Towards integrated European marine research strategy and programmes

Seas-era

EUFP7ERA-NET

http://www.seas-era.eu

# General concept of the CommonProgram

WP 2-Task 2.1

*Part of D.2.1.1*

October 2011

ANR/Ifremer

# General concept of the Common Program

**Grant Agreement n° 249552**

**Acronym: SEAS-ERA**

**Title: Towards Integrated Marine Research Strategy and Programmes**

WP 2:Common Program
Task 2.1:Inventory of Research, Monitoring and Technological programmes ans identification of the commonalities and gaps
Task Leader/Author: ANR/Maurice Heral & Ifremer/Sophie Sergent
Deliverable N°:Part of D.2.1.1
Due date of deliverable: M18
Actual submission date:M18
Security: PU

| Document Information | |
|---|---|
| **Document Name** | General concept of the Common Program |
| **Document ID** | SEASERA_WP2_Part of D 2.1.1 |
| **Version Date** | 31/10/11 |
| **Task Leader** | ANR |
| **Author/Organisation** | ANR/Maurice Heral – Ifremer/Sophie Sergent |
| **Security** | PU |

| History | | | | |
|---|---|---|---|---|
| **Version** | **Date** | **Modification** | | |
| 1 | 31 October 2011 | Final Version | | |
| | | | | |

| Diffusion List | | | | |
|---|---|---|---|---|
| | | | | |
| | | | | |
| | | | | |


**Summary**

The main objective of the report is to aim at a clear definition of the concept of Common Program, explain the step by step approach towards common program, propose to identify and define key conditions for success and what could be the added value.

First the Background on Common Program has been analyzed within the EU systems, instruments such as ERA-Nets, JPI, EUROCORES and other organizations such as Marine Board, EFARO and ICES.

Secondly, the outcomes of the experience of the ERA-Net MariFish which has the experience of developing common activities at the regional level or at pan European scale are very relevant. The collaborationdeveloped through MariFish has set a firm foundation on which further collaboration can be built in the Seasera project.

The report provides useful information and good practice to future projects and initiatives. A five steps process to design Common Program is described.

In the last part of the report, the authors, having taken into account the S.W.O.T analyses of the previous experience, explain the difficulties to build Common Programs in relation with the partnership composition of all the ERA-Nets.The analyze also shows that it is easier to have efficient collaboration at the regional level based on the greater interest of the actors involved.

Therefore, in this period of decreasing budget dedicated to science, it is requested to make the most efficient use of investments in research. Indeed, a reflection should be engaged on how to better join efforts, human and infrastructure resources to be able to keep pace with these challenges.

So one of the goals of the Seasera project will be to demonstrate the feasibility and effectiveness to work together though Common Program at regional and Pan-European level.It is obvious that the cooperation has a cost and different ways of co-founding must be identified.

**General concept of Common Program Report**

**CONTENTS**

# Introduction

This document elaborates a general procedure for the adoption and implementation of Common Programs.

One core aim to be achieved in the Seasera project is to foster synergies, mobilizing non-competitive funds for research in a more coordinated way through Common Programs at regional and pan-European level, opening to excellent high level research collaboration. The WP2 in Seasera is in charge of designing Common Programs. The global objective is to push national programs toward European collaboration to increase coordination and collaboration between the major Research Performing Organizations (RPOs).

The main rationale of the report is to propose a clear definition of the concept of Common Program, to explain what a step by step approach towards Common Program is and to propose to identify and define key conditions for success and what could be the added value.

# 1. Background on Common Program

## 1.1 - EU systems and instruments

The objective of the ERA-Net scheme is to step up the cooperation and coordination of research activities carried out at national or regional level in the Member States and Associated States through i.a. the:

- Networking of research activities conducted at national or regional level, and
- Mutual opening of national and regional research programs.

The scheme will contribute to make a reality of the European Research Area by improving the coherence and coordination across Europe of such research programs. The scheme will also enable national systems to take on tasks collectively that they would not have been able to tackle independently.

Both networking and mutual opening of programs require a progressive step by step approach. The ERA-Net scheme therefore has a long-term perspective that must also allow for the different way that research is organized in different Member States and Associated States to merge to a consensual base for common management.

**Furthermore, drawing up Common or Joint Program in the ERA-Net scheme is innovative and it can be considered that it is still at the experimental level.**

It is not really possible to exchange good practices, views, processes and results with other ERA-Nets, as the general case in the ERA-Net scheme is rather to draw the setting up of a joint research agenda, on which are based joint calls to develop new funding program. In contrast important progress will be to build a further network, to share information on success factors, with the rare ERA-Nets which achieved to manage Common Program.

As few ERA-Nets develop “joint action plan” which will ultimately lead to a new RTD program based upon cooperation, it could be considered that for these reasons, the EU created the articles 169 (now 185) to enable their development.

An analysis of the **Baltic 169 initiative**, BONUS,shows that it isdeveloping an ongoing stronger cooperation. It is important because the partners have achieved to establish a regional strategic research agenda coupling Common Programs and new projects funded by different calls. In these cases the Common Programs are co-funded by national contributions and by EU funds.

**In EUROCORES** scheme, the initiative to increase coordination was a "bottom-up" approach for proposals to initiate new collaborative research programs dealing with broad and complex topics which were best addressed through multinational cooperation. Through annual calls for theme proposals, ESF solicited new ideas from the scientific community with a view to creating large-scale European Collaborative Research programs in and across all scientific domains. The EUROCORES scheme aimed at providing an effective and efficient need-driven collaboration mechanism at a multinational level within Europe, which can be responsive to the emerging priorities of national funding agencies within the ESF membership. It built on existing national structures and maximized their value through collaboration while leaving funding 'ownership' with the national agencies. But to be efficient in the networking, ESF gave a budget of roughly 1M€ by network to support the extra costs of the international cooperation of the collaborative projects.

**EUROMARINE,** the network of network of excellence in Marine research, is composed by senior scientists who do not represent any institution. It could explain why only a few common projects mainly based on Human Capacity Building are developed when budget-lines are co-funded by the Commission.

For all the others EU instruments which promote networking like **EUREKA or the Technology Platforms**and even the large scale infrastructure (ESFRI),the extra-costs of cooperation are supported by specific funds.

