

Darwin Initiative Main Annual Report

To be completed with reference to the “Project Reporting Information Note”:
(<https://www.darwininitiative.org.uk/resources-for-projects/information-notes-learning-notes-briefing-papers-and-reviews/>).

It is expected that this report will be a **maximum** of 20 pages in length, excluding annexes)

Submission Deadline: 30th April 2022

Darwin Initiative Project Information

Project reference	28-018	
Project title	Sanctuaries for threatened species and communities in Northeast Luzon, Philippines	
Country/ies	Philippines	
Lead partner	Mabuwaya Foundation	
Project partner(s)	Local governments of Baggao (Cagayan) and San Mariano (Isabela), Department of Environment and Natural Resources community offices in Alcala and Naquilian, Isabela State University, National Commission on Indigenous Peoples.	
Darwin grant value	140,000 GBP	
Start/end dates of project	1 July 2021 – 30 June 2024	
Reporting period (e.g. Apr 2021 – Mar 2022) and number (e.g. Annual Report 1, 2, 3)	1 July 2021 – 31 March 2022	
Project Leader name	Merlijn van Weerd / Marites Gatan-Balbas	
Project website/blog/social media	www.mabuwaya.org facebook/Mabuwaya	
Report author(s) and date	Merlijn van Weerd / Marites Balbas	

