



ADAPTATION FUND

ADAPTATION FUND BOARD SECRETARIAT TECHNICAL REVIEW OF PROJECT/PROGRAMME PROPOSAL

PROJECT/PROGRAMME CATEGORY: Regular-sized Project Concept

Country/Region: Argentina/Latin America and Caribbean

Project Title: Strengthening community resilience of rural populations in the drylands of northwestern Argentina facing climate change, improving access to water and the implementation of sustainable land management practices

Thematic Focal Area: Multisector

Implementing Entity: Development Bank of Latin America (CAF)

Executing Entities: National Directorate of Planning and Environmental Management of the Territory, Ministry of Environment and Sustainable Development of the Nation

AF Project ID:

IE Project ID:

Requested Financing from Adaptation Fund (US Dollars): 10,000,000

Reviewer and contact person: Micol Ullmann Auger

Co-reviewer(s): Patricia Marcos Huidobro

IE Contact Person:

Technical Summary

The project "Strengthening community resilience of rural populations in the drylands of northwestern Argentina facing climate change, improving access to water and the implementation of sustainable land management practices" aims to contribute to the adaptation of rural communities in the drylands of northwestern Argentina, reducing their vulnerability to the impacts of climate change. This will be done through the four components below:

Component 1: Improve access to water and promote Sustainable Land Management Practices (SLMP) in rural populations of the NOA Cuyo to reduce their vulnerability to CC. (USD 4,362,100).

Component 2: Strengthening organizations and rural women and diversities for adaptation to CC (USD 306,637).

Component 3: Financing and added local value (USD 2,625,269).

Component 4: Project management, monitoring, evaluation, and knowledge management (USD 1,110, 367).

	<p>Requested financing overview: Project/Programme Execution Cost: USD 787,734 Total Project/Programme Cost: USD 9,192,105 Implementing Fee: USD 807,893 Financing Requested: USD 10,000,000</p> <p>The initial technical review raises several issues such as the need to carry out a consultative process with project stakeholders, include an initial gender assessment, provide more information on financial sustainability, and reduce the management fee, as is discussed in the number of Clarification Requests (CRs) and Corrective Action Requests (CARs) raised in the review.</p>
Date:	January 24, 2022

Review Criteria	Questions	Comments	RIE Response
Country Eligibility	1. Is the country party to the Kyoto Protocol?	Yes.	N/A
	2. Is the country a developing country particularly vulnerable to the adverse effects of climate change?	Yes. The drylands of north-western Argentina suffer from water deficits, severe seasonal rainfall variability, in addition to high land degradation and poverty levels. Moreover, wind and water erosion and salinization have contributed to desertification problems for 40% of the irrigated land. These challenges are made worse by unsustainable land use practices.	N/A
Project Eligibility	1. Has the designated government authority for the Adaptation Fund endorsed the project/programme?	Yes, as per the endorsement letter dated January 8, 2022.	N/A
	2. Does the length of the proposal amount to no more than Fifty pages for	No. The proposal is 71 pages, including its annexes.	CAR1 Amended. All the Concept Note was revised to adjust the content; some paragraphs and figures were removed to

	<p>the project/programme concept, including its annexes?</p>	<p>CAR1: Please shorten to stay within page limit.</p>	<p>avoid duplicity and reinforcement of some ideas already express which will be used in the full proposal document if necessary; the intervention area maps were synthesized into a single map; Annex 2 (References) has been removed and the references has been include in the main document; Annex 4 (Photography record of MST-NOA Cuyo project), has been removed. Annex 1 Acronyms and Annex 2 (former annex 3) of ToC were maintain.</p> <p>The complete Concept Note of the Project is in 47 pages and the two annexes are 3 additional pages. This leaves the CN in 50 pages.</p>
	<p>3. Does the project / programme support concrete adaptation actions to assist the country in addressing adaptive capacity to the adverse effects of climate change and build in climate resilience?</p>	<p>Yes. The project supports concrete adaptation activities in the drylands of the Northwest and Cuyo of Argentina, to reduce the rural communities' vulnerability to climate change impacts and strengthening their community resilience.</p> <p>Project activities focus on sustainable land management practices, including climate smart agriculture, improved water management and access, and local capacity development to be financed by a locally managed revolving fund and microcredit loans.</p>	<p>N/A</p>

		The proposal includes a detailed theory of change (annex 3).	
	4. Does the project / programme provide economic, social and environmental benefits, particularly to vulnerable communities, including gender considerations, while avoiding or mitigating negative impacts, in compliance with the Environmental and Social Policy and Gender Policy of the Fund?	<p>Yes. The rural population of project area is approximately 350,000 people and includes the poorest in the region with subsistence living standards.</p> <p>The project will focus on building local capacity and knowledge on sustainable land management practices, including climate smart agriculture, increased food security, and access to and management of scarce water resources. Special attention will be paid to rural women and vulnerable groups.</p>	N/A
	5. Is the project / programme cost effective?	<p>Yes. The proposal provides a logical explanation of the selected scope and approach and demonstrates cost effectiveness from a sustainability point of view, as outlined on pg. 28.</p> <p>The investment proposed is equivalent to two years of the country's current policy of compensation for emergencies and agricultural disasters in the region, which establishes a fixed annual fund of 500 million pesos, currently equivalent to 4.7 million US\$, intended to compensate affected producers in delimited areas throughout the country, and to</p>	N/A

		rebuild damaged infrastructure without addressing the lack of adaptive capacity. Instead, the project proposes to build capacity, knowledge, and material investments to reduce vulnerability to climate change of the most vulnerable communities.	
	6. Is the project / programme consistent with national or sub-national sustainable development strategies, national or sub-national development plans, poverty reduction strategies, national communications and adaptation programs of action and other relevant instruments?	<p>Yes, as outlined on pg. 28, the project is aligned with Law No. 27,520 on Minimum Budgets for Adaptation and Mitigation to Global Climate Change (Climate Change Law) and its Regulatory Decree No. 1030/202039, three National Communications; three Biennial Update Reports; two Nationally Determined Communications (NDC), and the National Adaptation Plan and Climate Change Mitigation (RESOL- 2019-447-APN-SGAYDS # SGP) which is in the process of being updated.</p> <p>In the case of the NDCs, the sectorial plans and the National Climate Change Adaptation Plan have served to contextualize the strategic lines of the project.</p>	N/A
	7. Does the project / programme meet the relevant national technical standards, where applicable, in compliance with the Environmental	Not clear. Further details should be provided. As outlined on pg. 30, and in the 'Compliance with the Law' section of the risks table on pg. 35, the project commits to meeting all relevant national standards, including the General	CR1. Table "NATIONAL LEGISLATION IN WHICH THE PROJECT IS FRAMEWORKED" and "PROVINCIAL LEGISLATION APPLICABLE TO THE PROJECT" have been included which synthesizes relevant national and provincial specific legislation applicable in which the project is frameworked. Relevant technical

	<p>and Social Policy of the Fund?</p>	<p>Environmental Law of the Nation No. 25,675, and will be implemented by the national agencies and their provincial counterparts, authorities in charge of compliance with national laws and standards and provinces in terms of production, environmental protection, regulatory frameworks on climate change, with a focus on the processes of poverty reduction and social inclusion, pillars of the National Government scheme.</p> <p>However, it is necessary to identify the relevant sector-specific national technical standards.</p> <p>CR1: Please identify the relevant national technical standards, including environmental impact assessments, land use or tenure regulations, water quality regulations, and any other sector-specific regulations.</p>	<p>national and provincial standards are included in this legislation.</p>
	<p>8. Is there duplication of project / programme with other funding sources?</p>	<p>Unclear. The proposal notes that the project's design and activities are based on lessons learned and antecedents in the activities carried out by various institutions such as INTA and IADIZA and by a series of previously executed projects such as LADA and the UNDP Arg / 14 / G / 55 project.</p>	<p>CR2. The MAyDS programs and initiatives already implementing in the intervention sites have been included.</p> <p>A table that shows complements/synergize/reinforces between projects was added.</p> <p>The consultative process, which is propose to be completed and reinforcement at full proposal stage, will</p>

		<p>The proposal mentions that the project will complement the Inclusive Rural Development Program (ProDERI), as well as two projects already executed with financing from the Adaptation Fund in the Argentine Republic, the “Increasing climate resilience and enhancing sustainable land management in the southwest of the Buenos Aires province” (2013-2017) and “Adaptation and resilience of family farming in Northeast Argentina (NEA) to the impact of climate change and its variability” (2013-2017).</p> <p>However, the proposal also references “other initiatives are being implemented in the project intervention area both from the MAYDS and from other areas of the national and provincial government” but does not identify them.</p> <p>CR2: Please list all other potentially overlapping initiatives being implemented in the project intervention area, and outline linkages and synergies with all relevant potentially overlapping projects / programmes.</p>	<p>be the moment for highlight other possible initiatives implementing by others stakeholders in the territory.</p>
	<p>9. Does the project / programme have a learning and knowledge</p>	<p>Yes. Component 4-Project management, monitoring, evaluation and knowledge</p>	<p>CR3: It is propose to create a <i>Regional Knowledge Sharing Adaptive Platform</i>, which will have at least the following</p>

	<p>management component to capture and feedback lessons?</p>	<p>management is the project's learning and knowledge management component and includes plans supporting community dialogue on lessons learned during project implementation, and for a systematization of local, traditional, and ancestral knowledge, as part of the community-based adaptation approach. This component also includes development of "guides and protocols of best practices" to disseminate to the target population.</p> <p>CR3: Please ensure that the KM approach includes an overview of existing lessons and best practice that inform the project concept; plans to learn from relevant projects, programs, initiatives & evaluations; and an indication of the processes to capture, access, and document information, including possible knowledge platforms and websites which can be routinely updated throughout and after project implementation.</p> <p>Component 4 has an estimated budget of USD 1,110,367, which accounts for 11 percent of the total project costs.</p>	<p>content: best SLMPs inform; plans to learn from relevant projects, programs, initiatives & evaluations and the processes to capture, access, and document information, which can be routinely update throughout and after project implementation.</p> <p>CAR2. Component 4 is rename as "<i>Knowledge management and project sustainability</i>". In this new format, the project management, monitoring and evaluation actions have been removed taking into account that these actions are include in the PMC.</p>
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		CAR2: Please consider dedicating component 4 exclusively to the knowledge component, as project management, monitoring and evaluation are generally covered under project execution and the management fee costs.	
	10. Has a consultative process taken place, and has it involved all key stakeholders, and vulnerable groups, including gender considerations in compliance with the Environmental and Social Policy and Gender Policy of the Fund?	<p>No. The concept is based on extensive participatory and consultation processes carried out within the framework of national planning of policies for adaptation to climate change.</p> <p>Regarding the consultation of the most vulnerable groups to the impacts of climate change present in the selected territories; the proposal is based on the results obtained in the implementation of the Project "Sustainable Land Management in the Dry Zones of the Argentine Northwest" - MST NOA-Cuyo (UNDP ARG 14 / G55).</p> <p>CAR3: Please carry out an initial consultative process with key stakeholders of the project/programme, including gender considerations.</p>	<p>CAR3:</p> <p>Paragraphs 48 to 51 were included to reinforce the Bae Line scenario of the project.</p> <p>More relevant information of the communities of the MST NOA CUYO beneficiaries and their main concerns and demands in which this project is built on, is added in order to support this proposal (paragraphs 134 and 137).</p> <p>The consultative process is proposed to be completed and reinforcement at full proposal stage.</p>
	11. Is the requested financing justified on the basis of full cost of adaptation reasoning?	Yes.	N/A

	12. Is the project / program aligned with AF's results framework?	Yes , as outlined on pgs. 44-48.	N/A
	13. Has the sustainability of the project/programme outcomes been taken into account when designing the project?	<p>Yes, but more information is needed regarding financial sustainability.</p> <p>The project's community's capacity building in SLM practices, its participatory and focuses on women's' engagement. This will strengthen local ownership of project activities, enabling sustainability of project activities.</p> <p>Moreover, since the proposal has been developed within the framework of the national climate change strategies in conjunction with those of LDDD, the project's implementation and institutional sustainability are directly linked to the commitments assumed by the country versus UNFCCC and UNCCD.</p> <p>It would be useful to understand how local banks will be engaged. Who will be managing the proposed Revolving Fund (RF) during and after the project? Does the project anticipate the use of any additional financial mechanisms (in addition to the microcredits from the RF)? If so, which ones and who will be developing them?</p>	<p>CR4: New information of Revolving Fund was added in paragraphs number 72 and 73 for better understanding of this solidarity finance mechanism which doesn't involve banks and in which there is extensive application experience in Argentina.</p> <p>The project does not anticipate the use of any additional financial mechanisms at this stage.</p>

		<p>CR4: Kindly consider the questions outlined above to provide more details on financial sustainability.</p>	
	<p>14. Does the project / programme provide an overview of environmental and social impacts / risks identified, in compliance with the Environmental and Social Policy and Gender Policy of the Fund?</p>	<p>Yes, as outlined in the checklist of impacts and risks identified against each of the 15 ESP principles on pgs. 35-38, and in the Background and context section, which outlines the social, economic, and environmental context of intervention areas of the project.</p> <p>The proposal has classified the project as a category B.</p> <p>However, while the proposal briefly outlines the gender-specific cultural and/or legal context on pg. 20, it does not include an initial gender assessment. This is particularly relevant considering that the gender and diversities perspective will be central to the project, particularly component 2- Strengthening organizations and rural women and diversities for adaptation to climate change.</p> <p>Regarding the risk mitigation, disposal of PV panels is a key environmental aspect which should be considered if PV panels are to be installed as part of the project.</p>	<p>CAR4: An initial gender analysis based on existing data (national statistics, academic field research and evaluation of participation in projects similar or earlier as the MST NOA Cuyo), is incorporated in paragraphs 82 to 85.</p> <p>It is proposed to elaborate a complete Gender Assessment for rural an indigenous women of the NOA of Argentina at full proposal stage in a multisectoral and multi-actor way in the space of the National Climate Change Cabinet.</p> <p>CR5: We appreciate the contribution to take into account the risks associated with the disposal of PV panels used in the small water works.</p> <p>As Implementing Entity, CAF has experience on this issue in other previous project and will use it as lessons learned in this project. The disposal of PV panels will be taking into account for Full Proposal stage.</p>

		<p>CAR4: Please include an initial gender assessment in compliance with the Environmental and Social Policy and Gender Policy of the Adaptation Fund.</p> <p>CR5: Kindly consider the risks associated with the disposal of PV panels used in the small water works.</p>	
Resource Availability	1. Is the requested project / programme funding within the cap of the country?	Yes.	N/A
	2. Is the Implementing Entity Management Fee at or below 8.5 per cent of the total project/programme budget before the fee?	<p>No. The implementing entity management fee (USD 807,893) is more than 8.5 percent of the total project budget before the fee (USD 9,192,107).</p> <p>CAR5: Please review the project financing to ensure that the implementing entity management fee is below 8.5% of the total budget before the fee.</p>	<p>CAR5: Amended. Now the implementing entity management fee is 8.03% of the total budget before the fee.</p> <p>In addition, the entire budget was revised and it was decided to adjust the implementation time of the project to 5 years. This allows reducing administrative costs and maximizing investment in the planned activities to achieve the proposed objectives.</p>
	3. Are the Project/Programme Execution Costs at or below 9.5 per cent of the total project/programme budget (including the fee)?	<p>Yes.</p> <p>The total project cost presents discrepancies (USD 9,192,105, rather than the correct USD 9,192,107)</p> <p>CAR6: Please correct the total project cost amount.</p>	CAR6: Amended.

Eligibility of IE	1. Is the project/programme submitted through an eligible Implementing Entity that has been accredited by the Board?	Yes , CAF is an accredited implementing entity of the Board.	
Implementation Arrangements	1. Is there adequate arrangement for project / programme management, in compliance with the Gender Policy of the Fund?	n/a at concept stage	
	2. Are there measures for financial and project/programme risk management?	n/a at concept stage	
	3. Are there measures in place for the management of for environmental and social risks, in line with the Environmental and Social Policy and Gender Policy of the Fund?	n/a at concept stage	
	4. Is a budget on the Implementing Entity Management Fee use included?	n/a at concept stage	
	5. Is an explanation and a breakdown of the execution costs included?	n/a at concept stage	
	6. Is a detailed budget including budget notes included?	n/a at concept stage	
	7. Are arrangements for monitoring and evaluation clearly defined, including	n/a at concept stage	

	budgeted M&E plans and sex-disaggregated data, targets and indicators, in compliance with the Gender Policy of the Fund?		
	8. Does the M&E Framework include a break-down of how implementing entity IE fees will be utilized in the supervision of the M&E function?	n/a at concept stage	
	9. Does the project/programme's results framework align with the AF's results framework? Does it include at least one core outcome indicator from the Fund's results framework?	n/a at concept stage	
	10. Is a disbursement schedule with time-bound milestones included?	n/a at concept stage	



ADAPTATION FUND

REQUEST FOR PROJECT FUNDING FROM THE ADAPTATION FUND

The annexed form should be completed and transmitted to the Adaptation Fund Board Secretariat by email or fax.

Please type in the responses using the template provided. The instructions attached to the form provide guidance to filling out the template.

Please note that a project must be fully prepared (i.e., fully appraised for feasibility) when the request is submitted. The final project document resulting from the appraisal process should be attached to this request for funding.

Complete documentation should be sent to:

The Adaptation Fund Board Secretariat 1818 H Street NW
MSN N7-700
Washington, D.C., 20433 U.S.A
Fax: +1 (202) 522-3240/5
Email: afbsec@adaptation-fund.org



Annex 5 to OPG Amended in October 2017

DATE OF RECEIPT:
ADAPTATION FUND PROJECT ID:
(For Adaptation Fund Board
Secretariat Use Only)

PROJECT PROPOSAL TO THE ADAPTATION FUND

PART I: PROJECT INFORMATION

Project Category: Full Size-Project

Country: Argentine Republic

Title of Project: Strengthening community resilience of rural populations in the drylands of northwestern Argentina facing climate change, improving access to water and the implementation of sustainable land management practices

Type of Implementing Entity: Regional Implementing Entity

Implementing Entity: CAF- Andean Development Corporation- Development Bank of Latin America

Executing Entity: National Directorate of Planning and Environmental Management of the Territory, Ministry of Environment and Sustainable Development of the Nation

Amount of Financing Requested: USD 10.000.000 (Ten millions dollars)

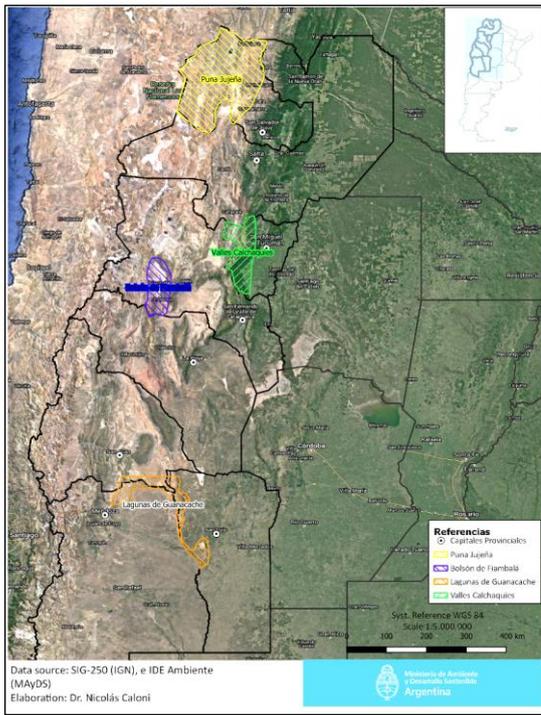
Project Background and Context:

1. General social, economic and environmental context

1. Argentina is a country with a large territorial extension, with a topographic, temperature and precipitation gradient that determines highly varied climatic characteristics. Within this heterogeneity, which gives rise to 18 natural regions or ecoregions, 70 per cent of the territory corresponds to drylands.
2. The arid diagonal crosses the Argentine territory from the Northwest to the Southeast, and there are five ecoregions found in these drylands: Puna, Monte de Sierras and Bolsones, Monte de Llanuras and Mesetas, Chaco Seco and Estepa Patagónica.
3. These ecoregions are particularly vulnerable to land degradation processes (mainly wind and water erosion) and to various impacts of climate change such as: the retreat of glaciers and permafrost with the consequent decrease in river flows; water erosion due to the increase in intensity and frequency of torrential rains; the shifting of vegetative floors due to changes in the ecological niches of the species; the lower efficiency in the use of water; the increase in desertification processes and the frequency of fires due to the greater amount of biomass accumulation and the increase in the probability of landslides and landslides due to the destabilization of the soil due to changes in the cycles of freezing and thawing of the soil; among others.

4. This project aims to work in specific areas of 3 of these 5 ecoregions, where there is greater social vulnerability to the impacts of climate change. These areas and ecoregions are: Puna Jujena (Puna), Valles Calchaquies and Bolsón de Fiambalá (Monte de Sierras ~~and~~ Bolsones) and Ramsar Site Guanacache Lagoons, Desaguadero and Bebedero Saltflats (~~Mount of Plains and Plateaus~~ Monte de Llanuras y Mesetas).

Figura 1: Proposed areas of intervention



Source: Ministry of Environment and Sustainable Development

4-5. These specific areas of intervention within each of the ecoregions have been identified as promising as a result of a recently implemented project in the northwest and Cuyo region of Argentina: "Sustainable Land Management in the Dry Zones of Northwest Argentina" - MST NOA-Cuyo (UNDP ARG 14 / G55). Especially taking into account that in an analysis of the Degradation Rate of the drylands and the areas of intervention proposed for the project, it is observed that these areas are mainly within the degradation rates of Rapid and Moderate increase, making them even more vulnerable to the impacts of climate change than they currently are.

