

Project Approved Form	
1. Project identification	
Project Change n°	2
Date of approval by the Monitoring Committee	
1.0 Code number	EAPA_458/2016
1.1 Acronym	
1.1.1 Acronym	COCKLES
1.1.2 Project email address	rfernandez@cetmar.org
1.2 Programme Priority	
1.2.1 Programme priority	Biodiversity, natural and cultural assets
1.2.2 Programme specific objective	4.1. Improving the protection of biodiversity and ecosystems services
1.2.3 Fields of intervention	(100) , (300) , (100) , (800) , (300) , (300) , (600) , (300) , (100) , (2000) , (1200) , (600) , (600) , (800) , (100) , (100) , (800) , (300) , (300) , (50) , (250)
1.3 Total budget	
1.3.1 ERDF	2,711,683.20€
1.3.2 Partners contribution	903,894.40€
1.3.3 Eligibles costs	3,615,577.60€
1.3.4 Total costs	3,615,577.60€
1.4 Title	<p>EN: Co-Operation for Restoring Cockle Shellfisheries & its Ecosystem-Services in the Atlantic Area (AA)</p> <p>ES: Cooperación para recuperar las pesquerías de berberecho y sus servicios de ecosistema en el AA</p> <p>FR: Coopération pour la restauration des pêcheries de coques et de leurs services d'écosystème dans l'AA</p> <p>PT: Cooperação para a recuperação das pescarias de berbigão e os seus serviços de ecossistema na AA</p>
1.5 Project duration	
1.5.1 Start date	2017-10-01
1.5.2 End date	2020-09-30
1.5.3 Project duration in months	36
1.6 Project background	
1.6.0 Project has started	0
1.6.1 Project based on previous AA projects?	0
1.6.2 If the project is based on previous AA projects, please detail how it builds on from results of such previous projects	<p>EN: COCKLES does not base particularly on any of the PRESPO results, however, this is a reference of related past AA Projects where three of the partner</p>

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	<p>institutions will join again their capacities to address, now, a specific natural resource of key relevance for small scale fisheries communities.</p> <p>ES: FR: PT:</p>
1.6.3 Project based on other programmes/policies results?	1
1.6.4 If the project is based on other programmes/policies results, please detail	<p>EN: Background shared by the partnership comprises projects of various funding sources. Examples: Oceanographic datasets and models (INTERREG-Raia, RaiaCo), pathology, biology and ecology datasets (OYSTERECOVER, SUSFISH, H2020-VIVALDI), aquaculture (SEAFARE) and ecosystem services (ROBIN) among others.</p> <p>ES: FR: PT:</p>
1.6.5 Have you applied for the same project for another EU funding programmes?	0
1.6.6 If yes, explain which programmes	<p>EN: ES: FR: PT:</p>
1.6.7 Have you ever been beneficiaries of the Atlantic Area Programme?	1
1.6.8 If yes, explain which projects	<p>EN: CETMAR has been involved more than 10 Atlantic Area projects: PRESPO, BIOTECMAR, ANCORIM, ARCO POL, ARCO POL PLUS and ARCO POL PLATFORM, EROCIPS, MYCOAST, ACRUNET, TURNKEY, MARMED, MARLEANET. The other partner institutions in COCKLES have also an extensive background in this INTERREG programme.</p> <p>ES: FR: PT:</p>
1.7 MONITORING COMMITTEE STAGE 2 recommendations if any	<p>EN: Section 4.7.4 has been streamlined to show how industry and authorities as key stakeholders will engage in the project activities, in particular how they will contribute to the workplan and to capitalize on project results. The innovative aspects of the project (from approach and products perspectives) have been better explained by linking results and outputs expressed in sections 4.7.1, 4.7.2. and Deliverables. Mechanisms for sustainability are highlighted across section 4 and through specific actions in the workplan such as: capitalization actions (e.g. management plans will be a mechanism that both administrations and producers can adopt and benefit from, capacity building foreseen in WP3 will also guarantee the capacity for stakeholders to act beyond the project and benefit from the knowledge base and outputs generated in it. Efforts to keep the information available will be guaranteed through the maintenance of the website. Finally, the partnership commits to organize at least one follow-up international workshop one year after the project end, to assess, again</p>

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with stakeholders progress on results implementation, relevant needs and barriers and impact achievement. More details are provided about the budget formulation, in particular, to justify the amounts requested for equipment (referring to small equipment and consumables) for partners whose budget for this concept exceed 10%.

ES:

FR:

PT:

1.8 MONITORING COMMITTEE STAGE
2 Conditions for approval if any

EN:

ES:

FR:

PT:

1.9 Project documents

1.9.1 Subsidy contract

1.9.1.1 Contract date

2017-05-31

1.9.1.2 Contract file

Anx_2708/2018

1.9.2 Partnership agreement

1.9.2.1 Partnership agreement date

2018-02-28

1.9.2.2 Partnership agreement file

Anx_7018/2018

1.9.3 Project start declaration

1.9.3.1 Project start declaration date

2017-10-01

1.9.3.2 Project start declaration file

Anx_20119/2017

1.9.4 Proof of Solvability To be provided only by the lead partner (in case of public authority is enough a document justifying the legal status of the entity)

1.9.4.1 Date

2002-04-17

1.9.4.2 Solvability documents

Anx_23093/2017|Anx_20657/2017

1.9.5 Written agreement with Countries outside the Interreg AA eligible area

1.9.5.1 Document date

1.9.5.2 Agreement

2. Project partnership

Partner number	Entity	Position	Country	Region	New partner	Suspended
1	Centro Tecnológico del Mar, Fundación CETMAR	1	Spain	Galicia	No	No
2	Consellería do Mar, Xunta de Galicia	2	Spain	Galicia	No	No
3	UNIVERSIDADE DE SANTIAGO	2	Spain	Galicia	No	No

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Partner number	Entity	Position	Country	Region	New partner	Suspended
	DE COMPOSTELA					
4	UNIVERSITE DE BORDEAUX	2	France	Aquitaine	No	No
5	University College Cork	2	Ireland	Southern and Eastern	No	No
6	Bangor University	2	United Kingdom	West Wales and The Valleys	No	No
7	NERC Centre for Ecology and Hydrology, Bangor	2	United Kingdom	West Wales and The Valleys	No	No
8	Groupe d'Etude des Milieux Estuariens et Littoraux	2	France	Hautes-de- France	No	No
9	Cyfoeth Naturiol Cymru	3	United Kingdom	West Wales and The Valleys	No	No
10	Instituto Português do Mar e da Atmosfera, I.P.	2	Portugal	Lisboa	No	No
11	Universidade de Aveiro	2	Portugal	Centro	No	No
12	Faculdade de Ciências da Universidade de Lisboa	2	Portugal	Lisboa	No	No
13	Université de Caen Normandie	2	France	Basse Normandie	Yes	No
14	Marine Institute Ireland	3	Ireland	Border, Midland and Western	Yes	No
15	Institut français de recherche pour l'exploitation de la mer	3	France	Nouvelle Aquitaine	Yes	No
16	Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest	3	France	Nouvelle Aquitaine	Yes	No
17	Centre National de la Recherche Scientifique Délégation Aquitaine	3	France	Nouvelle Aquitaine	Yes	No
18	CONFRARÍA DE PESCADORES SAN ANTONIO DE CAMBADOS	3	Spain	Galicia	Yes	No

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Partner number	Entity	Position	Country	Region	New partner	Suspended
19	Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia	3	Spain	Galicia	Yes	No
20	Instituto Tecnolóxico para o Control do Medio Mariño de Galicia	3	Spain	Galicia	Yes	No
21	Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.	3	Portugal	Algarve	Yes	No
22	Instituto da Conservação da Natureza e das Florestas	3	Portugal	Lisboa	Yes	No

2.0 Partner number	1
2.1 Position in the partnership	Lead partner
2.2 Entity	
2.2.1 Organization acronym when applicable	CETMAR
2.2.2 Organization name	Centro Tecnológico del Mar, Fundación CETMAR
2.2.3 Organization name in English	Technological Centre of the Sea – CETMAR Foundation
2.2.4 Department	Technology Promotion and Transfer
2.2.5 Type of organization	Regional public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	G36885853
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN: Through quarterly declarations to the Spanish Tax Office ES: FR: PT:
2.2.7.3 VAT statement	Anx_20075/2017
2.2.8 Website	www.cetmar.org
2.2.9 Size of the organization (employees)	42
2.3 Location	
2.3.1 Country	Spain
2.3.2 Sub-Region (NUTS3)	Galicia
2.3.3 City	Vigo

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2.3.4 Address	Eduardo Cabello s/n
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: CETMAR is a public foundation aimed to achieve a sustainable management of the marine environment and resources. One of the key enabling skills of its team is facilitating and coordinating strong collaboration links among key agents in science, economy, policy and administration and civil society.</p> <p>ES: FR: PT:</p>
2.4.2 Transnational experience	<p>EN: CETMAR has a sound transnational background. It has accomplished a vast amount of projects (#600), often being part of the international consortia and having led more than 10% of those. FP6, FP7, H2020, ESF, INTERREG, LiFE and ERUROPAID are among the funding programs where CETMAR has been successful</p> <p>ES: FR: PT:</p>
2.4.3 Role in the project	<p>EN: CETMAR is proposed to lead COCKLES. Apart from coordination and management, it will play a key role in engaging with stakeholders, facilitating their involvement in the project activities, particularly through capitalization and dissemination WPs. It will also engage in key technical actions WPs 6,8</p> <p>ES: FR: PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: In WP1: Lead partner and, as such, will chair the project steering committee and lead the Operational Management Board. Will organize and carry out progress monitoring work with the collaboration of the partnership; it will pay special attention to risk management and will also act as interlocutor with AA authorities. CETMAR will organize reporting and due delivery of outputs. In WP2 it'll provide dissemination contents and organise dissemination and outreach activities (including one post-project workshop). In WP3 it'll lead the capitalization of project outputs assuring stakeholder uptake. In WP6 it'll integrate the Cockle larvae PTM in a user-friendly operational management tool and will evaluate concentration under different met-ocean conditions in the Galician Coast. In WP8 It'll gather data and information to describe and calculate the value of ecosystem services provided by cockles. CETMAR will also facilitate co-creation of the spreadseet tool to support management decisions.</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Rosa Fernandez Otero
2.5.2 Email	rfernandez@cetmar.org

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2.5.3 Phone	+34986247047
2.5.4 Address	Eduardo Cabello s/n
2.5.5 Post code	36208
2.5.6 City	Vigo
2.5.7 Country	Spain
2.6 Legal representative	
2.6.1 Name	Paloma Rueda
2.6.2 Email	direccion@cetmar.org
2.6.3 Phone	+34986247047
2.6.4 Address	Eduardo Cabello s/n
2.6.5 Post code	36208
2.6.6 City	Vigo
2.6.7 Country	Spain
2.6.8 Date of entering into functions	2009-06-26
2.6.9 Probative document of the Legal representative	Anx_20105/2017
2.7 Bank account	
2.7.1 IBAN	ES98 2080 0572 5530 4000 0459
2.7.2 SWIFT	CAGLESMMXXX
2.7.3 Bank	ABANCA CORPORACION BANCARIA SA
2.7.4 Bank Account Owner	Centro Tecnológico del Mar, Fundación CETMAR
2.7.5 Bank Account Country	Spain
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_20076/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-15
2.8.2 Co-financing declaration	Anx_26465/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-18
2.9.2 State Aid Declaration	Anx_20074/2017
2.0 Partner number	2
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	CIMA-XUGA
2.2.2 Organization name	Consellería do Mar, Xunta de Galicia
2.2.3 Organization name in English	Ministry of the Sea, Galicia Regional Government

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2.2.4 Department	Centro de Investigacións Mariñas (Marine Research Centre)
2.2.5 Type of organization	Regional public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	S1511001H
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	Anx_20531/2017
2.2.8 Website	http://www.xunta.gal/mar
2.2.9 Size of the organization (employees)	3000
2.3 Location	
2.3.1 Country	Spain
2.3.2 Sub-Region (NUTS3)	Galicia
2.3.3 City	Santiago de Compostela
2.3.4 Address	Edifícios Administrativos - San Caetano, s/n - CP15781
2.4 Partner profile	
2.4.1 Partner skills	EN: CIMA is committed to perform applied research to develop sustainable and efficient marine resource management and to provide advisory services to industry and Administration. CIMA's team in this project includes researchers with vast experience in mollusc diseases and in shellfishery management. ES: FR: PT:
2.4.2 Transnational experience	EN: CIMA's team cooperates with numerous researchers from Europe, North and South America and Asia. Regarding projects funded by EU, CIMA's team has been involved in the mollusc-related projects BOLCI (Q5CR-2002-72338), BLUESEED (FP6-SME-017729), WOPER (FP6-SSA-044442) and OYSTERECOVER (FP7-SME-243583) ES: FR: PT:
2.4.3 Role in the project	EN: CIMA is a partner acting as coordinator of WP7 and involved in all other WPs except WP6. CIMA will support scientific coordination in coop. with CETMAR, through its involvement in the Steering Committee. As part of the Regional Ministry of the Sea, it will also give strong support to capitalization. ES: FR: PT:

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2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: Regarding technical WPs, CIMA will compile information and will perform new research on demographical issues of Galician cockle beds and will provide samples for population genetic analyses in WP4; it will provide information on pathological threats of Galician cockle beds resulting from its own research in the last 19 years, will perform a new pathological survey, and new research to characterise the cockle immune system in WP5; CIMA will coordinate WP7, with research to identify molecular markers of marteliosis resistance and to design a selective breeding programme to produce marteliosis-resistant cockle strains and plans to restore exhausted cockle beds; it will compile information and will provide samples for WP 8. Furthermore, CIMA will participate in pilot programmes included in WP3; in dissemination activities (WP2) through workshops, training, scientific meetings and articles; and in coordination (WP1), with a scientific vice-chair in the steering committee.</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Antonio Villalba García
2.5.2 Email	antonio.villalba.garcia@xunta.gal
2.5.3 Phone	+34915954224
2.5.4 Address	Pedras de Corón s/n
2.5.5 Post code	36620
2.5.6 City	Vilanova de Arousa
2.5.7 Country	Spain
2.6 Legal representative	
2.6.1 Name	Rosa Quintana Carballo
2.6.2 Email	cma.conselleria@xunta.gal
2.6.3 Phone	+34981544001
2.6.4 Address	Edificios Administrativos – San Caetano s/n
2.6.5 Post code	15781
2.6.6 City	Santiago de Compostela
2.6.7 Country	Spain
2.6.8 Date of entering into functions	2016-11-13
2.6.9 Probative document of the Legal representative	Anx_20532/2017
2.7 Bank account	
2.7.1 IBAN	ES14 9000 0022 1003 5000 0022
2.7.2 SWIFT	ESPBESMM
2.7.3 Bank	BANCO DE ESPAÑA
2.7.4 Bank Account Owner	XUNTA DE GALICIA

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2.7.5 Bank Account Country	Spain
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_20626/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-20
2.8.2 Co-financing declaration	Anx_20530/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-20
2.9.2 State Aid Declaration	Anx_20540/2017
2.0 Partner number	3
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	USC
2.2.2 Organization name	UNIVERSIDADE DE SANTIAGO DE COMPOSTELA
2.2.3 Organization name in English	University of Santiago de Compostela
2.2.4 Department	Genetics - Acuigen
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body
2.2.7 Tax ID	Q1518001A
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN: Through quarterly declarations to the Spanish Tax Office ES: FR: PT:
2.2.7.3 VAT statement	Anx_20080/2017
2.2.8 Website	http://www.usc.es/en/index.html http://www.acuigen.es/en
2.2.9 Size of the organization (employees)	4104
2.3 Location	
2.3.1 Country	Spain
2.3.2 Sub-Region (NUTS3)	Galicia
2.3.3 City	Lugo
2.3.4 Address	Avda. Carballo Calero s/n
2.4 Partner profile	
2.4.1 Partner skills	EN: Acuigen is a Galician Group of Competitive Research in USC; it has 20 members (7 permanent teachers and 13 hired technicians, postdocs, admin.

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	staff); it focuses on genetics for aquaculture and conservation of biological resources; a flagship achievement on technology transfer is Geneaqua spin-off ES: FR: PT:
2.4.2 Transnational experience	EN: USC-Acuigen participated in 4 EU (OYSTERECOVER, AQUATRACE, FISHBOOST, TAXUSLIFE) and 6 American (ARGENTINA, CHILE, URUGUAY (2) and BRASIL (2)) projects (5 last years). Acuigen organized the Genetics in Aquaculture Symposium (ISGA XII, 2015). International trainingships are key part of Its background ES: FR: PT:
2.4.3 Role in the project	EN: USC-Acuigen is responsible for the actions involving genetic tools in COCKLES focusing on the evaluation of cockle populations (WP4), the identification of genetic markers for resistance to Marteilirosis (WP7), and the integration of this information for restoration of cockle populations (WP3, WP7). ES: FR: PT:
2.4.4 Describe the activities that your organisation is going to implement in the project	EN: i) evaluation of genetic diversity and structure (geographical & temporal), and identification of genetic markers under selection pressure by using powerful genotyping by sequence methods (4.4), Aquigen will coordinate sampling across regions, create a DNA and tissue bank, and construct a genotyping database; ii) the identification of candidate genes and genetic markers for resistance to marteiliosis using the most sensitive and accurate method (RNAseq) (7.3), a database with the cockle immune genes and a list of candidate genes and genetic markers released; iii) the integration of this information along with proteomic data (7.2) for selective breeding plans for disease resistance to Marteilirosis, necessary for enhance production (7.4 and 3.2) and restoration of cockle populations (7.5 and 3.3); iv) The group will collaborate in modelling larval dispersal by statistical inference and genetic markers, and will provide complementary information for the evaluation of stressors in (WP5) ES: FR: PT:
2.5 Contact person	
2.5.1 Name	Paulino Martínez Portela
2.5.2 Email	paulino.martinez@usc.es
2.5.3 Phone	+34982822425
2.5.4 Address	Avda. Carballo Calero s/n
2.5.5 Post code	27002

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2.5.6 City	Lugo
2.5.7 Country	Spain
2.6 Legal representative	
2.6.1 Name	Isabel Rodríguez Moldes
2.6.2 Email	vr.investigacion@usc.es
2.6.3 Phone	+34881811002
2.6.4 Address	Edificio CACTUS - Campus Vida
2.6.5 Post code	15782
2.6.6 City	Santiago de Compostela
2.6.7 Country	Spain
2.6.8 Date of entering into functions	2014-06-09
2.6.9 Probative document of the Legal representative	Anx_20078/2017
2.7 Bank account	
2.7.1 IBAN	ES27 2080 0387 8031 1000 0209
2.7.2 SWIFT	CAGLESMMXXX
2.7.3 Bank	ABANCA
2.7.4 Bank Account Owner	Universidade de Santiago de Compostela
2.7.5 Bank Account Country	Spain
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_27802/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-06
2.8.2 Co-financing declaration	Anx_20081/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-06
2.9.2 State Aid Declaration	Anx_20079/2017
2.0 Partner number	4
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	UBx
2.2.2 Organization name	UNIVERSITE DE BORDEAUX
2.2.3 Organization name in English	University of Bordeaux
2.2.4 Department	EPOC - Environnements et Paléoenvironnements Océaniques et Continentaux
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body

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2.2.7 Tax ID	FR23 130 018 351
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN: By monthly request to State tax administration for TVA Credit refund ES: FR: PT:
2.2.7.3 VAT statement	Anx_20537/2017
2.2.8 Website	http://www.u-bordeaux.fr
2.2.9 Size of the organization (employees)	The University of Bordeaux (UBx) is a multidisciplinary university with about 50 000 students and 6 600 permanent staff
2.3 Location	
2.3.1 Country	France
2.3.2 Sub-Region (NUTS3)	Aquitaine
2.3.3 City	Bordeaux
2.3.4 Address	Station Marine d'Arcachon, 2 rue du Pr Jolyet
2.4 Partner profile	
2.4.1 Partner skills	EN: UBx offers curricula leading to degrees in major fields, including Science and Technology and Social & Human Sciences. UBx offers 40 international master and doctorate programmes. Its cutting-edge research activities are carried out in 80 research departments associated with major research bodies. ES: FR: PT:
2.4.2 Transnational experience	EN: UBx offers high level of research with an international scope (90 FP7, H2020 and INTERREG projects, 12 joint international laboratories). UBx is # 208 in the Shanghai ranking and # 3 in France. Over 250 cooperation agreements have been signed with partner universities worldwide. ES: FR: PT:
2.4.3 Role in the project	EN: UBx will lead WP5 and co-lead WP8. Furthermore it will contribute to WPs 4,6,1and 2. ES: FR: PT:
2.4.4 Describe the activities that your organisation is going to implement in the project	EN: In WP4, UBx will provide data from 18-yr data base for actions focused on population dynamics (4.1 and 4.2), It'll participate to sampling and data analysis in 4.3 and provide samples for genetic population (4.4). UBx will lead WP5 and will have a major contribution on sampling in the whole AA in order to provide a catalogue of the different infectious threats (5.1). In

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	<p>5.2, It'll participate to the study of martellosis disease by characterizing associated prokaryotes in healthy vs. infected cockles, and in analysing genes involved in cockle stress. In 5.3 and 5.4, we'll provide cockles (for trace metals analysis) and historical data (for exotic species). In WP6, It'll contribute to 6.3 (carrying capacity of ecosystems) and 6.4 (collaboration with bird reserve: correlation between birds and cockles). A significant involvement on the ecosystem engineer role of cockles is proposed in WP8 (role of cockles in biogeochemistry cycles, bioturbation, erosion, bioirrigation).</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Xavier de Mountaudouin
2.5.2 Email	x.de-montaudouin@epoc.u-bordeaux1.fr
2.5.3 Phone	+33556223904
2.5.4 Address	Station Marine d'Arcachon, 2 rue du Pr Jolyet
2.5.5 Post code	33120
2.5.6 City	ARCACHON
2.5.7 Country	France
2.6 Legal representative	
2.6.1 Name	Manuel TUNON de LARA
2.6.2 Email	president@u-bordeaux.fr
2.6.3 Phone	+33540 00 29 95
2.6.4 Address	35 place Pey BERLAND
2.6.5 Post code	33000
2.6.6 City	BORDEAUX
2.6.7 Country	France
2.6.8 Date of entering into functions	2014-01-17
2.6.9 Probative document of the Legal representative	Anx_20525/2017
2.7 Bank account	
2.7.1 IBAN	FR76 1007 1330 0000 0010 0124 128
2.7.2 SWIFT	TRPUFRP1
2.7.3 Bank	TRESOR PUBLIC D.R.F.I.P. GIRONDE
2.7.4 Bank Account Owner	UNIVERSITE DE BORDEAUX
2.7.5 Bank Account Country	France
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_20538/2017
2.8 Co-financing declaration	

