

Tender specifications

Attached to the Invitation to tender

**Invitation to tender N° EMSA/OP/18/2015
for the Provision of ICT services
for upgrades related to SafeSeaNet European Index Server, Central
Ship/Location/ Organisation databases as well as helpdesk, corrective
maintenance services for applications supporting SSN Central System services
to MS**

Summary

Contracting authority Purpose	<p>The European Maritime Safety Agency</p> <p>The objective is to establish a Framework Service Contract with regard to the provision of ICT services relating to the SafeSeaNet maritime application.</p> <p>Following the signature of the framework contract, EMSA intends to establish during the first year a specific contract for corrective maintenance and helpdesk (Task 1 hereunder) as well as a cycle of upgrading and development of the system (Task 2 hereunder).</p>						
Type of tasks	<table border="1"> <tr> <td>Task 1</td><td>Corrective maintenance including 24/7 helpdesk for application incident management; The services may relate to one or more of the applications mentioned in section 2.2.1 (I to III) of the technical specifications</td></tr> <tr> <td>Task 2</td><td>Upgrading and development of the EIS</td></tr> <tr> <td>Task 3</td><td>Upgrading and development of databases storing reference data</td></tr> </table>	Task 1	Corrective maintenance including 24/7 helpdesk for application incident management; The services may relate to one or more of the applications mentioned in section 2.2.1 (I to III) of the technical specifications	Task 2	Upgrading and development of the EIS	Task 3	Upgrading and development of databases storing reference data
Task 1	Corrective maintenance including 24/7 helpdesk for application incident management; The services may relate to one or more of the applications mentioned in section 2.2.1 (I to III) of the technical specifications						
Task 2	Upgrading and development of the EIS						
Task 3	Upgrading and development of databases storing reference data						
Budget	<p>The maximum budget available for this contract over its entire duration is 1.600.000 Euro, excluding VAT. The maximum amount for the initial period of two years is 800.000 Euro, excluding VAT. The contract, if so to be decided by the Agency, could be renewed up to two times at maximum. Each extension covering one year with budget ceiling per additional year, 400.000 Euro excluding VAT.</p>						
Type of Contract Duration of framework contract Places of delivery	<p>The Framework contract is expected to be signed during October 2015.</p> <p>Two years, renewable twice, each time for a period of one year.</p> <p>The place of performance of the tasks shall be the contractor premises. In exceptional cases and when stipulated in the relevant Specific Contract, the necessity to deliver services in other locations, such as EMSA premises at Praça Europa, nº 4 in Lisbon may occur for a limited period of time.</p>						
Particulars of delivery	<p>Services will be carried out by the contractor during normal working days/hours. The necessity to deliver services outside the normal working days/hours may occur for Task 1.</p>						
Variants Joint offers Subcontracting	<p>Not permitted</p> <p>Permitted</p> <p>Subcontracting is permitted for those subcontractors proposed in the offer of the tenderer. Apart from that, subcontracting will only be permitted with the prior specific written authorisation of EMSA.</p> <p>Tenderers should note that the successful bidder (or the successful bidder's subcontractors) to be awarded this contract will not be taken into consideration for any future tender concerning testing services on software deliveries associated with this procurement.</p>						

Abbreviations

The following table includes a list of abbreviations commonly used in connection with SafeSeaNet.

Abbreviation	Definition
AFTN	Aeronautical Fixed Telecommunication Network
AIS	Automatic Identification System
AIS	Automatic Identification System
ALRS	Admiralty List of Radio Signals
ATA	Actual Time of Arrival
ATD	Actual Time of Departure
BAR	Base Authority Registry
BC	International Code of Safe Practice for Solid Bulk Cargoes
BCF	Business Continuity Facility (belonging to EMSA, currently hosted in Porto)
CARD	Central Access Rights Database
CAS No	CAS Registry Number assigned by the Chemical Abstracts Service to every chemical substance.
CCD	Central Country Database
CGD	Central Geo-reference Database
CHD	Central Hazmat Database
CLD	Central Location Database
CLP	Classification, labelling and packaging of substances and mixtures [Regulation (EC) No 1272/2008]
CMC	Common Management Console
COD	Central Organisation Database
COSS	Committee on Safe Seas
COTS	Commercial Off The Shelf
CSD	Central Ship Database
CSN	CleanSeaNet
CST	Coastal Station
CTG MPPR group	Consultative Technical group on Marine pollution Preparedness, Prevention and Response
DW	Data Warehouse
EBSC	European Behaviour Classification System
EC	European Commission
ECDIS	Electronic Chart Data Display and Information System
EEZ	Exclusive Economic Zone
EIS	European Index Server
EMSA	European Maritime Safety Agency

Abbreviation	Definition
ENC	Electronic Nautical Chart
EO DC	Earth observation Data Centre – a system in the SSN Ecosystem Architecture (an evolution of CSN)
EOS	Earth Observation Services
ETA	Expected Time of Arrival
ETD	Expected Time of Departure
EU	European Union
EU LRIT CDC	European Union LRIT Cooperative Data Centre – Another term identifying EU LRIT DC
FDT	Fixed Deliverables and Time
FWC	Framework Contract
GESAMP	Joint Group of Experts on the Scientific Aspects of Marine Environmental Protection
GIS	Geographic Information System
GNSS	Global Navigational Satellite System
GPS	Global Positioning System
GUI	Graphic User Interface
HAZMAT	Dangerous and polluting goods
HNS	Hazardous and Noxious Substances
HLSG	High Level Steering Group
HMI	Human Machine Interface
HTTP	Hypertext Transfer Protocol
HTTPS	Hypertext Transfer Protocol Secure
IALA	International Association of Marine Aids to Navigation and Lighthouse Authorities
IBC	International Code for the construction and equipment of ships carrying dangerous chemicals in bulk
ICM	Installation and Configuration Manual
ICT	Information and Communications Technology
IdM	Identity Manager (an Oracle application)
IdM	EMSA Identity Management system
IEC	International Electrotechnical Commission
IFCD	Interface and Functionalities Control Document, as mentioned in Annex III of Directive 2002/59/EC.
IGC	International Code for the construction and equipment of ships carrying liquefied gasses in bulk
IMDatE	Integrated Maritime Data Environment – It wil be upgrad in the future to what is to be known as “STAR”
IMDatE WUP	The web portal of the current IMDatE system
IMDG	International Maritime Dangerous Goods Code
IMO	International Maritime Organisation
IMS	Integrated Maritime Services (framework) – a term identifying all the services supporting SSN Ecosystem functions

Abbreviation	Definition
IMSBC	The International Maritime Solid Bulk Cargoes Code
IT	Information Technology
IUPAC	International Union of Pure and Applied Chemistry
JSRs	Java Specification Requests
LCA	Local Competent Authority
LDAP	Lightweight Directory Access Protocol
LRIT	Long Range Identification and Tracking.
LRIT DB	LRIT Database
LRIT IDE	LRIT International Data Exchange
LRIT SD	LRIT Ship Database
MAP	Maritime Application Portal
MAR-CIS	MARine Chemical Information sheets
MAR-ICE	Marine Intervention in Chemical Emergencies Network
MARPOL	The International Convention for the Prevention of Pollution from Ships
MARSEC	Regulatory Committee for Maritime Security
MARSURV	Maritime Surveillance
MMSI	Maritime Mobile Service Identity
MRCC	Maritime Rescue Coordination Centre
MRS	Mandatory Reporting System
MS	Member State
MSS	Maritime Support Services (of EMSA)
MSs	Member State(s)
NCA	National Competent Authority
NSW	National Single Window
OASIS	Organisation for the Advancement of Structured Information Standards (OASIS)
OES	Oracle Entitlement Server
OLR	Operational LOCODE Registry
OSB	Oracle Service Bus
OVR	Operational Vessel Registry
OWASP	Open Web Application Security Project
POR	Port Authority
PSC	Port State Control
PSSA	Particularly Sensitive Sea Area
RFC	Request For Change