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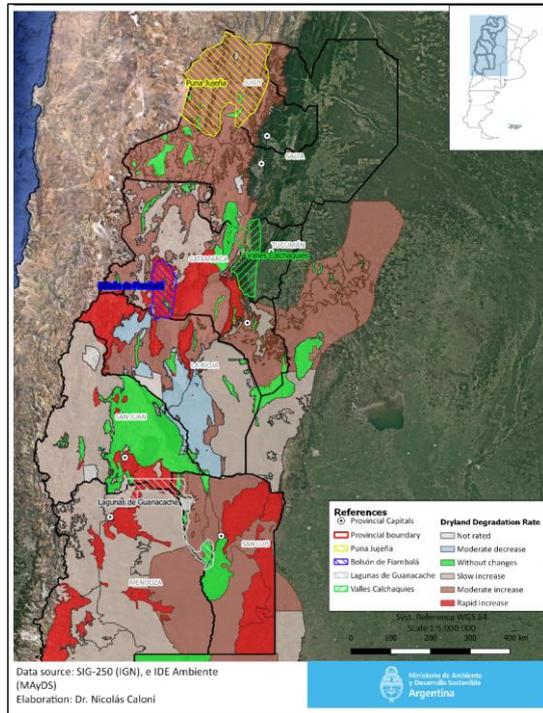
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FIGURE 1: DEGRADATION RATE AND PROPOSED INTERVENTION AREAS



5-6. It is evident that future climate changes will influence the type, intensity, recurrence and extent of desertification and land degradation processes that are already present in the project intervention areas today. These processes are strongly linked to the intrinsic climatic, geographical and edaphic characteristics of the drylands of northwestern Argentina and are often enhanced by unsustainable anthropic actions, which generate moderate impacts on the functioning of these fragile natural ecosystems.

6. In this sense, it is worth highlighting the actions that are being implemented in the NOA and Cuyo regions aimed at avoiding, reducing and / or reversing land degradation as a way of contributing to neutrality in land degradation. A project that stands out in this regard and that serves as a precedent to this proposal is the project "Sustainable Land Management in the Dry Zones of the Northwest of Argentina" – MST-NOA-Cuyo (UNDP-ARG-14 / G55).

7. The MST-NOA-Cuyo project (UNDP-ARG-14 / G55), gave as strategic results the development of three Provincial Action Plans to combat Land Degradation-Desertification and Drought mitigation (LDDD); the strengthening of local governance with the constitution of six Multisectoral Committees (MSC); the start-up of two Infrastructure of Spatial Data Nodes – GIS-ISD for monitoring degradation in drylands and the identification and implementation of 20 sustainable land management practices (SLMP), covering 673,335 ha and 9,600 direct beneficiaries belonging to indigenous peoples and small family farmers.

8-7. The ecoregions select, cross eight provinces with an area corresponding to 309,835 km² (equivalent to 42% of the territory of the provinces and 8% of the national territory). They

Annex 5 to OPG Amended in October 2017

have one of the highest poverty rates nationwide; the NOA has 6.8% of the population below the poverty rate. The population of this region is very dispersed with an approximate density of 9 inhabitants / km² (national average of 14.4 inhabitants / km²) and a total of 6.9 million people of which 1.3 million (19%) live in the rainfed, being numerous the communities of native people that are present in these territories.

9.8. The rural population of these provinces is approximately 3.7%, totaling approximately 350,000 people and this number includes the poorest in the region with subsistence living standards.

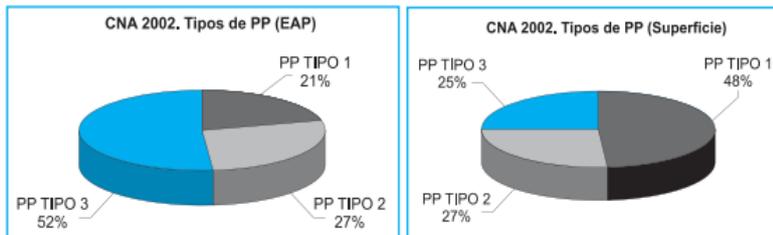
10. Small producer farms are differentiated into Type 1: More capitalized producers in transition; Type 2: They live mainly from their exploitation but do not manage to evolve and Type 3: those with fewer productive resources that cannot live exclusively from their exploitation.

14. In the country as a whole, slightly more than half of the Small Producers (SP) agropecuary exploitation (EAPs) are Type 3, the poorest in terms of resources, since they are the ones with the lowest level of capitalization. They follow in relative weight those of Type 2, intermediate, with 27%. Finally, Type 1, with the highest level of capitalization¹.

REGIONES	EAP de pequeños productores		PP - TIPO 1		PP - TIPO 2		PP - TIPO 3	
	Superficie (ha)	Número de EAP	Número de EAP	Superficie (ha)	Número de EAP	Superficie (ha)	Número de EAP	Superficie (ha)
TOTAL DEL PAÍS	100	100	21,5	48	26,8	27	51,7	25
1. Puna	100	100	8,3	30	21,1	38	70,6	32
2. Valles del NOA	100	100	10,8	21	15,9	13	73,3	67
3. Agric.Subt.del NOA	100	100	4	4	25,8	28	70,2	68
4. Chaco Seco	100	100	16,1	30	26	32	57,9	38
5. Monte Árido	100	100	14,5	39	18,9	27	66,6	35
6. Chaco Húmedo	100	100	23	53	28,2	30	48,8	18
7. Mesopotamia	100	100	12,5	36	23,6	29	63,9	35
8. Patagonia	100	100	33,3	49	24,8	27	41,9	24
9. Pampeana	100	100	38,2	63	37,3	26	24,5	11
10. Oasis Cuyano	100	100	18,6	25	24,7	14	56,8	61
11. Valles Patagónicos	100	100	37,3	7	23,2	1	39,5	92

Source: Obschatko, 2007

12.9. On the other hand, the participation of the rates in the total surface of the SP is inverse. Those with the highest level of capitalization (Type 1) cover almost 50% of the surface, while those with the lowest level (Type 3) have 25%. Type 2 SPs show a remarkable symmetry in their participation in the number of EAPs and in the surface area, which, in both cases, is 27%.



Source: IICA on data from INDEC

¹ Obschatko, Edith Scheinkerman de. 2007. Los pequeños productores en la República Argentina: importancia en la producción agropecuaria y en el empleo en base al censo nacional agropecuario 2002: 2da. Edición revisada y ampliada / Edith Scheinkerman de Obschatko; María del Pilar Foti; Marcela E. Román. - 2a ed. - Buenos Aires: Secretaría Agricultura, Ganadería, Pesca y Alimentos. Dirección de Desarrollo Agropecuario; Instituto Interamericano de Cooperación para la Agricultura- Argentina, 2007. 127 p. + 1 CD ROM : 30x21 cm. (Estudios e investigaciones : 10) ISBN 978-987-9184-54-7

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13-10. Producers with fewer resources (Type 3) show the highest percentages in the regions that make up the NOA (Puna, Valleys of the NOA, Subtropical Agriculture of the NOA), with more than 70%.

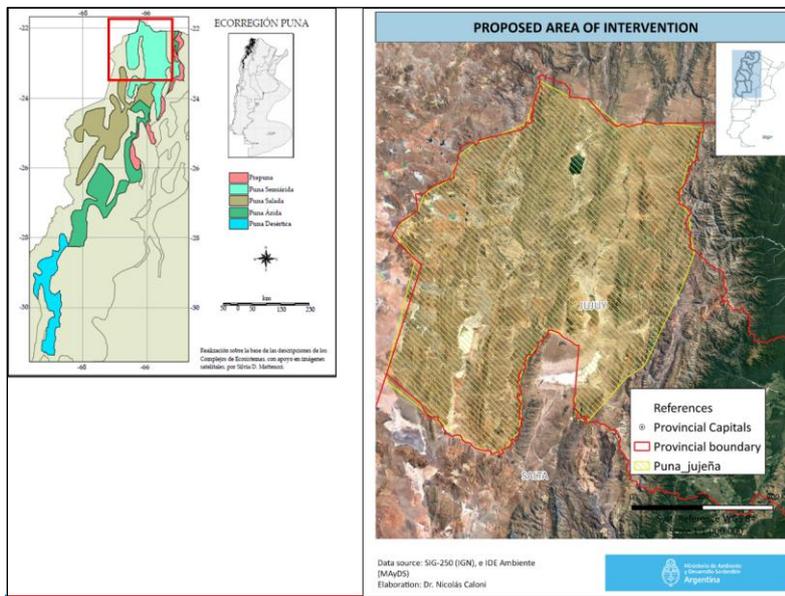
2. Social, economic and environmental context of intervention areas of the project

2.1 Puna Jujeña – Province of Jujuy (Puna Ecoregion)

14. Puna ecoregion is part of the Cordillerana Region (which also includes the High Andes and Monte de Sierras and Bolsones ecoregions). The Cordilleran Region covers the areas of the Andes, its foothills and the plains along 6 provinces from central to northern Argentina: Mendoza, San Juan, La Rioja, Catamarca, Salta and Jujuy.

15-11. Specifically, the proposed intervention area for this project is the Puna Jujeña. In the Puna Jujeña.

FIGURE 2: PUNA ECOREGION AND PROPOSED INTERVENTION AREA



Source: own elaboration based on Third National Communication on Climate Change Secretary of Environmental and Sustainable Development of the Nation

16-12. **Environmental context:** La Puna has a high landscape, ecological and environmental value. It conserves among its deserts, mountains, salt flats and lagoons, different species of birds, both seasonal and permanent. It includes, among others, the Pozuelos Lagoon and the Lagoons of Vilama complex (Jujuy province), wetlands which are highly variable spatially and temporally and have high ecological fragility, that are among the Ramsar Sites of Argentina. Wetlands are generally systems highly threatened by climate change and therefore their protection is part of their adaptation to it. **In the Puna ecoregion, aquatic ecosystems are the most important.** Although there are no glaciers in this area, there is the Andean permafrost (Ahumada *et al.*, 2009) with important reservoirs of fresh water to supply the lowlands.

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~~17-13. **Social context:** The Puna Jujeña area occupies an area of 29,643.30 km² out of a provincial 53,219 km². Its population density is 1.33 inhabitants/km², a percentage that is strongly conditioned by its climatic and geographical characteristics. Altitude, geology and thermal amplitude determine a limited soil support for agricultural activities, a difficult accessibility -especially in rural areas- and an enormous complexity for the provision and support of infrastructure, transport and connectivity services.² (MinPlan, 2015).~~

~~18-14. The Departments of the Puna are inhabited, in general, by various native communities distributed in clusters of houses around streets, close to schools and health posts. The number of original communities of the Puna Jujeña is 124 and the ethnic groups that make them up correspond to Kollas, Atacama and Toara.~~

~~19. In the case of some families dedicated to raising livestock, the dispersed pattern of housing in the countryside persists. The country house continues to be the most important for pastoral families due to its extensive infrastructure: various houses or rooms, corrals, sanctuaries, ovens, looms, etc. This type of buildings is of outstanding importance both for economic activities and for social gatherings and religious celebrations - such as the carnival and the Pachamama celebration. Each household has an average of five stalls on its grazing lands, reflecting the high degree of spatial mobility in herd management, and each location has certain grazing lands and sources of water for human and animal consumption.~~

~~20. The population of the Puna is highly mobile but with a return circuit, since it leaves in search of work but returns, both at different times of the year and at some point in its life cycle. Migratory movements in the Puna are related to the search for better economic, cultural and / or social possibilities offered by other towns in the Province. Consequently, migrations take place from the less favored regions to the more favored ones in terms of sources of work, income levels, educational conditions and quality of life in general. One of the migrant age groups is the young population, which in economic terms represents one of the biggest problems in the Puna. Within the region, inhabitants of the interior who have double residences inhabit intermediate cities such as Abra Pampa, La Quiaca and Susques, that is, they retain their place in rural areas and, in turn, have a house in the city.~~

~~15.~~

~~21-16. There are sectors of the Puna population that still cannot access the services necessary to improve their quality of life, reflected in insufficient housing, work, health and education conditions. A large proportion of the inhabitants are unable to cover their basic needs, a phenomenon observed in an average of 37.4% of households with Unsatisfied Basic Needs. This low quality of life is associated with the scarce productive alternatives in the region and its relative economic, geographical and sociocultural marginality, added to the consequent loss of the young population due to migration. Finally, there are no systematized studies of groundwater reserves or aquifer recharge. In various sectors, water has different levels of salinization and the natural presence of arsenic, boron and other elements, which makes it unsuitable for consumption.~~

~~22. **Economic and productive context:** In relative terms, the economic activity of the Puna is the least developed in the Province. The most important activities, due to their impact on both the level of employment and the generation of income, are mining, livestock, commerce and public administration. Agriculture, tourism and handicraft production, although still at a low level of development, have significant growth potential. The current economic organization can be considered subsistence. A high proportion of families in the Puna carry out small-scale operations of livestock such as llamas, sheep and goats - an average of 80 heads per family -~~

² MinPlan. Ministerio de Planificación Federal, Inversión Pública y Servicios. 2015. Plan Estratégico Territorial de la Puna Jujeña. Provincia de Jujuy. Plan Estratégico territorial. Avance III. [https://www.mininterior.gov.ar/planificacion/pdf/planes-reg/Plan-Estrategico-Territorial-Puna-Juje%C3%B1a-\(2015\).pdf](https://www.mininterior.gov.ar/planificacion/pdf/planes-reg/Plan-Estrategico-Territorial-Puna-Juje%C3%B1a-(2015).pdf) . ISBN: 978-987-1797-25-7.

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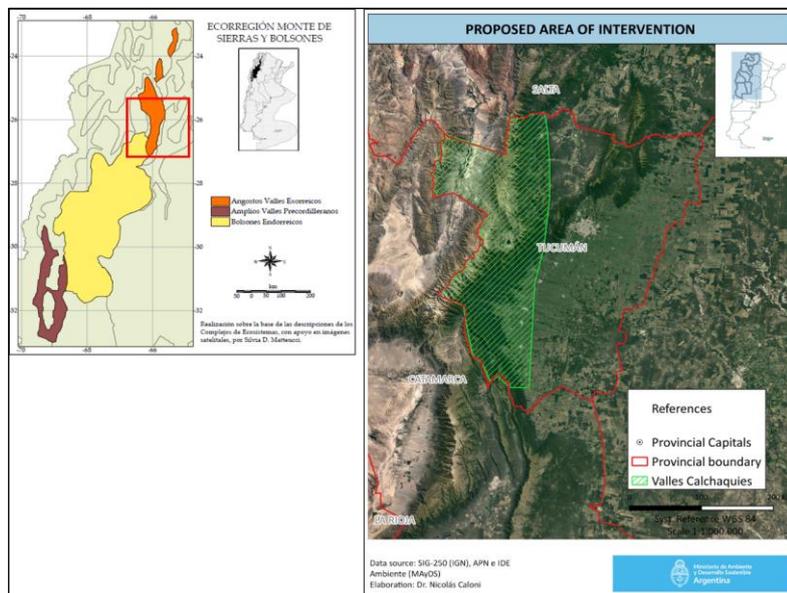
from which they obtain meat, fiber, wool, milk and hides that they use for their own consumption or that they commercialize informally in nearby urban centers, either directly or by transforming them into handicrafts.

17.

2.2 Mounts of Sierras and Bolsones: Valles Calchaquíes (Tucumán) and Bolson de Fiambalá (Catamarca)

23-18. Like the Puna Jujeña, it is part of the Cordilleran Region. Its territory represents 2.22% of the country and extends parallel to the Andes Mountains, from Jujuy to the north of Mendoza. Within this ecoregion, the proposed intervention areas are Valles Calchaquíes (corresponding to the area of dry lands with aridity and semi-aridity indices in Tucumán province) and Bolsón de Fiambalá (Catamarca province).

FIGURE 3: MONTE DE SIERRAS Y BOLSONES ECORREGION AND AND PROPOSED INTERVENTION AREA VALLES CALCHAQUIÉS



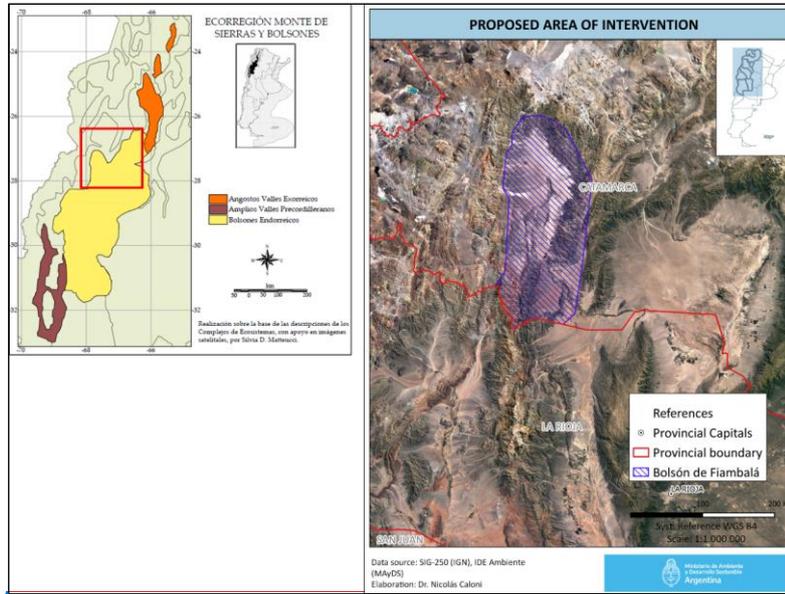
Source: own elaboration based on Third National Communication on Climate Change Secretary of Environmental and Sustainable Development of the Nation

FIGURE 4: MONTE DE SIERRAS Y BOLSONES ECORREGION AND AND PROPOSED INTERVENTION

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AREA BOLSON DE FIAMBALÁ



Source: own elaboration based on Third National Communication on Climate Change Secretary of Environmental and Sustainable Development of the Nation

24-19. Environmental context: It is a shrubby steppe lying on intermountain valleys, pockets and mountain slopes. These ecoregions present areas of high ecological value since their natural resources such as glaciers, native forests, endemisms, to name a few of the most important, provide a large number of crucial ecosystem services for the operation and maintenance of the regional population. ~~Despite the fact that it receives little rainfall (up to 200 mm per year), in those areas with groundwater some tree species, such as the carob tree, thrive. This exclusive region of Argentina is home to guanacos, tortoises, pumas, vizcachas, the lesser pichiciego, the vizcacheras boa and the crowned eagle.~~

25-20. In the Valles Calchaquíes, an area that has an approximate extension of 1,440 km² (52% of the total area of Tafí del Valle Department), the climate is arid - dry sub-humid, with hot summers, annual rainfall of around 200 mm (concentrated between the months of December to March) and an annual evapotranspiration of 700 to 800 mm, which determines a permanent annual water deficit. ~~The average annual temperature is 15 to 16 °C, with mean maximums of 20 to 25 °C, absolute maximums of 42°C and harsh and dry winters (absolute minimums of up to 12°C below zero on slopes and high mountain peaks).~~ (PAP Tucumán 2021-2025). The soils, both in the valley area and on the slopes of the surrounding mountains, are generally of incipient development, ~~shallow, without differentiation of horizons, with predominantly sandy textures, little structured, with very homogeneous light colors that show low content of organic matter. The areas near the Santa Maria River have a predominant saline-sodium-alkaline character.~~ These fragile and low-productivity environments require special management standards not only for agricultural production, but also for the conservation of their ecosystem services.

26. Respect to Bolson de Fiambalá (also known as, the Fiambalá Valley) is a depression in northwestern Argentina, located in the center-southwest of the province of Catamarca in the Tinogasta Department. The Tinogasta Department has a surface area of 23,582 km², 23,326

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inhabitants (INDEC, population projection to the year 2021) and is administratively divide into 13 districts. ~~It is an arid to semi-arid region where the relief is an alternating of elevations (mountain systems) and depressions (pockets) with a general increase in altitude from East to West and from South to North.~~

~~21.~~

~~27.~~ The hydrographic basin of the Abaucán River that runs through the entire department stands out, and has a hydrological regime "Periodic Nival" (mountain melts). Its waters are intensively used for irrigating crops typical of an intense regional economy. ~~In the Abaucán basin, a water regime typical of the endorheic, transitory and scarce basins predominates, with saline efflorescence in the semisubterranean section channels. The landscape is desert, with immature and skeletal soils, a predominance of sandy sediments, subject to intense erosion and accumulation of medanales towards the NE of the valley, against the Fiambalá mountain ranges.~~

~~22.~~

~~28-23.~~ In the Bolson de Fiambalá, the degraded carob forest patches are very characteristic, extending discontinuously along the Abaucán River ~~and covering an area of 12,680 hectares.~~ They are part of the natural and cultural heritage of the region, with a significant importance in the hydric dynamics of the river, biodiversity and soil protection. In addition, this tree provides benefits such as ground cover, the incorporation of nitrogen from the air and the production of organic matter. It is also the main source of wood in the region, while its fruits can be used to make food products and fodder for animals.

~~29-24.~~ **Social Context:** In the Calchaquíes Valleys, there are the Rural Communes of Amaicha del Valle and Colalao del Valle, between the Calchaquíes peaks and the Sierras del Cajón or Quilmes, which concentrate 3,601 inhabitants (20% of the departmental total). The main challenges posed by the site to the local inhabitants are: the water supply; the type of soil and drainage to which agricultural techniques must be adapted; a generalized process of aridization and the impacts of different anthropic activities that affect the dynamic factors of the landscape.

~~30-25.~~ According to the latest National Census, corresponding to the 2010 period, the province of Catamarca has an index of 3,994 Rural Households with Unsatisfied Basic Needs, of which 341 correspond to the Tinogasta Department.

~~34-26.~~ **Economic and productive context:** In the Mount of Sierras and Bolsones ecoregion, economic activity depends largely on the water contributions of its rivers (for irrigation oases) and reservoirs (hydroelectric production), standing out permanent crops such as vine and fruit growing, which have great economic importance. The problem of this region is characterized by its complexity, since it encompasses different aspects such as the high impact on the natural environment, the productivity of the land, the generation of genuine employment and therefore migration and depopulation of rural areas, the lack of consolidated producer entities and their lack of infrastructure. This situation extends to all areas of the territory and also to other non-agricultural activities (Morandi *et. al.*, 2020).

~~32-27.~~ Some of the main problems in the region related to desertification and land degradation are the following (Government of Tucumán, 2018): 1) high pressure on the native forest through the extraction of firewood for different uses, 2) the livestock sector, in general, lacks sustainable management; there is an unsatisfied demand and the possibility of developing fiber and leather products, these activities do not grow in the desired way due to poor commercial management, non-existent logistics for the transfer of value-added products to regions with greater demand and due to the lack of water supply infrastructure in breeding areas; 3) the agricultural production structure has a low scale of production and a high degree of informality and 4) population growth in the area shows an increase in recent years, which increases the demand for water for consumption to the detriment of agricultural activities.

