

ANNEX V

Environmental and Social Management Plan (ESMP) of the Project “Adaptation to the Impacts of Climate Change on Peru’s Coastal Marine Ecosystem and Fisheries”

Content

1	Project description summary.....	2
2	Screening of AF’s environmental and social principles.....	3
3	Environmental and Social Impact Assessment	4
3.1	Categorization	10
4	Environmental and social management plan.....	10
4.1	Environmental and social prevention and mitigation program	10
4.1.1	Grievance mechanism	10
4.2	Monitoring, evaluation and oversight program	11
4.2.1	Operational and financial arrangements	11
4.2.2	Implementation schedule.....	17
5	Description of the compliance with AF’ environmental and social principles.....	19
5.1.1	Compliance with the Law.....	19
5.1.2	Access and equity	19
5.1.3	Marginalized and Vulnerable Groups.....	20
5.1.4	Human Rights.....	20
5.1.5	Gender Equity and Women’s Empowerment	20
5.1.6	Core Labour Rights.....	20
5.1.7	Indigenous Peoples	21
5.1.8	Involuntary Resettlement	21
5.1.9	Protection of Natural Habitats	21
5.1.10	Conservation of Biological Diversity	21
5.1.11	Climate Change.....	22
5.1.12	Pollution Prevention and Resource Efficiency.....	22
5.1.13	Public Health	22
5.1.14	Physical and Cultural Heritage.....	22
5.1.15	Lands and Soil Conservation	22
6	Consultation.....	22

1 Project description summary

The overall objective of the project is to support the GoP in reducing the vulnerability of coastal communities to impacts of climate change on the coastal marine ecosystems and fishery resources. This will require the implementation of a group of adaptation measures that include:

- (i) Implementation of a group of activities that contribute to the enhancement of current adaptive capacity of artisanal fishing communities living along the Peruvian coast, and reduce the vulnerability of coastal ecosystems, while increasing the income of the communities and their participation in managing and protecting their natural resources.
- (ii) Deployment of a modern and efficient surveillance, prediction and information system of climate and environmental key factors at regional and local scales, supporting fishing, aquaculture and ecotourism activities, as well as fisheries adaptive management based on long-term prevision under climate change scenarios.
- (iii) Development of a knowledge framework to facilitate capacity building at different levels and the dissemination of project's lessons learned;
- (iv) Adjustment of the institutional framework (legal, regulatory and organizational) to facilitate EBA for the coastal marine domain at country-level and to implement an Ecosystem Approach to Fisheries (EAF) including artisanal fishing.

As compared to classical (non-climatic) good fisheries management, the proposed project considers three aspects directly related to adaptation capacities: a) the implementation of a monitoring system that allows the continuous adjustment of the management actions; b) a multi-sectorial approach for the governance of the coastal marine domain (fisheries, environment and local authorities); and c) a socio-economic approach towards the improvement of the livelihoods of artisanal fishing communities through 'win-win' measures that also benefits ecosystem resilience.

Thus, the main challenge consists in increasing the resilience of the coastal marine ecosystems and the coastal communities (particularly the artisanal fishing communities) to climate change impacts (e.g. the Ecosystem Based Adaptation, EBA; CBD, 2009). Therefore the main beneficiaries of this proposal are the artisanal fishing communities, whose livelihoods largely depends on the status of the coastal marine ecosystems, which are already subject to a number of non-climatic threats.

The approach of the proposal is to focus the adaptation measures in two pilot areas, one associated to the southern tip of the Tropical Eastern Pacific Coastal Ecosystem (Máncora pilot site), and the other, a typical representative of the Peruvian Coastal Upwelling Ecosystem (Huacho pilot site). The project will carry out adaptive 'win-win' measures to improve the resiliency to climate change of both the ecosystems and of the artisanal fishing communities.

The measures will help, on one side, to reduce fishing pressure through adoption of environmentally friendly gears while developing incentives from the human direct consumption market. On other side, economic diversification through aquaculture and ecotourism, will strengthen resilience of fisher communities. Bio-conversion of fish landing and aquaculture residues will aid to economic diversification as well, while mitigating pollution for the coastal marine ecosystem. All the adaptation measures will be sustainable in the long-term through active participation of local communities empowered through by co-management framework. The ultimate purpose of the

proposal is that these adaptive measures at local level can be upscaled or replicated to other zones of the coastal domain, combining governance, capacity building and interventions sponsored by the government and the private sector.