Abbreviation	Definition
RFD	Directive 2010/65/EU of the European Parliament and of the Council of 20 October 2010 on reporting formalities for ships arriving in and/or departing from ports of the Member States and repealing Directive 2001/6/EC
RFS	Request For Services
RVR	Reference Vessel Repository a term used in the SSNv2 to identify the database currently identified as CSD
SAR	Search and Rescue
SAR	Synthetic Aperture Radar
SDS	Software Design Specifications
SEG (SSN Ecosystem GUI)	The Graphical user interface that will provide in the near future the services currently provided by the SSN GI application in SSN, IMDatE WUP in IMDatE. LRIT web interface in EU LRIT CDC and CSN web interface.
SHT	Single Hull Tanker
SOA	Service Oriented Architecture
SOAP	Simple Object Access Protocol
SOLAS	International Convention for the Safety of Life At Sea
SRS	Software Requirements Specifications
SSL	Secure Sockets Layer
SSN	SafeSeaNet
SSN (Ecosystem)	A “system of systems” includes, in addition to SSN EIS, STAR, EO DC and EU LRIT CDC
SSN AccIIS	SSN Accident/Incident Information System
SSN GI	Central SSN Graphical Interface
SSN SI	SSN Streaming Interface
SSN TI	Central SSN Textual Interface
STAR	Ship Tracking, Awareness and Reporting data system, a system of the SSN Ecosystem
STCW	International Convention on Standards of Training, Certification and Watchkeeping for Seafarers
STIRES	SSN Tracking Information Relay and Exchange System – a component system of SSN that will be deprecated as soon as STAR will go into production.
STMID	Shore-based Traffic Monitoring Information Database
STP	Software Test Plan
TLS	Transport Layer Security
TSS	Traffic Separation Scheme
UTC	Coordinated Universal Time
VAS	Value-Added Service
VDS	Vessel Detection System
VMS	Fishing Vessel Monitoring System
VTMIS	Vessel Traffic Management and Information System

Abbreviation	Definition
VTMIS Directive	Directive 2002/59/EC of the European Parliament and of the Council of 27 June 2002 establishing a Community vessel traffic information system and repealing Council Directive 93/75/EEC
VTS	Vessel Traffic Services
WFS	Web Feature Service
WWW	World Wide Web
XML	Extensible Markup Language
XML RG	XML Reference Guide

Glossary

The following table includes a glossary of the relevant terms commonly used in connection with SafeSeaNet.

Term	Definition
AIS	AIS is intended to enhance safety of life at sea, the safety and efficiency of navigation, and the protection of the marine environment. In addition, it may contribute to maritime security. SOLAS Regulation V/19 requires that AIS should exchange data from ship-to-ship and with shore based facilities. Therefore, the purpose of AIS is to help identify vessels; assist in target tracking; simplify information exchange (i.e. reduce ship reporting using radiotelephony); and provide additional information to assist situational awareness. (IALA VTS Manual edition 2008).
Application	A computer program or a set of computer programs designed to help people performing a predefined set of activities. Applications could be implemented on custom-made code or commercial-off-the shelf software (such as Oracle database server, Oracle Identity management suite, Weblogic or Apache application servers, ArcGIS or Geoserver suites, Liferay portal server, Microsoft server, Active Directory, Open LDAP, etc). Maritime applications at EMSA include: CSN, LRIT DC, LRIT SD, LRIT IDE, Thetis, STCW, IMDATE integrated services (MARSURV-1, MARSURV-3 and future VAS) and those included in the SSN system (currently EIS, STIRES, SSN DW)
Component (Definition applicable for MAP design)	A set of functionality-grouping capabilities enabled by one or more applications that are made available to a user via the MAP. The capabilities integrated into components are subject to different configurations depending on the user accessing the component. In this respect, the “components” may include one or more “options” (refer to the definition of “options”). Some examples of components from SSN are: SSN “graphical” interface”, SSN textual interface, SSN accident module. Depending on the way in which the applications are configured in MAP, access to a component is granted to a user either by a duly authorised administrator or “by default”. MAP should be aware at all time of the users which are authorised to access EMSA applications and maintain in its database a registry of the configuration of the components made available to users.
CSN	CSN is a satellite based monitoring system for marine oil spill detection and surveillance in European waters. The service is operated by EMSA and provides a range of detailed information including oil spill alerts to Member States, rapid delivery of available satellite images and oil slick positions. More information at: https://csndc.emsa.europa.eu/homepublic
ECDIS	ECDIS means a navigation information system which with adequate back-up arrangements can be accepted as complying with the up-to-date chart required by regulation V/20 of the 1974 SOLAS Convention, by displaying selected information from a system electronic navigational chart with positional information from navigation sensors to assist the mariner in route planning and route monitoring, and if required display additional navigation-related information (IMO resolution A.817 (19)).
EMSA	EMSA provides technical assistance and support to the European Commission and Member States in the development and implementation of EU legislation on maritime safety, pollution by ships and maritime security. To do this, one of EMSA's most important supporting tasks is to improve cooperation with, and between, MSs in all key areas. In addition, the Agency has also been given operational tasks in the field of oil pollution response, vessel monitoring and in long range identification and tracking of vessels. As a body of the EU, the Agency sits at the heart of the EU maritime safety network and collaborates with many industry stakeholders and public bodies, in close cooperation with the EC. More info at: www.emsa.europa.eu

Term	Definition
ENC	ENC means the database, standardized as to content, structure and format, issued for use with ECDIS on the authority of government authorized hydrographic offices. The ENC contains all the chart information necessary for safe navigation and may contain supplementary information in addition to that contained in the paper chart (e.g. sailing directions) which may be considered necessary for safe navigation (IMO resolution A.817 (19)).
GNSS	A space-based global navigation satellite system on board sensor providing reliable positioning, navigation, and timing services to worldwide users on a continuous basis in all weather, day and night, anywhere on or near the Earth.
HTTPS	A combination of the http Protocol with the SSL/TLS protocol to provide encryption and secure identification of the server. HTTPS connections are often used for payment transactions on the WWW and for sensitive transactions in corporate information systems. More information at: https://tools.ietf.org/html/rfc5246
IALA	The non-profit, non-governmental international technical association gathering marine aids to navigation authorities, manufacturers and consultants from all parts of the world and offering them the opportunity to compare their experiences and achievements. IALA's aim is to harmonise aids to navigation worldwide and to ensure that the movements of vessels are safe, expeditious, cost effective and harmless to the environment. Refer to http://www.iala-aism.org
IEC	The world's leading organization that prepares and publishes International Standards for all electrical, electronic and related technologies. Refer to http://www.iec.ch
IMO	The United Nations specialized agency with responsibility for the safety and security of shipping and the prevention of marine pollution by ships. Refer to http://www.imo.org
Interface	The communication boundary between: <ul style="list-style-type: none"> • IT entities such as: IT systems, applications, software modules within an application, software or hardware devices; • Users and IT systems (i.e. graphical interface)
LRIT	A satellite-based transmission system providing the ship's identity, location and date and time of the position. The EU LRIT DC is operated by EMSA. More information at: http://emsa.europa.eu/lrit-ide.html
MAP application	A fully configurable portal application, supported by a proven portal framework implementing a unique user interface allowing users of EMSA applications to seamlessly access components common for all EMSA applications (for example used for user login and logout and change password) and application-specific components they are authorised to access.
MMSI	MMSI is a series of nine digits which are sent in digital form over a radio frequency channel in order to uniquely identify ship stations, ship earth stations, coast stations, coast earth stations, and group calls (Recommendation ITU-R M.585-6).

