







Biodiversity Challenge Funds Projects Darwin Initiative, Illegal Wildlife Trade Challenge Fund, and Darwin Plus Half Year Report

Note: If there is any confidential information within the report that you do not wish to be shared on our website, please ensure you clearly highlight this.

Submission Deadline: 31st October 2022

Project reference	28-019
Project title	Protecting ecosystem functions in key watersheds for biodiversity and people
Country(ies)/territory(ies)	Bolivia
Lead partner	Asociación Armonía
Partner(s)	1) Tiquipaya Municipal Government. 2) Secretaria de la Madre Tierra—Gobierno Departamental de Cochabamba (Regional Government of Cochabamba). 3) Tunari National Park. 4) Faunagua
Project leader	Rodrigo W. Soria-Auza
Report date and number	Report date: 01/Apr/2022 to 30/Sep/2022
(e.g. HYR1)	HYR # 1 (this is the first half year report presented)
Project website/blog/social media	https://www.facebook.com/armoniabolivia

1. Outline progress over the last 6 months (April – Sept) against the agreed project implementation timetable (if your project has started less than 6 months ago, please report on the period since start up to end September).

<u>Output 1.</u> This year we are producing 210,000 saplings in our nursery (<u>Fig 1</u>). These saplings will be planted during the next plantation season that will take place between November 2022 and March 2023. The two water reservoirs that we proposed to build have been concluded. One is located in Thola Pujru community (<u>Fig 2</u>) and the other in Laphia community (<u>Fig 3</u>). Moreover, we distributed 2800 meters of pipes to improve the irrigation systems (Fig 4).

Fifty-one members from the five local communities have been trained as firefighters through two training courses between July and August (Fig 5 shows attendants to the first training course). Though this activity was planned for the next semester, we decided to bring this activity forward because of time availability issues of instructors. The firefighting equipment will be delivered during the next semester.

<u>Output 2.</u> Several pilot plots for the sustainable management of exotic tree plantations have been established in Thola Pujru and Laphia communities (Fig 6). Plans have been already submitted to the competent authority (Autoridad de Bosque y Tierra = ABT), and during the next period we will conduct the socialization of these plans at the central office that administrates the national system of protected areas.

<u>Output 3</u>. The five communities we work with in Tiquipaya municipality (Cruzani, Laphia, Linkupata, Thola Pujru y Totora) have now a committee formed by representatives of each community. This committee is known as Organismo de Gestión de Cuenca (OGC). Though its formation started just before the start of this project, this project is being fundamental in its structuration within the organizational scheme of the communities. Next steps will be to integrate a representative of the municipal government as well as a representative of the Tunari

National Park administration. The integration of the latter actor will be challenging because of the long history of confrontational relationship between the local communities and the protected area.

A significant part of the capacity building process is to train local people in two aspects key to the development of their communities: 1) the development of a plan to pave the sustainable development of these communities. This activity is being implemented in coordination with Kurmi (another NGO that is also working with the same communities). The plan has 80% of progress and we expect to conclude it by the end of April 2023. 2) Members of the OGC, as well as a number of members from the communities (20 attendants in total), are being trained in the planning and management of sustainable development projects (Fig 7 shows the list of participants).

We have also attended to a series of meetings organized by the municipal government of Tiquipaya whose aim is to develop a municipal plan to manage and protect the basins within its territory. Our reforestation program is now part of this plan (Fig 8). We are also reconciling this municipal plan with the plan of sustainable development that is being developed with the communities we work with.

<u>Output 4.</u> Though we have not written a document detailing the monitoring protocol, we have a monitoring protocol already developed. Each year we establish 10 monitoring plots (each plot is approx. 500 m²) whose location is randomly selected (within the forested/reforested areas). These plots are then monitored yearly between August and September, the peak of the dry season (Fig 9 & Fig 10). The two variables we record are: survival rate (the proportion of saplings alive in relation to the total number of plants planted within the boundaries of the plot) and the plant height. At least 10 years of data will be collected for every plot. As we are involving park rangers, municipal officers and even community members in the monitoring, we decided to restrain the monitoring to the yearly collection of these two variables, which are easy to obtain for every plot. We also collected high-resolution drone images of the forested/reforested areas. From the year 2030 onwards, monitoring of the forested/reforested areas will be conducted remotely with the use of a drone. Thus, we will able to compare landscape changes (e.g. changes in vegetation coverture).

During the first semester of project implementation we have experienced a delay in the implementation of the monitoring of key bird species populations (e.g. Cochabamba Mountain-Finch). This is being implemented from September this year.