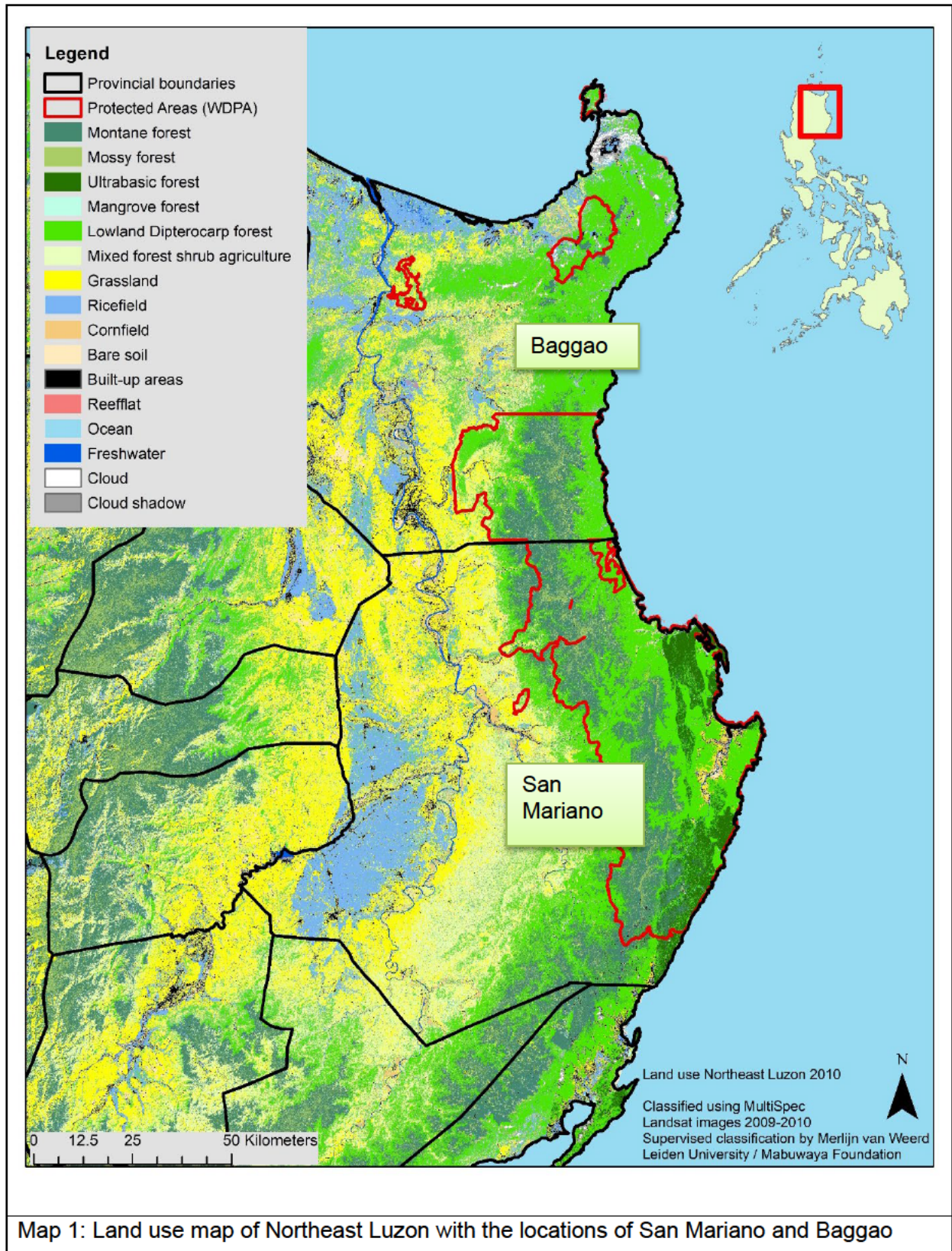
1. Project summary

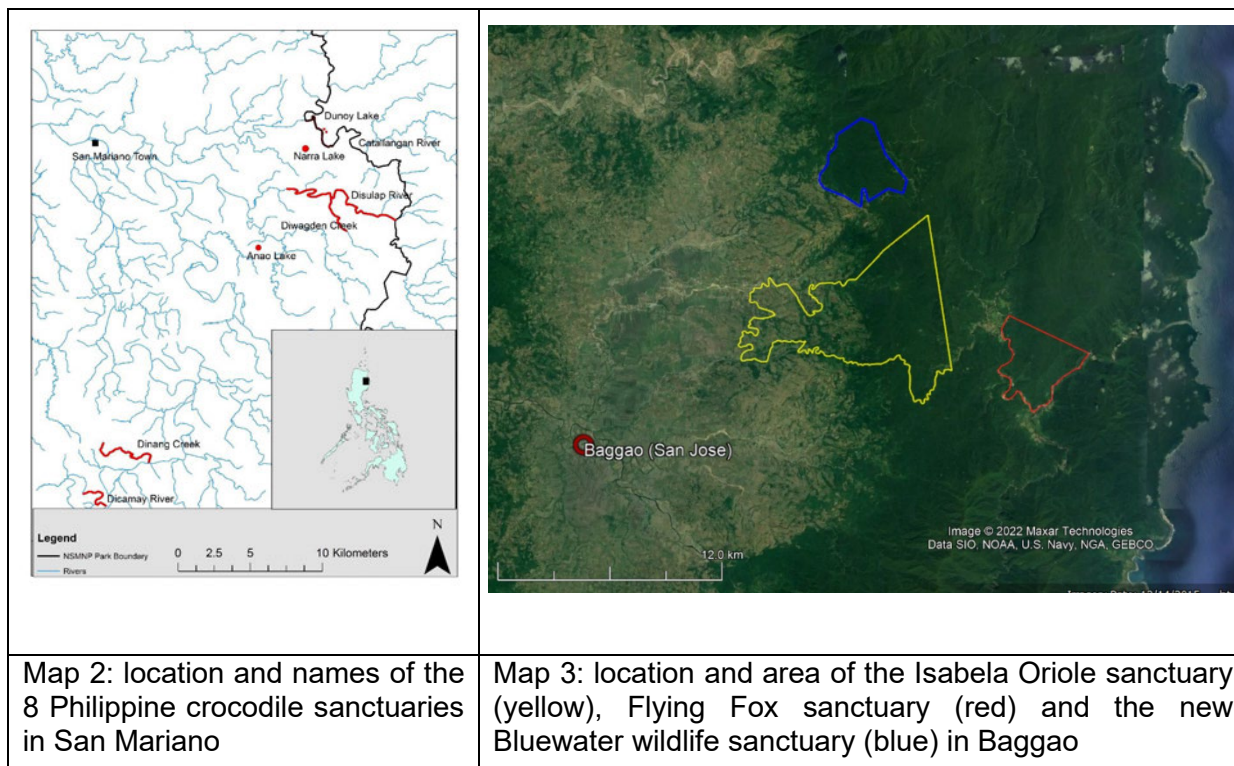
The Philippines is a mega-diversity country with globally important numbers of endemic species. Many endemic species are however threatened with extinction, mainly as a result of habitat loss. Ecosystem degradation also threatens lives and livelihoods of the poorest rural communities. The Northern Sierra Madre Mountain Range in Northeast Luzon holds the last great forest of the Philippines and important wetland areas. The forest and wetlands and their species are threatened by logging, agricultural conversion and unsustainable hunting and fishing. Although some areas are nationally protected, there is little real protection on the ground. Since 2003, the Mabuwaya Foundation has identified critical habitat areas for threatened species, and areas that provide important ecosystem services. Mabuwaya lobbies with communities, village and municipal governments to have these areas protected as locally proclaimed community conserved areas (“sanctuaries”). In this DI-supported project, Mabuwaya works in the municipalities of San Mariano (Isabela Province) and Baggao (Cagayan Province) to sustain the management and protection of 8 sanctuaries for critically endangered Philippine Crocodile *Crocodylus mindorensis*, 1 sanctuary for critically endangered Isabela Oriole *Oriolus isabellae*, 1

sanctuary for endangered Golden-crowned Flying Fox *Acerodon jubatus* and 1 sanctuary for wildlife in general (11 sanctuaries in total, 1 more than in the original proposal as a new wildlife sanctuary is being proclaimed at the moment in Baggao). This project seeks to further engage communities in sanctuary management by enhancing awareness of the importance of biodiversity conservation and by improving community-based biodiversity and land-use change monitoring, law enforcement and sanctuary management. The project also aims to promote agroforestry-based livelihoods by restoring deforested areas in sanctuaries and sanctuary bufferzones. This is not only a more biodiversity-friendly type of landuse as an alternative to unsustainable slash-and-burn farming, but it has the potential to increase farmers' incomes and will provide incentives for sustained sanctuary protection.