Term	Definition
Option (Definition applicable for MAP design)	<p>A configurable option is a group of distinct features, a service or an interface that is made available by an application to enable a user to provide/update/cancel/delete data or retrieve/consult information.</p> <p>Some examples from SSN: "Find" console, "Send" console. These could be part of the SSN textual interface "component".</p> <p>The specific access rights of users for options to which he/she is granted access are application specific. The MAP application is not "aware" of the specific access rights/permissions of users. If the configuration of a component could change (access to some options included in the component could be enabled/disabled by administrator action taken at application level) a web service is to be established (between MAP and the application) allowing the change of the configuration of the component and the update of the MAP registry containing the details of the options to be accessed by the user.</p> <p>The contractors should take a note of the following:</p> <ul style="list-style-type: none"> • "Components" and "options" have an "operational" context. They should not be perceived as what engineers and software experts understand as an "application", a "service" or "interface"; • The same configurable "option" might be utilised by one or more application "components". <p>"Options"/"Components" cater for grouping application capabilities accessed via a url or a set of urls but do not specify the explicit access rights of users to these capabilities. In this sense, they should not be confused with access control related "roles" or "groups". Not all the users enabled to utilise a component or accessing an option would or should have the same access rights. The MAP application will control the urls to be presented to users for them to access application capabilities, and will not control what the user actually has access to by clicking on a specific url.</p>
OWASP	OWASP is a not-for-profit worldwide charitable organization focused on improving the security of application software. Refer to http://www.owasp.org/index.php/Main_Page
Portlet	Pluggable user interface software components that are managed and displayed in a web portal. Portlets produce fragments of markup code that are aggregated into a portal. Typically, following the desktop metaphor, a portal page is displayed as a collection of non-overlapping portlet windows, where each portlet window displays a portlet. Hence a portlet (or collection of portlets) resembles a web-based application that is hosted in a portal. Portlets are defined in JSR-000168 and JSR-000268 standards.
Real-Time and Near-real-time	In the context of its use in SSN, "real-time" pertains to the delay introduced, by automated data processing or network transmission, between the occurrence of an event and the use of the processed data, e.g., for display or feedback and control purposes. In the context of its use in SSN, the term "near-real-time" refers to data that during the data processing are down-sampled (positions displayed with 6 minutes update rate)
SAR	(As Synthetic Aperture Radar). SAR is a form of radar in which multiple radar images are processed to yield higher-resolution images than would be possible by conventional means. Either a single antenna mounted on a moving platform (such as an airplane or spacecraft or satellite) is used to illuminate a target scene or many low-directivity small stationary antennas are scattered over an area near the target area. The many echo waveforms received at the different antenna positions are post-processed to resolve the target. SAR can only be implemented by moving one or more antennas over relatively immobile targets, by placing multiple stationary antennas over a relatively large area, or combinations thereof. SAR has been extensively used in remote sensing and mapping. SAR images are used in VDS.
Service (in the context of an IT system architecture)	<p>When the term "service" is used in the context of system architecture it refers to (according to OASIS definition):</p> <p>A mechanism to enable access to one or more capabilities, where the access is provided using a prescribed interface and is exercised consistent with constraints and policies as specified by the service description</p>

Term	Definition
SOAP	SOAP is a lightweight protocol intended for exchanging structured information in a decentralized, distributed environment. It uses XML technologies to define an extensible messaging framework providing a message construct that can be exchanged over a variety of underlying protocols. The framework has been designed to be independent of any particular programming model and other implementation specific semantics (See also www.w3c.org).
SSL	The SSL (now TLS) is a communications protocol. See also http://tools.ietf.org/html/rfc5246
SSN	SSN is the European network with the main objective of providing a European Platform for Maritime Data Exchange between maritime administrations of the Member States. The implementation of the system is based on Directive 2002/59/EC as amended. More information at: http://emsa.europa.eu/operations/safeseanet.html
STIRES	STIRES is the module of SSN collecting, processing and relaying AIS and other real time data.
User	A human being or an Authority accessing one or more EMSA applications using a web – based interface. The “Authority”, in terms of the MAP, could be understood as an account that allows a team of persons to access one or more applications via the MAP web portal.
User interface	Everything designed into an IT system which includes one or more applications which a human being may interact with. This includes, but is not restricted to: display screen, keyboard, mouse, light pen, desktop appearance, illuminated characters, help messages, and how an application program or a Web site invites interaction and responds to it.
VTS	A marine traffic monitoring system implement by a competent authority, designed to improve the safety and efficiency of navigation, safety of life at sea and the protection of the marine environment. The service should have the capability to interact with the traffic and respond to traffic situations developing in the VTS area (VTS manual ed. 2008). VTS is governed by SOLAS Chapter V Regulation 12 and by other international Conventions. (IALA VTS Manual edition 2008).
XML	A set of rules for encoding documents in machine-readable form. XML is extensively used for messaging exchange in SSN (See also www.w3c.org).

Terms specific to this FWC

Term	Definition
Helpdesk	Remote support to EMSA for the analysis and diagnosis of identified problems in the software application or hotfixes that are to delivered under tasks 1, 2 & 3 and proposals for temporary and permanent solutions.
Incident management (bug resolution) and corrective maintenance	<p>Within the scope of activities to be covered by a specific contract on IT helpdesk activities are the functional, non –functional and security related issues affecting the SSN applications to be identified in the contract (among those mentioned in the description of Task 1 of the FWC). The issues could be detected either by EMSA staff or an EMSA contractor r and/ or MS users following the placement of a patch release in production. A functional issue may relate to:</p> <ul style="list-style-type: none"> a. A “bug” (deviation of the system from the agreed specifications; and/ or b. Changes of minor scale in the system behaviour (i.e. those related to the change of an applicable business rule) addressing an existing operational requirement that was not foreseen in the implementation contract for the release that is in production and/ or a change in the system behaviour requested by the MS
System upgrades	Referring to the applications mentioned in the scope of Task 2, 3 in chapter 2, the activities concerning system upgrades relate to adding, changing or deleting functionalities from the system software and/or the software of individual subsystems.
Training	Training for of EMSA administrators (or advanced users) of the application to facilitate the applications administration, helpdesk, monitoring and diagnosis in the event of an incident.
Data entry/ collection	Data entry/ collection services that may require specific skills or expertise associated to the nature of data introduced in a reference database at EMSA

1. Introduction

The European Maritime Safety Agency (EMSA) was established under Regulation 1406/2002/EC (as amended) for the purpose of ensuring, amongst other tasks, a high, uniform and effective level of maritime safety.

Among its tasks, the Agency develops, hosts, operates and monitors the central SafeSeaNet system that supports the exchange of maritime safety information among EU Member States, Norway and Iceland, and in some cases with countries outside of the EU/EEA.

The operation of central SafeSeaNet involves a number of entities or users at regional, national and local level. These can vary from those in the shipping industry (e.g. ship masters, agents or operators) to national administrations (e.g. port authorities and coastal stations, Port State Control officers, SAR centres, VTS, ship reporting systems, pollution response bodies, etc.).

SafeSeaNet is considered to be a time critical application supporting the maritime safety services. It is administered, operated and monitored by EMSA on a 24/7 basis with a guaranteed availability of 99% over a year with a maximum downtime of 12 hours per event. EMSA has established an operational centre, the Maritime Support Service (MSS), that is manned 24/7 for the first level monitoring and helpdesk related to these applications.

The main software developments concerning the current version of the system (SSN v.3) have been completed but they require time critical maintenance and support in the operational phase. In addition, further development of the system is required, in light of the following:

- The evolution of operational requirements based on the decisions taken by MS in the SSN High Level Steering Group (HLSG) or the SSN (technical) Group level;
- The evolution of legal requirements;
- The harmonisation of the applications integrated into the SSN Ecosystem (refer to the Annex G) and the technical infrastructure at EMSA to facilitate interoperability of traffic monitoring and information systems hosted by the Agency.

Enhancements to SSN during the next two years would mainly be aimed at including new information in the system, linking information from different system modules, further interfacing with other EMSA maritime information systems, facilitating its operational performance or improving its (user) ergonomics.

2. Objective, scope and description of the contract

Note:

By way of information, an overview of SafeSeaNet and its components covered under this contract (EIS and already existing reference databases CSD, CLD, COD) is provided in the Annex A whilst a non-exhaustive description of the technical landscape at EMSA is included in the Appendix 1 to Annex II of the contract. Annex G presents the guiding principles for evolution of EMSA applications architecture included in the SSN Ecosystem.