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2.8.1 Document date	2017-09-15
2.8.2 Co-financing declaration	Anx_20523/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-15
2.9.2 State Aid Declaration	Anx_20524/2017
2.0 Partner number	5
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	UCC
2.2.2 Organization name	University College Cork
2.2.3 Organization name in English	University College Cork
2.2.4 Department	Sc.Biolog,Earth&Envir.Sci (BEES), Aquaculture and Fisheries Dev.Ctr. (AFDC) & Envir.Res.Inst. (ERI)
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body
2.2.7 Tax ID	IE0006286E
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	Anx_20648/2017
2.2.8 Website	www.ucc.ie, https://www.ucc.ie/en/afdc/ , http://www.ucc.ie/en/eri/
2.2.9 Size of the organization (employees)	2,747
2.3 Location	
2.3.1 Country	Ireland
2.3.2 Sub-Region (NUTS3)	Southern and Eastern
2.3.3 City	Cork
2.3.4 Address	School of BEES, UCC, Enterprise Centre, Distillery Fields, North Mall
2.4 Partner profile	
2.4.1 Partner skills	EN: UCC has extensive experience in shellfish reproductive health, parasites and disease using histology and molecular diagnostic tools (PCR, qPCR). Geographic information systems (GIS) knowledge and mathematical modelling experience of parasite trophic interactions and the ecology of wading birds. ES: FR: PT:

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2.4.2 Transnational experience	<p>EN: Prof Sarah Culloty has acted as PI or co-PI for 16 EU and 13 nationally funded projects on shellfish health, disease and future sustainability, with a total funding of €5.6 million. Prof Culloty currently has active collaborations with over 24 industry and industry representative body partners.</p> <p>ES: FR: PT:</p>
2.4.3 Role in the project	<p>EN: UCC will participate in all WPs and will be the lead partner in WP4.</p> <p>ES: FR: PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: UCC will be responsible for WP4, overseeing and regularly monitoring the progress of all partners within this WP. In WP4 Actions 1, 2 and 3, UCC will conduct a comprehensive baseline study of cockle population distribution, abundance, dynamics, including reproductive health, and site influences in the AA to assess past and present situations and to forecast future scenarios. A desk study collating past data and a field trial at two cockle sites to assess the current situation will be carried out. Data and biological material from WP4 Actions 1, 2 and 3 will be provided to WP4 Action 4 (Cockle genetics), WPs 6 (Modelling) and 7 (Breeding programme). In WP5, a field survey of cockle microparasites will be conducted by UCC and trophic interactions of cockle microparasites and bird predators will be assessed, with data provided to WP8. UCC will promote stakeholder involvement and promote meetings with them to promote knowledge exchange and contribute to WPs 2, 3 and 8</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Sarah Culloty
2.5.2 Email	s.culloty@ucc.ie
2.5.3 Phone	+353214904646
2.5.4 Address	School of BEES, UCC, Enterprise Centre, Distillery Fields, North Mall
2.5.5 Post code	00000
2.5.6 City	Cork
2.5.7 Country	Ireland
2.6 Legal representative	
2.6.1 Name	Anita R. Maguire
2.6.2 Email	uccresearch@ucc.ie
2.6.3 Phone	+353214903501
2.6.4 Address	Research Support Services, UCC, Western Road
2.6.5 Post code	0000

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2.6.6 City	Cork
2.6.7 Country	Ireland
2.6.8 Date of entering into functions	2014-02-25
2.6.9 Probative document of the Legal representative	Anx_20528/2017
2.7 Bank account	
2.7.1 IBAN	IE90 BOFI 9027 6837 867548
2.7.2 SWIFT	BOFIE2D
2.7.3 Bank	Bank of Ireland
2.7.4 Bank Account Owner	National University of Ireland - University College Cork
2.7.5 Bank Account Country	Ireland
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_20114/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-19
2.8.2 Co-financing declaration	Anx_22604/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-20
2.9.2 State Aid Declaration	Anx_27168/2017
2.0 Partner number	6
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	BU
2.2.2 Organization name	Bangor University
2.2.3 Organization name in English	Bangor University
2.2.4 Department	Centre for Applied Marine Science, School of Ocean Science
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body
2.2.7 Tax ID	1141565
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	Anx_20087/2017
2.2.8 Website	www.bangor.ac.uk

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2.2.9 Size of the organization (employees)	2,600
2.3 Location	
2.3.1 Country	United Kingdom
2.3.2 Sub-Region (NUTS3)	West Wales and The Valleys
2.3.3 City	Bangor
2.3.4 Address	Cae Derwen
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: CAMS (www.cams.bangor.ac.uk) at BU undertakes multi-disciplinary impact marine research working with partners across the sciences spectrum from molecular marine biology to applied oceanography and whole ecosystem interactions undertaking collaborative and contract research and consultancy.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.2 Transnational experience	<p>EN: CAMS and specifically the staff involved in the project have considerable transnational expertise ranging from EU projects to large INTERREG Ireland Wales Projects. BU is also involved in several MSCA PhD, Postdoc and fellowship/Co-Fund actions.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: BU will lead WP6, the modelling workpackage focusing on the larval tracking models. BU will also be involved in WP4 and 5 collecting data and samples of cockles. BU will also assist with WPs 1, 2 and 3 and was involved in WP0 from the inception of the project</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: BU will coordinate activities in WP6, focussing specifically on actions 6.1 (developing ocean models, during 2017-18) and 6.3 (developing cockle larvae tracking models, during 2018-19), and also develop a population abundance model in 6.4 (during 2019-20). Scenarios linking actions 6.1-6.4, that characterise cockle population dynamics and test sensitivity of the metaopoulation to both natural and anthropogenic stressors, will be designed and simulated by BU – the outcomes from which will link into a management tool for the cockle industry (in WP3). BU will lead a scientific paper on the integrated modelling outcomes from WP6. BU will be involved in gathering data and collecting and analysing samples for WP4, specifically actions 4.1-4.3, and also undertake microbiological experiments related to cockle mortality as described in WP5 (action 5.1). BU will sample where required for actions 5.2 and 5.3 with relation to invasive species. BU will also contribute to all actions within WP1-3.</p>

Project Approved Form	
	ES: FR: PT:
2.5 Contact person	
2.5.1 Name	Shelagh Malham
2.5.2 Email	s.malham@bangor.ac.uk
2.5.3 Phone	+441248383252
2.5.4 Address	Centre for Applied Marine Sciences, Menai Bridge, Anglesey
2.5.5 Post code	LL59 5AB
2.5.6 City	Menai Bridge
2.5.7 Country	United Kingdom
2.6 Legal representative	
2.6.1 Name	Ben Davies
2.6.2 Email	r.b.v.davies@bangor.ac.uk
2.6.3 Phone	+441248 388495
2.6.4 Address	Cae Derwen
2.6.5 Post code	LL57 2DG
2.6.6 City	Bangor
2.6.7 Country	United Kingdom
2.6.8 Date of entering into functions	2016-04-25
2.6.9 Probative document of the Legal representative	Anx_20085/2017
2.7 Bank account	
2.7.1 IBAN	GB46ABBY09022210364019
2.7.2 SWIFT	ABBYGB2LXXX
2.7.3 Bank	SANTANDER
2.7.4 Bank Account Owner	BANGOR UNIVERSITY
2.7.5 Bank Account Country	United Kingdom
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_27007/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-19
2.8.2 Co-financing declaration	Anx_20328/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-15
2.9.2 State Aid Declaration	Anx_20084/2017
2.0 Partner number	7

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2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	NERC
2.2.2 Organization name	NERC Centre for Ecology and Hydrology, Bangor
2.2.3 Organization name in English	NERC Centre for Ecology and Hydrology, Bangor
2.2.4 Department	Bangor Office
2.2.5 Type of organization	Research and innovation organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	618367325
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	Anx_21001/2017
2.2.8 Website	http://www.ceh.ac.uk/
2.2.9 Size of the organization (employees)	480
2.3 Location	
2.3.1 Country	United Kingdom
2.3.2 Sub-Region (NUTS3)	West Wales and The Valleys
2.3.3 City	Wallingford
2.3.4 Address	Centre for Ecology and Hydrology, Maclean Building, Benson Lane, Crowmarsh Gifford
2.4 Partner profile	
2.4.1 Partner skills	EN: The Centre for Ecology and Hydrology (CEH) is NERC's centre of excellence for terrestrial and freshwater science, delivering excellent science and policy advice. Coastal research has long been a central research theme, and CEH has an international reputation for Ecosystem services science. ES: FR: PT:
2.4.2 Transnational experience	EN: NERC-CEH has a long history of leading and delivering large international research projects, including European H2020 FP7 projects (e.g. EU ROBIN, European Nitrogen Assessment, NitroEurope, OPENNESS, ECLAIRE, SOILTREC, CLIMSAVE, IMPRESSSIONS), and international projects in Latin America and Asia. ES: FR:

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2.4.3 Role in the project	<p>EN: NERC-CEH will lead WP8 and contribute to scenario development in WP3 and catchment modelling in WP5. It will also contribute to management, dissemination and capitalisation aspects of WP1, WP2 and WP3.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: WP8: NERC-CEH will co-ordinate collation of data and experiments across all countries to quantify ecosystem services provided by shellfish (WP8). This includes: collating yield data for provisioning services; sampling and analysis of cockle shell material, sediments and co-ordinating nutrient filtration experiments in order to quantify regulating services, and conducting questionnaires and social surveys, with assistance from local partners in each country, to assess cultural services. We will co-ordinate upscaling of this data and development of the ES evaluation tool based on these findings. WP3: We will contribute to scenario development, with the WP leader, and WP5: We will contribute to catchment models.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	Laurence Jones
2.5.2 Email	lj@ceh.ac.uk
2.5.3 Phone	+441248374500
2.5.4 Address	Environment Centre Wales, Deiniol Road
2.5.5 Post code	LL33 0SS
2.5.6 City	Bangor
2.5.7 Country	United Kingdom
2.6 Legal representative	
2.6.1 Name	Liz Stanfield
2.6.2 Email	cehresearchcontracts@ceh.ac.uk
2.6.3 Phone	+441491692224
2.6.4 Address	Centre for Ecology and Hydrology, Maclean Building, Benson Lane, Crowmarsh Gifford
2.6.5 Post code	OX10 8BB
2.6.6 City	Wallingford
2.6.7 Country	United Kingdom
2.6.8 Date of entering into functions	2017-04-01
2.6.9 Probative document of the Legal representative	Anx_23084/2017

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2.7 Bank account	
2.7.1 IBAN	GB95NWBK60720385014028
2.7.2 SWIFT	NWBKGB2L
2.7.3 Bank	NATIONAL WESTMINSTER BANK
2.7.4 Bank Account Owner	NERC EUR GENERAL
2.7.5 Bank Account Country	United Kingdom
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_32824/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-10-09
2.8.2 Co-financing declaration	Anx_23083/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-21
2.9.2 State Aid Declaration	Anx_33391/2017
2.0 Partner number	8
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	GEMEL
2.2.2 Organization name	Groupe d'Etude des Milieux Estuariens et Littoraux
2.2.3 Organization name in English	Study Group of Estuarine and Coastal Environment
2.2.4 Department	n/a
2.2.5 Type of organization	Business networks and associations
2.2.6 Legal status	Not-for-profit private organization
2.2.7 Tax ID	FR75328557160
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	Anx_20296/2017
2.2.8 Website	www.gemel.org
2.2.9 Size of the organization (employees)	4
2.3 Location	
2.3.1 Country	France
2.3.2 Sub-Region (NUTS3)	Hautes-de-France

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2.3.3 City	Saint-Valery-sur-Somme
2.3.4 Address	Station d'Etude en Baie de Somme 115, quai Jeanne d'Arc
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: GEMEL contributes to improve knowledge about estuarine and coastal ecosystems between the Seine estuary and the Belgian border. It promotes exchanges between scientists and coastal users, in particular fishermen. It participates to the co-management of the largest cockle bed exploited in France</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.2 Transnational experience	<p>EN: GEMEL participated in the COST-647 program in 1980's. The director contributed in 2000's to the definition of benthic indicator in the frame of the ICES group "WKBBEMET" (Benthos Related Environmental Metrics) and published with foreign scientists</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: GEMEL will provide data from the begin of 1980's and improve a growth model (WP4), provide samples for WP5 and 8 from the biggest cockle bed in France. It will carry out semi-directive interviews about recreational fishing and provide data to quantify direct cockle production and services (WP8)</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: GEMEL will compile data of distribution, length frequencies and production collected from the begin of 1980's for the Bay of Somme and the Bay of Authie. It will improve the growth model developed in 2012-2013 with altitudinal data for the Bay of Somme and develop a growth model for the Bay of Authie. It will sample cockles and sediments for the WP5 and 8. It will make available its laboratory to the partners for the study of parasites. It will carry out 200 semi-directive interviews about recreational fishing. Data will be analyzed with Sphinx IQ2 Quali, a specialized software that we use for this type of data. GEMEL works with fishermen, wholesalers and local administrations: knows the production, the purchase price, the number of fishermen and can estimate poaching (using minutes, copies fines and personal observations). So, GEMEL will contribute to quantify production and provisioning associated services and will participate in the meetings to exchange with others participants.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	Mélanie Rocroy
2.5.2 Email	melanie.rocroy@gemel.org

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2.5.3 Phone	+33322266040
2.5.4 Address	Station d'Etude en Baie de Somme 115, quai Jeanne d'Arc
2.5.5 Post code	F 80230
2.5.6 City	Saint-Valery-sur-Somme
2.5.7 Country	France
2.6 Legal representative	
2.6.1 Name	Mélanie Rocroy
2.6.2 Email	melanie.rocroy@gemel.org
2.6.3 Phone	+33322266040
2.6.4 Address	Station d'Etude en Baie de Somme 115, quai Jeanne d'Arc
2.6.5 Post code	F 80230
2.6.6 City	Saint-Valery-sur-Somme
2.6.7 Country	France
2.6.8 Date of entering into functions	2017-05-08
2.6.9 Probative document of the Legal representative	Anx_20298/2017
2.7 Bank account	
2.7.1 IBAN	FR76 1802 5101 0008 1015 8549 684
2.7.2 SWIFT	CEPAFRPP802
2.7.3 Bank	CAISSE D'EPARGNE
2.7.4 Bank Account Owner	ASSOCIATION GEMEL
2.7.5 Bank Account Country	France
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_26773/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-26
2.8.2 Co-financing declaration	Anx_21014/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-25
2.9.2 State Aid Declaration	Anx_21015/2017
2.0 Partner number	9
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	NRW
2.2.2 Organization name	Cyfoeth Naturiol Cymru
2.2.3 Organization name in English	Natural Resources Wales

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2.2.4 Department	Operations South
2.2.5 Type of organization	Regional public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	145153725
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	https://naturalresources.wales/splash?orig=
2.2.9 Size of the organization (employees)	1900
2.3 Location	
2.3.1 Country	United Kingdom
2.3.2 Sub-Region (NUTS3)	West Wales and The Valleys
2.3.3 City	Cardiff
2.3.4 Address	Plas Gwendraeth, Heol Parc Mawr, Cross Hands Business Park, Cross Hands, Carmarthenshire.
2.4 Partner profile	
2.4.1 Partner skills	EN: NRW is the largest Welsh Government Sponsored Body. Formed in April 2013, taking over the functions of the Countryside Council for Wales, Forestry Commission Wales and the Environment Agency in Wales, as well as certain Welsh Government functions. Focuses on environment, change and resilience ES: FR: PT:
2.4.2 Transnational experience	EN: NRW is designator for Sites of Special Scientific Interest – areas of particular value for their wildlife or geology, Areas of Outstanding Natural Beauty (AONBs), and National Parks, as well as declaring National Nature Reserves. Among Int. programmes LIFE Natura 2000 Wales ES: FR: PT:
2.4.3 Role in the project	EN: NRW will facilitate key data and advice on work packages related to cockle distribution, abundance and population dynamics (WP4), estimation of ecosystem's carrying capacity (WP6) and help to quantify the ecosystem service benefits that cockles provide to society (WP8). It will engage in WP2 and 3 ES: FR:

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2.4.4 Describe the activities that your organisation is going to implement in the project	EN: NRW regulates the Burry Inlet cockle fishery, within Carmarthen Bay, as a large European protected estuary with extensive areas of intertidal sand and mud-flats and the largest continuous area of salt-marsh in Wales (22 km ²). Ideal conditions for the common cockle to thrive, and for overwintering wildfowl and waders. NRW conducts stock surveys that are fundamental to the sustainable management of the fishery. The data collected is used to set the amount of cockles the licence holders can catch. NRW will contribute w/data, knowledge and logistical support for sampling and surveys useful to WPs(4,5,6 and 8) NRW also aims to rationalise historical stock survey datasets collected by different bodies in various formats, some going back over 50 years, to aid research and test hypothesis on cockle growth and survival to maximise the productivity of the fisheries within Sustainable Management Principles. NRW will support the quantification of ecosystem services in line with these principles. ES: FR: PT:
2.5 Contact person	
2.5.1 Name	Stuart Thomas
2.5.2 Email	stuart.thomas@cyfoethnaturiolcymru.gov.uk
2.5.3 Phone	+443000653321
2.5.4 Address	Plas Gwendraeth, Heol Parc Mawr, Cross Hands Business Park, Cross Hands, Carmarthenshire.
2.5.5 Post code	SA14 6RE
2.5.6 City	Cross Hands
2.5.7 Country	United Kingdom
2.6 Legal representative	
2.6.1 Name	Stuart Thomas
2.6.2 Email	stuart.thomas@cyfoethnaturiolcymru.gov.uk
2.6.3 Phone	+443000653321
2.6.4 Address	Plas Gwendraeth, Heol Parc Mawr, Cross Hands Business Park, Cross Hands, Carmarthenshire.
2.6.5 Post code	SA14 6RE
2.6.6 City	Cross Hands
2.6.7 Country	United Kingdom
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	

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2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	10
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	IPMA
2.2.2 Organization name	Instituto Português do Mar e da Atmosfera, I.P.
2.2.3 Organization name in English	Portuguese Institute of Sea and Atmosphere, P.I .
2.2.4 Department	Aquaculture and Upgrading Division
2.2.5 Type of organization	Research and innovation organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	PT510265600
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN: Yes, but only partialy 11% ES: FR: PT:
2.2.7.3 VAT statement	Anx_20091/2017
2.2.8 Website	http://www.ipma.pt/pt/index.html
2.2.9 Size of the organization (employees)	417
2.3 Location	
2.3.1 Country	Portugal
2.3.2 Sub-Region (NUTS3)	Lisboa
2.3.3 City	Lisboa
2.3.4 Address	Rua C ao Aeroporto de Lisboa

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2.4 Partner profile	
2.4.1 Partner skills	<p>EN: IPMA is a public institute devoted to research, technological development, innovation, services and dissemination activities on sea and atmosphere. The Division of Aquaculture and Upgrading (DivAV) deals with pre competitive research and experimental development for fish and shellfish production.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.2 Transnational experience	<p>EN: Regarding project management, IPMA has participated in the last years in diverse financing programs, both national and international, with emphasis on FP7 (Collaborative Projects), LIFE, FCT, P2020 and H2020. IPMA coordinates one FP7 project and currently is also participating in an INTERREG SUDOE.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: IPMA will be involved in WP4 and WP5 contributing with data and analytical work from for the Portuguese sites; In WP7, the Experimental Mollusc hatchery facilities of IPMA will be used: IPMA will lead action 7.1.and will contribute to 7.3. It will also support a.5.2: Impacts of Invasive species.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: IPMA will Investigate population dynamics morphometrics, growth rates, condition, mortality and reproductive health (sex ratio, gametogenesis). We are able to evaluate the influence of environmental conditions in the energetic dynamics of reproductive cycle, too (WP4, WP4.1). IPMA also will improve culture procedures, selective breeding for resistance to disease and restoration, by using their Experimental Mollusc hatchery facilities(WP7). IPMA will conduct a health survey of cockle populations in the selected production sites in Portugal, in order to identify the pathogens and diseases that affect those populations, as well as the environmental conditions associated with (WP5).</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	Francisco Ruano
2.5.2 Email	fruno@ipma.pt
2.5.3 Phone	+351213027000
2.5.4 Address	IPMA Av. De Brasília
2.5.5 Post code	1449-006
2.5.6 City	Lisboa

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2.5.7 Country	Portugal
2.6 Legal representative	
2.6.1 Name	Jorge Miguel Miranda
2.6.2 Email	miguel.miranda@ipma.pt
2.6.3 Phone	+351213027000
2.6.4 Address	Rua C ao Aeroporto de Lisboa
2.6.5 Post code	1749-077
2.6.6 City	Lisboa
2.6.7 Country	Portugal
2.6.8 Date of entering into functions	2013-01-17
2.6.9 Probative document of the Legal representative	Anx_20092/2017
2.7 Bank account	
2.7.1 IBAN	PT50078101120112001238154
2.7.2 SWIFT	IGCPPTPL
2.7.3 Bank	Agência de Gestão da Tesouraria e da Divida Pública
2.7.4 Bank Account Owner	Instituto Português do Mar e da Atmosfera, I.P.
2.7.5 Bank Account Country	Portugal
2.7.6 DTCC Code	Lisboa
2.7.7 Bank Statement	Anx_28589/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-28
2.8.2 Co-financing declaration	Anx_21467/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-21
2.9.2 State Aid Declaration	Anx_20625/2017
2.0 Partner number	11
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	UA
2.2.2 Organization name	Universidade de Aveiro
2.2.3 Organization name in English	University of Aveiro
2.2.4 Department	Biology
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body
2.2.7 Tax ID	501461108

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2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN: Universidade de Aveiro has the pro-rata regime and may recover only 4% of the VAT amount ES: FR: PT:
2.2.7.3 VAT statement	Anx_20110/2017
2.2.8 Website	www.ua.pt
2.2.9 Size of the organization (employees)	1578
2.3 Location	
2.3.1 Country	Portugal
2.3.2 Sub-Region (NUTS3)	Centro
2.3.3 City	Aveiro
2.3.4 Address	Universidade de Aveiro, Campus de Santiago
2.4 Partner profile	
2.4.1 Partner skills	EN: UA team belongs to the research center CESAM (www.cesam.ua.pt); UA team conducts inter-disciplinary and collaborative research including chemistry, biochemistry and ecotoxicology, ranging from molecules to ecosystems, related to environmental conservation and sustainable use of marine ecosystems. ES: FR: PT:
2.4.2 Transnational experience	EN: UA team has a large experience in transnational projects, including INTERREG and SUDOE projects as well as bilateral cooperations (Portugal-France, Portugal-Spain). UA members are supervisors of Master and PhD thesis developed in collaboration with foreign Universities (e.g. France, Spain, Brazil). ES: FR: PT:
2.4.3 Role in the project	EN: UA will be the leader of WP2 (dissemination and communication actions). UA team will participate in the identification of parasites in cockles (WP5), environmental characterization of sampling areas, including quantification of contaminants (WP4) and the integration of information (WP3, WP7). ES: FR: PT:
2.4.4 Describe the activities that your organisation is going to implement in the project	EN: UA is leader of WP2, which includes the creation of project website and logo, development of dissemination material for end users (especially stakeholders);