The socioeconomic study of the communities is almost complete. Data collection phase has been conducted with the participation of communities' members (Fig 11 shows a sample of interviews carried out) and we are processing the information collected. This study will provide the baseline data information to estimate the socioeconomic impacts of the project in the communities we are currently working with.

To determine the current environmental flow and the current soil water retention, our project partner Faunagua is measuring of water flow in the basins of the study area every month (Fig 12). Information build by Faunagua will be key for later evaluations of project environmental impacts.

<u>Output 5</u>. The municipal government of Tiquipaya and several civil society organizations in this municipality are aware of the project's goal and objectives. We are actually collaborating to the municipal government in the elaboration of its plan to manage and protect basins within its territory (<u>Fig 13</u>; our forest restoration program is a component of this plan). We have also had several meetings with authorities of the neighbouring municipalities of Cochabamba, Quillacollo, Sacaba and Vinto, and with several communities in these municipalities. We are in the process to sign agreements with these communities to start reforestations in their territories from 2023-2024.

We had numerous activities to communicate to the public opinion about the project. So far, we had two TV interviews and several radio interviews (<u>Fig 14</u> shows one of the two tv interviews). We also had a booth to convey to the public opinion about the project during the last three "dia del peaton" (<u>Fig 15</u>). "Dia del peatón" is celebrated three times in the year (first Sunday of April, first Sunday of September and the first Sunday of December). Our booth has gained a strategic location in one of the main plazas where, according to the regional government of

Cochabamba, approximately 10,000 persons attend between 9:00 am and 17:00 during the "dia del peatón".

We have produced two 4-minutes videoclips. Both have been shared through our social media resources. We also play the videos in all meetings, workshops we attend to. The links to have acces to copies of both videos are: 1) https://bit.ly/3TD641d and 2) https://bit.ly/3gMpnX2.

Along the last semester we have had several meetings with leaders of the association of boy scout association of Cochabamba to build an alliance. Unfortunately, we couldn't reach an agreement to get the scouts onboard of educative/informative activities. So, in the next weeks we will send a change request modify this part of the project and propose an alternative.

Finally, in April 2022 and September 2022 we have conducted a survey to measure the level of knowledge people have about the importance of the Tunari National Park. This will provide us with the baseline information to measure the impact of our project's communications activities.

2. Give details of any notable problems or unexpected developments/lessons learnt that the project has encountered over the last 6 months. Explain what impact these could have on the project and whether the changes will affect the budget and timetable of project activities.

Though we developed the concept of this project in coordination with communities' leaders, who channelled their communities' priorities, some aspects of this project are more challenging than expected. The implementation of the forestry management plan is one of the activities that needed more effort and time. Two factors emerged during the development of the sustainable management plan of forestry plantations (of exotic trees) that forces us to reformulate our original approach. Some communities have very few communal land left. Most of these communities' territories have been divided among their families. Therefore, forestry management plans will have to be developed for each family. We are currently developing a new approach to make sure we achieve our proposed outputs. We will submit a change request for this purpose soon by the end of November 2022.

In the process of facilitating the consolidation of the communities' governance body (OGC), we realized that communities need to understand better the OGC's role and importance for their communities' future. We also identified that leadership for future generations needs to be guaranteed. To approach these two weaknesses, we are helping the OGC to produce informative material and also helping its members to communicate the OGC role and activities among communities' members. We are fostering the integration of youngsters into the training course (projects development and management) and all workshops we are conducting.

We are struggling to facilitate that local communities improve the level of communication and coordination with the administration of the Tunari National Park. Though we integrated personnel of this protected area in some activities together with local people (e.g. reforestation campaigns, and some meetings and workshops), local communities are still reluctant to include a representative of the Tunari national park within the governance body formed. Before the conclusion of this fiscal year, we will organize two meeting to facilitate a process of conversations between the protected area and the local communities to find the place and role of the protected area and a channel of communication between both key actors.

Finally, though we had several meetings with leaders of the Asociacion of Boy Scouts o Cochabamba, we couldn't reach an agreement. We are currently in conversations with the director of an institute of technical education where floricuturists, technical agronomists and technical in forestry are educated. The director is willing to provide us numerous volunteers every semester to help us convey information about the project and the importance of the Tunari national park among the public opinion. We will include this modification in the change request we are planning to submit by the end of November 2022.

3. Have any of these issues been discussed with NIRAS-LTS International and if so, have changes been made to the original agreement?