Within the **Joint Programming Initiative concept**, the marine one, “Healthy and Productive Oceans and Seas”, is just starting and has not yet defined its way to implement Common Programs. There is an absolute need and mainly to work together on the same line closely connected with Seasera project.

The present experimental approach of building Common Program within the ERA-Net process could be the first brick of Joint Program. Joint Programming Initiatives offer the opportunity for a more efficient utilization of scarce resources and for bringing a new dimension to European research by aligning national programs across participating countries, thereby contributing to the development of the European Research Area in addressing major societal challenges. By working together around a common vision and a strategic research agenda, by pooling together limited resources, the Member States will be able to make significant contributions to research by avoiding duplication, filling gaps and creating critical mass. This will increase the visibility and impact of the European research at the international level. The commitment of the Member States is critical for establishing a long-term large base research endeavour, which in turn will foster innovative, high impact research in Europe. For example, the main objective of FACCE-JPI (agriculture) is to align national programs across participating Member/Associated States to address the research questions defined in the

strategic research agenda and to “share the burden”. To this end, participating Member/Associated States have shown a great willingness to work together and to advance rapidly. This wish to progress quickly is demonstrated by the preparation of a pilot joint action expected at the end of 2011 and by the use of a new JPI-specific instrument known as a FACCE-JPI Knowledge Hub. This first pilot action will show the way for future, more large-scale calls, but beyond joint calls, the Governing Board is thinking about other ways to build a common research agenda. A project life cycle is also proposed that will harmonize methodologies and data analysis and will provide interoperability between databases. It is important to note that for the pilot action and the project a budget funded by a low contribution of the Members States is identified to support the extra cost of the cooperation.

In the EU systems and instruments, to increase cooperation and collaboration through Common Programs or analogues, a budget line is alwaysassociated for the duration of the action.

### 1.2 - Other organizations

**The Marine Board -ESF**, established in 1995, is a network of 30 leading European Marine Research Institutes from 20 European countries. The Marine Board is actively involved in promoting the marine research agenda at both European and Member State levels and in fostering research cooperation between its Member Organizations and Member countries. The Marine Board has had significant input to the European Research Framework Program Agenda and to the recent European Strategy for Marine and Maritime Research (2008) through strategic position papers and through the influential Galway, Aberdeen and Oostende Declarations. But the Marine Board has not managed to build cooperation in implementing collaborative programs.

**The European Fisheries Aquaculture Research Organizations** (EFARO),established in 2004,is a network of the directors from 25 research organizations, working in the area of Fisheries, Aquaculture, Seafood processing and Marine Environment. Its goal is to share the best practices and knowledge between the research institutes, to achieve some foresight studies and to promote them to DG Mare and DG research. EFARO also facilitates scientific collaboration between its members in the European Research Area, connecting its members to elaborate common proposals. But the network has not managed to build Common Programs even if the members have dedicated budgets to facilitate the cooperation.

Since 1902, **the International Council for the Exploration of the Sea** (ICES) coordinates and promotes marine research on oceanography, the marine environment, the marine ecosystem, and on living marine resources in the North Atlantic. Members of the ICES community now include all coastal states bordering the North Atlantic and the Baltic Sea. ICEScooperateswith organizations and institutes on an international scale. It is a network of more than 1600 scientists from 200 institutes linked by an intergovernmental agreement between the 20 states (the ICES Convention) to add value to national research efforts. Scientists are working through ICES to gather information about the marine ecosystem. Besides filling gaps in existing knowledge, this information is developed into unbiased, non-political advice. The 20 Members countries that fund and support ICES use advice from ICES to help them managing the North Atlantic Ocean and adjacent seas. ICES is the prime source of scientific advice on the marine ecosystem to governments and international regulatory bodies that manage these ecosystems. Its secretariatmaintains some of the world’s largest databases on marine fisheries, oceanography, and the marine environment, and its Data Centre is part of a global network of distributed data centres. ICES coordinates collaborative programs at national

expenses with success because the programs are mainly governed by advice on fisheries, ecosystems and environment for its members, for EU commissions, for all the other regional organizations and for the Oslo, Paris and Helsinki conventions.As all the members states are committed to produce this advice, they find it more convenient, efficient and scientifically more credible, to participate in the cooperative works even if the cooperative programs are not funded. In that case the environmental and fisheries commitment is so strong that it can force the Members states to cooperate. But ICES is not anEuropean institution. It is involved for example in North America and Russia.

**There are strong opportunities for EU instruments to develop Common research Program avoiding overlapping in relation with the request of the policies.**

## 2. The statement of fact for Common Program in ERA-NET

The proposed definition and processes described in this report result essentially from the experience the consortium has gained during the course of the ERA-Net MariFish(*), an ERA-Net which has experienced thedeveloping of common activities at the regional level (Channel or Mediterranean) or at a pan European scale (discards, ecosystem indicators, climate change impacts on marine ecosystems).

*(*) MariFish was a five year EC funded ERA-NET project with a budget of €3 million, composed of 18 European partners from fifteen European Union (EU) Member and associated states. It aimed at improving collaboration between the funders of marine fisheries research by providing opportunities for fisheries managers to work together in a partnership.*

In 2008, the eighteen partners in MariFish noted that they had a collective yearly marine fisheries research budget of€190m, potentially enabling collaboration to become an important way to avoid duplication and to gain a better outcome from the investment in of each country

In the second phase of the project [2008-2010], there was an increased focus on how partners would be able to collaborate by developing shared research projects, to maximize the impact of the research carried out at national and regional level.MariFish partners discussed the practicalities of making their existing research programs more collaborative and complementary, they identified common research themes or regional areas of interest and consequently developed five Common projects.

All the countries represented in MariFish have put in common, after a detailed inventory of their projects and on a voluntary basis, the different approaches developed in their national programs by the most relevant national marine research organizations. In 2008, they signed Memorandum of Understanding (ex MOU in annex) to set out the practices and procedures for working together and continuing their collaboration after the end of MariFish.

The collaboration undertaken within the MariFish programs has extended outside the strict focus of developing Joint research Projects. It has included developing detailed databases on current research to help identify common priorities and avoid duplication. Agreement has been reached on sharing data on fishing vessel activity in the Channel and on ground fish surveys in parts of the Mediterranean. Gear technologists and modellers have been brought together to share their experiences, in the context of fisheries management's need for improved science. Future research

needs and scope for collaboration have been identified through focused workshops, for example on integrated ecosystem models and indicators for inshore and deep waters.