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	<p>developing workshops; preparation of the final conference; dissemination of scientific information; development of activities for general public to disseminate the project outputs. The information gathered by the UA team will feed other WPs towards the development of cockles conservation and management tools: i)UA will be involved in sampling (5.1), contributing to the creation of a cockles parasites diversity map to provide a catalogue of the different infectious threats for the AA; ii) UA will provide cockles for metals and As analysis and data for exotic species (5.3 and 5.4), contributing to the creation of a map with the identification of contamination levels in different sampling areas and exotic species presence; iii) UA members will also collect and collate information to develop interactive maps (WP4).</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Rosa Freitas
2.5.2 Email	rosafreitas@ua.pt
2.5.3 Phone	+351914525095
2.5.4 Address	Departamento de Biologia, Universidade de Aveiro
2.5.5 Post code	3810-193
2.5.6 City	Aveiro
2.5.7 Country	Portugal
2.6 Legal representative	
2.6.1 Name	Manuel António Cotão de Assunção
2.6.2 Email	jfmendes@ua.pt
2.6.3 Phone	+351234370832
2.6.4 Address	Universidade de Aveiro, Campus de Santiago
2.6.5 Post code	3810-193
2.6.6 City	Aveiro
2.6.7 Country	Portugal
2.6.8 Date of entering into functions	2015-10-09
2.6.9 Probative document of the Legal representative	Anx_20106/2017
2.7 Bank account	
2.7.1 IBAN	PT50 0035 0123 00087008730 61
2.7.2 SWIFT	CGDIPTPL
2.7.3 Bank	Caixa Geral de Depositos
2.7.4 Bank Account Owner	Universidade de Aveiro
2.7.5 Bank Account Country	Portugal
2.7.6 DTCC Code	Aveiro

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2.7.7 Bank Statement	Anx_30104/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-13
2.8.2 Co-financing declaration	Anx_20449/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-15
2.9.2 State Aid Declaration	Anx_20104/2017
2.0 Partner number	12
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	FCUL
2.2.2 Organization name	Faculdade de Ciências da Universidade de Lisboa
2.2.3 Organization name in English	Faculty of Sciences, University of Lisbon
2.2.4 Department	Biologia Animal (Animal Biology)
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body
2.2.7 Tax ID	PT502618418
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	Anx_20109/2017
2.2.8 Website	https://ciencias.ulisboa.pt/ http://www.mare-centre.pt/en
2.2.9 Size of the organization (employees)	618
2.3 Location	
2.3.1 Country	Portugal
2.3.2 Sub-Region (NUTS3)	Lisboa
2.3.3 City	Lisboa
2.3.4 Address	Campo Grande, edifício C5, Lisboa
2.4 Partner profile	
2.4.1 Partner skills	EN: FCUL-MARE combines expertise on all types of aquatic systems, from river basins and associated landscapes, to estuaries, coastal and large marine ecosystems, the open-ocean and deep-sea, on a context of global and regional changes and cumulative anthropogenic impacts. ES:

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	FR: PT:
2.4.2 Transnational experience	EN: FCUL has participated on FP7 (Collaborative Projects and Marie Curie Actions), LIFE + and H2020. On FCUL international experience stands out the coordination of 2 EU projects (FP7). FCUL is also participating in an INTERREG SUDOE project recently approved. ES: FR: PT:
2.4.3 Role in the project	EN: FCUL will be the leader of action 5.3 of WP5. The FCUL team will participate in actions related to cockle distribution, abundance and population dynamics (WP4), estimation of ecosystem's carrying capacity (WP6) and quantification of the ecosystem service (WP8). It will also engage WP 2 and 3. ES: FR: PT:
2.4.4 Describe the activities that your organisation is going to implement in the project	EN: FCUL will coordinate the sampling design that integrates actions 4.2 and 5.3, to provide data on the population status of the cockle and sympatric non-indigenous species (NIS). FCUL will conduct sampling and sample processing at Portuguese systems and analyse data provided from other partners. FCUL will set the experiments needed to assess competition between the cockle and sympatric NIS, namely filtration rates based on biodeposits and diet determination. This will be coordinated with the isotopic analysis (action 6.3). Cockle samples will be provided for the genetic and pathogen studies (actions 4.4, 5.1 and 5.2) and benthic organisms will be provided for the biodiversity and ecosystem services assessment (8.1). FCUL will also promote meetings with the associate partners to provide data and interactions needed for the development of WP2, WP3 and WP8. ES: FR: PT:
2.5 Contact person	
2.5.1 Name	Paula Chainho
2.5.2 Email	pmchainho@fc.ul.pt
2.5.3 Phone	+351962415546
2.5.4 Address	Marine and Environmental Sciences Centre, Facul. de Ciências da Universidade de Lisboa, Campo Grande
2.5.5 Post code	1749-016
2.5.6 City	Lisboa
2.5.7 Country	Portugal
2.6 Legal representative	
2.6.1 Name	José Artur Martinho Simões
2.6.2 Email	jams@direcao.ciencias.ulisboa.pt

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2.6.3 Phone	+351217500 000
2.6.4 Address	Campo Grande, edifício C5, Lisboa
2.6.5 Post code	1749-016
2.6.6 City	Lisboa
2.6.7 Country	Portugal
2.6.8 Date of entering into functions	2014-03-03
2.6.9 Probative document of the Legal representative	Anx_20108/2017
2.7 Bank account	
2.7.1 IBAN	PT50078101120000000604672
2.7.2 SWIFT	IGCPPTPL
2.7.3 Bank	Agência de Gestão da Tesouraria e da Dívida Pública - IGCP, EPE
2.7.4 Bank Account Owner	Facultade de Ciências da Universidade de Lisboa
2.7.5 Bank Account Country	Portugal
2.7.6 DTCC Code	Lisboa
2.7.7 Bank Statement	Anx_20113/2017
2.8 Co-financing declaration	
2.8.1 Document date	2017-09-15
2.8.2 Co-financing declaration	Anx_20111/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-15
2.9.2 State Aid Declaration	Anx_20112/2017
2.0 Partner number	13
2.1 Position in the partnership	Partner
2.2 Entity	
2.2.1 Organization acronym when applicable	UoCaen
2.2.2 Organization name	Université de Caen Normandie
2.2.3 Organization name in English	University of Caen
2.2.4 Department	UMR BOREA Biologie des Organismes et Ecosystèmes Aquatiques CNRS-7208, IRD-207, MNHN, UPMC, UniCaen
2.2.5 Type of organization	Universities and higher education
2.2.6 Legal status	Public body
2.2.7 Tax ID	191 414 085 00016
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN:

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	<p>The activities carried out in the frame of the project by this public law body are falling within its public mandate under national laws. VAT is recovered but not eligible.</p> <p>ES: FR: PT:</p>
2.2.7.3 VAT statement	Anx_20676/2017
2.2.8 Website	http://borea.mnhn.fr/
2.2.9 Size of the organization (employees)	2718
2.3 Location	
2.3.1 Country	France
2.3.2 Sub-Region (NUTS3)	Basse Normandie
2.3.3 City	Caen
2.3.4 Address	Université de Caen Normandie, UMR BOREA, Esplanade de la paix
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: UoCaen team belongs to the research laboratory BOREA; Francis Orvain has vast experience on aquaculture and estuarine environments, in work with cockle beds management and on modelling trophic interactions between primary producers and the cockles and describing mechanism driving these interactions</p> <p>ES: FR: PT:</p>
2.4.2 Transnational experience	<p>EN: UoCaen team has an experience in transnational projects, including INTERREG projects (e.g. RECIF-Project). UC members develop collaborations with foreign Universities (e.g. UK, Portugal, Netherlands).</p> <p>ES: FR: PT:</p>
2.4.3 Role in the project	<p>EN: In WP8 UoCaen will coordinate field experiments. It will participate in evaluating the role of cockles in the dissemination of virus responsible for oyster spat mortality (WP8.2), provide datasets and information (useful for all WPs). It will develop numerical models on trophic interactions in (WP6)</p> <p>ES: FR: PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: UoCaen is co-leader of WP8, which includes experiments in 4 sites (one per country) to quantify the role of cockles as ecosystems engineers stimulating microphytobenthic microalgae production and surface erosion. The information gathered by this team will feed other WPs and the development of cockles conservation and management tools: i) UC will be involved in sampling (5.3),</p>

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	<p>contributing to the role of cockles in the limitation of viral dissemination of μvar - Ostreid Herpes Virus 1, cockles providing ecosystemic services by diminishing the potential viral threats for oysters spats <i>Crassostrea gigas</i>; ii) UC will provide large datasets regarding population dynamics in Normandy estuaries useful for all WP, iii) WP5 will be involved in the production of hydrodynamic models for estimating growth and reproduction. It will also support interaction with associate partners in France and contribute to WPs 1-3.</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Francis Orvain
2.5.2 Email	francis.orvain@unicaen.fr
2.5.3 Phone	+33622762629
2.5.4 Address	Université de Caen Normandie, UMR BOREA, Esplanade de la paix
2.5.5 Post code	14032 cedex 5
2.5.6 City	Caen
2.5.7 Country	France
2.6 Legal representative	
2.6.1 Name	Pierre Denise
2.6.2 Email	Pierre.denise@unicaen.fr
2.6.3 Phone	+ 33231565081
2.6.4 Address	Université de Caen Normandie, UMR BOREA
2.6.5 Post code	14032 cedex 5
2.6.6 City	Caen
2.6.7 Country	France
2.6.8 Date of entering into functions	2016-04-04
2.6.9 Probative document of the Legal representative	Anx_20678/2017
2.7 Bank account	
2.7.1 IBAN	FR76 100 7114 0000 0001 0002 3068
2.7.2 SWIFT	TRPUFRP1
2.7.3 Bank	DIRECTION REGIONALE DES FINANCES PUBLIQUES
2.7.4 Bank Account Owner	UNIVERSITE DE CAEN NORMANDIE
2.7.5 Bank Account Country	France
2.7.6 DTCC Code	
2.7.7 Bank Statement	Anx_20675/2017
2.8 Co-financing declaration	

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2.8.1 Document date	2017-09-21
2.8.2 Co-financing declaration	Anx_20679/2017
2.9 State aid declaration	
2.9.1 Date	2017-09-21
2.9.2 State Aid Declaration	Anx_20677/2017
2.0 Partner number	14
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	MI
2.2.2 Organization name	Marine Institute Ireland
2.2.3 Organization name in English	Marine Institute Ireland
2.2.4 Department	n/a
2.2.5 Type of organization	National public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	IE6600338L
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	www.marine.ie
2.2.9 Size of the organization (employees)	180
2.3 Location	
2.3.1 Country	Ireland
2.3.2 Sub-Region (NUTS3)	Border, Midland and Western
2.3.3 City	Galway
2.3.4 Address	Oranmore, Rinville
2.4 Partner profile	
2.4.1 Partner skills	EN: Marine Institute promotes and assist in marine research and development to support economic development and protect the marine environment. They provide expertise in fisheries, marine environment and ecosystem services, aquaculture, fish and shellfish health, catch management, and climate change. ES: FR: PT:
2.4.2 Transnational experience	EN:

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	<p>Extensive history of Involvement with numerous national and international projects, stakeholders and policy makers.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: Marine Institute Ireland will be an associated partner attending and contributing to project meetings in an advisory capacity, and supporting the capitalization of project outputs in Ireland.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: Marine Institute Ireland will provide scientific and technical advice to the Cockles project and will advise on national and European policy, conveying key messages about COCKLES outputs to relevant stakeholders in Ireland and at European scale.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	Deborah Cheslett
2.5.2 Email	deborah.cheslett@marine.ie
2.5.3 Phone	+35391387200
2.5.4 Address	Oranmore, Rinville
2.5.5 Post code	H91 R673
2.5.6 City	Galway
2.5.7 Country	Ireland
2.6 Legal representative	
2.6.1 Name	Caroline Bocquel
2.6.2 Email	Director of Corporate Services
2.6.3 Phone	+35391387200
2.6.4 Address	Rinville, Oranmore
2.6.5 Post code	H91 R673
2.6.6 City	Galway
2.6.7 Country	Ireland
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	

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2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	15
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	Ifremer
2.2.2 Organization name	Institut français de recherche pour l'exploitation de la mer
2.2.3 Organization name in English	French Research Institute for Exploitation of the Sea
2.2.4 Department	Départ. Ressources Biologiques & Environnement: Lab. de Génétique & Pathologie des Mollusques Marins
2.2.5 Type of organization	Research and innovation organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	33071536800107
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	http://wwz.ifremer.fr/institut_eng
2.2.9 Size of the organization (employees)	1593
2.3 Location	
2.3.1 Country	France
2.3.2 Sub-Region (NUTS3)	Nouvelle Aquitaine
2.3.3 City	La Tremblade
2.3.4 Address	LGPM-Ifremer Av de Mus de oup
2.4 Partner profile	

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2.4.1 Partner skills	<p>EN: Ifremer (including LGPMM) is recognised for its expertise in shellfish pathology and is involved in the surveillance of mollusc diseases at national and international level. It has developed research works on the diversity of mollusc parasite and on their interactions with their hosts</p> <p>ES: FR: PT:</p>
2.4.2 Transnational experience	<p>EN: LGPMM is the EU and OIE Reference Laboratory for mollusc diseases and the OIE reference laboratory for marteiliosis and bonamiosis. It has coordinated European projects on mollusc pathology is currently coordinating the H2020 project VIVALDI (Preventing and mitigating farmed bivalve diseases).</p> <p>ES: FR: PT:</p>
2.4.3 Role in the project	<p>EN: The LGPMM will provide support to Actions 5.1 and 5.2 related to the detection of pathogens affecting cockles and to the definition of cockle holobiome, and will be key in channelling project findings about the health of cockle populations at European and international Level.</p> <p>ES: FR: PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: The LGPMM will provide its expertise in the field of shellfish diseases and particularly will contribute to the detection of numerous pathogens of cockles with complementary techniques including histology. LGPMM skills will particularly help in Actions 5.1 (census of parasites along AA) and 5.2 (definition of holobiome). Besides, Ifremer being EU Reference Laboratory (EURL) for Mollusc diseases and the OIE Reference Laboratory for bonamiosis and marteiliosis, COCKLES will provide an important information for the activity of these reference laboratories. Interactions with the EURL will enable the project to support the implementation and monitoring of relevant EU policies with this regard.</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Isabelle ARZUL
2.5.2 Email	isabelle.arzul@ifremer.fr
2.5.3 Phone	+33546762610
2.5.4 Address	LGPMM-Ifremer Av de Mus de oup
2.5.5 Post code	17390
2.5.6 City	La Tremblade
2.5.7 Country	France

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2.6 Legal representative	
2.6.1 Name	Patrick VINCENT
2.6.2 Email	Patrick.Vincent@ifremer.fr
2.6.3 Phone	+33146482100
2.6.4 Address	155 rue Jean-Jacques Rousseau
2.6.5 Post code	92138
2.6.6 City	Issy-les-Moulineaux
2.6.7 Country	France
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	16
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	SEPANSO
2.2.2 Organization name	Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest
2.2.3 Organization name in English	Federal Society for Study, Protection and Management of Environment in South-West of France
2.2.4 Department	Réserve Naturelle Nationale du Banc d'Arguin
2.2.5 Type of organization	Civil society and third sector organisations
2.2.6 Legal status	Not-for-profit private organization

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2.2.7 Tax ID	30131318500029
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	http://www.sepanso.org/index.php
2.2.9 Size of the organization (employees)	17
2.3 Location	
2.3.1 Country	France
2.3.2 Sub-Region (NUTS3)	Nouvelle Aquitaine
2.3.3 City	Bordeaux
2.3.4 Address	SEPANSO 1 rue de Tauzia
2.4 Partner profile	
2.4.1 Partner skills	EN: Expert in management of protected and natural coastal environments. SEPANSO main objective is conservation of natural assets. Involved in fauna monitoring with a strong focus on sea birds and waders at regional and national scales. ES: FR: PT:
2.4.2 Transnational experience	EN: Significant contribution to wintering birds' census and counting at international scale (Wetlands International Project). Education projects with environment concern, in collaboration with National Parc of Band d'Arguin in Mauritania. ES: FR: PT:
2.4.3 Role in the project	EN: Christophe Le Noc is head manager of the reserve. He will provide access to the reserve (=one of the sampling site) and facilitate communication and study implementation between the consortium and the reserve. ES: FR: PT:
2.4.4 Describe the activities that your organisation is going to implement in the project	EN: Christophe Le Noc will be able to provide assistance in disseminating COCKLES project outputs within the reserve and SEPANSO. It is also expected to share data on birds (reserves) and cockles (UBx) in order to go deeper in the understanding of the role of cockle in wadders occurrence. ES: FR:

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	PT:
2.5 Contact person	
2.5.1 Name	Christophe LE NOC
2.5.2 Email	rnarguin@wanadoo.fr
2.5.3 Phone	+33556664587
2.5.4 Address	Réserve Naturelle du Banc d'Arguin Chemin du petit Bordes
2.5.5 Post code	33260
2.5.6 City	La Teste de Buch
2.5.7 Country	France
2.6 Legal representative	
2.6.1 Name	Pierre DAVANT
2.6.2 Email	pdt.sep@wanadoo.fr
2.6.3 Phone	+33556913365
2.6.4 Address	SEPANSO 1 rue de Tauzia
2.6.5 Post code	33800
2.6.6 City	Bordeaux
2.6.7 Country	France
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	17
2.1 Position in the partnership	Associated partner

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2.2 Entity	
2.2.1 Organization acronym when applicable	CNRS
2.2.2 Organization name	Centre National de la Recherche Scientifique Délégation Aquitaine
2.2.3 Organization name in English	French National center for scientific research
2.2.4 Department	Team: Aquatic Ecotoxicology
2.2.5 Type of organization	National public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	180 089 013 02458
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	<p>EN: The CNRS is authorized to deduct the VAT paid on its expenses in proportion to its deduction coefficient (which is equal to one), except for expenses subject to a restriction or exclusion measure by the tax regulation.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.2.7.3 VAT statement	
2.2.8 Website	http://www.cnrs.fr/aquitaine/
2.2.9 Size of the organization (employees)	31944
2.3 Location	
2.3.1 Country	France
2.3.2 Sub-Region (NUTS3)	Nouvelle Aquitaine
2.3.3 City	TALENCE
2.3.4 Address	CNRS - Délégation Aquitaine Esplanade des Arts et Métiers BP 105
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: CNRS is a world's leading research organization in terms of scientific publications. It has important scientific skills notably in determining the health status of mollusc and the impact of shellfish diseases using pluridisciplinary approaches (molecular biology, physiology..)</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.2 Transnational experience	<p>EN: CNRS has an extensive transnational experience in European contracts: over the 2007-2014 programming period more than 70 contracts were managed and justified (including 8 INTERREG projects); Over the period 2014-2020, 25 European contracts were followed, including 2 INTERREG SUDOE projects.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>

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2.4.3 Role in the project	EN: Expert advice on molecular biology+ dissemination to a wide community of stakeholders at European and International Level ES: FR: PT:
2.4.4 Describe the activities that your organisation is going to implement in the project	EN: As associate participant CNRS will provide its expertise in the field of shellfish survey and diseases analysis . Additionally CNRS has an extensive network which will be a good vector for dissemination. ES: FR: PT:
2.5 Contact person	
2.5.1 Name	Patrice Gonzalez
2.5.2 Email	patrice.gonzalez@u-bordeaux.fr
2.5.3 Phone	+33556223926
2.5.4 Address	Allée Geoffroy Saint-Hilaire - 33615 PESSAC CEDEX - FRANCE
2.5.5 Post code	33615
2.5.6 City	PESSAC
2.5.7 Country	France
2.6 Legal representative	
2.6.1 Name	Gaëlle Bujan
2.6.2 Email	deleguee@dr15.cnrs.fr
2.6.3 Phone	+33557355858
2.6.4 Address	CNRS - Délégation Aquitaine Esplanade des Arts et Métiers BP 105
2.6.5 Post code	33402
2.6.6 City	TALENCE
2.6.7 Country	France
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	

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2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	18
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	CCambados
2.2.2 Organization name	CONFRARÍA DE PESCADORES SAN ANTONIO DE CAMBADOS
2.2.3 Organization name in English	Cambados Fishing Guild
2.2.4 Department	n/a
2.2.5 Type of organization	Business networks and associations
2.2.6 Legal status	Not-for-profit private organization
2.2.7 Tax ID	G 36012847
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	http://cambados.saecdata.net/es/
2.2.9 Size of the organization (employees)	22
2.3 Location	
2.3.1 Country	Spain
2.3.2 Sub-Region (NUTS3)	Galicia
2.3.3 City	Cambados
2.3.4 Address	RÚA NOVA S/N
2.4 Partner profile	
2.4.1 Partner skills	EN: CCambados is one of the largest, and most important small scale fishermen and women associations in Galicia. More than 1000 fishermen and women belong to this guild. Among their most important activities they perform shellfish harvesting and cockle is one of the key and most traditional species. ES: FR: PT:

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2.4.2 Transnational experience	<p>EN: They have been involved in one European Project, SEREA. Funded by the European Social Fund and aimed at new models for socioeconomic and labor restructuring in the fishing sector.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: CCambados will convey the COCKLEs information to their associates and involve them in discussion workshops both to update their information about COCKLEs situation in the AA, and also to engage the sector in capitalization actions. They will facilitate access to sampling sites and empirical data.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: CCambados will facilitate empirical data about cockle in the Ria of Arousa. They will involve their associates in workshops and project meetings to guarantee their understanding of the project outputs and to prepare to use them. They will facilitate dissemination to individuals in the fishing community they represent involving all: harvestors, retailers, processors, tourism agents and conservation NGOs already operating in this area. They will transmit their experience to their counterparts in other regions in the AA and commit capitalization efforts in desining management plans with a new knowlegde base. They will also facilitate the trial of new culture techniques and resources resulting from WP7. For this, capacitation of this associate partners will also ensure the sustainability of the project beyond the funding period by applying the results obtained.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	JOSÉ CARLOS MARIÑO BALSA
2.5.2 Email	maicarril@gmail.com
2.5.3 Phone	+34609127775
2.5.4 Address	RÚA NOVA S/N .
2.5.5 Post code	36630
2.5.6 City	Cambados
2.5.7 Country	Spain
2.6 Legal representative	
2.6.1 Name	RUPERTO COSTA FERNÁNDEZ
2.6.2 Email	cofradia@cofradiacambados.org
2.6.3 Phone	+34986542056
2.6.4 Address	RÚA NOVA S/N

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2.6.5 Post code	36630
2.6.6 City	Cambados
2.6.7 Country	Spain
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	19
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	SXCAA
2.2.2 Organization name	Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia
2.2.3 Organization name in English	General Secretariat of Quality and Environmental Assesment
2.2.4 Department	MeteoGalicia
2.2.5 Type of organization	Regional public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	S1511001H
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	

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2.2.8 Website	www.meteogalicia.gal
2.2.9 Size of the organization (employees)	107
2.3 Location	
2.3.1 Country	Spain
2.3.2 Sub-Region (NUTS3)	Galicia
2.3.3 City	Santiago de Compostela
2.3.4 Address	San Lázaro, S/N
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: MeteoGalicia has been involved in many projects to build up operational oceanography. ROMS, MOHID, WWIII and Swan models are operationally run twice a day. We maintain observations in 6 different buoys located in the Galician coast. Data and results of the models are on-line available in our web.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.2 Transnational experience	<p>EN: Main partners of RAIA and RAIACo (InterregIVa and Poctep) to develop a coastal oceanographic observatory. Partners of RAIA-Tec. Projects financed by Atlantic Area Transnational Cooperation Program (INTERREG IIIB and IVB): Arcopol, Easy, EasyCo, EnergyMare, Erocips.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: MeteoGalicia will give access to couple its hydrodynamic models (ROMS and MOHID) with the transport model of cockles larvae developed by UB (WP6) and produce maps of larvae concentration in different oceano-meteorological circumstances for the coast of Galicia that will be available through the web.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: MeteoGalicia will facilitate with advice, data and technical means, the following activities: The coupling between hydrodynamic models (ROMS and MOHID) and cockles larvae transport to achieve a successful coupling for the area under study (Galician Coast); The elaboration of concentration maps under different oceano-meteorological conditions. We will choose representative situations for different seasons; Routinely produce forecast for these concentrations maps for the next three days using their own forecast models; The study of the behavior of this coupled system under different climate-change scenarios; The development of a climate service with these concentration maps and to make this available through the web page of MeteoGalicia and also through the web of the Raia Observatory, supporting this all the capitalization of past and present results and the dissemination of</p>

