

Applying the IUCN Global Standard on Nature-based Solutions (NbS) in the Guatemalan Highlands: Case study

Fernández, Manuela; Monterroso Rivas, Ottoniel; Domínguez, Dafne; Ramírez, Orsibal; Franco, Vanessa; Coy, Lourdes; Calvo-Solano, Oscar; Puac, Marvin; Joj, Eliazar; López, Ronal; Leiva, Raúl







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Acronyms

AFD French Development Agency

AFOLUO Agriculture, Forestry and Other Land Use

CEM Commission on Ecosystem Management

CONAP National Council for Protected Areas

DICORER Regional Coordination and Rural Extension Department

EbA Ecosystem-based Adaptation

ESMS Environmental and Social Management System

FCG Foundation for Conservation of Natural Resources and the Environment in Guatemala

FPIC Free, Prior and Informed Consent

GCF Green Climate Fund

INAB National Institute of Forests

INSIVUMEH National Institute of Seismology, Volcanology, Meteorology and Hydrology

INTA National Institute of Agriculture Technology (Argentina)

InVEST Integrated Valuation of Ecosystem Services and Tradeoffs

KOICA Korean International Cooperation Agency

LORTA Learning-Oriented Real-Time Impact Assessment

M&E Monitoring and Evaluation

MAGA Ministry of Agriculture, Livestock and Food

MARN Ministry of Environment and Natural Resources

MIAF Maize Intercropped with Fruit Trees

NDC Nationally Determined Contributions

NDVI Normalized Difference Vegetation Index

Norad Norwegian Agency for Development and Cooperation

OECMs Other Effective Area-based Conservation Methods

ORMACC Normalized Difference Vegetation Index

SDC Swiss Agency for Development and Cooperation

SDG Sustainable Development Goals

Sida Swedish International Development Cooperation Agency

UNFCCC United Nations Framework Convention on Climate Change

Programa de incentivos para poseedores de pequeñas extensiones de tierras de vocación

forestal o agroforestal

PROBOSQUE Programa de Incentivos para el Establecimiento, Recuperación, Restauración, Manejo,

Producción y Protección de Bosques

REA Recursos forestales, ecosistemas y áreas protegidas

ROAM Restoration Opportunities Assessment Methodology

SbN Soluciones basadas en la Naturaleza

SICA Sistema de la Integración Centroamericana

STAR Species Threat Abatement and Restoration

UICN Unión Internacional para la Conservación de la Naturaleza

URL Universidad Rafael Landívar

VIDER Viceministerio de Desarrollo Económico Rural

WRI World Resources Institute

Presentation



his document is the result of a joint effort between the Commission on Ecosystem Management (CEM) and the Regional Office for Mexico, Central America, and the Caribbean (ORMACC), both key pillars of IUCN. The CEM and ORMACC have collaborated on various regional issues, including project implementation, training, institutional strengthening, and scientific contributions, among others.

Since 2021, the CEM's regional Coordinator, Rocío Córdoba, has supported the Resilient Highlands Project as a member of the project's Scientific Technical Committee. Her contributions in analysis and work strategies have strengthened the project's implementation and impacts.

The Resilient Highlands Project is funded by the Green Climate Fund (GCF), the Korea International Cooperation Agency (KOICA), and the Government of Guatemala. It aims to strengthen the resilience of local livelihoods against climate change by promoting ecosystem-based adaptation strategies and improving watershed governance. Notably, this was the first project approved for IUCN as a global implementing agency, and it was launched in 2020.

Dr. Manuela Fernández, a member of the CEM, participated as a facilitator in this case study, supporting the technical team of the Resilient Highlands Project in implementing the self-assessment tool of the IUCN Global Standard for Nature-based Solutions (NbS). The results of the self-assessment have been shared with diverse audiences, including the Regional Conservation Forum 2024 in Mexico, multiple training sessions for government agencies in Guatemala, and the Professional Certificate on the IUCN Global Standard for NbS course offered by the IUCN Academy to an international audience.

The results of the case study have made a significant contribution to recent reviews focused on improving the IUCN Global Standard for NbS. The regional Secretariat and CEM are working together to improve tools and approaches to nature-based solutions.

The Global Standard for NbS emphasizes a systemic approach, considering the relationships among natural, economic, social, and institutional components, as well as the links between interventions and the broader landscape vision. The case study illustrates how this systemic vision can be implemented in the field through specific projects. Moreover, the self-assessment tool helps identify opportunities for improvement, maximizing the impact of these projects and interventions.

The case study in this document is structured to make the methodology both accessible and practical, offering a concrete example to support the development of self-assessment processes. Its purpose is to foster training among stakeholders and clarify the concept of nature-based solutions. When properly applied, these solutions address key challenges in climate mitigation and adaptation, benefiting both people and the environment.

This case study is one of the few examples in Latin America that applies the IUCN Global Standard for Nature-based Solutions, and it will undoubtedly help promote its replication in other similar projects or initiatives within the region and globally.

Angela Andrade

Chair of the Commission
On Ecosystem Management

Ursula Parrilla

Regional Director for Mexico, Central America and the Caribbean

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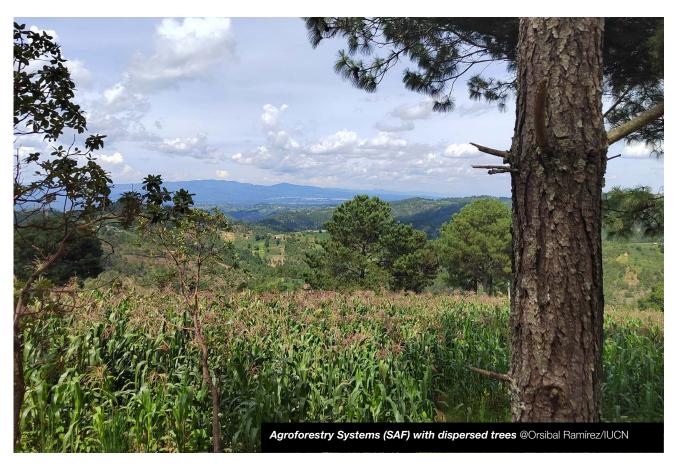
We want to thank the IUCN Ecosystem Management Commission and its regional coordinator, Rocío Córdoba, for their steadfast support in developing this case study and the present publication. We also acknowledge their valuable coordination that facilitated collaboration between the commission and ORMACC.

We would also like to extend our gratitude to the consortium implementing the Resilient Highlands
Project, which includes the Ministry of Environment and Natural Resources (MARN), the Ministry of Agriculture,
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Institute (INAB), the National Institute of Seismology,

Volcanology, Meteorology, and Hydrology (INSIVUMEH), the Foundation for the Conservation of Natural Resources and the Environment in Guatemala (FCG), and Rafael Landívar University (URL).

We gratefully acknowledge the Green Climate Fund (GCF) and the Korea International Cooperation Agency (KOICA) for providing the funding that has enabled the implementation of the Resilient Highlands Project in Guatemala's western highlands since 2020.

We extend special thanks to the project participants, the organizations implementing small and medium-sized donations, and the community groups and Indigenous Peoples whose dedication supports the conservation of natural resources and ecosystems in Guatemala's western highlands. Their ongoing promotion of ancestral practices and knowledge is crucial in addressing climate change, ensuring food security, and building resilient livelihoods.



Summary

his case study presents the self-assessment process for the Resilient Highlands Project, guided by the IUCN Global Standard for Nature-based Solutions (NbS). The assessment focused on the project's theory of change, which includes water and soil management and conservation practices for the long-term sustainability of the hydrological cycle in the Guatemalan Highlands.

The project promotes integrated watershed management by identifying opportunities for restoration. Its comprehensive approach includes the creation of governance structures such as micro-watershed

councils, supplying producers with agroclimatic information, and building the climate response capacity of rural organisations and communities. All this is achieved through grant programmes, government forestry incentives, and the existing extension system. The project also integrates social inclusion, gender equality, and Indigenous Peoples' perspectives.

The project's self-assessment exercise entailed completing an IUCN-developed data matrix. The process followed a seven-step methodology, which included training the technical team on the IUCN Global Standard for NbS, reviewing project indicators and



Pedro Osorio and Santa Soc Osorio, participants in the Resilient Highlands Project, have adopted Ecosystem-Based Adaptation (EbA) practices on their 1.67-hectare plot of land located in the Joj River watershed, Santa María Chiquimula, Totonicapán, Guatemala.

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databases, and collaboratively completing the self-assessment tool, among other steps. The methodology follows IUCN's (2020c) recommendations, tailored to the specific conditions of Guatemala and the project.

The assessment analysed 28 indicators across the eight criteria of the Global NbS Standard. This analysis showed that the Resilient Highlands Project achieved an overall average of 91%, demonstrating adherence with the IUCN Global Standard for NbS.

The analysis of indicators and criteria resulted in twelve recommendations for improvement. Based on the Global Standard—which defines essential considerations for compliant interventions—these recommendations address the Resilient Highlands Project's approach (for instance, adding analyses of ecosystems not fully identified), its operations (for example, streamlining the communications strategy),

and its focus (such as analysing the interactions and effects between interventions and other territories).

The implementation of the self-assessment tool revealed important elements for developing other similar projects. The observations address the practical procedures involved in using the self-assessment tool. Recommendations were also made for the IUCN Global Standard for NbS, particularly regarding criteria 1, 2, 3, 4, and 6.

In conclusion, the IUCN Global Standard for NbS is a useful tool for evaluating interventions and providing recommendations for ongoing projects. It is also suitable for evaluating a project's overall theory of change (i.e. whether it's the desired intervention), rather than individual measures such as soil and water conservation works. The project is already implementing the recommended improvements.



1

Introduction

Climate change is negatively impacting Guatemala, increasing the frequency of extreme events, such as hurricanes and droughts, which, in the long term, will lead to changes in average annual temperature and humidity (Imbach et al., 2018). Short-term events affect the population, agriculture, and infrastructure, while long-term variations impact ecosystems, resulting in fewer humid ecosystems and more dry ones (URL, 2015).

In the western highlands of Guatemala, the impacts of climate change affect water access and availability during the dry season, while the frequency of floods and landslides increases during the rainy season (Juárez, 2021). Furthermore, the high population density in the highlands increases the risk of losses from climate variability, underscoring the importance of promoting climate change adaptation in this region.

In this context, the Resilient Highlands Project has been implemented since 2020 and is scheduled to last for seven years. It aims to reduce the impacts of climate change and strengthen the resilience of rural communities in the upper watersheds of western Guatemala. With a strategy focused on ecosystem restoration and a watershed-based approach, the project seeks to improve water recharge, reduce soil erosion, and increase the adaptive capacity of local livelihoods.

The outputs and intervention approaches were evaluated at the project mid-term to see whether they were consistent with the comprehensive vision of NbS. Therefore, the eight criteria and 28 indicators of the IUCN Global Standard for NbS (IUCN 2020b) for evaluating NbS were reviewed using the standard's self-assessment tool.

Hence, the objective of this case study is to present the process and results of the self-assessment conducted for the project "Building livelihood resilience to climate change in the upper basins of Guatemala's highlands" (Resilient Highlands Project). This exercise also supported the project implementation to ensure the ongoing implementation of the comprehensive NbS approach.

2

Context: Resilient Highlands Project

2.1 Objectives and intervention strategy

The project "Building livelihoods resilience to climate change in the upper basins of Guatemala's highlands" is financially supported by the Green Climate Fund (GCF), the Korea International Cooperation Agency (KOICA) and the International Union for Conservation of Nature (IUCN), acting as GCF's Accredited Entity.

The project is being implemented by a consortium consisting of the Ministry of Environment and Natural Resources (MARN)—Guatemala's Designated National Authority for the GCF—the Ministry of Agriculture, Livestock and Food (MAGA), the National Forestry Institute (INAB), and the National Institute of Seismology, Volcanology, Meteorology and Hydrology (INSIVUMEH). The implementing agencies are the IUCN Guatemala Office, the Foundation for the Conservation of Natural Resources and the Environment in Guatemala (FCG), and Rafael Landívar University (URL), through its Vice-Rectorate for Research and Outreach.

The objective of the project is to reduce the impacts of climate change on the hydrological cycle in the watersheds of the Guatemalan Highlands by scaling up Ecosystem-based Adaptation (EbA) actions.

The project has three components:1

- 1. Integrated and climate-smart watershed management, adapted to the local context of the western highlands, enables restoration activities in prioritised micro-watersheds, where degradation reduces the supply of ecosystem services, especially water availability. Additionally, this component also supports the government in implementing the forestry incentive programmes, PINPEP (Incentive programme for holders of small plots suitable for forestry or agroforestry) and PROBOSQUE (Incentive programme for establishing, recovering, restoring, managing, producing and protecting forests), which are instruments for restoring forest landscapes
- 2. Funding for watershed management to communities through community-based and second-tier organisations. The purpose is to implement climate change adaptation actions on the ground by awarding and executing at least seventeen medium-sized grants to second-tier community organisations and fifty-two grants to grassroots organisations.
- 3. Delivering agroclimatic information to local farmers and technicians. To this end, an early warning system for climate has been developed and strengthened, which includes data collection and interpretation, as well as the dissemination of reliable meteorological and climate information, enabling producers in the western highlands to adapt their agricultural, agroforestry, and forestry practices.

For more information on the Resilient Highlands Project, visit: Project FP087 Guatemala.

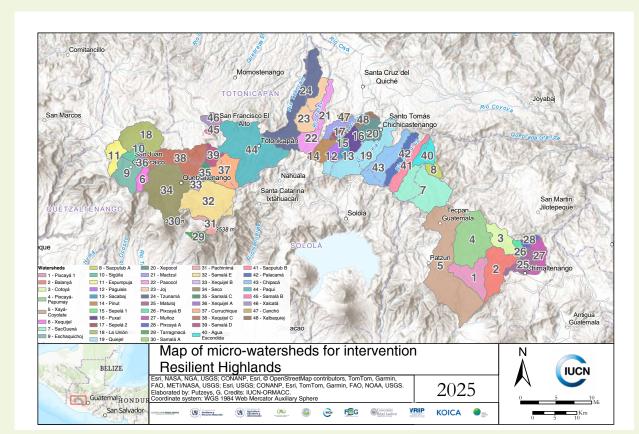


Figure 1. Intervention area and micro-watersheds of the Resilient Highlands Project's Source: IUCN, 2023.

The Resilient Highlands Project is being implemented in the upper basins of the Coyolate, Motagua, Salinas and Samalá rivers, in the departments of Quetzaltenango, Quiché, Totonicapán, Sololá and Chimaltenango, in the western highlands of Guatemala. Figure 1 shows the project's area of intervention.

The approach to promoting integrated watershed management was guided by the Restoration Opportunities Assessment Methodology (ROAM), which prioritises land practices and uses that increase water-related ecosystem services (IUCN and WRI, 2014). ROAM enables the identification of areas for forest restoration and conservation, the establishment of native species plantations, natural regeneration management, development of agroforestry with both annual and perennial crops, protection of riparian forests, creation of production forests, and implementation of agricultural improvements such as organic matter addition and soil and water conservation practices.

The three components work in close collaboration with government agencies (MARN, MAGA, INAB),

micro-watershed councils, and grant-implementing organisations to promote ecosystem restoration.

This collaboration has created a network of local stakeholders who coordinate efforts and processes with government and implementing agencies supported by the project's components.

Beneficiaries and communities also receive meteorological and climate information from INSIVUMEH, which is coordinated through collaborative efforts with MAGA, Rafael Landívar University, grantimplementing organisations, and the IUCN. This partnership supports the implementation of an early warning system for climate events, improving rural households' capacity to respond to the impacts of climate change and also helps farming families make informed decisions about agricultural practices in anticipation of adverse hydrometeorological and climatic conditions. The system integrates both ancestral and traditional knowledge.