To illustrate the approach developed in a regional case study on the Mediterranean, different key stages have been identified: (i) identification of national research priorities by the funding agencies, (ii) establishment of data base on the on-going research projects by all the actors, (iii) identification of the very detail project on "Essential Fish Habitat of small pelagic, anchovy and sardine, in the Mediterranean Sea". Progress has been made to identify areas in the Mediterranean considered as essential habitats for anchovy and sardine to predict their temporal (seasonal and inter annual) variation in relation to environmental parameters. The identification of these areas was achieved by integrating existing and new knowledge, for example acoustic surveys, satellite environmental data, advanced statistical analysis, GIS techniques and the presence/absence of each species. Using these techniques, the Spanish and Greek teams were able to produce first common results for the summer and winter surveys, 2002-2007, in the Aegean Sea and Spanish Mediterranean waters. Later the success attracts other teams such as Italian, French and Croatian. Results included models and maps of critical spawning, juvenile and adult habitats for anchovy and sardine species in all the Mediterranean Sea with the factor of temporal persistency included. In that case, it has been clearly demonstrated, that at the regional level, the exchange of data, of good practices and of software for modelshas been very efficient with several innovative international results published in good journals and with practical applicable for the fisheries managers.

# 3. Conditions to design Common Programs in ERANETs

## 3.1 - Common program is cooperation among national programs already funded.

By cooperation, it is intended a junction of some national programs funded through their national marine research organizations (Operators – RPOs), in a view of contributing collectively to Common research Programs.

Thereby research programs carried out at national or regional level should have the following characteristics:

- be strategically planned, i.e., should be composed of a number of research projects focused on a defined subject area or set of problems, scheduled to run for a set dedicated period of time and have a coordinated management;
- be carried out at national or regional level, and
- be already fundedby national or regional public bodies(*)

The major objective is to push these national programs to build collaboration at European level, based mainly on non-competitive funds to increase coordination and critical masses among the major Research Performing Organizations (RPO) of the EU.

*(*) in major cases the funders of national programs are:*

- *Ministries*
- *Government or regional authorities*
- *Research Council or agency*
- *Research Foundation*

The overall aims of Common Program are to foster practical cooperation between Partners on existing or planned research programs, and to improve the collaboration between scientific institutions in Europe where appropriate, and to introduce more complementarity among the national Programs.

The aim behind this challenge is to try to move closer together important areas of research already funded by partners. By experience it appears that many of the research challenges are common across Europe. Therefore, working collaboratively will bring added value and benefits.

### 3.2 - Common program is different than bilateral cooperation

A common Program does not seek to substitute bi- or multi- lateral initiatives or projects, but aims at harmonizing and clustering existing joint research priorities already developed at the regional and pan- European level.

The implementation of Common Program requires a minimum of three countries involved.

The most optimal implementation way could be the regional level with the involvement of all the countries which are sharing the same sea for the same management purposes.

Common Program looks at increasing multinational cooperation and aims at considering regional focus and/or topical thematic issues. In addition, it can induce structure changes between the different RPOs, such as sharing and specialization of some tasks, the creation of virtual laboratories (and later merged into single location), the sharing of different expertise and the achievement of critical masses.

The regional approach between the Member/Associated States in Common Program is a practical way to involve non-EU countries. It has been achieved in ARIMNet with the countries of the south of Mediterranean Sea.

### 3.3 - Methodology: step by step approach to implement Common Program

Based on the previousexperience, it isproposed to implement Common Program at both regional and Pan-European levels in a way that ensure that the priorities and interests of all partners are taken into account. The general guidelines proposed below set out different stages and different levels of involvement of the various actors.

BuildingCommon Programs is a step by step approach that requires investment from the partners, an important communication, involving ministries, funding agencies, research operators and experts. The roles of each actor must be well defined in a participative way.

It is a step by step approach also to translate the strategic research agenda of the ERA-net and also of the JPI into a list of eligible Common Programs.

#### 3.3.1. Common research theme to develop collaboration

In general, the ERA-Net projects focus mostly on updating inventory and analysis of existing national and regional science and technology plans and strategic priorities of partners (in general RFOs)at the pan-European and regional level.

One part of this exercise may help at informing the development of Common Programs taking into account the definition of common themes priorities to be addressed at European and regional levels by the major marine and maritime research components.