Specifically, the project produces information materials (annual calendars, posters, billboards and educational materials for schools) and distributes these to focal communities and schools. Teachers are trained in using the materials and to incorporate environmental conservation in their lessons. Youth environmental leader groups are established, trained, supported and engaged in project activities in each municipality. Meetings are held at community and household level to explain the project, stress the importance of environmental conservation and discuss project progress. CV-19 restrictions allowing, environmental manifestations (cultural shows, parades, school contests, exhibitions, workshops) are organized together with the youth environmental groups during annual town fiestas. Baseline data on knowledge and awareness regarding focal species, environmental conservation and nature-friendly farming practices are gathered at project start, and again at project end to assess the impact of communication campaigns (all Output 1). Local sanctuary guards are selected by partner communities and equipped and trained in species monitoring, threat monitoring and environmental law enforcement (Output 2). Sanctuary management councils are established and capacitated for each sanctuary and sanctuary management plans are developed. Baseline data on focal species populations and land use are gathered at project start and end to assess the impact of sanctuary protection measures (Output 3). The largest threat to the sanctuaries is agricultural conversion, notably to establish mono-culture corn farms (for animal feed production outside the region). The project seeks to promote alternative nature-friendly tree-based agricultural systems. Individual farmers who consent with agroforestry development on (part of) their land in wildlife sanctuaries and their bufferzones, will be assisted with individual farm development plans, seedling procurement and production, agroforestry training and assistance with developing and marketing produce and derived products. Where possible this will be done through farmer cooperatives. Specific attention is given to women's groups and the youth environmental groups to promote vegetable gardening and the production of banana "leather" from banana fibres as basis material for lamp shades (origami), wallpaper and bags. Apart from providing a much more biodiversity friendly environment, the agroforestry component of the project is expected to increase farmer incomes on the long term, promote climate-change resilience through crop diversity, community health by providing access to a more diverse diet and more opportunities to women and youth to earn their own income. Baseline data on crop use and individual farmer household incomes are collected at project start and end to assess the impact of agroforestry development, although measurable impacts are likely to be longer term than project life (Output 4).

The official project starting date is 1 July 2021, but until August we did not know whether our project would be funded (the final grant offer was made on 15 September). Activities therefore started in August 2021 and this first annual report covers a period of 8 months of activities.





2. Project stakeholders/ partners

The Local Government of Baggao through the Office of the Municipal Environment and Natural Resources Office (MENRO) assigned staff members to work with the Mabuwaya Foundation staff in landscape monitoring and biodiversity surveys of Isabela Oriole and Flying Foxes, farm validation and gathering of soil samples and the establishment of vegetable nurseries and tree plantations. We are also collaborating in the organization of the youth nature group and the conduct of youth environmental activities such as youth camps and river clean up drives. There are regular meetings of Mabuwaya staff and the Mayor and MENRO of Baggao to discuss project planning and progress, and local government staff have joined most field activities of the project.

We collaborated with the Local Government of San Mariano through the office of the Municipal Planning and Development Office in the conduct of a training with women on banana leather production and origami. There have been meetings with the MENRO of San Mariano to discuss project implementation and local government support for the project, for example through the provision of seedlings for the agroforestry component. The activities with the youth nature group of San Mariano are coordinated with the municipal council of San Mariano.

The DENR in CENRO Alcala provided maps of the declared Bluewater wildlife sanctuary in Baggao. We also collaborated in organizing and facilitating the community meeting where the regulations of the sanctuary were discussed.

We partner with the Department of Environment and Natural Resources (DENR) through the Community Environment and Natural Resources Office (CENRO) Naguilian in the preparatory work for the declaration of Critical Habitat for Philippine Crocodile of the Dunoy Lake and Disulap River crocodile sanctuaries in San Mariano.

Five students of the Isabela State University (ISU) Cabagan, College of Development Communication conducted Knowledge, Awareness and Practice (KAP) surveys about agroforestry in Baggao. The results will be used as a basis for communication campaigns to explain the benefits of agroforestry for people and nature to farmers in Baggao and San Mariano. ISU DevCom students will further be involved in the production of information materials and in the baseline assessment of environmental and focal species knowledge and awareness (Year 2).

A planning meeting with the Isabela State University Cabagan, College of Forestry and Environmental Management (CFEM) was held. CFEM students and staff will be involved in

2022 in soil and water studies, market and value chain studies and species suitability studies as a basis for agroforestry farm development planning in Baggao and San Mariano. CFEM staff will further be involved in the conduct of an agroforestry development planning workshop and agroforestry training for farmers in Baggao and San Mariano.

Together with the National Commission on Indigenous People (NCIP) Region 2 and indigenous Agta communities, we have completed the Ancestral Domain Sustainable Development and Protection Plan in Baggao. The Agta ancestral domain partly overlaps with the flying fox and Isabela Oriole sanctuaries. Our work with the Agta community is co-funded by the Green Livelihood Alliance and is not further part of this report.

3. Project progress

3.1 Progress in carrying out project Activities

Output 1: Increased knowledge, awareness and appreciation of the importance of environmental conservation and environmental laws in 8 focal communities.