~~33-28.~~ In Bolsón de Fiambalá, according to the definitive data from the last National Agricultural

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Census carried out in 2018 (INDEC, 2021), the province of Catamarca has 9,706 agricultural holdings (EAPs) of which 1,344 are in the Tinogasta department, where 960 (71%) are in charge of men and 349 (26%) in charge of women (the remaining 3% without discrimination).

~~34-29.~~ In the department of Tinogasta, the main productive chain in the area refers to viticulture. For this reason, since 2013 the Government of the Province has been developing the Viticulture Plan, which currently registers a participation of 90% of small Type 2 and 3 producers. They have 70% of the area of vineyards in the province, approximately 3,715 you have the second most important crop are olive groves, with 1,650 hectares planted. The growing area depends exclusively on irrigation.

~~35.~~ Likewise, a report provided by the Secretariat of Production and Tourism of the Municipalities of Tinogasta, gives an account of the growing and constant development of family agriculture in various productive chains, used as means of subsistence. On the other hand, tourism is booming for this region mainly due to its proximity to the San Francisco International Pass, which represents one of the most important passes of the Andes Mountains, which joins the northwestern region of the Republic. Argentina with the north of the Republic of Chile.

2.3 Mount of plains and plateaus: Ramsar Site Guanacache Lagoons, /Desaguadero and Bebedero Salt Flats (provinces of San Luis, San Juan and Mendoza)

~~36.~~ This ecoregion comprises the driest strip in the country, and covers some 35,414,412 hectares (6.71% of the country). From Mendoza, the Mount heads east-southeast towards the Atlantic Ocean, passing between the ecoregions of Espinal and the Patagonian Steppe until it reaches the coast of the extreme south of Buenos Aires, Río Negro and Chubut. Plains and stepped plateaus prevail. ~~Its jarillales host maras, guinea pigs, pumas, guanacos, gray foxes and choiques.~~

~~30.~~
~~37.~~ Within this ecoregion, the Guanacache Lagoons, Desaguadero and Bebedero Ramsar Site is located in central-western Argentina, at the foot of the Central Andes, in the border area of the provinces of San Juan, Mendoza and San Luis, fed by the Salado Desaguadero - Basin. ~~The area includes in part the southern part of the Departments of Sarmiento and 25 de Mayo of the province of San Juan and the north and east of the Department of Lavalle and the eastern edge of the Department of La Paz, both in the province of Mendoza. In the province of San Luis, the Sierra de las Quijadas National Park (within the limits of this province) and the territory limited by route 147 to the east, continuing south at 480 meters above sea level including the entire Salt flat from the Bebedero to the La Horqueta Bridge that crosses the Desaguadero River (National Route No. 146) (Di Paola, 2012).~~

~~38.~~ The Ramsar Site Guanacache Lagoons was designated on December 14, 1999, including 580,000 hectares in the provinces of Mendoza and San Juan. On June 5, 2007 it was expanded to be renamed Guanacache, Desaguadero and Bebedero Lagoons, including 962,370 hectares in the provinces of Mendoza, San Juan and San Luis.

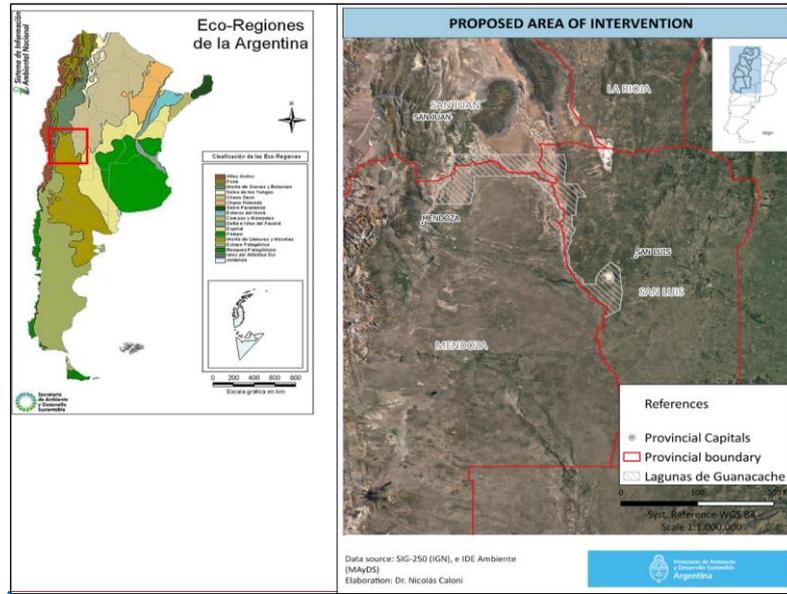
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FIGURE 5: MONTE DE LLANURAS Y MESETAS ECOREGION AND PROPOSED INTERVENTION AREA



Source: own elaboration

39. Environmental context: It constitutes a system of lagoons and chained baths, fed by the Mendoza and San Juan rivers and sporadically through the Bermejo Drains. It is an exorheic system that discharges through the Desaguadero River. It has a rich biological diversity associated with the wetland (more than 50 species of aquatic birds with more than 20,000 individuals), and a local community that reaches 2,000 inhabitants whose customs and traditions are historically linked to the lagoons, where they reside in the today 12 huarpes communities and scattered creole settlers who call themselves "laguneros" (Sosa, H. 1999)
- 31.
- 40-32. The Ramsar Site Guanacache Lagoons is a valuable site not only for the conservation of biodiversity but also as a way of life for rural communities and indigenous peoples present in the area, with strong cultural relevance and a marked sense of belonging to part of those.
- 44-33. Social Context: At present, the site is inhabited by about 2,000 people, including 12 Huarpes communities and Creole settlers (lagoons people), who live mainly by raising goats. From the 1950s onwards, the Guanacache wetlands suffered a process of desiccation and other alterations due to natural and antropic causes. The diversion of the rivers for the use of water in the productive oases upstream, added to the extreme climatic events, resulted in the drying up of the Guanacache lagoons, a situation that was strengthened since 2010. This scenario of water crisis and extreme drought threatens the survival of the Ramsar Site's inhabitants, who do not have water for irrigation or to feed their livestock.
- 42-34. Productive economic context: In the past, the San Juan, Mendoza and Desaguadero rivers, with the Guanacache lagoon and the Desaguadero baths, provided water for agricultural and livestock activities. Currently the area is a desert because long years of drought have contributed to the drying out of the bodies of water, the producers emigrated and the region was left depopulated. Currently the main activity is the raising of goats, handicrafts and extraction of firewood and jonquil to make brooms (Morello, 2012). The main

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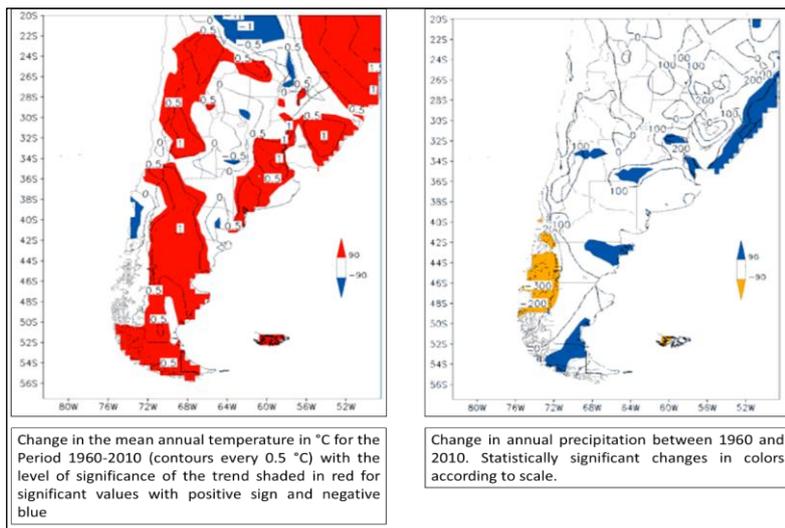
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 livestock activity is goat rearing, with more than 10,500 heads. Cattle ranching with about 1,200 heads follow it. Farm animals include pigs and poultry. The production is mainly for self-consumption and the goats work as petty cash to pay for expenses. Breeding takes place around the stalls, each one made up of a house, a corral and a well, the land is communal, without fences.

3. Climate Change in the áreas of intervention of the project:

43-35. The Argentine Republic is a developing country particularly vulnerable to the adverse effects of climate change under Article 7, paragraph 2, of the Paris Agreement, and under Article 4, paragraph 8, of the UNFCCC, given that it possesses: zones low coastal; arid and semi-arid zones; areas with forest cover and areas exposed to forest deterioration; disaster prone areas; areas exposed to drought and desertification; and areas of fragile ecosystems, including mountain ecosystems³ (MAyDS, 2020).

44-36. Changes in the country's climate have been observed since the second half of the last century that, according to climate model projections, would generally intensify or not reverse in this century. These changes have caused impacts on natural and human systems. In most of non-Patagonian Argentina there was a temperature increase of up to half a degree between 1960 and 2010, while average precipitation increased in almost the entire country, although with interannual and interdecadal variations⁴ (SAyDS, 2015).

FIGURE 6: CHANGE IN TEMPERATURE AND PRECIPITATION. PERIOD 1960-2010



Source: own elaboration based on Third National Communication on Climate Change Secretary of Environmental and Sustainable Development of the Nation

45-37. The water deficit and the seasonality of rainfall characterize the three ecoregions

³ MAyDS. 2020. *Segunda Contribución Determinada a Nivel Nacional de la República Argentina*. Ministerio de Ambiente y Desarrollo Sostenible. República Argentina.

⁴ SAyDS. 2015. *Tercera Comunicación Nacional de la República Argentina a la Convención Marco de las Naciones Unidas sobre el Cambio Climático*. Secretaría de Ambiente y Desarrollo Sustentable de la Nación.

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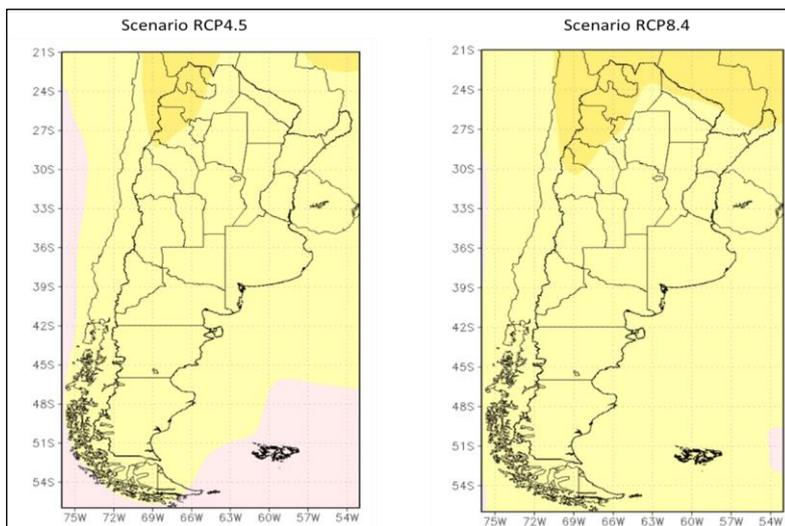
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described above and result in the need to manage water resources in a sustainable way so that they are available for human consumption, as well as for agricultural and industrial production. In the west and most notably in the north, the dry periods of winter have become longer. This has generated problems in the availability of water for some populations and more favorable conditions for grassland fires and greater stress on livestock.

46-38. Climate projections have been made for Argentina according to the CMIP5 set that includes twentieth-century simulations and projections of twenty-first century climate scenarios. The climate scenarios include the average of 42 experiments for two time horizons: near future (2015-2039) and far future (2075-2099), informative in the long term and for two scenarios of future greenhouse gas concentrations (GHG) RCP4.5 and 8.4. These GHG concentration scenarios correspond in the first case to moderate emissions growth and in the second to growth with current trends. For this project, the projections of the near future will be taken since they are those of interest for adaptation policies.

47-39. As a result, projections indicate that the average temperature would rise across the country.

FIGURE 7: TEMPERATURE PROJECTION SCENARIOS FOR NEAR FUTURE



Source: own elaboration based on Third National Communication on Climate Change Secretary of Environmental and Sustainable Development of the Nation

48-40. According to climate projections for the 21st century, the Cordilleran Region is the region of the country for which the greatest warming is projected ~~in this century~~. In the near future, the increase in mean temperature would not depend much on the concentration scenario and would be greater than 1 ° C in much of the region with a tongue of greater warming that extends from the north and along the west.

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49-41. Due to the warming of the region, an increase in the height of the isotherm of 0°C is projected, continuing with the trend observed in recent decades, which will cause an acceleration of the melting of permafrost and glaciers.

50-42. The height of the 0° C isotherm is a rough indicator of the lower level of glaciers and perennial snows. These water reserves feed the main rivers of the region, which support the

foothills of irrigation oases that allow agriculture and the settlement of towns and cities. Its average height in the region is 3,950 m, being higher in the north than in the south and varying from 3,500 m in San Juan and Mendoza to more than 4,400 m in Salta and Jujuy. Consistent with the observed regional warming, the height of the 0° C isotherm has increased in the period 1960-2010, this increase being greater in the south (250 m) than in the north (100 m).

51-43. With these moderate increases in temperature in the near future and, with the fluctuations typical of arid regions, precipitation would not have significant changes. This configures a scenario of increasing water stress with moderate impacts on the functioning of natural ecosystems. In addition, there is a vulnerability of wetlands in the Cordilleran region in particular, because high temperatures will accentuate evaporation, reducing bodies of water such as lagoons, and affecting physicochemical characteristics such as salinity, in addition to exacerbating fragmentation processes by increasing distances between patches. However, climatic signals such as the increase in temperature differentially affect different scales of wetlands. In the Puna for example, the size of the lagoons largely determines their resilience to these increases in temperature: those with a smaller surface area show radical changes in areas and become completely dry for 1 or more years.

52-44. It will be also an increase in days with heat waves in most regions of the country, which would be greater in the north and, especially in the northwest ~~of the country~~, where it would increase by more than 60 days in the near future (SAyDS, 2015). As the NOA region of the country is the region with the greatest social vulnerability to disasters, it would be the region with the highest risk of social impacts due to heat waves. Likewise, climate change is a new risk factor that, by affecting all economic activities, influences the world of work in general and more directly in those branches of activity that are sensitive to climate. Workers who carry out their work activities outdoors will have an increase in their occupational risks due to the greater frequency or intensity of extreme events, greater exposure to high temperatures, or greater occurrence of vector-borne diseases. In these cases, the loss of work days due to illness or injury can represent a significant loss of income. According to the climatic scenarios, these damages will be greater in the north of the country.

53.

54-45. The latest report from IPCC Working Group I (2021) reinforces these projections that climate change will increase in all regions in the coming decades. According to the report, with global warming of 1.5 °C, there will be an increase in heat waves, hot seasons will lengthen and cold seasons will shorten. Because of climate change, different regions experience different changes, which will intensify if warming increases; in particular, changes in humidity and dryness, winds, snow and ice, coastal areas and oceans. Specifically for the Southwest South American (SWS) region where this project is located, it is expected that:

- The total land area subject to increasing drought frequency and severity will expand (high confidence).
- Projections of fire weather indices indicate an increased risk in the region (high confidence).
- Increases in one or more aspects between drought, aridity, and fire weather (high confidence) will ~~potentially~~ potentially impact a wide range of sectors (including agriculture, forestry, health, and ecosystems), ~~which will be assessed in the IPCC Working Group II report.~~
- Glacier volume loss and permafrost thawing will likely continue in the Andes Cordillera under all greenhouse gas emissions scenarios in this report, causing important reductions in river flow and potentially high-magnitude glacial lake outburst floods.

55-46. ~~As the NOA region of the country is the region with the greatest social vulnerability to disasters, it would be the region with the highest risk of social impacts due to heat waves. Likewise, climate change is a new risk factor that, by affecting all economic activities, influences the world of work in general and more directly in those branches of activity that are sensitive to climate. Workers who carry out their work activities outdoors will have an increase in their occupational risks due to the greater frequency or intensity of extreme~~

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~~events, greater exposure to high temperatures, or greater occurrence of vector-borne diseases. In these cases, the loss of work days due to illness or injury can represent a significant loss of income. According to the climatic scenarios, these damages will be greater in the north of the country.~~

- ~~56. In general lines, the Second National Contribution of the Argentine Republic lists various vulnerabilities and adverse impacts associated with the climate already identified and / or expected for the various regions of Argentina, according to the differentiation made based on the Third National Communication (TCN) presented around the country. The aspects related to this project are taken from the different regions:~~
- ~~57. **Northwest Argentine Region** (provinces of Salta, Jujuy, Tucumán, Santiago del Estero and Catamarca): 1) Difficulty, for various reasons, in access to water in some populations; 2) Greater impacts expected from flooding and contamination of drinking water and, therefore, an increase in internal migration; 3) The increase in heat waves can generate strong impacts, since this region presents greater social vulnerabilities to disasters; 4) The increase in favorable conditions for the development of forest, rural and grassland fires due to the reduction in the extension of natural firebreaks and the accumulation of dry matter; and greater stress in livestock and in different productive sectors, due to longer dry periods during winter and spring; 5) The acceleration of desertification processes with impact on ecosystems, changes in the geographical range and extinction of less tolerant species and 6) The retreat of rock glaciers and permafrost.~~
- ~~58. In the irrigation oases of the Andean foothills there is a risk that the supply of water will be reduced and will change unfavorably in terms of its seasonal availability. To maintain and even increase production, the management of water resources can be improved or the area under irrigation can be expanded. In relation to the first, the most widespread irrigation system at the national level is gravitational (69.8%) followed by sprinkler irrigation (20.8%), drip (7.7%) and micro sprinkler. (one %). This indicates that there is a wide potential for the improvement of irrigation systems as an adaptation action.~~
- ~~59. **Cuyo Region** (provinces of Mendoza, San Juan, La Rioja y San Luis): 1) An increase and prolongation of periods of water shortage in the region, with significant negative effects on all sectors of the population, but especially on vulnerable communities and on productive agricultural and livestock activities; 2) Restrictions on the availability of water for olive, wine and fruit and vegetable irrigation, for the generation of hydroelectric energy and for other industries, such as mining; 3) The increase in periods of extreme drought, which promote favorable conditions for the development of forest, rural and grassland fires, causing damage to wild fauna and flora; 4) The acceleration of desertification processes with impact on ecosystems and changes in the geographical range and the extinction of less tolerant species; 5) The increase in regional floods in the form of extraordinary events and 6) Affecting the recharge of aquifers due to a decrease in the contribution due to rainfall.~~
4. Current existing barriers and baseline scenario to overcome it to achieve effective adaptation to climate change

~~60-47.~~ The purpose of this project is to strengthen the community resilience of rural populations in the drylands of northwestern Argentina in the face of climate change. This will only be feasible if the barriers that currently exist in the areas proposed for project implementation can be overcome. These barriers are:

- A. A high percentage of people with Unmet Basic Needs (UBN) that prevents them from improving their productive economic situation and continues to replicate production, marketing and consumption practices, which are not very sustainable.
- B. Productive structure with a low production scale, a high degree of informality and a low effective representation of the most vulnerable groups such as women and youth.

- C. Productive activities do not grow in the desired way due to poor commercial management, non-existent logistics for the transfer of value-added products to regions with higher demand and due to the lack of water supply infrastructure in areas.
48. To overcome these barriers, Argentina has a solid baseline scenario to build this project upon on. During the 2015-2021 period, the National Ministry of Environment implemented the UNDP ARG 14G55 Project "Sustainable land management in dry areas of Northwest Argentina", which was financed by the GEF. This project includes the 4 areas covered in the present proposal: Puna (Jujuy), Valles Calchaquíes (Tucumán), Bolsón de Fiambalá (Catamarca) and Guanacache Lagoons, Bebedero and Desaguadero Ramsar Site (San Juan, Mendoza and San Luis). The actions were aimed at carrying out sustainable land management practices (PMST), the governance of drylands through the formation of Multisectoral Committees for the formulation of Provincial Action Ps to Combat desertification, drought and land degradation (PAPs) and the survey of the surface of bare lands (devoid of vegetation) and of producers involved in carrying out PMST financed by the Project.
49. The UNDP ARG 14G55 Project, financed 45 sub-projects to carry out SLMP, contributing USD1,551,000, which were executed by community organizations of peasants and Original Peoples of the Kolla, Diaguita Calchaquí, Huarpe and Mapuche ethnic groups. The subprojects had a gender component. In addition, a specific call was made for Indigenous People, with the intervention of the National Institute of Indigenous Affairs (INAI). A total of 1,443 families (8,086 persons) benefited. About 20 types of SLMP were implemented, of which 46% were linked to access to water for human consumption and production. Two hundred families from Jujuy, Catamarca, La Rioja and Mendoza benefited from the Revolving Funds designed in the Project, managed mainly by groups of women and young people, in order to purchase fodder, inputs for production, agroecological production, livestock and small water works.
50. Six Multisectoral Committees (MSC) were formed and put into operation, including the provinces of Jujuy (Puna ecoregion), Tucumán (Valles Calchaquíes), Catamarca (Bolsón de Fiambalá) and San Juan. They integrate by the MAyDS, government institutions in the areas of environment and production, and rural research and development institutions (INTA and the Secretariat of Family, Peasant and Indigenous Agriculture), National Universities, and peasant and Indigenous Peoples' organizations. The MSC formulated the Provincial Action Programs to Combat Desertification, Drought and Land Degradation, which contain specific lines of action referring to 1. Public policies and institutional articulation, 2. Financial and economic instruments, 3. Strengthening of capacities for implementation in the territory, 4. Education and awareness, 5. Science, technology and knowledge.
51. In this sense, it is worth highlighting the actions that are being implemented in the NOA and Cuyo regions aimed at avoiding, reducing and / or reversing land degradation as a way of contributing to neutrality in land degradation. The MST NOA-Cuyo project (UNDP ARG 14 / G55), gave as strategic results the development of three Provincial Action Plans to combat Land Degradation Desertification and Drought mitigation (LDDD); the strengthening of local governance with the constitution of six Multisectoral Committees (MSC); the start-up of two Infrastructure of Spatial Data Nodes - GIS-ISD for monitoring degradation in drylands and the identification and implementation of 20 sustainable land management practices (SLMP), covering 673,335 ha and 9,600 direct beneficiaries belonging to indigenous peoples and small family farmers.
52. Finally, the MST NOA-Cuyo project has deliver many lessons to be learned and things to be done to continue to overcome the current existing barriers and reinforcement the quality of life of rural and indigenous people of the drylands of the northwest of Argentina especially in the face of the impacts of climate change.
- C.