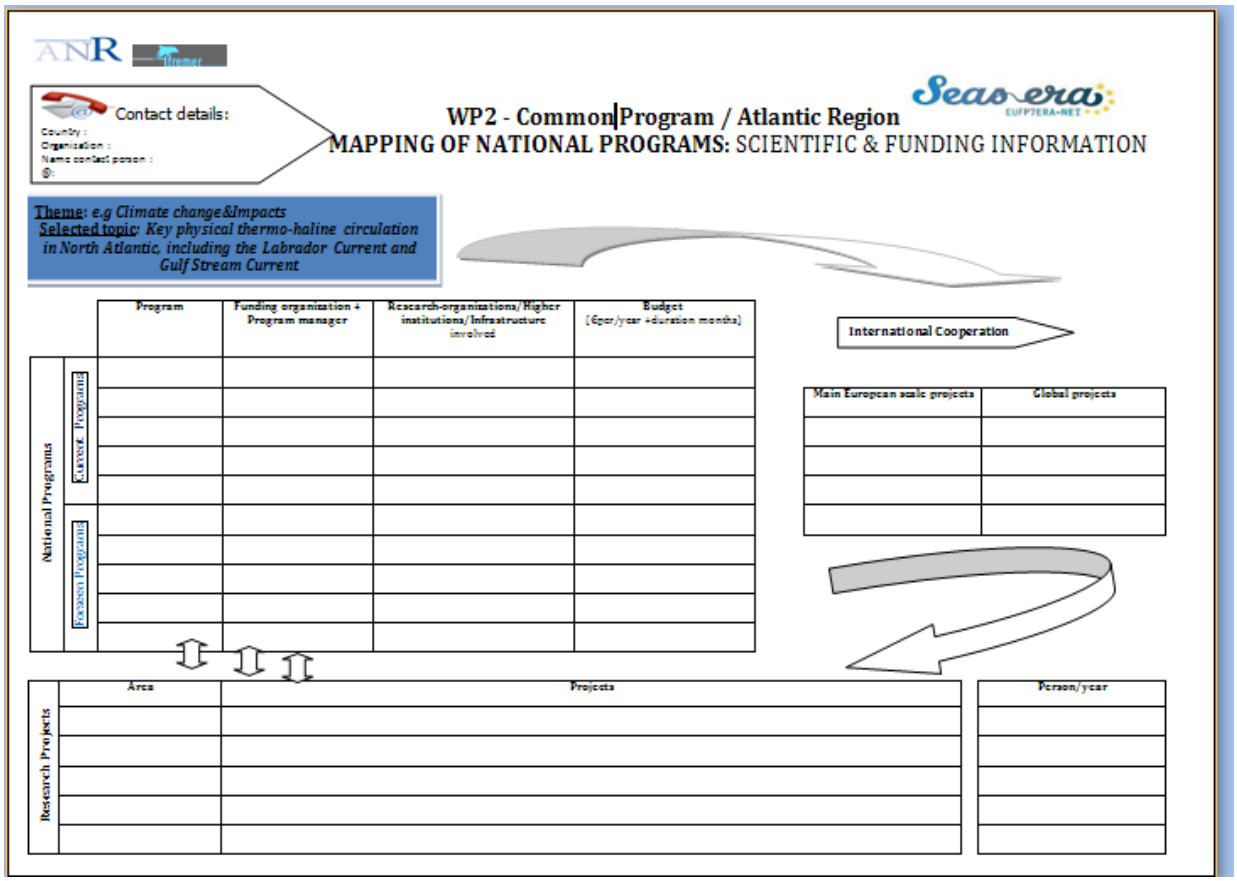
Indeed, by comparing the national priorities, the analysis allows to identify common themes considered necessary to be developed collectively. Then a negotiation phase is necessary to obtain a consensus on so called “selected topics” for further collaboration.

### 3.3.2. Inventory of National programs and projects on the selected topic

It is proposed on the selected topic, an inventory and an identification(*) of existing national programs/projects and the planned programs/projects for the next four years by the national research performing organizations.A detailed analysis of the existing research leads to identify the contents of the Common Program.

(*) The requested and necessary information is the following mapping areas against current research on the selected topic:

- ✓ Current programme/projects
- ✓ Planned programs/projects
- ✓ Funding organization/Program manager,
- ✓ Research-organizations/Higher institutions/Infrastructure involved - person/year,
- ✓ International and European cooperation




*Ex proposed support for the inventory – Seaseara Common Program Atlantic region*

The mapping of the national programs/projectsfor each partner will address the partner/country profile and the European added values for designingCommon Program.

#### 3.3.3. Work up into detailed plans using Experts groups to build the Common Program content

In the Common Program approach, the network is a close co-operation between funding agencies, managers, RPOs and leader scientists and/or Experts

The RPOs that perform the national program have to be involved in the elaboration of the precise content and in the discussion on how the national projects could be interlinked and what areas would be most valuable for collaboration.

In the general case, the scientific leadersand national expertsfrom a research organization participate in the drafting of the Common Programs.

The mapping of the existing national programs/projects on the selected topic (3.3.2) and the Experts group results (3.3.3) will be used to define the content and the agenda of the Common Programs.

#### 3.3.4. Development and implementationof the Common Program

The partners involved in Common Program sign a Memorandum of Understanding that set out what would be achieved and the modalities for partners to work together.The MoU is a mutual statement of intention among the partners agreeing to make efforts to fulfil their intentions and which also establishes the nature of the agreed collaboration in terms of resources shared and practical interactions between project participants. It could normally besigned for the total duration of the program even if it lasts longer than the duration of the ERA-Net.

A Steering Group is created including the leading scientific actors as well as the concerned partners of the ERA-Net to follow up the results and to achieve continuous improvement of the collaboration.

The follow up of the activities is an important process with periodic analyses of the reports of the results of the Common Program.

#### 3.3.5.Knowledge management

It is essential to implement communicationto the Members countries, to the stakeholders and to the general public the resultsthrough the Seasera web site or all other appropriate means.

# 4. Proposals to go further in Seasera ERA-Net

## 4.1- Taking into account the previous experience of ERA-Net

A S.W.O T (Strengths, Weaknesses, Opportunities and Threats) analysis has been performed to identify key problems or success stories of Common Program developed within the MariFish ERA-Net *(Héral and Sergent 2010 - D-7.6report MariFish)*. The results of this swot are the following:

#### 4.1.1 Strengths

*The Network*is (i) a close co-operation between scientists, funders and policy - makers, the forum increases the culture of trust, (ii) improves communication and strong relationships between funding

agencies, managers, RPOs and scientists, (iii) brings the EC closer to the scientists, (iv) a real long term Network closer to the scientists –and acts by signing MoU as a catalyst for long term agreements despite the end of the ERA-Net

The Network's funds: the network develops operational research funded by the national budget owners and a part of the cooperation costs is supported by the EU. The partners are budget holders so they are committed to deliver practical results

*The collaborative work*

- Learn experience from each other to overcome difficulties
- Build upon on-going projects: increase efficiency
- Find advantages to work together (1+1>2)
- Linkage between Fisheries Policies and Marine Strategy Framework: increase convergence
- Help to provide a critical mass, identify research gaps, fill the gaps and avoid duplication of work
- Provide access to the infrastructure, technologies, and good practices of other countries
- Favour data exchanges and common database
- Address regional dimension for scientific and management reasons
- Provide access to national funds for scientists to carry out smaller cooperative projects than those normally commissioned by the EC
- Focus on specific areas; making decisions more likely, more effective and responsive

#### 4.1.2. Weaknesses

*Institutional problems:*

- Difficulties to involve Ministries, Funding agencies and Research organizations at the right level
- Long time to identify common real priorities and to build Common Program
- The priorities of all countries may be not the same
- Lack of consistency between MariFish partner institutions, Ministries / Funding agencies
- No real national connexion between funding agencies and RPOs: loose commitments
- Insufficient level of representation for funding agencies and RPOs in the Network
- Not all the EU countries have been involved
- The focus on fisheries should benefit from experts from other disciplines to encourage the ecosystem approach

*Funding issues:*

- Difficulties in raising awareness and mobilizing resources to implement the projects in particular with the decrease of national budgets
- Research is now organized by projects funded from different sources including competitive money
- Not enough research time allocated, time available from experts is an issue with the lack of funding
- Lack of dedicated resources for future cooperation

*Communication:*

- Time needed to communicate with all the actors on the concept of joint program and how to build it and the benefits expected, many actors to convince

*Necessary complementarities*

- Possible overlap with ICES, DG MARE (DCF) and DG RESEARCH in evaluating the gaps

- Possible overlap with projects already funded by the E.C.