Progress: 2 youth nature groups were organized and have received lectures about the biodiversity of Baggao and San Mariano. In November 2021, the “Baggao local biodiversity awareness and appreciation symposium” was organized by Mabuwaya and MENRO staff for the youth of Baggao. This resulted in the establishment of the Baggao Youth Environmental Leaders (BYEL) group (43 members). The BYEL co-organized an Environmental Youth Camp with Mabuwaya and LGU Baggao. Activities included lectures on the biodiversity of Baggao and training on birdwatching techniques, leadership and team building. Aside from this, BYEL conducted river clean-up drives, assisted in the distribution of calendars, potting of wildlings and establishment of vegetable nurseries. The vegetable seedlings will be distributed to households for planting in their respective gardens. The pre-project existing Kasalika Youth Environmental Leaders group in San Mariano (c. 600 members) conducted several river clean up drives and were involved in the distribution of calendars and a poster on Philippine crocodile diets (co-funded by Synchronicity Earth, Whitley Foundation and Zoos Victoria).

4,500 annual calendars (2022) were produced and distributed in Baggao and San Mariano to all households in focal communities. The theme of the 2022 calendar are the youth environmental groups and both groups are featured on the calendar with photos. Both groups participated in the distribution of the calendar

3 meetings were conducted in Baggao (Mansarong, Malisi and Camunayan) and 1 meeting was conducted in San Mariano with community members about the project. An introduction of the project and the identification of interested farmer-beneficiaries and planning of surveys of proposed agroforestry farms were on the agenda.

The project further had meetings with the Baggao Local Council of Women and two women’s groups in San Mariano to discuss the establishment and maintenance of vegetable nurseries, and the later disbursement of vegetable seedlings to households in the wildlife sanctuaries and their bufferzones. In San Mariano, another meeting was held with a women’s group on the planting of Banana saplings and the planning of a training on the production of banana leather from banana fibres.

Output 2. Eight participatory biodiversity & land use change monitoring and environmental law enforcement teams are monitoring focal species and enforcing environmental laws in 10 sanctuaries, reducing threats to focal species and their habitat and yielding data on species’ populations and tree cover.

Progress: 2 Philippine Crocodile population surveys were conducted in San Mariano together with 12 sanctuary guards (*Bantay sanktuwaryo*). The total count in 2021 was 84 individual crocodiles. In Baggao, an Isabela Oriole survey was conducted in September 2021 with the community monitoring team and staff of the MENRO. A total of 36 individuals were recorded. One flying fox survey was conducted in September 2021. 16,435 flying foxes were counted during the exit flight.

In San Mariano, 12 Bantay Sanktuwaryo members were provided with uniforms, water bottles and batteries for their flashlights.

The Barangay (village) Council in Blue Water, Pallagao in Baggao passed an ordinance declaring 970 ha of the area as Wildlife Sanctuary on June 12, 2021. 28 households decided that all of them will be part of the law enforcement and monitoring team in the area. The ordinance is now with the Municipal Legislative Office for adoption.

Output 3. 10 community sanctuary management councils are taking decisions about interventions in response to sanctuary guard patrol reports, and about law enforcement, reforestation of denuded areas and land use appropriations

Progress: In Baggao, monitoring and law enforcement committee members were selected by the focal communities in the wildlife sanctuaries. The law enforcement committee members will be trained during the environmental law enforcement training planned for July 2022. The monitoring members are already involved in biodiversity monitoring surveys together with Mabuwaya and MENRO staff. The sanctuary management councils in Baggao still have to be formally established and trained, and management plans for the 3 wildlife sanctuaries still have to be developed.

In San Mariano, 7 community sanctuary management councils were established in 2018 and 12 sanctuary guards have been actively involved in crocodile monitoring surveys and environmental law enforcement. The councils however need additional training and coaching, and management plans for the sanctuaries still need to be developed. One crocodile sanctuary (Cadsalan) does not yet have a sanctuary management council.

The crocodile sanctuaries of Disulap River and Dinang Creek are to be declared as Critical Habitat under the national Wildlife Act by the Department of Environment and Natural Resources (DENR). Mabuwaya is assisting the DENR with information and the organization of community meetings as the basis for the declaration. Recognition as Critical Habitat will provide additional protection to the sanctuaries, and budget for DENR to be involved in monitoring and law enforcement activities.

Output 4. Agroforestry-based livelihoods contributing to local incomes and support for sanctuaries

Progress: 89.95 hectares of potential agroforestry areas in wildlife sanctuaries in Baggao and San Mariano have been identified and surveyed together with 101 farmer-beneficiaries. Soil samples have been submitted to the Department of Agriculture for analysis. The results of the soil analysis, combined with market and value-chain studies will be used for species suitability analysis by students and faculty of the College of Forestry and Environmental Management (CFEM) of Isabela State University in July – August 2022; this will lead to individual farm planning and the planting of seedlings.

2 vegetable nurseries were established and managed in Baggao by the Baggao Local Council of Women and the Baggao Youth Environmental Leaders. The vegetable seedlings will be distributed to participating households in wildlife sanctuaries in May 2022.

A training was given to 40 participants on the production of Banana leather from banana fibers, and the use of origami to produce lamp shades from banana leather to the Villa Miranda Crossing Malaya Women's Association on 12 March 2022. One hectare was planted with Banana saplings by the group as a future source of banana fibres.

