United Nations Development Programme

Project title: Catalyzing **O**ptimum Management of **N**atural Heritage for **S**ustainability of **E**cosystem, **R**esources and **V**iability of **E**ndangered Wildlife Species (CONSERVE)		
Country: Indonesia	**Implementing Partner (GEF Executing Entity):** Ministry of Environment and Forestry (MoEF/KLHK)	**Execution Modality***:* National Implementation Modality
Contributing Outcome (UNDDF/CPD, RPD, GPD)*:* Outcome 3 (UNCPD 2021-2025): By 2025, Institutions, communities and people actively apply and implement low carbon development, sustainable natural resources management, and disaster resilience approaches that are all gender sensitive. **CPD Output 3.2**: Strengthened and expanded protection, governance and management of terrestrial and aquatic ecosystems, habitats and species (Strategic Plan output1.4.1)		
UNDP Social and Environmental Screening Category: High Risk	**UNDP Gender Marker:** 2	
Atlas Award ID: 00126223	**Atlas Project/Output ID: 00120339**	
UNDP-GEF PIMS ID number: 6380	**GEF Project ID number:** 10236	
LPAC meeting date: 5 August 2021		
Latest possible date to submit to GEF: 15 June 2020		
Latest possible CEO endorsement date: 11 June 2021		
Planned start date: February 2022	**Planned end date:** Operational close: February 2028	
Expected date of posting of Mid-Term Review to ERC: February 2025	**Expected date of posting Terminal evaluation report to ERC:** August 2027	

Brief project description: The loss of biological diversity is one of the most severe human-caused global environmental problems. Wildlife is critical to ecosystem functioning and their decline and extinction disrupts natural processes and services. Rapid population growth in rural areas leads to increased habitat loss and increased human wildlife conflicts over scarce resources. This is a serious challenge that can lead to retaliatory killing, negative perspectives of communities towards wildlife, and undermine support for conservation.

There is failure to account for economic and ecological biodiversity value that leads to mismanagement and overexploitation. Local populations that live with wildlife are often excluded from benefits derived from the value of wildlife, which in many cases is extracted unsustainably by few. Wildlife is also under threat as they are often not considered a preferred land-use choice to generate benefits for governments and local communities through nature-based tourism or other economically viable activities.

The project is designed to strengthen management of multiple use landscapes to enhance biodiversity conservation, generate sustainable land-use and livelihood practices and address illegal wildlife trade. The project's intervention is to ensure that existing protected areas and surrounding high conservation value forests are managed to support viable populations of globally threatened species and allows for the movement of wildlife, pollination and reproduction, and other processes that support the recovery and improve natural resiliency to external development including climatic shocks. This will be achieved through the implementation of four inter-related components that are focussed at addressing existing barriers. The four components of the project are:

Component 1: Strengthened management and protection of multiple use landscapes for the conservation of key threatened species
Component 2: Enhanced site-based enforcement and monitoring of sustainable use of wildlife resources
Component 3: Improved private sector and community engagement and diversified financing for biodiversity conservation across landscapes; and
Component 4: Upscaling/replication of project approaches at national and regional level

The project is part of the GEF Global Wildlife Programme that promote wildlife conservation and crime prevention for sustainable and resilient development. It will contribute to stabilization or increase populations of, and area occupied by, wildlife at project sites. It will be fully executed by the Ministry of Environment and Forestry as a national leading sector in biodiversity conservation and endangered wildlife management in Indonesia.

1. FINANCING PLAN

GEF Trust Fund	USD 6,272,018
Total Budget administered by UNDP	**USD 6,272,018**

2. CO-FINANCIERS THAT WILL DELIVER PROJECT RESULTS INCLUDED IN THE PROJECT RESULTS FRAMEWORK

Ministry of Environment and Forestry (KSDAE)	USD 46,000,000
NGOs	USD 700,526
Universities	USD 1,000,000
UNDP Multi-Partner Trust Fund (the Lion Share)	USD 2,000,000
UNDP CO	USD 1,300,000
Total confirmed co-financing	**USD 51,000,526**
Grand-Total Project Financing (1)+(2)	**USD 57,272,544**