#### 4.1.3. Opportunities

*For research and strategy:*

- Joint Programming Initiative on “Healthy and Productive Seas and Oceans” is the way forward to benefit from the experience gained
- Possibility to encourage researchers to collaborate from the start of a project
- Better connecting the application of the Marine Strategy Framework Directive (MSFD)
- Better coordination of research programs at the regional level in relation with national funding difficulties will decrease the costs
- Facilitate data exchange between researchers in different countries, possibly through contractual obligation, to increase data usage
- Provide resources for scientists to communicate their work and knowledge
- Develop knowledge at a European rather than national scale and creating a space for more coordination
- Increase communication visiting some actors [RFO,RPOs] to explain the Common Program approach
- Possibilities to involve the RACs as regional stakeholders
- Increase partnerships in the Med and in Black Sea where its lack is more important

#### 4.1.4. Threats

- Conceptual issues are difficult to communicate except to real experts
- Need to find a niche or funds in order to continue the collaboration
- Processes or structure becoming too complicated,
- Available funds to communicate with a broad audience not identified

#### 4.1.5. Conclusions of the S.W.O.T

It has been demonstrated that Regional approaches could be successful to build cooperation on a long-term perspective because the states have common interests in managing the same sea and science.Furthermoremultidisciplinary approach is easier to implement at the regional level and to build critical masses of scientists is more feasible as well as sharing data and infrastructure.But the main weakness is due to the new way of research funding. Funds are more and more based on competitive funds.

Therefore, in this period of decreasing budget dedicated to science, it is requested to make the most efficient use of investments in research. Indeed a reflection should be engaged on how to better join efforts, human and infrastructure resources to be able to keep pace with these challenges. In the RPOs, there is now a lack of dedicated funds for future cooperation.

There is also an important institutional problem as Common Program approach absolutely requires working in close connection between the management actors, funding agencies and research organization which are not formally involved in ERA-Nets. In theory ERA-Nets are built on the concept that the Ministries and the funding Agencies are controlling all the national research activities. But the reality is different from one country to another. Innovative research is often independent from the Ministries.

### 4.2 - Challenges for Seasera project

A general analysis of the application of the Common Program has clearly demonstrated that this concept is difficult to be applied in reality without extra funding. Nobody has achieved to develop them in a long perspective except ICES which benefit from the members being committed by regional authorities to produce advice. Furthermore,all the ERA-Net structures are not well designed to achieve this task due to the fact that the partnerships with the funding agencies are adequate to co-fund calls but not relevant to build collaborative project without extra funding. The absence in all the Era-Nets consortia of the actors of the Common Program represents the major difficulty.

Nevertheless, the ERA-Net Seasera will try to demonstrate that by following the steps methodology, it could be possible to implement regional case studies as common scientific interest could be stronger to mobilize the scientific community.

Two topics have already been discussed and selected and their implementation is in process for the Atlantic and Mediterranean regions:

- ⇒ For the Mediterranean region: how the climate change impacts physical circulation? and consequences for the biochemistry cycle
- ⇒ For the Atlantic region: Key physical thermo-haline circulation in North Atlantic, including the Labrador Current and Gulf Stream Current.

The proposed way to push forward a topic at the pan-European level could be to follow ICES success story by promoting a research topic in relation with EU commitments to the Member States. Both the Green Paper on CFP reform and the Marine Strategy Framework Directive highlight the need for better support from science and by scientific advice. Research topics to define the content of the“good environmental status”, could be a possible way to find a common pan-European program by avoiding overlapping of work achieved under the coordination of DG Environment or DG Research.

Seasera project will seek to work with the main actors involved in research, beyond the only ERA-Net consortium but with its support, to build effective collaboration around this concept of Common Programs to address significant advances as a part of the construction of the JPI Oceans.

## 5. Conclusions

The implementation of Common Programs within ERA- Nets or JPI are an important opportunity to build more collaboration in the ERA, opening of national programs, pooling of resources, improving cross border cooperation and obtain critical masses in a way to increase research efficiency and innovation. Common Programs are a long term process. At the first phase of development, they cost extra money to the Member States to support all the cooperative actions (i) for projects designing, (ii) for implementation of the work, (iii) for production of publications and relevant advice. Return of investment will be obtained only at the second phase, when the projects after several years of close cooperative work will produce innovative results. Meanwhile, at this stage, funding could be obtained through national or international competitive calls. A mechanism to support the financial effort at the initial first stage has not been yet taken into account at the EU level and MS level, crucial issue during a period of funding crisis.