The comprehensive approach to conserving and restoring ecosystem functions for the provision of ecosystem services includes social, cultural, and

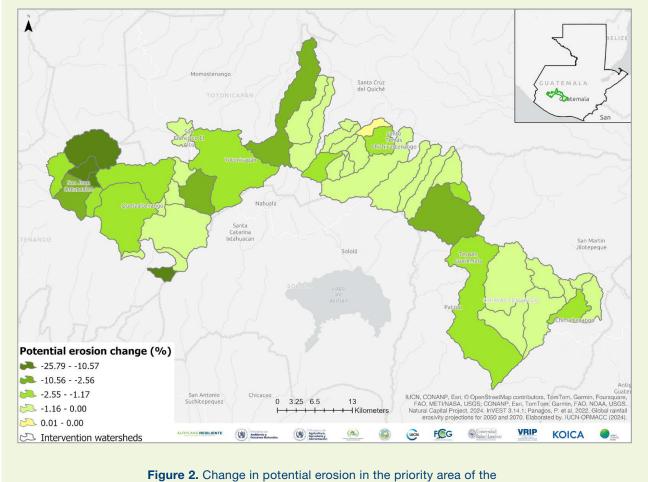


Figure 2. Change in potential erosion in the priority area of the Resilient Highlands Project at the mid-term of its implementation period Source: Resilient Highlands Project

institutional dimensions. It promotes the social inclusion of gender and Indigenous Peoples, thereby strengthening local governance (IUCN and WRI, 2014). Micro-watershed councils have been established with broad community participation and respect for local governance systems, such as the *ri kaxkol*, which refers to community service in forest management. Additionally, project activities include social safeguards such as the free, prior, and informed consent (FPIC) process, among others.

As of March 2025, the Resilient Highlands Project has restored 27,350 hectares, established 20 microwatershed councils, and reached 100,316 direct beneficiaries. Additionally, adaptation practices are improving water availability during the rainy season by increasing groundwater infiltration and reducing

potential erosion and sediment export.² For example, as shown in Figure 2, two micro-watersheds have reduced potential erosion by more than 25%, while eleven others have reported reductions between 5% and 24%.

2.2 Description of the case study

Nature-based intervention. For the self-assessment, water and soil management practices that sustain the hydrological cycle long-term in the Guatemalan Highlands were selected, as outlined in the project's theory of change. In essence, the project's entire comprehensive strategy was evaluated as a Nature-based Solution (NbS) instrument.

The estimation of water balance and sediment export indicators is based on the Integrated Valuation of Ecosystem Services and Tradeoffs (InVEST, Investigated Valuation of Ecosystem Services and Tradeoffs (InVEST, Investigated Valuation of Ecosystem Services and Tradeoffs (InVEST, Investigated Valuation of Ecosystem Services).

Geographical location. The Resilient Highlands
Project is implemented in the upper basins of the
Coyolate, Motagua, Salinas and Samalá rivers, located
in the departments of Quetzaltenango, Quiché,
Totonicapán, Sololá and Chimaltenango, in the western
highlands of Guatemala (see Figure 2).

Case study scale. The Resilient Highlands Project works at the micro-watershed scale (Figure 1). Interventions are implemented across 48 microwatersheds, collectively referred to as the intervention area. The case study examined the entire intervention area.

Status and timeline of the case study. The Resilient Highlands Project began in 2020 and is scheduled to conclude in April 2027. The self-assessment exercise for the NbS was carried out from October 2023 to January 2024, considering the outputs and outcomes achieved up to December 2023.

Ecosystems present. According to the IUCN Global Ecosystem Typology (Keith et al. 2020), this case study considers the work done in the following ecosystems where the Resilient Highlands Project is being implemented:

• **Division:** Terrestrial

• Biome: T1 Tropical-subtropical forest

 Functional group: T1.3 Tropical montane rainforests

Identified societal challenges. NbS are designed to address at least one of the seven societal challenges identified by the IUCN in 2016 and the second public consultation of the Global Standard.³ The primary societal challenge addressed by the Resilient Highlands Project is to promote better conditions for communities and the population to adapt to climate change.⁴ This will be achieved by improving water security in the territory, promoting greater water availability during the dry season and reducing runoff in the rainy season.

The secondary societal challenges addressed by the Project are economic and social development, food security and disaster risk reduction.

Types of nature-based interventions considered in the case study. This study considered the following types of ecosystem-based interventions:

- 1. Ecosystem-based adaptation
- 2. Ecosystem restoration
- 3. Integrated water resource management
- 4. Natural infrastructure
- 5. Forest landscape restoration
- 6. Area-based conservation (protected areas, Other Effective Area-based Conservation Measures [OECMs], biosphere reserves and other related areas)

Relationship between NbS and the Resilient Highlands Project. This case study evaluated the Resilient Highlands Project as an instrument for implementing Nature-based Solutions, using the Project's Theory of Change and examining the actions implemented up to the project's mid-term (as of December 2023).

The project's NbS promotes traditional knowledge in watershed management, natural resource management (including soils, forests, and water), and adaptation strategies. They also encourage interaction and dialogue between technical, scientific, and local traditional knowledge. The NbS also respond to both local needs and national objectives established in political, legal, environmental, and rights-based frameworks. Additionally, the project promotes gender equality and supports vulnerable communities. Institutionality and governance rely on local and territorial bodies —primarily micro-watershed councils that coordinate with municipalities, decentralised MAGA offices, and civil society organisations.

³ IUCN (International Union for Conservation of Nature) Resolution 69 on the definition of nature-based solutions (IUCN Resolution 6.069 of 2016). IUCN Resolutions, Recommendations and other decisions 6-10 September 2016. World Conservation Congress, Honolulu, Hawaii, USA. See: WCC-2016-Res-069-EN. Definition of nature-based solutions, at https://portals.iucn.org/library/sites/library/files/resrecfiles/WCC_2016_RES_069_EN.pdf

⁴ See project document for more information on the socio-economic situation of the Guatemalan Highlands: https://iucn.org/es/news/mexico-america-central-y-el-caribe/202102/proyecto-altiplano-resiliente-fortaleciendo-la-resiliencia-de-los-medios-de-vida-ante-el-cambio-climatico

Restoration, biodiversity conservation and sustainable use. This case study prioritises ecosystem restoration through the promotion of sustainable land practices and uses, such as forest management, reforestation, and the implementation of agroforestry systems. The objective is to ensure water availability during the dry season while preventing erosion during the rainy season, i.e., reducing surface runoff.

To achieve this, Ecosystem-based Adaptation (EbA) practices and measures are implemented for restoration and sustainable management at the landscape level, specifically in watersheds and micro-watersheds (Du et al. 2022). Priority is given to local and native species, including threatened species such as the Guatemalan fir (Abies guatemalensis) (Martínez Arévalo, 2016). Restoration efforts are guided by inclusive governance structures such as micro-watershed councils, where beneficiary communities actively participate and make decisions.

Initiatives such as government forestry incentives (PINPEP and PROBOSQUE) and grants supporting grassroots organisations have been instrumental in building capacity for climate change adaptation measures and improving livelihood resilience. The extension system of MAGA and the municipalities is a mechanism for reaching beneficiaries, providing them with timely technical assistance and climate information.

Furthermore, frost, drought, water stress, and abnormal rainfall patterns have been identified as the main climate threats in the intervention area (IUCN, 2020a). Restoration opportunities were also identified through an analysis of current land use, taking into account the socio-economic and cultural aspects of the territory. The project also promotes inclusive participation in implementing EbA measures based on weather and climate information.

3

Methodology

3.1 IUCN Global Standard for Nature-based Solutions

The IUCN Global Standard for NbS (IUCN 2020b) is a tool designed "to equip users with a robust framework for designing and verifying NbS that yield the outcomes desired, in solving one or several societal challenges" (IUCN 2020b:2). It is important to note that the Standard ensures that "the design and execution quality is accounted for and the results can be tracked and linked to global goals as well as research narratives" (IUCN 2020b:3).

The Standard has eight criteria, each with its own set of indicators. The criteria are based on the principles of NbS and informed by expert consultations (IUCN 2020b; 2020c). The criteria are as follows:

- → Criterion 1: focuses on the process of identifying societal challenges faced by stakeholders and rights holders, as well as understanding the opportunities and challenges associated with the interventions.
- → Criterion 2: evaluates how interventions are implemented and interact at a larger scale, recognising that macro processes can influence the solution's robustness and long-term sustainability beyond the initial execution.
- → Criterion 3: analyses processes and interactions with biodiversity, assessing whether there are opportunities to achieve positive outcomes for biodiversity and whether trade-off measures have been implemented where necessary.

- Criterion 4: provides inputs for assessing the impact on social indicators and analysing trade-off mechanisms.
- Criterion 5: examines processes that can increase the probabilities of achieving positive results for the economic subsystem.
- Oriterion 6: analyses immediate, short-term and long-term outcomes and their relationship with the natural, economic and social spheres.
- Criterion 7: evaluates whether the implementation included the principles of adaptive management, supported by a theory of change and iterative learning processes.
- Criterion 8: analyses the processes for integrating NbS across spatial and temporal scales, assessing the long-term sustainability of impacts beyond the project's implementation period and the potential of the interventions to address current societal challenges.

To support the implementation of the Standard, IUCN has developed a self-assessment tool, which is available online.⁵ The self-assessment rates each indicator on a four-point scale: strong, adequate, partial or insufficient.

The tool provides a traffic light system for each criterion, enabling the identification of areas for improvement and the extent to which the interventions adhere to the IUCN Global Standard for NbS (IUCN 2020c). The traffic light system shows the status of the indicators and criteria, where green means adherence, orange partial reached, and red no accomplishment.

It is also necessary to identify the most appropriate means of verification to support the assessment of each indicator. In addition, the elements describing the reasoning behind the indicator rating should be detailed in the **Rationale** column. If relevant, the last column may be completed with **Recommendations**, **Opportunities**, and **Challenges** encountered for each indicator, and either for the project analysed or the self-assessment tool (see Annex A).

The self-assessment tool assigns a value of "strong" for scores greater than 75, "adequate" for scores between 50 and 75, "partial" for scores between 25 and 50, and "insufficient" for scores lower than 25%. The indicator scores are then normalised so each that criterion has equal weight. After normalisation, the criterion scores are combined to give the overall percentage of adherence. If an intervention scores an "insufficient" rating, then it is considered "noncompliant" with the IUCN Global Standard for NbS (IUCN 2020c).

IUCN (2020c) suggests the following steps when implementing the self-assessment tool:

- → Review the criteria and indicators, including the provided examples, and consider the suggested means of verification in the self-assessment tool;
- → Identify the means of verification that are most suitable for demonstrating to what degree the NbS meets the requirements of each indicator;
- → Describe how and to what extent the NbS meets the requirements of the indicator in the provided cells of the self-assessment tool;
- Provide links to the means of verification used to support the findings;
- Refer to the overview sheet for the traffic light results, the scoring percentages, and whether the intervention adheres to the IUCN Global Standard for NbS;
- Share, report and discuss the findings as needed to improve or implement solutions;
- → Be flexible and repeat the process as needed, given that some evaluation aspects may change.

3.2 Procedure for implementing the IUCN Global Standard for NbS self-assessment

In this case study, the self-assessment process followed the steps outlined by IUCN (2020c), with adaptations or additions made to the activity flow, as illustrated in Figure 3. Further details are provided below.

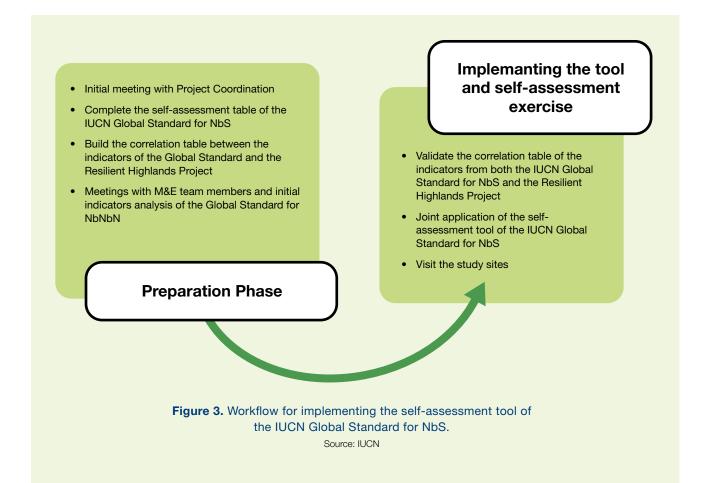
3.2.1 Case study preparation phase

Step 1: Initial meeting with the project team. The project's technical team and coordinators defined the area of action and the scope of the self-assessment, agreeing on the roadmap for its implementation. A participatory exercise was developed to help the team better understand the indicators of the Resilient Highlands Project and how they relate to the IUCN Global Standard for NbS indicators. Similarly, the Resilient Highlands Project staff received training in NbS and the IUCN Global Standard for NbS.

Step 2: Review the Global Standard self-assessment tool. The Global Standard self-assessment tool, available at the following link, was also reviewed. Guidance on using the IUCN Global Standard for nature-based solutions: first edition | IUCN Library System. This tool includes a spreadsheet with formulas for calculating the ratings for all the Global Standard criteria.

Step 3: Analyse the correlation between the Global Standard indicators and the available indicators from the Resilient Highlands Project. This step entailed creating a table that shows the correlation between the Resilient Highlands Project indicators and the criteria and indicators outlined in the IUCN Global Standard for NbS.

This analysis used project information (Table 1), which includes an extensive and robust monitoring and evaluation system, indicator protocols, means of verification, and technical and financial reports submitted to donors and government authorities.



Given that the project is part of the GCF Independent Evaluation Unit's monitoring system, this also helped with a solid database and verifiers.

As part of this third step, the Project's Theory of Change, the Information Management Dashboard, and the 2020-2023 Annual Operating Plan (AOP) were also reviewed. Thus, project indicators were organised into impact, outcome, output, and activity indicators, as well as social and environmental safeguard indicators, which had been reported individually to the GCF (the complete indicators matrix is available from the authors upon request).

The indicator correlation table was created using Microsoft Excel 365, as shown in Table 1. The first column shows the level of each indicator of the Resilient Highlands Project (i.e., impact, outcome, output, and activity). The second column lists the indicator name according to the Project's monitoring system, and the third column identifies the relevant IUCN Global Standard for NbS indicator addressed by the Project. Finally, the last column identifies which Global Standard criteria correspond to each project indicator.

Step 4: Initial analysis of the IUCN Global Standard for NbS indicators. Using the correlation table (Table 1), information gaps were identified for each of the Standard indicators. To address these, the team conducted field visits and reviewed relevant

documentation. This process provided necessary inputs for the self-assessment exercise, significantly improving its effectiveness and overall dynamics.

A total of 94 indicators were identified, related to the four levels of the project's monitoring system: impact, outcome, output and activity, including social and environmental safeguards (ESMS) indicators (Figure 4). The category 'others' refers to information outside of the project's M&E system that may still provide supporting evidence for the project.

The 94 indicators identified align differently with the eight criteria of the IUCN Global Standard for NbS, as shown in Figure 5. For example, four indicators were initially used to analyse Criterion 6 of the Global Standard, while 43 indicators corresponded to Criterion 5.