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Project Objectives:

General Objective:

- Contribute to the adaptation of rural communities in the drylands of northwestern Argentina, reducing their vulnerability to the impacts of climate change

The specific objectives of the project are:

- Increase the efficient use of water resources in all sectors and ensure the sustainability of the extraction and supply of fresh water to face water scarcity.
- Promote, among small and medium-scale producers, the adoption and implementation of SLMP to prevent, reduce and / or mitigate LDDD; revaluing cultural practices and strengthening the sustainable and resilient management of agroecosystems that contribute to the achievement of food security in the face of the impacts of climate change.
- Consolidate and enhance the capacities of local producer groups and organizations that inhabit the prioritized ecoregions
- Empower rural women who inhabit the prioritized ecoregions, to achieve their effective participation in the development processes of the territory and strengthen them in actions to adapt to climate change.
- Develop and implement financing mechanisms and value chains managed by the local producer organizations themselves, which support the adoption of SLMP and measures to improve access to water with an Ecosystem-based Adaptation (EbA) and Community-based Adaptation (CbA) approach.
- Implement the Project in the prioritized ecoregions, in coordination with local partners, monitoring, evaluating, communicating and disseminating its results.

Project Components and Financing:

Project Components	Expected Concrete Outputs	Expected Outcomes	Amount (US\$)
1. Improvement of access to water and promotion of Sustainable Land Management Practices (SLMP) in rural populations of the NOA Cuyo to reduce their vulnerability to CC.	1.1.1 Trained local population with access to materials and technical assistance for the efficient use of water resources with an EbA and CbA approach.	1.1 The efficient use of water resources increases in all sectors ensuring the sustainability of the extraction and supply of fresh water to face water scarcity.	USD 4.632.100
	1.1.2 Financing the investments necessary to achieve the sustainability of water extraction and supply		
	1.2.1 Development and / or updating of guides and / or protocols for the implementation of SLMP at the local level in the selected ecoregions and critical areas.	1.2 Small and medium-scale producers and producers adopt and implement SLMP to prevent, reduce and / or mitigate LDDD; revaluing their cultural practices and	
	1.2.2: Women and groups of		

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Annex 5 to OPG Amended in October 2017

	<p>rural women and diversities, participate together with technicians in the definition of priorities and training modalities and in the elaboration of a systematization of experiences and recommendations with a gender perspective.</p> <p>1.2.1 Development and / or updating of guides and / or protocols for the implementation of SLMP at the local level in the selected ecoregions and critical areas.</p> <p>1.2.2: Women and groups of rural women and diversities, participate together with technicians in the definition of priorities and training modalities and in the elaboration of a systematization of experiences and recommendations with a gender perspective.</p> <p>1.2.3 Technical support for the development of local capacities for the adoption and implementation of the SLMP.</p> <p>1.2.4 Financing the necessary investments for the SLMP implementation</p>	<p>strengthening the sustainable and resilient management of agroecosystems that contribute to the achievement of food security in the face of the impacts of climate change.</p>	
<p>2. Strengthening organizations and rural women and diversities for adaptation to CC</p>	<p>2.1.1 Legal, administrative, institutional and communicational / informative strengthening of the social organizations present in the intervention areas with gender equity and diversities with an intersectional approach</p> <p>2.1.2 Exchange of experiences, articulation of goods, services, knowledge and facilitated knowledge; both between beneficiary social organizations and between them and other institutions linked to the Project</p>	<p>2.1 The capacities of the groups and local organizations of producers and producers that inhabit the prioritized ecoregions are consolidated and strengthened.</p>	<p>USD 306.637 USD 514.174</p>

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Annex 5 to OPG Amended in October 2017

	2.2.1: The role of women and diversities is strengthened in local rural groups or organizations, through training and support in the exercise of managerial roles.	2.2 Rural women who inhabit the prioritized ecoregions are empowered to achieve their effective participation in the processes of development of the territory and strengthened in the actions of adaptation to climate change.	
3. Financing and added local value	<p>3.1.1 Goods, services and resources available to Small and Medium Enterprises (SMEs) and local producer organizations for marketing and added local value</p> <p>3.1.2 Incorporated differentiation strategies to value or promote local and traditional practices and knowledge that allow combating LDDD to strengthen adaptation to CC</p> <p>3.1.3 Locally managed financing mechanisms available to SMEs and local producer organizations.</p>	3.1 Local and regional markets are promoted as centers for the commercialization of products and the development of actions and investments aimed at adding value for production associated with SLMP and the efficient use of water resources with an EbA and CbA approach is strengthened.	<p>USD 2.625.269</p> <p>USD 2.690.831</p>
4. <u>Knowledge management and project sustainability</u> <u>Project management, monitoring, evaluation and knowledge management</u>	<p>4.1.1 Knowledge dialogue space where the exchange of lessons learned and the systematization of experiences is promoted, and local knowledge is consolidated as a useful tool for planning and evaluating the project.</p> <p><u>4.2.1 4.2.1 Networking, communication products and capacity development, facilitate the implementation and exchange of adaptation to climate change experiences and lessons learned among the communities of the four interventions areas.</u> Project execution is permanently monitored and evaluated by implementing adaptive management</p>	<p>4.1 Traditional and ancestral knowledge provide information for a better understanding of climate variability at the local level and to strengthen the generational transfer of knowledge.</p> <p>4.2 The Project is implemented in the prioritized ecoregions, in coordination with local partners, monitoring, evaluating the actions carried out and communicating their results. <u>A Regional Knowledge Sharing Adaptation Platform is</u></p>	<p>USD 1.110.367</p> <p>USD 810.368</p>

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Annex 5 to OPG Amended in October 2017

	<p>through a “triple loop” learning mechanism.</p> <p>4.2.2 Internal and external communication materials of the project facilitate the articulation between components and partners and the dissemination of results and lessons learned.</p>	<p>establish for enhance climate change resilience of rural communities of the Northwest of Argentina</p>	
5. Project Execution cost			<p>USD 787.734 USD 879.117</p>
6. Total Project Cost			<p>USD 9.192.405 USD 9.256.590</p>
7. Project Cycle Management Fee charged by the Implementing Entity (if applicable)			<p>USD 807.895 USD 743.410</p>
Amount of Financing Requested			USD 10.000.000

Projected Calendar:

Milestones	Expected Dates
Start of Project Implementation	March 2023
Mid-term Review (if planned)	April-September 2026 ⁵
Project/ Programme Closing	March 202 8 ⁹
Terminal Evaluation	May-Dec 202 8 ⁹

PART II: PROJECT JUSTIFICATION

A. Describe the project components, particularly focusing on the concrete adaptation activities of the project, and how these activities contribute to climate resilience. For the case of a programme, show how the combination of individual projects will contribute to the overall increase in resilience.

61-53. The project focuses its implementation in four areas of intervention: Puna Jujena, Valles Calchaquies, Bolsón de Fiambalá and Ramsar Site Guanacache Lagoon, Desaguadero and Bebedero Saltflats; which are characterized by being strongly conditioned by the climate, geography and geology and by having a low population density of rural communities and indigenous peoples. These populations are very vulnerable because of they live with a poor livelihood associated with the scarce productive alternatives in the region and their relative economic, geographical and sociocultural marginality, added to the consequent loss of the young population due to migration.

62-54. In this context, the project's main objective is made contributions to the adaptation of rural communities in the drylands of the Northwest and Cuyo of Argentina, reducing their vulnerability to the impacts of climate change and strengthening their community resilience.

63-55. For this, the project is structured in four main components that are mainstreamed by three

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key axes: gender and diversities perspective with an intersectional approach; Ecosystem-based Aadaptation (EbA) and eCommunity-based aAdaptation (CbA).

~~64-56.~~ Working within the framework of the EbA approach, guides how to work with nature in the face of climatic events and promotes the protection, restoration and sustainable management of ecosystems to help communities reduce their vulnerability and increase her resilience in the face of variability and climate change. ~~Examples of EbA are conservationist agriculture, agroforestry and silvopastoral systems, and water harvesting. These techniques are recognized for protection of soils and to conserve the quantity and quality of water and contribute to the adaptation to water scarcity, especially in arid and semi-arid zones (Delgado and others, 2011; Quiroga and Gaggioli, 2011; Alvarez and others, 2013).~~ This approach will take special relevance in sites under some conservation category such as Ramsar Sites.

~~65.~~ CbA is an approach that seeks to increase the adaptation capacity of the most vulnerable communities over the impacts of climate change and variability. In the case of these project, Type 3 small producers, with special relevance on indigenous people and women. ~~Applying this approach seeks: avoid development actions that may worsen local vulnerability conditions, actively participating in local planning processes; incorporate adaptation priorities by local communities in the instruments of land use planning and social policy and Implement concrete adaptation actions, in specific places, guided by the principles of integrality and sustainability.~~

~~66.~~ Finally, the approach with a gender and diversities perspective with an intersectional approach is essential to modify the historical disadvantages of women, their limited access to resources, restrictions on their rights and the silence of their voices in the decision-making process. This context makes them highly vulnerable to climate change.

~~67.~~ It is important to recognize that the conditioning factors based on gender, social dimension, ethnicity, age and religion, among others, influence the construction and determination of vulnerabilities and capacities, generating differences and inequalities when facing and recovering from the impacts of climate change. ~~Along the same lines, the higher rate of job insecurity and unemployment, income inequality, as well as participation in lower productivity jobs, place women in a situation of greater vulnerability to face the disasters caused by climate change (MAyDS, 2020).~~

~~57.~~

~~58.~~ In recent years, Argentina experienced an increase in the femininity index of poor households, which implies that they concentrate a higher proportion of women. In this sense, the Economic Commission for Latin America and the Caribbean (ECLAC) estimates that by 2013 women dedicated an average of 15.2 hours per week to paid work, compared to 33.2 hours per week for men, and an average of 42.4 hours of unpaid work compared to 17.3 hours for men. In this framework, and deepening the analysis from a gender perspective, in the case of rural women, and given their simultaneous role of performing reproductive and productive tasks, they face greater barriers to the development and commercialization of products and little experience in management and use of credit. In addition, they have land tenure restrictions and are faced with a lack of potable water. (Ministry of the Interior and Transport; 2012)

~~59.~~ In this sense, the MST NOA Cuyo project worked on each of the components, active participation and contributed to the empowerment of women, which favored the strengthening and continuity of good practices in the territory. Although it was not a rule, it was encouraged that gender parity be taken into account in the formation of the CMS and, by decision of the organizations, the FRs are managed mostly by women and young people. The project has managed to lay important foundations, which must be strengthened in the context of adaptation to climate change, and this is what the present project seeks to contribute with respect to the gender and diversity perspective.

~~68.~~

~~69-60.~~ A conceptual map of the project or Theory of Change is presented in "Annex 32: Theory

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of Change” and allows visualizing the link between the problems identified in the NOA Cuyo region of Argentina as priorities to be addressed in order to strengthen resilience community of rural populations and communities originating from the intervention areas and the proposed actions. Likewise, the four components in which the project is structured as “high-level change levers”, the expected results and the barriers to be overcome to achieve the expected impact at the end of the project are detailed.

Component 1: Improving access to water and promoting Sustainable Land Management Practices (SLMP) in rural populations of the NOA-Cuyo to reduce their vulnerability to CC.

61. Since it is evident that future climate changes will deepen the LDDD processes that are already present today in the project's intervention areas; the adoption and implementation by the population of SLMPs aimed at reducing and mitigating these impacts, is essential. Likewise, actions for the efficient use of water resources in all sectors that ensure the sustainability of the extraction and supply of fresh water to face water scarcity are key to adaptation to climate change. These two strategies will be implemented in individual or mixed proposals; keeping in mind that many SLMP are simultaneously efficient water use practices.

62. The implementation of the SLMP, contributes to the approach of different components of the integral management of climate risk such as the development of still incipient capacities in adaptation matters and reduction of inequities and socioeconomic inequalities, including those of gender. Also reduces impacts related to the increase in the annual average temperature, water stress due to increased temperature and a potential water crisis. Although, increase resilience in areas prone to disasters, from fragile and degraded ecosystems, arid and semi-arid and exposed to drought or desertification.

70.—

71. ~~For the selection of the SLMP and the measures aimed at the efficient use of water resources, the three key axes that run through the entire implementation of the project will be taken into account: EbA, CBA and gender and diversities.~~

72-63. Although there are multiple approaches and criteria to determine which are the SLMP according to the characteristics of each ecoregion, in general terms for a land use or management practice to be considered “sustainable”, it must provide the following benefits: a) preserve the physico-chemical properties and fertility of the soil; b) preserve water quality and tend to hydrological regulation; c) conserve biodiversity; d) set greenhouse gas emissions; e) contribute to the diversification and beauty of the landscape; f) preserve cultural identity; and, g) avoid contamination⁵ (SAyDS, 2019).

73. ~~The implementation of the SLMP will be carried out with a Rural Territorial Development approach, for which the actions will be privileged and articulated in a way that promotes an integral, balanced and sustainable development.~~

74-64. The SLMP to be promoted will be, initially (because new practices will continue to be adjusted and tested), those already tested and validated in the execution of the MST NOA-Cuyo project in order to reinforce its effective implementation (See Annex 4: Photographic record of MST NOA Cuyo Project) and which are:

- 1) Small water works: drip and sprinkler irrigation, repair of main and secondary canals, Australian plates, wells and tanks with solar panels, dams, dams to recover wetlands and flow measurement.

⁵ SAyDS (Secretaría de Ambiente y Desarrollo Sustentable de la Nación). 2019. Guía de prácticas de manejo sustentable de tierras y conservación de suelos. [REGIÓN NOROESTE] Catamarca, Jujuy, Salta, Santiago del Estero y Tucumán”. CABA: Secretaría de Ambiente y Desarrollo Sustentable de la Nación. Disponible en <https://www.argentina.gob.ar/ambiente/bosques/programa-accion-nacional/publicaciones>

Annex 5 to OPG Amended in October 2017

- 2) Agroecological production: compost, vermicompost and fertilization of soils in areas of agricultural and horticultural crops.
- 3) Management of land with pastures: production of winter greening, management of natural pastures in cattle fields and vicuña shearing areas, implantation and management of forest curtains,
- 4) Production of plants in nurseries, in addition to the use of non-wood forest products.
- 5) Improvement of water and groundwater quality, salinity regulation and efficient use of water.
- 6) Monitoring of climatic variables by installing meteorological stations
- 7) Protection against natural risks (prolonged droughts, avalanches, floods, fires)

~~75. In addition, new practices will continue to be adjusted and tested.~~

~~76. The implementation of the SLMP, contributes to the approach of different components of the integral management of climate risk such as the development of still incipient capacities in adaptation matters and and reduction of inequities and socioeconomic inequalities, including those of gender. Also reduces impacts related to the increase in the annual average temperature, water stress due to increased temperature and a potential water crisis. Although, increase resilience in areas prone to disasters, from fragile and degraded ecosystems, arid and semi-arid and exposed to drought or desertification.~~

65. The step prior to the adoption and implementation of the SLMP and the design and selection of measures to achieve efficiency in the use of water, is to carry out training sessions with the beneficiary communities. These trainings will be given as a workshop and will have work, communication and dissemination materials specially designed with a gender and diversity approach, for which the participation of women and LGBTI+ in the preparation stage is essential, together with the technicians, of the necessary material, guaranteeing the gender perspective. Likewise, each proposed participation instance will be accompanied by guides and protocols developed to facilitate and strengthen the involvement of the different actors in the execution of this project; both in the instances of work in the office and in the field.

77-66. *(Output 1.1.1: Local population trained and with access to materials and technical assistance for the efficient use of water resources; Output 1.2.1: Development and / or updating of guides and / or protocols for the implementation of SLMP at the local level in the selected ecoregions and critical areas; Output 1.2.2: Rural women and groups of women and diversities, participate together with technicians in the definition of priorities and training modalities and in the elaboration of a systematization of experiences and recommendations with a gender perspective).*

78-67. Once carried out the trainings, information exchange workshops and knowledge; the dissemination and awareness of adaptation to climate change, among other aspects, the necessary actions will be carried out to address the main problem faced by producers in the project intervention areas, which is the increase in the frequency and intensity of extreme events extremes, going from floods to periods of droughts where access to water is a strong limitation for the maintenance of local livelihoods. According to the emerging projections of climate models, these trends will continue to deepen in the future.

79-68. It is proposed to make available to small producers the necessary investments for the acquisition and use of appropriate water technologies for collection, harvesting and storage of water. These will allow efficient management of the resource to be carried out, storing water in periods of excess for later use in periods of deficit. (Ministry of Agroindustry of the Nation, 2018). These tools will be analyzed and selected according to their proven efficiency, with the modifications that may be necessary depending on the particularities of each intervention area, production systems and the socio-cultural profile of the beneficiary group. *(Output 1.1.2: Financing the necessary investments to achieve the sustainability of the extraction and supply of water; Output 1.2.3: Technical support for the development of local capacities for the adoption and implementation of SLMP linked in this case to the improved*

access to water).

80. For example, currently in the Cordilleranian Region an experience is being carried out with active community participation and application of techniques based on local knowledge and low cost, which tend to raise water levels, avoid runoff and erosion and increase the infiltration. One of these projects is the reactivation of lagoons, through the reconstruction of natural systems of dikes to increase the availability of water in the Lagunas de Guanacache (between Mendoza, San Juan and San Luis provinces). These water management techniques in some natural ecosystems are used to conserve biodiversity and habitats and thus improve the quality of life of the inhabitants who depend on them.

81-69. The promotion of the SLMP will be carried out both through non-refundable financial contributions and microcredits. The beneficiaries of these mechanisms will mainly be individual or grouped implementers (producers and land managers) of family farming and indigenous people communities, but they will also include medium-scale capitalized family producers and SMEs with the possibility of forming local value chains and / or expand the scale of impact.

70. Both for the implementation of the SLMP and the actions to improve access to water, the Revolving Fund (RF) mechanism will be principally used, ~~among others~~. A RF is a resource management instrument for organizations that have limited access to financing. It basically functions as a "resource box" that an organization manages and that "circulate", or "rotate", between it and its associates in the form of credits. These credits, both in money and in products or inputs, are mainly used to finance the productive activities of the members of the organization. When they repay the credits, the resources return to the fund so that they can be re-lent to other members of the group. ~~(UCAR, 2016). The scale in the use of these resources is "local" in the sense that their recipients share the same territorially based productive system that is, they share the same socio-economic activity and daily articulations in the same territory.~~

71. The Revolving Funds are, then, a form of local solidarity finance that can be defined as follows:

1. A financial tool managed by organizations that promote family farming in a given territory or local area.
2. Its source of financing is, in general, a subsidized resource, that is to say that its Funds come from State subsidies, National NGOs, International Cooperation, etc. It should be noted that many of the organizations combine resources from credits.
3. Its recipients (or "borrowers") are rural and peri-urban producers, organizations and communities.
4. They are aimed at financing productive and rural development projects that seek to solve local and/or regional needs regarding the improvement of production conditions, the reduction of desertification and drought in the territory and the increase in the quality of life of its population.
5. They are transferred to producers in the form of credit, both in cash and in products or supplies.
6. They are accompanied by other non-financial resources from the organization, such as training, technical assistance, accompaniment to producers, etc.
7. Their return plans (fees, terms, amounts) and guarantee mechanisms (individual or by solidarity group), seek to adapt to the characteristics of the producer, their income, status, activity, etc.
8. What is returned to the Fund does not remain there but a part is destined to cover the operating costs and another, called "rota", is re-lent to other producers. Is The latter makes the solidarity component of a Revolving Fund: its return implies the possibility of others to access the resource.
9. Management seeks to be participatory, involving those who live together on a daily basis with local problems and that can only be identified through the participation of their

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protagonists.

72. Argentina has experience in the implementation of RF. Some of these experiences can be found at National Institute of Agricultural Technology (INTA)⁶, the Department of Programs and Special Projects (DIPROSE) of the Ministry of Agriculture of the Nation for six different programs⁷ and at the MST NOA CUYO project. The results of these implementations, shows that: In the short term, 55% of the organizations indicate that the Revolving Funds contributed substantially to improving the quantity and quality of production, while 30% of the organizations express that the Funds helped significantly in the commercialization of the products. Of all the organizations consulted, 64% positively valued the contribution of the Revolving Funds in the generation of participation, self-management, commitment, collective growth and productive autonomy. Finally, Most of the experiences (88%) reveal that the Revolving Funds strengthened the family economy.

82-73. The resources that make up an RF make it possible to finance the individual activities of the producers at the same time that they contribute to promoting, or reinforcing, the joint projects of an organization. (*Output 1.1.2 Financing the necessary investments to achieve the sustainability of the extraction and supply of water; Output 1.2.3: Technical support for the development of local capacities for the adoption and implementation of the SLMP; Output 1.2.4: Financing of the necessary investments for the SLMP implementation*).

83. ~~The promotion and incentives to increase sustainable production and access to water systems that are already being applied by a considerable fraction of producers, is a primary adaptation strategy. In rainfed crops, certain management practices, such as fallow, crop sequence, reduced tillage and cover crops, increase water availability and improve adaptation to conditions of water stress (Quiroga and Gaggioli, 2011).~~

84. To guarantee the effective participation of communities and local actors in this component, it will act in synergy with Component 2 of ~~Strengthening community resilience for adaptation to CC.~~

74. **Component 2:** Strengthening organizations and rural women and diversities for adaptation to CC

85-75. Through the implementation of this component, the aim is to enhance the capacities of local producer groups and organizations and, fundamentally, of women producers that inhabit the prioritized ecoregions, to achieve their effective participation in the development processes of the territory and, in particular, in the LDDD prevention and mitigation actions and sustainable use of water for adaptation to climate change.