3.2 Progress towards project Outputs

Output 1: Increased knowledge, awareness and appreciation of the importance of environmental conservation and environmental laws in 8 focal communities.

CV-19 restrictions have limited the possibility to organize community meetings and the baseline data gathering of knowledge and awareness regarding focal species and environmental conservation by Isabela State University students. At this early stage of the project, 4,500 calendars were distributed to all households, government offices and schools in the focal communities with information about the youth environmental groups (message: "A prosperous

future of the youth depends on a healthy environment”). Meetings were held with 3 communities in Baggao, 1 community in San Mariano, 1 women’s group in Baggao and 2 women’s groups in San Mariano. One youth environmental leaders’ group was established in Baggao with an initial 43 members (22 males, 21 females) and several activities were conducted with them (river clean-up drives, environmental youth camp, biodiversity lectures, birdwatching training, involvement in vegetable nursery set up, distribution of calendars). Activities were also conducted with the existing youth environmental leaders’ group (600 members, > 50% female) in San Mariano (river clean-up drives, distribution of calendars and posters, crocodile release). Fiestas are still banned under CV-19 restrictions, so no town environmental manifestations could be held.

Output 2. Eight participatory biodiversity & land use change monitoring and environmental law enforcement teams are monitoring focal species and enforcing environmental laws in 10 sanctuaries, reducing threats to focal species and their habitat and yielding data on species’ populations and tree cover.

Twelve community members are sanctuary guards in 8 crocodile sanctuaries in 5 communities in San Mariano (11 male, 1 female). Five community members of Camunayan, and 1 community member in Malisi (male) in Baggao are sanctuary guards of the Isabela Oriole sanctuary (all male). These 18 sanctuary guards, representing 7 communities, are involved in the monitoring of focal species in the wildlife sanctuaries. An additional 15 sanctuary guards volunteered for the new Bluewater wildlife sanctuary in Baggao (14 male, 1 female) but the monitoring system here still has to be established. It is proving difficult to find female volunteers to be sanctuary guard, as the associated fieldwork, hiking and law enforcement is more associated with males in these rural communities. No hunting / killing of crocodiles or illegal logging was reported in the crocodile sanctuaries in San Mariano. The sanctuary guards in Baggao have yet to be trained in environmental law enforcement. Data on hunting and logging are not yet systematically collected in Baggao. Tree cover data with the use of drone aerial images / maps have not yet been collected as a training for project staff on aerial land use monitoring had to be postponed as a result of CV-19 restrictions.

Output 3. 10 community sanctuary management councils are taking decisions about interventions in response to sanctuary guard patrol reports, and about law enforcement, reforestation of denuded areas and land use appropriations

Sanctuary councils still have to be established (Baggao) or existing councils have to be revived (San Mariano). Sanctuary management plans still have to be developed.

Output 4. Agroforestry-based livelihoods contributing to local incomes and support for sanctuaries

In Baggao, 21 farmers in Camunayan (17 ha), in Malisi 24 farmers (25 ha) and in Mansarong 7 farmers (8 ha) agreed to develop agroforestry farms in the Isabela Oriole sanctuary. See Annex 4 field report Baggao September 2021. In San Mariano, in Dunoy, Dadugen and Malaya, 19 farmers (16.55 ha) agreed to develop agroforestry farms in the bufferzone of the crocodile sanctuaries of Dunoy Lake, Catallangan River and NARRA Lake. See Annex 5 field report San Mariano December 2021. Also in San Mariano, 30 farmers in Diwagden and Kamarisatan (23.3 ha) agreed to develop agroforestry farms in the (bufferzone) of the crocodile sanctuaries of Disulap River and Diwagden Creek. See Annex 6 field report San Mariano January 2022. An inventory of other farmers in other crocodile sanctuaries is still ongoing. Summarising, 101 farmer households in wildlife sanctuaries have so far indicated that they are willing to convert an area of 89.85 ha now used for corn or other annual crops into agroforestry (50 ha in Baggao and 39.85 ha in San Mariano).

In San Mariano, 40 women were trained in the production of banana leather from banana fibres and the use of origami to produce banana leather lamp shades. One hectare of degraded grassland areas were planted with banana saplings by the women’s group in the NARRA crocodile sanctuary as a future source of banana fibres. See Annex 7 Field report San Mariano February 2022.

Baseline data on farmer household incomes and crop cultivation was collected in Mansarong (13 household interviews), Malisi (19), Camunayan (44) in Baggao and in Lumalog (34), Dunoy (19), Malaya (9), Dadugen (3), Diwagden (32), Kamarisatan (4). A total of 177 interviews were conducted, comprising about half of the population of the focal communities. See Annex 9 Baseline data Farmers households. Many more data were gathered, the report just provides a brief summary.