Table 1. Details of the correlation chart between the existing indicators of the Resilient Highlands Project and the indicators of the Global Standard for NbS

Level	Indicators	Estandar	criterios
Impact	1. Area of agroforestry systems.	C.3.2	3
Impact	2. Area of forestry systems, forest plantations and natural forest management for production purposes.	C.3.2	3
Impact	3. Area of ecosystems restored, established or improved through EbA strategies.	C.3.2	3
Impact	4. Number of women (30%) and men (70%) adopting diversified and climate-resilient livelihood options.	C.5.2	4 y 5
Outcome	5. Number of vulnerable households, local organisations and technicians that, at the local level, use tools, information and practices wholly or partially related to climate.	C.4.1/C.5.2	4
Outcome	6. Potential soil erosion. InVEST	C.3.2	3
Outcome	7. Hydrological balance. InVEST.	C.3.2	3
Outcome	8. Base Flow. InVEST	C.3.2	3
Outcome	9. Local recharge. InVEST	C.3.2	3
Outcome	10. Seasonal water yield. InVEST.	C.3.2	3
Output	11. Watershed management plans include EbA criteria.	C-3.2	3
Output	12. Hectares managed under EbA strategies promoted by forest incentives.	C.3.2	3
Output	13. Number of women (30%) and men (70%) with enhanced capacities for climate action and watershed management who benefit from forest incentives.	C.4.1/C.5.2	4 y 5
Output	14. Number of grants and average amount.	C.4.2/C.4.1/C.4.3	4
Output	15. Number of women (30%, with emphasis on women heads of household) and men (70%) who benefit from grants.	C.4.1/C.5.2	4 y 5
Output	16. Hectares managed under EbA strategies promoted through grants.	C.3.2	3
Output	17. Number of women (30%, with emphasis on women heads of household) and men (70%) with access to frontline climate information.	C.4.1/C.5.2	4 y 5
ACTIVITY 1.1	1.1.1 Measurement of stream flow and quality, interception rate, infiltration and water recharge in watersheds.	C.3.1	3
ACTIVITY 1.1	1.1.2 Technical capacity building of Women's Offices in at least 20 municipalities and the gender offices of MAGA, MARN, INAB and CONAP.	C-1.3/C-5.5	1y5
ACTIVITY 1.1	1.1.3 Implementation of at least 20 diversified agroforestry nurseries.	C2.1/C3.4	2 y 3
ACTIVITY 1.1	1.1.4 Implementation of appropriate technology through the application of best land-use practices in prioritised zones (soil conservation practices and structures).	C2.1	2
ACTIVITY 1.1	1.1.5 Participation in at least four international experience-exchange events.	C.5.5	5
ACTIVITY 1.1	1.1.6 Creation and/or strengthening of micro-watershed/watershed committees and development of 20 management plans with emphasis on climate adaptation.	C.4.1/C.5.3	4 y 5
ACTIVITY 1.1	1.1.7 Creation and strengthening of municipal water offices and local committees for efficient water use (at least 10 municipalities).	C-1.3/C-5.5	1y5
ACTIVITY 1.1	1.1.8 Strengthening the capacities of four government institutions (INAB, MAGA, MARN, CONAP) and at least 20 municipalities.	C.4.1	4
Activity 1.2	1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRISTAL.	C.3.4	3
Activity 1.2	1.2.2 Rehabilitation of 12,500 hectares through the EbA approach and natural infrastructure interventions.	C.3.2	3
Activity 1.2	1.2.3 Support to INAB for the certification of PROBOSQUE-PINPEP incentives.	C.4.1/C.42/C.4.4/C.6.2/C.82	4, 6 y 8
Activity 1.2	1.2.4 INAB payment of agroforestry incentives.	C.4.1/C.42/C.4.4/C.62/C.82	4, 6 y 8
Activity 1.2	1.2.5 Capacity building of four government institutions (INAB, MAGA, MARN, CONAP), and at least 20 municipalities, including raising gender awareness, and the use of tools incorporating gender considerations.	C-1.3	1
Activity 1.2	2.1.6 Evaluation and selection of six fundable projects.	C-4.1/C-4.2/C-4.3/C-4.4	4
Activity 1.2	2.1.8 Grant monitoring and evaluation phase.	C.72	7

Source: IUCN

3.2.2 Using the tool and validation exercise

From 20 to 22 November 2023, in the city of Quetzaltenango, the Resilient Highlands Project staff gathered to collaboratively work on the self-assessment. Together, the group completed the following steps:

Step 5: Validation of the correlation table between the IUCN Global Standard for NbS indicators and the indicators of the project's monitoring and evaluation system. The team validated, deleted and adjusted the indicator correlation table created in steps 3 and 4.

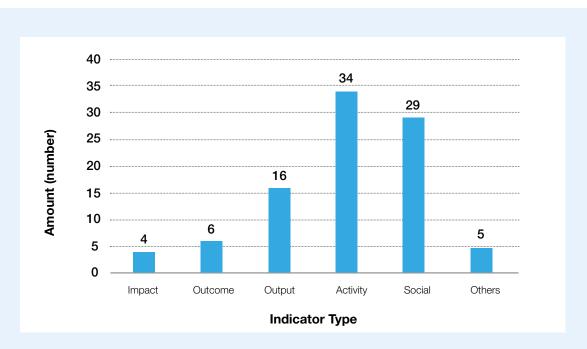


Figure 4. Type and number of indicators used in the correlation table between the existing indicators of the Resilient Highlands Project and the indicators of the Global Standard for NbS Source: IUCN



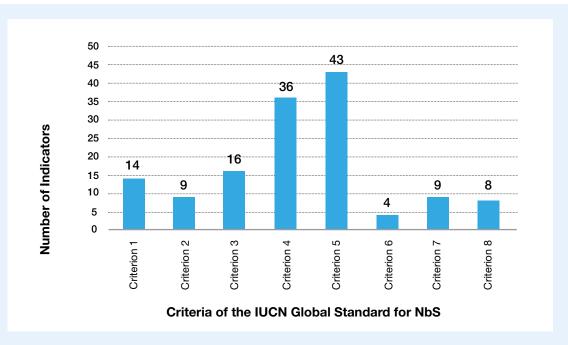


Figure 5. Distribution of the Resilient Highlands Project indicators according to the corresponding criteria of the IUCN Global Standard for NbS.

Source: IUCN





Step 6: Complete (collectively and collaboratively) the IUCN Global Standard for NbS self-

assessment tool. Once all the indicators of the Resilient Highlands Project had been identified and linked to the appropriate criteria and indicators of the Global Standard, the self-assessment tool was completed and validated (IUCN, 2020b). The following supporting materials were used:

- Training material on NbS and the IUCN Global Standard for Nature-based Solutions.
- 2. IUCN Global Standard for Nature-based Solutions: A user-friendly framework for the verification, design and scaling up of NbS (IUCN, 2020b).
- 3. Guidance for using the IUCN Global Standard for Nature-based Solutions: A user-friendly framework for the verification, design and scaling up of Nature-based Solutions (IUCN, 2020c).

Step 7: On-site verification of indicators. The purpose of the field visit was to corroborate the weightings of specific indicators, fill in information gaps, and identify any aspects not covered in the self-assessment. The field visit was not to validate indicators, as the Project already has a robust monitoring and evaluation system in place.

The team visited several implementation sites of the Resilient Highlands Project, such as the municipal nursery in Totonicapán (Photo 1); met with beneficiaries who are members of the Paxocol Micro-Watershed Council in the Chixoy River watershed (Photo 2); and visited the demonstration plot of Pedro Osorio Pu, where the Keyline system is being practiced.⁶

4

Self-assessment results

Annex A (Tables A.1 to A.8) shows the results of the self-assessment for the Global Standard for NbS as applied to the Resilient Highlands Project. These tables include the indicators, their assigned ratings based on the self-assessment tool,⁷ along with rationales, means of verification and recommendations for each indicator, across all eight criteria of the Global Standard.

The Project scored 100 points in four criteria, as follows⁸:

Societal challenges (Criterion 1). The project addresses a pressing challenge faced by the Highlands population: climate change, and water availability and access. This issue continues to be highly relevant, as confirmed by various local stakeholders. Appropriate measures such as ecosystem-based adaptation have also been identified. The project's outcomes and impacts are evaluated periodically. This criterion scored 100 points, thus rated as "strong".

Scale-informed design (Criterion 2). The project design is solid, having prioritised the beneficiaries' most significant societal challenges right from the start. In this case, priority was given to providing climate change adaptation tools to the target groups, as well as establishing an early warning system to improve household resilience.

The project has clearly identified and documented societal challenges (e.g., through prior and informed consultations). It also defined results in terms of human well-being and benchmarks for periodic evaluation using an indicator system and the Learning-Oriented Real-Time Impact Assessment (LORTA) evaluation, focused on the impact and scope of the theory of change.

The design included interactions between the economy, society and ecosystems in the planned actions, as well as the environmental and social safeguards, which are reflected in the action plans for Indigenous Peoples and gender, for example. It also appropriately complements other projects and government policies. The approach is based on integrated watershed management and ecosystem restoration and incorporates risk dimensions and risk management beyond the project site (e.g., the project has a gender and social inclusion strategy).

Economic viability (Criterion 4). The project design and implementation include the estimated costs and benefits of its interventions. The starting point was the identification of restoration opportunities using the ROAM methodology, which features a cost-benefit economic assessment. The promoted alternatives address producers' needs and are also informed by preferences identified from existing systems.

Inclusive governance (Criterion 5). The project has a three-level governance structure: a steering committee with four participating government agencies, local advisory committees at the regional/departmental level and local micro-watershed councils. This structure is linked to national-level policies and governance bodies in different ways. The project implements social safeguards, including free, prior, and informed consultations, and has established micro-watershed councils that serve as platforms for governance and promoting local actions.

⁷ See section 3.1 of this document for the values assigned to the 'solid', 'adequate', 'partial' and 'insufficient' ratings.

⁸ For more details, refer to Annex A. Verification sources are available from the Resilient Highlands Project upon request.

The following four criteria received a high rating, with scores ranging from 75% to 89%.

Net gain to biodiversity and ecosystem integrity (Criterion 3 with 83 points). Four indicators were evaluated under this criterion; three of which were rated as "strong" and one as "partial" (see section 3.1 on the methodology of the self-assessment tool [UICN, 2020b], and Table A.3 in the annex).

The first indicator assesses whether "interventions respond directly to evidence-based assessment of the current state of the ecosystem and prevailing drivers of degradation and loss." This indicator was rated "strong," given that the project is based on the national forest landscape restoration map and uses up-to-date restoration studies at the micro-watershed level.

As part of the baseline, the ecosystem services of soil protection and water balance provided by local forests were estimated and updated for the mid-term evaluation (2025). Although no specific biodiversity studies were conducted, maps of forest degradation status are available. These maps use indicators such as the Normalised Difference Vegetation Index (NDVI), which provides a rough measure of the ecological integrity of forest areas.

The second indicator evaluates whether "clear and measurable biodiversity conservation outcomes are identified, benchmarked and periodically assessed." This indicator was rated as "strong," given that the project has specific and measurable indicators related to ecosystem restoration, aiming to restore at least 22,500 hectares with different land uses (forest conservation, sustainable forest management, reforestation, and agroforestry systems) by the end of the project.

The project established a monitoring and reporting system with quantifiable values from the outset. A baseline, approved by the donor, was also created at the beginning. As a result, there is now enough information to measure ecosystem restoration.

The third indicator analyses whether there is regular monitoring of "unintended adverse consequences on nature arising from the NbS." This indicator was rated as "partial." The project has a "B" rating for social and environmental risks according to the donor's

methodology (a "low" rating for the environment and a "medium" rating for social risks). For example, the direct interventions of the watershed component focus on ecosystem restoration. Similarly, activities funded through small and medium-sized grants undergo an environmental risk assessment at the project design stage, where the technical evaluation committee offers recommendations to prevent unintended harm.

Although the project implements adequate environmental safeguards, it was rated as "partial" because the monitoring of possible effects on biodiversity resulting from the interventions lacks a systematic analysis. Therefore, the project needs to analyse the impacts of NbS interventions on ecosystems and generate supporting scientific evidence. For example, these impacts could include a decrease in water availability due to rainwater harvesting in micro-watersheds (negative, though unlikely). Consequently, the project will include procedures to measure possible negative impacts.

Finally, the fourth indicator of criterion 3, which examines whether "opportunities to enhance ecosystem integrity or connectivity" have been identified and integrated into the NbS strategy, was rated as "strong." At the micro-watershed level, forest landscape restoration improves connectivity and species conservation and increases the provision of ecosystem services. At the farm level, the project has studies on how agroforestry systems improve the quantity and diversity of species within plots, as well as biodiversity and soil conditions.

Given that the project aims to restore ecosystems and their functions, its goal is to enhance two ecosystem services: reducing potential erosion and increasing aquifer infiltration, which are estimated using water balance and sediment export data through the Integrated Valuation of Ecosystem Services and Tradeoffs (InVest) tool (see footnote 3). In this regard, the mid-term evaluation showed that potential erosion was reduced by up to 25%, while in other areas the reduction is about 10%.

Balance trade-offs (Criterion 6 with 78 points).

Among the three indicators in this criterion, the project received a rating of "solid" for one and "adequate" for the other two. See the methodology section for the weightings used by the self-assessment tool, as well as Table A.6.9

The first indicator analyses whether "the potential costs and benefits of the trade-offs associated with the NbS intervention are explicitly acknowledged, and informs safeguards and any other appropriate corrective actions". This indicator was rated as "adequate" because, from the outset, the project had a strategy in place to implement the social and environmental standards required by the donor (GCF) and the IUCN, which included specific objectives in both the gender and Indigenous Peoples plans.

The designed safeguards focus on avoiding negative impacts from the interventions, stating that comprehensive social and environmental measures guide the project actions. However, this indicator also requires a cost-benefit assessment of the NbS implementation sites and across a broader landscape over the project's duration. At the time of the assessment, the project lacked an analysis of potential costs and benefits at the landscape level outside the direct intervention area. Consequently, due to these gaps, the indicator was rated as "adequate" according to the self-assessment tool (see Table A.6).

The second indicator evaluates whether the project "acknowledges and respects the rights, usage of and access to land and resources, along with the responsibilities of different direct stakeholders." On this point, all interventions recognise the land tenure and rights of the populations in the area; therefore, this indicator was rated as "strong".

Additionally, adequate monitoring is in place to ensure that organisations implementing grants recognise the rights of communities and take into account local norms, as well as ancestral knowledge and wisdom. Gender safeguards and the implementation of the strategy further ensure that People's rights are

respected. The Indigenous Peoples' action plan also outlines the required social standards to guide the implementation of actions.

The third indicator examines whether "the established safeguards are periodically reviewed to ensure that mutually-agreed trade-off limits are respected and do not destabilise the entire NbS." This indicator was rated as "adequate" because the safeguards are identified and implemented: workshops and training sessions are held at specific times for both men and women, the local language is used, family roles are respected, and the ecosystem restoration considers the interests of both men and women regarding the species selected. However, the project should improve the periodic reviews of safeguard compliance, especially for organisations implementing grants. ¹⁰

Adaptive management (Criterion 7 with 89

points). A robust monitoring and evaluation system is in place, allowing implementation strategies to achieve the intended results. However, at the time of the evaluation, learning and knowledge management mechanisms needed to be built in to capitalise on the project's impacts and support its scaling up. The evaluation of this criterion prompted urgent measures to communicate lessons learned and adapt them during the implementation of actions.

Mainstreaming and sustainability (Criterion 8 with

78 points). This criterion analyses three indicators (see Table A.8). The first indicator assesses whether "the NbS design, implementation and lessons learned are shared to drive transformative change". This indicator was rated "partial" since, at the time of the evaluation, the existing communication and learning strategy had not yet been fully implemented. Additionally, some actions required attention, such as publishing success stories, translating training materials into local languages, organising experience exchange events among organisations implementing grants, and providing training on the early warning system.

The second indicator of this criterion looks at whether "NbS informs and enhances facilitating policy and

⁹ Based on the self-assessment, the project took actions to improve communication of lessons learned and the monitoring of organisations implementing donations. Therefore, at the time of publication, indicators 6.1 and 6.2 could have a improved their score.

¹⁰ Due to this exercise, the project incorporated mechanisms to ensure the implementation of social and environmental safeguards for organisations that implement grants.

regulatory frameworks to support its adoption and mainstreaming." This indicator was rated "strong", as the project has supported the national gender policy. It also worked with INAB on reviewing the forestry policy, and supported the National Council of Protected Areas (CONAP) in designing the social engagement policy of protected areas. Additionally, the project contributed to updating the national restoration strategy with INAB; supported the municipal water resource management policy in the municipality of Totonicapán; collaborated with the Regional Coordination and Rural Extension Department (DICORER) and the Deputy Ministry of Rural Economic Development (VIDER) on policy instruments for the national rural extension system; and participated in technical roundtables for the Motagua and Samalá watersheds with MARN, as well as in the agroclimatic technical roundtables of MAGA and INSIVUMEH. Similarly, the project is an instrument of the national climate change policy.

The third indicator reviews whether "NbS contribute to national and global targets for human well-being, climate change, biodiversity and human rights, including the United Nations Declaration on the Rights of Indigenous Peoples." This indicator was rated "strong" because it responds directly to targets of the national climate change policy, thereby contributing to

ecosystem restoration, improving People's adaptive capacity and facilitating an early warning system.

Furthermore, the project implements its gender strategy, with interventions aligned to national and international human rights commitments; thus, contributing to Guatemala's standing on international agreements and conventions, as well as supporting the Agriculture, Forestry and Other Land Use (AFOLU) regional initiative of the Central American Integration System (SICA). In addition, its Indigenous Peoples' plan complies with the safeguards and standards that recognise the rights and participation of Indigenous Peoples, including those outlined in the Global Biodiversity Framework.

Table 2 shows a summary of the self-assessment tables. The overall average score is 91%, proving that the Project adheres to the IUCN Global Standard for Nature-based Solutions (NbS).

¹¹ At the time of publication, the communication plan had been fully implemented. A communications strategy for the early warning system was also developed which, as of the fifth year of the project, includes a mobile app, radio spots, rural extension systems, and the formalisation of agroclimatic technical roundtables.