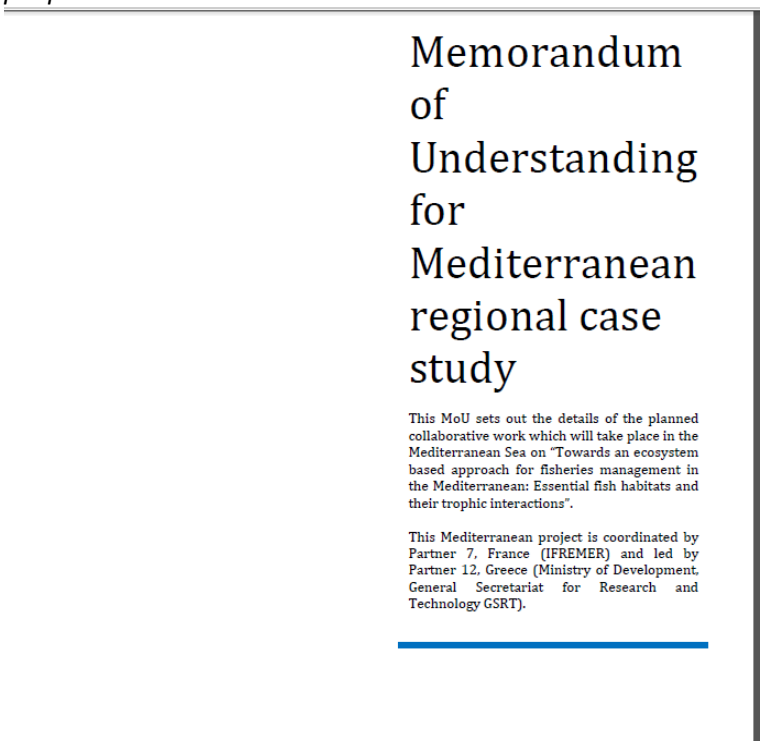
To finance the first phase, it could be explored ways to allocate a dedicated EU budget within the ERA-Net or to initiate calls between the funding agencies to support these cooperation costs.

Recently the Communication "Partnering in Research and Innovation" has emphasized the need for long-term commitment from all Member States through multi-annual financial commitments and a simplification of the partnering landscape. This will be achieved at least partially through the creation of a new single and more flexible type of ERA-Net that combines features of ERA-NET and ERA-NET Plus schemes. It was also suggested that in the future, EU funding may be conditional on appropriate application of the voluntary guidelines known as the “Framework conditions”. These evolutions are in agreement with the conclusions of the present report. The requested flexibility must allow a partnership with the RPOs. The new instrument will have to facilitate not only the production of calls but also to consider and promote the favorable conditions for Common Programming.

---

## ANNEXE 1- ERA-Net MariFish
## Memorandum of Understanding for Mediterranean regional case study

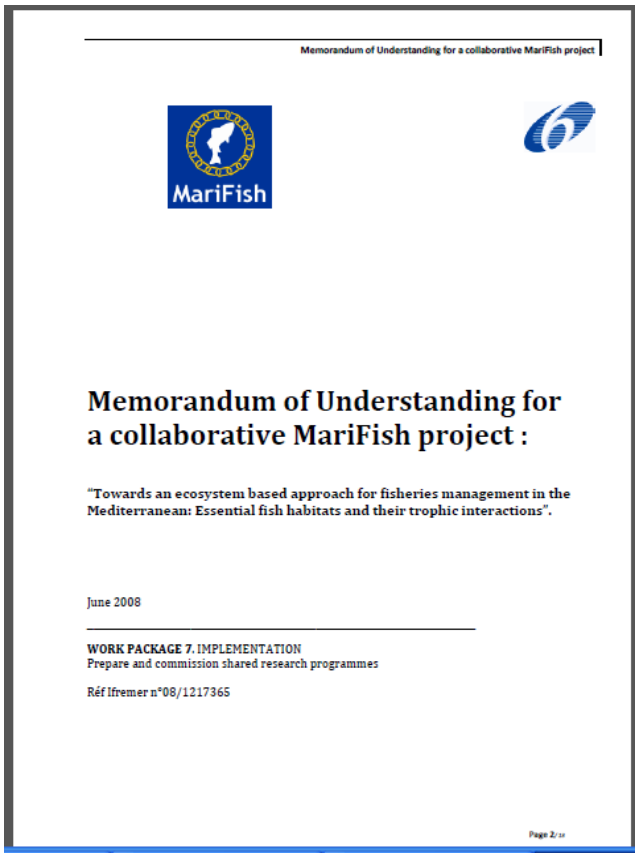
*Note: for WP7 collaborative project in Mediterranean Sea – Task " Essential fish habitat of small pelagic" - in 2009Italy and Croatiahave joined the Common Program as associated partner and through the operators CNR-IAMC & IOF-Split – The group is now composed between 15 and 18 people involved in the work*



Memorandum of Understanding for Mediterranean regional case study

This MoU sets out the details of the planned collaborative work which will take place in the Mediterranean Sea on "Towards an ecosystem based approach for fisheries management in the Mediterranean: Essential fish habitats and their trophic interactions".

This Mediterranean project is coordinated by Partner 7, France (IFREMER) and led by Partner 12, Greece (Ministry of Development, General Secretariat for Research and Technology GSRT).



Memorandum of Understanding for a collaborative MariFish project

MariFish

**Memorandum of Understanding for a collaborative MariFish project :**

**"Towards an ecosystem based approach for fisheries management in the Mediterranean: Essential fish habitats and their trophic interactions".**

June 2008

**WORK PACKAGE 7.** IMPLEMENTATION
Prepare and commission shared research programmes

Réf Ifremer n°08/1217365

Page 2/

**Between :**

**The MariFish members interested in the management and the development of a transversal research programme in the Mediterranean regional case study are : France, Greece and Spain :**

- French Research Institute for Exploitation of the Sea (Ifremer), France

  and,

- Ministry of Development, General Secretariat for Research and Technology (GSRT), Greece

  and,

- The Ministry of Science and Innovation, (MICINN), Spain

**referred to hereinafter as «the Partners».**

---

**This MoU is a mutual statement of intention among the Partners. It is not intended to be, and shall not constitute in anyway, a binding or legal agreement, or impose any legal obligation or duty on any Partner. But the Partners agree to make all reasonable efforts to fulfil their intentions herein.**

**Preamble**

The ERA-NET scheme is an innovative component of the European Union's Sixth Framework Programme providing funding to improve the cooperation and coordination of national research activities and thus strengthen the European Research Area (ERA).

Supported under the ERA-Net scheme, the MariFish network began its activities in January 2006. Members of the network aim to strengthen the links between European marine fisheries science and fisheries management.

MariFish work package 7 is looking at increasing multinational cooperation at a regional scale and aims to consider regional and/or topical thematic issues. It will achieve this through the development of five collaborative projects. The MariFish Steering Committee has agreed that the Mediterranean Sea is a suitable candidate for a collaborative regional project.