SIGNATURES

Signature: Luky Alfirman Director General of Budget Financing and Risk Management, Ministry of Finance	**Agreed by Government Development Coordination Authority**	**Date/Month/Year:** 02 / 02 / 2022
Signature: Bambang Hendroyono Secretary General, Ministry of Environment and Forestry	**Agreed by Implementing Partner**	**Date/Month/Year:**
Signature: Norimasa Shimomura Resident Representative	**Agreed by UNDP**	**Date/Month/Year:**

Key GEF Project Cycle Milestones:

Project document signature: within 25 days of GEF CEO endorsement
First disbursement date: within 40 days of GEF CEO endorsement
Inception workshop date: within 60 days of GEF CEO endorsement
Operational closure: within 3 months of posting of TE to UNDP ERC
Financial closure: within 6 months of operational closure

I. TABLE OF CONTENTS

I. Table of Contents 2
II. Development Challenge 6
III. Strategy 21
IV. Results and Partnerships 29
V. Project Results Framework 89
VI. Monitoring and Evaluation (M&E) Plan 98
VII. Governance and Management Arrangements 101
VIII. Financial Planning and Management 106
IX. Total Budget and Work Plan 109
X. Legal Context 118
XI. Risk Management 118
XII. Mandatory Annexes 121

1 Project Map and geospatial coordinates of the project area
2 Multiyear Workplan
3 Monitoring Plan
4 Stakeholder Engagement Plan
5 UNDP Atlas Risk Log
6 Overview of technical consultancies/subcontracts
7 Terms of Reference for Key Project Staff
8 Applicable Policy for Essential Ecosystem Areas
9 Steps for implementation of Essential Ecosystem Areas
10 Social and Environmental Screening Procedure (SESP)
11 Customary Communities Planning Framework
12 Gender Analysis and Gender Action Plan
13 Knowledge Management and Communication Framework
14 Procurement Plan – for first year of implementation especially
15 GEF focal area specific annexes (e.g. METT)
16 Capacity Development Scorecards
17 GEF and/or LDCF/SCCF Core indicators
18 GEF Taxonomy
19 PPG consultations
20 Environmental and Social Management Framework
21 Partners Capacity Assessment Tool and HACT assessment
22 UNDP Project Quality Assurance Report (to be completed in UNDP online corporate planning system)
23 Co-financing letters
24 Project site selection matrix

Acronyms and Abbreviations

BAPPENAS	Ministry of National Development Planning
BKSDA	Natural Resources Conservation Agency
BPEE	Ecosystem Essential Management Body (under DG-KSDAE)
CA	Conservation Area
CBD	Convention on Biological Diversity
CBO	Community-based Organization
CCP	Customary Communities Plan
CCPF	Customary Communities Planning Framework
CITES	Convention on International Trade in Endangered Species of Wild Fauna and Flora
CRU	Conservation Response Unit
CSO	Civil Society Organization
ESMF	Environment and Social Management Framework
ESMP	Environment and Social Management Plan
FKGI	Forum Konservasi Gajah Indonesia (Indonesian Forum for Elephant Conservation)
FMU	Forest Management Unit
FPIC	Free Prior and informed consent
FORDA	Forest Research and Development Agency
FSC	Forest Stewardship Council
FSP	Full Sized Project
GEF	Global Environment Facility
GEFSEC	Global Environment Facility Secretariat
GRM	Grievance Redressal Mechanism
GWP	Global Wildlife Program (GWP)
HCS	High Carbon Stock
HCVF	High Conservation Value Forest
HTC	Human-Tiger Conflict
HTI	Industrial Timber Plantation
HWC	Human-Wildlife Conflict
IAS	Invasive Alien Species
IBSAP	Indonesia Biodiversity Strategy and Action Plan
IP	Indigenous People
ISPO	Certification for Indonesian Sustainable Palm Oil
ITHCP	Integrated Tiger Habitat Conservation Program
IUCN	International Union for the Conservation of Nature
IWT	Illegal Wildlife Trade
KBA	Key Biodiversity Areas
KEE	Essential Ecosystem Areas (*Kawasan Ekosistem Esensial*)
KKH	Directorate of Biodiversity Conservation, Ministry of Environment and Forests
KK	Directorate of Conservation Areas, Ministry of Environment and Forests
KSDAE	Directorate General of Nature Resources, Conservation and Ecosystem
KSNP	Kerinci Seblat National Park
M&E	Monitoring and Evaluation

