2. Identification of transmission:

2.1 The Radio user shall use one of the following methods of identification for all transmissions:

- a) the call sign of the coastal station
- b) MMSI of the coast station
- c) MMSI of the coast station

3. Definitions

3.1 License: The permission issued by the General Manager to an individual or class of individuals to own or operate a telecommunications network, provide telecommunications services, or use radio frequency spectrum and it does not constitute a contract or bilateral agreement

3.2 Licensee: A person who holds a License pursuant to the provisions of the Communications Law and the executive by-law.

3.3 MMSI: Maritime Mobile Service Identity (MMSI) is nine digit ID which is sent in digital format over a radio frequency channel in order to uniquely identify ship stations, ship earth stations, coast stations, coast earth stations, and group calls.

4. Technical Schedule (1)

This schedule forms part of the Coastal Station (International) License No. XXXX issued to XXXX, the Licensee on [Date].

Type of Coast Station	
Location (Lat & Long)	
Frequencies	
Manufacturer / Model	
Power(ERP) / Max permitted field strength	
Emission	



**National Communications authority
Federal Republic of Somalia**

LICENSE

For the Provision of

Coastal Radio Station (Private) License

Issued by:

National Communications Authority (NCA)

Issued to:

[Company Name]

13th January, 2021

License Number: **NCA-XXXX/2021**

LICENSE

For the Provision of

Coastal Radio Station (Private) License

WHEREAS [**Company Name**] requested authorization to provide Coastal Radio Station (Private) Services in Somalia under the authority of the National Communications Authority (NCA).

AND WHEREAS, in accordance with mandate and the policy of the Ministry of Post, Telecommunications & Technology, the National Communications Authority, with principal responsibility for Radio Spectrum Licensing, **MAY GRANT** a Coastal Radio Station (Private) License.

NOW, THEREFORE, by Article 41 of Communication Act of October 02, 2017 and pursuant to section 2 of its regulations, the National Communications Authority hereby grants Coastal Radio Station (Private) license [**Company Name**]

The [**Company Name**] is hereby authorized to establish, install and work Coastal Radio Station (Private) in Somalia for the specified term of this License and subject to the provisions of the Spectrum Regulations and the License terms and conditions overleaf.

Call Sign:

MMSI:

Dated: 13 January 2021

Specific Terms & Conditions

1. Equipment operation

1.1 The licensee shall ensure that:

- a) the equipment is only used by persons authorised by the licensee. In the event of an emergency where there is a risk to life, the equipment may be used by any person.
- b) land-to-land communications is not allowed unless in an emergency where there is risk of life or unless specifically allowed in the special conditions.
- c) connection of any coastal station with any fixed or mobile telecommunications service networks or with any other private telecommunications network is not allowed unless a separate authorization is acquired from NCA.
- d) communications are restricted to business use only.
- e) on receipt of messages not connected with the business of the Licensee, the Licensee or any person using the Radio Equipment shall not:
 - I) make known the contents of any such message, its origin or destination, its existence or the fact of its receipt to any person, except to a duly authorised government official, a person authorised by NCA or in the course of legal proceedings or for the purpose of any report thereof
 - II) retain any copy or make any use of any such message, or allow it to be reproduced in writing, copied or made use of.

2. Definitions

2.1 License: The permission issued by the General Manager to an individual or class of individuals to own or operate a telecommunications network, provide telecommunications services, or use radio frequency spectrum and it does not constitute a contract or bilateral agreement

2.2 Licensee: A person who holds a License pursuant to the provisions of the Communications Law and the executive by-law.

3. Technical Schedule (1)

This schedule forms part of the Coastal Station (International) License No. XXXX issued to XXXX, the Licensee on [Date].

Location (Lat & Long)	
Frequencies	
Manufacturer / Model	
Power(ERP) / Max permitted field strength	
Emission	
Ship Radio Station License Numbers (for Associated Vessels)	

ANNEX B: APPLICATION PRECESSING PROCEDURE

The licensing process starts with the submission of a duly completed application form. Application forms should be available at <https://nca.gov.so/spectrum-licensing/> Generally speaking, all applicants for commercial licenses should meet the following conditions:

- Be registered and have a license in Somalia with the ministry of Ports and marine transport / Somalia as service provider Company.
- Have a duly registered office and permanent premises in Somalia,
- Provide company profile which provides detailed information of company shareholders and directors,

ANNEX C: APPLICATION FORM

Ref: __/__/__

Application Form for Maritime/Ship Station Radio License

1. Applicant details

Name / Company / Organisation:

Full address of the company HQ

Main Contact

Contact E-mail

Office Tel:

Position:

Mobile Tel:

ID/ Passport/ Company Registration Number:

PIN No:

2. for Companies,

Name/s of Director/s	Nationality	Nationality

3. PARTICULARS OF VESSEL

a) Name of Vessel: _____

b) Class of Vessel: Merchant ship : Fishing Pleasure Other

c) Vessel/Ship Registration Number/IMO No _____ Call Sign _____

d) Gross Tonnage _____

4. DECLARATION BY APPLICANT

I/We hereby declare that the information and particulars given by me/us in this form and in documents submitted are to the best of my/our knowledge true, correct and completed.

Name: _____ Designation _____

Signature of Applicant _____ Date _____

Contact Telephone _____

Official Stamp

5. ENDORSEMENT BY SOMALI MARITIME ADMINISTRATION

I. Radio Station Details

No.	Transmitters	Make/ Type	Type Approved (Yes/No)	Power (W)	Frequency Band (s)	Emission Designation
1						
2						
3						
4						

II. Recommended/ Not Recommended:

Name: _____ Designation _____

Signature _____ Date: _____

Official Stamp

Notes:

Recommended/ Not Recommended:

- a) A letter stating the purposes for which the network is required
- b) A letter stating the purposes for which the network is required
- c) Copies of the following documents:-
 - I. Registration Certificate from ministry of Ports and marine transport/ Somali Maritime Administration
 - II. Valid business license
 - III. Working Permit for the Foreign Directors (if the Directors are not Somalian citizens and are residing Somalia).
 - IV. Certificate of Seaworthiness
 - V. Inspection Report
 - VI. Copies of Identity Cards (ID) or passports for all Directors and Shareholders of the Applicant (Both sides of the ID should be copied onto the same side of an A4 size paper, and Passport copies should include pages showing the nationality, date of issue and expiry, name and photograph of holder.)