86-76. It is essential for community strengthening, technical support and accompaniment for the consolidation of local groups and organizations, through their formalization and legal and / or tax regularization. This increases the institutional sustainability of local groups, and their capacity for action, reducing the vulnerability of their members to climate change. (*Output 2.1.1 Legal, administrative, institutional and communicational / informative strengthening of the social organizations present in the intervention areas*).

87-77. The exchange of experiences between peers facilitates the transmission of practices and knowledge, while the possibility of articulating actions and exploiting synergies will result in the strengthening of local organizations and the increase of their capacity for action to face the climate change challenges.

88-78. Both the training for the community approach to the problems arising from climate change; such as promoting the exchange of experiences between organizations; they will be carried

⁶ https://inta.gob.ar/sites/default/files/script-tmp-inta_cipaf_fondos_rotatorios.pdf

⁷ https://magyp.gob.ar/sitio/areas/proderi/pdf/Sistematizacion_FOCOS_PRODRI.pdf

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out with a gender and diversity approach. (*Output 2.1.2 Exchange of experiences, articulation of goods, services, knowledge and knowledge provided; both between beneficiary social organizations and between them and other institutions linked to the Project*).

89-79. The training and accompaniment of women and diversities in matters of leadership, decision-making, conflict resolution, management and handling of information will be promoted. Likewise, technical support for the consolidation of local groups and organizations formed and led by women will be a priority in the implementation of the project. The transversal incorporation of the gender and diversities perspective in the actions of the project requires a specific space in which the gaze of women and other diversities is explicitly rescued, and the modes of training, dissemination and training are planned accordingly linked to the target population, to guarantee effective and equitable access to the goods and services provided by the project. (*Outputs 2.2.1: The role of women is strengthened in local rural groups or organizations, through training and support in the exercise of managerial roles*).

80. This support will be carried out through: the design and implementation of dissemination strategies and tools for the calls for the presentation of projects especially aimed at women and women's organizations; Technical assistance and financing through Non-reimbursable Contributions (NRC) for the implementation of subprojects led by women and women's groups and the promotion of the exchange of experiences between women and women's organizations with collective mapping of experiences, practices, difficulties and problems in around the organization of production, sustainable land management and their participation in the activities carried out.

81.

82. An important background to work on gender issues in the present project is constitute by the project MST NOA Cuyo that promoted in each component the active participation and contributed to the empowerment of women, which favored the strengthening and continuity of good practices in the territory. Although it was not a rule, it was encouraged that gender parity be taken into account in the formation of the MSC and, by decision of the organizations, the RFs are managed mostly by women and young people. The implementation of SLMPs and rotatory funds were opportunities to raise awareness on the importance of gender equality and women's empowerment within the communities. Women were able to design the scheme of rotatory funds and manage the administration of money, decide about the purchase of material and supplies, and the allocation of funds according to the regulations. During the meetings, they take decisions on rotatory funds and the works according to personal needs. In addition, Argentina is carrying out a process of mainstreaming the gender and diversity perspective in its climate agenda within the framework of the National Climate Change Cabinet.

83. Even so, much work remains to be done and it is the concrete contribution of this Project. In an initial gender analysis based on existing data (national statistics, academic field research and evaluation of participation in projects similar or earlier as the MST NOA Cuyo), some results for rural women of the NOA are: 1) Decrease in feminine population; 2) Young rural women between 15 and 34 years had, in average, 1.63 children compared to urban women that had 1.15 children between 2001 and 2010; 3) Families in charge of women increased in the same period; 4) Rural young women reached higher educational levels; 5) Number of employed rural women increased from 39.9% in 2001 to 45.6% in 2010, 6) Rural women carried out several different tasks: they had domestic tasks within their household, they worked in agriculture within the family farm and also outside home as a worker for a salary, 7) Society and often women did not recognize the daily value of feminine work unless it renders money; 8) The gap in the accessibility of health services, education and technology between rural and urban women implied a lower standard of living; 9) Some public policies made possible for women to get new social positions outside home developing new capacities for them and their families.

84. The level of structural poverty (NBI) was higher in the dispersed rural area of the NOA, due

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Annex 5 to OPG Amended in October 2017

to deficiencies in infrastructure for the provision and distribution of water to homes. Although there was a reduction of this indicator in the last intercensal period, it was low. The decrease in rural poverty in this region could be related with some improvements in infrastructure for water in homes, in higher level of education of heads and, in the case of households to position of women, to their greater labor insertion and, therefore, to the perception of better income.

85. The gradual equipment with electricity and water services in the scattered rural area, in the last decade, improved the quality of life of the entire population of these localities but, especially, that of women since they relieved the tasks assigned to the female role. These changes in the situation of rural women influenced, possibly, in their position within the household. A growing percentage of women rural areas in the NOA no longer lives in a situation of subordination to a male of the home, exercising the role of head. This was recorded by the sources consulted for young rural women and, mainly, in rural áreas concentrated.

90-86. A complete Gender Assessment for rural an indigenous women of the NOA of Argentina will be elaborate at full proposal stage.

Component 3: Financing and added local value

94-86. As a result of this component, it is expected that local and regional markets will be promoted as centers for the commercialization of products and the development of actions and investments aimed at added value for production associated with SLMPs and the efficient use of the hydric resources will be strengthened with a focus on AbE**E**bA and CBA.

92-87. To achieve this result, the project will make available to SMEs and local organizations of producers, the financing and support for the implementation of projects that provide goods, services and resources to improve access to local and regional markets, incorporate new or better processes and / or advance in the value chain, in such a way as to increase the economic results of the family units. The addition of value and local marketing increases the appropriation of benefits by rural families in the intervention areas, thereby increasing their resilience to the adverse effects of climate change. Within this framework, the creation of short marketing circuits in local and regional markets for productions associated with SLM practices will be supported, as well as the development of locally integrated value chains, supply systems or local or regional chains. (*Output 3.1.1. Goods, services and resources available to SMEs and local organizations of producers for commercialization and the addition of local value*).

93-88. The rescue of local practices and knowledge will cross the entire project by adopting a C**b**B**A** approach. Opportunities will be identified and developed to value practices and knowledge from the differentiation of products, favoring community strategies such as Participatory Guarantee Systems (Fernandez, 2018). (*Output 3.1.2 Incorporated differentiation strategies to value or promote local and traditional knowledge and practices*).

94-89. Access to financing constitutes one of the main barriers to the adoption and continuity of SLMPs, and other investments necessary to sustain production and commercialization by small family producers. At the same time, the management of financial resources by local organizations strengthens their management capacity and expands their capacity to generate positive impacts on the well-being of the community. For this reason, the project will develop and implement, together with local organizations, the constitution of revolving funds for financing through microcredits aimed at the rural population of the prioritized areas. These mechanisms have already been successfully applied in the region through the MST NOA-Cuyo project (UNDP ARG 14 / G55), and there is a high unmet demand that requires the expansion of this tool. For it:

- Capacity will be developed at the level of the communities and organizations for the managvgfnf

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- HBJement of resources and financing mechanisms,
- the design, implementation and management of credit operations managed by producer organizations that develop MST subprojects will be technically supported, and
- The creation of revolving credit funds will be financed and their execution will be monitored.
- In addition, learning and good practices on the management of revolving funds that serve to replicate successful experiences and / or disseminate lessons learned will be systematized.

(Output 3.1.3 Locally managed financing mechanisms available to SMEs and local producer organizations)

Component 4: Knowledge management and project sustainability *Project management, monitoring, evaluation and knowledge management*

90. Knowledge management would enable one community to learn from the experiences of another to be able to tackle a common situation. This would save the time, costs on research and avoid reinventing the wheel if knowledge were managed to promote knowledge sharing and transfer. It is therefore important to understand what 'knowledge management' is and how it can be applied in the context of climate change adaptation. Knowledge management enhances climate change adaptation development.

95-91. In this component, the participation of the community is foreseen through a space for dialogue of knowledge where the exchange of lessons learned is promoted. With a CbBA approach, a systematization of local knowledge will also be considered, as a useful tool for decision-making processes, since traditional and ancestral knowledge provide information for a better understanding of climate variability at the local level and, also, strengthen the generational renewal of knowledge. *(Output 4.1.1 Knowledge dialogue space where the exchange of lessons learned and the systematization of experiences is promoted, and local knowledge is consolidated as a useful tool for planning and evaluating the project).*

92. With the same approach, therefore, the project's dissemination materials (printed and audiovisual), its results and lessons learned, will be developed and published under this component, designed in such a way that they are appropriate for the target population. *(Output 4.2.2 Internal and external communication materials of the project facilitate the articulation between components and partners and the dissemination of results and lessons learned).*

93. In addition, knowledge management can be used as a tool for capacity building, which is a mayor strategy for the project sustainability. In this context, Specialized Technical Assistance in Strengthening Local Organizations, in marketing, local value added and short circuits and in the design and implementation of revolving funds, will be deliver during all the project cycle. The trainee actions in climate change adaptation, in SLMPs and efficient water use are also consider capacity-building strategies.

94. Finally, like adaptation, knowledge management is a dynamic process, which must be constantly capture and update. For this, it is propose to create a Regional Knowledge Sharing Adaptive Platform which will have at least the following content: best SLMPs inform; plans to learn from relevant projects, programs, initiatives & evaluations and the processes to capture, access, and document information, which can be routinely updated throughout and after project implementation.

96-97. This component also contemplates the implementation of a monitoring system of the project results and its indicators, including their spatial expression through geographic information systems. This will feed into the project's annual planning and evaluation activities, as well as external evaluations. Lastly, this component includes the activities and resources properly of management and coordination, for which the constitution of focal points in the region will be

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~~privileged, with all the human and material resources necessary for a correct implementation of the project.~~

B. *Describe how the project provides economic, social and environmental benefits, with particular reference to the most vulnerable communities, and vulnerable groups within communities, including gender considerations. Describe how the project will avoid or mitigate negative impacts, in compliance with the Environmental and Social Policy and Gender Policy of the Adaptation Fund.*

~~98-95.~~ The project's goal is to contribute to the adaptation of rural communities in the drylands from the Northwest and Cuyo Argentinian regions, reducing their vulnerability to the impacts of climate change. This vulnerability is evidenced both in the intrinsic susceptibility of agri-food systems conditioned by the altitude, geology and geomorphology of these drylands; as well as the vulnerability of rural populations and indigenous people who inhabit them in conditions that often fail to meet their basic needs.

~~99-96.~~ The rural population of these provinces is approximately 3.7%, totaling approximately 350,000 people and this number includes the poorest in the region with subsistence living standards. The agricultural exploitations of small producers with fewer resources (Type 3: with fewer productive resources that cannot live exclusively from their exploitation), show the highest percentages in the regions that make up northwestern Argentina, representing more than 70%.

~~100-97.~~ Likewise, climatic, edaphological and geomorphological variables determine a limited soil support for productive economic activities and condition the rural population density due to difficult accessibility and enormous complexity for the provision and support of infrastructure, transport and connectivity services.

~~101-98.~~ For this reason, the project is essential to strengthen the community resilience of rural dryland populations, paying special attention to the most vulnerable.

~~102-99.~~ This strengthening will be achieved through:

1) The efficient use of water resources ensuring the sustainability of the extraction and supply of fresh water to face scarcity and the adoption and implementation of SLMP to prevent, reduce and/or mitigate LDDD, revaluing cultural practices and the strengthening of the sustainable and resilient management of agroecosystems that contribute to the achievement of food security in the face of the impacts of climate change. This will directly result in reducing the pressure that is currently generated in drylands by the unsustainable use of them; reducing also the anthropic processes of degradation and as a consequence, the synergistic effects that occur with the climatic trend of the region.

2) Strengthening the capacities of local groups and organizations of producers, both in the adoption and implementation of SLMP to obtain more and better products without compromising the capacity of the system, as well as in their subsequent commercialization.

3) The empowerment of women and rural diversities that inhabit the prioritized ecoregions to achieve their effective participation in the territorial development processes; among other proposed adaptation measures. ~~It is expected that the participatory processes included in the development of the project will enhance the local capacity for grouping and collective decision-making. The identification of common problems and the search for solutions with the greatest degree of scope will also serve to improve social cohesion.~~

~~103-100.~~ To achieve these results, the project will provide training with access to informative materials, guides and protocols for the adoption and implementation of the SLMP and permanent technical assistance, both within social organizations and with producers in the territory. Likewise, it will provide the necessary financing for infrastructure and measures that

improve access to water and the implementation of SLMP; Rotary Funds and investments aimed at adding value for production associated with SLMP and the efficient use of water resources with a focus on EbA and CbBA. Finally, a permanent space for dialogue of knowledge will be fostered where the exchange of lessons learned and the systematization of consolidated local knowledge will be promoted as a useful tool for decision-making processes.

C. Describe or provide an analysis of the cost-effectiveness of the proposed project

~~104~~.101. Given the social and economic reality of rural communities and indigenous people of the Northwest region and Cuyo of Argentina and the intrinsic environmental characteristics of the drylands of these areas; the climatic threats foreseen for these regions become more relevant, where in the near future they will face increasing water stress due to an increase in temperature without significant changes in precipitation.

~~105~~.102. This implies that, throughout the century, desertification processes would accelerate with less efficiency in the use of water by ecological systems, lower productivity, and greater fragmentation, loss of soil and nutrients and, possibly, landslides. Reduction of the geographic range of some species, with the consequent local extinction of some of the less tolerant to the new environmental conditions. There will be a reduction in the ice and snow cover that will lead to continue modifying the annual cycle of rivers, increasing winter flows and reducing those in summer. There will be an increase in heat wave days; an increase in the height of the 0° C isotherm and more favorable conditions for grassland fires and increased stress on livestock; among other impacts. All this, impacting on the most vulnerable sectors of the rural population of the Northwest and Cuyo.

~~106~~.103. Climate change and human-induced land degradation have increased the vulnerability of the NOA and Cuyo communities in Argentina. Among the present and future expected impacts in the region are mentioned:

- Difficulty in access to water, especially for rural populations
- The increase in heat waves can generate strong impacts, since this region presents greater social vulnerabilities to disasters.
- The increase over favorable conditions for the development of forest, rural and grassland fires and greater stress in livestock and in different productive sectors, due to longer dry periods during winter and spring.
- The acceleration of desertification processes with impact on ecosystems, changes in the geographic range and extinction of less tolerant species.
- The retreat of rock glaciers, and consequent changes in hydrological regimes
- An increase and prolongation of periods of water shortage in the region, with significant negative effects on all sectors of the population, but especially on communities in vulnerable situations and on productive agricultural and livestock activities.
- Restrictions on the availability of water for olive, viticulture and fruit and vegetable irrigation, for the generation of hydroelectric energy and for other industries, such as mining.

~~107~~. All this has repercussions in the loss of livelihoods for thousands of small subsistence farmers and their families, abandonment of small and medium farms and rural villages, deterioration of rural infrastructure and pressure on productive ecosystems. The aforementioned factors further contribute to decreasing climate resilience and adaptive capacity.

~~108~~.104. To this must be added the context of the COVID-19 crisis, understanding that any measure to adapt to the future impacts of climate change must take into account poverty and fiscal repercussions. In Argentina, the COVID-19 crisis has put significant pressure on the government budget and caused an increase in poverty. (World Bank, 2021).

~~109~~.105. Faced with this situation, the socioeconomic and environmental cost of inaction is constantly increasing over time.

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~~410-106.~~ This can be reflected in the declarations of Emergency and Agricultural Disaster within the framework of Law No. 26.509, in the departments where this project will intervene. In the last six years, all relevant departments (except those of the Province of San Luis, without data) have been declared an emergency or agricultural disaster on at least one occasion due to drought or extreme rainfall that lead to floods (not counting hail or late frost emergency declarations). The productions affected were major and minor livestock (Puna Jujeha and Guanacache Lagoons) Quinoa, Andean potato and other tubers (Puna Jujeha), blueberries, chickpea, wheat and potatoes (Calchaquies Valleys), olive trees (Bolsón de Fiambalá and Guanacache Lagoons), vine and fruit and vegetable crops (Guanacache Lagoons) and agricultural production in general (Puna Jujeha and Calchaquies Valleys)⁸.

~~411-107.~~ It should be noted that the declaration of Agricultural Emergency or Disaster implies that producers in these areas may have lost more than 50% or 80% of their crops (emergency and agricultural disaster respectively). If only bovine production is considered, in 2020 the reference departments concentrated 39,409 head (MAGyP, 2021), which according to the efficiency indices in the corresponding provinces (MAGyP, 2019) would generate an annual productivity of about 5,932 head, with an estimated standing value of US \$ 2,473,000 / year. The recurring emergency situations and agricultural disaster caused by drought and extreme hydrological events would put at least half of this productivity, that is, more than 1.2 million US \$ / year. The cost could be higher since these adverse situations frequently cause death of the productive stock, which is much more expensive and difficult to recover.

~~412-108.~~ Regarding the wine industry, North of Mendoza, Catamarca and NOA regions (which encompass the project intervention areas), generated exports for US\$ 42,164,000 in 2020 (~~Instituto Nacional de Vitivinicultura – INV, 2020~~). On the other hand, the area with vineyards in the relevant departments for the project represents 15% of the national total (~~INV, 2021~~). According to a study carried out by both the Argentine Wine Grower corporation and the Argentine Wine Grower Observatory (2018), the wine chain contributes 0.4% of the GDP of the Argentine Republic (2,574 million U \$ in 2017), and generates 373,000 jobs direct and indirect work. Assuming a participation proportional to the surface area, it means that the wine production in the project implementation area generates an annual added value of US \$ 386,000,000, and 56,000 jobs. Beyond the aforementioned effects ~~on the occasion of emergencies caused by recent climatic events;~~ ~~T~~he medium and long-term climatic scenarios place the wine production and other production based on the irrigation valleys of Cuyo and the NOA, in a situation of high vulnerability due to the effects of climate change on the retreat of glaciers and the expected hydrological changes, being able to compromise a substantial part of the production.

~~413-109.~~ The main and most direct compensation policy on the part of the National State in the face of adverse effects caused by weather contingencies is Law No. 26,509 on Agricultural Emergency. It establishes a fixed annual fund of 500 million pesos, currently equivalent to 4.7 million US\$, intended to compensate affected producers in delimited areas throughout the country, and to rebuild damaged infrastructure. The law also provides for tax deferral and exemption measures, as well as credits with a 25% reduction in interest rates. The provincial states in turn replicate the same type of aid. All this is burdensome for the National and Provincial States, and adds to the loss of production and economic activity. In addition, the access and adaptation of this type of instruments for small producers has been questioned (Casparri et al., 2014)

~~414-110.~~ This project proposes instead to develop capacities, knowledge, and material investments to reduce vulnerability to climate change, instead of trying to compensate without success for its adverse effects. It is also aimed at a particularly vulnerable population and region, and will use a participatory and inclusive approach, guaranteeing the ~~appropriability~~ ~~appropriation~~ of actions and the empowerment of local actors to plan and carry out new

⁸ https://www.agroindustria.gob.ar/sitio/areas/d_eda/resoluciones/

initiatives in the future.

415.111. It should be noted that of the total proposed investment, 69% will be used for capital investments, and 6% for training activities and exchange workshops; resources that increase physical and human capital and that will remain permanently in the region.

416.112. The investment proposed in this framework is moderate, equivalent to two years of the current policy of compensation for emergencies and agricultural disasters, and well below the estimated costs of inaction. It is also cost effective since it takes advantage of lessons learned and experiences developed in the MST NOA-Cuyo Project (UNDP ARG 14 / G55), expanding its scope and the depth of its achievements.

D. Describe how the project is consistent with national or sub-national sustainable development strategies, including, where appropriate, national adaptation plan (NAP), national or sub-national development plans, poverty reduction strategies, national communications, or national adaptation programs of action, or other relevant instruments, where they exist.

417.113. The Argentine Republic has participated actively and uninterruptedly in international negotiations on environmental matters in general, and in those related to climate change in particular. In this sense, through Law No. 24,295, sanctioned in December 1993, our country approved the United Nations Framework Convention on Climate Change (UNFCCC) as a non-Annex I country. Along the same lines, through the Law No. 25,438 of June 2001 approved the Kyoto Protocol, as well as the Paris Agreement through Law No. 27,270 of September 2016. Finally, in December 2019 the Argentine Republic ratified its political commitment in the fight against climate change by approving Law No. 27,520 on Minimum Budgets for Adaptation and Mitigation to Global Climate Change (Climate Change Law) and its Regulatory Decree No. 1030/202039. Said law reaffirms and regulates the international commitments assumed, and strengthens national climate policy and subnational planning, establishing minimum environmental protection budgets to guarantee adequate actions, instruments and strategies for adaptation and mitigation to climate change throughout the national territory.

418.114. In compliance with the commitments assumed in the framework of the UNFCCC, Argentina has presented to date: three National Communications (1997, with the greenhouse gas inventories of 1990 and 1994; 2008, with the inventory of the year 2000 and 2015, with the GHG inventory of 2012); three Biennial Update Reports (BUR for its acronym in English 2015, 2017 and 2019) two Nationally Determined Communications (NDC), one in 2015 and the other in 2020 and the National Adaptation Plan and Climate Change Mitigation (RESOL-2019-447-APN-SGAYDS # SGP) which is in the process of updating.

419.115. This political, institutional and normative context in the matter of climate change which is actual in Argentina, has been taken into account as a theoretical and conceptual framework for the design of this project; as well as the information generated and systematized in the documents developed as part of the commitments assumed by the country, which has been the main input to guide the contents. In the case of the NDCs, the sectorial plans and the National Climate Change Adaptation Plan, which is currently being updated, have served to contextualize the strategic lines of intervention.

420. The project takes into account 3 of the cross-cutting approaches that guide the country strategy for adaptation to climate change: gender and diversity, ecosystem-based adaptation, and community-based adaptation.

421. In this sense, the project prioritizes the needs of social groups in conditions of greater vulnerability to climate change, such as rural communities and indigenous people of the drylands of northwestern Argentina, with special emphasis on the gender perspective, so that gender is not a reason for social, political and economic inequality. The project contributes to the guiding principles of the Argentine Republic outlined in the NDC, where it

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Annex 5 to OPG Amended in October 2017

is proposed to mainstream the gender and diversity perspective in climate change mitigation and adaptation policies.