Table 2. Results of the self-assessment tables of the Global Standard for NbS

Criterion	Criterion score	Maximum score for the criterion	Normalised criterion ^{a/}	Final result (%)
1. Societal challenges	9	9	1,00	100 %
2. Scale-informed design	9	9	1,00	100 %
3. Net biodiversity gain	10	12	0,83	83 %
4. Economic viability	12	12	1,00	100 %
5. Inclusive governance	15	15	1,00	100 %
6. Trade-offs balance	7	9	0,78	78 %
7. Adaptive management	8	9	0,89	89 %
8. Mainstreaming and sustainability	7	9	0,78	78 %
Total score percentage		•••••••••••••••••••••••••••••••••••••••		91 %
Do these results adhere to the IUCN Global Standard for NbS?			Yes, they do	

a / Each indicator is normalised to values between 0 and 1 to enable comparison across criteria and calculate a final score. Source: IUCN

Figure 6 shows a summary of the self-assessment process, illustrating that the NbS of the Resilient Highlands Project, titled "Water and soil management practices for the long-term sustainability of the hydrological cycle in the Guatemalan Highlands," adheres to the IUCN Global Standard.

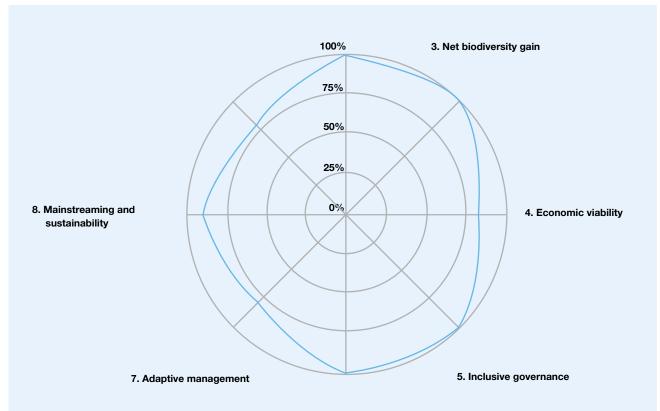


Figure 6. Summary of the self-assessment process for the Resilient Highlands Project.

Source: IUCN

Identified lines of action

The results of the self-assessment show that the intervention model of the Resilient Highlands Project (i.e. Water and soil management practices for the long-term sustainability of the hydrological in the Guatemalan Highlands) constitutes an NbS. In other words, it has a set of practices that promote soil and water conservation, watershed management, governance, and cultural considerations to ensure the systemic implementation of the project.

The tool highlighted areas for improvement that the project can tackle in the short term, and the self-assessment process offered insights into the implementation methodology and the IUCN selfassessment tool (2020c). The sections below explore these findings.

5.1 Recommendations for the **Resilient Highlands Project**

Recommendation 1:

The NbS model developed should further emphasise how the outcomes of such initiative align with Guatemala's international commitments.

such as the Rio Declaration on Environment and Development (1992), the United Nations Framework Convention on Climate Change (UNFCCC) (1994), the Montreal Protocol (1999), the Millennium Declaration (2000), the Kyoto Protocol (1997), the United Nations Convention to Combat Desertification and Drought (1994), the 2030 Agenda for Sustainable Development (2015), and the Paris Agreement (2016).

Strengthening these alignments will benefit the country and its institutions by providing technical inputs and resources to develop strategies and public policies that foster the adoption of NbS in different projects nationwide. This is feasible because the Project integrates the relevant government institutions into its strategic governance and maintains close communication with them across all territories.

Recommendation 2:

The outputs and outcomes developed from the NbS model can contribute to achieving the objectives of the National Biodiversity Strategies and Action Plans, as well as the Nationally Determined Contributions (NDCs). Since the IUCN Global Standard for NbS has a systemic approach, the Resilient Highlands Project can support the development or improvement of national adaptation and mitigation strategies. Moreover, it is an instrument of the National Climate Change Adaptation Plan, which directly addresses the country's priorities.

The implemented NbS intervention model contributes to several of the Nationally Determined Contributions (NDC) targets. For example, in the Forest Resources, Ecosystems and Protected Areas sector: REA-1 Forest Cover; REA-3.1 Forest Restoration; REA-3.2 Agroforestry Systems; REA-4 Ecosystem-based Adaptation. Therefore, it is recommended that the description of project outcomes emphasise their direct connection to the NDCs and the Biodiversity and Climate Change Adaptation Strategies.

→ Recommendation 3:

Keep information on societal challenges up-todate. This recommendation is based on Criterion 1 (NbS effectively address societal challenges [IUCN, 2020b]) and its Indicator 1: The most pressing societal challenges for rights-holders and beneficiaries are prioritised. Consultations help identify which issues or

challenges are most important to society and enable the timely detection of emerging pressing challenges. This contributes to scaling up the project and ensuring the sustainability of the actions.

→ Recommendation 4:

Adapt documents and publications to local languages. Based on Criterion 1, Indicator 2 (The societal challenges addressed are clearly understood and documented), it is recommended that all project documents and publications produced be translated into local languages, using suitable didactic techniques and graphic design.

Recommendation 5:

Restoration outcomes must be linked to IUCN tools for threatened species and conservation threats. For Criterion 3 (NbS result in a net gain to biodiversity and ecosystem integrity), and its indicator 1 (NbS actions directly respond to evidence-based assessment of the current state of the ecosystem and prevailing drivers of degradation and loss), it is recommended to expand the analysis of the self-assessment results with the IUCN Red List of Threatened Species. 12

It is also recommended to describe the context of the Guatemalan Highlands, using the Species Threat Abatement and Restoration (STAR) metric tool.¹³ Doing so helps link the project to the formulation of strategies and public policies that promote NbS, using available data and information.

Recommendation 6:

Analyse whether the interventions may be causing adverse effects on ecosystems. In Criterion 3, indicator 2 (Clear and measurable biodiversity conservation results are identified), the assessment identified that the project should include ecological and conservation indicators. This information can then be used to monitor potential adverse impacts at both the biological and social levels, thereby evaluating whether the objectives of reducing erosion and conserving water resources are being achieved.

→ Recommendation 7:

Identify additional areas of intervention that include the gaps identified in the ecosystems map of Guatemala. This recommendation is based on the discussion in Criterion 3, indicator 3 (Monitoring includes periodic assessments of unintended adverse consequences on nature arising from the NbS). The project can evaluate whether it is possible to include important ecosystems in the highlands or support the scaling up of activities in other territories.

→ Recommendation 8:

Document the work carried out by municipal extension agencies in implementing water and soil conservation activities. This includes the Maize Intercropped with Fruit Trees (MIAF) system¹⁴ and the Keyline plots. This evidence should be included in the section on scaling up actions in the annual performance report submitted to the donor.

→ Recommendation 9:

The safeguards monitoring system must be improved overall, and especially regarding grant programmes. Criterion 6 (NbS equitably balance trade-offs between achievement of their primary goals and the continued provision of multiple benefits) and its Indicator 3 (The established safeguards are periodically reviewed to ensure that mutually agreed trade-off limits are respected and do not destabilise the entire NbS). It is recommended that the project include monitoring of social and environmental safeguards and check that organisations implementing donations are complying with these standards. This will help ensure that all necessary information and guidance are available to support effective action.

→ Recommendation 10:

Strengthen the communication channels used for sharing project lessons learned. This observation responds to Criterion 7 (NbS are managed adaptively, based on evidence), Indicator 3 (A framework for iterative learning that enables adaptive management is applied throughout the intervention life cycle). It is recommended that regular learning meetings be held for

¹² Disponible en: IUCN Red List of Threatened Species

Ver: UICN. (2024). Species Threat Abatement and Restoration (STAR) metric. Disponible en: https://lucn.org/resources/conservation-tool/species-threat-abatement-and-restoration-star-metric

¹⁴ Ver: Sistema de Milpa Intercalada con Árboles Frutales, ¿qué es, cómo funciona y cuáles son sus beneficios? | Secretaría de Agricultura y Desarrollo Rural Gobierno | gob.mx

project staff and that an open-access library be created for sharing results.

Additionally, experiences and lessons learned should be systematised and published in technical literature, on social media, and in scientific journals (e.g., Open Access) to promote the results achieved. Furthermore, materials created by grant-implementing organisations should be disseminated to share project information with a larger number of beneficiaries.

→ Recommendation 11:

The implementation of the early warning system's communication strategy should be streamlined.

Experiences should be systematised and the strategic and implementation processes of the Project must be addressed. It is proposed to make meteorological and climate information more straightforward and to diversify communication channels, paying attention to the timing and methods of distribution.

Although results and processes are shared with staff from different agencies, this information is often lost when there are changes in administration. This identified opportunity relates to Criterion 8 (NbS are sustainable and mainstreamed within an appropriate jurisdictional context), Indicator 1 (The NbS design, implementation and lessons learned are shared to drive transformative change).

Recommendation 12:

Report the Project results under the framework of Sustainable Development Goal 5 (SDG 5 - Achieve gender equality and empower all women and

girls. (Gender equality and women's empowerment)

The project's contributions to social and environmental safeguards should be systematised and linked to the country's international commitments. This responds to Criterion 8, Indicator 3 (Where relevant, the NbS contributes to national and global targets for human well-being, climate change, biodiversity and human rights, including the United Nations Declaration on the Rights of Indigenous Peoples).

5.2 Relevant observations from the implementation of the self-assessment tool

During the implementation of the self-assessment tool, several aspects were identified that could be relevant for other similar projects. These include:

- The Global Standard is designed to evaluate an entire project, rather than just a specific measure such as soil and water conservation works. In the case of the Resilient Highlands Project, analysing only a single measure would have resulted in an incomplete assessment. Self-assessing the entire project allowed for a thorough and systematic review of its theory of change.
- → Training the project team on the IUCN Standard for NbS prior to the self-assessment proved very valuable. This step is strongly recommended.
- Regarding adaptation to local language and idiosyncrasies, it was necessary to adapt the standard's concepts to the objectives, idiosyncrasies, and national context in which the project is implemented.
- → Time and dedication. The self-assessment process required the undivided attention of 10 project staff members over a three-day period.
- The self-assessment process was conducted in a participatory manner with the technical staff of the Resilient Highlands Project. This approach encouraged greater dynamism and diverse perspectives, leading to rigorous reasoning during the self-assessment.

- Robust databases and indicators: The project has a robust monitoring and evaluation system with indicators at multiple levels and adequately systematised sources of information. Prior to the participatory self-assessment, these indicators were mapped along with their correlation to the Global Standard criteria. This facilitated the collective work and served as a basis for discussing, understanding and validating the indicators during the self-assessment process.
- Nowledge of project indicators: The participants had in-depth knowledge of the project indicators and activities, which fast-tracked the identification and assessment of each criterion and indicator in the Standard.
- → It is necessary to extend the analysis and selfassessment process to the three implementing partners (IUCN, URL and FCG) to ensure the assessment reflects a broader representation of the project stakeholders.
- → With its vision and policies promoting conservation, restoration, and sustainable management through engagement with stakeholders and populations, the IUCN offers a suitable institutional and organisational framework for promoting Nature-based Solutions (NbS) and supporting organisations seeking to integrate NbS into their activities and work plans.

5.3 Recommendations for the IUCN Global Standard for NbS

After completing the self-assessment process of the Resilient Highlands Project under the IUCN Global Standard for NbS, the following recommendations are suggested:¹⁵

- → Criterion 1: NbS effectively address societal challenges. Indicator 1.1 (The most pressing societal challenges for rights holders and beneficiaries are prioritised). The indicator relates to the degree and type of consultation, which should be enough to distinguish between 'strong' and 'adequate'; however, the difference between the two ratings is not specifically significant. The fact that 'strong' includes the "most pressing" challenges creates a considerable difference in valuation. Therefore, it is recommended to remove the phrase "most pressing."
- by scale. Indicator 2.1 (The design of the NbS is informed by scale. Indicator 2.1 (The design of the NbS recognises and responds to interactions between the economy, society and ecosystems) can be confused with Indicator 2.3 (The design of the NbS incorporates risk identification and risk management beyond the intervention site) because the former refers to the effect or impact, while the latter also asks about the impacts. It is suggested that the first indicator addresses the question of impact, while the second indicator should only focus on risks and not effects.
- → Criterion 3: NbS result in a net gain to biodiversity and ecosystem integrity. Indicator 3.3 (Monitoring includes periodic assessments of unintended adverse consequences on nature arising from NbS). In this indicator, the risks are confused with impacts, and the scales can get mixed up. On one hand, it refers to risk or impact at the project scale, and on the other, to risks and impacts at the scale of the intervention area and outside the intervention area.

- Indicator 4.2 (A cost-effective study is provided to support the choice of NbS, including the likely impact of any relevant regulations or subsidies). The Global Standard was designed to address this indicator in terms of cost-effectiveness in design, rather than in monitoring and evaluating the effectiveness of the implemented interventions being carried out. It is suggested that this type of analysis also be considered during interventions, not just during the design phase.
- Criterion 6: NbS equitably balance tradeoffs between achievement of their primary goal and the continued provision of multiple benefits. Indicator 6.1 (The potential costs and benefits of associated trade-offs of the NbS intervention are explicitly acknowledged and inform safeguards and any other appropriate corrective actions). The word "trade-off" is translated into Spanish as "compensación," but this term does not have the same meaning as "trade-off" in English. In the French version, it was translated as compromise (compromise in English). After analysing the different meanings, the team considered that the best translation of trade-off into Spanish would be sacrificio, (sacrifice in English), which refers to a situation involving 'loss and gain'. Therefore, this suggests that certain aspects must be sacrificed or lost to the detriment of others, in order to obtain or gain something else.

Conclusions

This case study shows the self-assessment process for the Resilient Highlands Project, based on the IUCN Global Standard for Nature-based Solutions (NbS). The NbS evaluated corresponded to the project's theory of change and, therefore, to an intervention model that combines water and soil management with conservation practices for the long-term sustainability of the hydrological cycle in the Guatemalan Highlands. Thus, the project's strategy and approach were considered as the NbS for evaluation.

The intervention model promotes integrated watershed management by identifying restoration opportunities, establishing governance structures (micro-watershed councils), providing agroclimatic information to producers, strengthening Guatemala's public extension systems, and increasing the climate response capacity of rural organisations and communities. This is achieved through a combination of grant programmes, government forestry incentives and strong coordination with existing extension systems. Public policies and incentives have been a key starting point as mechanisms for developing climate change adaptation solutions. The project also integrates a focus on social inclusion, gender and Indigenous Peoples.

The project's self-assessment exercise entailed completing an IUCN-developed data matrix. To this end, a seven-step methodology was followed, which included training the technical team on the NbS Standard, reviewing project indicators and databases, and collaboratively completing the self-assessment tool, among other steps. The methodology follows IUCN's (2020c) recommendations tailored to the specific conditions of Guatemala and the project.

The self-assessment process of the Resilient Highlands Project conducted using the IUCN Global Standard for NbS framework, yielded the following conclusions:

1. The results revealed that the Resilient Highlands
Project's theory of change obtained an overall
average score of 91%, confirming that the Project
adheres to the IUCN Global Standard for NbS.

- 2. Twelve recommendations for improvement were identified to improve the interventions based on NbS criteria and indicators. The recommendations address the project's approach (e.g., adding analyses of ecosystems not fully identified), operational issues (streamlining the communications strategy) and focus (such as analysing interactions and effects between interventions and other territories).
- 3. The IUCN Global Standard for NbS is a useful tool for evaluating a project in its implementation phase. The self-assessment tool is rigorous, which helped evaluate the implementation of the Resilient Highlands Project, providing a basis for identifying successes and opportunities for improvement for the remainder of the project's life and closure cycle.
- 4. The assessment process can be further strengthened by using other assessment tools, such as the IUCN Red List of Threatened Species or the STAR metric, which generate robust results and information for informed decision-making.
- 5. The robust information and monitoring and evaluation (M&E) system of the Resilient Highlands Project made it possible to use the IUCN self-assessment tool. Initial training, participatory discussions and data collection were also key elements.
- 6. The information generated by the self-assessment tool can be easily adapted and communicated to the beneficiaries, helping them learn about sustainable and adaptation practices.
- 7. The self-assessment of the Resilient Highlands
 Project under the framework of the IUCN Global
 Standard for NbS, resulted in five recommendations
 for the self-assessment tool. The observations
 pertain to indicators 1, 2, 3, 4 and 6, and highlight
 the need for clearer indicators, pertinent translation
 of concepts and improved indicator rating.



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The Guatemalan Highlands are marked by mountainous landscapes, volcanic soils, and elevations above 1,500 meters above sea level. Adaptation strategies are based on restoring forest ecosystems through forest management, plantations, and agroforestry systems. The goal is to conserve soil and improve water availability and access.