**1 - Purposes**

The purpose of this Memorandum of Understanding, hereafter called MoU, are to facilitate:

- the identification of existing programmes and the planned programmes for the next four years by the different national institutes,
- the specification by the funding agencies of their requirements and priorities for research,
- the development of a transversal programme in this area to be applied to different species and different areas of the Mediterranean Sea, *as described in annex 4,*

This MoU also establishes the nature of the agreed collaboration in terms of resources shared and practical interactions between project participants.

**2 -Geographical area**

This MoU relates to the ecosystem approach of fisheries management in the "Mediterranean Sea", including Western and Eastern Mediterranean.

The geographic areas and particularities for the pilot project execution are based on ongoing research projects in the member states, the existence of data time series from previous scientific work and the general research and scientific interests for all participating member states.

**3- Commitments of participants**

3.1 All the MariFish members that are identified as "Partners" in this MoU have a major interest in fishing activities in the area and have signed this MoU,

3.2 Some other MariFish members interested in the development of the concept of regional collaboration in the area could be identified as "observers" and could signed this MoU. They could attend the Scientific Committee and the Joint Management Committee *(annex 1.)*.

3.3 Other Mediterranean Countries, not members of MariFish, developing fishing research programme in the area, are encouraged to participate in the study (sign the MoU if they wish), as Associated Partners. They could attend the Scientific Committee and the Joint Management Committee *(annex 2.)*.

**4- Principles**

The principles of this MoU are the common interest of the Partners in combining national programmes in the Mediterranean Sea in order to :

- Develop innovative concepts :
  - avoid duplication,
  - share expertise,
- Contribute to the management of the same ecosystem with the same fish and shellfish stocks.
- Increase scientific cooperation by :
  - exchanging information on the national priorities, on a regular basis and through appropriate means,
  - mutual use of the facilities and instruments of each partner,
  - sharing the knowledge, the data, scientific cruises,
  - organizing workshops and symposia on topics of mutual interest.
- Exchange respective expertise in personnel including junior and senior scientists and technical experts.

The Partners have identified the national marine research organizations which will contribute to common research programmes through studies and expert assessments *(referred as «the Operators» in annex 3.)*.

The Partners agree that funds will be made available in order to develop cooperation, to carry out the project meetings, to communicate regularly, to maintain systems, to exchange students etc as appropriate. Partners can contribute either financially or through the provision of infrastructures and/or resources.

Depending on requirements, the Partners accept the principle of a call that may be proposed by the management committee, to fund collaborative activities and possibly to propose research topics for thesis, post-doctorate or employment contract, and funding workshop facilities.

**5- Procedures**

**5.1. Defining the topic**

The Partners intend to develop a joint regional programme on the following topic :

**"Towards an ecosystem based approach for fisheries management in the Mediterranean: Essential fish habitats and their trophic interactions"** *(details are specified in annex 4.)*.

**5.2. Management for the "Mediterranean" regional case study**

***5.2.1 Joint Management Committee***

The Partners agree on the creation of a Joint Management Committee to be chaired by Ifremer, as workpackage 7 leader and Partner 12, Greece (Ministry of Development, General Secretariat for Research and Technology GSRT).

This Committee is composed of two nominated representatives from each Partner and each Associated Partner *(1 manager and 1 scientist)*.

The Joint Management Committee will be responsible for the coordination of the cooperation between the national programmes, and for the practical implementation of the MoU including :

- Inventory of the national programmes and associated budget at the national level,
- identify common approaches,
- endorse methodology proposed by the Scientific Committee
- facilitate access to data,
- encourage exchange of facilities used by each research group,
- adapt a common approach to :
  - the publication of research results,
  - the ownership of research output or possible intellectual or economic benefits *(in agreement with the rule 9 of this MoU)*,
- develop procedures for exchange human resources between the different partners,
- monitor progress of the projects.

The members of the Joint Management Committee are assisted by Ifremer administration.

The management committee will meet one time a year and may be organized in conjonction with the scientific committee.

The Associated Partners may attend the Joint Management Committee. If funding is available, MariFish WP7 supports their attendances to the meetings.

The Observers may attend the Joint Management Committee on invitation. MariFish WP7 do not support their attendances to the meetings.

Under the MariFisfh workpackage 7 budget, funding has been allocated to cover all the operating costs of the Joint Management Committee until January 16, 2011. From January 16, 2011, each Partner shall bear all the costs for its participation in the Joint Management Committee.

#### *5.2.2 Scientific Committee*

The Joint Management Committee agrees to the creation of a Scientific Committee to be chaired by Ifremer, as workpackage 7 leader and Partner 12, Greece (Ministry of Development, General Secretariat for Research and Technology GSRT).

This Committee is composed up to three scientists (nominated representatives) from each Partner and each Associated Partner.

The Scientific Committee will be charged with elaborating detailed plans for the Mediterranean project including:

- project goals, tasks, delivery calendar,
- facilitate access to large infrastructure,
- setting out action plans for interaction and partnership,
- budgetary requirement,
- description of staff involved and their roles in each project to enable exchanges of staff (including profile for exchange human resources & Research topics for student exchanges),
- reporting.

The Scientific Committee reports to the Joint Management Committee and after its agreement, the scientific Committee will implement the cooperation.

If necessary, the Scientific Committee will advise the Joint Management Committee on the scope and the content of any gaps which could be filled by a common call.

In any publication relating to this regional programme the coordination role of MariFish will be acknowledged.

The Scientific Committee will meet two times a year.

The Associated Partners may attend the Scientific Committee. If funding is available, MariFish WP7 supports their attendances to the meetings.

The Observers may attend the Scientific Committee on invitation. MariFish WP7 do not support their attendances to the meetings.

Under the MariFisfh workpackage 7 budget, funding has been allocated to cover all the operating costs of the Scientific Committee until January 16, 2011. From January 16, 2011, each Partner shall bear all the costs for its participation in the Joint Management Committee.

If extra meetings of the Scientific Committee are requested, these meetings will be in that case covered by the national expenses.

**6 - Evaluation procedure**

The projects and overall programme will be evaluated by independent Scientific experts nominated by the Joint Management Committee with 3 sets of criteria: (1) the scientific aspects (2) the project management (3) the EU MariFish added value and mainly to ensure complementarities between national projects, to achieve the programme's thematic and regional goals and to issue a "label of excellence MariFish".
The result of the review is presented during a session involving the partners and the main investigates.