3.3 Progress towards the project Outcome

Outcome: Protection of 10 local sanctuaries with growing populations of Philippine Crocodile, Isabela Oriole and Golden-crowned Flying Fox by 8 well-capacitated supportive communities that are benefitting from healthy ecosystems and nature-based livelihoods

The project now focusses on 11 local sanctuaries, as 1 new sanctuary (Bluewater, 930 ha, general wildlife sanctuary with several endemic threatened species including the CR Isabela Oriole) is in the process of being proclaimed in Baggao. The Philippine crocodile non-hatchling count in 2021 in San Mariano was 52 individuals (86 including hatchlings born in 2021), this is 15% higher than the baseline data of 45 non-hatchling crocodiles in 2020. The Isabela Oriole count in 2021 in Baggao was 36 individuals, this is 157% higher than the baseline data of 14 orioles in 2020. The exit flight count of flying foxes in Baggao was 16,435 individuals; assuming that 10 % / 1,644 individuals of these were Golden-crowned Flying Foxes (and 90% Large Flying Fox *Pteropus vampyrus*), this is 53% lower than the baseline data of 3,500 Golden-crowned flying foxes. We need to treat these figures with caution as fluctuations in count results with these very rare, elusive and difficult to count animals is common, and the increase or decrease in populations cannot yet be attributed to the project; we need to look at the trends at project end. It seems that the Isabela Oriole population in Baggao is larger than we knew though, although a population of 36 individuals remains critically small. See Annex 8 Field report monitoring Baggao September 2021 for the results of monitoring surveys there.

It is too early in the project to monitor changes in tree cover. Similarly, many sanctuary guards still need to be trained in environmental law enforcement and sanctuary councils need to be set up and capacitated, so it is too early to monitor changes in illegal activities. Baseline data on environmental knowledge, awareness and support for conservation still need to be established, and communication campaigns still need to be conducted, so a change in attitudes towards conservation can not yet be monitored.

As of now, 101 farmer households have indicated an interest in developing agroforestry farms as an alternative to mono-culture slash-and-burn farming in (bufferzones) of wildlife sanctuaries. In addition, several women representatives of focal households are involved in establishing vegetable gardens and banana plantations as a basis for banana fibre. It is too early to measure the impact of this in monetary terms.

3.4 Monitoring of assumptions

Assumption 1: No huge adverse impacts from natural disasters such as super-typhoons or earthquakes (the Philippines is prone to these).

Comments: In March 2022, scheduled community meetings and monitoring of Isabela Oriole and flying foxes in Baggao were cancelled due to unusual heavy rain during 2 weeks that made fieldwork impossible. These activities have yet to be undertaken.

Assumption 2: No serious increase in hostilities between the Philippine Army and communist rebels (New Peoples Army) in the focal areas (both San Mariano and Baggao have NPA presence).

Comments: In February 2022, the scheduled farm validation and gathering of soil samples in Camunayan in Baggao was cancelled due to fighting between the Philippine Army and the New People's Army. Helicopters were used by the army to bomb rebel camps. Tensions remain high in remote areas of Baggao as these are now considered the hotspot of rebel activity in the Northern Sierra Madre. Project activities are well coordinated with the local government, and if there is any risk, project activities are postponed. The farm validation and soil sample collection have now been completed after fighting stopped.

Assumption 3. Mabuwaya keeps permission to operate in focal communities and municipalities by local governments, also after the 2022 elections (we don't have indications we will not allowed to continue).

Comments: Mabuwaya is allowed to continue work in all project sites. Elections will be held on 9 May 2022. Local government leadership will not change in San Mariano (the Mayor runs unopposed) but in Baggao 5 candidates run for Mayor and political change is expected. A change in local political leadership usually results in a complete shake-up of all local positions, and in Baggao we would have to establish new relationships and partnerships with the local government if this happens. We do not expect that this will alter our work on community level though.

Assumption 4. CV-19 restrictions will not hamper field activities, trainings, meetings, public activities and interview surveys.

Comments: Some meetings were not allowed because of CV-19 restriction imposed by the Inter-Agency Task Force within the municipalities. Fiestas and large-scale public gatherings remain banned in Baggao and San Mariano; this could impact our larger scale public awareness activities (environmental manifestations at fiestas).

Assumption 5. Isabela State University and students remain interested as a partner in developing and implementing communication campaigns and pre/mid-term/post communication campaign impact surveys.

Comments: Isabela State University remains interested and engaged to partner with Mabuwaya in this project. CV-19 restrictions have limited the engagement of students until March 2022, impacting awareness and knowledge baseline data gathering and agroforestry farm planning, but these restrictions are now lifted and plans have been made to collect data during the mid-year break (June – August).

Assumption 6. The municipal governments and schools remain supportive to integrate environmental conservation in the curriculum and (high)school children will be interested to participate in surveys, conservation events and youth nature groups.

Comments: All these stakeholders remains supportive of the project.

Assumption 7. Tanggol Kalikasan remains interested as a partner in conducting environmental law enforcement trainings and lawyers are available for trainings.

Comments: TK remains supportive of the project. An environmental law enforcement is planned for June 2022.

Assumption 8. Local communities and municipal governments remain supportive to trainings regarding biodiversity monitoring and environmental law enforcement.

Comments: No change.

Assumption 9. Municipal governments and/or DENR remain supportive to deputizing trained community members as sanctuary guards or wildlife enforcement officers.