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Table A.1. Self-assessment table for Criterion 1: Societal challenges

Indicator			How well intervention		How well ha	s the indicator been m	et?			
No.	Indicator	Guiding questions	matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	Recommendations, opportunities and challenge
1.1	The most pressing societal challenges for rights holders and beneficiaries are prioritised	Are societal challenges identified? Are rights holders and beneficiaries consulted? Are the most pressing societal challenges for rights holders and beneficiaries prioritised?	Strong	Yes. The most pressing societal challenges prioritized based on full consultation with rights holders and beneficiaries.	Specific societal challenges identified with some consultation with rights holders and beneficiaries.	General societal challenges identified with limited input from some rights holders and beneficiaries only.	No. No clear societal challenges identified and/or no consultation with any rights holders and beneficiaries.	Water and the impacts of climate change were mentioned by the beneficiary population. Other challenges were also identified, such as access to land. Annex 13 highlights difficulties and needs expressed by the population, some of which are being addressed while others are not. The baseline and LORTA, as well as the rapid assessments, also ask about the main problems.	Baseline (including surveys in which information was collected on the main needs of the communities in the project area). Rapid assessment of the impact of the COVID-19 pandemic on rural households and their livelihoods (identifying the economic areas in which households were affected and, therefore, prioritising livelihoods for the prompt economic recovery of the communities). Characterisation and prioritisation of the intervention microwatersheds (24 micro-watersheds were prioritised according to social, environmental, cultural, and biophysical criteria). Annex 13: Report on consultation workshops. 1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRISTAL.	Solid consultations were carried out, which helps identify the challenges and problems highlighted by society itself. However, we did not differentiate which were the "most pressing", such appraisal is still missing. The distinction between "solid" and "adequate" is not particularly relevant, since it essentially refers to the degree and type of consultation, which is already sufficient for differentiation. However, by adding the "most pressing" challenges to the definition of "solid," it introduces another layer of evaluation. Suggested improvement: remove the phrase "most pressing."
1.2	The societal challenges addressed are clearly understood and documented	Are the drivers and responses to the societal challenges identified? Are the societal challenges understood at the relevant national/ local context? Are the societal challenges documented and accessible to affected stakeholders?	Strong	Yes. The drivers of and responses to identified societal challenges are well understood, including with reference to the relevant national/ local context, and are fully documented and accessible.	Drivers of and responses to identified societal challenges are broadly understood within the relevant context although some documentation and knowledge gaps persist.	Societal challenges framed in terms consistent with widely accepted narratives but multiple documentation and context-specific knowledge gaps persist.	No. Superficial/limited understanding of drivers of and responses to identified societal challenges with limited or no documentation.	The APR compiles everything the project has carried out and is shared with MARN, MAGA, INAB, and INSIVUMEH. However, the APR does not reach the local context. In addition to all the reports, baseline, diagnostics, and others, the ROAM has been presented at the local level (there are indicators on the number of times ROAM results have been presented to the population). These results are shared verbally through talks, meetings, and training sessions, not only in written form, since some beneficiaries are not literate. PINPEP and Probosques, along with their analyses, have been documented in local languages.	Baseline (including surveys in which information was collected on the main needs of the communities in the project area). Rapid assessment of the impact of the COVID-19 pandemic on rural households and their livelihoods (identifying the economic areas in which households were affected and, therefore, prioritising livelihoods for the prompt economic recovery of the communities). Characterisation and prioritisation of the intervention microwatersheds (24 micro-watersheds were prioritised according to social, environmental, cultural, and biophysical criteria). Annex 13: Report on consultation workshops. 1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRISTAL. Annual Performance Report (APR) and quarterly reports.	Opportunity for the project: we were able to best use the opportunity with Evelin, communications specialist, in order to adapt the documents to local traditions and languages (this relates to the criterion of accessibility of documentation).
1.3	Human wellbeing outcomes arising from the NbS are identified, benchmarked and periodically assessed	Are human wellbeing outcomes relevant to the identified societal challenges identified? Are there benchmarks in place to monitor impact? Are outcomes and benchmarks assessed at regularly occurring intervals? Are human wellbeing outcomes incorporated into the strategy for the intervention?	Strong	Yes. SMART human well-being outcomes and benchmarks, relevant to the identified societal challenges and national/local context, are identified and are assessed at regularly occurring intervals.	Specific human well-being outcomes and benchmarks, relevant to the identified societal challenges and national/local context, are identified and assessed at least once during the intervention period.	General human well-being outcomes and benchmarks identified but no provision has been made for their assessment.	No. Human well-being outcomes are not identified or are vague and ill defined with no benchmarks and no provision for assessment.	The project is periodically evaluated and monitored. Social well-being indicators are analysed and included in planning processes. For example, in the calls for small and medium-sized grants, and in the analysis for prioritising regular interventions.	Core indicators (social challenges), disaggregated by level. Baseline measurements to establish a reference point for periodic evaluations (monthly monitoring and quarterly balances for reporting). LORTA – Learning-Oriented Real-Time Assessment. Project stories (success stories focused on the changes promoted, highlighting a protagonist). Interim Evaluation. Dashboard with project progress, updated quarterly.	

Table A.2. Self-assessment table for Criterion 2: Scale-informed design

la dia atau			How well		How well has t	he indicator been met	1?			D
Indicator No.	Indicator	Guiding questions	intervention matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	Recommendations, opportunities and challenge
2.1	Design of NbS recognises and responds to the interactions between the economy, society and ecosystems	Are interactions identified between the economy, society and ecosystems? Does that include those within and surrounding the intervention area? Is the change in these interactions considered over time? Are potential knock-on impacts on and from other areas identified? Are these interactions used to design the intervention and decision making processes?	Strong	Yes. The design of the NbS considers in detail the interactions between the economy, society and ecosystems within and surrounding the intervention area, given its potential knock-on impacts on and from other areas/sectors. These interactions are accounted for in the decision-making process throughout the intervention timescale.	The design of NbS recognises specific interactions between the economy, society and ecosystems, and these are accounted for in the NbS decision-making processes, at least once during the intervention period.	The design of NbS recognises and responds to some of interactions between the economy, society and ecosystems although knowledge gaps remain. These are partially or not at all accounted for in decision-making processes.	No. The design of the NbS does not recognise nor respond to the interactions between the economy, society and ecosystems.	LORTA is an evaluation (external and independent) conducted at the start of the project on its impacts, and again at midterm. Planning documents, such as the watershed plans and threat identification, set out integrated and systemic actions. Landscape-level perspective. ROAM: restoration opportunities, taking into account productive, social, institutional, and economic aspects (e.g., species identification; assessment of threats, including water stress and climate threats; studies are conducted by multidisciplinary teams that include social scientists, planning specialists, and internal project staff with expertise in gender, forestry, local languages, and local traditions).	1.1 Development of twenty (20) microwatershed management plans for climate change with a gender, cultural relevance, and inclusion approach. Characterisation and prioritisation of intervention microwatersheds (24 micro-watersheds were prioritised based on social, environmental, cultural, and biophysical criteria). Identification, prioritisation, and impact of threats from extreme climate events (short term) in the area of influence of the Project, with a particular focus on the three priority territories.	This indicator is sometimes confused with C.3. This indicator focuses on effect and impact, whereas C.3 again addresses impacts. The suggestion is for this indicator to focus on impact, and for C.3 to focus solely on risks, not effects/impacts.
2.2	Design of NbS integrated with other complementary interventions and seeks synergies across sectors	Are complementary interventions identified in and around the area? Is the design of the NbS integrated with relevant complementary interventions? Are synergies sought in project management, monitoring and outcomes? Are complementary interventions and synergies re-assessed throughout the intervention time scale?	Strong	Yes. Synergies across sectors are thoroughly investigated, and all relevant complementary interventions are integrated within the design of the NbS. These are investigated and revisited at relevant points throughout the intervention time scale.	Synergies across sectors are investigated and the most relevant complementary interventions are integrated within the design of the NbS. These are revisited at least once during the intervention period.	Synergies across some sectors are broadly identified, but knowledge gaps persist and only some complementary interventions are integrated into the design of the NbS.	No. Synergies across sectors are not identified, and if any complementary interventions are identified, they are not integrated into the design of the NbS.	At field level, weekly reviews are carried out with donors, government agencies, and other IUCN projects. Coordination also takes place with international cooperation projects (UNDP, FOREST, FAO), creating synergies with other sectors and state institutions. Forest incentives are coordinated with INAB at both national and local levels, in support of the grants. Restoration roundtables bring together a range of actors and institutions to review actions and interventions. Stakeholder planning exercises with social and institutional actors help assess their environmental activities and define the project's impact on them. The participation of stakeholders—such as community authorities—is prioritised, and on the basis of this analysis, appropriate governance structures for the project are designed. Relevant bodies include SEPREM, the Agroclimatic Technical Working Group, and the Technical Working Groups for the Samalá and Motagua River watersheds.	1.2.4 INAB payments of agroforestry incentives. 1.2.3 Support to INAB for PROBOSQUE-PINPEP certification of incentives. Hectares managed under EbA strategies promoted by forest incentives. 1.4.Number of grants and average amount. Counterparts from government institutions. (APR, Section 3) Stakeholder Participation Plan.	
2.3	Design of NbS incorporates risk identification and risk management beyond the intervention site	Have the drivers of internal and external risks been identified? Has scientific and local knowledge concerning those risks been taken into account? Does the design of the NbS take into account possible internal and external risks? Has a risk management plan been integrated into the design of the NbS? Will this risk management plan be revisited throughout the intervention time scale?	Strong	Yes. The possible risks of undesirable changes and their drivers are identified, taking into account scientific and local knowledge. The management of these risks is integrated into the design of the NbS and revisited throughout the intervention time scale.	Most risks of undesirable changes and their drivers are identified, taking into account scientific and local knowledge. The management of most of these risks is integrated into the design of the NbS and revisited at least once during the intervention time scale.	Some possible risks are identified and taken into account in the design of the NbS, but context-specific knowledge gaps persist and multiple documentation (e.g. their management, within the intervention site and across the broader land/seascape) are lacking.	No. Limited or no risks are identified and, where identified, the management of these are not integrated into the design of the NbS.	The project maintains a social and environmental risk assessment, as well as categorised project risks, with plans to avoid, mitigate, and compensate for them. There is a gender and social inclusion strategy with cultural relevance, and tools derived from this strategy include knowledge dialogues, case studies, and Annex 5, which outlines the social and environmental commitments of grants. CLPI is applied. In addition, IUCN has risk monitoring and a risk policy, which includes a formal registry. Every measure and action is assessed from an institutional risk perspective, considering not only external but also internal risks. Donors also require analysis and reporting of financial, environmental, political, and technical risks, and a risk scale and status must be generated (e.g., ongoing, resolved, etc.).	Implemented socio-environmental safeguards: grievance and complaints mechanism, CPLI. Project Risk Register. Gender and Social Inclusion Strategy with Cultural Relevance. Annual and quarterly reports. Project documents and annexes. Proposals for small and medium-sized grant projects.	Risks and impacts are sometimes confused, and scales are mixed. Risks/impacts are considered at project scale, intervention area scale, and beyond the intervention area.

Table A.3. Self-assessment table for Criterion 3: Net biodiversity gain

Indicator			How well		How well has the in-	dicator been met?				December detices are all with a sent
Indicator No.	Indicator	Guiding questions	intervention matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	Recommendations, opportunities and challenge
3.1	NbS actions directly respond to evidence-based assessment of the current state of the ecosystem and prevailing drivers of degradation and loss	Is the current state of relevant ecosystems assessed? Is this assessment at the appropriate spatial and temporal scale? Are the drivers of ecosystem degradation and biodiversity loss assessed? Does the assessment include field verification? Does the assessment take into account scientific and local knowledge? Do NbS actions respond to the assessment and identified drivers of degradation and loss?	Strong	Yes. An updated assessment of the current status of ecosystems at the appropriate spatial and temporal scales is in place. The assessment includes information about the drivers of change and biodiversity loss. The assessment includes field verification and local knowledge.	There is information available about the current state of the ecosystems using secondary data and reference maps, not older than 10 years. The information of the ecosystem has been verified in general terms through field visits, with general inputs from local communities and traditional knowledge, where possible.	General information about existing land cover and land use is used for assessing the status of the ecosystems, at more general scales and not older than ten years. There is not validation at field level and data coming from communities or traditional knowledge.	No. There is no information available about general conditions of the status of the ecosystems at any relevant spatial or temporal scale.	ROAM, updated land-use studies. Previous ecological analyses focused on the condition of water and soils. Pre-feasibility studies took these variables into account. IMS: Amount of protected. No specific biodiversity studies were carried out, but indirect analysis was undertaken through forest cover assessment. Forest quality was analysed. Studies on the main species of economic and cultural importance were conducted, with reference to their cultural value (e.g., cultural uses for ceremonial purposes). A forest quality study was conducted in Salamá (within the ROAM and baseline). Analysis of seed supply and demand in the Highlands considered the economic impact of planting species for communities. Characterisation of agroforestry systems included evaluating species, associations (combinations of species and redistribution within plots), and agroforestry system arrangements.	1.1.1 Measurement of streamflow and water quality, interception rate, infiltration, and watershed recharge. ROAM Pre-feasibility study Baseline (including surveys that collected information on the main needs of the communities in the project area, and the results from applying InVEST). Studies of the main species of economic and cultural importance. Seed bank. Characterisation of agroforestry systems.	Opportunity: Pinabete, Quercus, and Iximché were identified as threatened species on the IUCN Red List. Actions undertaken by the project could be better reported and communicated in order to to rescue them. Other species include Red Wabler (Cardelina versicolor), white-tailed deer, and emerald toucanet.
3.2	Clear and measurable biodiversity conservation outcomes are identified, benchmarked and periodically assessed	Are clear and measurable biodiversity conservation outcomes identified? Are these outcomes based on an understanding of the current ecosystem state? Are these outcomes applicable to the relevant period of time for the intervention? Are benchmarks for desired change in place? Are the conservation outcomes periodically assessed?	Strong	Yes. The NbS objectives include: specific and measurable indicator variables related to biodiversity and ecosystem integrity, the direction of desired change (increase, decrease, maintain), the magnitude of desired change (e.g., 80%) and the timeframe (e.g., within 5 years). Prior to initiating treatments, a monitoring and evaluation system is in place that includes the variables to be assessed, the frequency of assessment, the analyses that will be done to determine outcomes, and how information will be shared. Also prior to initiating treatment, a baseline assessment of the indicator variables has been conducted. Depending on the conservation actions proposed, monitoring and assessment yields enough information to indicate species or ecosystem recovery or a measurable extent of recovered areas, over a relevant period of time.	The NbS outcomes include measurable indicator variables related to biodiversity and ecosystem integrity, but may lack specific details related to the magnitude of desired change (e.g., 80%) and the timeframe (e.g., within 5 years). Prior to initiating treatments, a baseline assessment has been conducted and a monitoring and evaluation system is in place, but may lack detail on the frequency of assessment, the analyses that will be done to determine outcomes, or how information will be shared. There is not enough information on ecosystem indicators for a relevant period of time.	The NbS outcomes related to biodiversity and ecosystem integrity lack specificity. There is a general indication about relevant conservation outcomes and a monitoring system is under preparation.	No. The NbS lacks identified outcomes related to biodiversity or ecosystem integrity. There is no monitoring system in place and no data about ecosystem or species recovery.	Data and targets are available, which are measurable, quantified, and timely. There are also periodic measurements and evaluations (Dashboard, Mid-term Evaluation). For example, the report on number of restored areas.	Indicator 3. Area of ecosystems restored, established, or improved using EbA strategies. Indicator 7. Hydrological balance. Indicator 6. Potential soil erosion. Indicator 8. Base flow. Indicator 9. Local recharge. 1.2.2 Rehabilitate 12,500 hectares using the EbA approach and natural infrastructure interventions. 1.1.3 Implementation of at least 20 diversified agroforestry nurseries. 11. Watershed management plans incorporate EbA criteria.	Opportunity: The analysis could be enriched by including results linked to threatened species on the IUCN Red List. IUCN STAR List.