METT	Management Effectiveness Tracking Tool
MIKE	Monitoring the Illegal Killing of Elephants
MMP	Community-Based Ranger (*Masyarakat Mitra Polhut)*
MOEF	Ministry of Environment and Forestry
MOU	Memorandum of Understanding
MSME	Micro, Small and Medium Enterprises
MTR	Mid-Term Review
NCBI	National Center for Biotechnology Information
NTFP	Non- Timber Forest Product
NGO	Non-Governmental Organization
NPD	National Project Director
NPM	National Project Manager
NPMU	National Project Management Unit
NTRP	National Tiger Recovery Program
OECM	Other Effective Area-based Conservation Measures
PA	Protected Areas
PAP	Project Affected Person
Perbakin	Indonesian Shooting and Hunting Sport Union (Persatuan Penembak Indonesia)
PIF	Project Identification Form
PIR	GEF Project Implementation Report
POPP	Program and Operations Policies and Procedures
PPG	Project Preparation Grant
RBM	Resort Based Management
RPJM	Medium Term Development Plan
RPJP	Long Term Development Plan
RSPO	Roundtable on Sustainable Palm Oil
SESP	Social and Environment Screening Procedures
SFM	Sustainable Forest Management
SIP	Stakeholder Involvement Plan
SLM	Sustainable Land Management
SMART	Spatial Monitoring and Reporting Tool
SMART-RBM	Spatial Monitoring and Reporting Tool-Resort Based Management
SOMTC	ASEAN Senior Officials Meeting on Transnational Crime
STAP	GEF Scientific Technical Advisory Panel
TCL	Tiger Conservation Landscapes
TE	Terminal Evaluation
TPE	Tiger Proof Enclosures
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNDP-GEF	UNDP Global Environmental Facility
UPT	Unit Pelaksana Teknis (National Government, Technical Implementing Unit)
WCS	World Conservation Society

II. DEVELOPMENT CHALLENGE

1. This project aims to address the negative impacts of unsustainable public and private sector-led development practices by trying to establish and operationalize a comprehensive biodiversity-friendly planning and management approach that harmonizes socio-economic development, sustainable management of natural resources and conservation of biodiversity in major biological landscapes in Indonesia. The project's intervention is to ensure that existing protected areas and surrounding high conservation value forests are managed to support viable populations of globally threatened species and allow for the movement of wildlife, pollination and reproduction, and other processes that support the recovery and improve natural resiliency to external development and climatic shocks. To promote this conservation efforts, the project also seeks to support other area-based conservation measures (OECMs) in areas not recognized as protected areas (PAs), promote sustainable land use practices, generate sustainable livelihoods and address illegal wildlife trade. The project comes at a time when increased degradation of natural habitats from deforestation and conversion to oil palm plantations, forest concessions, coal mining and agricultural expansion and climate change is becoming an ever-increasing threat to critical habitats and ecosystems and their attendant biodiversity. This has great impact on large threatened species, such as the Sumatran elephant, Sumatran tiger and Orangutan. In 2007, estimates suggest that 2,400 to 2,800 elephants were in the wild. Approximately 2,200 elephants were lost in a span of 22 years prior to 2007; the average population loss being 100 elephants per year. In 2008, the elephant had become "locally extinct" in 50% of the ranges identified in Sumatra in 1985 (over one generation)[1]. Now, the Sumatran elephants reside in only seven provinces many of which are under increased pressure of habitat loss and imminent conflicts with humans. Human-elephant conflict rather than poaching is believed to be the main cause of elephant death. The elephant population in Riau province population, faced by the island's most severe habitat loss, was decimated from >1300 to <200 individuals[2]. Due to the rapid decline in Sumatran elephant population, in 2012, it was given the status as "Critically Endangered". About 70% of the elephant's habitat has been wiped out due to illegal logging, establishment of oil palm plantations, forest concessions, mining and poaching. Another critically endangered species which is threatened by habitat loss and poaching is the yellow-crested Cockatoo found in West Nusa Tenggara.
2. A significant threat facing these biodiversity hot spots in Sumatra also include forest habitat loss and fragmentation that over the past two decades has occurred at the rate of 2%/year. Second, significant threats facing the key species of Sumatran Tiger, Sumatran Elephant, Helmeted Hornbill and other species is from direct poaching to supply Asian markets, which over the past five years has spiked in response to soaring international demand. Direct poaching of helmet hornbill to supply Asian markets, for instance, has which over the past five years has spiked in response to soaring international demand (SRAK rangkong gading Indonesia 2018-2028). For tiger, the threat has been accelerated due to an increase in black market prices (>300%) and organized wildlife trafficking syndicates sponsoring poaching. A lesser poaching threat is from the hunting of the tiger's ungulate prey base, which is mainly for local meat consumption. While large (>10,000 km^2) contiguous forest landscapes remain in Sumatra, limited resources for effective management of protected area, means that overall threats remain high, especially as anti-poaching patrols are mostly confined to the core areas of Protected Areas (PAs). Outside of national parks, threats to tigers and elephants are even greater because of proposals to clear remaining forest areas for plantations and infrastructure development, and retaliatory killings due to conflicts with people. Maintaining forests and other ecosystems outside PAs, in Indonesia is paramount in ensuring the conservation of its rich biodiversity and preventing the further decline of its key threatened species and ecosystems
3. Indonesia is one of the most biodiversity rich regions in the world and supports many mammal and bird species including endemic and endangered species. The country is located in the biodiversity distribution path of the Asian continent (Java, Sumatra and Kalimantan islands) and Australia (Papua), and is in the transitional zone of the Wallace line (Sulawesi, Maluku and Nusa Tenggara islands), and therefore harbors