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	COCKLES to a wide vast community of users (of meteorological information) in the region. ES: FR: PT:
2.5 Contact person	
2.5.1 Name	María Luz Macho Eiras
2.5.2 Email	maria.luz.macho.eiras@xunta.gal
2.5.3 Phone	+34881999659
2.5.4 Address	Rúa Roma, 6
2.5.5 Post code	15707
2.5.6 City	Santiago de Compostela
2.5.7 Country	Spain
2.6 Legal representative	
2.6.1 Name	María Cruz Ferreira Costa
2.6.2 Email	Maria.cruz.ferreira.costa@xunta.gal
2.6.3 Phone	+34981541705
2.6.4 Address	San Lázaro, S/N
2.6.5 Post code	15781
2.6.6 City	Santiago de Compostela
2.6.7 Country	Spain
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	

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2.0 Partner number	20
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	INTECMAR
2.2.2 Organization name	Instituto Tecnológico para o Control do Medio Mariño de Galicia
2.2.3 Organization name in English	Technological Institute for the Monitoring of the Marine Environment in Galicia
2.2.4 Department	UNIDAD DE MODELADO OCEANOGRÁFICO/ UNIDAD DE PATOLOGÍA/ UNIDAD DE DOCUMENTACION Y APOYO CIENTÍFICO
2.2.5 Type of organization	Regional public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	Q3600376B
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	www.intecmar.gal
2.2.9 Size of the organization (employees)	83
2.3 Location	
2.3.1 Country	Spain
2.3.2 Sub-Region (NUTS3)	Galicia
2.3.3 City	Vilagarcía de Arousa
2.3.4 Address	Peirao de Vilaxoán s/n
2.4 Partner profile	
2.4.1 Partner skills	EN: The Oceanographic Modelling Unit & Documentation and Scientific Support Unit, have vast experience in the use of knowledge on numeric, ocean-meteorology, data management and web services development. ES: FR: PT:
2.4.2 Transnational experience	EN: INTECMAR has a long experience in the management of collaborative projects at European level. It participated during the last ten years in the projects RAIA, RAIACO, RAIATEC (POCTEP), EROCIPS, EASY, EASYCO, ARCOPOL Family projects (Atlantic Area); MARINER (DG-ECHO). ES: FR: PT:

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2.4.3 Role in the project	<p>EN: INTECMAR will actively support with guidance and data the activities about modelling of cockles larvae and those in WP4 and 5 to characterize past and present situation of cockle populations and production sites in Galicia.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: Supporting activities: provision of data for WPs 4, 5 and 8. Provision of data and advice for modelling activities committed in WP6. Dissemination of results to all the relevant stakeholders in the region, and working closely with CIMA and CETMAR to convey the project outcomes to producers and to the Regional Ministry of the Sea, that links them all.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	Pedro Montero Vilar
2.5.2 Email	pmontero@intecmar.gal
2.5.3 Phone	+34986512320
2.5.4 Address	Peirao de Vilaxoán s/n
2.5.5 Post code	36611
2.5.6 City	Vilagarcía de Arousa
2.5.7 Country	Spain
2.6 Legal representative	
2.6.1 Name	Mª Covadonga Salgado Blanco
2.6.2 Email	csalgado@intecmar.gal
2.6.3 Phone	+34986512320
2.6.4 Address	Peirao de Vilaxoán s/n
2.6.5 Post code	36611
2.6.6 City	Vilagarcía de Arousa
2.6.7 Country	Spain
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	

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2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	21
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	Formosa
2.2.2 Organization name	Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.
2.2.3 Organization name in English	Formosa, Cooperative of Ria Formosa Shellfish Producers, C.R.L.
2.2.4 Department	n/a
2.2.5 Type of organization	Civil society and third sector organisations
2.2.6 Legal status	Not-for-profit private organization
2.2.7 Tax ID	504301624
2.2.7.1 VAT recovery	1
2.2.7.2 If YES explain how?	EN: As required by law by our government for whom who is working in our commercial business. The Standard VAT rate is 23%, and there are reduced rates of 13% and 6%. ES: FR: PT:
2.2.7.3 VAT statement	
2.2.8 Website	https://goo.gl/oLtXli
2.2.9 Size of the organization (employees)	4 employees
2.3 Location	
2.3.1 Country	Portugal
2.3.2 Sub-Region (NUTS3)	Algarve
2.3.3 City	Olhão
2.3.4 Address	Apartado 1002 EC. Zona Industrial de Olhão
2.4 Partner profile	
2.4.1 Partner skills	EN:

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	<p>CFormosa represents a group of bivalve mollusc producers and was established 1998. It operates in the geographical area bounded by the Ria Formosa Natural Park. Their role is fundamental to the mollusc farming community. It is the link between the producers and the entities that regulate activity.</p> <p>ES: FR: PT:</p>
2.4.2 Transnational experience	<p>EN: Community initiative EQUAL concerning transnational cooperation to promote new means of combating discrimination and inequalities in connection with the labour market; Coexist – Interaction in coastal waters – From 2010 to 2013.</p> <p>ES: FR: PT:</p>
2.4.3 Role in the project	<p>EN: Formosa is an end user of the results obtained in this Project since cockle exploitation is highly representative at Ria Formosa, where they are based. Formosa participation is to ensure that scientific knowledge generated within this Project is focused on the producers needs.</p> <p>ES: FR: PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: Formosa participation is to ensure that scientific knowledge generated within this Project is focused on the producers' needs. Capacitation of this cooperative will also ensure the sustainability of the project beyond the funding period by applying the results obtained. Formosa will participate at the technical workshops of the project and stakeholders meetings. Formosa will provide information related to producers needs at their working area. They will also provide technical support during the sampling campaigns.</p> <p>ES: FR: PT:</p>
2.5 Contact person	
2.5.1 Name	Marta Barcelos Rocha
2.5.2 Email	coopformosa@gmail.com
2.5.3 Phone	+351289721758
2.5.4 Address	Apartado 1002 EC. Zona Industrial de Olhão, Portugal
2.5.5 Post code	8700-402
2.5.6 City	Olhao
2.5.7 Country	Portugal
2.6 Legal representative	
2.6.1 Name	José Marcos Matias Florêncio
2.6.2 Email	coopformosa@gmail.com

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2.6.3 Phone	+351289721758
2.6.4 Address	Apartado 1002 EC. Zona Industrial de Olhão
2.6.5 Post code	8700-402
2.6.6 City	Olhão
2.6.7 Country	Portugal
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
2.0 Partner number	22
2.1 Position in the partnership	Associated partner
2.2 Entity	
2.2.1 Organization acronym when applicable	ICNF
2.2.2 Organization name	Instituto da Conservação da Natureza e das Florestas
2.2.3 Organization name in English	Institute for Nature Conservation and Forests
2.2.4 Department	n/a
2.2.5 Type of organization	National public organisations
2.2.6 Legal status	Public body
2.2.7 Tax ID	PT510342647
2.2.7.1 VAT recovery	0
2.2.7.2 If YES explain how?	EN: ES: FR:

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	PT:
2.2.7.3 VAT statement	
2.2.8 Website	http://www.icnf.pt/portal
2.2.9 Size of the organization (employees)	1388
2.3 Location	
2.3.1 Country	Portugal
2.3.2 Sub-Region (NUTS3)	Lisboa
2.3.3 City	Lisbon
2.3.4 Address	Av. da República, 16 – 16B
2.4 Partner profile	
2.4.1 Partner skills	<p>EN: Nature conservation and management authority. ICNF, IP's mission is to propose, monitor and ensure the implementation of nature conservation and forest policies, with a view to the conservation, sustainable use, valorisation, enjoyment and public recognition of natural resources.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.2 Transnational experience	<p>EN: Several EU projects: LIFE, Interreg</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.3 Role in the project	<p>EN: ICNF is an end user of the results obtained in this Project since cockle exploitation takes place in several protected areas located in estuarine and coastal systems..</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.4.4 Describe the activities that your organisation is going to implement in the project	<p>EN: ICNF participation in this project aims to ensure that ecosystem services provided by the cockle are compatible with nature conservation objectives in protected areas. ICNF will participate at the technical workshops of the project and stakeholders meetings. ICNF will provide information related to the conservation values at the protected areas included in the study area of the Project, which might be used as support for the elaboration of dissemination materials.</p> <p>ES:</p> <p>FR:</p> <p>PT:</p>
2.5 Contact person	
2.5.1 Name	Dinah Sobral
2.5.2 Email	dinah.sobral@icnf.pt

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2.5.3 Phone	+351213507900
2.5.4 Address	Av. da República, 16 – 16B
2.5.5 Post code	1050-191
2.5.6 City	Lisboa
2.5.7 Country	Portugal
2.6 Legal representative	
2.6.1 Name	Rogério Rodrigues
2.6.2 Email	rogerio.rodrigues@icnf.pt
2.6.3 Phone	+351213507900
2.6.4 Address	Av. da República, 16 – 16B
2.6.5 Post code	1050-191
2.6.6 City	Lisboa
2.6.7 Country	Portugal
2.6.8 Date of entering into functions	
2.6.9 Probative document of the Legal representative	
2.7 Bank account	
2.7.1 IBAN	
2.7.2 SWIFT	
2.7.3 Bank	
2.7.4 Bank Account Owner	
2.7.5 Bank Account Country	
2.7.6 DTCC Code	
2.7.7 Bank Statement	
2.8 Co-financing declaration	
2.8.1 Document date	
2.8.2 Co-financing declaration	
2.9 State aid declaration	
2.9.1 Date	
2.9.2 State Aid Declaration	
3. Brief Summary	
3.1 Brief Summary	<p>EN: Cockles provide a wealth of services to coastal communities in the Atlantic Area (AA). COCKLES will restore production and the services provided by this emblematic resource, threatened by disease outbreaks and suboptimal management. Developing aquaculture, resistant strains and recovering natural stocks, optimizing management and upskilling stakeholders will aid recovering</p>

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resources, increase the understanding of ecosystem services and contribute to the GES and boost coastal economies of AA

ES:

El berberecho proporciona gran riqueza las comunidades costeras en el Área Atlántica (AA). COCKLES restaurará la producción y los servicios proporcionados por este recurso emblemático, acechado por patologías y una gestión ineficiente. El desarrollo de la acuicultura, de estirpes resistentes, la recuperación de stocks, optimizando la administración y las capacidades de los actores lograrán recuperar el recurso, valorizar los servicios de ecosistema y desarrollar las economías costeras en el AA

FR:

La coque participe à de nombreux services sur le littoral Atlantique (AA). COCKLES propose de restaurer la production et les services fournis par cette ressource emblématique menacée par les maladies et une gestion parfois inefficace. Développer l'aquaculture, rechercher des lignées résistantes, restaurer les populations pour optimiser la gestion de la ressource contribueront au retour des coques, à l'évaluation des services écosystémiques et stimulera l'économie côtière le long de l'AA.

PT:

O berbigão proporciona uma grande riqueza para as comunidades costeiras na Área Atlântica (AA). COCKLES irá restaurar a produção e os serviços proporcionados por este recurso emblemático, ameaçado por patologias e uma gestão ineficiente. O desenvolvimento da aquicultura, de estirpes resistentes, a recuperação de stocks, otimizando a administração e as capacidades dos atores contribuirá para a valorização dos serviços do ecossistema e para o desenvolvimento das economias costeiras na AA

3.2 Explain eventual modifications in relation to the submitted EOI

EN:

No relevant changes have been made to the summary. It still reflects the essence of the project. Important improvements have been made to explain the value added of the work proposed for target users and the innovation provided by the project approach itself and through the expected results and outputs. COCKLES is focused on applicability of knowledge generated and on the sustainable impact of its results. Associates give proof of relevance and have committed on capitalization and impact.

ES:

FR:

PT:

4. Project Description

4.1 Overall objective

EN:

Cockles provide meaningful environmental, societal, cultural as well as economic benefits to coastal communities in ES, PT, FR, IE, and UK, but are threatened by disease and sub-optimal management. This project will restore and increase cockle production and the services it provides in the Atlantic Area, using the following objectives: -To assess the health, diversity and inter-relationships of cockle populations across the AA by characterising population dynamics, genetic diversity and larval transport, threats from disease, pollution, invasive species and climate -To quantify the wider economic, societal and cultural benefits from ecosystem services provided by cockles (fishery, aquaculture, biodiversity, food for birds, tourism, cultural services), by surveys, interviews and socio-economic analysis -To provide new techniques for cockle management by developing new technology and procedures for

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cockle bed restoration, hatchery technology for seed production, selective breeding programmes to produce disease-resistant and fast growing strains, and conservation of genetic structure/diversity -To provide guidance on best practice for producers, administrations, environmental agencies, and NGOs, by evaluating and sharing best practice across the AA and optimizing management through mutual learning This will result in improved cockle production, a strong, viable and sustainable industry, with recognised societal and biodiversity benefits.

ES:

FR:

PT:

4.2 Common Challenge

4.2.1 Common Challenge

EN:

Cockles suffer from periodic mass mortalities with severe effects on natural stocks. The frequency and intensity of such episodes have significantly increased in the last 50 years, especially for the most valued native species, *Cerastoderma edule*. Mortality for this species has been dramatic in the last decade due to devastating effects of emergent diseases. Overfishing, inefficient management and worse environmental conditions have also led to dramatic production declines throughout the AA. Despite this, Europe produces # 800K tn. of molluscs/year, representing a turnover of 1,100M€ and about 37K direct employments, representing 50% of global EU aquaculture production. Clams and cockles production in EU-28 reached 30KT, with a value of 174M€ in 2013 (Eurostat), with AA countries among the major producer communities. Cockles are considered a delicacy of the Atlantic gastronomy and an asset for tourism. From a social perspective, cockles are traditionally exploited by small associations often with high rates of female employment. In terms of protection areas cockle is a key-species, for many top predators (finfish, waders). The decline of production threatens equilibrium of the global food-web in coastal environments. Mass mortalities and declining stocks have already resulted in economic and ecological losses. This has severe consequences for the social structure of coastal communities, and for the wider ecosystem services and societal benefits provided by cockles.

ES:

FR:

PT:

4.2.2 Explain modifications in relation to the submitted EOI

EN:

The proposal challenge remains the same. The project update (from the EOI) covers all its facets through the workplan structure and as a result, it shall be stressed that COCKLES is expected to have positive impact: _To the environment, through improved conservation and management of this important resource; _To the economy, through the improvements on production processes and thus, through better chances for sustainable exploitation; _To the society, through enhancing the value of cockles for all the coastal communities, which will better understand the importance of natural resources and get sound arguments to improve management and spread its benefits to other activities such as cultural or touristic.

ES:

FR:

PT:

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4.3 What is new?

4.3.1 What is new?

EN:

Cockles and the ecosystem services they provide have never been targeted for integrated knowledge and improved management at AA scale. Population characterisation and food-web models will assess the impact of biological interactions between trophic levels in coastal habitats but also in cockle individuals. We will know how an impact on cockles, as a key ecosystem species, affects other organisms and the coastal biodiversity and ecology. Novel operational tools, based upon modelling and genetic data to figure out cockle larval dispersal in different environmental scenarios, will be tested. Efficient culture procedures, including hatchery protocols, and refined genetic tools to produce fast-growing and resistant strains will reinforce natural populations and improve, sustainably, the socio-economic performance of coastal communities. Outreach and awareness raised on the value of cockles will increase legitimacy for management decisions and the likelihood of compliance by all stakeholders. This will enhance the value of cockles as a natural asset for all stakeholders, including young generations. Sharing best practices for cockle enhancement and transferring knowledge will facilitate the standardisation of key procedures and spread benefits across the AA. Pioneer collaboration among stakeholders to generate and test the innovative tools and information will provide a sound basis for efficient protection and management policies and decisions, and to anticipate future scenarios.

ES:**FR:****PT:**

4.3.2 Explain modifications in relation to the submitted EOI

EN:

The identification of innovative aspects of the proposal has been strengthened by streamlining above their description and value. A sound consortium has been built to assure direct access and balance between the use of available knowledge, the acquisition of new evidences and data and their application for building advanced and innovative tools. Historical datasets and literature about cockles; about the environmental conditions, such as oceanographic data; as well as about human activities, in each production area, will be exploited. The overall value added of the proposal relies upon the generation of outputs that will directly improve the management of the resource (with the buy in of key stakeholders in all countries), the environmental status and the conservation of biodiversity (as a consequence of action), and the wellbeing of the coastal communities, especially through the coastal economic activities linked to cockles

ES:**FR:****PT:**

4.4 Transnational approach

4.4.1 Transnational approach

EN:

Transnational co-operation is needed for a number of reasons. Cockle larvae are dispersed by ocean currents across borders, as also do disease-causing organisms. Maintaining genetic diversity and disease control, and hence, management, are inherently trans-national issues. Management of cockle species has evolved differently in the production areas and is still highly dependent on natural abundance. This poses both challenges and

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opportunities, and identifying the best practices across the AA by engagement and exchange with local stakeholders, will allow sharing them for mutual benefit. Thus, both the problems and the solutions are large-scale and require co-operation across member states. The project activities will run co-operatively and trans-nationally, with WP leaders and participants in the most important production regions of all AA countries (incl. Bay of Somme, out of the eligible area, but the most important cockle area in France). Associate partners are committed players to guarantee capitalization and sustainability of the project results. Data collection and modelling will use common approaches, agreed and applied in all countries but tailored to local needs. Data and information sharing among partners has been agreed from the project inception, through the setup of the work plan and a careful collective planning of sampling needs. The project will run demonstration activities in each country with cockle stakeholders and share experiences across AA and beyond.

ES:

FR:

PT:

4.4.2 Explain modifications in relation to the submitted EOI

EN:

The project has been designed from the very beginning with the involvement of partners from the five countries of the AA, from a total of eight regions. The transnational approach, for this second stage of the proposal submission, has been improved through the changes to the partnership. These changes have improved the balance of the expertise shared by the consortium and, especially, have harnessed the capacity to capitalize on results across boundaries. All relevant production regions in the AA are represented in the project (including the most important production area in France, which is outside the eligible NUTS3) and stakeholders required to capitalize on results through management, conservation, production and enhancement of the value of cockles as a key natural asset, are also represented.

ES:

FR:

PT:

4.5 Cooperation intensity

4.5.1 Joint development (mandatory)

EN:

All partners in the project have actively contributed to the setup of COCKLES. The project idea was built upon the shared concern about the situation of cockle stocks in the AA and upon partner's background and experiences with the species biology, ecology and life-cycle, with the ecosystem services it provides and with concerns about climate change and other relevant threats and about how to deal with the challenges posed by these factors to the resource and to the communities depending on it.

ES:

FR:

PT:

4.5.2 Joint implementation (mandatory)

EN:

Tackling COCKLES' challenge requires working at transnational and multidisciplinary scale involving experts of all countries in population dynamics, ecology, genetics, pathology, zootechny and socioeconomics, as proposed. COCKLES integrates this expertise to tackle the problem at the whole AA

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	<p>scale to achieve a tangible impact for society. Outputs will be jointly generated as a result of an integrated co-operation workplan applied to restore cockle shellfisheries and related ecosystem services.</p> <p>ES: FR: PT:</p>
4.5.3 Joint staffing (mandatory)	<p>EN: Partners commit to allocate jointly and evenly, the required staff to carry out the workplan. Hired new staff, in support to joint implementation, will yield benefits to the overall accomplishment and contribute to assure impactful results across the AA. From a total of 19,83 FTEs, 11,56 new staff are planned to complete the capacities of the partnership for developing and testing, in practice, the project outputs. At least one of the new contracts will focus on stakeholders' coord. engagement.</p> <p>ES: FR: PT:</p>
4.5.4 Joint financing (mandatory)	<p>EN: COCKLES partnership will also contribute to the joint achievement of the project and to its balanced implementation across partners and regions, through joint financing. Full partners commit to allocate jointly and proportionally to their individual participation, 25% of the total funding needed to accomplish the project. The cost-efficient approach with due financial management will add to the joint financing principle for a full guarantee of the economic efficiency in the project execution.</p> <p>ES: FR: PT:</p>
4.5.5 Joint capitalization	<p>EN: COCKLES capitalizes on available data and knowledge, some of that from past INTERREG projects (i.e. Observ. RAIA, ...) _Policy: further than contribution to EU regulations (MSFD, Natura 2000, etc), local & regional policies will capitalize on improved cockle-beds management and protection _Industry: producers will capitalize on sustainable production procedures and selective breeding _Community: coastal economy, tourism, education, culture and NGOs will capitalize on quantified ecosystem services.</p> <p>ES: FR: PT:</p>
4.5.6 Joint enabling of long term effect	<p>EN: Two types of commitments are dealt to ensure long term effects: i) Dissemination (WP2) COCKLES website will remain available for 5 years beyond the granted period, scientific publishing will also go on after COCKLES, the organization of an updating workshop by the lead partner with partnerships and stakeholders, one year after the project end; ii) Capitalization actions (WP3), have been designed to initiate, with long-term guarantee, improved management, production and restoration practices</p> <p>ES: FR: PT:</p>

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4.5.7 Others

EN:

COCKLES will maintain and actively manage a risk log (WP1) exemplified as follows: Risk: For WP3_a3.1 Geographical dispersion of stakeholders, the no. of actors and the no. of events needed to cover the project topics may hamper the efficiency of stakeholder trainings. Prob. of occurrence: Medium Impact: Medium Contingency: Topics addressed in a short no. of workshops. Resourcing to mobilize key agents. Use of web tools to allow remote and off-line attendance. Efficacy: No. of agents benefiting.

ES:**FR:****PT:**

4.6 Partnership consistency

4.6.1 Partnership consistency

EN:

This partnership, balanced across the AA, provides: Outstanding research centres involving multidisciplinary research groups will join efforts to address this proposal. Environmental scientists will contribute with key knowledge about the role that cockles play in coastal ecosystems (biodiversity, seabed integrity, food-webs). Shellfisheries biologists and pathologists will evaluate how different stressors affect cockles stocks and which strategies can more effectively increase their resilience; experts in shellfish aquaculture will implement hatchery and growing out protocols. Geneticists and mathematicians will develop molecular tools and models to better understand the baseline situation and to plan more sustainable management and restoration strategies. Ecosystem service experts and social scientists will address the importance of cockles from a socio-economic and cultural perspective. Relevant administrations and agencies, producers, NGOs and other key stakeholders in each area are also represented in the consortium, and are crucial to making the proposal approach feasible and sustainable in the long-term. CETMAR will provide the coordination capacity, the needed pathways and targeted awareness support to guarantee a fluent co-operation and a strong engagement of all partners to achieve the project objectives. The sound partnership built will allow the achievement of envisaged outcomes but also their practical uptake by local & regional policy managers and by producers.