Discussed with NIRAS-LTS:

Yes/No

Formal Change Request submitted:	Yes /No	
Received confirmation of change acceptance	Yes /No	
Change request reference if known: Just as a note, we have not submitted a change request yet. We are planning to submit it by the end of November 2022.		

4a. Do you currently expect to have any significant (e.g. more than £5,000) underspend in your budget for this year?		
Yes No x Estimated underspend: £		
4b. If yes, then you need to consider your project budget needs carefully. Please remember that any funds agreed for this financial year are only available to the project in this financial year.		
If you anticipate a significant underspend because of justifiable changes within the project, please submit a re-budget Change Request as soon as possible. There is no guarantee that Defra will agree a re-budget so please ensure you have enough time to make appropriate changes if necessary. Please DO NOT send these in the same email as your report.		

As requested, bellow I answer some comments I received in my award letter:

management, monitoring, or financial procedures?

5. Are there any other issues you wish to raise relating to the project or to BCF

1) approval of the sustainable forestry plan will lie with central government (the National Protected Areas service): it is not clear whether securing this approval will be challenging or not - please comment in your first half year report (HYR);

Yes. It is challenging because this process may take longer than expected. This will not be due to a lack of any technical documentation that we need to generate, but because the bureaucratic procedure simply takes time.

2) the significant communications campaign in this project depends on interest from journalists, broadcasters, etc. but it is not clear whether they have yet been engaged or might be interested. The communication expertise on the project team could also be strengthened, given its emphasis in the project (HYR)

We have built a relationship with several journalists who gave us a space in TV and radio interviews. However, we are aware that more effort needs to be allocated to communication. In September 2022 Armonía hired a professional in communication whose aim is to help us find more spaces in TV channels and radio stations.

3) the exit strategy is based on capacity development, but long-term sustainable support for project actions seems missing from the application (HYR);

We do not agree with this observation. It is correct that an important part of our project aims to build local capacities from all key actors (communities, local and regional governments and the protected area). However, we also mention that we will continue with forestation/reforestation until 2025. And part of our activities during this period will be monitoring the diverse impacts of the present project.

- 4) the ethics statement could be further developed (HYR);
- As mentioned in the application, Armonía's philosophy is to proceed with deep respect for local people's principles and culture. This is part of our vision as institution and our staff is trained to follow this principle.
 - 5) there are some key actions missing for the translation of ecosystem services into payments to communities and the park: more detail is needed here since it is identified as a long-term target (HYR):

Payment for ecosystem services has not been considered as an immediate output for this project. Consequently, we have not given much more detail about this in the present proposal.

However, this is our long-term goal. We still need to develop a robust strategy to approach this in the future (it is our plan after this project concludes).

6) it is not clear whether discussions have been held with the relevant authorities (e.g. water utility) about increasing water bills to pay for watershed management and providing a sustainable financing option (HYR):

We have had conversations with several key actors (local authorities, activists, community leaders, etc.). However, we all agree this is challenging. A long-term intensive communication campaign needs to be implemented. And specially an intensive agenda of meetings needs to be put in place to gain the support of the numerous actors who can provide support or represent an obstacle. We regularly push for this idea in all our public activities, but more intensive activities are required to be implemented. This is the reason for us to place this as a long-term goal.

Responses to reviewer's questions to the first annual report:

- 1) Comment 1: Comments to the award feedback. Already addressed above
- 2) Comment 2: *Gender specific capacity building*. Women participation in the training course has been encouraged. Almost half of participants are women. And at least one of the project concepts is specifically will strengthen/diversify the opportunities of women to generate income and encourage their autonomy.
- 3) Comment 3: explain activities 1.5, 1.6, 4.6, 5.7 and 5.8 Pipes have been distributed among families from communities, we are still in the process of verifying their current location. This activity will take time because it depends on time availability of people. Other activities that required specific commentaries have been addressed above.
- 4) Comment 4: about activities with the UGR (Unidad de gestion de riesgos) form the regional government of Cochabamba as ca be noted in this report, activities with the UGR were implemented without delay. Instructors to train community members in firefighting are personnel from the UGR. During the next semester we will continue the process of integrating the newly formed community firefighters brigades in the UGR (as volunteers).

If you are a new project and you received feedback comments that requested a response (including the submission of your risk register), or if your Annual Report Review asked you to provide a response with your next half year report, please attach your response to this document.

Please note: Any <u>planned</u> modifications to your project schedule/workplan can be discussed in this report but should also be raised with NIRAS-LTS International through a Change Request. Please DO NOT send these in the same email.

Please send your completed report by email to BCF-Reports@niras.com. The report should be between 2-3 pages maximum. Durwin Initiative Half Year Report