Indicator			How well intervention		How well has the inc	dicator been met?				Recommendations, opportunities and
No.	Indicator	Guiding questions	matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	challenge
3.3	Monitoring includes periodic assessments for unintended adverse consequences on nature arising from the NbS	Is a monitoring and assessment plan in place for ecosystems, species and ecological processes? Is the monitoring plan based around measurable variables related to potential adverse impacts on nature arising from the NbS, both direct and indirect? Are actions in response to those impacts in place? Is the monitoring plan properly implemented with measurements taking place at periodic intervals?	Partial	Yes. Possible adverse impacts of NbS interventions on ecosystems, ecological process and species identified and actions to mitigate those impacts are mobilized. Specific measurable variables related to potential adverse impacts have been included in the baseline assessment, a monitoring and evaluation system of these impacts is properly implemented, and actions to address those impacts are in place.	The NbS plan has identified possible adverse impacts of NbS interventions on ecosystems, ecological process and species, and has included actions to mitigate those impacts, however lack of clarity on how actions will be mobilised and resourced. A monitoring plan for assessing adverse impacts is under development, including actions to counteract the effects of those impacts.	There is a general identification of possible impacts of NbS actions at ecosystem level and plans to mitigate those impacts are in place.	No. There is no identification of potential impacts of NbS interventions and these impacts are not assessed.	An analysis (General Project, Annex 7. a; for the grants, Annex 5, and social and environmental commitments) was carried out at the beginning, to determine whether the intervention might generate adverse impacts. For small and medium-sized grants, measures are also considered to avoid environmental risks (recommendations are provided). However, there is no systematic follow-up analysis of adverse effects that might arise from project interventions on environmental or biodiversity issues. There is no information on "where" the adverse effect may occur. Adverse effects of interventions are considered in relation to project objectives on soil and water. For example, an assessment on the implementation of canals and their adverse effects in terms of soil erosion.	LORTA report including impact evaluation. Annual Performance Report (APR) and quarterly reports, Interim Evaluation. Implemented socio-environmental safeguards: grievance and complaints mechanism, CPLI.	Opportunity: Hire consultancy to assess adverse effects of the interventions. Field monitoring on whether grant recommendations have been implemented. These adverse effects could also be incorporated into safeguards, with monitoring focused separately on biological adverse effects, and on intervention-induced adverse effects, in line with the objectives (e.g., more water, less erosion).
3.4	Opportunities to enhance ecosystem integrity and connectivity identified and incorporated into the NbS strategy	Are the requirements to maintain or recover ecosystem integrity identified? Are opportunities to enhance ecosystem connectivity and integrity assessed? Are actions in response to these requirements and opportunities incorporated into the NbS strategy?	Strong	Yes. There is a detailed assessment of requirements to maintain or recover ecosystem integrity. Options to enhance the integrity of the ecosystem or connectivity, where appropriate, are identified and implemented. These options might include soil recovery practices, ecological restoration activities, isolation practices, or conservation actions for targeted species.	There is a general identification of potential options to enhance ecosystem integrity or connectivity, where appropriate, and a plan to incorporate them into the NbS strategy.	There is a general identification of potential actions to enhance ecosystem integrity or connectivity, where appropriate.	No. There is no identification of any options to enhance ecosystem integrity or connectivity.	The integrity of ecosystems is being improved by working at the micro-watershed level. The emphasis is on connectivity of water, and of species, but connectivity improvement is not being measured. Agroforestry system interventions increase the number and diversity of species within plots (IKEA), on biological corridors. However, this focuses more on connectivity of ecosystem services. The ROAM project strengthens ecosystem integrity (improving species, ecosystem services, and INVEST projections). However, connectivity improvement across multiple ecosystems is less evident; the how and which protected areas are connected, is still unknown. A good example is the analysis of connectivity between forest and agricultural systems, with agroforestry systems considered as a strategy.	1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRISTAL. 1.1.6 Creation and/or strengthening of micro-watershed/watershed committees, and the development of 20 management plans with a focus on climate adaptation. 1.2 Seed bank with species adapted to the climatic, cultural, and commercial conditions of the area, ensuring equitable participation. 2.1.6 Evaluation and selection of six fundable projects.	Opportunity: Gaps in Guatemala's ecosystem map could be considered when planning intervention areas. Recommendation: review our project under the standard NbS agriculture approach promoted by IUCN.

 Table A.4. Assessment table for Criterion 4: Economic viability

Indicator			How well intervention		How well has the in	dicator been met?				Recommendations
No.	Indicator	Guiding questions	matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
4.1	The direct and indirect benefits and costs associated with the NbS, who pays and who benefits, are identified and documented	Are the direct and indirect benefits and costs associated with the NbS and who receives them identified? Is this fully documented? Is this verified with key informants? Can "winners" and "losers" be easily ascertained?	Strong	Yes. All the main direct and indirect costs and benefits have been established, verified with key informants and are fully documented. The distribution of the costs and benefits are well understood and "winners" and "losers" can be easily ascertained.	Analysis of costs and benefits includes both financial and non-financial elements and a clear description of indirect costs and benefits, although some gaps in understanding are still evident. There is a good understanding of how costs and benefits are distributed but limited verification with key informants.	Analysis of costs and benefits include both financial and non-financial elements although significant gaps in understanding with respect to indirect costs and benefits. There is a general understanding of how the major costs and benefits are distributed but it is not comprehensive and lacks verification.	No. Identification of costs and benefits is limited only to the immediate and direct financial transactions of the initiative. Understanding of how costs and benefits are distributed is superficial and/or anecdotal	Each ROAM includes a cost-benefit analysis, and Annex 3 covers the sensitivity analysis of critical elements (discount rate, economic indicators). All beneficiary indicators undergo these analyses, including the identification of indirect beneficiaries. The SAB analysis looks at women's participation, the times women are involved in forest systems, and the times they might not be benefiting. Institutional strengthening: the impact was measured beyond information systems, including training and incentives for municipalities, which in turn generate indirect benefits. Strengthening the Women's Office. Guatemala City has an indirect benefit from improvements in water availability thanks to the work carried out in the Xajá Pixcayá watershed. Studies have also been conducted on the feasibility of (economic, social, environmental) projects. Gender considerations for interventions help reduce family costs. The losing party: assessed in the risk report.	Indicator 13. Number of women (30%) and men (70%) with enhanced capacities for climate action and watershed management who benefit from forest incentives. Gender and Social Inclusion Strategy with Cultural Relevance. Indicator 17. Number of women (30%, with emphasis on women heads of household) and men (70%) with access to frontline climate information. Indicator 5. Number of vulnerable households, local organisations, and technicians that, at the local level, use tools, information, and practices related, entirely or partially, to climate. 14. Number of grants and average amount. 1.1.8 Capacity building of four government institutions (INAB, MAGA, MARN, CONAP), and at least 20 municipalities. 1.2.3 Support to INAB for the certification of PROBOSQUE–PINPEP incentives. 1.2.4 INAB payment of agroforestry incentives. At least 30% of participating organisations are women's organisations. 1.1.6 Creation and/or strengthening of micro-watershed/watershed committees, and the development of 20 management plans with emphasis on climate adaptation. 3.1.2 (Ongoing)Institutional development and strengthening. 30% of participants in training and awareness-raising activities are women's organisations. 3.1.3 (Ongoing) Strengthening of weather monitoring and forecasting. 3.2.3 Professional training programme for youth. 3.3.2 Establishment of a training centre. 1.1 Women's groups benefiting from time-saving agricultural and non-agricultural technologies. 1.1 Tour (4) watershed committees with equitable participation of women's groups, and formal and ancestral institutions of indigenous peoples. 1.1 Inclusive committees strengthened for water management. At least 10% of the grants awarded go to women's organisations. General: Number of training workshops, committee meetings, and planning sessions with the participation of municipal water offices and COCODES. 1.2 Women, women's groups, and indigenous communities benefiting from PROBOSQUE and PINPEP incentives. Fifteen small grants awarded to indigenous women produ	

Indicator			How well intervention		How well has the inc	dicator been met?				Recommendations,
No.	Indicator	Guiding questions	matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
4.2	A cost- effectiveness study is provided to support the choice of NbS including the likely impact of any relevant regulations and subsidies	Is cost-effectiveness analysed? Does the study include upfront and recurring direct and indirect costs as well as the full flow of benefits overtime? Are the key assumptions of cost-effectiveness identified? Does the study include measuring the impact of any relevant regulations and subsidies? Does the study support the choice of actions for the intervention? Is a sensitivity analysis conducted against critical variables?	Strong	Yes. A full cost effectiveness study has been conducted according to best practice and includes upfront and recurring direct and indirect costs, the full flow of benefits overtime and key assumptions. Sensitivity analysis has been conducted against critical variables (including changes to key regulatory and subsidy arrangements), the long-term economic and financial sustainability is well understood as well as the economic risks.	A cost effectiveness study is available which includes upfront and recurring direct and indirect costs and the flow of key benefits. Key assumptions have been identified but a full sensitivity analysis has not been undertaken. The long-term economic and financial sustainability is broadly understood but there may be gaps in the framing of future economic risks with respect to changes in regulation and subsidy regimes.	A basic internal rate of return has been calculated drawing primarily on direct upfront and recurring costs and direct benefits. However there are significant gaps in accounting for indirect costs and benefits and key assumptions have not been tested. There is a limited understanding of the impacts of changes to current regulations and subsidy regimes.	No. There has been no attempt to calculate or estimate even a basic internal rate of return or otherwise understand how the flow of benefits over time compare against upfront and recurring costs.	There is a cost-effectiveness analysis section of the project in the FFA (the project document), as well as in Annex 2 on feasibility, and Annex 3 on sensitivity analysis, which were prior to the start of the project. During the ROAM implementation, watershed analyses and plans were conducted. Analyses and diagnostics of stations were carried out to evaluate installation costs and calculate benefits. Annual reports, the APRs, include the project's cost-effectiveness during implementation. The INVEST analysis considers long-term cost-effectiveness. As part of this analysis, avoided costs are included (e.g., climate information is generated by INSIVUMEH, which has an impact on decision-making and prevents economic losses).	14. Number of grants and average amount. Annex 2: Feasibility study. Annex 3: Sensitivity analysis of critical elements. 1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRiSTAL. 1.1 Twenty (20) micro-watershed management plans for climate change adaptation, developed with a gender, cultural relevance, and social inclusion approach. Annual Performance Report (APR) and quarterly reports. All InVEST indicators. 1.2.3 Support to INAB for the certification of PROBOSQUE–PINPEP incentives. 2.1.6 Evaluation and selection of six fundable projects. 3.2.4 Development and implementation of the early warning system. 1.2.4 INAB payment of agroforestry incentives. Cost of implementing the AbE action (e.g., SAF) per hectare.	
4.3	The effectiveness of an NbS design is justified against available alternative solutions, taking into account any associated externalities	alternative solutions	Strong	Yes. The effectiveness and affordability of the intervention against the next best alternative(s) are fully economically justified, understood and documented.	The effectiveness and affordability of the intervention can be broadly justified although gaps in the analysis, particularly with respect to a comprehensive understanding of the alternate's cost, benefits and risks, persists.	Viable alternate solutions have been identified and their pros and cons have been documented but only limited and basic economic analysis has been conducted.	No. There has been no meaningful review of the proposed intervention's cost effectiveness against other viable alternatives	The documents from the FFA project and ROAM consider alternatives to determine which intervention is the most cost-effective. A study conducted within the framework of the IKEA project compared plots with and without agroforestry systems, allowing for evaluation of the intervention versus other alternatives. There are also plot plans and forest management plans that analyze intervention alternatives. These plans specify actions to take, reasoning, and include cost analyses, among others.	Keyline plots. 1.1 Women's groups benefiting from time-saving agricultural and non-agricultural technologies. FAA: Project document (Funded Activity Agreement). Plot plans and forest management plans. 1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRiSTAL. 14. Number of grants and average amount.	Recommendation: The Standard primarily considers cost- effectiveness at the design stage, rather thar during monitoring or evaluation of intervention effectiveness. It is recommended to also apply this type of analysi during implementation; this may require adjusting the guiding questions accordingly.
4.4 Source: IUCN	NbS design considers a portfolio of resourcing options such as market- based, public sector, voluntary commitments and actions to support regulatory compliance	Is there a comprehensive review of resourcing options? Does this review cover the costs of delivery of the intervention's primary and ancillary benefits? Has a full resourcing package been assembled and negotiated? Does this resourcing package include provision for future revenue streams?	Strong	Yes. A comprehensive review of resourcing options that covers the costs of delivery of the intervention's primary and ancillary benefits has been undertaken and a full resourcing package has been assembled and negotiated, including provision for future revenue streams.	The principle source of long-term funding is identified and secured. Potential viable sources of complementary resourcing have been identified and thoroughly assessed, including accompanying legal, regulatory and contractual obligations. While a comprehensive resourcing package has been identified it has not yet been negotiated	The principle source of long- term funding is identified and secured. Potential viable sources of complementary resourcing have been identified although more analysis is required to properly assess feasibility.	No. There is no clear understanding (or guarantee) of even the main long-term funding source beyond that required to cover the costs of immediate start-up or piloting phase. There has been no analysis of potential future revenue streams and no preliminary analysis of complementary resourcing options.	FFA: funding from KOICA, GCF, in-kind and financial contributions from government counterparts, contributions from organizations implementing donations, and even funding from IUCN (support structures), was considered, as well as counterparts from the beneficiary population itself.	Support to INAB for the certification of PROBOSQUE-PINPEP incentives. Support to INAB for the certification of PROBOSQUE-PINPEP incentives. Support to INAB for the certification of PROBOSQUE-PINPEP incentives. FA: Project document (Funded Activity Agreement). Annual Performance Report (APR) and quarterly reports. 1.2.4 INAB payment of agroforestry incentives.	

 Table A.5. Assessment table for Criterion 5: Inclusive governance

lmalic - t -			How well		How well has the	e indicator been met?				Recommendations,
Indicator No.	Indicator	Guiding questions	intervention matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
5.1	A defined and fully agreed upon feedback and grievance resolution mechanism is available to all stakeholders before an NbS intervention can be initiated	Is there a legitimate feedback and grievance mechanism? Are affected stakeholders consulted for the development of this mechanism? Is this mechanism documented, predictable and transparent? Is this mechanism available and accessible to all stakeholders? Is the mechanism available to stakeholders from before the start of the intervention? Is the mechanism right-compatible? Is the ownership and trust of the mechanism evident? Is the mechanism regularly reviewed and adapted?	Strong	Yes. A feedback and grievance resolution mechanism is developed in full consultation with affected stakeholders. The mechanism is legitimate, accessible, predictable, equitable, transparent, rights-compatible, and adaptively managed. There is clear evidence of ownership and trust in the mechanism	A feedback and grievance resolution mechanism is developed in full consultation with affected stakeholders. The mechanism is legitimate, accessible, predictable, equitable, transparent, rights-compatible, and adaptively managed. Ownership and trust in the mechanism is likely but currently cannot be substantiated	A feedback and grievance resolution mechanism is developed with limited input from some affected stakeholders. The mechanism is not fully legitimate, accessible, predictable, equitable, transparent, rights-compatible or adaptively managed.	No. A feedback and grievance resolution mechanism is not or only partially developed with no consultation with affected stakeholders.	Mechanism: complaints are resolved verbally, and the technical staff reports how the issue was resolved. Sometimes complaints are not made in writing or are not recorded; on occasions, the complaint is raised within the community. The mechanism was socialised with some indigenous mayor's offices; they have their own methods of conflict resolution, so they were able to propose and incorporate them into the project's grievance and complaint mechanism. Accordingly, people affected indirectly are consulted via their representatives (organisations, mayor's office, government entities). Translations of the mechanism are currently being prepared, and shared to people. The mechanism defines levels: i) a complaint can be raised to a technician or a community to seek prompt resolution; our role then is to report the incident and how it was resolved; ii) it can reach the organisation's coordination level (each organisation can adapt the mechanism); iii) the project mechanism can be used via telephone, e-mail, or by approaching the indigenous authorities. The donor requires grievance mechanisms. The mechanism, by means of guiding principles, clearly establishes what constitutes a complaint and what does not; it is transparent, visible, and legitimate. It is currently being translated (inclusivity), and takes traditional values into account. It is reliable, and there is documentation showing ownership.	Socio-environmental safeguards implemented: grievance and complaints mechanism, CPLI.	Challenge: the scope was approved by indigenous authorities, and the route was validated in the grants. We observed that there is no cultural precedent for this type of grievance mechanism in indigenous peoples. Within the cultural context, it is perceived that submitting a complaint might endanger one's involvement in the project. There needs to be a different term for "complaint", perhaps environmental impacts or unintended effects. It is important to make a distinction between a grievance and an accusation.
5.2	Participation is based on mutual respect and equality, regardless of gender, age or social status, and upholds the right of Indigenous Peoples to Free Prior and Informed Consent (FPIC)	Are indigenous peoples impacted, either directly or indirectly, at any point during the intervention? Does the intervention uphold the right of Indigenous Peoples to Free Prior and Informed Consent throughout the intervention timescale? Is participation based on mutual respect and equality? Are there processes in place to support this throughout the intervention timescale?	Strong	Yes. FPIC was obtained through high level participation from representative institutions and processes have been established to ensure this is upheld throughout the NbS timescale.	High level participation was achieved from most representative institutions. Processes have been established to ensure this is upheld throughout the intervention with priority stakeholders although gaps persist with some stakeholders.	Information giving and consultation was provided early in the NbS process with some representative institutions. No processes in place to ensure this persists throughout the intervention.	No. FPIC has not been obtained and processes have not been established to ensure this is upheld.	Minutes serving as the record of decision. Grants in the Chitxol area are awarded by considering hierarchy of community authorities, and respecting customary law and indigenous forest management. Actions, benefits, and other aspects are explained prior to the intervention, and all of this is signed, endorsed, and documented. In micro-watershed management plans, the micro-watershed councils indicate whether they wish to participate. For donations, consultation occurs during the design and implementation phases. Characterisation of Indigenous governance structures and their links to natural resources. Guide document for the CLPI, annex to the Gender and Social Inclusion Strategy and Stakeholder Participation Plan: Annex 24, an example of how to intervene. We have promoted the participation of women and groups/ organisations in governance structures, such as microwatershed councils and local advisory committees.	Stakeholder Participation Plan. Characterisation of indigenous governance structures and their links to natural resources. C3: Three capacity-development activities that incorporate indigenous considerations. 1.1 Twenty (20) micro-watershed management plans for climate adaptation were developed with a gender, cultural relevance, and inclusion approach. 1.1 Inclusive committees strengthened for water management. 1.1 Four (4) watershed committees with equitable participation of women's groups and both formal and ancestral institutions of indigenous peoples. Socio-environmental safeguards implemented: grievance and complaints mechanism, CPLI. Case study of three ancestral practices developed by indigenous communities in the Highlands in the context of climate adaptation. Methodology for the case studies and knowledge dialogues, including the data collection tools and mapping of key actors relevant to the process.	