Project components

- (i) **Component 1:** Implementation of interventions in pilot strategic areas to improve resilience of target coastal communities and key coastal marine ecosystems to climate change and variability-induced stress.
- (ii) **Component 2:** Deployment of a modern and efficient environment surveillance and prediction system in the coastal marine ecosystems at regional and local scales supporting fisheries adaptive management under the EAF principles.
- (iii) **Component 3:** Capacity building and knowledge management system for implementing the EBA and the EAF, and for the dissemination of project's lessons learned, targeting government officials, academia, local communities and other stakeholders.
- (iv) **Component 4:** Management policies, regulations and measures promoting the resiliency of coastal ecosystems and local communities to climate change and variability-induced stress.

2 Screening of AF's environmental and social principles

The AF's environmental and social principles (ESP) applicable to the project (Table 01) are the following:

- Compliance with the Law
- Access and equity
- Marginalized and vulnerable groups
- Human rights
- Gender equity and women's empowerment
- Core labour rights
- Involuntary resettlement
- Protection of natural habitats
- Conservation of biological diversity
- Climate change
- Pollution prevention and resource efficiency
- Physical and cultural heritage

A description of the compliance with the outcomes of these principles is presented in section 5 of this document.

Table 01. Adaptation Fund's applicable ESP

ESP	Project components			
	Component 1	Component 2	Component 3	Component 4
Compliance with the Law	X	X	X	X
Access and equity	X	X	X	X
Marginalized and vulnerable groups	X	X	X	X
Human rights	X	X	X	X
Gender equity and women's empowerment	X	X	X	X
Core labour rights	X			
Indigenous Peoples				
Involuntary resettlement	X			
Protection of natural habitats	X	X	X	X
Conservation of biological diversity	X	X	X	X
Climate change	X	X	X	X
Pollution prevention and resource efficiency	X	X	X	X
Public health				
Physical and cultural heritage	X	X	X	X
Lands and soil conservation				

3 Environmental and Social Impact Assessment

The purpose of this section is to identify and assess the potential environmental and social impacts and risks that could occur during the project's implementation.

Identification of impacts and risks was carried out for each of the project outputs, considering the 12 ESP applicable to the project (See Table 02). More details of the methodology used in this stage can be found in the environmental and social assessment documents annexed to the project.

As a result of this analysis, potential minor environmental and social impacts and risks associated to the implementation of some activities under Component 1 and 2 are identified. Implementation of outputs 1.1.1 (replacement of environmentally friendly fishing gears), 1.2.1 (planning and development of sustainable aquaculture through small-scale concessions), 1.2.2 (creation of ecotourism enterprises) and 2.1.1 (Development of a climatic and an oceanographic surveillance system), could affect

marine biodiversity and water quality if they are not adequately managed. Moreover, possible minor social risks within fishermen communities could be generated mainly by the implementation of adaptation activities under component 1.

In that sense, the following ESP are triggered to the project:

- Access and equity;
- Core labour rights;
- Involuntary resettlement;
- Conservation of biological diversity, and
- Pollution prevention and resource efficiency.

The only activity that will need a further environmental impact assessment approved by GoP during the project's implementation, is the development of sustainable aquaculture through small-scale concessions (output 1.2.1). According to national legislation (Law of Promotion and Development of Aquaculture – Law N° 27460 and its regulation Supreme Decree N° 030-2001-PE), activities related to extensive aquaculture are considered as minor scale with low environmental impact. Therefore, an environmental impact statement (DIA by its acronym in Spanish) is required to be submitted to the Regional Direction of Production (DIREPRO) for approval.

The Law of the National System of Environmental Impact Assessment (SEIA, by its acronym in Spanish) establishes that projects whose implementation does not cause significant negative environmental impacts requires a DIA. This document consists in the description of the environmental effects of the proposed actions. Upon the evaluation of the DIA, the DIREPRO issues an Environmental Certification, which along other requirements to be approved by the DICAPI, enables the start of the activity.

It is important to note that the SEIA states that public institutions implementing projects for themselves or dependent bodies, are required to obtain an environmental certification at the sectoral authority that is competent. In that sense, although PRODUCE is the executing entity of the project, they are also required to obtain the environmental certification issued by DIREPRO.

A proposal for the management of the environmental and social impacts and risks identified is presented in section 4 of this document.