[1] Gopala, A., Hadian, O., Sunarto, ., Sitompul, A., Williams, A., Leimgruber, P., Chambliss, S.E. & Gunaryadi, D. 2011. Elephas maximus ssp. sumatranus. The IUCN Red List of Threatened Species 2011: e.T199856A9129626. http://dx.doi.org/10.2305/IUCN.UK.2011-2.RLTS.T199856A9129626.en.

[2] Biodiversity loss. https://www.eyesontheforest.or.id/backgrounders/biodiversity-loss

the biological richness of Asia, Australia and the transitional zone of the two continents. Sumatra is the sixth largest island in the world, characterized by the Bukit Barisan mountain range and globally significant tropical montane, sub-montane, lowland, freshwater and peat swamp forests as well as mangroves and rivers. The flora of Sumatra, in particular is one of the most species-rich on earth with over 10,000 vascular plant species, of which 12% are endemic. The island's fauna includes 201 mammal and 580 bird species, with endemic and Critically Endangered species such as orangutan, rhinoceros, and elephant. It is also the home to two other Critically Endangered species: Sumatran tiger and Helmeted hornbills. This range covers multiple conservation areas - 13 Important Bird Areas, two Ramsar sites (Berbak and Sembilang National Parks) and the UNESCO Tropical Rainforest Heritage of Sumatra World Heritage Sites (the National Parks of Gunung Leuser, Kerinci Seblat and Bukit Barisan Selatan).

Key threats to natural resources management and biodiversity

4. The primary threats to biodiversity and direct causes of ecosystem degradation in the Indonesia are:

5. *Loss and degradation of natural habitat* stem from deforestation due to conversion of forest areas to oil palm plantations, forest concessions, coal mining and agriculture, unsustainable agricultural practices, incoherent agricultural and natural resources policies, informal settlements, (illegal) logging, irresponsible mining, forest fire, and infrastructure development (roads, residential and commercial establishment). In the coastal and marine ecosystems, this is due to conversion of mangroves and sea grass beds to fishponds and other unsustainable coastal developments, damages to coral reefs and sea grass, pollution from industrial sources, agricultural runoff, and siltation and uncontrolled tourism development. Limited resources as compared to the massive extent of protected areas and other natural habitats (production forests, protection forests etc.) has caused challenge for their effective management. The primary driver of habitat loss and fragmentation, particularly in Sumatra and Sulawesi has been commercial agriculture through the creation of large-scale exotic plantations of mainly oil palm and paper pulp plantations. The threat is further compounded when degraded forests are then considered less important for conservation and assigned for other uses, in particular for agriculture. Poverty in the rural areas, coupled with landlessness, and weak tenure security discourages sustainable upland farming practices leading to the increase in subsistence agriculture. Once agriculture has set in, intensive use of fertilizers and unsustainable land management practices further erode the soil of essential nutrients thus resulting in diminishing harvests, which leads to further expansion of agriculture in forest areas to meet socio economic needs. Deteriorating productivity of upland farms has forced many native communities to shorten their fallow periods in between forest clearings thus limiting the time for open forest areas to recover naturally. As a result of these processes, Indonesia posted a total loss of almost a quarter of its forests, largely driven by conversion to industrial plantations in the period of 25 years (1990-2015).[3] Most of the deforestation has occurred in areas that are the most accessible and suitable for agriculture (lowland forests), which are coincidently the most biodiversity-rich and offers the best quality habitat for some of the threatened species such as the Sumatran Tiger and Sumatran Elephant.