~~122.~~ For this reason, for women and LGBTI+ to have social and environmental conditions of habitability of the territories, their active participation in the consultation and decision-making processes is promoted, strengthening their voice and representation on the territories they inhabit through access to material resources, educational, informative, formative, financial and technological and the construction of strategic alliances that strengthen their role as agents of change in the processes of adaptation and mitigation to climate change.

~~123.~~ Likewise, the project will use the EbA approach promoted by the country as a fundamental support for the conservation, restoration and sustainable management of ecosystems, especially native forests, wetlands, peat lands, natural grasslands and other ecosystems with carbon significant content, contributing to the absorption and storage capacity of carbon, reducing vulnerability, and increasing the resilience of ecosystems and the communities that inhabit and depend on them.

~~124.~~~~116.~~ The adoption and implementation of SLMP and of measures to improve access to water contribute, first of all, to the fundamental priority of safeguarding food security, contributing to the reduction of poverty, hunger and the vulnerability of food production systems in the face of the adverse impacts of climate change. Second, they help prevent, reduce and / or reverse LDDD processes; contributing to the country's public policies framed in the commitments assumed with the UNCCD such as the National Action Plan to Combat Desertification, Land Degradation and Drought Mitigation (PAN); the Voluntary Goals for Land Degradation Neutrality and the Provincial Action Plans to Fight LDDD of the Jujuy and Tucumán provinces.

~~125.~~~~117.~~ Participation and access to information are other of the pillars on which the project has been developed according to the instances provided for training, communication and dissemination and the exchange of experiences between social organizations as fundamental measures of knowledge management.

E. Describe how the project meets relevant national technical standards, where applicable, such as standards for environmental assessment, building codes, etc., and complies with the Environmental and Social Policy of the Adaptation Fund.

~~126.~~~~118.~~ The Project will comply with all the applicable local and national regulations regarding Environmental and Social Screening, Assessments and Monitoring including participation and consultation and access to public information requirements. It will also comply with CAF and AF Environmental and Social Policies and an Environmental and Social management instrument will be developed for the whole Project's implementation and administration. The Project will also consider national and local laws regarding technical standards, procurement, NPA, land management, construction codes, among others.

NATIONAL LEGISLATION IN WHICH THE PROJECT IS FRAMEWORKED		
THEME	LEGISLATION	DESCRIPTION
General Regulatory Framework	National Constitution	Art. 41. All inhabitants enjoy the right to a healthy, balanced environment, suitable for human development and for productive activities to satisfy present needs without compromising those of future generations; and they have a duty to preserve it. Environmental damage will give priority to the obligation to repair, as established by law. Art. 121: The provinces retain all the power not delegated by this Constitution to the Federal Government, and that which has been expressly reserved by special agreements at the time of their incorporation.
Environment	Law N° 25.831	It establishes minimum budgets for environmental protection to guarantee the right of access to environmental information held by the state.

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Annex 5 to OPG Amended in October 2017

	Law N° 25.675	General environmental law. It establishes the minimum budgets for the achievement of a sustainable and adequate management of the environment, the preservation and protection of biological diversity and the implementation of sustainable development.
Biodiversity	Law N° 24.375	Adherence to the agreement on the protection of Biological Diversity.
	Law N° 19.282	Approves the adherence of the Argentine Republic to the "Agreement for the Conservation of the Vicuña"
	Law N° 25.861	The breeding of the guanaco (Lama guanicoe) is declared of national interest, throughout the territory of the Nation.
	Law N° 22.421	Protection and Conservation of Wild Fauna.
	Law N° 23.918	Approves the Convention on the Conservation of Migratory Species of Wild Animals.
	Law N° 26.331	Law of Minimum Budgets for Environmental Protection of Native Forests. It establishes the minimum budgets for environmental protection for the enrichment, restoration, conservation, use and sustainable management of native forests.
Heritage	Law N° 21.836	Approves the Convention on the Protection of the World Cultural and Natural Heritage – UNESCO.
Protected Areas	Law N° 22.351	Parks, National Reserves and Natural Monuments.
Wetlands	Law N° 23.919	Approves the Convention on Wetlands of International Importance, especially as Waterfowl Habitat.
Glaciers	Law N° 26.639	Minimum Budget Regime for the Preservation of Glaciers and the Periglacial Environment.
Climate Change	Law N° 24.295	Approves the United Nations Framework Convention on Climate Change
	Law N° 25.438	Approves the Kyoto Protocol of the United Nations Framework Convention on Climate Change
	Law N° 27.270	Approve the Paris Agreement
	Law N° 27.520	Minimum Budgets for Adaptation and Mitigation to Global Climate Change.
Soil	Law N° 22.428	Legal regime for the promotion of private and public action aimed at the conservation and recovery of the productive capacity of the soil
	Law N° 24.701	Approves the United Nations Convention to Combat Desertification in Countries Experiencing Serious Drought or Desertification, particularly in Africa.
Water	Law N° 25.688	Environmental Water Management
Fire	Law N° 26.815	Minimum Budgets for Fire Management
Indigenous people	Law N° 24.071	Approved Convention 169 of the International Labor Organization on Indigenous and Tribal Peoples in Independent Countries.
	Law N° 26.160	It declared an emergency in terms of possession and ownership of the lands traditionally occupied by indigenous communities originating in the country with legal status registered in the National Registry of Indigenous Communities, in a competent provincial body or in pre-existing ones.
	Law N° 26.994	Approved the reform of the Civil and Commercial Code of the Nation in which the rights of indigenous peoples and their communities are mentioned in the following articles: 14, 18, 225 and 240.
	Resolution 328/2010	Created the National Registry of Organizations of Indigenous Peoples (Re.No.Pi.).
	Law N° 27.118	It declares family, peasant and indigenous agriculture to be of public interest.
Gender	Law N° 26.485	Comprehensive Protection to Prevent, Punish and Eradicate Violence against Women in the Areas in which they Develop their Interpersonal Relationships
	Law 26.743	Gender identity
	Law 26.061	Comprehensive Protection of the Rights of Children and Adolescents

PROVINCIAL LEGISLATION APPLICABLE TO THE PROJECT								
THEME	LEGISLATION	PROVINCES						Main link with the project
		Jujuy	Tucumán	Catamarca	San Juan	San Luis	Mendoza	
General Regulatory Framework	Provincial Constitution	yes	yes	yes	yes	yes	yes	All the project
Water	Water code	Law N° 161	Law N° 7.139	Law N° 2.577	Law N° 4.392	Law N° VI-159-2004	Law N° 1920	Component 1

Annex 5 to OPG Amended in October 2017

Suelo	Provincial Law	Law N° 3.785	Law N° 5.294	Law N° 2.480	Law N° 260	Law N° IX-315-2004	Law N° 4.597	Component 1
	Other related laws: drylands and arid zones	S/D	Law N° 8.865 Law N° 6.290	S/D	Law N° 820	S/D	S/D	
Ambiente	General law			S/D	Law N° 6.634	S/D		All the project
	Environmental impact assessment	Law N° 5063	Law N° 6.253	S/D	Law N° 6571	Law N° IX-0876-2013	Law N° 5.961	Component 1
Biodiversity	Native forests	Law N° 6.097	Law N° 8304	Law N° 5311	Law N° 1439-L	Law N° IX-0697-2009	Law N° 8.195	Component 1
Climate change	There is no specific legislation at provincial level							
Glaciers	S/D	Ley N° 6.218	S/D	S/D	S/D	S/D	S/D	
Fire	S/D	Ley N° 5.018	S/D	S/D	S/D	Ley N° IX-0328-2004	S/D	Component 1

427-119. Evidence Base Identification will assess all the components of the project, taking into account the activities of the project, and the methodology used in previous proposal project presented by the implementation agency CAF.

- Description of Expected Outputs and Activities
- Evidence Base Risk Identification
- Risks Identification per E&S Principles
- Activity Identified risks in accordance with AF's E&SP and Potential E&S Impacts

Table 1. Expected Outputs and Activities

OUTPUT	ACTIVITY

Table 2. Evidence Base Risk Identification

Checklist of E&S Principles	Questions	Yes / No	Evidence Base Identification
1 - 15	Questions related to the AF E&S Principles and evidence needed to be presented by the project	Answers	Description of the evidence base identification

Table 3. Risks Identification per E&S Principles

Risks Identification per E&S Principles		
Checklist of E&S Principles	Risk Associated	Risks Associated
1 - 15	YES / NO	Description of the Risks Associated

Table 4. Activity Identified risks in accordance with AF's E&SP and Potential E&S Impacts.

Activity	Risks Identified in accordance with the Adaptation Fund environmental and social policy	Environmental and social impacts in case risks materialize

Table 2. Categorization definition

Questions	Component Answer YES / NO

Annex 5 to OPG Amended in October 2017

	1	2	3	4
Does the Project Outputs / Activities have significant adverse environmental or social impacts that are diverse?				

~~128-120.~~ The Project will be developed in accordance with the applicable national technical regulations and standards and will be executed in inter-sectorial and intergovernmental cooperation at different levels, both national, provincial and local. The project will be implemented by the national agencies and their provincial counterparts authorities in charge of compliance with national laws and standards and provinces in terms of production, environmental protection, regulatory frameworks on climate change, with a focus on the processes of poverty reduction and social inclusion, pillars of the National Government scheme.

~~129.~~ The project will be developed in accordance with the applicable national and provincial technical standards and regulations, and will be executed in cooperation between the different technical agencies of the National Government and of these with the provinces. Likewise, the interaction with the local institutions operating in the territory will allow an adequate consideration of the social and environmental regulations of different jurisdictions that apply to the execution of the project. Thus, the general legal framework for the implementation of the project is based on the General Environmental Law No. 25,675, which determines the legal principles of public environmental policy such as legal consistency, prevention, precautionary principles, intergenerational equity, continuous improvement, subsidiarity, solidarity and cooperation. This law commits, among other aspects, the obligation to carry out an Environmental Impact Assessment (EIA), as well as the participation of affected stakeholders and the public when there is a project that meets said requirement within the framework of provincial legislation concordant on the matter.

~~130-121.~~ Another point of importance lies in the fact that all the activities that this project implies will be oriented by the guidelines of the processes of free, informed and consented consultation established by national protocols. In particular for the approach to work with the native population, which constitutes an important part of the target population of this proposal, the project will be conducted following the guidelines established by current national and international legislation on the matter, paying special attention to the appropriate use of the forms and the language to guarantee the participation of the communities, and the incorporation of their visions in the implementation of subprojects.

~~131-122.~~ It should be noted that the proposed climate change adaptation strategies are aimed at raising sustainability parameters and contributing to the achievement of the environmental goals set by the SDGs by promoting and implementing sustainable land management practices. The project also recognizes antecedents in the activities carried out by various institutions such as INTA and IADIZA and by a series of previously executed projects such as LADA and the UNDP Arg / 14 / G / 55 project. For the design of the strategies, results, goals and activities, we started from the systematization and the lessons learned from these experiences. Regarding the promoted practices, they are based on existing practices in the territory and applied for a long time by the NOA producers. Through the aforementioned interventions, these practices have been adapted and modified in order to reduce negative impacts and promote sustainable management, and in this way the practices promoted by this project are widely tested and have broad social acceptance.

F. Describe if there is duplication of project with other funding sources, if any.

123. There is no duplication with other funding sources. Although different initiatives have been implemented and/or are being implemented in the area of intervention of the project, none of them have as their central axis the contribution to the adaptation of rural communities in the drylands of northwestern Argentina, reducing their vulnerability to the impacts of climate change.

Annex 5 to OPG Amended in October 2017

~~132.124.~~ Although other initiatives are being implemented in the project intervention area both from the MAYDS and from other areas of the national and provincial government, none of them has as a central axis the strengthening of the community resilience of rural populations and indigenous people, most vulnerable in the northwest region and Cuyo of Argentina. Furthermore, the comprehensive approach to the territory, simultaneously addressing the synergy between LDDD and the impacts of climate change, taking as strategic axes the improvement of access to water and the implementation of SLMP through the organized and empowered community, represents an innovative approach that seeks respond to different edges of the same problem.

~~133.125.~~ Financial support from the Adaptation Fund is essential to carry out measures that otherwise would not be feasible to be carried out, substantially delaying the much-needed actions that allow small producers to improve their quality of life and protect their means of life subsistence, which are strongly threatened by the adverse effects of climate change in an inherently very vulnerable region such as drylands.

~~126.~~ Through the implementation of this project, it seeks to complement other initiatives that are (or were) executing in the territory by the MAYDS and to respond to the existing gaps, in order to accelerate the processes of adaptation to climate change. Through the implementation of this project, it seeks to complement other initiatives that are operating in the territory and to respond to the existing gaps, in order to accelerate the processes of adaptation to climate change.

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<u>Initiative/program/project</u>	<u>Executed or running</u>	<u>Financing</u>	<u>Complements/Synergizes/Reinforces</u>
<u>Sustainable Land Management Project in the Dry Zones of Northwest Argentina (GEF/UNDP ARG/14/G55)</u>	<u>Executed</u>	<u>GEF</u>	<u>Reinforces. The present project represent the continuity, upscaling and updating of this previous initiative in the framework of adaptation to climate change.</u>
<u>Increasing Climate Resilience and Improving Sustainable Land Management in the Southwest of the Province of Buenos Aires (IBRD-TF 015041-AR / P125804)</u>	<u>Executed</u>	<u>Adaptation Fund</u>	<u>Complements. The present project will contribute to projects previously executed by the FA, with information on new territories and lessons learned regarding adaptation to CC and in turn, will benefit from the knowledge acquired for efficient management and administration of financing and the achievement of objectives.</u>
<u>Adaptation and resilience of family farming in Northeast Argentina (NEA) to the impact of climate change and its variability</u>	<u>Executed</u>	<u>Adaptation Fund</u>	
<u>Decision support for the integration and scaling up of Sustainable Land Management FAO - GCP/GLO/337/GFF</u>	<u>Executed</u>	<u>GEF</u>	<u>Complements.</u>
<u>National Forest Management Plan with Integrated Livestock (MBGI in Spanish)</u>	<u>Permanent</u>	<u>MAYDS</u>	<u>Complement and synergizes. The present project will contribute with SLMPs</u>
<u>Community Forest Management through Comprehensive Community Plans (Native Forests and Community Project / IBRD 8493 – UNDP ARG/15/004)</u>	<u>Executed</u>	<u>MAYDS</u>	<u>Complement and synergizes. The present project will contribute with SLMPs</u>
<u>Incorporation of the</u>	<u>Executed</u>	<u>GEF</u>	<u>Complements.</u>

Annex 5 to OPG Amended in October 2017

<p><u>sustainable use of biodiversity in the production practices of small producers to protect biodiversity in forests of high conservation value in the Atlantic Forest, Yungas and Chaco Ecoregions"</u> (Sustainable Use of Biodiversity Project - USUBI- / GEF N°5338 - UNDP ARG/15/G53)</p>			
<p><u>Incorporation of the conservation of biodiversity and sustainable land management (MST) in development planning: operationalize the Environmental Planning of the Territory in Argentina / OAR ARG / 19/G24*</u></p>	<p>Running</p>	<p>GEF</p>	<p>Complements.</p>

434.

435-127. One of the initiatives already implemented and finalized that the project will complement is the Inclusive Rural Development Program (ProDERI). The purpose of this program is to promote the improvement of the social and productive conditions of poor rural families and the increase of their income, as a result of the increase of their production, the insertion in value chains and the creation of job opportunities. The Program is national in scope, with priority for the northwestern provinces and progressive scope for the rest of the country, with a temporary extension of six years. It is financed by the National State through direct funds and credits taken with international organizations. To its general strategy, three transversal strategies are added: the Gender Strategy, the Strategy for Attention to the Environment and Adaptation to Climate Change and the Strategy for Indigenous People. The Strategy for Attention to the Environment and Adaptation to Climate Change incorporates the notion of caring for the environment, with special interest in mitigating local impacts and adaptation measures to climate change. Some of the possible actions from this perspective are the incorporation of measures for the improvement of agricultural practices and the mitigation of environmental impacts in business plans and projects, development of pilot climate insurance systems, contingency funds and early warning systems, among others.

436-128. Finally, the project will complement, expanding the territory of intervention and the knowledge acquired at present, the two projects already executed with financing from the Adaptation Fund in the Argentine Republic:

- 1) Increasing climate resilience and enhancing sustainable land management in the southwest of the Buenos Aires province (2013-2017) and
- 2) Adaptation and resilience of family farming in Northeast Argentina (NEA) to the impact of climate change and its variability (2013-2017).

G. *If applicable, describe the learning and knowledge management component to capture and disseminate lessons learned.*

437-129. The project includes a specific section on knowledge management within Component 4, which aims to generate spaces for dialogue of knowledge where the exchange of lessons learned and the systematization of local knowledge are promoted, consolidating them as a strategic tool for the processes of decision making. In addition, as a result of the

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synergy that occurs in these intersectional spaces of exchange and co-production of knowledge, the impacts of the project are maximized.

~~138-130.~~ Likewise, knowledge management has elements in each component of the project in order to strengthen the capacities of producers from NOA and Cuyo de Argentina in relation to the theme of variability and climate change and its impacts; as well as the synergy that occurs between these and the LDDD.

~~139-131.~~ In this context, the development of specific activities to rescue the knowledge and perspectives of the beneficiary population and its diversities, with a gender and CbA approach, is foreseen for: prioritizing and designing materials and training activities (guides and protocols of good practices); the systematization of experiences and lessons learned; monitoring and evaluation of actions; and the systematization of experiences and lessons learned, as well as the development of appropriate dissemination materials for distribution among various stakeholders.

~~140-132.~~ These reports, in turn, are the input for the “triple loop” learning mechanism, since they systematize the progress, identify the achievements, and allow the analysis and review of the necessary adjustments for the remaining stages of the project.

H. *Describe the consultative process, including the list of stakeholders consulted, undertaken during project preparation, with particular reference to vulnerable groups, including gender considerations, in compliance with the Environmental and Social Policy and Gender Policy of the Adaptation Fund.*

~~141-133.~~ Although a specific consultation process has not been carried out for the preparation of this project concept stage; its proposal arises from extensive participatory and consultation processes carried out within the framework of national planning of policies for adaptation to climate change. In this sense, specific work spaces are being generated by sector, for each region established according to the Federal Council for the Environment (COFEMA) and with the rest of the stakeholders (civil society organizations, academia, private sector, workers and citizens in general), within the framework of the National Climate Change Cabinet (GNCC). With the various sectors of the national government and the provinces, work has been carried out in an articulated manner through the GNCC Working Groups and the Regional Adaptation Workshops, respectively. In the same sense, within the framework of the Expanded Table of the GNCC, meeting and training spaces were generated that allow strengthening the national planning process of adaptation and mitigation to climate change, seeking greater representation regarding the needs and priorities of the different regions and stakeholders. (MAyDS, 2021). So far in 2021, the process of civil society participation for the preparation of the National Adaptation Plan has been developed in 3 instances, in which it was sought to involve civil society in the diagnosis process. These instances were; introductory training on adaptation to climate change; First Regional Adaptation Tables and presentation of the multi-criteria analysis tool (AMC) developed by the Adaptation Coordination of the National Climate Change Directorate.

~~142-134.~~ As a result of the diagnosis, carried out in the Regional Adaptation Tables of the areas involved in this project (which has been taken into account for this proposal), a following list of topics to be studied was obtained:

Northwest Region (NOA)

- ~~Impacts on water resources, availability and use of water, including groundwater.~~
- ~~Decrease in pollination ecosystem service.~~
- ~~Impacts on food productivity in the NOA region due to water stress, intense rainfall, hail, soils, changes in crops in rural areas, etc.~~
- ~~Impacts on rural tourism, due to the alteration of the landscape and heritage.~~
- ~~Impacts in the region due to the increase of invasive species (example: the sereno).~~

Annex 5 to OPG Amended in October 2017

- Increase in fire sources due to lack of rain.
- Impacts on community health due to extreme weather events in the region.
- Impact due to the abandonment of evaporitic pools after the extraction of brine to obtain lithium.

Cuyo Region

- Increase of dry periods and desertification.
- Floods due to the tendency to increase in average precipitation and more events erratic torrential rains and droughts in the Llanos de La Rioja.
- Integral management of water resources.
- Displacement of human populations (towards the foothills).
- Decrease in agricultural productivity and loss of crops.
- Displacement of birds.
- Vulnerability in human health due to the spread of vectors and new diseases.
- Virulent forest fires (rural and interface).

<u>Northwest Region (NOA)</u>	<u>Cuyo Region</u>
<ul style="list-style-type: none"> → <u>Impacts on water resources, availability and use of water, including groundwater.</u> → <u>Impacts on food productivity in the NOA region due to water stress, intense rainfall, hail, soils, changes in crops in rural areas, etc.</u> → <u>Impacts on rural tourism, due to the alteration of the landscape and heritage.</u> → <u>Increase in fire sources due to lack of rain.</u> → <u>Impacts on community health due to extreme weather events in the region.</u> 	<ul style="list-style-type: none"> → <u>Increase of dry periods and desertification.</u> → <u>Integral management of water resources.</u> → <u>Displacement of human populations (towards the foothills).</u> → <u>Decrease in agricultural productivity and loss of crops.</u> → <u>Vulnerability in human health due to the spread of vectors and new diseases.</u> → <u>Virulent forest fires (rural and interface).</u>

135. Regarding the consultation of the most vulnerable groups to the impacts of climate change present in the selected territories; This proposal is based on the results obtained in the implementation of the Project "Sustainable Land Management in the Dry Zones of the Argentine Northwest" - MST NOA-Cuyo (UNDP ARG 14 / G55).

136. The training was carried out through training processes aimed at generating and increasing local capacities and awareness of specific issues in the different lines of action of the project, through the modality of workshops, technical tours, meetings and exchange of knowledge and wisdom, which usually allowed to rescue and value local knowledge. In addition, in each of the 45 sub-projects financed by the project, an initial workshop was held with the objective of sharing information and conducting training/awareness raising on the main problem to be solved. With this modality, 1700 people were trained. In Revolving Funds, the project worked with members of organizations that were financed to implement it aimed at implementing SLMPs, with a specific program for the design and implementation of the fund. The training was in charge of the project and 60 people were trained. In multi stakeholders context, like de Multisectoral Committees (six), about 250 people were trained. Finally, in order to promote awareness of Gender Equality in rural areas, workshops were held in 3 provinces with the participation of 350 people.