2.1 Objective

The objective is to establish a two year Framework Contract with an experienced contractor that can be requested in a relatively short time to support EMSA with code correction, evolutive maintenance, upgrades relating to the SafeSeaNet European Index Server (EIS), Central Ship/Location/ Organisation databases as well as with IT helpdesk, corrective maintenance services for the applications mentioned in the description of Task 1 here-after, supporting SSN Central System operational services to MS.

Software upgrades concerning other system integrated into the SSN Ecosystem (STAR/SEG, EU LRIT CDC, EO CDC) are out-of-scope of this procurement¹.

Following the signature of the Framework Contract, EMSA intends to contract specific activities by issuing individual Requests for Services (RFS) in accordance with the terms and provisions of the framework contract.

The contract could be extended, if so decided by EMSA, for maximum twice a period of one year.

2.2. Scope

The following types of activities could be contracted under this FWC:

1. IT helpdesk and corrective maintenance services related to the:
 - i. SafeSeaNet EIS (already existing software at the launch of this FWC or any upgrade executed under the task 2) and any of its interfaces
 - ii. CSD/ COD/ CLD software (already existing software at the launch of this FWC or any upgrade executed under the task 2) application and any of its interfaces
 - iii. Already existing software (at the launch of this FWC) associated with SSN GI/ STIRES/ Streaming interface applications (until they shall be deprecated and replaced by the components that shall be developed under the STAR and SEG framework contracts.

¹ Further upgrades to the STIRES application software used for implementing, at the time of launch of this procurement, the SSN Graphical Interface functions and SSN Streaming interface functions and position data processing, are out-of-scope of this procurement as the STIRES software is to be phased-out and replaced by STAR/ SEG..

2. Evolutive maintenance / software upgrade activities related to the SafeSeaNet EIS and any of its interfaces (e.g. XML/SOAP interface, textual web-based interfaces, e-mail distribution) made available for users.
3. Evolutive maintenance / software upgrade activities related to CSD, CLD, COD databases and their interfaces (system interfaces, web-consoles and user interfaces for tablet / mobile devices).

2.3 Tasks

The Framework Contract covers the following types of tasks:

- | | |
|---------------|---|
| | Corrective maintenance including 24/7 helpdesk for application incident management; |
| Task 1 | The activities to be contracted may relate to one or more of the applications mentioned in section 2.2.1 (I to III) of the technical specifications |
| Task 2 | Upgrading and development of the EIS |
| Task 3 | Upgrading and development of databases storing reference data |

For the purpose of this procurement procedure refer to the definitions of “*Helpdesk*”, “*Incident management and corrective maintenance*”, “*System upgrades*” and “*Training*” in the glossary at the beginning of this document.

Basic information (technical documentation) on system design is available in the appendices of Annex A, The technical reference correspond to the production version of SSN at the time of launching the procurement. The updated set of documents (corresponding to the version of the system in production at the time of signature of the FWC with the successful bidder) shall be made available to the winning tenderer.

2.4 Requirements specific to each type of task

The requirements hereunder apply, per type of task, to any request for services under the framework contract. More specific requirements will be introduced within the context of each specific order.

2.4.1 Requirements for Task 1 (helpdesk and corrective maintenance)

The contractor within this type of service will carry out the following tasks:

- a. Receive notifications from the EMSA SSN application support team or the Maritime Support Services (MSS) on service failures or requests to analyse/ resolve reported incidents respecting agreed service levels;
- b. Provide 24/7 remote second line helpdesk in line with the Service levels set in the Annex C;
- c. Analyse the incidents causing unforeseen service interruption and provide feedback to orient the required interventions for the repair or maintenance by EMSA or by its contractors;
- d. Incorporate minor changes in the application code to correct blocking errors or address urgent requests from MS affecting business logic of the affected applications;

- e. Support the back-up and recovery in case of failure;
- f. Propose deployment options (within the limits of the design of the application in production) to avoid performance bottle-necks and improve performance;
- g. Propose deployment options (within the limits of the design of the application in production) to address changes in the back-up needs for production environments;
- h. Implement changes in the applications necessary for implementing monitoring processes.

These tasks will be performed in line with the incident management procedure of EMSA (refer to the Annex F – Appendices E and F) respecting the SLA in Annex C.

2.4.2 Requirements for Task 2, 3 (upgrading and development services)

The contractor will undertake the following activities:

- a. Make design proposals for addressing the user/ functional, non-functional/ technical requirements following, if applicable a comparison of the potential technical options concerning the evolution of one or more software modules.
- b. Take-over activities (concerning existing software code developed by another contractor under another contract),
- c. Programming;
- d. Prototyping;
- e. Development/Coding;
- f. Factory acceptance tests;
- g. Updates of the system documentation to incorporate changes, in line with a specific RFS, made in software components/features. Within the scope of such activities are the following, if specifically requested:
 - i. Review of existing documentation to improve quality and readability;
 - ii. Clear segregation of technical information concerning pilot projects from the technical information related to the central SSN system implemented as per the IFCD (Interfaces and Functionalities Control Document);
- h. Code integration with existing code of SSN components
- i. Provide (if requested) training for application administrators at EMSA.
 - iii. Prepare training material (training plan, presentations, documents, etc.);
 - iv. Execute the training services , collect and report feedback from the trainees;
 - v. Provide remote coaching

These tasks will be performed respecting the procedures in Annex E, F and project delivery in Annex D as well as the specific requirements of each order.

A specific contract may include activities related with the scope of any of the tasks 2, 3 or a combination of them.

For background information and technical / operational references in relation to tasks 2, 3, the bidders shall consult the Annex A of the tender specifications:

2.4.5 General Conditions for the Provision of Services

Language

The working language of EMSA is English. The English language shall be used throughout the duration of any activities associated with this Framework Contract for all communication, reports and other documentation.

Used products and infrastructure

The technologies and tools to be used for the provision of services II are listed in Appendix 1 to Annex II of the contract. The personnel providing the service will use only the standard software packages in utilised at the Agency, and no other software may be installed or used without the prior written authorisation of EMSA.

Third party licences for products used in the software implementation

The offers for service and associated specific contracts should, unless explicitly agreed otherwise, cover the costs of any licence or product required to perform the service.

Place of performance and access to EMSA environments

The place of performance of the tasks shall be the contractor premises. VPN access could be provided to EMSA infrastructure and the test environments, on the basis of the signature of conditions of use regarding security.

Work time

Except for the helpdesk task and corrective maintenance, the work shall be carried out within the normal working hours/days of EMSA (a calendar will be provided to the contractor when available, usually three months before the end of the previous year). Office hours are from 9.30 a.m. to 5.30 p.m. on normal working days.

Under exceptional circumstances and with the previous agreement of both EMSA and the contractor, work might be performed outside of normal working hours/days.

Tests and audits

As a European body, EMSA itself or its external contractors might perform any kind of test or audit on the services provided by the contractor awarded the framework contract following this tender procedure. Checks and audits could in particular be performed in accordance with article I.15 of the General Conditions to the ICT draft Framework contract.

Project team

EMSA reserves the right to evaluate any change or new nomination of members to the contractor's project team. CVs and appropriate documentation of each person foreseen to take up duties not initially included in the list of CVs submitted within the bid, shall be presented to EMSA for approval with respect to Specific Requests for Services but in any case at least 15 days before the schedule start date of a specific contract.

2.5 The nature of the contracts

2.5.1 Framework contract

The contract deriving from this procurement procedure would be a framework service contract following the template published with these tender specifications. It should be stressed that

Framework Contracts involve no direct commitment and, in particular, do not constitute orders per se. Instead, they lay down the legal, financial, technical and administrative provisions governing the relationship between EMSA and the Contractor during their period of validity. The draft Framework Contract specifies the basic conditions applicable to any assignment placed under its terms.

2.5.2. Specific contracts

Actual orders will be placed after the Framework Contract is signed and in force, through “specific contracts” concluded in performance of the Framework Contract. All services will be provided on the basis of two different kinds of Specific Contracts:

- a. **Time & Means (TM)** specific contracts which correspond to the order of a number of days to be performed per profile;
- b. **Fixed Deliverable & Timing (FDT)** specific contracts which correspond to the order of a defined project with a number of specified deliverables.