A mid-term review may be considered, and a final evaluation must take place about three months before the official termination of the MariFish project in 2011.

**7 - Funding Model**

At the time of signing the MoU, this collaborative project has no plans to conduct a joint call for new research.

Each Partner will apply for funding at various regional, national, european and international institutions.

If necessary, under the MariFish Work Package 7, the funding provided for joint calls would involve the 'juste retour' principle whereby funding is provided to the research organisation of the origin country.

**8 - Duration - Renewal**

This MoU shall enter into force on the date of signature of the MariFish Partners. It shall remain in force for four years, unless terminated by the individual Partners giving other Partners at least six months written advance notice of its intention to terminate this MoU.

This MoU may be extended or amended by mutual agreement of the Partners.

**9 – Intellectual Property Rights**

The ownership, protection, use, dissemination and access rights relating to knowledge arising from this collaborative programme are as set out in PART C "Intellectual Property Rights" of ANNEX II "General Conditions" of the MariFish Contract, No 025989 (ERAC).

**10 – Confidentiality and publication**

In the framework of this MoU the Partners undertake to apply the provisions relating to confidentiality and publication defined in Article 9 "Confidentiality and Publication" of the MariFish Consortium Agreement dated 5 December 2005.

**11. Miscellaneous provisions**

**11.1. Entire agreement**

This MoU, the Consortium Agreement, the EC Contract and any subsequent when such apply, addendum and any complementary contract(s), shall constitute the entire agreement among the Partners in respect of MariFish, and supersede all previous negotiations, commitments and documents concerning MariFish.

**11.2. Controlling provisions**

In case of inconsistencies between the contractual provisions signed by the Partners in connection with this Project, the provisions of the EC Contract and Consortium agreement shall prevail over those of this MoU, which shall themselves prevail over any special contract or agreement signed for its application.

**11.3. Language**

This MoU is drawn up in the English language, which shall govern all documents, notices and meetings, for its application and/or extension or in any other way relative thereto.

**11.4. Settlement of disputes**

All disputes or differences arising from this MoU which cannot be amicably resolved by the Joint Management Committee shall be submitted to the MariFish Sterring Committee for arbitration and resolution.

**11.5. Amendments**

Amendments or changes to this MoU shall be valid only if made in writing and signed by any and all of the Partners.

**11.6. General provisions relating to termination**

The provisions of this MoU relating to liability, confidentiality, intellectual property rights and publications shall survive the term or termination of this MoU for any reason whatsoever to the extent needed to enable the Partners to pursue the rights and remedies provided for therein.

For the avoidance of doubt, termination or withdrawal shall not affect any rights or obligations incurred prior to the date of the termination.

**"The Partners" :**

*Signed on behalf of*
French Research Institute for Exploitation of the Sea (Ifremer), France

Date: 1/10/08 Name: Le Directeur Général Délégué Mer

Signature: Ifremer

*Signed on behalf of :*
**Ministry of Development, General Secretariat for Research and Technology (GSRT), Greece**
Signature :

Name :
Date : 23/4/08

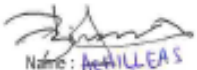
*Signed on behalf of :*
**The Ministry of Science and Innovation, (MICINN), Spain**
Signature :

Name : Prof. Dr. F. Goreia-Ochoa
Date : 17/10/2008

## Annex 1.

- **Other MariFish members that have an interest in the development of the concept of regional collaboration in the area :**

*Signed on behalf of :*
**The Research Promotion Foundation,**
**Cyprus**
Signature :



Name : ~~ACHILLEAS~~ PAIZINA ECB
Date : 29/09/08

**referred as «Observers».**

## Annex 2.

- **The partners agreed to extend the cooperation by involving the Mediterranean countries, not members of MariFish, interested in the management and development of a common research programme in the area:**

**referred as «the Associated Partners».**

- At present (June 2008), no Mediterranean countries, not members of MariFish, are «the Associated Partners». Italy and Croatia have been positively contacted.

## Annex 3.

**At present, the following National Institutes are interested in the implementation of the projects :**

- French Research Institute for Exploitation of the Sea (IFREMER), France
- Hellenic Centre for Marine Research (HCMR), Greece
- Spanish Institute of Oceanography (IEO), Spain

**referred as «the Operators».**

## Annex 4.

The Partners intend to develop a joint regional programme titled : **Towards an ecosystem based approach for fisheries management in the Mediterranean: Essential fish habitats and their trophic interactions.**

**The following research actions will be addressed within the project. Each partner will contribute to their achievement and each action will be lead by a specific Partner.**

**Essential fish habitats**: Mapping key spawning areas, habitat mapping of feeding and nurseries areas of exploited fish population. Identify refuges and key areas to be used for the implementation of Marine Protected Areas (MPA).

- Large pelagic fish, such as bluefin tuna, albacore and swordfish (France and Greece):
  Habitat mapping of the abundance of the fish will be achieved in relation with environmental condition. Evaluating catches by area needs to have access to VMS data. Tagging experiments developed by each country will be put together in the same common data base. This work will be done in strong partnership with the ICCAT secretariat.

- Small pelagic fish, such as anchovy and sardine (Greece and Spain) :
  The abundance of small pelagics is estimated by acoustic methodology. Mapping of the habitat of small pelagics will be achieved in relation to environmental conditions. Habitat mapping will be based on a presence absence approach at different periods of the year.

- Demersal fisheries (France) :
  The data will come from the Medits and it is underlined that there is no access to the data from some UE countries.
  The previous coordinator of Medits will be in charge to build this common access data base.
  In case of difficulties, the WP7 leader will address a letter to DG MARE to facilitate this task.

- The environmental condition (France) :
  They will be obtained using comprehensive remote sensing data's on the whole Mediterranean.
  CLS will provide conditions to access to this type of data.

**Trophic interactions**: Understanding trophic interactions of key Mediterranean food webs and its implications on fish condition and contamination.

- Trophic relationships (France) :
  An inventory of the different laboratories or teams very often from Universities will be addressed with the different techniques such as stomach content, mass spectrometry, and analysis contaminants as tracers.
  The modeling approach will be identified to address the following topics:
  - impact of climate change on the trophic web and consequences for recruitment or juvenile survival
  - effect of accumulation of pollutants from phytoplankton to top predators