137. Beyond the results achieved, in each of these instances of participation, different demands emerged to which this project seeks to provide a solution: 1) the need to increase the level of scope of the actions in the territory, strengthening the intervention in each site. For example: actions of extraction and conduction of water to the communities partially solved the problem, but it requires actions of storage and intra-farm distribution. 2) As the resource management modality was consolidated in the Revolving Fund format, the organizations demanded more. It is important to highlighth that provincial governments also demand it, 3) Another of the relevant issues raised whitin the communities is marketing for local markets to meet demand and strengthen food security and added value at origin (that is why in this

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Annex 5 to OPG Amended in October 2017

Project is an specific Component). 4) Gender perspective: the MST NOA CUYO project worked on the gender perspective in a solid but insufficient way. The most solid social organizations regarding the issue, demand more work in this regard within the organizations themselves, strengthening the role and participation of women, especially in decision-making instances. 5) Finally, a theme that was transversal to the entire project was the concern around youth and rooting in the territory.
143.

I. *Provide justification for funding requested, focusing on the full cost of adaptation reasoning.*

~~144~~:138. The dry lands of the NOA and Cuyo of Argentina, present an intrinsic ecosystem vulnerability given by the marked water deficit; fragile soils of incipient development and low productivity; conditioning by altitude, geomorphology and geology; in other aspects.

~~145~~. — This results in a high susceptibility of these systems to LDDD processes (especially water and wind erosion), which end up having a strong impact on the low-scale agricultural production structure and a high degree of informality that characterizes rural communities and of native people that inhabit these regions.

~~146~~. These communities, which often live in conditions of not being able to satisfy their basic needs, are then at a disadvantage when facing the challenges posed by climate change.

~~147~~:139. This synergy that occurs between LDDD and the current and future impacts of climate change on the agri-food systems of the drylands, deepening the vulnerability of rural communities; it has not been previously addressed in a comprehensive manner. Although there are policies in place that target highly vulnerable producers, these were not developed with consideration of the effects that climate change and climate variability can have on the productive processes of this particular social segment.

~~148~~:140. Through the implementation of this project, we will work with a rural territorial development approach in order to contribute to the adaptation of rural communities in the drylands of northwestern Argentina, reducing their vulnerability to the impacts of climate change.

~~149~~:141. In this sense, the requested financing will complement the interventions that are being carried out in the territories of the proposed intervention areas; It will strengthen the actions of proven success carried out within the framework of other antecedent projects to enhance their impacts and, fundamentally, it will fully address the climate adaptation needs in the NOA Cuyo from a comprehensive approach.

~~150~~:142. The actions planned to be executed in the project fully respond to this need and, through their execution, are sufficient to achieve the general objective of proposed adaptation of strengthening the community resilience of the rural populations of drylands of the Argentine Cuyo NOA, without need of the contribution of other donors.

J. *Describe how the sustainability of the project outcomes has been taken into account when designing the project.*

The sustainability of the project has been taken into account in 3 aspects:

1) Agreements and commitments assumed by the Argentine Republic: The proposal has been developed within the framework of the national climate change strategies in conjunction with those of LDDD, so its implementation and subsequent sustainability are directly linked to the commitments assumed by the country versus UNFCCC and UNCCD. This ensures that, strategically, the implementation and monitoring of the activities contemplated in the project beyond its execution horizon, is guaranteed by the participation of national and provincial

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public bodies that respond to long-term plans such as:

a.- For Climate Change: the three National Communications; the three Biennial Update Reports; the two Communications Determined at the National Level and the National Plan for Adaptation and Mitigation to Climate Change (RESOL-2019-447-APN-SGAYDS # SGP) which is in the process of being updated.

b.- For LDDD: the National Action Plan to Combat Desertification, Land Degradation and Drought Mitigation (PAN); the Voluntary Goals for Land Degradation Neutrality and the Provincial Action Plans to Fight LDDD of the Jujuy and Tucumán provinces.

2) Strengthening the community at the local level: the permanent support and technical advice provided throughout the project's implementation cycle is intended to empower grassroots social groups. Encourage the associativism of those who have not yet joined together and consolidate normatively and institutionally the existing social organizations. These are just some of the results that the project seeks to achieve so that climate change adaptation actions last over time. Likewise, the training of beneficiaries both in workshops and in the territory and the transfer of information and the exchange of knowledge fostered in the planned participation spaces, result in the acquisition of knowledge and its co-production.

3) Maintenance of infrastructure, equipment and interventions carried out by the project: The project plans to allocate 69% of the funds to material investments to improve access to water, implement SLMP, develop local value chains and locally managed financing mechanisms. Most of these investments in infrastructure and capital increase the income of rural families and communities, due to higher productivity, greater added value and greater investment capacity. Additionally, component 2 strengthens the capacity of local organizations to manage, maintain and expand their productive resources. Both through a greater flow of income and greater management capacity, local communities will be empowered to maintain and expand the investments made by the project.

4) Participatory process: the participatory approach will be applied throughout the implementation of the project, helping to strengthen the project beneficiaries in their ownership, which is expected to reinforce the sustainability of the results and the long-term impact of the project investments.

5) Strategic and priority approaches for implementation: Project design considers mainstreaming in all its components of three approaches: gender and diversities perspective with an intersectional approach; Ecosystem-based adaptation (EbA) and community-based adaptation (CbA). In this way, the project guarantees the participation of those involved in the actions of the project, which is central to ensuring its sustainability. In this sense, component 4 considers the incorporation of local knowledge in knowledge management and monitoring processes. Likewise, component 3 is aimed at strengthening the capacities of local producer groups and organizations that inhabit the prioritized eco regions, thus collaborating in the installation of capacities in the territories.

~~151-143.~~ All the activities that this project involves will be guided by the guidelines that guide the free, informed and consensual consultation processes established by national protocols. In particular for the approach to work with the native population, which constitutes an important part of the target population of this proposal, the project will be conducted following the guidelines established by current national and international legislation on the matter, paying special attention to the appropriate use of the forms and the language to guarantee the participation of the communities, and the incorporation of their visions in the implementation of the various planned actions.

~~152-144.~~ The articulation with institutions and social organizations present in the territory and the trajectory of joint work, facilitate the execution of the project and allow facing possible changes in the political-institutional scenario.

K. Provide an overview of the environmental and social impacts and risks identified as being relevant to the project.

153:145. Below is a preliminary analysis of the impacts and risks of the Project according to the Environmental and Social Principles of the Adaptation Fund in compliance with the Environmental and Social Policy of the Fund. Overall, the project has been classified as a Category B project according to the FA's E&SP, as the potential impacts are few, small-scale, and not extremely widespread, reversible, or easy to mitigate.

Checklist of environmental and social principles	No further assessment required for compliance	Potential impacts and risks – further assessment and management required for compliance
<i>Compliance with the Law</i>	Further assessment required for compliance	<p>All applicable proposed projects must comply with the current environmental legislation of the Argentine Republic in general and that of specific issues (such as soil conservation; climate change, land degradation, water resources; among others) in particular; including the regulations corresponding to the sub-national jurisdictions in which the project will be implemented.</p> <p>Within the framework of the General Environmental Law of the Nation No. 25,675 (GO 11/28/2002), as a national environmental law of minimum budgets that provides the legal basis, principles and requirements to be supplemented at the provincial level, its Regulatory and Modifying Decrees; As well as the environmental legislation of each province, the measures and actions proposed in Component 1 will be carried out.</p> <p>In this context, in the full proposal stage, it will be reviewed which project proposed within Component 1 will require a request for authorizations and / or Environmental Impact Assessments according to the provinces to be efficient in the presentation times and necessary administrative procedures.</p>
<i>Access and Equity</i>	Further assessment required for compliance	<p>The project seeks to provide equitable access for different groups to productive resources, services and markets; strengthening, for example, the participation of women and diversities in decision-making and in the social organizations of the beneficiary communities; thus ensuring that all stakeholders benefit equally from the interventions foreseen in the project and that inequality is not reinforced or continues to perpetuate.</p> <p>Although the entire project is designed in this context, a more exhaustive analysis will be carried out during the Full Proposal stage to avoid incurring in any activity or measure that could harm the access and equity of any group.</p>
<i>Marginalized and Vulnerable Groups</i>	Further assessment required for compliance	<p>The beneficiaries have been identified based on the results of the implementation of the MST-NOA Cuyo project (UNDP ARG 14 / G55) and within the framework of the updating processes of the National Plan for Adaptation to Climate Change that Argentina has been carrying out. Among the beneficiaries, vulnerable groups have been identified for the project: Indigenous Communities and rural inhabitants, mainly women.</p> <p>For this reason, not having had the possibility to carry out a direct consultation in this instance, during the Full Proposal</p>

Annex 5 to OPG Amended in October 2017

		<p>stage, the analysis will be expanded regarding the project beneficiaries in order to ensure full and equitable access for all sectors, identifying those groups that will require more attention during the execution of the project.</p> <p>All these initiatives will be implemented respecting the right to free, prior and informed consultation of indigenous peoples; promoting their ancestral and traditional knowledge and promoting respect for their rights and that of the community lands they inhabit.</p>
<i>Human Rights</i>	No further assessment required for compliance	<p>The project promotes fundamental human rights through the implementation of activities that will increase awareness and develop the capacity of rural people and small producers and vulnerable actors within the project's area of intervention. Since there are no proposed projects that have a negative impact on human rights, there is no further evaluation need for this criterion.</p>
<i>Gender Equality and Women's Empowerment</i>	Further assessment required for compliance	<p>The country has made significant progress in the enactment of regulations that protect the rights of women and diversities (Law 26,485), as well as in promoting the mainstreaming of the gender perspective in public policies (Law 27,499). However, gender gaps persist, particularly related to income, working conditions, participation in decision-making, among others, for which reason the project incorporates the gender and diversities perspective in each Component with different products and specific activities sensitive to gender and diversity.</p> <p>Even so, it is proposed to carry out a more exhaustive Gender and Diversity Assessment during the Full Proposal stage, for which it will be exclusive to have a Consultancy that provides relevant specialized knowledge in gender matters.</p>
<i>Core Labor Rights</i>	No Further assessment required for compliance	<p>This project is designed within the framework of current legislation on labor law, so there is no further need for evaluation for this criterion.</p>
<i>Indigenous People</i>	Further assessment required for compliance	<p>The indigenous peoples approach integrates the mechanisms of the Free, Prior and Informed Consent (FPIC), the basic principles of self-determination, respect for indigenous knowledge, traditional cultures and practices that contribute to sustainable and equitable development.</p> <p>Even so, during the Full Proposal stage, it will be relevant to explore ways, through formal FPIC processes, so that the different worldviews of indigenous peoples are taken into account, in order to maximize the local effectiveness of the implementation of the project activities, including the delivery of benefits to these actors. All this within the framework of current regulations, constitutional regulations and International Labour Organization (ILO) Convention 169 for the rights of indigenous peoples and Family Agriculture Law 27118 for peasants and other communities.</p>
<i>Involuntary Resettlement</i>	No Further assessment required for compliance	<p>The project does not foresee relocation activities for groups, people and / or communities.</p>
<i>Protection of Natural Habitats</i>	No Further assessment required for compliance	<p>The components of the project are designed so that they do not negatively impact the existing natural habitats in the intervention areas of the project. On the contrary, the project addresses the critical environmental particularities inherent to the drylands of northwestern Argentina, which enhance the vulnerability of these natural systems to climate change. In the framework of the project, all sites that have a legal conservation status, whether at the local, provincial, national or international level, or recognized as protected by local</p>

Annex 5 to OPG Amended in October 2017

		traditional or indigenous communities, are identified and recognized. And they are put in value through the implementation of the SLMP and improvements in access to water in communities strengthened from the social and economic productive.
<i>Conservation of Biological Diversity</i>	Further assessment required for compliance	The project will be developed within the conceptual framework of EbA and CbA. Therefore, all the proposed interventions consider the sustainable use of biodiversity. This becomes relevant within the framework of the commitments assumed by the Argentine Republic in relation to the Convention on Biological Diversity (ratified by national law in 1996); and in accordance with the National Biodiversity Strategy and Action prepared by the country to specifically plan the sustainable use of biodiversity. Likewise, an additional evaluation during the full proposal stage is recommended to guarantee adequate consideration of the singularities of the project intervention sites.
<i>Climate Change</i>	No Further assessment required for compliance	Argentina has Law No. 27,520 on Minimum Budgets for Adaptation and Mitigation to Global Climate Change, which also creates the National Climate Change Cabinet and a sub-national structure. It has an NDC and sectoral plans to mitigate and adapt to climate change. All the activities envisaged in the project are a priori in line with the regulations cited above and with the safeguarding of the Adaptation Fund since none of the proposed interventions tends "to a significant or unjustified increase in greenhouse gas emissions or other drivers of climate change". These are activities linked to the sustainable use of biodiversity, sustainable land management, access to water, agro-ecological production, and value added to community-scale production and marketing. It is not expected to increase Greenhouse Gas (GHG) emissions during the implementation of the project.
<i>Pollution Prevention and Resource Efficiency</i>	No Further assessment required for compliance	The project seeks to promote the sustainable use of natural resources minimizing (through appropriate techniques and through the incorporation of technology), the use of them, the production of waste and the emission of pollutants. For example: incorporation of technology for the use of solar energy.
<i>Public Health</i>	No Further assessment required for compliance	The project promotes the improvement of access to water, which constitutes an important factor for improving hygiene and food conditions, which is expected to contribute to improving the health conditions of the communities involved.
<i>Physical and Cultural Heritage</i>	Further assessment required for compliance	The actions of the project are not expected to have an impact on archaeological sites and areas of heritage interest. The project promotes the enhancement of cultural heritage as a key strategy for strengthening the identity of communities and adding value to local production. During the Full Proposal stage, work will be done jointly with the communities of native peoples and beneficiaries of the project to identify the tangible and intangible cultural heritage for the purpose of its proper consideration in each of the intervention sites.
<i>Lands and Soil Conservation</i>	No Further assessment required for compliance	This project is framed within the principles and objectives of the UNCCD and the UNFCCC and the agreements and commitments assumed by the Argentine Republic in this context. The adoption and implementation of the SLMP that this project seeks to promote, are within the framework of the PAN and the PAPs and are also mostly validated by institutional and scientific mechanisms and by projects already implemented in the NOA Cuyo of Argentina.

		All these practices aim to avoid land degradation, restore soil productivity and make sustainable use of water resources.
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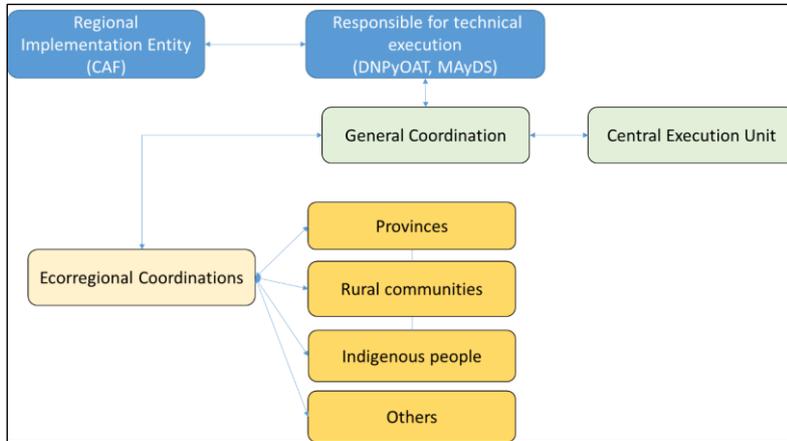
PART III: IMPLEMENTATION ARRANGEMENTS

A. Describe the arrangements for project implementation.

- ~~154~~.146. The Regional Implementation Entity (ERI) for the project is the Development Bank of Latin America (CAF), accredited to the Adaptation Fund in 2014 as the first ERI for Latin America. It will fulfill the functions that correspond to an (ERI) in accordance with the fiduciary and operational standards required at the time of its accreditation.
- ~~155~~.147. In turn, the technical execution of the project will be in charge of the National Directorate of Planning and Environmental Regulation of the Territory of the Ministry of Environment and Sustainable Development of the Nation, who will be responsible for organizing an Executing Unit (EU) both inland of the M_AyDS as with possible partners necessary for the execution.
- ~~156~~.148. A General Coordinator of the project will be appointed who will be in charge, together with the EU team, of organizing the day-to-day operations of the project. In this sense, their functions will be: to supervise the execution of the different components, to write the evaluation reports and to coordinate, supervise and support the various activities related to the execution of the project.
- ~~157~~.149. Likewise, there will be Ecoregional Territorial Coordinators who will have the function of supervising the activities in the field and inter-sectorial linkage and with the provincial / s and will report to the General Coordinator.
- ~~158~~.150. In turn, the territorial coordinators will be in permanent contact and will be supported in the implementation, by the units belonging to other areas of the national government with a provincial seat and by any other institution and / or organization that may be carrying out territorial actions with which this project could be complemented.

FIGURE 9: ARRANGEMENTS FOR THE IMPLEMENTATION OF THE PROJECT

Annex 5 to OPG Amended in October 2017



B. Describe the measures for financial and project risk management.

RISK	LEVEL	RISK MANAGEMENT MEASURES
Institutional Changes at National and/or Provincial level	MEDIUM	The Regional Implementation Entity (ERI) for the project is the Latin American Development Bank (CAF), accredited to the All the activities proposed in the project related to communication, intersectional participation and exchange of knowledge and experiences; Among others, they will play a key role in maintaining the link between the rest of the key non-governmental actors (assisted by the Implementing Entity and the Territorial Coordination), contributing to the articulation and maintenance of activities during periods of change of authorities.
Complexity in the procedures of the financial management of the project that could delay its execution and of the administrative management within the institutions in charge of the execution	MEDIUM	To mitigate any possible risk of delay in administrative management within the institutions responsible for execution, the project foresees the incorporation of professionals specialized in the area of accounting and administrative support for the UEC. During the stage of presentation of the Final Proposal, work will be done to detect possible
Changes in macroeconomic policies that affect the availability or value of foreign exchange	LOW	Variations in the exchange rate could negatively affect the implementation of the project if the importation of goods and services were required. On the contrary, the project seeks to strengthen the domestic market and local production and marketing chains as one of the measures for adaptation to climate change, not requiring imported inputs. Likewise, if this were necessary and the implementation of the project was affected by exchange rate fluctuations, the ERI and / or the UEC would assume the necessary costs to resolve the situation, since, for example, the national government has special assistance

Annex 5 to OPG Amended in October 2017

		programs for small producers according to their specific activities with which they can be assisted.
Implementation partners may be affected by their operational capacity in the territory	LOW	It may happen that some institutions or organizations may be affected, for various reasons, their operational capacity in the territory. To mitigate any possible impact that this could cause in the project execution times, it has been thought and designed with institutional arrangements that allow progress between the ERI and the UEC with the territorial coordinators independently, while the implementing partners they solve your situation.

C. Describe the measures for environmental and social risk management, in line with the Environmental and Social Policy and Gender Policy of the Adaptation Fund.

RISK	LEVEL	RISK MANAGEMENT MEASURES
Pandemic Situation that could complicate field activities	MEDIUM	If current Covid-19 pandemic conditions persist, national and provincial protocols and WHO standards will continue to be adopted. Likewise, if the situation demands confinement measures again, the training, exchanges of knowledge and experiences and the workshops must be carried out in virtual and / or mixed modality according to the capacity of assistance of allowed persons. Finally, the provinces, territorial coordinators and implementation partners with a territorial presence should assume a more active role in linking with the beneficiaries while these measures are in force.
Climatic variability	MEDIUM	The changing and / or seasonal climatic conditions characteristic of the project intervention areas could affect the success of certain adaptation measures implemented during its life cycle. In this sense, the partner institutions in the implementation of the project with a strong territorial presence such as INTA, which can provide information from the monitoring and early warning systems, as well as all the technical advisory work in the territory contemplated by the project, are particularly relevant. the permanent accompaniment of the beneficiaries and in their training for a sustainable management of their lands. If necessary, the Argentine government has special assistance programs for emergencies and agricultural disasters.

D. Describe the monitoring and evaluation arrangements and provide a budgeted M&E plan, in compliance with the ESP and the Gender Policy of the Adaptation Fund.

~~The monitoring and evaluation actions are foreseen within component 4, and include participatory processes with a gender and diversity perspective to rescue experiences and lessons learned, as well as criteria for the design of communication materials appropriate to the target community.~~

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Annex 5 to OPG Amended in October 2017

151. The monitoring and evaluation actions are foreseen the Project Execution Cost and the Implementing Entity Fee, and include participatory processes with a gender and diversity perspective.