Table 02. Identification of potential environmental and social impacts and risks

AF ESP	Component 1		Component 2	
	Output	Impact / Risk (L = low, M = medium, H = high)	Output	Impact / Risk (L = low, M = medium, H = high)
Access and equity	<p>Output 1.1.1. Adoption of sustainable fishing methods to tackle non-selective fishing gear based on EAF principles directed to target species vulnerable to climate change</p> <p>Output 1.1.2. Restoration and co-management of natural banks</p> <p>Output 1.2.1. Planning and development of sustainable aquaculture through small-scale concessions</p> <p>Output 1.2.2. Creation of ecotourism enterprises</p> <p>Output 1.2.5. Production of bio-fertilizers from fishery and aquaculture residues</p>	<p>(1) Reduction of artisanal fishermen family income (L)¹</p> <p>(2) Resistance from specific artisanal fisheries or groups within those areas to the proposed measures (M)</p> <p>(3) Beneficiaries not adequately trained in environmental concepts and sustainable practices (L)²</p> <p>(4) Conflicting interests among stakeholders regarding the rights and access to the use of natural resources (M)²</p> <p>(5) Few or lack of coordination instances for the key stakeholders involved</p>		

¹ Risk associated only to output 1.1.1

² This risk includes the possible conflicts of interest that could be generated for the administration of the experiential tuna fishing activity proposed in the Mancora pilot area

AF ESP	Component 1		Component 2	
	Output	Impact / Risk (L = low, M = medium, H = high)	Output	Impact / Risk (L = low, M = medium, H = high)
		does not ensure the adequate prioritization of project activities (L) ³		
Core labour rights	<p>Output 1.1.1. Adoption of sustainable fishing methods to tackle non-selective fishing gear based on EAF principles directed to target species vulnerable to climate change</p> <p>Output 1.1.2. Restoration and co-management of natural banks</p> <p>Output 1.2.1. Planning and development of sustainable aquaculture through small-scale concessions</p> <p>Output 1.2.2. Creation of ecotourism enterprises</p> <p>Output 1.2.5. Production of bio-fertilizers from fishery and aquaculture residues</p>	(1) Children working on adaptation activities proposed in the pilot sites (L)		
Involuntary resettlement	Output 1.1.2. Restoration and co-management of natural banks	(1) Restriction of fisheries resources use due to		

³ This risk could occur during the activities' implementation of the 4 project's components

AF ESP	Component 1		Component 2	
	Output	Impact / Risk (L = low, M = medium, H = high)	Output	Impact / Risk (L = low, M = medium, H = high)
	Output 1.2.1. Planning and development of sustainable aquaculture through small-scale concessions	aquaculture activities (L)		
Conservation of biological diversity	Output 1.1.1. Adoption of sustainable fishing methods to tackle non-selective fishing gear based on EAF principles directed to target species vulnerable to climate change	(1) Mortality of marine vertebrates (mainly birds and sea turtles) by incidental capture in new fishing gears (L) (2) Incidental capture of juvenile tuna fishes or use of juvenile anchovies as baits due to tuna fishing pilots with pole and line and hand-line (L)		
	Output 1.2.1. Planning and development of sustainable aquaculture through small-scale concessions	(3) Change in the benthic species composition due to aquaculture infrastructure installation (bottom pens) (L)		
	Output 1.2.2. Creation of ecotourism enterprises	(4) Marine vertebrates displacement or		

AF ESP	Component 1		Component 2	
	Output	Impact / Risk (L = low, M = medium, H = high)	Output	Impact / Risk (L = low, M = medium, H = high)
		habitat abandonment (mammals, birds and turtles) due to vessels' sound and human presence where sightings are held (L)		
Pollution prevention and resource efficiency	Output 1.2.1. Planning and development of sustainable aquaculture through small-scale concessions	(1) Seawater pollution by solid and oily waste generation from aquaculture activities (L)	Output 2.1.1. Development of a climatic and an oceanographic surveillance system	(1) Generation of solid waste due to installation of weather stations in guano islands (L) ⁴
	Output 1.2.2. Creation of ecotourism enterprises	(2) Seawater pollution by solid and oily waste generation from ecotourism activities (L)		

⁴ This impact poses no risk, since it will be timely and momentary.

3.1 Categorization

The project execution may generate few and minor potential environmental and social impacts and risks that should be reversible and easy to avoid or mitigate. Therefore, the project is categorized as **Category B**.

4 Environmental and social management plan

This plan consists of two programs that will be implemented during project execution:

- (i) Environmental prevention and mitigation program, in which specific measures are established to prevent, correct and/or mitigate adverse environmental impacts and risks. This program includes the grievance mechanism for the project.
- (ii) Monitoring, assessment and oversight program, in which the implementation arrangements for monitoring and evaluation (M&E) of the compliance with mitigation measures and grievance mechanism is defined.