Activities in scope of Task 1 (corrective maintenance and Helpdesk) shall be performed based on Fixed Deliverable and Timing specific contracts. For the remainder type of tasks both kinds could be used.

3. Contract management responsible body.

The European Maritime Safety Agency – Unit C.3, in charge Information Services Technical Management will be responsible for managing the contract.

4. Project Planning

The minimum reports and deliverables listed in the subsection below apply per type of service and should be considered as part of the “technical report” required for any interim and balance payments. Any additional reports, milestones, deliverables and meetings will be described in each specific contract.

4.1 Minimum deliverables/ reports associated with Task 1:

- a. Provision of the services required respecting the requirements, procedures and service levels.
- b. Inclusion of the results of analysis of each incident in TeamForge (the tool used by the Agency for Application Lifecycle Management).
- c. Quarterly reports for the services provided.
- d. Quarterly, if requested by EMSA, one day coordination meeting at EMSA premises, or Teleconference followed by a meeting report.

4.2 Deliverables/ reports associated with Tasks 2, 3:

- a. Provision of the services required respecting the requirements, procedures and services levels;
- b. SRS (Functional Software requirements Specification). Indicative content:

1. Requirements specification,
 2. Business process diagrams,
 3. Analysis of interactions with other systems,
 4. Analysis of interactions with users,
 5. Conceptual data model and data dictionary,
 6. Traceability with the requirements in an request for services;
- c. SDS (System Design Specification);
1. SDS will normally include volumes for:
 - i. SDD (Software Design Document),
 - ii. GIDD (Graphical Interface Design Document),
 - iii. SDDDB (System database design document),
 - iv. SIG (System Interface Guide) (comprising volumes for each system interface made available)
 - v. SSG (System Security Guidelines)
 2. The content shall cover:
 - i. Conceptual and physical system architecture,
 - ii. Use case description and business rules,
 - iii. Wireframes, mock-ups of user interfaces
 - iv. Software design and layering,
 - v. Modules and components,
 - vi. Object models and interactions between objects,
 - vii. Process, workflows and algorithms design and documentation,
 - viii. Internal interfaces definitions,
 - ix. Traceability matrix between components and business processes and use cases,
 - x. Database definition, data model,
 - xi. In particular the SIG of the SDS should include the applicable specifications for an interface with an external system and/ or an interface between systems integrated into the SSN Ecosystem .That is, SIG shall comprise one or more documents defining the system external interfaces, which should

include all details for external systems to interact with the module (s) to be upgraded or created under a specific Request For Services.

d. STP (System Test Plan)

The STP should be segregated to several docs/ booklets to distinguish very clearly the test cases concerning each distinct software component or service under testing. Tests that are related with external systems interfaced with a system included in the SSN Ecosystem should be segregated into “commissioning” test plans. These shall be provided by EMSA to the operators of external systems for executing tests on the interface between the external system and the system integrated into the SSN Ecosystem.

Bidders should note that in terms of the testing documentation referenced in the ISVVT procedure of EMSA (refer to Annex F/ Appendix C) the STP shall include, at minimum, the information understood as “Test Cases Specification (Standard IEEE 829-1998)”

e. UM (User Manual);

f. ICM (Installation & Configuration Manual);

- i. Installation and configuration and clustering manual, data migration procedures and data migration strategy,
- ii. Infrastructure dimensioning requirements,
- iii. Data migration strategy,
- iv. Release notes,
- v. Operation and maintenance manual, including all necessary information to monitor the system.

g. Release “Master” test plan

The Release “Master” test plan constitutes the guideline by which the application will be tested during the site acceptance cycles envisaged for a specific RFS, defining the acceptance criteria and the tests to be executed in each one of the SAT runs. In general the Test Plan makes reference to functional and non-functional tests under the following categories:

- Smoke tests: to check out if the main function of an application work properly, but not going into great details. They are put in place before the exhaustive testing activities or after the deployment on a different environment. EMSA may propose to contractor “smoke” tests for inclusion in the plan.
- Functional tests: to check out the functional behaviour of the application, including regression, in respect to specific function/feature.

- Non-Functional test: security, integration, load, stress, soak, and Business Continuity Facility (BCF) compliance. Load, stress and soak test descriptions must define all test scenarios to be executed, goals to be achieved, tools to be used and resources to be monitored.
- Acceptance (Business Validation) test: to validate that the business requirements are fulfilled by the new release. The 'Acceptance' formally acknowledges that the release has met the requirements once the release is deployed into the production environment. The 'Acceptance Criteria' should be agreed with EMSA (EMSA may propose the relevant tests) and include at least a prioritized list of defined and measurable attributes, which are application-related, that must be satisfied to achieve the final acceptance

Bidders should note that in terms of the testing documentation referenced in the ISVVT procedure of EMSA (refer to Annex F/ Appendix C) the Release "Master" test plan shall include, at minimum, the information understood as "Test Plan (Standard IEEE 829-1998)

- h. FAT Test reports;
- i. Feedback to SAT reports, Analysis/ Comments on SAT tests reports drawn by EMSA or parties contracted by EMSA to execute SAT. Such feedback will be usually recorded in the TeamForge (refer to Annex D on the usage of TeamForge) ;
- j. Automation scripts used to execute FAT tests of the software delivered.
- k. For a typical delivery (at the end of the development phase or following the site acceptance tests runs when it is delivered an updated patch release) the contractor must deliver:
 - i. Source code in a versioning structure for the specific components developed for EMSA (respecting the procedure in Annex E).
 - ii. Binaries for all the COTS and libraries used in the system.
 - iii. Scripts/artifacts/instructions on how to build the code.
 - iv. A list of deprecated components.
 - v. An update of the ICM document specifying the version of the software configuration items being delivered including references to COTS and software libraries included in the delivery. The document should also include the Release note describing changes as well as reference to the tests made attaching any relevant SPRs (software problem report).
 - vi. Applicable scripts to perform the installation: database scripts, configuration and deployment scripts, data migration scripts from the current version to the next one.
 - vii. Installation manual/instructions including information on software components whose installation could be automated by utilising tools like e.g. Redhat Package Manager (RPM).

- viii. To facilitate the installation of software delivered, contractors must comply with the following requirement as far as deployables on the weblogic servers are concerned:
 - 1. Weblogic Configurations (e.g. datasources, foreigner JNDI providers, JMS queues) and deployments (e.g. war, ear) must be automated using Weblogic Scripting Tool (WLST) or Ant with WLST tags.
 - 2. All needed configurations must be centralised on a property file defined per environment (test/training/pre-prod/production).
 - 3. The source code versioning structure must follow the existing structure as used in EMSA (e.g. for enhancements/upgrades to the existing components). For new components, the contractor shall propose a versioning structure to be agreed with EMSA.

Bidders should note that a request for payment for services under Tasks 2 and 3 should always be accompanied by proofs that all the deliveries specified for a service contract (including design documentation in points (b) to (i) and software (under points j, k) have been made.

Concerning training activities potentially requested under Tasks 2 or 3 the minimum deliverables/ reports are:

- a. Provision of the services required respecting the requirements, procedures and services level;
- b. Training folder including all the material (electronic and hardcopy) used for a training course;
- c. Training evaluation report, including lessons learned and an analysis of the feedback received from the trainees.

4.5 Other deliverables/ reports associated with all types of Tasks

Depending on the type of service requested and based on the specific requirements made in a request, the contractor should deliver the following additional reports:

- a. Along with the offer provided against a specific request for services
 - i. Project plan:
It must include at least project charter, project management approach/ methodology, scope, Work Breakdown Structure (WBS), project team, Gantt chart, deliverables milestones, working locations, meetings planning and reports, completion percentage to date, detailed planning for the next reporting period, reporting on decisions taken and pending. The project plan is to be maintained during the whole duration of the contract.
 - ii. Software Development Plan:
This must define overall processes, tools and practices to be used during software development, such as Software development approach, description of the strategy of the software development life cycle (waterfall, incremental, evolutionary life cycle, etc.), Software engineering environment, Software configuration management plan, Design standards, Coding standards, Testing standards and practices.