ES:**FR:****PT:**

4.6.2 Explain modifications in relation to the submitted EOI

EN:

Changes to the consortium composition from the EOI comprise one full partner (UoCaen) and 10 associates. The Associates committed to COCKLES proof the importance of this project for all AA countries and for major targets (Admins., Environmental Agencies, MPA managers, Producers and other key actors at regional, national and international level) Changes have completed the skills needs, the geographic coverage and have integrated the capacities of capitalization by means of: - Provision of advice, decision tools and data to regulators and those managing cockle populations through a common knowledge-base; -Improved production practices and capacity; -Increased operational capacity to benefit from integrated use of oceanographic, ecological, biological and socioeconomic data to predict future scenarios and increase coastal resilience; -Improved perception of the value for all from

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environmental protection, including societal benefits from cockle in protected and non-protected areas.

ES:

FR:

PT:

4.7 Main outputs, results in line with the work plan. Synthesis of the work packages. Target groups

4.7.1 Main outputs and results

EN:

• (Result, from now on, R) The value of cockles as an emblematic natural resource for AA coastal communities will be enhanced for all targets: producers, resource managers, authorities and other key actors (from related sectors such as tourism, processors, etc.) This will be achieved with efforts on capitalization and dissemination (WP2 and WP3). (Output, from now on, O) Datasets, interactive maps, reports and spreadsheet tools with integrated information about the situation of cockle populations, the ecosystem services they provide and their value for society (WP8). These knowledge outputs, with data obtained through technical WPs (4 to 8) will be key inputs to disseminate and to empower the stakeholders to use the results of COCKLES. • (R) New/ Improved management plans, aiding the implementation of wider policies, will benefit from the updated science-base. (O) The above-mentioned outputs together with operational tools, based on mathematical models, to understand larval dispersal (WP6); risk maps, with hot-spot areas, to tackle major threats (pathogens, alien species and contaminants) (WP5) and evidence on the effects and interactions of cockles to the coastal environment will be used to plan measures for protection, for restoration and to improve management practices (combining scientific and empirical knowledge obtained through interaction with stakeholders). This through all AA regions. • (R) Management and restoration will also benefit from the improved capacity to increase aquaculture production, with (O) reliable protocols for hatchery and on-growing sites, including the start of selective breeding programs for resistant cockle strains based on genomic and proteomic markers, will open the pathway for a gradual restoration of stocks and increase of production opportunities (WP7). • (R) Resilience to climate change and capacity to anticipate and adapt to future environmental and management scenarios will also be gained (O) Combining the data obtained in WP6, with WP4 and WP5, and the modelling tools from WP6, data obtained will inform and allow the testing of the changing scenarios. Anticipating these scenarios will allow stakeholders to identify opportunities for action (improvements in management, needs for restoration and/or protection, etc.) to gain resilience. Capitalization actions (including empowerment actions, development of user-friendly visualisation tools, pilot experiences and co-creation of management plans) for wide dissemination and exchange, will multiply impact. Actions in WP2 and WP3 will convey all the new knowledge and tools to all target-users and guarantee the uptake by them, across the AA and beyond.

ES:

FR:

PT:

4.7.2 Explain modifications in relation to the submitted EOI

EN:

The project plans a total of 37 outputs one output for each of the project actions: 6 of them are management outputs, 12 relate to dissemination and capitalization experiences and the remaining 19 correspond to the thematic activities (WPs4-8). Some of these outputs represent the aggregation of a set

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	<p>of more specific products and services. This information has been displayed above to illustrate how major technical outputs will cluster to produce major expected results, to clearly identify who will benefit and the pathways for added value generation (particularly through capitalization and dissemination actions committed in the workplan). Apart from explaining the relation between outputs and results, it is explained which of the WPs will contribute to these results. This provides a direct link between work plan - deliverables (resulting from each of the project actions) and results/impact derived from these outputs and their practical use.</p> <p>ES: FR: PT:</p>
4.7.3 Who will use the main outputs?	National public organisations, Regional public organisations, Local public organisations, Public Enterprises
4.7.4 Involvement of target groups	<p>EN: Managing authorities (Partners 2,7, 10, 14, 19, 20) conservation agencies (Partners 8, 9, 16,22) and producers' representatives (Partners 8, 18 and 21) are involved in the areas covered by the project. The whole partnership will assure the overall accomplishment and sustainability of COCKLES's results. Associates will have the direct capacity to influence project decisions by vice-chairing the project Steering Committee (WP1). Associate partners will participate in project meetings and receive regular information about the project. They will explain in detail their expectations about the project from the kick off meeting (WP1) and the partnership is committed to consider them as much as it is feasible and when they do not deviate from the proposal objectives. They will facilitate access to some means needed for the project execution (WP3-WP8). In WP2 they will help conveying bespoke messages from the project to other agents of similar nature across Europe. In WP3 their commitment to capitalize on project outputs will be crucial to maximize the yields of COCKLES during and beyond its accomplishment: they will collaborate in the co-creation of improved management plans, work for population restoration and get prepared for the future setting up breeding programs (WP7). Success stories in the different areas will enrich with quantitative data of the cockles' ecosystem services. Widespread dissemination efforts will build resilience on local communities for changing scenarios.</p> <p>ES: FR: PT:</p>
4.8 Long-term effects	
4.8.1 Long-term effects	<p>EN: COCKLES is aimed at mid and long-term effects with multiple benefits for Local stakeholders, particularly producers, managers and regulators. They will integrate their knowledge with scientific work for improved management and restoration. This will boost sustainable growth and jobs based on cockles, a resource with leveraging capacity for coastal sectors flagged in the RIS of the areas involved. The implementation of outstanding EU regulations will also benefit from the accomplishment of COCKLES: Atlantic Action Plan and MSFD (through descriptors 1 to 9, from the 11); MSPD, through the spatio-temporal datasets for cockle populations and larvae and plans for restoration;</p>

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	<p>Natura 2000 and the Birds and Habitats Directive through efforts in protected areas and outputs on ecological interactions; Regulations regarding Mollusc diseases and CFP through the improved production (w/culture). The project will provide the basis for regional and local plans for sustainable management of cockles in 8 regions, improved conservation capacity in at least 3 large protected areas, selective breeding programs, cost-efficient production of spat in at least two regions and quantification of the ecosystem services cockles provide to all 8 regions, enhancing the relevance of a key natural asset at European scale. The outputs of the project will be widely and intensively disseminated in all AA countries and beyond. Public engagement will occur throughout the project, via local outreach activities.</p> <p>ES: FR: PT:</p>
4.8.2 Explain modifications in relation to the submitted EOI	<p>EN: Contribution to Key EU policies has been highlighted as well as how this will touch ground and yield impact at regional and local level (through action of local actors dealing with management, protection, production, etc.).</p> <p>ES: FR: PT:</p>
4.8.3 The effects are expected for the next 5 or 10 years?	<p>EN: a) Empowerment of stakeholders around Europe with upgraded and updated capacities related to cockles will deliver impact already during the project accomplishment; b) Management practices will also be enhanced in the short term with impact on cockle communities. However, the effects on nature, will only be evident later on (+5years). c) Recommendations on restoration strategies will yield some short term (-5 yrs) effects (e.g. the involvement of all stakeholders in the strategy). However, long term will definitely provide a more clear framework to assess impact on nature. d) Reliable hatchery protocols for spat production and improved capacities for natural recruitment will also be available in the short term (- 5 yrs) for producers and managers. However, accurate predictions will need from the fine-tuning of models in the different regions and longer-term data series (+5 yrs). e) The gathered and disseminated information about the importance of cockles resources and the valuation of its ecosystem services will also yield short term effects, allowing the sustainable promotion of this resource and the recovery of some natural cockle beds with leveraging effects on the communities (+ 5 yrs). f) The effects of having identified molecular markers for an efficient selective breeding and of having devised a selective breeding programme, will materialise in - 5ys. This will allow the recovery of the resource at least in those areas where marteiliosis has been more devastating.</p> <p>ES: FR: PT:</p>
4.9 Horizontal principles	
4.9.1 Sustainable development (Concrete and real measures to contribute to sustainable development and environment.)	
4.9.1.1 Sustainable development effects	2

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4.9.1.2 Description of expected effects	<p>EN: The project will directly focus on sustainable development by improving the management of a key natural asset for the AA of ecological, economic and cultural importance, and acting directly on more than 10 relevant coastal sites, some of them are already protected areas. It was made an estimation of the Has. of the territory where project actions will take place and this represent a surface of more than 30 thousand hectareas. More than 30% of these surface are in protected areas.</p> <p>ES: FR: PT:</p>
4.9.2 Equal opportunities and non-discrimination (Specific actions foreseen to avoid discrimination and promote equal opportunities)	
4.9.2.1 Equal opportunities effects	2
4.9.2.2 Description of expected effects	<p>EN: Cockles are commonly a resource and a source of income for rural coastal areas. In production areas, they represent an important source of income for family business, men and women harvesting the resource and small companies which include, for example, specialized small restaurants or small processors. This represents a vulnerable economic fabric in face of climate change and the pressure of other capital intensive economic activities competing for coastal space. Reinforcing, demonstrating and quantifying the value of cockles from an integrated ecosystem approach are crucial for the resilience of this kind of coastal socio-ecologic landscape.</p> <p>ES: FR: PT:</p>
4.9.3 Gender equality (Specific actions to ensure equality between men and women)	
4.9.3.1 Gender equality effects	2
4.9.3.2 Description of expected effects	<p>EN: In various of the project regions women play a key role in the socio-ecological landscape above described. COCKLES will provide gender responsive statistics, will consider gender balance for decision making process and project structure. Gender balance will be encouraged for the composition of working groups, in recruitment processes and for the representation of stakeholder groups (both by associate partners and in open project actions). Outstanding experiences such as the Athena Swan Programme in UK and Ireland (NERC-CEH and UCC are already a signatories) will be disseminated among the project organizations, particularly among research and education institutions in COCKLES that will be recommended to embed this programme's six principles on gender balance https://www.ucc.ie/en/athenaswan/about/</p> <p>ES: FR: PT:</p>
4.10 Atlantic Strategy	
4.10.1 Is the project based on one of the Atlantic strategy specific objectives?	1
4.10.2 If yes, please select one	5

Work page type number	Activity name	Start date	End date
WP Nr. 0 Project Preparation	Preparation	2016-04-26	2017-09-30
WP Nr. 1 Project coordination	Coordination	2017-10-01	2020-09-30
WP Nr. 2 Project Communication	Communication	2017-10-01	2020-09-30
WP Nr. 3 Project Capitalization	Capitalization	2018-04-01	2020-09-30
WP Nr. 4 Baseline assessment: Characterising populations, reproductive health and genetics	Baseline assessment: Characterising populations, reproductive health and genetics	2017-12-01	2020-06-30
WP Nr. 5 Identification of major threats and trends affecting cockle beds in the Atlantic Area	Identification of major threats and trends affecting cockle beds in the Atlantic Area	2017-10-01	2020-06-30
WP Nr. 6 Modelling flows: Larval dispersal and trophic cascades	Modelling flows: Larval dispersal and trophic cascades	2017-12-01	2020-09-30
WP Nr. 7 Procedures for developing cockle culture, supporting genetic breeding for resistance to Marteilliosis	Procedures for developing cockle culture, supporting genetic breeding for resistance to Marteilliosis	2017-10-01	2020-09-30
WP Nr. 8 Quantifying biodiversity, economic and societal benefits from cockles	Quantifying biodiversity, economic and societal benefits from cockles	2017-10-01	2020-08-31

WP Nr. 0	Activity	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Project Preparation	17	2016-04-26	2017-09-30	16,000.00€
Partners' involvement					
Partner responsible		1			
Partner involved		1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16,17,18,19,20,21,22			

This WP comprises the design of the project and the consortium setup from the project idea, to the submission of the EOI and, later on, the full proposal to the second stage of the submission process. At the initiative of an initial core group composed of a representative from the five countries of the AA (namely CETMAR, CIMA-XUGA, UCC, IPMA, UBx, UCC and UB), a first step was to discuss on the project idea and to check its consistency with the Atlantic Area Cooperation Programme. Looking at Programme objective 4.1. the project concept was defined with contributions from all areas and the partnership was improved with complementary capacities and stakeholder representatives. The partnership agreed on a preliminary estimation of budget and worked together for the preparation of COCKLE's Expression of Interest. During the preparation of the second stage full proposal, first partners agreed on a strategy to overcome the evaluation remarks and, in parallel started a detailed discussion on the workplan. During the second stage of application, two preparation meetings took place one teleconference meeting and an in-person meeting. Then, partners worked out jointly the fine-tuning of the second stage proposal and planned a successful and early submission of it. Costs claimed correspond to effort invested in proposal writing and attendance to project preparation meeting, remotely and in presence.

Preparation costs are only claimed for those having invested time in writing and having attended the preparation meetings.

WP Nr.1	Activity	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Project coordination	36	2017-10-01	2020-09-30	298,532.07€
Partners' involvement					
Partner responsible		1			
Partners involved		1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16,17,18,19,20,21,22			

COCKLES' management structure comprises a Lead Partner (LP), a Steering Committee (SC), an Operational Management Team (OMT) and the Project Assembly (PA). The LP will facilitate a smooth running of the project activities managing the overall coordination of the project team and resources and guaranteeing an efficient implementation, accountability and due reporting of performance. The SC is a high level advisory board where the main responsible of each partner org. is represented. The SC will undertake the strategic decisions of the project, including risk management; it will enhance the project visibility and multiply the impact of dissemination and capitalization efforts. It will be chaired by the LP with two Vice-Chairs, one Scientific and one representing the Stakeholders. The OMT, composed of the WP Leaders, will assist the permanent follow up of the project activities and take operational decisions at a WP level. It will assist the compilation of information and the preparation of reports and discussion documents. The PA will be composed of all the people participating in the project. The LP will also assume the financial management of the project. The execution of budget will be subject to quarterly internal reporting in addition to mandatory reporting and audits. Detailed procedures for: communication, organization of meetings, decision processes, distribution of funds and reporting will be documented in Action 1.2. and built upon the programme standards. The LP with the partnership have the expertise and internal means to carry out management without major outsourcing needs with the only exception of annual financial audits to be hired by each full partner. Project meetings: Quarterly remote meetings of the OMT; Six-monthly meetings of the SC and annual meetings of the PA. Time schedules will benefit from matches and simplify the total number of meetings to a maximum of 6 in-person and 12 remote meetings. COCKLES's Risk Management Plan (RMP)

Centro Tecnológico del Mar, Fundación CETMAR	Internal staff	0.61
	Jobs to be created	0.76
	External staff (outsourcing)	0.16
	Technical resources involved	Meeting rooms, oceanographic datasets (Observatorio Raia), socioeconomic data, operational oceanography infrastructure incl. calibration facilities
Consellería do Mar, Xunta de Galicia	Internal staff	0.63
	Jobs to be created	0.83
	External staff (outsourcing)	0

	Technical resources involved	CIMA has the tools needed to sample shellfish beds and to estimate mollusc demographic parameters, laboratory infrastructure for pathological and immunological studies, and aquaria/laboratory infrastructure to perform in vivo and in vitro challenges of cockles with pathogens. Moreover it has access to relevant datasets for the project
UNIVERSIDADE DE SANTIAGO DE COMPOSTELA	Internal staff	0.63
	Jobs to be created	1
	External staff (outsourcing)	0
	Technical resources involved	The ACUIGEN group and the Functional Sequencing and Genomics Platform of the USC have the technical resources and specialized personnel to carry out the assigned RAD-seq and RNA-seq tasks in the project.
UNIVERSITE DE BORDEAUX	Internal staff	2.75
	Jobs to be created	1.25
	External staff (outsourcing)	0
	Technical resources involved	Three platforms (PF) of our laboratory will be devoted to the project: isotope PF for WP6 (carrying capacity and cascade effect), biodiversity PF for WP8 (ecosystem services) and molecular biology PG for WP5 (gene expression and parasite identification). In Arcachon Bay, the 12-m vessel of the Marine Station will be used for sampling.
University College Cork	Internal staff	0.3
	Jobs to be created	1.73
	External staff (outsourcing)	0
	Technical resources involved	The entire facility at the Aquaculture and Fisheries Development Centre (AFDC) in the School of BEES is 1200m2 and contains four laboratories; Aquaculture, Histology (histology processor, microtome, stainer, microscopes), Ecotoxicology (immunoassay spectrophotometer plate reader) and Molecular (UV PCR cabinet, PCR thermocycling machines, qPCR machine, Nanodrop DNA quantifier, electrophoresis equipment), as well as constant temperature rooms, an algal culture room and aquaculture tank rooms (500m2). An onsite technician is available to assist with laboratory trial set up.
Bangor University	Internal staff	0.6
	Jobs to be created	1
	External staff (outsourcing)	0
	Technical resources involved	The Centre for Applied Marine Sciences in BU will provide a wide range of facilities for the project including specialist equipment and facilities such as aquaria for experimental trials, molecular microbiological laboratories (including rt-qPCR) and access to high performance computing facilities (hpcwales.co.uk) for modelling of larvae. These facilities and equipment will be in addition to those used for regular laboratory (preparing samples for different analyses) and field work (surveying and collecting samples) relating to this project.
NERC Centre for Ecology and Hydrology, Bangor	Internal staff	0.78
	Jobs to be created	0
	External staff (outsourcing)	0
	Technical resources involved	Vehicles for fieldwork sampling, laboratory analysis facilities for water chemistry, sediment and shell samples, constant temperature cold rooms for sample storage, IT facilities for large data storage and analysis and support for video conferencing and remote meetings, administrative support and financial support as required to conduct the project.
Groupe d'Etude des Milieux Estuariens et Littoraux	Internal staff	0.46
	Jobs to be created	0.05
	External staff (outsourcing)	0
	Technical resources involved	GEMEL has a vehicle, means of sampling (TASM, sieve, GPS, ...) and a laboratory with microscopes, magnifiers, electronic calipers, ovens which will be used for the project. We have also GIS software to analyse spatial data and the software "Sphinx-IQ2 Quali" for the analysis of the semi-directive interviews.
Cyfoeth Naturiol Cymru	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Instituto Português do Mar e da Atmosfera, I.P.	Internal staff	0.43
	Jobs to be created	0,98
	External staff (outsourcing)	0
	Technical resources involved	IPMA will allocate to the project, their experimental hatchery facilities at Tavira, Algarve that includes :- Broodstock room, larvae production room; food chain production room and an outgrowing park in the intertidal area, used as nursery. IPMA also will allocated the facilities of Laboratory of Pathology of Aquatic Animals in their headquarters at Lisbon with skills in Histopathology, Cytology,, Molecular Biology (PCR – RFLP; ISH) for diagnostic and study of Shellfish diseases.
Universidade de Aveiro	Internal staff	0.49
	Jobs to be created	1.8
	External staff (outsourcing)	0
	Technical resources involved	UAVR will provide infrastructure in the form of offices, research labs, library, IT services and administrative support for the project.
Faculdade de Ciências da Universidade de Lisboa	Internal staff	0.34
	Jobs to be created	1.16
	External staff (outsourcing)	0
	Technical resources involved	FCUL will provide the infrastructure needed to develop the project implementation, namely working offices, research labs, equipment, library, IT services and administrative support for the project.
Université de Caen Normandie	Internal staff	0.25
	Jobs to be created	1

	External staff (outsourcing)	0
	Technical resources involved	Erosion measurement (ERODIMETER - See Orvain et al. 2014 for a full description - Orvain F, Guizien K, Lefebvre S, Bréret M, Dupuy C (2014). Relevance of macrozoobenthic grazers to understand the dynamic behaviour of sediment erodibility and microphytobenthos resuspension in sunny summer conditions, Journal of Sea Research, 92, 46-55) * Imaging PAM for microphytobenthic photobiology * Equipment for chl a and EPS analyses (Fluorometer and Flex-Station) * Tidal mesocosms for simulating cockle environment in laboratory. * Genomic platform for virus detection (PCR, extraction...)
Marine Institute Ireland	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Institut français de recherche pour l'exploitation de la mer	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Centre National de la Recherche Scientifique Délégation Aquitaine	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
CONFRARÍA DE PESCADORES SAN ANTONIO DE CAMBADOS	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Instituto Tecnolóxico para o Control do Medio Mariño de Galicia	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	Associate partner. Expert support and facilitator role (for data, sampling...). Described in section 1.
Instituto da Conservação da Natureza e das Florestas	Internal staff	
	Jobs to be created	
	External staff (outsourcing)	
	Technical resources involved	

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).

Action nr. 1	Action title: Project setup and launch	Start date: 10-2017	End date: 01-2018
	Action description: This action will combine all necessary efforts to formalize the contractual commitments of the project. It will start with the communication of the proposal approval and will lead to the formal signature of the project Grant Agreement and the Partnership Agreements. During this stage the role of the PL as fluent interlocutor with the Program Authorities and with the whole partnership will be essential to guarantee an agile accomplishment of this action		
Deliverables	Outputs title: COCKLES' contractual documents	Outputs description: This output adds the signed Grant Agreement and the Partnership Agreement, regulating in detail the internal relations (rights and obligations) among the partnership members.	Indicators: OA2# 2 Target:
	Expected results title: COCKLES' legal framework for the project accomplishment is setup	Expected results description: The project contractual basis is formalized and the whole partnership becomes fully aware of its rights and obligations towards the Atlantic Area Programme and towards the other members of the partnership.	
Action nr. 2	Action title: Development of detailed Internal operational protocols and decision structures	Start date: 10-2017	End date: 01-2018
	Action description: CETMAR will propose detailed procedures for internal communication, organization of meetings, decision-making processes, distribution of funds and reporting. COCKLES partnership will discuss and agree on these procedures while observing the Programme's rules. Moreover, the setup of the project managing structure will be accomplished and the composition and the specific roles of each body in the structure will be communicated to the whole partnership by written means.		