The development of these two programs is presented below:

4.1 Environmental and social prevention and mitigation program

Specific measures to prevent, correct and/or mitigate adverse environmental and social impacts and risks are presented in Table 03.

In case that unanticipated adverse environmental impacts and risks are identified during project implementation, mitigation measures will be designed and incorporated in the ESMP for M&E.

Furthermore, during the elaboration of the Annual Operating Plans (AOP), the PCT will identify the potential environmental and social risks of each of the planned activities for the year and will program the mitigation measure. This will contribute to identify impacts and risks unforeseen during the project design.

4.1.1 Grievance mechanism

Participatory spaces will be generated to develop consensus forms for negotiating where complaints and local demands (social, environmental or any other issue related to the Project) are processed. For example, through the conformation of “dialogue tables”, rounds of negotiations and other that have an authorized representation by competent bodies and local organizations.

Furthermore, Profonanpe’s website have an online form that allows users to make suggestions, queries, information requests and complaints (<http://www.profonanpe.org.pe/index.php/es/buzon-de-sugerencias>). This form is sent to the Administration and Finance Director and the Development and Supervision Director, who have the responsibility to reply when applicable, within 8 business days. This procedure will be informed to the Project stakeholders at the beginning and during the execution, specifically at workshops and meetings scheduled in the Project. Additionally, is important to mention that Profonanpe’s Direction of Development and Supervision will be in charge of overseeing the ESMP implementation.

On the other hand, a “Manual of Social and Environmental Safeguards Implementation” will be developed at the beginning of the Project. In this document, a detailed description of the process for resolving complaints, which include mechanisms for permanent information to beneficiaries, will be developed.

4.2 Monitoring, evaluation and oversight program

A proposal of protocol for M&E of the compliance with mitigation measures (safeguards) during project implementation was developed in each environmental and social assessment documents (both annexed to the project). These protocols contain specific indicators, means of verification and responsible for the implementation.

However, at the beginning of the project, a “Manual of Social and Environmental Safeguards Implementation” will be developed in order to validate the proposed protocols with the main stakeholders involved in the project’s implementation. Furthermore, a training workshop aimed to the PCT (project and local coordinators) will be carried out for the implementation of this manual. Profonanpe will give technical support for the manual elaboration and the training workshop.

4.2.1 Operational and financial arrangements

The main responsibilities of the key stakeholders involved in the project’s implementation for management of environmental and social impacts and risks are the following:

Project Coordination Team (PCT)

- Elaborate the “Manual of Social and Environmental Safeguards Implementation” and carry out the training workshop in coordination with Profonanpe and the Technical Secretary (if necessary). The responsible of these tasks will be the Project Coordinator (PC). However, consultants specialized in environmental and social safeguards will be hired to support the PC.
- Implement the ESMP. Local coordinators will be responsible for implementing ESMP in the field. They will report to the PC, who will in turn send a report every six months to Profonanpe about ESMP implementation.
- Undertake quarterly meetings with Profonanpe for monitoring of implementation progress.

Technical Secretary (TA)

- Receive semiannually project management reports, including safeguards compliance and give technical support to the PCT in the ESMP implementation.

Project Steering Committee (PSC)

- Receive semiannually project management reports, including safeguards compliance.
- Provide high-level technical and managerial guidance to the PCT.

Profonanpe

- Give technical support to the PCT for the elaboration of the “Manual of Social and Environmental Safeguards Implementation”, as well as for the execution of the training workshop for its application.
- Give no-objection to the terms of reference and final product regarding environmental consultancy for the DIA formulation (aquaculture concessions).

- Oversee the implementation of ESMP. Profonanpe will conduct at least two supervisions annually, in order to verify the implementation of the ESMP.
- Send the supervision reports to the PC with the recommendations or corrective actions to be implemented by the PCT.
- Undertake quarterly meetings with the PC for monitoring of implementation progress.
- Receive and review the reports of ESMP implementation sent by the PC and submit them semiannually to the AF.

The budget necessary for the formulation of DIA (aquaculture concessions) and ESMP implementation are included in each activity cost (section G of the project). Table 04 shows the section of the project where budget is included.