- iii. Risk management plan and Risk registry.
 - iv. Description of the change management, release and deployment and software verification procedures. These should be aligned to the procedures followed by EMSA (included in the Annex F).
 - v. Quality management plan.
- b. Monthly reporting
The contractor shall provide a simple “flash” report identifying, as a minimum, the status of on-going tasks, resource usage, progress status and issues foreseen
- c. Quarterly reporting
The contractor should deliver a “Project status Report” reporting on the current status of the project, including, if required, proposals on updating the project plan and risk registry.
- d. Meetings
The contractor shall be responsible for providing:
 - i. Prior to a meeting, a detailed agenda whose content shall be agreed with EMSA as well as drafts of the presentation to be made in a meeting.
 - ii. Post meeting, the minutes for meeting. The minutes must include at least the topics discussed, decisions taken and action items with indication of the responsible person and deadline of the actions.
- e. Interim and Final reporting
If interim payments are allowed for a specific contract, an interim report shall be submitted along the payment request.

A final report shall be always submitted when completing the services under a specific contract, accompanying with the request for balance payment under a specific contract.

The reports to be submitted for interim/ final payments shall summarise the tasks performed, the software deliveries made, dates and references of the deliverables mentioned above and/ or of any additional deliverable provided under the specific contract.

5. Timetable

The indicative date for signature of the Framework Contract is October 2015.

6. Estimated Value of the Contract

The maximum budget available for this contract over its entire duration is 1.600.000 Euro, excluding VAT. The maximum amount for the initial period of two years is 800.000 Euro, excluding VAT. The contract, if so to be decided by the Agency, could be renewed up to two times at maximum. Each extension covering one year with budget ceiling per additional year, 400.000 Euro excluding VAT.

7. Terms of payment

Payments shall be issued in accordance with the provisions of the **draft framework service contract** available on the Procurement Section under the call to tender EMSA/OP/18/2015 on the EMSA website at the following address: www.emsa.europa.eu

8. Terms of contract

In drawing up a bid, the tenderer should bear in mind the terms of the draft framework service contract. EMSA may, before the contract is signed, either abandon the procurement or cancel the award procedure without the tenderers being entitled to claim any compensation.

9. Financial guarantees

Not Applicable.

10. Sub-contracting

If the tenderer intends to either sub contract part of the work or realise the work in co-operation with other partners he shall indicate in his offer which part will be subcontracted, as well as the name and qualifications of the subcontractor or partner. (NB: overall responsibility for the work remains with the tenderer).

The tenderer must provide required evidence for the exclusion and selection criteria on its own behalf and when applicable on behalf of its subcontractors. The evidence for the selection criteria on behalf of subcontractors must be provided where the tenderer relies on the capacities of subcontractors to fulfil selection criteria². The exclusion criteria will be assessed in relation to each economic operator individually. Concerning the selection criteria, the evidence provided will be checked to ensure that the tenderer and its subcontractors as a whole fulfil the criteria.

11. Requirements as to the tender

Bids can be submitted in any of the official languages of the EU. The working language of the Agency is English. Bids must include an English version of the documents requested under point 14.5 & 15.1 of the present tender specifications.

The tenderer shall complete Tenderer's checklist.

If the tenderer intends to either sub contract part of the work or realise the work in co-operation with other partners (Joint Offers) he shall indicate in his offer by completion of the form – Information regarding joint offers and subcontracting.

The tender must be presented as follows and must include:

² To rely on the capacities of a subcontractor means that the subcontractor will perform the works or services for which these capacities are required.

Signed cover letter indicating the name and position of the person authorised to sign the contract and the bank account on which payments are to be made.

Financial Form completed, signed and stamped; available on the Procurement Section (Financial Form) on the EMSA Website at the following address: www.emsa.europa.eu

Legal Entity Form completed, signed and stamped and requested accompanying documentation, available on the Procurement Section (Legal Entity Form) on the EMSA Website at the following address: www.emsa.europa.eu

Tenderers are exempt from submitting the Legal Entity Form and Financial Form requested if such a form has already been completed and sent either to EMSA or any EU Institution previously. In this case the tenderer should simply indicate on the cover letter the bank account number to be used for any payment in case of award.

Part A: all the information and documents required by the contracting authority for the appraisal of tenders on the basis of the points **13, 14.2-14.3** of these specifications (part of the Exclusion criteria)

Part B: all the information and documents required by the contracting authority for the appraisal of tenders on the basis of the **Economic and Financial capacity** (part of the Selection criteria) set out under point **14.4** of these specifications;

Part C: all the information and documents required by the contracting authority for the appraisal of tenders on the basis of the **Technical and professional capacity** (part of the Selection Criteria) set out under point **14.5** of these specifications.

Part D: all the information and documents required by the contracting authority for the appraisal of tenders on the basis of the **Award Criteria** set out under point **15.1** of these specifications;

Part E: setting out **prices** in accordance with **point 12** of these specifications.

12. Price

The Price for the provision of ICT services delivered according to the conditions of the framework contract shall include:

1. The fixed price for a specific contract (referred below as P_{corrective-EIS reference databases}) covering helpdesk and corrective maintenance for the applications mentioned below. The contract shall meet the service level and conditions as in Annex C and will cover the first year after the signature of the FWC. The contract will cover the following SSN components:
 - a) SafeSeaNet EIS (pre-existing software at the launch of this FWC as well as software upgrades during the course of the contract). The contract will cover all the components of EIS including its textual interface, management utilities and system interfaces exposed to applications internal to EMSA and/ or the MS.
 - b) CSD/ COD/ CLD software (already existing software at the launch of this FWC as well as software upgrades during the course of the contract). The contract will cover all the components, their web-interface and system interfaces exposed to applications internal to EMSA and/ or MS.

Note:

A specific contract with scope of services as above described, may be drawn every year during the whole duration of the FWC (at same price and SLA conditions).

2. The fixed price for a specific contract ($P_{\text{corrective-Pre/existing Software}}$) covering helpdesk and corrective maintenance of already existing software (at the launch of this FWC) associated with SSN GI/ STIRES/ Streaming interface applications. The contract shall meet the service level and conditions as in Annex C and will cover 6 months after the signature of the FWC.

Note:

A specific contract with scope of services, as above described, will be drawn for the first 6 months following the commencement day of the FWC. This specific contract may be drawn every 6 months during the whole duration of the FWC (at same price and SLA conditions).

3. A fixed price per man day for each of the following profiles of the contract:
 - a. Project Manager (PM)
 - b. Senior Analyst(PSA)
 - c. Web Designer Ergonomist (PERGO)
 - d. Senior Programmer (PSP)
 - e. Programmer (PP)
 - f. Quality Assurance Officer (PQA)
 - g. Network & Security Expert (PNS)
 - h. Application Engineer (PENG)
 - i. Web designer expert (PWEB)
4. A fixed price for software “take over” activities. The price will include the effort/ costs for the project team to analyse/ understand the software code existing at the time of signature of the FWC (the existing code will be provided to the winning tendered by EMSA). The take-over estimation in the offer will be split as follows:
 - a. EIS application software take-over including system/ web interfaces of EIS but excluding COD, CSD, CLD software
 - b. CSD software take over (including system / web interfaces)
 - c. COD software take over (including system / web interfaces)
 - d. CLD software take over (including system / web interfaces)
 - e. Software for the BlueBelt pilot take-over
 - f. SSN accident input tool and database take over.
5. An estimated maximum amount for extra travelling (on EMSA request) for one person for a one day meeting in EMSA, at Lisbon (PTravel). This estimate will constitute the maximum amount of travel and daily subsistence allowance expenses to be paid for one person to attend a one day meeting in EMSA.