Indicator			How well		How well has th	e indicator been met?				Recommendations,
No.	Indicator	Guiding questions	intervention matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
5.3	Stakeholders who are directly and indirectly affected by the NbS have been identified and involved in all processes of the NbS intervention	Are the stakeholders who are directly and indirectly affected by the NbS identified? Is their impact and interest in the intervention mapped? Are they involved in all processes of the intervention? Do affected stakeholder accept and feel ownership over the outcomes of the intervention?	Strong	Yes. A robust multi-scale multi-sector stakeholder analysis was conducted to identify who may be directly and indirectly affected by the NbS. Affected stakeholders were involved in all processes from the start of the intervention and accept/own the outcomes	A stakeholder analysis was conducted identifying stakeholders who may be directly or indirectly affected by the NbS. Most stakeholders were then involved in the processes of the intervention although some gaps remain. Ownership cannot be substantiated	Limited stakeholder analysis was conducted identifying only some of the stakeholder who may be directly or indirectly affected by the NbS. Of those identified, some have been engaged in the processes of the NbS.	No. No stakeholder analysis has been conducted to identify who maybe directly and indirectly affected by the NbS.	Direct and indirect stakeholders have been identified in all intervention processes. The Stakeholder Participation Plan identifies stakeholders and participation mechanisms, and contains the diagnosis, characterization, and mapping of organisations in the project area. In the design phase, a stakeholder-mapping document was produced; at the feasibility analysis, a set of letters of commitment from MARN, INSIVUMEH, MAGA, and INAB regarding counterparts (Annex 4). Regarding results: Keyline plots — people want them and, through the grants, also wish to participate more. There is a sense of ownership. Local committees and micro-watershed councils have taken ownership. MAGA is adopting the model. Participation strategies ensure that people are involved in several intervention processes and adopt the results. In the mid-term evaluation, and at the LORTA, beneficiaries are asked (around 100 adaptation-related questions) at the household level. Through the grants instrument, beneficiaries participate at different stages of the intervention, as do local committees. Letters of appointment of primary and alternate representatives of organisations to local advisory committees are in place.	2.2.3 Design of an organisational diagnostic for community-based organisations carried out in three regions to identify the support needs of CBOs. Annexes 4 and 5: Letters of government institutions counterparts (MARN, MAGA, INAB and INSIVUMEH). Annual Performance Report (APR) and quarterly reports. Interim Evaluation. LORTA report and impact evaluation. Stakeholder Participation Plan. Letters of appointment of primary and alternate representatives to the Local Advisory Committees (CAL).	Opportunity: regarding agroforestry systems matters, municipal extension agencies are already implementing MIAF, while Keyline Plots are being implemented in other municipalities. This shall be documented with a report, photographs, etc., under the scaling-up section in the APR.
5.4	Decision-making processes document and respond to rights and interests of all participating and affected stakeholders	Are decision-making processes being documented? Is this documentation transparent and accessible? Do they respond to the rights and interests of all participating and affected stakeholders? Is specific attention paid to stakeholders subject to extreme inequity?	Strong	Yes. Decision-making processes take into account the rights and interests of all participating and affected stakeholders, with specific attention paid to stakeholders subject to extreme inequity. The procedures are documented and this documentation is transparent and accessible.	Decision-making processes take into account the rights and interests of all participating and affected stakeholders. The procedures are documented and this documentation is transparent and accessible.	Decision-making processes map rights and interests of all or some participating and affected stakeholders. The procedures are documented however no clear plan to take into account stakeholder decisions. Gaps remain and/or there is a lack of transparency or accessibility.	No. Decision making processes do not take into account rights and interests of stakeholders and/or are not documented.	There are inclusive governance mechanisms. Participation of women and indigenous communities is promoted. Decisions are made in spaces such as local water-use committees, the Steering Committee, Local Advisory Committees, and Micro-watershed Committees. Minutes and documents are produced in these governance bodies. Results are communicated in local languages, making them accessible and transparent.	Communication products are produced in local Mayan languages (for example: the climate information received, EbA actions, plot management, among others). Governance mechanisms: Steering Committee, Local Advisory Committees, Micro-watershed Committees, and other entities that already operate at a local level. 1.1 Four (4) watershed committees with equitable participation of women's groups, and both formal and ancestral institutions of indigenous peoples. Socio-environmental safeguards implemented: grievance and complaints mechanism, CPLI. 3.2.5 Differentiated characterisation of women's and men's productive practices. Case study of three ancestral practices developed by indigenous communities in the Highlands, in the context of climate adaptation.	"Opportunity: To provide climate information effectively, a differentiated characterisation is required to ensure that data are both equitable and inclusive. Although the indicator exists, it still needs to be put into practice. Challenge: In order to be part of the target population, certain requirements (such as land tenure) must be met; however, not all communities fulfil this condition. This limitation risks creating further inequality.
5.5	Where the scale of the NbS extends beyond jurisdictional boundaries, mechanisms are established to enable joint decision-making among the stakeholders in those jurisdictions affected by the NbS	Do ecological processes and functions of the ecosystems in the intervention extend beyond jurisdictional boundaries? If so, is joint decision-making being enabled among the stakeholders affected by the NbS in all jurisdictions? Are transboundary cooperation's agreements created between affected stakeholders in all jurisdictions?	Strong	Yes. Whether and where the NbS intervention area extends beyond jurisdictional boundaries is identified. Where this is the case, transboundary cooperation's agreements are created between affected stakeholders in all jurisdictions. Joint decision-making is enabled.	General understanding whether the NbS intervention area extends beyond jurisdictional boundaries. Some transboundary cooperation's agreements are created between affected stakeholders in jurisdictions although gaps persist.	Limited identification of whether and where NbS intervention area extends beyond jurisdictional boundaries. There is a lack of transboundary cooperation agreements.	No. Not know whether or where NbS intervention area extends beyond jurisdictional boundaries.	We engage the Women's Office and the municipal forestry and water offices. Staff are strengthened and can work in other communities outside the intervention area. Interventions in municipal forest areas are being carried out. There are forest areas not covered by the project; however, we still engage with them. All institutions were consulted in the design of the management plans to be approved. Working at the watershed scale involved multiple jurisdictions and municipalities across departments (e.g. Chixoy Watershed), which were integrated into a single forum to enable watershed-scale decision-making. This goes beyond jurisdictional boundaries. Departmental-level agroclimatic technical working group, and likewise, watershed technical working groups.	3.3.4 Inter-institutional coordination. 1.1.7 Creation and strengthening of municipal water offices and local water use committees (at least 10 municipalities). 1.1.6 Creation and/or strengthening of microwatershed/watershed committees, and the development of 20 management plans with an emphasis on climate adaptation. Participation in technical working groups (restoration, agroclimatic, watershed technical working groups, and interinstitutional coordination groups on gender and indigenous peoples). 1.1.2 Technical Capacity Building for Women's Offices in at least 20 municipalities and the gender offices of MAGA, MARN, INAB, and CONAP.	

Table A.6. Self-evaluation table for Criterion 6: Equitably balanced trade-offs

Indicator			How well intervention		How well h	as the indicator been met?				Recommendations,
No.	Indicator	Guiding questions	matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
6.1	The potential costs and benefits of associated trade-offs of the NbS intervention are explicitly acknowledged and inform safeguards and any appropriate corrective actions	Are costs and benefits both at the NbS site and the larger landscape/seascape, throughout the NbS intervention time-scale identified? Are the potential NbS costs and benefits of associated tradeoffs explicitly acknowledged? Are they used to inform safeguards? Are they used to inform corrective actions if those safeguards are passed? Is the process of decision-making regarding costs and benefits disclosed to affected stakeholders?	Adequate	Yes. The cost benefits analysis considers costs and benefits both at the NbS site and the larger landscape/seascape, throughout the NbS intervention time-scale. Costs and benefits are used to inform safeguards and corrective actions. Process of decision-making on choices is disclosed to all stakeholders	The cost benefit analysis considers most spatial and temporal dimensions. Costs and benefits identified are used to inform safeguards and corrective actions although there are some gaps.	A limited cost benefit analysis is carried out only considering the NbS site and/or only for specific parts of the NbS lifecycle. Costs and benefits identified have not been used to inform safeguards and corrective actions.	No. No cost benefit analysis of trade-offs is carried out and/ or no safeguards or corrective actions are in place.	The safeguards that were designed are an attempt to avoid negative effects. Subsequently, mitigation is attempted, and then trade-offs are defined (economic, etc.). However, there is no cost–benefit analysis of the trade-offs. The established route states that the trade-off must be assessed at that time. There is no pre-set trade-off. Trade-offs depend on the damage (which is evaluated by a team), and are defined after investigation. The investigation team is external (not part of the project). People still do not know the trade-off mechanisms, as these are decided post-investigation. The timeframe for considering trade-offs is the project duration, and an additional 18-month period. Economic evaluation takes environmental costs into account. The threat assessment can reflect the benefit of an EbA measure versus a practice in the event of a hazardous meteorological event. Cost–benefit items have been identified but not yet fully accounted for. They have not been considered for corrective measures.	Socio-environmental safeguards implemented: grievance and complaints mechanism, CPLI.	Recommendation for improving the Standard: The term "trade-off" has been translated into Spanish as "compensación." However, in Spanish, this word does not convey the same meaning. In the French version, it is translated as "compromise." After analyzing the nuances of the term, we believe that a closer translation would be "sacrificio," as it better reflects a situation involving both loss and gain.
6.2	The rights, usage of and access to land and resources, along with the responsibilities of different stakeholders are acknowledged and respected	Are the rights, usage of and access to land and resources as well as stakeholder responsibilities identified? Are they incorporated into a stakeholder mapping analysis? Are they acknowledged and respected? Do they inform the design of the intervention?	Strong	Yes. All the rights, usage of and access to land and resources, as well as stakeholder responsibilities are analysed using a stakeholder mapping/ analysis. Rights, usage of and access to land and resources are respected and inform the design of NbS.	Most rights, usage of and access to land and resources, as well as responsibilities were analysed using a stakeholder mapping/analysis. All those analysed are acknowledged and respected although knowledge gaps persist in some areas or parts of the NbS.	Some rights, usage of and access to land and resources, as well as responsibilities are analysed. However this was not done using appropriate tools and not linked to the outcomes of stakeholder analysis or mapping with only few stakeholders considered. Only some of those analysed are acknowledged and respected.	No. The rights, usage of and access to land and resources, as well as responsibilities are not identified.	In all interventions, land tenure is recognised, as well as the rights of local populations. INAB recognises land rights, and grants also do, as they take into account local norms and land use by stakeholders. Ancestral rights are also recognised. ROAM: Analysis of stakeholder and community mapping, emphasizing the respect of their rights. Stakeholder analysis and mapping. Gender analysis in the design phase, and expanded in the strategy.	1.2.3 Support to INAB for certification of PROBOSQUE–PINPEP incentives. 1.2.1 Assessment of restoration opportunities in water recharge zones – ROAM – CRISTAL. Case study of three ancestral practices developed by indigenous communities in the Highlands in the context of climate adaptation. 1.2.4 INAB payment of agroforestry incentives. 2.2.3 Design of a diagnostic of community-based organisations carried out in three regions to identify the support needs of CBOs.	
6.3	Established safeguards are periodically reviewed to ensure that mutually- agreed trade-offs limits are respected and do not destabilise the entire NbS	Are there mutually agreed upon limits of trade-offs and are they being respected? Are there established safeguards in place to prevent these being exceeded or to prevent trade-offs destabilising the entire ecosystem or land/seascape? Are these safeguards being periodically reviewed? Is clear documentation of safeguards and their review provided?	Adequate	Yes. Mutually agreed upon limits of trade-offs are in place, documented, and respected. Safeguards are in place and are periodically reviewed throughout the intervention time scale, with clear documentation of this being provided.	Mutually agreed upon limits of some trade-offs are in place and are respected. Safeguards are in place and are occasionally reviewed, with documentation provided	Mutually agreed upon limits of only a few trade-offs are in place and/or are not being respected. Few safeguards are in place but are sporadically reviewed. There is no documentation of the process	No. Mutually agreed upon limits of trade-offs have not been considered and no safeguards have therefore been put in place.	Safeguards have been identified and are being implemented (e.g. scheduling specific times for men and women, local languages, family roles, interests of men and women regarding species, and places and times for meetings). Area for improvement: Compliance with periodic review procedures is currently incomplete, especially concerning grants.	Socio-environmental safeguards implemented: grievance and complaints mechanism, CPLI.	Opportunity to improve safeguards: monitoring of safeguards in grants is an area for enhancement.