Table 03. Mitigation measures for management of environmental and social impacts and risks

ESP	Environmental or social risk	Mitigation measure
Access and equity	Resistance from specific artisanal fisheries or groups within those areas to the proposed measures	<ul style="list-style-type: none"> (i) Support the marketing of fishing products: The project will work with the wives of fishermen in activities of selection, handling and preparation of artisanal fisheries products, in order to canalize them to direct consumer market through weekly and / or daily fairs of fishing products, promoted by PRODUCE, local and regional governments. This means working previously in coordinated action and establishing agreements for cooperation between the stakeholders involved: fishermen, PRODUCE, local and regional governments (ii) Stage workshops and training programs for community leaders and civil authorities to raise awareness of important local issues related to climate change and adaptation (iii) Work through local associations to promote dialogue and build trust among stakeholders, as well as facilitate the incorporation of lessons learned and replication in specific geographical areas (iv) Ensure visibility of climate adaptation strategies and economic benefits in the eyes of all beneficiaries, through workshops, training, field visits (v) Provide technical assistance to the key stakeholders of the project for formalization and certification of artisanal fisheries (vi) Promote women participation in aquaculture, ecotourism and bio-fertilizers production (vii) Develop periodic meetings to report on progress, especially oriented to women leaders and / or boards of women social organizations

ESP	Environmental or social risk	Mitigation measure
		(viii) Promote education of children by NGOs and regional governments, in order to support working women in fisheries activities
	Beneficiaries not adequately trained in environmental concepts and sustainable practices	(i) Train and increase awareness and knowledge of beneficiaries via workshops and community education
	Conflicting interests among stakeholders regarding the rights and access to the use of natural resources	(i) Two working groups (one for each pilot area in the project) will work towards promoting dialogue and building trust among key stakeholders to assure equity conditions and promote auto-regulation through co-management strategies (i) Design and implement a sustained information program prior to project initiation targeted to fishermen communities involved in the project (ii) Implement an administration institutional arrangement with defined responsibilities to provide social and economic sustainability to the experiential tuna fishing activity in the Máncora pilot site. Institutionalize the arrangement through an act or agreement.
	Few or lack of coordination instances for the key stakeholders involved does not ensure the adequate prioritization of project activities	(i) Ensure the participation and consultation of key stakeholders and decision makers via workshops and meetings during the project preparation, introduction, implementation and evaluation phases (ii) Implement a strategy among regional and local governments, IMARPE, PRODUCE and representative fishermen organizations, to inform, validate and execute the actions provided by the project in a participatory way
	Reduction of artisanal fishermen family income due to adoption of new fishing gears	(i) Cover the cost of pilot sustainable fishing gears (ii) Reduce the commercial intermediation of marine products coming from the adoption of new fishing practices, by supporting the marketing of fishing products through weekly

ESP	Environmental or social risk	Mitigation measure
		and / or daily fairs of fishing products, promoted by PRODUCE, local and regional governments (i) Training and increase of awareness for the fishermen aiming towards the adoption of the new fishing practices and species sustainability
Core labour rights	Children working on adaptation activities proposed in the pilot sites	(i) In case of occurrence, report the case to the DEMUNA (Office of Advocacy for Children and Adolescents)
Involuntary resettlement	Restriction of fisheries resources use due to co-management of benthic natural banks and aquaculture activities	(i) With fishermen affected by restriction of use of natural resources, compensation measures will be implemented, such as: (a) registration and quantification of affected people, (b) develop income-generating initiatives with registered, such as bio-fertilizers production, ecotourism, etc., and (c) implement a training plan for income generation initiatives
Conservation of biological diversity	Mortality of marine vertebrates (mainly birds and sea turtles) by incidental capture in new fishing gears	(i) Establish an on board monitoring program to track bycatch of marine vertebrates (mammals, birds and turtles), which will contribute to provide recommendations to reduce bycatch of species and their associated mortality and improve fishing practices (ii) Train artisanal fishermen in recovery techniques, rehabilitation and release of bycatch species
	Incidental capture of juvenile tuna fishes or use of juvenile anchovies as baits due to tuna fishing pilots with pole and line and hand-line	(i) Release the juvenile individuals caught (ii) Verify that the anchovies used as bait are within the official size
	Change in the benthic species composition due to aquaculture infrastructure installation (bottom pens)	(i) Develop research aiming to generate information on the impact of aquaculture on benthic species and implement recommendations
	Marine vertebrates displacement or habitat abandonment (mammals, birds and turtles) due to vessels' sound and human presence where sightings are held	(i) Develop good practices codes of conduct for marine wildlife watching, to be implemented by conformed ecotourism enterprises