Conditions

- A. Prices must be quoted in Euro.
- B. Prices must be fixed amounts, non-revisable and remain valid for the duration of the contract.
- C. Under Article 3 and 4 of the Protocol on the privileges and immunities of the European Union, EMSA is exempt from all duties, taxes and other charges, including VAT. This applies to EMSA pursuant to the Regulation 1406/2002/EC. These duties, taxes and other charges can therefore not enter into the calculation included in the bid. The amount of VAT must be shown separately.

13. Joint Offer

Groupings, irrespective of their legal form, may submit bids. Tenderers may, after forming a grouping, submit a joint bid on condition that it complies with the rules of competition. Such groupings (or consortia) must specify the company or person heading the project and must also submit a copy of the document authorising this company or person to submit a bid.

Each member of the consortium must provide the required evidence for the exclusion and selection criteria. The exclusion criteria will be assessed in relation to each economic operator individually. Concerning the selection criteria the evidence provided by each member of the consortium will be checked to ensure that the consortium as a whole fulfils the criteria.

If awarded, the contract will be signed by the person authorised by all members of the consortium. Tenders from consortiums of firms or groups of service providers, contractors or suppliers must specify the role, qualifications and experience of each member or group.

14. Information concerning the personal situation of the service provider and information and formalities necessary for the evaluation of the minimum economic, financial and technical capacity required

14.1 Legal position – means of proof required

When submitting their bid, tenderers are requested to complete and enclose the **Legal Entity Form** and requested accompanying documentation, available on the Procurement Section (Legal Entity Form) on the EMSA Website at the following address:
www.emsa.europa.eu

14.2 Grounds for exclusion - Exclusion criteria

To be eligible for participating in this contract award procedure, tenderers must not be in any of the following exclusion grounds:

- a) they are bankrupt or being wound up, are having their affairs administered by the courts, have entered into an arrangement with creditors, have suspended business activities, are the subject of proceedings concerning those matters, or are in any analogous situation arising from a similar procedure provided for in national legislation or regulations;
- b) they have been convicted of an offence concerning their professional conduct by a judgement which has the force of res judicata;
- c) they have been guilty of grave professional misconduct proven by any means which the contracting authority can justify;
- d) they have not fulfilled obligations relating to the payment of social security contributions or the payment of taxes in accordance with the legal provisions of the country in which they are established or with those of the country of the contracting authority or those of the country where the contract is to be performed;
- e) they have been the subject of a judgement which has the force of res judicata for fraud, corruption, involvement in a criminal organisation or any other illegal activity detrimental to the Union financial interests;
- f) they have been the subject of the administrative penalty for being guilty of misrepresentation in supplying the information required by the contracting authority as a condition of participation in the procurement procedure or failing to supply an information, or being declared to be in serious breach of his obligation under contract covered by the budget.

14.3 Evidence to be provided by the tenderers

For this purpose the Declaration on Honour available on the Procurement Section on the EMSA Website (www.emsa.europa.eu) shall be completed and signed.

Please note that the tenderer to whom the contract is to be awarded shall provide additional proof evidencing eligibility.

For situations described in 14.2 (a), (b) and (e), production of a recent extract from the judicial record is required or, failing that, a recent equivalent document issued by a judicial or administrative authority in the country of origin or provenance showing that those requirements are satisfied. Where the tenderer is a legal person and the national legislation of the country in which the tenderer is established does not allow the provision of such documents for legal persons, the documents should be provided for natural persons, such as the company directors or any person with powers of representation, decision making or control in relation to the tenderer.

For the situation described in point 14.2(d) above, recent certificates or letters issued by the competent authorities of the State concerned are required. These documents must provide evidence covering all taxes and social security contributions for which the tenderer is liable, including for example, VAT, income tax (natural persons only), company tax (legal persons only) and social security contributions.

For any of the situations 14.2(a), (b), (d) or (e), where any document described in two paragraphs above is not issued in the country concerned, it may be replaced by a sworn or, failing that, a solemn statement made by the interested party before a judicial or administrative authority, a notary or a qualified professional body in his country of origin or provenance.

If the tenderer is a legal person, information on the natural persons with power of representation, decision making or control over the legal person shall be provided only upon request by the contracting authority.

When the tenderer to be awarded the contract has already submitted relevant evidence to EMSA, it remains valid for 1 year from its date of submission. In such a case, the reference of the relevant project(s) should be mentioned and the Contractor is required to submit a statement of confirmation that their situation has not changed.

14.4 Economic and financial capacity – Selection criteria

Requirements:

- The tenderer must be in stable financial position and the economic and financial capacity to perform the contract

Evidence:

- Financial statements for the last three years for which accounts have been closed.
- Statement of overall turnover and turnover relating to the relevant services for the last three financial years.
- Tenderers are exempt from submitting the documentary evidence if such evidence has already been completed and sent to EMSA for the purpose of another procurement procedure and still complies with the requirements. In this case the tenderer should simply

indicate on the cover letter the procurement procedure where the evidence has been provided.

- If, for some exceptional reason which EMSA considers justified, a tenderer is unable to provide one or other of the above documents, he may prove his economic and financial capacity by any other document which EMSA considers appropriate. In any case, EMSA must at least be notified of the exceptional reason and its justification in the tender. EMSA reserves the right to request any other document enabling it to verify the tenderer's economic and financial capacity.

14.5 Technical and professional capacity – Selection criteria

The tenderer's technical capacity will be evaluated on the basis of the following criteria that will be applied to the legal entity submitting the offer and not to any mother company or company of the same group:

- a) The suitability of the tenderer's organisational structure to supply the services covered by the Framework contracts, based on the description of the measures employed to ensure the quality of the services covered. This description should include:
 - i. An overview of the company departments mentioning the currently allocated number of staff and levels
 - ii. Description of the relationship of this company and those of the group if relevant,
 - iii. Description of the quality assurance procedures.
 - iv. Proofs that the tenderer have experience in analysing/ designing and implementing software for system2system communication utilising XML.
 - v. Proofs that the tenderer have experience in designing web applications.
 - vi. CVs of a minimum of three consultants per profile requested (except for web designer ergonomist where a minimum of 1 CVs are required). Regarding senior programmers, at least one of the CVs should refer to an expert in Geographical Information Systems (highly desirable knowledge related to the software products used at EMSA, namely ArcGIS server and Geoserver).
 - vii. For the project manager, senior analysts and web ergonomist expert the minimum requirements are:

Project Manager

Education

- University degree(s) in the IT or Engineering field.
- Excellent English verbal and writing skills.

Professional experience

- More than 10 years of experience (proven experience, not attendance of seminars) including at least 5 in project management positions.
- Experience in systems similar to those of EMSA.
- Experience in trans-European projects and systems concerning the implementation of EU Decisions and Directives.
- Experience in projects involving different countries related to the production of systems and coordination with beneficiaries' personnel.
- Experience in mission-critical trans-national systems.

Senior Analyst*Education*

- University degree(s) in the IT field.
- Excellent English verbal and writing skills.

Professional experience (mandatory)

- More than 10 years in system design (at least 5 years of experience in analysing user requirements and translating them into functional, technical, and testing specifications.
- Proven experience (not attendance of seminars) in business requirements and processes analysis.
- More than 5 years of experience in tools applying UML and RUP.
- Experience in systems similar to those of EMSA, in terms of business logic and used architectures.
- Experience in trans-European projects and systems concerning the implementation of EU Decisions and Directives.
- Experience in projects involving different countries related to the production of specifications, implementation, and consulting of beneficiaries' personnel (e.g. on-site consulting and training of users in the systems specifications in different countries).
- Experience in mission-critical trans-national systems.

Web Designer Ergonomist*Education*

- Degree (minimum 2 years post-secondary), or equivalent background knowledge and experience in communication-related field;
- Good knowledge of English language;

Professional experience (mandatory)

- Proven experience in web design and development of ergonomic charters (the tender should include references to his/her previous assignments and images/screenshots of work delivered).
- Technical expertise in using design related tools, such as Photoshop, Illustrator, Dreamweaver, HTML, CSS, Javascript, Command of multi-platform problems: navigators/OS, XHTML/CSS;
- Minimum 2 years of experience in projects related to ergonomics of operational web-based interfaces demonstrated by the description of the performed projects;

- b) The extent of experience in the projects related to services similar to those described here-in. The tenders should provide evidence of:
 - i. Experience of systems similar to those of EMSA, in terms of business logic and used architectures.
 - ii. Experience of trans-European projects and systems concerning the implementation of EU Decisions and Directives.
- c) Experience of projects involving different countries related to the production of specifications, implementation, and consulting of beneficiaries' personnel (e.g. on-site consulting and training of users in the systems specifications in different countries).
- d) Experience in mission-critical trans-national systems.