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).				
Deliverables	Outputs title: COCKLES' internal management manual	Outputs description: The Manual will describe the composition and roles of the managing structure, the decision-making processes (quorum, voting, etc.), how, when and where the project meetings will take place and how to report, claim and distribute the project funds.	Indicators: OA2#1	Target:
	Expected results title: COCKLES governance rules are clear for all in the project and smoothly adopted	Expected results description: The partnership has participated in the development of the internal governance system and is fully aware of the different procedures that will rule the project accomplishment. Transparency and democratic participation will be fundamental principles.		
Action nr. 3	Action title: Coordination and follow up of work progress		Start date: 10-2017	End date: 09-2020
	Action description: The project OMT will monitor progress achieved quarterly. WP Leaders and PL will gather, from the partnership, the basic information to assess the progress of activities and the accomplishment of relevant outputs and milestones. Milestones will be identified in addition to project outputs as an internal control mechanism. When deviations from planned work are identified the OMT will assess the causes and impact, and when needed, related contingency measures will be included in the RMP			
Deliverables	Outputs title: Dossier with quarterly internal progress reports and meeting minutes	Outputs description: Quarterly internal reports with synthetic information about the situation of work in each of the WPs will be discussed during regular OMT meetings. Quarterly reports and minutes will be inputs for the elaboration of the project annual reports.	Indicators: OA1#18 OA2#12	Target:
	Expected results title: Efficiency in project monitoring and reporting is achieved since the project launch	Expected results description: Project reporting will be simplified as a result of this systematic procedure to compile and update the information about progress of work and results. This will allow the early detection of deviations and enable to catch up and mitigate impact		
Action nr. 4	Action title: Risk management and Quality Assurance (QA)		Start date: 10-2017	End date: 09-2020
	Action description: The Risk Management Plan (RMP) comprises a preliminary identification of risks and contingency measures since the project design (see section 4.7), a detailed risk identification and classification (according to likelihood and potential impact) at WP level and consistent contingency actions. This will be recorded and permanently updated by the OMC, aided by COCKLES mngmnt. structure and protocols. QA will also be granted by peer revisions of public documents and contents generated by the project.			
Deliverables	Outputs title: Risk Management Plan and regular recorded updates	Outputs description: It will characterize and classify the risks affecting the project accomplishment, the achievement of the objectives and of the impact. For each risk, it will be identified a contingency measure, and for each measure, an indicator of performance.	Indicators: OA2#1	Target:
	Expected results title: The partnership manages the project risks efficiently, this contributing to successful performance and achievement	Expected results description: The system setup will allow anticipated reaction of the partnership to risks, avoiding their occurrence and/or mitigating any effects damaging the project and/or its chances for success and impact.		
Action nr. 5	Action title: Financial and administrative management		Start date: 10-2017	End date: 09-2020
	Action description: Partners will provide the LP the details of the financial manager in each partner org. Project protocols will include guidelines for financial management combining the Programme instructions about reporting, and resourcing, with the specific budget, calendar and commitments for COCKLES. Each partner will hire the annual audit services early after the project launch. The auditors and partners will meet to guarantee a shared understanding of the financial rules and due-diligent reporting.			
Deliverables	Outputs title: Dossier with quarterly financial reports	Outputs description: The information provided by the partnership through the quarterly reports will be compiled in a dossier and collated by the PL for feeding the annual mandatory reports.	Indicators: OA2#12	Target:
	Expected results title: COCKLES is accomplished without financial bottlenecks or deviations	Expected results description: COCKLES is accomplished smoothly from a financial perspective, assuring that the principles of efficient use of resources, maximum value for money and financial sustainability are achieved. This action will build on transparency and accountability.		
Action nr. 6	Action title: Project closure and final reporting		Start date: 06-2020	End date: 09-2020
	Action description: This action comprises all the efforts needed to close the project. It includes the preparation of the final project reports, the conclusion of the Deliverables scheduled for the final period. It also comprises the final works devoted to guarantee sustainability of the project beyond the funding period, and an optimal uptake of results by key stakeholders. It also includes the final audit certification.			
Deliverables	Outputs title: Final reports and project closure	Outputs description: Final and annual reports will be prepared accordingly to the Programme instructions and be used as a means to enhance the relevance of the project against indicators. Layman style reports will be added for synthesized communication of achievements.	Indicators: OA2#3	Target:

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).		
	Expected results title: The project is successfully and timely accomplished and comprehensively reported	Expected results description: The project is successfully and timely accomplished and actions guarantee short and long term impacts, directly as a consequence of COCKLES accomplishment. The partnership has provided full accountability of the execution and of the use of resources.

WP Nr.2	Activity	No	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Project Communication		36	2017-10-01	2020-09-30	227,460.35€
Partners' involvement						
Partner responsible		11				
Partners involved		1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16,17,18,19,20,21,22				

WP2 aims to promote open dialogue between all stakeholders: scientists, managers, politicians, fishermen, NGO's and others involved in the use of cockles and to sensitize all, in coastal communities and beyond, about the diversity and value of the ecosystem services cockles provide. The communication strategy of COCKLES combines a range of actions focused on these targets. Communication actions will raise both public awareness and stakeholders participation and this will be achieved through the design of a project website and on-line community. COCKLES webpage will link to the communication platform of the AA. Project outputs (publications, newsletters, brochures, maps) will be spread through COCKLES website and public events. The involvement of the whole partnership will enable capacity building, cross-disciplinary interaction and to effectively touch the ground of targets in the regions. Synergies with WP3 will be exploited. These objectives will be achieved by COCKLES workshops on specific topics, which will provide a forum for interaction between the project and external audience. The organization of a final conference will join the major players on cockle issues, presenting the major achievements by the project and discussing on the major concerns about cockles. Dissemination will continue beyond the project through the website, the publication of results in journals, technical meetings and congresses and through the organization of a post-project workshop.

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).				
Action nr. 1	Action title: Building-up the Atlantic Area on-line community to enhance COCKLES		Start date: 10-2017	End date: 08-2020
	Action description: A website will be created at the early stages of the project to provide public access to technical documents, maps, newsletters and other material that will be produced (website updated every month). This will represent an efficient interactive forum to disseminate at a transnational scale the project aims and products. The website will include multilingual sections but English will be the main language. An online community will be created using mass social networking applications (as Facebook).			
Deliverables	Outputs title: COCKLES on-line	Outputs description: Multi-lingual sections: public access area (with actions and their outputs). Interactive maps, videos, brochures and newsletters targeted to the stakeholders but also to schools, ONGs and general public. Partners restricted access area in English.	Indicators: PI04#2 PI05#8000	Target:
	Expected results title: COCKLES to everybody	Expected results description: This activity will provide Knowledge on COCKLES project and outputs to a wide audience in the AA. Extensive on-line community that will share on cockles issues, from population traits to sustainable management practices and socio-economic relevance.		
Action nr. 2	Action title: COCKLES project branding and communication material for target users		Start date: 10-2017	End date: 09-2019
	Action description: Marketing and communication items will be produced and distributed with relevant information for a wide audience. A strong brand for the project will be developed, including a logo, project templates, banners and posters to be exposed at projects events and in other forums, etc. A project brochure in the four languages of the partnership (English, French, Spanish and Portuguese) will be produced and 5 newsletters.			
Deliverables	Outputs title: COCKLES communication material package	Outputs description: A project logo; a project brochure in four languages; five newsletters; ten press releases in local, regional or national newspapers, brochures with information pills namely for stakeholders will be produced.	Indicators: OA3#5 PI05#1500 PI04#300	Target:
	Expected results title: Increased awareness about the importance of cockles to the AA and with key messages for mainstreaming biodiversity and sustainable management of natural resources for society	Expected results description: An attractive information set is made available for present and future awareness on cockles. Citizens, economic actors and politicians get sensitized about benefits, threats, and cockle population status in AA. Room for improvement becomes visible.		
Action nr. 3	Action title: Short technical workshops		Start date: 07-2018	End date: 04-2020
	Action description: Workshops on COCKLES topics for specific targets (science-science, science-producers, science-policy, science-society). These workshops will be publicized and open to outside participants. Workshops should cover the major project topics presented in very accessible language with the direct involvement of stakeholder representatives in all project areas: cockles population status; cockles threats, from pathogens to contamination; ecosystems services; cockles aquaculture; etc.			
Deliverables	Outputs title: Open Workshops to raise awareness about cockles situation and opportunities for improvement	Outputs description: Four transnational workshops during the project on specific technical issues are accomplished. 1 update workshop a year after the project to assess balance and update on impact.	Indicators: OA1#4 PI05#400	Target:

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).					
	Expected results title: Improvement of the quality of awareness about cockles as a key resource for AA coastal communities enhancing the benefits to all from cockle diversity protection and sustainable management	Expected results description: Transmission of knowledge among stakeholders and general public. This to raise the capacity of all stakeholders beyond the project partnership to support and reinforce co-management of fisheries and to endorse conservation and restoration measures			
Action nr. 4	Action title: Diverse outreach and dissemination activities for general public, including students	Start date: 10-2017	End date: 08-2020		
	Action description: This will convey the project messages about cockles to people where they live or spend time. Students represent the wider target, although families, households and many other people in the coastal communities around the AA will benefit. Short seminars, lecturers in masters and hands-on practice classes for kids will be organized with teachers. Activities like photos contests, gastronomic week, awareness actions during the touristic season (in beaches, for example) will also be accomplished.				
Deliverables	Outputs title: Dossier with outreach materials and successful stories	Outputs description: Compilation of materials used and guidelines to allow the replication of outreach experiences in any other area, in and beyond the Atlantic Area.	Indicators: OA2#1 PI05#300	Target:	
	Expected results title: Impact of outreach actions will be measured and lessons extracted (by the partnership and external audience) for future improvements. Particular attention will be paid to impact on younger generations	Expected results description: This will allow replication of outreach efforts at any moment beyond the project for any natural resource of similar nature. The impact of outreach actions will be measured and reported, including an ex-post analysis on lessons learnt for the future.			
Action nr. 5	Action title: Dissemination of COCKLES technical results in publications and international conferences in the Atlantic Area.	Start date: 04-2018	End date: 08-2020		
	Action description: The technical/scientific results produced will be disseminated through oral or poster presentations in national or international meetings (e.g. Aquaculture Europe; ECSA meetings) and publications in suitable scientific and technical journals (e.g. Aquaculture, Estuarine Coastal and Shelf Science, Marine Environmental Research. Publication of the proceedings from final project conference as a special issue of a ISI journal				
Deliverables	Outputs title: COCKLES publications and scientific production	Outputs description: At least ten oral or poster communications in national and international meetings, conferences or symposia; at least ten technical or scientific papers; at least ten communications in Atlantic area events related to COCKLES thematic	Indicators: PI02#30	Target:	
	Expected results title: Dissemination of scientific results will accelerate scientific progress and put cockle's biodiversity and services high in the agenda of the research community.	Expected results description: Knowledge generated feeds a vast academic community. Open access dissemination of COCKLES' main findings will guarantee impact and the speed up of further scientific advance in relation to cockle and marine and coastal ecosystems.			
Action nr. 6	Action title: COCKLES final conference	Start date: 07-2019	End date: 07-2020		
	Action description: A final conference will be organized at the end of the project. This conference will be an opportunity to promote the main results obtained in the project. It will be designed to attract scientists and stakeholders. Apart from the more conventional oral and poster technical/scientific communications it should also include an exhibition more devoted to the general public namely by presenting activities developed the main stakeholders (e.g. gastronomic presentation)				
Deliverables	Outputs title: COCKLES Conference	Outputs description: Project main findings should be presented at the final project conference. Invited speakers will present talks on related issues. Stakeholders will be also invited to make presentations, chair sessions and moderate discussion rounds.	Indicators: PI05#300	Target:	
	Expected results title: COCKLES major event takes place, raising scientific, political and societal attention to this natural resource	Expected results description: Participants from all the countries involved in the proposal should attend the conference; Participation of at least 120 delegates, including, stakeholders, policy makers at local, regional and European level, NGOs, and researchers.			

WP Nr.3	Activity	No	Duration in months	Activity start year and month	Activity start end and month	Activity budget
	Capitalization		30	2018-04-01	2020-09-30	286,747.29€
Partners' involvement						
Partner responsible		1				
Partners involved		1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16,17,18,19,20,21,22				

Describe how the capitalization strategy will be implemented during the project life-time including an explanation of how partners will be involved (who will do what).

The capitalization strategy is oriented to ensure that project actions and results will continue yielding impact beyond the project life, after end of the period granted. Actions with this aim will be oriented to ensure that the main stakeholder targets (producers, administrations, NGOs and, in general, coastal communities) incorporate the project outputs and undertake utilization. For this, the project must ensure that representatives of these targets take from the project the opportunity to upgrade their skills and capacities, to make an efficient use of the project outputs and maximize the yields. This WP will also be organized to ensure that COCKLES makes a shift of the situation of this natural asset and its ecosystem services across the Atlantic Area. The empowerment and capacity building efforts will be encompassed with a set of pilot actions and experiences directly oriented to use the major project technical outputs across the cooperation area. Best practice experiences from the different regions in the Cooperation Area will be described and shared among stakeholder groups for mutual learning and for the generation of a shared legacy for cockle recovery and enhancement. Actions undertaken will guarantee a balanced spread of impact among target users (administration, producers, NGOs, and other community representatives) and across the cooperation territory. Public bodies and directly related orgs. with relevant competences to the project (XUGA-CIMA and MeteoGalicia, NRW, BIM, MI, SEPANSO, ICNF) will capitalize on management and restoration outputs. Producers (CCambados, Cformosa) will capitalize on management, production techniques and restoration. Liaison Orgs. and public service centres (CETMAR, BIM, GEMEL, INTECMAR) will facilitate mutual learning, long-term engagement and the adoption of co-creation methods. Protected Areas (SEPANSO, ICNF and NRW) will benefit from improved management and decision-support tools. All in COCKLES will capitalize on scenario setting, forecasting models and operational tools. A common knowledge base will be tailored to local needs for capitalization guided by UB, UBx, CIMA, USC, UCaen, NERC, CETMAR, UCC, UL, IPMA and UA. Some of the associates will leverage the results at European level (MI, IFREMER, and CNRS). Not all regions will participate in every capitalization action, experiences in each area will be disseminated across the AA and beyond. However, capacity building actions (3.1) will be offered for associates in all regions. Culture techniques developed in PT will be tested in ES and IE; Integrated management in ES; Restoration in ES and UK; Quantification of Ecosystem Services will be capitalized across actors and in all the areas and scenario setting and forecast tools, through sustainable management plans, will foster biodiversity protection and all coastal communities' resilience.

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).				
Action nr. 1	Action title: Empowering stakeholders for a more efficient and sustainable management of cockle populations across the AA.	Start date: 04-2018	End date: 04-2020	
	Action description: Leveraging the understanding of the relevance of AA cockle populations, situation, threats and best practices on management and conservation is essential to engage all stakeholders in capitalization actions. This action is needed to assure the long-term implementation of the project tools and methodologies in practice by direct users. Thematic and targeted workshops and on-site training activities will be carried out in all the countries to assure capacity building for the use of outputs.			
Deliverables	Outputs title: Report compiling the relevant information from thematic and participatory workshops and on-site training initiatives	Outputs description: Attendants, minutes, didactic materials used, pictures, and other information will be compiled to deliver due account of performance and support future replications of these capacity building actions.	Indicators: PI05#150 PI04#5	Target:
	Expected results title: Enabled cockles recovery with relevant stakeholders skilled and empowered across the AA to maintain improvement efforts beyond the project	Expected results description: A wide pool of target-users and other stakeholders will understand much better the potential of cockles as a key biological asset for the AA, and will gain the skills needed to undertake the project results and make use of them, in and beyond COCKLES		
Action nr. 2	Action title: Pilot implementation of sustainable culture techniques and preparation of selective breeding	Start date: 07-2019	End date: 09-2020	
	Action description: The production protocols developed as a result of WP7 will be tested by stakeholders at least in two of the five countries (ES and IE) in addition to the country where protocols were developed (PT). Results of the first trials will be widely disseminated across the AA. IPMA will coach the process in the sites where trials take place, with the support of local partners.			
Deliverables	Outputs title: Report with data and analysis of pilot scale performance in at least two areas	Outputs description: Each hatchery/site trying the culture techniques will report performance with assessment on the advantages found in the process and, the bottlenecks or barriers, room for improvement and the plans for future sustainability of action.	Indicators: OA2#3 PI01#3 CO29#3	Target:
	Expected results title: Initiation of the production recovery through pilot-scale improvements in sustainable cockle seed production and growing	Expected results description: The production protocols and procedures developed in WP7 will be transferred across the regions and tested at least in two regions different from the site where development took place. Findings and best practice from field trials will be shared		
Action nr. 3	Action title: Operational tool for cockle resource management, and quantitative assessment of change scenarios: comprising both natural variability factors and management alternatives	Start date: 07-2019	End date: 09-2020	
	Action description: Development of a set of storylines for scenarios based on 6.1-6.4, 7.4 and 8.3. The storylines will combine projected climate change (IPCC AR5 scenarios to 2100, downscaled to local level for WorldClim data), population change, ecological threats (for likely disease/invasive species spread), socio-economic projections, with policy and management options. The scenarios will be applied by end-users and researchers in models and ecosystem service assessments to develop future management options.			
Deliverables	Outputs title: Scenarios to guide sustainable future management of cockle shellfisheries will be co-developed and tested with operational models	Outputs description: Impacts of scenarios which to be used by industry, end-users, as well as researchers, as input to management plans and decisions, to better understand the likely effects of climate change, and to	Indicators: PI01#5 PI05#50 PI03#1	Target:

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).				
		optimise management based on biophysical constraints.		
	Expected results title: Improved potential of stakeholders to anticipate the consequences for cockles populations of climate change and emerging threats.	Expected results description: Knowing likely future conditions affecting cockle and helping develop the scenarios to describe these conditions and model their effects will allow industry and policy makers to adapt, anticipate these changes, mitigate pressures and promote sust. use		
Action nr. 4	Action title: Pilot action plan for restoration and improved protection of AA cockle populations, with success indicators		Start date: 07-2019	End date: 09-2020
	Action description: CIMA, UA, IPMA, UB and NERC, together with the associate partners in FR, ES, PT and UK with direct interest on opportunities for restoration and improved protection of AA cockle populations will discuss and co-design action plans for restoration and protection. Two specific sites (ES and PT) will be used for a targeted and specific approach as case studies (not for implementation but for a realistic planning). Planning will eventually need some field experiments with the stakeholders involved.			
Deliverables	Outputs title: Report on co-design of protection and restoration plans for cockle populations	Outputs description: This will describe and provide evidence on how the knowledge base generated by COCKLES and the stakeholder engagement processes will yield advantages for collaborative planning of restoration and protection plans.	Indicators: OA2#1 PI03#3 PI01#3 PI05#30	Target:
	Expected results title: Increased efficiency, compliance and acceptance of restoration and conservation measures	Expected results description: A satisfactory experience will yield increased chances for compliance and acceptance of protection and restoration plans across the AA will have positive effects on cockle recovery and also for future conservation and restoration programmes		
Action nr. 5	Action title: Co-creation of a sustainable management plan for cockles in the Atlantic Area, integrating new knowledge and tools		Start date: 07-2019	End date: 09-2020
	Action description: This action integrates in a Management Plan the practical use of the main outputs COCKLES project will provide. This will happen with the engagement of the key stakeholders who will co-create the plan. The experience will be put into practice in Galicia. The competent bodies will upgrade the plan to become part of the shellfisheries sector regulatory framework. Observer entities from all the other regions will be given the chance to follow the process closely, to foster replication across the AA			
Deliverables	Outputs title: Sustainable management plan, integrating new knowledge and tools. Displaying a co-creation experience in Galicia.	Outputs description: The report will comprise the management plan itself and a description of the methodology used to co-create it with all relevant stakeholder groups. It will be translated into the AA languages and incorporate judgement from expert observers across AA.	Indicators: PI03#1 PI05#30 PI01#1 CO23#30980	Target:
	Expected results title: The basis for an improved management of cockle in the AA are settled, improving the status of coastal ecosystems and their benefits	Expected results description: The co-creation experience will be fully documented to allow other regions in the AA to undertake a similar process. The documents generated, the testimony and constructive judge from observers, will be exploited in dissemination actions.		
Action nr. 6	Action title: Pilot action to enhance the visibility and value of cockles around the AA. Co-design of a promotional campaign for cockles as a key natural asset for the AA.		Start date: 07-2019	End date: 09-2020
	Action description: Outputs from WP8, measuring all range of benefits cockles provide to the human being, will become an invaluable material for enhancing the relevance of this resource and foster improved management and attention. COCKLES importance to preserve healthy and diverse coastal ecosystems, as a key source of income for coastal communities and as a key recreational and cultural asset for tourism will be depicted in the project areas and this will feed the design of a promo campaign at the scale of the AA			
Deliverables	Outputs title: Promotional campaign co-designed with stakeholders across the AA and built upon the outcomes of WP8	Outputs description: The campaign will spread the key messages and data about cockles relevance, for each of the regions and jointly. Stakeholders will aid the partnership and agree on most efficient communication formats, means and intensity. WP2 will aid implementation	Indicators: PI05#100 PI03#1 PI01#1	Target:
	Expected results title: The benefits to all from biodiversity and ecosystem services will be enhanced. Increased awareness	Expected results description: This experience will also highlight the relevance of ecosystem service studies for other species and		

Please describe actions (max. 6) and deliverables within the Activity (the system must allow create a maximum of 6 actions).

	about cockles and ecosystem services will enhance the visibility and protection of this asset to the benefit of all the coastal communities	ultimately contribute to foster the protection of coastal biodiversity in general.		
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WP Nr. 4	Activity	No	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Baseline assessment: Characterising populations, reproductive health and genetics	31		2017-12-01	2020-06-30	613,268.35€
Partners' involvement						
Partner responsible		5				
Partners involved		2,3,5,6,8,9,10,11,12,14,15,16,18,20,21,22				

In WP4, a comprehensive baseline study of cockle population distribution, abundance, dynamics and site influences in the Atlantic Area (AA) will be undertaken. This is needed to compare past and present situations and to forecast future trends and scenarios. UCC will oversee and regularly monitor the progress of all partners within this WP. Initially a desk study (Action N° 1) will be carried out collating historical data sets of cockle population characteristics and dynamics in the AA, as current information is incomplete, fragmented and unpublished. A field survey (Action N° 2) will be carried out, simultaneously by partners (FCUL, IPMA, UA, UCC), and available data from official bodies or producer associations will be used to assess the current status in light of the desk study. A crucial reproductive health survey (Action N° 3) will be undertaken on those cockle populations to assess current reproductive success, which will estimate the need for hatchery production (WP7) and will provide data for models in WP6. Cockle tissue and DNA banks (Action N° 4) will be created by USC based on biological material provided to them by partners from Actions N° 2 and N° 3. The use of Next Generation Sequencing (NGS) methodologies will estimate genetic diversity at a genomic level and the demographic parameters influencing cockle populations. Findings from WP4 will provide stakeholders with an in depth overview of cockle demographics currently and in a changing marine environment.

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).