ESP	Environmental or social risk	Mitigation measure
		<ul style="list-style-type: none"> (ii) Subscribe agreements or commitments with beneficiaries to comply with watching best practices (iii) Develop training modules for beneficiaries on ecotourism best practices (iv) Ensure compliance with legal standards related to tourism operation (v) Oversee the adequate development of ecotourism operation
Pollution prevention and resource efficiency	Seawater pollution by solid and oily waste generation from aquaculture activities	<ul style="list-style-type: none"> (i) Elaborate the Environmental Impact Statement (DIA) requested by the competent authority (Production Regional Direction)⁵ (ii) Develop and implement a solid and oil wastes management plan, which must be part of the fishing area or the concession's management plan (iii) Conduct periodic revisions of boat engines to avoid oils or lubricants spills, which must be part of the fishing area or concession's management plan (iv) Consider training modules on solid and oil wastes management and good aquaculture practices, within component 3 regarding capacity building (v) Oversee the appropriate development of aquaculture
	Seawater pollution by solid and oily waste generation from ecotourism activities	<ul style="list-style-type: none"> (i) Develop and implement a solid and oily waste management plan from ecotourism activities (ii) Conduct periodic revisions of boat engines to avoid oils or lubricants spills (iii) Develop training modules for beneficiaries on solid and oily waste management
	Generation of solid waste due to installation of weather stations in guano islands	<ul style="list-style-type: none"> (i) Evacuate all solid waste generated outside the natural protected area (Don Martin islet)

⁵ Mitigation measures established in this document (DIA) should be incorporated in the ESMP for M&E.

Table 04. Budget for safeguard's implementation

Activity	Section of the project where budget is included
Elaboration and approval of the manual of environmental and social safeguards implementation	Project execution costs (M&E)
Training workshop aimed to PC and local coordinators	Project execution costs (M&E)
Formulation of DIA for aquaculture concessions	Component 1 (output 1.2.1)
Implementation of the ESMP by PCT	Included in all project's activities (section G) and project execution costs (M&E)
Oversight of ESMP implementation by Profonanpe	Project cycle management fee (section G)

4.2.2 Implementation schedule

The schedule for the implementation of the ESMP is presented in Table 05.

Table 05. Implementation schedule for ESMP

Activity	Year 1				Year 2				Year 3				Year 4			
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Elaboration and approval of the manual of environmental and social safeguards implementation	■	■														
Training workshop aimed to PC and local coordinators		■														
Formulation of DIA for aquaculture concessions				■												
Implementation of the ESMP by PCT	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■	■
Oversight of the ESMP implementation		■		■		■		■		■		■		■		■
Reporting of ESMP implementation		■		■		■		■		■		■		■		■

5 Description of the compliance with the AF' environmental and social principles

A brief overview of the project compliance with the expected outcomes of the 15 ESP is presented below:

5.1.1 Compliance with the Law

The design and formulation of the project has taken as reference the law of Peru, both from the environmental sector (Law of SEIA – Law N° N° 27446 and its regulation Supreme Decree N° 019-2009-MINAM) as from the fishery sector (General Law of Fisheries – Decree Law N° 25977 and its regulation – Supreme Decree N° 012-2001-PRODUCE; Law of Promotion and Development of Aquaculture – Law N° 27460). The project will comply with obtaining all permits requested by the sectorial authorities for the development of the proposed activities.

5.1.2 Access and equity

The project ensures fairness in the selection process of the direct beneficiaries. Moreover, it plans to implement a "positive discrimination" to ensure access to the active participation of women in the capacity building and decision making processes. To ensure their participation in these processes, the calls for meetings and / or workshops will be made with due notice and consultation about their time availability will be made in terms of dates and schedules⁶.

Furthermore, the project will develop periodic meetings to report on progress, especially oriented to women leaders and / or boards of women social organizations.

The project promotes equal access to the benefits thereof, in particular through the participation of artisanal fishermen (main beneficiaries) in the following activities:

- Adoption of sustainable fishing methods.
- Restoration and co-management of natural banks.
- Sustainable aquaculture through small-scale concessions.
- Creation of ecotourism enterprises.
- Production of bio-fertilizers from fishery and aquaculture residues.
- Access to the benefits of ocean climate information to be generated through implementation of component 2.
- Training and sensitizing on key topics such as formalization, entrepreneurship, normative, fishing gear and fishing surveillance and control.
- Design and implementation of early warning systems.
- Social equity seeks to promote a process of advocacy to improve governance including participation of artisanal fishermen and women social organizations in the sector.

However, potential social risks have been identified by the implementation of adaptation activities mainly under Component 1. Therefore, a set of mitigation measures to manage these risks have been proposed as part of the ESMP (see section 4.1).

⁶ During participatory workshops held on 22 and 28 August 2015 in Huacho and Mancora, respectively, women reported that the best day for workshops and / or meetings are weekends, always in the evening. This measure allows women to finish their workday, personal hygiene and take daily tasks at home.