Comments: No change

Assumption 10. Isabela State University and the Department of Trade and Industries (regional office) remain interested and available to provide technical assistance to the development of agroforestry livelihood plans and the marketing of products.

Comments: A meeting was conducted with the College of Forestry and Environmental Management for the development of the Agroforestry Livelihood Plans. We are in contact with

the Department of Trade and Industry on the livelihood training and assistance to marketing of product by our beneficiaries.

Assumption 11: Local communities and municipal governments remain supportive to trainings and the implementation of agroforestry-based livelihood activities.

Comments: No change.

3.5 Impact: achievement of positive impact on biodiversity and poverty alleviation

The project now focusses on 11 local sanctuaries, as 1 new sanctuary (Bluewater, 930 ha, general wildlife sanctuary with several endemic threatened species including the CR Isabela Oriole) is in the process of being proclaimed in Baggao. The Philippine crocodile non-hatchling count in 2021 in San Mariano was 52 individuals (86 including hatchlings born in 2021), this is 15% higher than the baseline data of 45 non-hatchling crocodiles in 2020. The Isabela Oriole count in 2021 in Baggao was 36 individuals, this is 157% higher than the baseline data of 14 orioles in 2020. The exit flight count of flying foxes in Baggao was 16,435 individuals; assuming that 10 % / 1,644 individuals of these were Golden-crowned Flying Foxes (and 90% Large Flying Fox *Pteropus vampyrus*), this is 53% lower than the baseline data of 3,500 Golden-crowned flying foxes. We need to treat these figures with caution as fluctuations in count results with these very rare, elusive and difficult to count animals is common, and the increase or decrease in populations cannot yet be attributed to the project; we need to look at the trends at project end. It seems that the Isabela Oriole population in Baggao is larger than we knew though, although a population of 36 individuals remains critically small. The wildlife sanctuaries do not only protect specific species, but a host of other wetland and forest species as well.

As of now, 101 farmer households have indicated an interest in developing agroforestry farms as an alternative to mono-culture slash-and-burn farming in (bufferzones) of wildlife sanctuaries. In addition, several women representatives of focal households are involved in establishing vegetable gardens and banana plantations as a basis for banana fibre. It is too early to measure the impact of this in monetary terms.

4. Project support to the Conventions, Treaties or Agreements

Our project will support several CBF Aichi Biodiversity targets, notably target 1 (increasing awareness), target 5 (reduction forest loss), target 11 (well-managed locally protected areas), target 12 (extinction prevention of Philippine crocodile, Isabela Oriole and Golden-crowned Flying Fox), target 14 (restoration and safeguarding of ecosystem services) and target 17 (support to the implementation of the Philippine NBSAP (2015-2028)). We have regular meetings with the Biodiversity Management Bureau of the Department of Environment and Natural Resources (DENR-BMB) in Manila about our projects and activities and how we can support the goals of the Philippine government regarding biodiversity conservation.

Our project will support Goal 15 of the Sustainable Development Goals by promoting sustainable forest management and halting biodiversity loss and land degradation in the Northern Sierra Madre.

We contribute to climate change mitigation under the UNFCCC by protecting forest and restoring degraded forest areas, and by promoting nature-based solutions to habitat degradation.

At this moment, the contribution of the project to these targets is not yet measurable.

The first steps have been taken to declare two crocodile sanctuaries in San Mariano as national Critical Habitat by the Department of Environment and Natural Resources. Once this has happened, we will lobby for recognition of the crocodile sanctuaries as a RAMSAR wetland site of international importance. We have had a meeting about this with DENR-BMB.

5. Project support to poverty reduction

It is still early in the project to show impacts on poverty reduction. We have so far identified 101 farmer households in/near wildlife sanctuaries who are willing to convert part of their mono-culture farmland into agroforestry farms. This is expected to increase their resilience against weather extremes through crop diversification and hence decrease the risk of failed harvests and the need to obtain loans from loan sharks, and eventually increase household income through the production of higher value crops and derived products. We have also initiated work with 3 women's groups to promote vegetable farming as a means to increase women's incomes and diversify household diets. One women's group is trained and engaged in banana farming in a wildlife sanctuary, and in producing banana leather and banana leather products from banana fibres. This too is expected to increase household and individual women incomes.

6. Consideration of gender equality issues

We work closely with three existing women's groups in focal communities in San Mariano (2) and in Baggao (1). We conducted community meetings with the women's groups and work with them in establishing communal vegetable nurseries and banana plantations as a source of banana fibres. We trained 1 group in the production of banana leather and banana leather lamp shades. The women's groups and individual members will economically benefit from the sale of banana leather and vegetables, and thus become economically less dependant on the income usually generated by men in these rural farmer communities. The vegetables will further diversify household diets and benefit all household members in terms of health.

We also aim to involve women more closely in wildlife sanctuary management, environmental law enforcement and sanctuary monitoring. Two new sanctuary guards are women, but it proves difficult to motivate more women to become sanctuary guard as this is generally regarded to be a men's job in the communities where we work.

The 2 youth environmental leader groups we support consist of more or less equal numbers of girls and boys, and girls play an equally important role in decision making and implementation of activities in the groups. Perhaps future female sanctuary managers and guards can be recruited from these groups.