 Table A.7. Self-assessment table for Criterion 7: Adaptive management

Indicator			How well intervention		How well has the	indicator been met?				Recommendations,
No.	Indicator	Guiding questions	matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
7.1	A NbS strategy is established and used as a basis for regular monitoring and evaluation of the intervention	Is there a strategy for the intervention for how societal challenges will be addressed? Does the strategy precisely state intended outcomes, actions and assumptions in regards to economic, social and ecological conditions? Does the strategy elaborate on whether and how assumptions may change? Is it consistently being used as a basis for regular monitoring and evaluation of the intervention?	Strong	Yes. A strategy is established that precisely states intended outcomes, actions and assumptions made in regards to economic, social and ecological conditions. The strategy elaborates on whether/ how assumptions may change and is consistently used a basis for monitoring and evaluation of the intervention occurring at regular intervals.	A strategy is established that states intended outcomes, actions and assumptions relevant to the current context. The strategy is used to inform monitoring and evaluation of the intervention in the design and implementation stage.	A strategy is established that states some intended outcomes, actions and assumptions. The strategy does not inform the monitoring and evaluation of the intervention and/or does not take into account changing assumptions.	No. Incomplete or no strategy established, with no link to economic, social and ecological conditions and little link to monitoring and evaluation of the intervention.	The project has established indicators and designed them as the basis for M&E. Protocols were developed for each indicator, specifying the method, measurement methodology, periodicity, metrics, and information sources for the indicator to be measured. The monitoring system operates through periodic data analysis, monthly monitoring, and quarterly balances, providing information for public disclosure and serving as inputs for reports that present cumulative project results and progress against indicators. The M&E system operates under a continuous improvement approach that allows adaptation to the information needs of the project, IUCN, and donors. It provides tools that can be adapted to the needs of data collectors (for example, for GIS hectare measurement, there are various options: smartphone app, GPS, or Excel document for grassroots organisations that do not use the first two options). The system is transparent. It makes data available to project staff and key stakeholders, respecting the policy for handling sensitive data (sensitive personal information is not displayed), and presents evidence of results. There is an approach strategy defined in the FAA and updated in annual reports (e.g., conservation targets achieved; restoration strategy: maintain, optimise). Example of strategy: areas of conservation were prioritised first, which built trust with communities and MAGA, enabling progress towards agroforestry systems afterwards. The strategy is also identified in supervision mission reports (ORMACC, HQ). Within the strategy, complementary indicators related to ecosystem services (hydrological balance and soil erosion) were defined and modelled using the InVEST methodology. In decision-making bodies (micro-watershed councils, committees, etc.), participants evaluate results at each meeting and make decisions accordingly.	Baseline (including surveys in which information was collected on the main needs of the communities in the project area and the results from the application of InVEST). LORTA report including impact evaluation. Dashboard with project progress, updated quarterly. Interim Evaluation. Annual Performance Report (APR) and quarterly reports. Gender and Social Inclusion Strategy with Cultural Relevance. Governance mechanisms: Steering Committee, Local Advisory Committees, Micro-watershed Committees, and other entities that already operate at a local level. Quarterly reports. Supervision mission reports from ORMACC and IUCN HQ.	
7.2	A monitoring and evaluation plan is developed and implemented throughout the intervention lifecycle	Is there a robust monitoring and evaluation plan in place? Is it being implemented throughout the lifecycle of the intervention? Does this plan include how deviations of the strategy trigger an adaptive management response?	Strong	Yes. A robust and adaptive monitoring and evaluation plan is in place to be implemented at regular intervals throughout the intervention lifecycle. The plan includes how deviations from the strategy trigger an adaptive management response.	A monitoring and evaluation plan is in place to be implemented throughout the intervention lifecycle albeit not at a regular basis. A clear process for how deviations will trigger an adaptive management response is lacking.	A monitoring and evaluation plan is in place to be implemented throughout the intervention lifecycle albeit not at a regular basis. A clear process for how deviations will trigger an adaptive management response is lacking.	No. Incomplete or no monitoring and evaluation plan in place. No link to how the plan could trigger an adaptive management response.	The plan in general is the M&E system, which consists of the following steps: 1) information collection phase (geographic data via the Survey123 platform, and beneficiary data); 2) systematisation and cleaning of information (using ArcGIS, Smartsheet, OneDrive); 3) arrangement and presentation (presented through a dynamic Dashboard built with PowerBI and ArcGIS), and; 4) information analysis and reporting (using donor formats or other required data). This is regarding evaluation indicators. Regarding monthly monitoring, the POA is prepared and approved by the Steering Committee, and the progress of activities is tracked using the Smartsheet tool collaboratively. Financial follow-up is carried out monthly, quarterly, semi-annually, and annually (including an annual financial audit). The system allows for spatial localisation of actions and spatial monitoring. This avoids duplication of areas, both internally and with other IUCN initiatives, promoting complementarity with other projects/interventions	2.1.8 Phase of grant monitoring and evaluation. M&E system designed, in operation, and in continuous improvement. POA and real-time monitoring on the Smartsheet platform. Audit reports. Gender and Social Inclusion Strategy with Cultural Relevance. Dashboard with project progress, updated quarterly.	

Indicator			How well		How well has the	indicator been met?				Recommendations,
Indicator No.	Indicator	Guiding questions	intervention matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	opportunities and challenge
7.3	A framework for iterative learning that enables adaptive management is applied throughout the intervention lifecycle	Is there a plan to learn and adapt in response to the monitoring and evaluation plan? Is there a learning framework applied to the NbS for iterative learning throughout the intervention lifecycle? Does this enable adaptive management? Is there are strategy for how learning persists beyond the time frame of the intervention?	Adequate	Yes. There is a learning framework that is applied throughout the intervention lifecycle and that is used continuously to learn and adapt in response to results of the monitoring and evaluation plan. Strategy in place for how learning would persist beyond time frame of intervention.	There is a learning framework that is applied at different stages of the intervention lifecycle. It is linked to the monitoring and evaluation plan.	Incomplete learning framework lacking clarity on how monitoring and evaluation will lead to learning and adaptation.	No. Incomplete or no learning framework. No to the monitoring and evaluation of the intervention.	Agreements and minutes are kept for each experience-exchange event. Exchanges happen, i) internally, among project staff; ii) with project partners; iii) with other IUCN projects, and; iv) with external projects (restoration working groups, regional frameworks). All of this is documented, and reports are produced. Consultancy for analysis of the flagship products: (flagship products: Early Warning System, women's access to resources, analysis of ecosystem services provision, local knowledge, flash floods), estimation of indicators, and preparation of documents with the ROAM and InVEST strategy for IUCN. Consultancy on lessons learned, based on concrete case studies to identify enabling factors and barriers to women's access to grants, so that strategies can be designed, and ensure access for women. Consultancy on application of the IUCN Global Standard for Nature-based Solutions to learn from and validate the NbS intervention. Diagnosis of the status of existing stations and their incorporation into a single network. Operational matters include meetings with donors where lessons learned are presented. ROAM results are presented at training workshops on readiness for incentives, grants, and the formulation of management plans. Documents are shared with organisations and partner institutions, and then feedback is used to make adjustments. Results are presented at conferences. With Component 2, at presentations to the Steering Committee, proposals and ToRs are revealed. The POAs are reviewed with the councils (e.g. review of restoration actions and decision-making based on such review). Organisations participate in the councils, and the spirit of these bodies is to provide recommendations based on evolving circumstances. There are link between micro-watershed councils and the local advisory council. Some lessons will persist beyond the project timeline: e.g. lessons on Keyline Plots, agroforestry systems, watershed management, and application of a gender perspective in projects, at governmental, municipal, and par	2.1.9 (Ongoing) experience exchange events. 2.1.10 Utilisation of lessons learned and best practice dissemination (ongoing). Repository of generated documents (flagship products: Early Warning System, women's access to resources, analysis of ecosystem services provision, local knowledge, and flash floods). Dashboard with project progress, updated quarterly. General: number of presentations on ROAM results in training workshops on readiness for incentives, grants, and formulation of management plans. C3: number of reports from the early warning system, climate bulletins, and local climate forums for disseminating climate information with impact on agroforestry systems. C3: number of early warning system reports with indigenous and gender considerations, as well as local knowledge included in the early warning system design. C3: number of presentations on climate risks in training workshops on readiness for incentives, grants, and formulation of management plans. 1.1.5 Participation in at least four international experience-exchange events. Governance mechanisms: Steering Committee, Local Advisory Committees, Micro-watershed Committees, and other entities that operate at a local level. Quarterly reports. General: number of presentations on ROAM results in training workshops on readiness	Internal improvement opportunity: hold more regular internal learning events across the three components. Develop an open library where all documents and reports are shared with the entire ORMACC so they persist beyond the project timeframe. There is a repository. These lessons learned should be conveyed into scientific literature, and these lessons learned should be systematised to generate additional publications. Another opportunity: publish works in open access and strengthen strategic communications to promote the dissemination of lessons learned.
								projects, at governmental, municipal, and partner institution levels.	Committees, and other entities that operate at a local level. Quarterly reports. General: number of presentations on ROAM	

Table A.8. Evaluation table for Criterion 8: Mainstreaming and Sustainability

lm ali t -			How well		How well ha	as the indicator been met?				Decommondation
Indicator No.	Indicator	Guiding questions	intervention matches to indicator?	Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	Recommendations, opportunities and challenge
8.1	NbS design, implementation and lessons learnt are shared for triggering transformative change	Are NbS design, implementation and lessons learnt being systematically captured? Are they being shared both on demand and with strategic audiences? Is this sharing accessible to target audiences? Is a communication strategy in place? Does this strategy detail how communication will change behaviours and how this will trigger transformational change?	Partial	Yes. NbS lessons learnt have been systematically captured and subsequently shared both upon demand and with strategic audiences in an accessible manner. A communication strategy is in place identifying how this change behaviours to trigger transformational change.	Lessons learnt have been systematically captured and some sharing both upon demand and with relevant audiences in an accessible manner. Communications strategy is incomplete.	Provision made to systematically capture lessons learnt. Some lessons learnt are shared with relevant audiences. There are barriers to accessibility (time frame, language, visibility, etc.) whether on demand or freely available. No communications strategy in place.	No. Lessons learnt are not captured and/or shared. Not communications strategy in place.	There is a commitment to documenting lessons learned and sharing them upon request or with strategic audiences. For example, through a training course (strategic audience) or on request. However, accessibility barriers remain, linked to language, mobility, visibility, and timing (with communication often delayed). A communication strategy is in place, though not yet fully implemented; with the recent appointment of a Communications Officer, this is now becoming feasible. A strategy to identify and share success stories has been developed and is about to be implemented. An indicator has also been established for the translation of materials into local languages. Opportunities for exchange and feedback have been scheduled. In addition, a virtual training centre is being considered, alongside in-person training on climate change and the development of an agroclimatic observatory.	Communication strategy. Project stories (previously called Success Stories). 1.1.2 Technical Capacity Building of Women's Offices in at least 20 municipalities and the gender offices of MAGA, MARN, INAB, and CONAP. 2.1.9 (Ongoing) experience exchange events. 1.1 Women and men participating equitably in national and international experience-exchange events. General: number of presentations on ROAM results in training workshops on readiness for incentives, grants, and the formulation of management plans. General: number of materials adapted and translated. C3: number of materials (related to knowledge and learning) adapted and translated. 1.2.5 Capacity Building for four government institutions (INAB, MAGA, MARN, CONAP), and at least 20 municipalities, including gender awareness and the use of tools incorporating gender considerations. 3.2.3 Professional training programme for youth. 3.3.1 Capacity-building programme in climate change, interpretation, modelling, and forecasting and restoration. 3.3.2 Establishment of a training centre.	Opportunity for improvement: produce systematic reports that explain strategic and implementation processes, with case studies and infographics. Another opportunity: implement the communication strategy over the remaining three and a half years of the project. The strategy exists; however, it needs better implementation. Improve clarity of climate information. Challenge: diversify communication channels and consider how, when, and what is being communicated. Challenge: When information is shared only with a specific staff member or representative of an organisation, it may be lost if one of those individuals later leaves. One way to address this is to bring together all relevant stakeholders, ensuring that knowledge is retained beyond individual attendees. Another opportunity: use materials produced by organisations implementing small and medium-sized grants.
8.2	NbS inform and enhance facilitating policy and regulation frameworks to support its uptake and mainstreaming	Are policy, regulations and laws relevant to the intervention being identified? Are their impacts and opportunities being mapped? Are early adopters and entry points being identified? Are the interventions actions and communications informing or enhancing facilitating policy and regulation frameworks? Is this supporting uptake and mainstreaming of NbS?	Strong	Yes. NbS actions incorporate a review of policy, regulations and laws that are relevant to the NbS, that can be used to support their uptake and mainstreaming. Where necessary and possible, the NbS may inform and enhance policy and regulating frameworks amendment, to ensure sustainability.	The policy, laws and regulations relevant to the NbS were identified and taken into account as part of the design of the NbS, and their potential use to support NbS or necessary amendment, were partially included.	Some relevant policy, regulations or laws were identified as part of the design of the NbS, but knowledge gaps (e.g. their potential use to influence the NbS, their relevance to the NbS, possible amendment) remain and no link to them was thought of or planned.	No. The NbS design and operational plans have not been framed within the context of prevailing land-use and other relevant policies, regulations or laws and has not engage with other key stakeholders on issues that related to enabling policy, legal and regulatory frameworks.	Vertical scaling: at national and policy levels: support gender policies through the CGI, review of the forest policy (support to INAB), and the policy of social participation in protected areas (CONAP). Participation in the national restoration strategy (update and implementation with INAB). Local political level: municipal policy for water resources management (e.g. Totonicapán). Horizontal/territorial scaling: work with the national rural extension system (DICORER, VIDER), participation in watershed technical working groups (Motagua, Samala), and agroclimatic technical working group. Support to other IUCN and regional projects: IKEA, EBALAC, PROSEHIGUA, ENLAZANDO (at national level, IUCN), and with ORMACC (e.g. training on M&E system). In the design phase, policies and laws were identified, such as the national climate action plan, KATÚN 2030, and the SDGs. The social evaluation considered institutional gender policies, and indigenous peoples' rights, Convention 169. A review was made of all laws related to the environment and participation.	Sharing Keyline results. Seed bank. Social inclusion. Review of forest policy. Design of social participation policy in SIGAP and DB. Creation of municipal water resources policy for Totonicapán. Participation in the implementation and update of the Restoration Strategy. Training of CADERs (Rural Learning and Development Centres), and DICORDER (Regional Coordination and Rural Extension Directorate). General: number of presentations on ROAM results in training workshops on readiness for incentives, grants, and formulation of management plans. Project counterpart contributions with other national and regional initiatives (National: "Enlazando", Sustainable Agriculture, PROSEHIGUA, EbA-LAC, and other regional initiatives). C3: number of reports from the early warning system, climate bulletins, and local climate forums for dissemination of climate information with impact on agroforestry systems. FAA: project document (Funded Activity Agreement).	

Indicator No.	Indicator	Guiding questions	How well intervention matches to indicator?	How well has the indicator been met?						Recommendations, opportunities
				Strong	Adequate	Partial	Insufficient	Rationale	Means of verification	and challenge
8.3	Where relevant, NbS contribute to national and global targets for human wellbeing, climate change, biodiversity and human rights, including the United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP)	Are relevant national and global targets for human wellbeing, climate change, and biodiversity and human rights being identified? Does this include UNDRIP? Are the interventions actions contributing to any of these targets? Is this contribution being reported in relevant platforms? IS this facilitating mainstreaming and upscaling of the intervention?	indicator? Strong	Yes. Relevant national and global targets for human wellbeing, climate change and biodiversity have been identified. The potential contribution of the NbS to these targets was identified is reported in the relevant platforms, to facilitate mainstreaming and upscaling of the NbS intervention.	Relevant national and global targets for human wellbeing, climate change and biodiversity have been identified. The potential contribution of the NbS to these targets was partially identified and partially reported in the relevant platforms.	Some national and global targets for human wellbeing, climate change and biodiversity have been identified as part of the NbS design. But the potential contribution of the NbS to these targets was only partially identified and not reported in the relevant platforms.	No. No relevant national and global targets for human wellbeing, climate change and biodiversity have been identified. The potential contribution of the NbS to these targets was not identified and nor reported in the relevant platforms.	The exercise to identify "impact targets" was participatory. When the project indicates it contributes to indicators/targets, the contribution is measured using the project's impact and results indicators, and it is accompanied by a monetary percentage to achieve them. The project informs the IUCN office how it contributes to reducing land degradation. Ministries or other state bodies (MAGA, INAB, etc.) request information from the project so these institutions can calculate Guatemala's contribution to various international targets and commitments. Social evaluation and risk analysis, and gender strategy: the progress on the alignment of interventions with national and international commitments on human rights and the recognition of indigenous peoples is reported annually. This is reported at the national level at relevant platforms when requested by the country office or donor. The APR contains a section related to commitments.	SDG 1: No Poverty. SDG 6: Clean Water and Sanitation. SDG 13: Climate Action. SDG 15: Life on Land. GBF: 1) Spatial planning and ecosystem integrity. 2) Ecosystem restoration. 8) Biodiversity and climate change (NbS and AbE). 9) Sustainable management and use of wild species. 10) Sustainable management of areas dedicated to agriculture, aquaculture, fisheries and forestry. 11) Contributions of nature to people. 20) Capacity building. 21) Information and knowledge. 22) Rights and participation of indigenous peoples and local communities. 23) Gender equality. IT.1.2 Equitable and effective governance of natural resources at all levels to benefit people and nature. IT.2.2 Thriving production landscapes are sustainable, and nature's value and benefits are safeguarded in the long term. IT.3.2 Equitable access to water resources and all associated ecosystem services are secured. IT.3.3 Water governance, law and investment decisions address the multiple values of nature and incorporate biodiversity knowledge. IT.5.1 Countries use Nature-based Solutions and innovations in financing to scale up effective adaptation to the impacts of climate change. IT.5.3 Responses to climate change and its impacts are informed by scientific assessment and knowledge to avoid adverse outcomes for nature and people. PANCC indicators (National Climate Change Action Plan), Bonn Challenge, Global Soil Partnership, UNCCD as neutralisation of land degradation (LDN), UND Decade on	Opportunity: to report on SDG 5 (Gender Equality). With respect to the GBF, an analysis was conducted by M&E however, validation with the wider project team is still required. Challenge: to understand how ORMACC reports, its roadmap, and to socialise this within the project group. Opportunity: to establish a single repository for these contributions and international commitments.
									Ecosystem Restoration. Annual Performance Report (APR) and quarterly reports.	



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