5.1.3 Marginalized and Vulnerable Groups

Artisanal fishermen are considered in poor strata of the population. Therefore, they are highly vulnerable to climate change impacts. In addition, the project promotes the participation of women in all profits generated by it.

5.1.4 Human Rights

The project is oriented to expand access of marginalized and vulnerable population to greater human rights, since it promotes food security of these groups and the country as a whole through the strengthening of artisanal fisheries in environmentally and socially sustainable practices.

5.1.5 Gender Equity and Women's Empowerment

The project promotes the participation of women in income diversification activities such as ecotourism, aquaculture and production of bio-fertilizers, promoting the empowerment of women and men alike, to assume the management, organization and social sustainability in the initiatives diversification of family income.

During the participative workshops of the project, the women thoroughly expressed the need of being part of the component related to the strengthen of capacities and decision making, which will allow them to be empowered in subjects specially linked to conservation, adaptation to climate change, business development, strengthening of organizations in the case of Huacho, and associations in the case of Mancora; and other spaces that the project develops.

Therefore, the project will take several measures that facilitate the participation of women in the workshops and/or work terms that are organized as part of the capacity strengthening an decision making subjects, for example, through the paperwork for the installation of the Program CUNAMAS , where the women will be able to obtain a daily caring service for their children up until 3 years old, attention for food and nutrition, caring of children's health, children's learning and work with the families. These measures, added to the other measures described in the title Access and Equity, will allow women to enter these spaces, without neglecting the work under their responsibility at home.

5.1.6 Core Labour Rights

The project is not designed to promote employment under the standards of the International Labor Organization. However, by promoting ecotourism, aquaculture and bio-fertilizers initiatives, definitely it will create jobs for artisanal fishing families (wives of fishermen), under the principle of equal pay for equal work. Therefore, the project will ensure that the associations with which get to implement economic activities are officially registered.

The project will not generate in any way child labor. The project is designed to respect the laws of Peru in relation to child labor, the same that are aligned to international standards for the protection of the rights of children. In the case of artisanal fisheries, work practices exist where children support parent activities in land. These are traditional practices where children basically help with the selection of fishes and some other tasks to support their parents in the market. In no case these practices violate the norms of protection of children and their fundamental rights to health, education and recreation, moreover, these traditional practices allow children to acquire skills and tools that enable them to improve their career opportunities in their future.

The monitoring system of safeguards of the project incorporate, as a measure of prevention of child labor, an item to ensure full compliance with the rights of girls and boys. This monitoring will allow detecting children working in the pilot areas. In case of occurrence, it will be reported to the DEMUNA (Office of Advocacy for Children and Adolescents). This instance has specialized personnel and protocols to fulfill their tasks of promotion, protection and compliance of children rights. They are responsible for reporting this to the Ministry of Labor in order to guarantee children's basic rights to health, education and recreation.

5.1.7 Indigenous Peoples

This principle does not apply to the project, since in both pilot sites, there is no presence of indigenous peoples, as artisanal fishermen are not identified as such.

5.1.8 Involuntary Resettlement

The project will not be implemented on land or population centers. In that sense, it will not generate involuntary resettlement. However, it is likely to restrict the use of resources due to the delimitation to be held for the strict protection of benthic species natural banks as well as the establishment of aquaculture concessions. This restriction may involve a level of conflict between the project beneficiaries and those fishermen who do not participate in the project (social risk). Therefore, a set of mitigation measures to manage these risks have been proposed as part of the ESMP (see section 4.1).

5.1.9 Protection of Natural Habitats

The project will contribute to the protection of marine and coastal habitats within protected areas, as it will promote the restoration of natural banks of benthic species in islet Don Martin and Punta Salinas, which belongs to the Guano Islands, Islets and Capes National Reserve System, in co-management with artisanal fishing communities and authorities to protect these banks. Furthermore, it will support the governance of marine protected areas.

5.1.10 Conservation of Biological Diversity

The project will not cause significant reduction or loss of biological diversity, or introduce exotic species. On the contrary, the proposed activities will contribute to the conservation of marine and coastal biodiversity, since the project will promote the development of sustainable economic activities, as well as policy and management instruments for the conservation and responsible use of marine ecosystems. However, it have been identified minor environmental impacts and risks. Mitigation measures to avoid or mitigate them, are presented in section 4.1 of the ESMP.