7. Monitoring and evaluation

We are still establishing a better participatory monitoring and evaluation system for this project. We have collected a lot of data but while writing this report we realized we need better data management systems and databases. Also, we would like to develop a more participatory M&E system with our partners although we do discuss project progress with our partners regularly in an informal way. In 2022 we want to use a more formal M&E system, through a semi-annual meeting with project partners where indicator data is presented and discussed.

8. Lessons learnt

Close collaboration with local government and national government agencies can be very fruitful, as we have learned in this project so far from working with the municipal government of Baggao and the Department of Trade and Industries. As NGO, we have in the past sometimes worked too much on our own although we have always coordinated our activities with authorities. But implementing activities in much closer collaboration, with participation of local government staff, results in a very good working relationship that will hopefully lead to much more sustainability of project activities.

9. Actions taken in response to previous reviews (if applicable)

This is our first annual report. We have incorporated feedback on the proposal in a revised version of the logframe (approved after a change request).

10. Other comments on progress not covered elsewhere

We have no other comments

11. Sustainability and legacy

It is too early in the project to reflect on this.

12. Darwin identity

The Darwin and UK government logo are shown on the annual calendar (3,500 copies) that was produced and distributed to households, schools and government offices. These logos will also be used on future materials. The Darwin Initiative and UK government have been mentioned as partner / donor in all meetings about the project with local government, national government agencies, communities and Isabela State University.

13. Impact of COVID-19 on project delivery

CV-19 restrictions in the Philippines have been very strict until March 2022 and to this date some measures remain in place (wearing face masks, no large gatherings, local restrictions on travel, online education). Education will be in-class again starting September 2022, if number of CV-19 cases remains low. The Philippines is using an alert coding system which can be implemented locally depending on the number of CV-19 cases. At the moment (April 2022) most of the country is at alert level 1, which is the lowest level. If cases rise in a municipality or province, this alert level can be elevated with consequential more restrictions. Municipalities and provinces can also be isolated for a number of weeks if cases spike.

CV-19 restrictions have impacted our project, but we had anticipated that activities with large groups would be difficult until the start of 2022. When it became clear late December 2021 that new restrictions would be in place until March 2022, we submitted a budget change request to move the budget for trainings and group events to the next fiscal year. Also, the budget for the procurement of equipment was moved to the next fiscal year as travel to Manila was restricted until March 2022, and it is difficult to procure equipment outside Manila.

All our staff are vaccinated (voluntarily) and use precautions when visiting rural communities (use of face mask if required/desired, social distancing and stay home / go home if exhibiting symptoms).

The use of virtual meetings with partners in Manila has proven an effective way to communicate, and we expect this will replace some travel. Virtual meetings in the province or with rural partners is very difficult as cellphone signal and internet connections are often very weak.

It is difficult to predict how the pandemic will develop and how it will impact our work. The Philippine government has been among the most restrictive globally in its response to CV-19 but a new government will be in place after the May 2022 elections and we don't know how they will respond to a possible rise in CV-19 cases.

14. Safeguarding

Our safeguarding policy and code of conduct was developed in 2020 and adopted by the board of trustees of the Mabuwaya Foundation in March 2021. All staff have been oriented on the safeguarding policy and on whistleblowing procedures. Staff have further followed an online training on safeguarding (<https://kayaconnect.org/course/info.php?id=1424>) and a webinar on safeguarding organized by Synchronicity Earth on 16 March 2021. Staff have also been oriented on how to share and implement this policy when working with (community) partners.

No safeguarding or human rights violations have occurred during the reporting period.

15. Project expenditure

Table 1: Project expenditure during the reporting period (1 April 2021 – 31 March 2022)

Project spend (indicative) since last Annual Report	2021/22 Grant (£)	2021/22 Total Darwin Costs (£)	Variance %	Comments (please explain significant variances)
Staff costs (see below)	████████	████████	█	
Consultancy costs	-	-		
Overhead Costs	████████	████████	█	
Travel and subsistence	████████	████████	█	
Operating Costs	████████	████████	█	Operating costs were lower than budgeted as many activities had to be postponed as a result of CV-19 restrictions
Capital items (see below)	-	-		
Monitoring & Evaluation (M&E)	-	-		
Others (see below)	-	-		
TOTAL	████████	████████		

16. OPTIONAL: Outstanding achievements of your project during the reporting period (300-400 words maximum). This section may be used for publicity purposes

I agree for the Darwin Initiative Secretariat to publish the content of this section (please leave this line in to indicate your agreement to use any material you provide here).

We do not yet have outstanding achievements of our project

Is your report more than 10MB? If so, please discuss with Darwin-Projects@ltsi.co.uk about the best way to deliver the report, putting the project number in the Subject line.	
Have you included means of verification? You should not submit every project document, but the main outputs and a selection of the others would strengthen the report.	X
Do you have hard copies of material you need to submit with the report? If so, please make this clear in the covering email and ensure all material is marked with the project number. However, we would expect that most material will now be electronic.	No
Have you involved your partners in preparation of the report and named the main contributors	No, but explained in M&E section
Have you completed the Project Expenditure table fully?	X
Do not include claim forms or other communications with this report.	