Action nr. 1	Action title: Historical survey of cockle distribution, abundance and population dynamics		Start date: 12-2017	End date: 10-2018
	Action description: The geographic range and abundance of cockle populations within the Atlantic Area, including exploited stocks and peripheral non exploited "wild" stocks, will be described using publically available historical data sets. Past population dynamics including morphometrics, growth rates, condition and mortality, of those Atlantic Area stocks will be collated. Any data on environmental conditions such as water quality, environmental parameters and anthropogenic pressures will be included			
Deliverables	Outputs title: Historical survey of cockle distribution, abundance and population dynamics in the Atlantic area.	Outputs description: A comprehensive historical data set and maps of cockle population characteristics and dynamics in the Atlantic area based on archival records and past publications to feed awareness and exchange with stakeholders.	Indicators: OA2#1 PI03#3 PI02#1	Target:
	Expected results: Baseline historical survey of cockle populations in the Atlantic area as well as current situation (a.2.) is essential for addressing the underlying causes for cockle loss	Expected results description: The historical characterisation of cockle populations in the Atlantic area will provide the cockle industry, policy makers and the scientific community with a baseline to compare with the current situation and potential future scenarios		
Action nr. 2	Action title: Field survey of cockle distribution, abundance and population dynamics currently		Start date: 03-2018	End date: 06-2020
	Action description: The current status of cockle distribution, abundance and population dynamics of an exploited and ecologically important nonexploited stock will be investigated along the AA. Criteria described in Action N° 1 will be assessed to evaluate current influences on population dynamics at different latitudes. Findings from this study will be used to compare the current situation with the past (Action N° 1) and potential future scenarios (WP6).			
Deliverables	Outputs title: Report with maps and data showing the current distribution, abundance and population dynamics of cockle stocks in the Atlantic area.	Outputs description: Data sets on the current status of cockle population characteristics and dynamics in the AA. Diagnostics to feed stakeholders knowledge needs (industry, policy makers, NGOs etc.).	Indicators: OA2#1 PI03#5 PI02#1	Target:
	Expected results: Availability of thorough information on current cockle demography, together with past information (a.1) is key to understand causes of biodiversity loss and design improved management measures	Expected results description: Producers and administrations will have available and thorough information on current cockle demography thorough AA, to be used to optimise management plans and forecast future trends		
Action nr. 3	Action title: Cockle reproductive health		Start date: 03-2018	End date: 09-2019
	Action description: A crucial reproductive health (sex ratio, age/size at first maturity, gametogenesis, seasonality, recruitment success and site influence) survey of AA cockle populations will be conducted to look at historical trends using data published in scientific papers, reports etc. (Action No 1). Field surveys with stakeholder involvement and training will be conducted to assess the current situation with the past and to monitor future reproductive health. Data from this action will inform WPs 6 and 7			
Deliverables	Outputs title: Reproductive health survey and protocols for monitoring by stakeholders, past and present, of cockle populations in the Atlantic area.	Outputs description: Historical and current reproductive health survey of cockle populations in the Atlantic area enabling continuity of monitoring by stakeholders.	Indicators: PI03#1 OA2#1 PI02#1	Target:

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).			
	Expected results: Availability of thorough information on reproductive health in cockle populations in the AA.	Expected results description: Thorough information on cockle reproduction trends and procedures for success evaluation will be made available. This will be integrated in the guidelines for management of exploited and protected beds, culture and restoration programmes in WP 7.	
Action nr. 4	Action title: Cockle population genetics	Start date: 12-2017	End date: 06-2020
	Action description: Tissue and DNA banks from cockle populations in the AA will be created using biological material from Actions 2 and 3. Advanced sequencing methods will be applied to estimate genetic diversity and demographic parameters influencing population dynamics. Temporal and geographic genetic structure and signals of selection regarding environmental factors will be analysed. This material is essential to define management units for conservation and restoration of cockle beds preserving biodiversity.		
Deliverables	Outputs title: Maps and dataset informing the genetic diversity and structure of Atlantic cockle beds	Outputs description: Genetic diversity in Atlantic cockle beds. Temporal and geographic genetic structure: demographic parameters. Signals of natural selection regarding environmental and biological factors. Definition of operational conservation units for cockle	Indicators: PI03#4 PI02#1
	Expected results: Availability of thorough knowledge on the genetic diversity and structure of cockle populations through the AA is crucial for sustainable management and protection	Expected results description: A thorough knowledge of the genetic structure of cockle populations through AA, which is essential for preservation of genetic biodiversity, fishery/aquaculture management and restoration programmes, will be available for industry and administration.	

WP Nr. 5	Activity	No	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Identification of major threats and trends affecting cockle beds in the Atlantic Area	4	33	2017-10-01	2020-06-30	686,168.88€
Partners' involvement						
Partner responsible		4				
Partners involved		2,3,4,5,6,7,8,9,10,11,12,15,17,18,20,21				

A thorough knowledge of the threats of exploited and protected cockle beds is crucial to implement appropriate management. This WP addresses the threats of cockle beds along the AA and is a unique occasion to leverage the complementary expertise of all partners. The 1st action will involve an exhaustive screening of pathogens affecting cockles along the AA, including virus and phycotoxins, by integrating information from previous studies and from surveys that will be performed in each country; risk assessment of each identified pathogen will be performed and specific recommendations will be established to tackle them (BU, CIMA, FCUL, GEMEL, IPMA, UA, UBx, UCC). The 2nd action will address the efficiency of the response of cockles to stress, with emphasis in pathogens and climate change, involving two key components in resistance to stress, characterisation of the cockle immune ability (CIMA) and the cockle microbiote (associated micro-organisms community) quality along the AA (UBx, BU), in order to identify characters conferring resistance to stress. This knowledge will allow predicting cockle ability to cope with stress in a changing scenario. Another threat type, non-indigenous species, will be dealt with in the 3rd action, assessing the risk involved by non-indigenous species along AA as competitors or carriers of pathogens (FCUL, UA).

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).			
Action nr. 1	Action title: Pathogens census along Atlantic Area	Start date: 10-2017	End date: 06-2020
	Action description: Information on pathogens threatening cockle beds along AA from previous studies will be integrated with that resulting from surveys that will be performed in every country. Risk assessment will be performed considering every identified pathogen; specific recommendations to tackle relevant pathogens will be established to be included in management procedures.		
Deliverables	Outputs title: Risk management guidelines for pathogens	Outputs description: A guide will be produced with thorough information on each identified pathogen threatening cockle beds along AA, including maps with geographic distribution of prevalence and severity, pathogenicity, risk assessment and management recommendations	Indicators: PI03#1 OA2#1
	Expected results: Availability for stakeholders of thorough information on pathogen associated-risks and recommendations to tackle them efficiently	Expected results description: Stakeholders will be provided with thorough information on pathogens threatening cockle beds along AA, including spatial distribution, risks and recommendations to tackle them as a major pressure.	
Action nr. 2	Action title: Cockle response to stress	Start date: 10-2017	End date: 06-2020
	Action description: Two complementary approaches will be implemented to analyse the capability of cockles to resist stress, with emphasis in pathogens and climate change, along AA. The cockle immune system will be characterised as well as the role of the cockle microbiota (associated micro-organisms community) on host fitness, which will allow identifying characters conferring better ability to tackle stress and will contribute to improve management."		
Deliverables	Outputs title: Report on cockle resistance to stress with indicators of resistance capability	Outputs description: Report on the characterisation of the cockle immune system and cockle microbiota along AA and their roles in resistance to stress, including a list of indicators of stress resistance capability that will be used in management procedures	Indicators: OA2#1 PI02#1
	Expected results: Availability of information on roles of immune system and microbiota in	Expected results description: Information on the roles of cockle immune system and cockle microbiota in resistance to stress together with a list of indicators of stress capability, considering different conditions along AA, will be available to improve management procedures.	

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).					
	resistance to stress and indicators of resistance capability to improve management procedures				
Action nr. 3	Action title: Impacts of invasive species on cockles		Start date: 12-2017	End date: 04-2020	
	Action description: Geographic range and abundance of non-indigenous species (NIS) associated with cockle beds, in particular invasive species (e.g. Manila clam), will be assessed, based on sampling and available datasets. NIS-associated risks will be assessed with different criteria: are NIS modifying cockle habitat? Are NIS significant trophic competitors? Are NIS carrying potential pathogens? Is there a risk of NIS transport along with cockle transport? Management recommendations will be stated where needed				
Deliverables	Outputs title: Report with NIS-associated risk assessment	Outputs description: A report with geographic (maps) information on NIS along AA will be produced, including risk assessment and specific recommendations to be implemented where needed.	Indicators: PI03#1 OA2#1	Target:	
	Expected results: Cockle vs. NIS interactions	Expected results description: Information on NIS-associated risks will be available to be used in action 5.1 (pathogens) and WP6 (carrying capacity) and to improve management procedures of protected and exploited cockle beds as well as restoration plans.			

WP Nr. 6	Activity	No	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Modelling flows: Larval dispersal and trophic cascades		34	2017-12-01	2020-09-30	373,460.39€
Partners' involvement						
Partner responsible		6				
Partners involved		1,3,4,6,8,9,12,13,14,16,19,20,22				

Cockle populations within the AA naturally form an inter-connected ecosystem, where holistic approaches to management are needed to improve the sustainability of the resource. Yet connectivities between populations via larval dispersal and the ecological response are poorly resolved, meaning that management practices and associated risks are difficult to establish. BU w/NERC will develop integrated bio-physical and (UCC, UCaen) ecological models to simulate these processes (CETMAR,UCC,UB). The results will inform an operational forecasting and scenario-testing tool (developed in WP3) to assist decision makers with cockle resource management within the AA. The integrated models will road test management strategies before implementing them in reality. Bespoke 3D ocean models will simulate tidal and residual currents at high spatial/temporal resolutions during extreme conditions and for future scenarios. Simulated currents (6.1) and information gained on larval behaviour (6.2) will together drive 3D Particle-Tracking Models (6.3), to simulate the transport of cockle larvae and the variability relative to potential driver inputs. Ecological models (6.4) will use data on cockle and its competitor stocks, primary production and modelled water residence times, to simulate carrying capacities and feeding impact of cockles and other filter-feeders, which together with larval flows will predict population abundances.

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).					
Action nr. 1	Action title: Develop ocean models to simulate natural variabilities in residual currents		Start date: 12-2017	End date: 12-2018	
	Action description: Simulating ocean currents from a range of scenarios is an essential first step to study connectivity patterns, since existing models contain large uncertainties. A 3D ocean model (ROMS) will be applied at AA scale, and at high spatial resolution in key complex regions, validated against observations (e.g. Galician Meteorological Service, BODC, and WP4). Present-day and projected future (2100) scenarios will increase understanding of residual flow variability over tidal-to-centennial timescales.				
Deliverables	Outputs title: Maps characterising the magnitude and variability in residual currents	Outputs description: Detailed residual maps will inform on how transport pathways such as flow along oceanic fronts naturally vary in strength and direction, due to tidal conditions, seasonal variations, extreme storm events, and impacts of projected climate change	Indicators: PI03#1	Target:	
	Expected results: Quantification of relevant oceanographic variability to drive particle-tracking models will be obtained (this output can be further on used, i.e. for ocean-clima studies)	Expected results description: Generation of ocean currents and other variables (e.g. temperatures and mixing) at high spatial/temporal resolution and describing natural variabilities is essential information that will be used in 6.3 to drive larval dispersal predictions			
Action nr. 2	Action title: Description of larvae behaviour during their planktonic life and settlement		Start date: 12-2017	End date: 06-2019	
	Action description: A key control on dispersal of benthic organisms is their swimming behaviour during pelagic larval stages. Displacement modes and rates of cockle larvae will be investigated using image analysis techniques in experimental microcosms. Larval behaviour during the planktonic phase, early sediment recognition, and settlement processes will be investigated. Further, the influence of environmental factors (e.g. salinity, temperature, and pressure) on behaviour and settlement success will be evaluated.				
Deliverables	Outputs title: Parameterization of larval behaviour for Particle-Tracking Models	Outputs description: Microcosm experiments will allow for an accurate assessment of larval swimming capacities in fluctuating environmental conditions. Such information are mandatory for an accurate parameterization of Particle-Tracking Models	Indicators: PI03#1	Target:	
	Expected results: Improved larval dispersal simulations based on specific cockle larvae swimming behaviour	Expected results description: Data on larval swimming behaviour will be implemented into Particle-Tracking Model (6.3) thus improving predictions of larval transport, retention and settlement. Variability in behaviour will be measured and implemented in 6.3 to model sensitivity.			
Action nr. 3	Action title: Development of a Particle-Tracking Model (PTM) to describe cockle larval dispersal		Start date: 03-2018	End date: 03-2020	

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).			
	Action description: A PTM will be developed to simulate larval transport, based on 3D output obtained from 6.1 and potential swimming behaviour obtained from 6.2. Model validation will be aided by genetic analyses and migration inference, and also results from the INTECMAR tracking model. Scenarios will define species range, for example in cold vs. warm periods, calm vs. stormy conditions, and under climate change projections. Well-connected sub-populations and sensitive linkages will be identified		
Deliverables	Outputs title: Data characterising the bio-physical controls on cockle larval dispersal	Outputs description: PTM output (e.g. dispersal probability maps and connectivity matrices) will quantify the relative controls on larval dispersal (e.g. coastal environment, spawning behaviour, oceanographic variability, larval behaviour, and settlement environment).	Indicators: PI03#1 Target:
	Expected results: Data to drive ecological models will be obtained to explain larval dispersal	Expected results description: Migration between cockle areas will be quantified within probability thresholds, based on modelling and genetic markers, allowing a comprehensive assessment of dispersal (leading to a scientific paper) and parameterisation of ecological models (6.4).	
Action nr. 4	Action title: Modelling of carrying capacities, trophic cascades, and population growth	Start date: 03-2018	End date: 09-2020
	Action description: Ecological models will estimate flow of matter/energy between ecosystems through filter-feeding organisms, using new and existing data on biomass and filtration potential, water residence times, and primary production. Carrying capacities will be predicted, as will cockle bioturbation effects on primary production and trophic cascades. Output (carrying capacities, trophic cascades, and connectivity from 6.3) and population abundances (4.1) will together drive a population growth/recovery model.		
Deliverables	Outputs title: Evaluate controls on cockles population abundance within the AA	Outputs description: A scientific paper will describe the ecological status of cockle populations within the AA based on 6.1-6.4. Focus will centre on natural variability and projected future trends. Food-limitation as a control to populations dynamics will be assessed	Indicators: PI03#1 PI02#1 Target:
	Expected results: Data to inform an operational forecasting and scenario-testing tool will be made available, explaining interactions of cockles with other species and hence integrating the ecological perspective	Expected results description: Model predictions will help managers understand the ecological dynamics and sensitivities of cockle populations, with focus on potential food-limitation. Model output will be used to inform scenarios tested for the operational tool, designed in WP3.	

WP Nr. 7	Activity	No	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Procedures for developing cockle culture, supporting genetic breeding for resistance to marteliosis		36	2017-10-01	2020-09-30	387,608.52€
Partners' involvement						
Partner responsible		2				
Partners involved		2,3,6,9,10,11,12,16,18,21,22				

WP7 aims to develop culture and restoration procedures to recover exhausted cockle beds and to increase cockle production where required. A lethal disease, marteliosis, is the most serious pathological threat for cockles through AA; it has devastated cockle beds of Galicia and prevents them from recovering. Thus, culture/restoration plans will require using marteliosis-resistant cockle strains in marteliosis-affected areas. This approach is succeeding to increase oyster production and to recover oyster reefs throughout USA Atlantic coast, which is seriously affected by oyster diseases. In action 7.1, hatchery seed production and outdoor growing up to market size will be established by IPMA. In actions 7.2 and 7.3, protein (CIMA) and gene (USC) expression, respectively, will be evaluated to understand the molecular bases of the cockle immune response and to develop marteliosis-resistance markers. This information will be used by USC and CIMA in action 7.4 to design a selective breeding programme to produce marteliosis-resistant cockle strains. In action 7.5, outputs from actions 7.1 and 7.4 as well as information from WP4 on cockle demography and genetic structure through AA and from WP6 on cockle larval dispersal will be integrated by USC and CIMA to design procedures to restore exhausted cockle beds.

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).			
Action nr. 1	Action title: Settling culture procedures at hatchery and outdoor stages		Start date: 10-2017 End date: 06-2020
	Action description: Cost-effective procedures will be settled to produce cockle seed in hatchery facilities and to grow outdoor up to market size, minimising the impact on the ecosystem. The knowledge currently applied to successfully culture other bivalve molluscs species will be used. The required research on reproduction, nutrition, growth and zootechnical aspects will be performed for every culture stage, indoor (hatchery seed production) and outdoor (two ways: suspended culture and culture in bottom plots).		
Deliverables	Outputs title: Guidelines to culture cockles at hatchery and outdoor stages.	Outputs description: Guidelines with detailed, thorough description of the procedures to culture cockles, including hatchery and outdoor stages.	Indicators: PI03#1 PI01#3 CO28#3 Target:
	Expected result: Implementation of cockle culture by the Administration and the Industry (associations of producers, hatchery companies and fishing guilds)	Expected result description: Improved procedures for cockle culture will be made available for the industry to increase cockle production where appropriate. The Administration with the industry will get the know-how to produce seed that can be used to restore exhausted beds.	
Action nr. 2	Action title: Identification of protein markers of marteliosis resistance		Start date: 10-2017 End date: 04-2020
	Action description: A marteliosis outbreak occurs every year in affected areas devastating new recruitment. The proteome of cockles surviving a marteliosis outbreak will be compared with that of cockles taken before the outbreak occurs. Proteome of the haemolymph (key in the immune response) and the digestive gland (where the parasite proliferates) will be analysed. The proteins being more abundant in survivors will be identified and evaluated as putative markers of marteliosis-resistance for the action 7.4.		

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).						
Deliverables	Outputs title: List of candidate proteins serving as markers of Marteiliopsis-resistance in selective breeding	Outputs description: A list of candidate proteins serving as markers of Marteiliopsis-resistance will be obtained. They will be used in the action 7.4.	Indicators: PI03#1 OA2#1	Target:		
	Expected result: Availability of the selected marker proteins to be used in selective breeding programmes for Marteiliopsis-resistance	Expected result description: The selected marker proteins will serve to select appropriate cockles (those having the adequate concentration of marker proteins) to be used as brood-stock in selective breeding programmes envisaged to produce Marteiliopsis-resistant cockle strains.				
Action nr. 3	Action title: Identification of candidate genes and genetic markers of resistance to Marteiliopsis		Start date: 10-2017	End date: 04-2020		
	Action description: Cockle immune response is under genetic control. It is expected that some genes play key roles to control Marteiliopsis and serve as markers of resistance in breeding programmes. Expression of genes related to immunity will be scrutinised in cockles harvested along a Marteiliopsis outbreak, including survivors. Evaluation of gene expression and identification of allelic variants will be performed to check for their association with Marteiliopsis-resistance and select candidate genes and markers					
Deliverables	Outputs title: Set of genetic tools including a database with cockle genes related to immune response and a list of genetic markers of Marteiliopsis-resistance.	Outputs description: - A database with cockle genes related to immunity, highlighting those differentially expressed in response to Marteiliopsis, will be released. - A list of genetic markers of Marteiliopsis-resistance will be obtained and used in the action 7.4.	Indicators: PI03#2	Target:		
	Expected result: Availability of the selected genetic markers in selective breeding programmes for Marteiliopsis-resistance, to recover the AA cockle beds and production.	Expected result description: The selected genetic markers will serve to select appropriate cockles (those having the marker allelic variants) to be used as brood-stock in selective breeding programmes envisaged to produce Marteiliopsis-resistant cockle strains.				
Action nr. 4	Action title: Devising a selective breeding programme for resistance to Marteiliopsis using proteomic and genomic information		Start date: 06-2020	End date: 09-2018		
	Action description: The integration of the complementary proteomic and genetic information from actions 7.2 and 7.3, respectively, will provide key knowledge to understand the molecular basis for controlling Marteiliopsis. The markers and candidate genes identified in those actions together with the information on hatchery production of cockle seed from action 7.1 will be used to design a selective breeding programme to produce Marteiliopsis-resistant cockle strains.					
Deliverables	Outputs title: Guidelines to perform a marker-assisted selective breeding programme to produce Marteiliopsis-resistant cockle strains	Outputs description: Guide for the industry and the Administration to perform a selective breeding programme to produce Marteiliopsis-resistant cockle strains	Indicators: PI03#1 CO28#30	Target:		
	Expected result: Implementation of selective breeding programmes to produce Marteiliopsis-resistant cockle strains	Expected result description: The industry and the Administration will have available a protocol to perform selective breeding programmes to produce Marteiliopsis-resistant cockle strains, which can be used to increase production through culture and to restore exhausted beds				
Action nr. 5	Action title: Designing procedures to restore exhausted cockle beds and to evaluate their success along the AA		Start date: 10-2017	End date: 09-2020		
	Action description: Much information on procedures to restore oyster beds and reefs is available from USA programmes. A key issue is to know if the larvae setting in an area (bed/bay) derive from progenitors located near or far away, even from other bays. Information from previous mollusc restoration programmes and from WP6 on larval dispersal and genetic markers to discriminate cockles from different geographic areas will be used to design procedures to restore exhausted cockle beds and to evaluate the success.					
Deliverables	Outputs title: Guidelines to restore Atlantic Area cockle beds	Outputs description: Guide with detailed, thorough description of procedures to restore cockle beds and monitor the success through implementation	Indicators: PI03#1	Target:		
	Expected result: Action plans for the restoration of cockle beds across the AA	Expected result description: Procedures to restore exhausted cockle beds will be available to be implemented across the AA by the Administration with the Industrial involvement				
WP Nr. 8	Activity	No	Duration in months	Activity start year and month	Activity end year and month	Activity budget
	Quantifying biodiversity, economic and societal benefits from cockles		35	2017-10-01	2020-08-31	726,331.75€
Partners' involvement						
Partner responsible		7				
Partners involved		1,2,4,5,6,7,8,9,10,11,12,13,14,16,18,21,22				

This WP will create a decision support tool based on quantifying the contribution of cockles to biodiversity, ecosystem health and resilience, and the benefits to people from ecosystem services. Industry, researchers and policy makers will together collate existing information and conduct new studies required on biodiversity and functions (8.1), ecosystem services (8.2), to create a spreadsheet-based management tool (8.3). The ecosystem service benefits from shellfish are poorly studied, with almost no information on cockles, and very little information on cultural services from shellfish. Therefore, the primary data we need to collect will contribute substantially to this knowledge, and will guide holistic management of the ecosystems that cockles inhabit in order to support multiple biodiversity and societal benefits. Actions 8.1 and 8.2 will run in parallel, later feeding into Action 8.3 (the decision support tool). Development of the tool will be supported by data and information from Action 4.2, and 6.4, and will support Action 3 (especially 3.3, 3.5, 3.6), and Action 7, with dissemination in Action 2. UBx will lead Action 8.1, NERC-CEH will lead 8.2 and 8.3. Partners from each country (GEMEL, UoCaen, UCC, UA, FCUL, CETMAR, CIMA, BU, NRW) will provide data on yield of cockles for national upscaling; send samples for analysis under agreed protocols to quantify regulating services; and will assist with questionnaires to assess cultural services.