For the establishment of aquaculture concessions, the Regional Directions of Production (DIREPRO) requests an environmental impact statement. It is noteworthy that according to the decentralization process of the national government to the regional governments, now the DIREPROs are in charge of approving and delivering environmental impact declarations of minor scale aquaculture concessions. These Directions depend administratively and from a budget point of view, on sub-national governments (Regional Governments). However, they are governed by the legal framework established by PRODUCE. Thus, there will not be a risk of conflict of interest with the project Executing Agency (PRODUCE).

In order to ensure that the AF's Social and Environmental Policies are incorporated in this environmental impact assessment, Profonampe will include this responsibility in the contracts of environmental consultants. Impacts and risks and their mitigation measures arising from this document will be updated and included in the ESMP.

5.1.11 Climate Change

The project will not develop activities that involve a significant increase in emissions of greenhouse gases or other climate change stressors.

5.1.12 Pollution Prevention and Resource Efficiency

Project activities include the development of good practices in the management of solid and oily waste, so the risk of environmental pollution should be avoided. However, potential risks generated by activities such as aquaculture and ecotourism that could affect water quality, have been identified. Therefore, mitigation measures for avoiding this risk are proposed as part of the ESMP (section 4.1).

5.1.13 Public Health

Project activities involve no risk to human health. On the contrary, the promotion of bio-fertilizers, will be made under an efficient use of waste from fishery and aquaculture, which means in practice to implement actions of recycling solid waste pollutants and harmful to health, turning them into products of commercial value.

5.1.14 Physical and Cultural Heritage

There are no cultural heritage in the project's pilot areas. Only some activities are proposed within Guano Islands, Islets and Capes National Reserve System (Huacho pilot area). However, the protected area will not be affected.

5.1.15 Lands and Soil Conservation

Project activities will be conducted mainly in marine ecosystems, therefore there will be no soil degradation or conversion.

6 Consultation

Consultation with national, regional and local stakeholders from both pilot areas (Máncora and Huacho) took place in two periods. The first one was carried out between 2011-2012 and the second one in 2015 in order to update the consultation.

In 2015, the workshops had specific goals as it follows:

- To resolve with precision the participation of the fishermen beneficiaries of the project and the representative organizations of artisanal fisherman that will give full support to the execution of the same.
- To resolve with precision the participation of women beneficiaries of the project and the representative organizations of women that will give full support to the execution of the same.
- To refine in a participative way, the main activities where women can participate and define their participation during the development of the project.
- To resolve the gender indicators and/or goals.

In that sense, the workshop in the pilot zone of Huacho was executed on August 22nd and on August 28th, 2015 in the pilot zone of Mancora. At the Huacho workshop, there was participation of 55 people from the different fishermen and women organizations, civil organizations and institutions. The participation of women reached a total number of 28, while the participation of men was of 27 people.

At the Máncora workshop, participated 38 people from the different fishermen and women organizations, civil organizations and institutions. The participation of women reached a total number of 15, while the participation of men was of 23 people.

Both workshops began with a presentation of the main aspects of the projects, the benefits, the main activities according to the components, the intervention areas, and the beneficiaries of the same. Later, it was opened a space for opinions and valuations regarding the project. During the same, none of the participants gave an opinion against the project. On the opposite in the Mancora zone, a participant claimed “why the delay in the execution, since on the year 2012 we had already participated in a workshop similar to this one and we had the expectation that the project would be in execution since the year 2015”.

After this space, two worktables were conformed, one for the fishermen and other for the attending women, on both it was confirmed the social majority adhesion to the project, after working with closer attention to the activities that will be implemented to reduce the vulnerability facing climate change.

The social organizations of women linked to the marine and coast territory, were informed about each one of the components and activities of the project and during the same they thoroughly stated their acceptance and adhesion. These women, they committed themselves to inform their directive boards and assemblies about the workshop and the decisions taken at it.

Among the possible projects that could be implemented with women we have the companies dedicated to ecotourism, repair of fishing nets, recycling of fishing residuals, craftwork, etc., so that in that way they can diversify their productive offer and can obtain more representation at the decision making spaces.

Also, the definition of activities has allowed the identification of gender indicator for each of them.

Finally, an act of social adhesion was signed, which allows the project an execution with an ample and majority support from the fishermen communities in the pilot zones where it will be implemented. In the zone of Huacho the act was signed by 48 people, from where 27 were women. In the zone of Mancora the act was signed by 33 people, reaching a total of 14 women. The people that have signed the social adhesion act mostly belong to 6 fishermen organizations and 2 women organizations in the pilot zone of Huacho. Also, belong to 5 organizations and/or unions of fishermen and to organizations of women from the Vaso de Leche and Comedores Populares (popular dinners) in the pilot zone of Mancora.