These criteria will be evaluated based on a description of the last four major contracts performed during the past three years similar to those described in the tender specifications. Each reference must at least include the following information:

- i. Contract number or reference
- ii. Start and finish date
- iii. Client name
- iv. Volume in Euros
- v. Short description of the services covered by this contract

Bids that do not comply with the selection criteria under 14.4 and 14.5 will not be taken into consideration for the award of the contract.

14.6 Technical and professional capacity – Award criteria

Only the tenders meeting the requirements of the exclusion and selection criteria will be evaluated in terms of quality and price. The contract will be awarded to the tenderer who submits the most economically advantageous bid (the one with highest score) based on the following quality and price criteria and their associated weightings:

1. Quality criterion 1 ($W_1 = 20\%$)

Quality of the team based on the proposed team organisation, the description of the responsibilities of each member within the team and the qualifications of staff members (in this respect the bidders should fill-in the staff list as in Annex B).

2. Quality criterion 2 ($W_2 = 20\%$)

General Project management methodology for the framework contract based on a document describing the project management methodology used by the company per type of task including:

- a. A detailed description for the methodology to be used during the whole lifecycle of the framework contract (including further breakdown and description of the tasks);
- b. Description of the means, tools that the bidder shall use to conduct the activities, including procedures and tools to be used for unit test during FAT tests, as well as the anticipated level of code coverage during these unit tests;
- c. Provision of a table of contents for the key deliverables (referring to the minimum deliverables and reports under point 4.2);
- d. Concrete reference to standards applicable for each type of task.

3. Quality criterion 3 ($W_4 = 30\%$)

Design and implementation of high quality services. To further assess the quality of services that a bidder is capable to produce, the tenderers are invited to provide the following documents (associated with deliveries made under those projects selected by the contractor to demonstrate the extent of experience in relevant project as required in 14.5.b):

- Two examples of system interface documentation provided to customers as part of the design activities associated with at least two of the reference projects.
- One example of the graphic design of the web interface of a service delivered under one of the reference project.

Note:

Tenderers that may already provide services to EMSA under an already established contract should not provide, as examples, documents that are delivered to EMSA for EMSA critical applications. They should provide design documents associated with reference projects conducted for other customers.

4. Price of the bid ($W_{\text{Price}} = 30\%$)

The price of the bid shall be calculated as the sum of the following three prices:

- The fixed price for a contract covering helpdesk and corrective maintenance (referred above in section 12.(bullet point 1) as $P_{\text{corrective-EIS reference databases}}$) for the first year from the launch of the FWC.
- The fixed price for a contract covering helpdesk and corrective maintenance (referred above in section 12.(bullet point 2) $P_{\text{corrective-Pre/existing Software}}$) for the first 6-months period from the launch of the FWC.
- The Price of the following standard scenario for services (P_{Scenario}) that shall be calculated by multiplying the price per person day for each profile by a typical number of persons/days within the standard evaluation scenario.

Table 1 Price calculation - "Standard" Evaluation Scenario

	Price offered / Day / Profile in the bid A	Person days for the price evaluation B	Total A x B
Project Manager	P_M	150	
Senior Analyst	P_{SA}	250	
Web Designer Ergonomist	P_{ERGO}	30	
Senior Programmer	P_{SP}	200	
Programmer	P_P	560	
Quality Assurance Officer	P_{QA}	130	
Network & Security Expert	P_{NS}	50	
Application Engineer	P_{ENG}	400	
Web Designer expert	P_{WEB}	60	
Total for scenario			$P_{\text{Scenario}} = \sum(A \times B)$

The price of the bid constitutes the sum of the prices for points a, b and c as identified above.

Evaluation process

For all bids evaluators will give marks between 0-10 (half points are possible) for each quality criterion.

The score is calculated as

$$S = SQ + SP$$

where:

The average quality for quality criterion i is

$$Q_i = \frac{1}{\text{number of evaluators}} * \sum_{\text{evaluator}} \text{mark of the evaluator for quality criterion } i$$

The overall weighted quality is

$$Q = \sum_i Q_i * W_i$$

The score for quality is

$$SQ = \frac{Q}{Q \text{ of the bid with highest } Q} * 100 * \sum_i W_i$$

The score for price is

$$SP = \sum_i \frac{\text{lowest Price}_i \text{ of all bids}}{\text{Price}_i} * 100 * W_{\text{Price}_i}$$

Only bids that have reached:

- a minimum of 50 % for Q_1 ,
- a minimum of 50 % for Q_2 ,
- a minimum of 50 % for Q_3 ,

will be taken into consideration when calculating the score for quality SQ , score for price SP and score S .

Only bids that have reached a minimum of 70 % for the score S will be taken into consideration for awarding the contract.

15. Contracts will not be awarded to tenderers who, during the procurement procedure:

- a) are subject to a conflict of interest
- b) are guilty of misrepresentation in supplying the information required by the contracting authority as a condition of participation in the contract procedure or fail to supply this information.

16. False declarations

Without prejudice to the application of penalties laid down in the contract, tenderers and contractors who have been guilty of making false declarations concerning situations referred to in points 14 and 15 above or have been found to have seriously failed to meet their contractual obligations in an earlier procurement or grant shall be subject to administrative and financial penalties set out in Article 145 of Commission Delegated Regulation of 29.10.2012 on the rules of application of Regulation (EU) No 966/2012 of the European Parliament and of the Council on the financial rules applicable to the general budget of the Union.

17. Intellectual Property Right (IPR)

Please consult the contract for IPR related clauses.

If the results are not fully created for the purpose of the contract this should be clearly pointed out by the tenderer in the tender. Information should be provided about the scope of pre-existing rights, their source and when and how the rights to these rights have been or will be acquired.

In the tender all quotations or information originating from other sources and to which third parties may claim rights have to be clearly marked (source publication including date and place, creator, number, full title etc.) in a way allowing easy identification.

18. Special negotiated procedure under Article 134(1)(f)

EMSA may at a later stage exercise the option to increase the estimated value of the contract via negotiated procedure with the successful tenderer in accordance with Article 134(1)(f) of the Rules of Application to the Financial Regulation

19. List of Annexes

Annex A: SafeSeaNet Application Overview

- Appendix A: SSN EIS System Design Document applicable to SSNv3.0
- Appendix B: SSN SDDb applicable to SSNv3.0
- Appendix C: SSN IFCD applicable to SSNv3.0
- Appendix D: SSN XML Reference Guide v3.02 (version applicable to SSNv3.0)
- Appendix E: CSD System Interface Guide applicable to the on-going MS pilot project
- Appendix F: SSN Design Documents that could be made available to bidders on request
- Appendix G: EMSA RFS for the implementation of the SSNv3.1 release

	<ul style="list-style-type: none"> • Appendix H:EMSA RFS for “Upgrades to the Central Organisation Registry of EIS for the implementation of a Shore-based Traffic Monitoring and Information Database (STMID)”
Annex B	Template for Staff list for the FWC
Annex C:	Working Procedures for Helpdesk and Corrective Maintenance Services
Annex D:	Work procedures for specific Request for Services and Project Delivery
Annex E:	Code Upgrade and Code Merging procedures
Annex F:	EMSA Procedures related with service transition and service operation <ul style="list-style-type: none"> • Appendix A: Change Evaluation Management • Appendix B: Release and Deployment Management • Appendix C: Service Verification, Validation and Testing • Appendix D::Service Asset and Configuration Management • Appendix E: Event & Incident Management • Appendix F: Problem Management
Annex G:	SSN Ecosystem - Guiding principles for system architecture