Please describe actions (max. 4) and deliverables within the Activity (the system must allow create a maximum of 4 actions).				
Action nr. 1	Action title: Quantifying role of cockles as an engineering species, supporting coastal ecosystem functioning and biodiversity		Start date: 10-2017	End date: 08-2020
	Action description: Cockle is a keystone species as its burrowing and feeding behaviour underpins many benthic and water column processes, seen as supporting services. This action will evaluate the role of cockles on 1) sediment bed properties (erosion and sand accumulation), 2) biogeochemical sediment dynamics (nutrient fluxes and microphytobenthic production) 3) macrofaunal diversity, and 4) the role of cockles in supporting healthy bird populations (i.e. oystercatcher).			
Deliverables	Outputs title: Technical report on role of cockles as an ecosystem engineer	Outputs description: The report will present new data on the role of cockles as an ecosystem engineer, and its expected effects on biodiversity and ecosystem functioning services	Indicators: OA2#1 PI03#1	Target:
	Expected result: Improved understanding by managers and policy makers of cockles key role for ecosystem health.	Expected result description: This will provide supporting evidence to show how important cockles are in maintaining ecosystem health. It will emphasise their vital role underpinning ecosystem functions and the more visible biodiversity that the public care about.		
Action nr. 2	Action title: Quantifying the ecosystem service benefits that cockles provide to society		Start date: 10-2017	End date: 08-2019
	Action description: Direct benefits include provisioning services (shellfish meat, shell by-products). Less visible benefits include regulating services (carbon sequestration in shell and sediment, water filtration, pathogen removal), and cultural services (recreational harvesting, cultural value). We will quantify these final services with field data and stakeholder interviews, and value the benefits to society (monetary + non-monetary). We will use data from other WPs (cockle extent, density) to upscale services			
Deliverables	Outputs title: Report with integrated data an analysis on provisioning, regulating and cultural ecosystem services provided by cockles	Outputs description: The outputs will present new data from experiments, field studies and existing data from the literature to quantify the ecosystem services provided by cockles, upscaled to national level across the partner countries.	Indicators: PI03#3 OA3#6	Target:
	Expected result: Improved marketing and advertising for the industry, based on improved understanding of the services and benefits provided by cockles	Expected result description: This will fill a major knowledge gap on the services that cockles provide, particularly for cultural services. It will allow managers and the industry to better understand the non-market benefits, to promote the sustainability of the industry		
Action nr. 3	Action title: Create a spread-sheet based decision support tool for managers and industry to calculate the ecosystem services provided by cockles		Start date: 10-2019	End date: 08-2020
	Action description: With industry, researchers and other stakeholders we will create a spread-sheet based decision tool for managers to calculate the ecosystem services provided by cockles at their site. Inputs will include site information and management data, as well as findings and data from 8.1 and 8.2 and other Actions. It will allow exploration of management and climate change scenarios, and will feed into and complement other tools in the project.			
Deliverables	Outputs title: An easy to use, spreadsheet-based tool for users to calculate ecosystem service benefits from cockles at a site	Outputs description: The tool allows users to calculate ecosystem services, based on simple input information. Future management scenarios or climate options can also be explored.	Indicators: PI03#1	Target:
	Expected result: Improved management of the industry, through easy access to information on the biodiversity and services cockles provide	Expected result description: This tool will make sustainable management of cockle fisheries much easier, by collating in one place information on the wider non-market services from cockles, including biodiversity, for a range of scenarios.		

6. BUDGET

6.1 Financing Plan by Partner

Partners	Programme Funding			Partner Contribution	External Contribution		Total Budget	Total Budget %	Part of Budget spent outside Programme Area		Other Fundings				Total Costs
	ERDF	Co-Financing Rate	ERDF %		Public Contribution	Private Contribution			Budget	% of Total	European Investment Bank	Revenues generated by the project	Others	Total	
Partner n.º 1 - Centro Tecnológico del Mar, Fundación CETMAR	251368.23€	75%		83789.41	0	0	335,157.64€		0	0.00%	0	0	0	0.00€	335,157.64€
Partner n.º 2 - Consellería do Mar, Xunta de Galicia	233233.44€	75%		77744.48	0	0	310,977.92€		0	0.00%	0	0	0	0.00€	310,977.92€
Partner n.º 3 - UNIVERSIDADE DE SANTIAGO DE COMPOSTELA	258291.75€	75%		86097.25	0	0	344,389.00€		0	0.00%	0	0	0	0.00€	344,389.00€
Partner n.º 4 - UNIVERSITE DE BORDEAUX	367677.00€	75%		122559	0	0	490,236.00€		2000	0.41%	0	0	0	0.00€	490,236.00€
									Field trips to Baie de Somme						
Partner n.º 5 - University College Cork	239761.38€	75%		79920.46	0	0	319,681.84€		0	0.00%	0	0	0	0.00€	319,681.84€
Partner n.º 6 - Bangor University	285840.00€	75%		95280	0	0	381,120.00€		0	0.00%	0	0	0	0.00€	381,120.00€
Partner n.º 7 - NERC Centre for Ecology and Hydrology, Bangor	188625.00€	75%		62875	0	0	251,500.00€		0	0.00%	0	0	0	0.00€	251,500.00€
Partner n.º 8 - Groupe d'Etude des Milieux Estuariens et Littoraux	104910.00€	75%		34970	0	0	139,880.00€		111012	79.36%	0	0	0	0.00€	139,880.00€
									Bay of Somme is the most important						

Partners	Programme Funding			Partner Contribution	External Contribution		Total Budget	Total Budget %	Part of Budget spent outside Programme Area		Other Fundings				Total Costs
	ERDF	Co-Financing Rate	ERDF %		Public Contribution	Private Contribution			Budget	% of Total	European Investment Bank	Revenues generated by the project	Others	Total	
									cockle area in France. Crucial for AA						
Partner n.º 9 - Cyfoeth Naturiol Cymru	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 10 - Instituto Português do Mar e da Atmosfera, I.P.	187914.00€	75%		62638	0	0	250,552.00€		0	0.00%	0	0	0	0.00€	250,552.00€
Partner n.º 11 - Universidade de Aveiro	228114.03€	75%		76038.01	0	0	304,152.04€		0	0.00%	0	0	0	0.00€	304,152.04€
Partner n.º 12 - Faculdade de Ciências da Universidade de Lisboa	187331.10€	75%		62443.70	0	0	249,774.80€		0	0.00%	0	0	0	0.00€	249,774.80€
Partner n.º 13 - Université de Caen Normandie	178617.27€	75%		59539.09	0	0	238,156.36€		0	0.00%	0	0	0	0.00€	238,156.36€
Partner n.º 14 - Marine Institute Ireland	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 15 - Institut français de recherche pour l'exploitation de la mer	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 16 - Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 17 - Centre National de la Recherche Scientifique Délégation Aquitaine	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€

Partners	Programme Funding			Partner Contribution	External Contribution		Total Budget	Total Budget %	Part of Budget spent outside Programme Area		Other Fundings				Total Costs
	ERDF	Co-Financing Rate	ERDF %		Public Contribution	Private Contribution			Budget	% of Total	European Investment Bank	Revenues generated by the project	Others	Total	
Partner n.º 18 - CONFRARIA DE PESCADORES SAN ANTONIO DE CAMBADOS	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 19 - Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 20 - Instituto Tecnolóxico para o Control do Medio Mariño de Galicia	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 21 - Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Partner n.º 22 - Instituto da Conservação da Natureza e das Florestas	0.00€	75%		0	0	0	0.00€		0		0	0	0	0.00€	0.00€
Total	2,711,683.20	75.00%		903,894.40€	0.00€	0.00€	3,615,577.60€		113,012.00€	3.13%	0.00€	0.00€	0.00€	0.00€	3,615,577.60€

6.2 Budget explanation

6.2.1 Explain the budget preparation methodology (main assumptions and justifications)	Staff costs: actual salaries with social charges, for the number of hours estimated for each action (and activities). Travel costs: for six-monthly project meetings, opportunities for matching meeting dates with workshops (to minimize the costs) , a max. of two days w/nights and 2 people + sampling trips. External servs.: analytical servs., computational servs., web programming, translations and ext. stakeholders' involvement in meetings and workshops. Equipment: consumables, small equipment
6.2.2 Explain the partners involvement in the preparation of the budget	Each partner has prepared its own budget estimation individually. Then a negotiation process has taken place to balance costs according to technical commitments and territorial representation of the partnership. To optimize calculations a shared sampling plan, for the field work, was elaborated and extra details about WP have been discussed and agreed. A time plan was also elaborated to inform budgeting.

6.2.3 If applicable, explain the investment budget (under budget lines: equipment/small infrastructures and works):	Equipment budget is needed for experimental work in the field and in the lab. Costs are related to the collection, storage and processing of samples: cockles, parasites and other biological materials, small consumables and reagents. To optimize efforts and expenditure these costs have been calculated accordingly to a shared and detailed sampling plan (and considering risks such as abnormal mortalities of cockles). Molecular analysis work (DNA and RNA extraction, sequencing, Next Seq, genotyping, -omics...) committed (Wps 4, 5 7) will require the use of lab consumables and reagents and also the payment for the use of equipment. Field experiments in Wp5 and WP7 will require optical consumables and small equipment: submersible cameras, video, sensors, monitor, cables, dataloggers, etc. Bioturbation experiments in Wp7: for bioturbation experiments (dissolved tracers, particle tracers, cons. for biogeochemical measurements, experimental chambers, -80°C freezer... + Computing costs and PCs
6.2.4 Explain how the value for money will be ensured, i.e. how do you will reach the most advantageous combination of cost, quality and sustainability to meet project achievements?	Economy: All the work in the project has been carefully planned. The most important issue addressed to minimize costs is the sampling and surveying plan, constructed to share samples and sampling efforts among partners, actions and WPs. Costs of project meetings will also be minimized by taking advantage of ICT facilities and matching meeting dates with workshops. Efficiency: Improvements to project consortium, workplan and to get applicable results will be achieved with a minor deviation from the original estimation of budget (3%). Exhaustive project monitoring will assure early detection of any deviation from plans (in cost, time and/or quality) and prevent or mitigate impact. Effectiveness: Costs minimization will not affect quality of performance and/or accomplishment of results.
6.2.5 Complementary information	The small fraction of the budget that is expected to be spent outside the eligible area refers to work around Baie du Somme in France. This area is the most important cockle area in France and one of the most important in the Atlantic regions of Europe. It is essential to include this area in the workplan for the impact it will have in the whole area.

6.3 Budget Plan per Partner, Work Package and Year

Partners	Year														Total
	2017	%	2018	%	2019	%	2020	%	2021	%	2022	%	2023	%	
Partner n.º 1 - Centro Tecnológico del Mar, Fundación CETMAR	28517.43	8.51%	115060.74	34.33%	131051.92	39.10%	60527.55	18.06%	0	0.00%	0	0.00%	0	0.00%	335,157.64€
Partner n.º 2 - Consellería do Mar, Xunta de Galicia	26509.26	8.52%	124717.05	40.10%	78471.16	25.23%	81280.45	26.14%	0	0.00%	0	0.00%	0	0.00%	310,977.92€
Partner n.º 3 - UNIVERSIDADE DE SANTIAGO DE COMPOSTELA	14181	4.12%	139430	40.49%	116021	33.69%	74757	21.71%	0	0.00%	0	0.00%	0	0.00%	344,389.00€
Partner n.º 4 - UNIVERSITE DE BORDEAUX	26599	5.43%	181221	36.97%	233646	47.66%	48770	9.95%	0	0.00%	0	0.00%	0	0.00%	490,236.00€
Partner n.º 5 - University College Cork	6000	1.88%	116831.06	36.55%	73775.72	23.08%	123075.06	38.50%	0	0.00%	0	0.00%	0	0.00%	319,681.84€
Partner n.º 6 - Bangor University	18954	4.97%	134554	35.30%	146847	38.53%	80765	21.19%	0	0.00%	0	0.00%	0	0.00%	381,120.00€
Partner n.º 7 - NERC Centre for Ecology and Hydrology, Bangor	15760	6.27%	83333	33.13%	83333	33.13%	69074	27.46%	0	0.00%	0	0.00%	0	0.00%	251,500.00€
Partner n.º 8 - Groupe d'Etude des Milieux Estuariens et Littoraux	9359	6.69%	73317	52.41%	54776	39.16%	2428	1.74%	0	0.00%	0	0.00%	0	0.00%	139,880.00€

Partners	Year														Total
	2017	%	2018	%	2019	%	2020	%	2021	%	2022	%	2023	%	
Partner n.º 9 - Cyfoeth Naturiol Cymru	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 10 - Instituto Português do Mar e da Atmosfera, I.P.	20172.25	8.05%	93992	37.51%	70000	27.94%	66387.75	26.50%	0	0.00%	0	0.00%	0	0.00%	250,552.00€
Partner n.º 11 - Universidade de Aveiro	45070.29	14.82%	82052.51	26.98%	98405.51	32.35%	78623.73	25.85%	0	0.00%	0	0.00%	0	0.00%	304,152.04€
Partner n.º 12 - Faculdade de Ciências da Universidade de Lisboa	17186.64	6.88%	132550.27	53.07%	62523.66	25.03%	37514.23	15.02%	0	0.00%	0	0.00%	0	0.00%	249,774.80€
Partner n.º 13 - Université de Caen Normandie	20352.60	8.55%	83063.21	34.88%	61263.21	25.72%	73477.34	30.85%	0	0.00%	0	0.00%	0	0.00%	238,156.36€
Partner n.º 14 - Marine Institute Ireland	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 15 - Institut français de recherche pour l'exploitation de la mer	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 16 - Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 17 - Centre National de la Recherche Scientifique Délégation Aquitaine	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 18 - CONFRARIA DE PESCADORES SAN ANTONIO DE CAMBADOS	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 19 - Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 20 - Instituto Tecnolóxico para o Control do Medio Mariño de Galicia	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 21 - Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 22 - Instituto da Conservação da Natureza e das Florestas	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Total	248,661.47€	6.88%	1,360,121.84€	37.62%	1,210,114.18€	33.47%	796,680.11€	22.03%	0.00€	0.00%	0.00€	0.00%	0.00€	0.00%	3,615,577.60€

6.4 Line Budget plan by partner and budget line

Partners	Budget Line														Total
	PREPARION COSTS	STAFF FLAT RATE	STAFF	%	OFFICE AND ADMINISTRATIVE	%	TRAVEL AND ACCOMODATION	%	EXTERNAL EXPERTISE AND SERVICES	%	EQUIPMENT	%	SMALL INFRASTRUCTURE AND WORKS	%	
Partner n.º 18 - CONFRARÍA DE PESCADORES SAN ANTONIO DE CAMBADOS	0	0	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 19 - Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia	0	0	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 20 - Instituto Tecnolóxico para o Control do Medio Mariño de Galicia	0	0	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 21 - Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.	0	0	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Partner n.º 22 - Instituto da Conservación da Natureza e das Florestas	0	0	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0	0.00%	0.00€
Total	16,000.00€	2,114,855.01€	2,114,855.01€	58.49%	317,228.25€	8.77%	336,847.17€	9.32%	362,125.51€	10.02%	468,521.66€	0.00%	0.00€	0.00%	3,615,577.60€

6.5 Budget plan by partner and workpackage

Partners	Work Package														Total				
	WP0-Project Preparation	%	WP1-Project Coordination	%	WP2-Communication	%	WP3-Capitalization	%		%		%		%					
Partner n.º 1 - Centro Tecnológico del Mar, Fundación CETMAR	1500	0.45%	69392.64	20.70%	36456.25	10.88%	126879.98	37.86%	0	0.00%	0	0.00%	79712.50	23.78%	0	0.00%	21216.27	6.33%	335,157.64€
Partner n.º 2 - Consellería do Mar, Xunta de Galicia	1500	0.48%	24190.92	7.78%	9301.35	2.99%	4955.7	1.59%	24160.5	7.77%	122484.15	39.39%	0	0.00%	119679.60	38.48%	4705.7	1.51%	310,977.92€
Partner n.º 3 - UNIVERSIDADE DE SANTIAGO DE COMPOSTELA	1500	0.44%	7861	2.28%	0	0.00%	11537	3.35%	156400	45.41%	4144	1.20%	4833	1.40%	158114	45.91%	0	0.00%	344,389.00€
Partner n.º 4 - UNIVERSITE DE BORDEAUX	1500	0.31%	7000	1.43%	5000	1.02%	0	0.00%	0	0.00%	172087	35.10%	149470	30.49%	0	0.00%	155179	31.65%	490,236.00€
Partner n.º 5 - University College Cork	1500	0.47%	5813.82	1.82%	5813	1.82%	0	0.00%	110000	34.41%	110000	34.41%	0	0.00%	0	0.00%	86555.02	27.08%	319,681.84€
Partner n.º 6 - Bangor University	1500	0.39%	83202	21.83%	14013	3.68%	29755	7.81%	59072	15.50%	59072	15.50%	90609	23.77%	17345	4.55%	26552	6.97%	381,120.00€
Partner n.º 7 - NERC Centre for Ecology and Hydrology, Bangor	1500	0.60%	22557.34	8.97%	9771.80	3.89%	24141.63	9.60%	0	0.00%	17143.72	6.82%	0	0.00%	0	0.00%	176385.51	70.13%	251,500.00€
Partner n.º 8 - Groupe d'Etude des Milieux Estuariens et Littoraux	600	0.43%	0	0.00%	0	0.00%	23270	16.64%	103918	74.29%	1323	0.95%	0	0.00%	0	0.00%	10769	7.70%	139,880.00€

Partners	Work Package																		Total
	WP0-Project Preparation	%	WP1-Project Coordination	%	WP2-Communication	%	WP3-Capitalization	%		%		%		%		%		%	
Partner n.º 9 - Cyfoeth Naturiol Cymru	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 10 - Instituto Português do Mar e da Atmosfera, I.P.	600	0.24%	41981.25	16.76%	25286.35	10.09%	8686.35	3.47%	54007.65	21.56%	76208.10	30.42%	0	0.00%	43782.30	17.47%	0	0.00%	250,552.00€
Partner n.º 11 - Universidade de Aveiro	1500	0.49%	6057.44	1.99%	84584.17	27.81%	30287.20	9.96%	60574.41	19.92%	60574.42	19.92%	0	0.00%	30287.20	9.96%	30287.20	9.96%	304,152.04€
Partner n.º 12 - Faculdade de Ciências da Universidade de Lisboa	1500	0.60%	20434.43	8.18%	34734.43	13.91%	27234.43	10.90%	45135.79	18.07%	63132.49	25.28%	20100.43	8.05%	18400.42	7.37%	19102.38	7.65%	249,774.80€
Partner n.º 13 - Université de Caen Normandie	1300	0.55%	10041.23	4.22%	2500	1.05%	0	0.00%	0	0.00%	0	0.00%	28735.46	12.07%	0	0.00%	195579.67	82.12%	238,156.36€
Partner n.º 14 - Marine Institute Ireland	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 15 - Institut français de recherche pour l'exploitation de la mer	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 16 - Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 17 - Centre National de la Recherche Scientifique Délégation Aquitaine	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 18 - CONFRARIA DE PESCADORES SAN ANTONIO DE CAMBADOS	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 19 - Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 20 - Instituto Tecnológico para o Control do Medio Mariño de Galicia	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 21 - Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Partner n.º 22 - Instituto da Conservação da Natureza e das Florestas	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0	NaN %	0.00€
Total	16,000.00€	0.44%	298,532.07€	8.26%	227,460.35€	6.29%	286,747.29€	7.93%	613,268.35€	16.96%	686,168.88€	18.98%	373,460.39€	10.33%	387,608.52€	10.72%	726,331.75€	20.09%	3,615,577.60€

6.6 Complementary information

6.6.1 In Kind Contribution			
Partners	Budget	% of Total Budget	Explanation
Partner n.º 1 - Centro Tecnológico del Mar, Fundación CETMAR			
Partner n.º 2 - Consellería do Mar, Xunta de Galicia			
Partner n.º 3 - UNIVERSIDADE DE SANTIAGO DE COMPOSTELA			
Partner n.º 4 - UNIVERSITE DE BORDEAUX			
Partner n.º 5 - University College Cork			
Partner n.º 6 - Bangor University			
Partner n.º 7 - NERC Centre for Ecology and Hydrology, Bangor			
Partner n.º 8 - Groupe d'Etude des Milieux Estuariens et Littoraux			
Partner n.º 9 - Cyfoeth Naturiol Cymru			
Partner n.º 10 - Instituto Português do Mar e da Atmosfera, I.P.			
Partner n.º 11 - Universidade de Aveiro			
Partner n.º 12 - Faculdade de Ciências da Universidade de Lisboa			
Partner n.º 13 - Université de Caen Normandie			
Partner n.º 14 - Marine Institute Ireland			
Partner n.º 15 - Institut français de recherche pour l'exploitation de la mer			
Partner n.º 16 - Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest			
Partner n.º 17 - Centre National de la Recherche Scientifique Délégation Aquitaine			
Partner n.º 18 - CONFRARÍA DE PESCADORES SAN ANTONIO DE CAMBADOS			
Partner n.º 19 - Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia			
Partner n.º 20 - Instituto Tecnolóxico para o Control do Medio Mariño de Galicia			
Partner n.º 21 - Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.			
Partner n.º 22 - Instituto da Conservação da Natureza e das Florestas			

6.6.2 Physical Investment						
ID	Name of the organization	Investment Title	Investment Budget	Technical Description and justification	Investment requirements	Ownership and durability
1	Partner n.º 1 - Centro Tecnológico del Mar, Fundación CETMAR					

6.6.2 Physical Investment						
ID	Name of the organization	Investment Title	Investment Budget	Technical Description and justification	Investment requirements	Ownership and durability
2	Partner n.º 2 - Consellería do Mar, Xunta de Galicia					
3	Partner n.º 3 - UNIVERSIDADE DE SANTIAGO DE COMPOSTELA					
4	Partner n.º 4 - UNIVERSITE DE BORDEAUX					
5	Partner n.º 5 - University College Cork					
6	Partner n.º 6 - Bangor University					
7	Partner n.º 7 - NERC Centre for Ecology and Hydrology, Bangor					
8	Partner n.º 8 - Groupe d'Etude des Milieux Estuariens et Littoraux					
9	Partner n.º 9 - Cyfoeth Naturiol Cymru					
10	Partner n.º 10 - Instituto Português do Mar e da Atmosfera, I.P.					
11	Partner n.º 11 - Universidade de Aveiro					
12	Partner n.º 12 - Faculdade de Ciências da Universidade de Lisboa					
13	Partner n.º 13 - Université de Caen Normandie					
14	Partner n.º 14 - Marine Institute Ireland					
15	Partner n.º 15 - Institut français de recherche pour l'exploitation de la mer					
16	Partner n.º 16 - Fédération des Sociétés pour l'Etude, la Protection, et l'Aménagement de la Nature dans le Sud-Ouest					
17	Partner n.º 17 - Centre National de la Recherche Scientifique Délégation Aquitaine					
18	Partner n.º 18 - CONFRARÍA DE PESCADORES SAN ANTONIO DE CAMBADOS					
19	Partner n.º 19 - Secretaría Xeral de Calidade e Avaliación Ambiental-Xunta de Galicia					

6.6.2 Physical Investment						
ID	Name of the organization	Investment Title	Investment Budget	Technical Description and justification	Investment requirements	Ownership and durability
20	Partner n.º 20 - Instituto Tecnolóxico para o Control do Medio Mariño de Galicia					
21	Partner n.º 21 - Formosa, Cooperativa de Viveiristas da Ria Formosa, C.R.L.					
22	Partner n.º 22 - Instituto da Conservação da Natureza e das Florestas					

Output Indicators

Outputs	Work Package
	Target value
Project reports	44
Internal project meetings and events	22
Number of actions for the dissemination and capitalisation of results	307
Number of participants in actions for the dissemination and capitalisation of results	10860
Project newsletters and other information documents	11
Number of technical and scientific publications produced	36
Number of case studies and pilot actions implemented	16
Number of enterprises supported to introduce new to the firm products	3
Number of policy, strategy and operational instruments produced	36
Surface area of habitats supported in order to attain a better conservation status	30980
Number of enterprises supported to introduce new to the market products	33

Reports Delivering Chronogram

Year	Reports	With payment claim / Without payment claim	Date expected to be deliver	Total amount expected to be claim
2018	1º Half Report		2018-04-01	
2018	2º Half Report		2018-10-01	
2019	1º Half Report		2019-04-01	
2019	2º Half Report		2019-10-01	
2020	1º Half Report		2020-04-01	
2020	2º Half Report		2020-10-01	