<u>Monitoring and Evaluation Activity</u>	<u>Expected Products</u>	<u>Responsible Parties</u>	<u>Estimated budget</u>	<u>Estimated term</u>
<u>Monitoring and Evaluation Coordination</u>	<u>Rescue experiences and lessons learned, as well as criteria for the design of communication materials appropriate to the target community.</u>	<u>National Directorate of Planning and Environmental Regulation of the Territory of the Ministry of Environment and Sustainable Development of the Nation</u>	<u>US\$ 155.155</u>	<u>Five years</u>
<u>Monitoring and Evaluation Activity</u>		<u>Responsible Parties</u>	<u>Estimated budget</u>	<u>Estimated term</u>
<u>AF Environmental, Social Policy fulfilment</u>		<u>CAF</u>	<u>US\$ 60.000</u>	<u>Five years</u>
<u>AF Gender Policy fulfilment</u>		<u>CAF</u>	<u>US\$ 60.000</u>	<u>Five years</u>
<u>Technical support and backstopping by personnel from CAF</u>		<u>CAF</u>	<u>US\$ 150.000</u>	<u>Five years</u>
<u>TOTAL BUDGET (PMC and IE Fee)</u>			<u>US\$ 425.155</u>	

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<u>Monitoring and Evaluation Activity</u>	<u>Expected Products</u>	<u>Responsible Parties</u>	<u>Estimated budget</u>	<u>Estimated-term</u>
<u>Design, installation and execution of a monitoring and follow-up system</u>	<u>Monitoring system in place since the first year of the project, including a baseline and annual reports of all the established indicators. Quarterly project progress reports.</u>	<u>Monitoring and Evaluation Coordinator- CAF- Project-Executing Unit</u>	<u>\$ 140.000</u>	<u>Design and data collection, 1st year of the project. Continuous execution during the 6 years of the project</u>
<u>External evaluations (mid-term and final evaluation)</u>	<u>Mid-term review reports and Final Project Report.</u>	<u>Monitoring and Evaluation Coordinator- CAF- Project-Executing Unit</u>	<u>\$ 42.412</u>	<u>Mid-term, at the end of year 3. Final evaluation, prior to the end of year 6.</u>
<u>Participatory planning and evaluation workshops with a</u>	<u>AOP submitted and approved. Annual workshop of the monitoring team,</u>	<u>Monitoring and Evaluation Coordinator- CAF-</u>	<u>\$ 48.000</u>	<u>Semiannual, during the 6 years.</u>

Annex 5 to OPG Amended in October 2017

gender and diversity perspective	for follow-up and progress actions:	Project-Executing Unit		
Development of dissemination materials-rescuing results and lessons learned	The dissemination-/ communication materials-generated by the project reach 100% of the intended recipients.	Monitoring and Evaluation Coordinator- CAF- Project-Executing Unit	\$ 48.000	One publication plus other materials per year, during the 6 years.
			\$ 248.412	

E. Include a results framework for the project proposal, including milestones, targets and indicators, including one or more core outcome indicators of the Adaptation Fund Results Framework, and in compliance with the Gender Policy of the Adaptation Fund.

CORE OUTCOME INDICATORS OF THE AF RESULTS FRAMEWORK	PROJECT OUTCOMES	INDICATORS	TARGETS
6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	1.1 The efficient use of water resources increases in all sectors ensuring the sustainability of the extraction and supply of fresh water to face water scarcity.	Indicator: # of trainings carried out both in workshops and field	Target: At least 7 workshops or field training activities carried out in each intervention area (28 in total)
		Indicator: # investments done to achieve sustainability from the extraction and supply of water financed by the project	Target: At least 7 investments financed by the project made in each intervention area (28-in total). 50% of the investments must be in charge of women and diversities.
6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	1.2 Small and medium scale producers adopt and implement SLMP to prevent, reduce and / or mitigate LDDD; revaluing their cultural practices and strengthening the sustainable and resilient management of agro ecosystems that contribute to the achievement of food security in the face of the impacts of climate change.	Indicator: # guides and protocols developed and disseminated	Target: At least 1 protocol and / or guide developed and disseminated by area of intervention (4 in total)
		Indicator: # of trainings, experiences and recommendations developed by women and groups of rural women with a gender and diversities perspective	Target: At least 2 definitions of priorities and training modalities per area of intervention (8 in total) prepared together with women and diversities
		Indicator: # of trainings carried out in workshops and in the field	Target: At least 7 workshops or field training activities carried out in each

Annex 5 to OPG Amended in October 2017

			intervention area (28 in total)
		Indicator: # investments made for the SLMP implementation financed by the project	Target: At least 57 investments financed by the project made in each intervention area (280-in total). 50% of the investments must be in charge of women and diversities.
6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	2.1 The capacities of the groups and local organizations of producers and producers that inhabit the prioritized eco regions are consolidated and strengthened.	Indicator: # of formally constituted social organizations	Target: At least 4 social organizations formally constituted for each area of intervention (16-in total) that promote gender equity and diversities.
		Indicator: # of intersectional meetings facilitated for the exchange of experiences	Target: At least 1 annual meeting held in each intervention area (24 in total - 4 annual meetings x 6 years)
6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	2.2 Rural women who inhabit the prioritized eco regions are empowered to achieve their effective participation in the processes of development of the territory and strengthened in the actions of adaptation to climate change.	Indicator: # Training and support in the exercise of managerial roles of rural women	Target: At least 4 workshops per area of intervention (in total 16 workshops)
8.1. No. of innovative adaptation practices, tools and technologies accelerated, scaled-up and/or replicated	3.1 Local and regional markets are promoted as centers for the commercialization of products and the development of actions and investments aimed at adding value for the production associated with	Indicator: # investments made for marketing and adding local value.	Target: At least 3 investments financed by the project made in each intervention area (12 in total)
		Indicator: # of strategies (certifications, seals, collective marks, appellations of origin) developed and incorporated.	Target: At least 2 strategies developed and incorporated in each intervention area (8 in total)
8.2. No. of key			

Annex 5 to OPG Amended in October 2017

findings on effective, efficient adaptation practices, products and technologies generated	SLMP and the efficient use of water resources with an EbA and CbA approach is strengthened.	Indicator: # of locally managed financing mechanisms in operation	Target: at least 5 financing mechanisms in operation in each intervention area (20 in total)
3.1. Percentage of targeted population aware of predicted adverse impacts of climate change, and of appropriate responses. 3.2. Modification in targeted population behavior	4.1 Traditional and ancestral knowledge provide information for a better understanding of climate variability at the local level and to strengthen the generational transfer of knowledge	Indicator: # of intersectional meetings facilitated for the systematization of experiences and lessons learned, planning and evaluation, and exchange of experiences.	Target: At least 1 annual meeting held in each intervention area (24 in total - 4 annual meetings x 6 years)
	4.2 The Project is implemented in the prioritized eco regions, in coordination with local partners, monitoring, evaluating the actions carried out and communicating their results.	Indicators: in the Full Proposal stage, a package of results indicators (of achievements, activity and impact) and management (process and resources indicators) and the evaluation schedule (added to the mid-term evaluation and final already planned by the FA). Indicator: # of communication materials reflecting results and lessons learned published and distributed	Target: at least one communication material (publications or audiovisuals) edited and distributed to the relevant audiences in each year of the project (total 6)

F. Demonstrate how the project aligns with the Results Framework of the Adaptation Fund

Project Objective(s)⁹	Project Objective Indicator(s)	Fund Outcome	Fund Outcome Indicator	Grant Amount (USD)
Increase the efficient use of water resources in all sectors and ensure the sustainability of freshwater extraction and supply to address water scarcity.		Outcome 6: Diversified and strengthened livelihoods and sources of income for vulnerable people in targeted areas	6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	US\$ 2.181.050

⁹ 1 The AF utilized OECD/DAC terminology for its results framework. Project proponents may use different terminology but the overall principle should still apply

Annex 5 to OPG Amended in October 2017

Promote among small and medium-scale producers the adoption and implementation of SLMP to prevent, reduce and / or mitigate desertification, land degradation and drought (DDTS); revaluing cultural practices and strengthening the sustainable and resilient management of agroecosystems that contribute to the achievement of food security in the face of the impacts of climate change.		Outcome 6: Diversified and strengthened livelihoods and sources of income for vulnerable people in targeted areas	6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	US\$ 2.181.050
Consolidate and enhance the capacities of local producer groups and organizations that inhabit the prioritized ecoregions		Outcome 6: Diversified and strengthened livelihoods and sources of income for vulnerable people in targeted areas	6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	US\$ 194.637 162.93 <u>0</u>
Empower rural women who inhabit the prioritized ecoregions, to achieve their effective participation in the territorial development processes and strengthen them in actions to adapt to climate change.		Outcome 6: Diversified and strengthened livelihoods and sources of income for vulnerable people in targeted areas	6.1 Percentage of households and communities having more secure access to livelihood assets	US\$ 112.000 351.24 <u>4</u>
Develop and implement financing mechanisms and value chains managed by the local producer organizations themselves, which support the adoption of SLMP and measures to improve access to		Outcome 8: Support the development and diffusion of innovative adaptation practices, tools and technologies	8. Innovative adaptation practices are rolled out, scaled up, encouraged and/or accelerated at regional, national and/or subnational level.	US\$ 2.625.269 2.692.69 <u>0.831</u>

Annex 5 to OPG Amended in October 2017

water with an Ecosystem-based Adaptation (EbA) and Adaptation-based approach. in Communities (CbA).				
Implement the Project in the prioritized eco regions, in coordination with local partners, monitoring, evaluating, communicating and disseminating its results.		Outcome 3: Strengthened awareness and ownership of adaptation and climate risk reduction processes at local level	3.1. Percentage of targeted population aware of predicted adverse impacts of climate change, and of appropriate responses 3.2. Modification in targeted population behavior	US\$ <u>1.140.367.810.</u> <u>368</u>

Project Outcome(s)	Project Outcome Indicator(s)	Fund Output	Fund Output Indicator	Grant Amount (USD)
1.1 The efficient use of water resources increases in all sectors ensuring the sustainability of the extraction and supply of fresh water to face water scarcity.	Indicator: # of trainings carried out in workshops and in the field Indicator: # investments made to achieve sustainability of water extraction and supply financed by the project	Output 6: Targeted individual and community livelihood strategies strengthened in relation to climate change impacts, including variability	6.1.1.No. and type of adaptation assets (tangible and intangible) created or strengthened in support of individual or community livelihood strategies 6.1.2. Type of income sources for households generated under climate change scenario	US\$ 2.181.050
1.2 Small and medium scale producers adopt and implement SLMP to prevent, reduce and / or mitigate LDDD; revaluing their cultural practices	Indicator: # guides and protocols developed and disseminated Indicator: # of trainings, experiences and recommendations	Output 6: Targeted individual and community livelihood strategies strengthened in relation to	6.1.1.No. and type of adaptation assets (tangible and intangible) created or strengthened in support of individual or community	US\$ 2.181.050

Annex 5 to OPG Amended in October 2017

and strengthening the sustainable and resilient management of agro ecosystems that contribute to the achievement of food security in the face of the impacts of climate change.	<p>developed by women and groups of rural women with a gender and diversities perspective</p> <p>Indicator: # of trainings carried out in workshops and in the field</p> <p>Indicator: # investments made for the SLMP implementation financed by the project</p>	climate change impacts, including variability	<p>livelihood strategies</p> <p>6.1.2. Type of income sources for households generated under climate change scenario</p>	
2.1 The capacities of the groups and local organizations of producers and producers that inhabit the prioritized eco regions are consolidated and strengthened.	<p>Indicator: # of formally constituted social organizations</p> <p>Indicator: # of intersectional meetings facilitated for the exchange of experiences</p>	Output 6: Targeted individual and community livelihood strategies strengthened in relation to climate change impacts, including variability	6.2. Percentage of targeted population with sustained climate-resilient alternative livelihoods	<p>US\$</p> <p>194.637162.930</p>
2.2 Rural women who inhabit the prioritized ecoregions are empowered to achieve their effective participation in the processes of development of the territory and strengthened in the actions of adaptation to climate change.	Indicator: # Training and support in the exercise of managerial roles of rural women	Output 6: Targeted individual and community livelihood strategies strengthened in relation to climate change impacts, including variability	6.1 Percentage of households and communities having more secure access to livelihood assets	<p>US\$</p> <p>112.000351.244</p>
3.1 Local and regional markets are promoted as centers for the commercialization of products and the development of actions and investments aimed at adding value for		Output 8: Viable innovations are rolled out, scaled up, encouraged and/or accelerated.	8. Innovative adaptation practices are rolled out, scaled up, encouraged and/or accelerated at regional, national and/or	<p>US\$</p> <p>2.625.2692.692.690.831</p>

Annex 5 to OPG Amended in October 2017

the production associated with SLMP and the efficient use of water resources with an EbA and CbA approach is strengthened.			subnational level.	
4.1 Traditional and ancestral knowledge provide information for a better understanding of climate variability at the local level and to strengthen the generational transfer of knowledge	Indicator: # investments made for marketing and adding local value.	Output 3: Targeted population groups participating in adaptation and risk reduction awareness activities	3.1.1 No. and type of risk reduction actions or strategies introduced at local level" 3.1.2 No. of news outlets in the local press and media that have covered the topic	US\$ 555.183533. <u>716</u>
<u>4.2 A Regional Knowledge Sharing Adaptation Platform is establish for enhance climate change resilience of rural communities of the Northwest of Argentina</u> 4.2 The Project is implemented in the prioritized ecoregions, in coordination with local partners, monitoring, evaluating the actions carried out and communicating their results.	<u>Indicator: the Knowledge Sharing Adaptation Platform on line.</u> <u>Indicator: # of communication materials reflecting results and lessons learned published and distributed</u> <u>Indicators: in the Full Proposal stage, a package of results indicators (of achievements, activity and impact) and management (process and resources indicators) and the evaluation schedule (added to the mid-term evaluation and final already planned by the FA).</u> <u>Indicator: # of communication materials reflecting results and lessons</u>	Output 3: Targeted population groups participating in adaptation and risk reduction awareness activities	3.1.1 No. and type of risk reduction actions or strategies introduced at local level" 3.1.2 No. of news outlets in the local press and media that have covered the topic	US\$ 555.183276. <u>652</u>

	learned-published and-distributed			
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G. Include a detailed budget with budget notes, a budget on the Implementing Entity management fee use, and an explanation and a breakdown of the execution costs.

This section will be develop during Full Proposal preparation.

H. Include a disbursement schedule with time-bound milestones.

The payment schedule will be accommodated in the final presentation to the scheme developed in the budget and will respond to the implementation stages of the different subcomponents and products associated with them.

PART IV: ENDORSEMENT BY GOVERNMENT AND CERTIFICATION BY THE IMPLEMENTING ENTITY

A. Record of endorsement on behalf of the government² Provide the name and position of the government official and indicate date of endorsement. If this is a regional project list the endorsing officials all the participating countries. The endorsement letter(s) should be attached as an annex to the project proposal. Please attach the endorsement letter(s) with this template; add as many participating governments if a regional project/:

(Enter Name, Position, Ministry)	Date: (Month, day, year)
----------------------------------	--------------------------

B. Implementing Entity certification Provide the name and signature of the Implementing Entity Coordinator and the date of signature. Provide also the project/programme contact person's name, telephone number and email address

<p>I certify that this proposal has been prepared in accordance with guidelines provided by the Adaptation Fund Board, and prevailing National Development and Adaptation Plans (.....list here.....) and subject to the approval by the Adaptation Fund Board, <u>commit to implementing the project/programme in compliance with the Environmental and Social Policy and the Gender Policy of the Adaptation Fund</u> and on the understanding that the Implementing Entity will be fully (legally and financially) responsible for the implementation of this project/programme.</p>

-
1. Each Party shall designate and communicate to the secretariat the authority that will endorse on behalf of the national government the projects and programmes proposed by the implementing entities.

<i>Name & Signature</i> Implementing Entity Coordinator	
Date: (<i>Month,</i> <i>Day,</i> <i>Year</i>)	Tel. and email:
Project Contact Person:	
Tel. And Email:	

PART IV: ENDORSEMENT BY GOVERNMENT AND CERTIFICATION BY THE IMPLEMENTING ENTITY

B. Implementing Entity certification *Provide the name and signature of the Implementing Entity Coordinator and the date of signature. Provide also the project/programme contact person’s name, telephone number and email address*

I certify that the national project proposal “ Strengthening community resilience of rural populations in the drylands of northwestern Argentina facing climate change, improving access to water and the implementation of sustainable land management practices ” has been prepared in accordance with guidelines provided by the Adaptation Fund Board, and prevailing National Development and Adaptation Plans and subject to the approval by the Adaptation Fund Board, <u>commit to implementing the project in compliance with the Environmental and Social Policy of the Adaptation Fund</u> and on the understanding that the Implementing Entity will be fully (legally and financially) responsible for the implementation of this project.	
 Ubaldo Elizondo Implementing Entity Coordinator	
Date: <i>January / 08 / 2022</i>	Tel. and email: uelizondo@caf.com
Project Contact Person: Carolina Cortés	
Tel. And Email: +593987883698 / acortes@caf.com	

PART IV: ENDORSEMENT BY GOVERNMENT AND CERTIFICATION BY THE IMPLEMENTING ENTITY

A. Record of endorsement on behalf of the government¹

Project “Strengthening community resilience of rural populations in the drylands of northwestern Argentina facing climate change, improving access to water and the implementation of sustainable land management practices”

 <p><i>Mr. Martin Manuel Illescas</i></p> <p><i>Director of Projects with External Financing and International Cooperation of this Ministry – NDA Adaptation Fund</i></p> <p><i>Ministry of Environment and Sustainable Development</i></p>	<p>Date: <i>(January/08/2022)</i></p>
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⁶ Each Party shall designate and communicate to the secretariat the authority that will endorse on behalf of the national government the projects and programmes proposed by the implementing entities.



ADAPTATION FUND

Letter of Endorsement by Government

**Government of the Republic of Argentina
Ministry of Environment and Sustainable Development**

January 8th, 2022

To: The Adaptation Fund Board
c/o Adaptation Fund Board Secretariat
Email: Secretariat@Adaptation-Fund.org
Fax: 202 522 3240/5

Subject: Endorsement of the Full Proposal “***Strengthening community resilience of rural populations in the drylands of northwestern Argentina facing climate change, improving access to water and the implementation of sustainable land management practices***”

In my capacity as designated authority for the Adaptation Fund in Argentina, I confirm that the above national full project proposal is in accordance with the government’s national priorities in implementing adaptation activities to reduce adverse impacts of, and risks, posed by climate change in the Republic of Argentina.

Accordingly, I am pleased to endorse the above full project proposal with support from the Adaptation Fund. If approved, the project will be implemented by CAF Latin American Development Bank (Corporación Andina de Fomento).

Sincerely,

Mr. Martin Manuel Illescas
Director of Projects with External Financing and International Cooperation
Ministry of Environment and Sustainable Development

ANEXO 1: ÍNDICE DE SIGLAS Y ACRÓNIMOS**ANNEX 1: INDEX OF ACRONYMS**

SIGLA	ESPAÑOL	ACRONYM	ENGLISH
AbC	Adaptación Basada en Comunidades	CbA	Community Based Adaptation
AbE	Adaptación Basada en Ecosistemas	EbA	Ecosystem Based Adaptation
CAF	Corporación Andina de Fomento- Banco de Desarrollo de América Latina	CAF	Development Bank of Latin America
CC	Cambio Climático	CC	Climate Change
CDN	Contribución Determinada a Nivel nacional	NDC	National Determined Contribution
CMNUCC	Convención Marco de las Naciones Unidas sobre el Cambio Climático	UNFCCC	United Nation Framework to Combat Climate Change
CMS	Comité Multisectorial	MSC	Multisectoral Committee
CNULD	Convención de las Naciones Unidas para la Lucha contra la Desertificación	UNCCD	United Nation Convention to Combat Desertification
COFEMA	Consejo Federal de Medio Ambiente	COFEMA	Environmental Federal Council
CPLel	Consulta Previa, Libre, e Informada a pueblos indígenas	FPIC	Free, Prior and Informed consent to indigenous peoples
DDTS	Desertificación, Degradación de Tierras y Mitigación de la Sequía	LDDD	Land Degradation, Desertification and Droughth
DN	Dirección Nacional (Ministerio de Ambiente y Desarrollo Sostenible)	ND	National Directorate
DNPYoAT	Dirección Nacional de Planificación y Ordenamiento Ambiental del Territorio	DNPYoAT	National Directorate of Planning and Environmental Management of the Territory
DT	Degradación de Tierras	LD	Land degradation
FR	Fondo Rotatorio	RF	Revolving Fund
EAP	Explotación Agropecuaria	EAP	Agropecuary exploitation
GNCC	Gabinete Nacional de Cambio Climático	GNCC	National Cabinet of Climate Change
IADIZA	Instituto Argentino de Investigaciones de las Zonas Áridas	IADIZA	Argentine Institute for Arid Zones Research
IICA	Instituto Interamericano de Cooperación para la Agricultura	IICA	Inter-American Institute for Cooperation on Agriculture
INDEC	Instituto Nacional de Estadísticas y Censos	INDEC	National Institute of Statistics and Censuses
INTA	Instituto Nacional de Tecnología Agropecuaria	INTA	National Institute of Agricultural Technology
IPCC	Panel Intergubernamental de Cambio Climático	IPCC	Intergubernamental Panel of Climate Change
LADA	Proyecto de evaluación de la degradación de la tierra	LADA	Land Degradation Assessment Project
MAYDS	Ministerio de Ambiente y Desarrollo Sostenible de la Nación	MAYDS	Ministry of Environment and Sustainable Development of the Nation
MST	Manejo Sustentable de Tierras	SLM	Sustaineble Land Management
MST NOA-Cuyo	Proyecto de Manejo Sustentable de Tierras en el Noroeste argentino	MST NOA-Cuyo	Sustainable Land Management of argentina Nortwestern Project
ODS	Objetivos de Desarrollo Sostenible	SDG	Sustainable Development Goals
OIT	Organización Internacional del Trabajo	ILO	Ibternational Labour Organization

Annex 5 to OPG Amended in October 2017

PAN	Programa de Acción Nacional de Lucha contra la Desertificación, Degradación de Tierras y Mitigación de la Sequía.	NAP	National Action Plan to Fight Desertification, Land Degradation and Drought Mitigation.
PAP	Plan de Acción Provincial de Lucha contra la Desertificación, Degradación de Tierras y Mitigación de la Sequía.	PAP	Provincial Action Plan to Fight Desertification, Land Degradation and Drought Mitigation.
PMST	Prácticas de Manejo Sustentable de Tierras	SLMP	Sustainable Land Management Practices
PNUD	Programa de las Naciones Unidas para el Desarrollo	UNDP	United Nations Development Programme
PP	Pequeños productores	SP	Small Producers
NBI	Necesidades Básicas Insatisfechas	UBN	Unmet Basic Needs
NOA	Noroeste de Argentina	NOA	Northwestern Argentina
SAyDS	Secretaría de Ambiente y Desarrollo Sustentable de la Nación	SAyDS	Secretariat of Environment and Sustainable Development of the Nation
SIG-IDE	Sistema de Información Geográfica – Infraestructura de Datos Espaciales	GIS-SDI	Geographic Information Systems - Infrastructure of Spatial Data
TCN	Tercera Comunicación Nacional de la República Argentina a la CMNUCC	TNC	Third National Communication of the Argentine Republic to the UNFCCC

ANEXO 2: TEORÍA DEL CAMBIO – ANNEX 2: THEORY OF CHANGE