6. *Over-exploitation of wildlife and forest resources* entails the illegal and unsustainable exploitation of wildlife, as well as retaliatory killing of species such as the elephant, orangutan, gibbons, tiger, and other species. Additionally, the recent outbreak of viral pneumonia in China and beyond associated with the novel coronavirus that originated with the sale of wild animals as the source of zoonotic infection[4] requires concerted actions by all countries to enhance anti-smuggling operations associated with IWT. Weak law enforcement has enabled the widespread trading of key species nationally as pets or internationally to feed the traditional medicine requirements of Southeast Asian countries. The exact number of animals killed or the volume of trade cannot be easily assessed on account of the lack of a reliable reporting system. Similarly, for the same reason it is difficult to quantify the threat posed by human-elephant and human-tiger conflict

[3] Beeler, Carolyn and Ser, Kuang Keng Kuek (2016) Indonesia's rapidly disappearing forests in https://www.pri.org/stories/2016-12-30/indonesia-s-rapidly-disappearing-forests-four-charts.

[4] https://www.nature.com/articles/s41586-020-2169-0_reference.pdf

and subsequent retaliatory killings of animals. The poaching of ungulates, especially Sambar deer (*Rusa unicolor*) and Muntjac (*Muntiacus montanus*) for local meat consumption, as well as legal hunting of wild boar by sports clubs such as Perbakin are also contributory factors to wildlife depletion. The severity of this threat on species population viability remains unknown, as does its subsequent impact on tigers and elephants, and requires evaluating through first compiling accurate data on the situation, rather than relying on best guesses.

7. *Invasive alien species (IAS)* pose one of the greatest threats to biodiversity, in particular to aquatic biodiversity. IAS can hasten the extinction of threatened species and reduce the diversity of indigenous and endemic species through predation, competition, parasitism, diseases, hybridization, and species displacement caused by environmental and habitat change. The introduced alien species brought in as ornamental plant, horticulture, pet and other domestic purposes or by coincidence in ship (water ballast) are often becoming invasive and leading to the loss of local species and damage to ecosystem. Particular local species introduced to new natural environment could influence various forms of imbalance to ecological network. For example, the introduction of Tilapia (*Oreochronis mossambicus*) exterminates Duck-Beak fish (*Adrianichthys kruytii*) and endemic fish in Lake Poso. The loss of local plants caused by alien species domination often happens in many parts of Indonesia. *Calopogonium mucunoides* was brought to Indonesia as ground cover plant in rubber, coconut and palm oil plantations. This plant turned to cover the whole land surface and exterminated grass species and plants that previously grew in the area. Invasive alien species of mammal (8 species), flora (342 species), insect (90 species), fish (20 species), arachnida (22 species), bird (76 species), bacteria (76 species), virus (47 species) and fungi (16 species) have been reported in Indonesia.[5] In terrestrial habitats, around Kerinci-Seblat National Park, imperator grass (*Imperator cylindrica*) that changes soil pH and follows encroachment as new land is farmed is becoming a real problem, particularly in biodiversity-rich areas. The uncontrolled spread of IAS is due in part to lack of awareness of IAS and their impacts on the ecosystem to which they are introduced, poor understanding of their ecology and life cycle growth; lack of assessment of the environmental impacts of newly introduced species; and lack of regulation. Contributing to these are the disjointed policies and programs that promote agricultural productivity, that fails to consider the holistic view and recognize the long-term net effects of IAS introduction on farm income, natural resilience of agriculture, and quality and quantity of food production. Introduction of exotic species in critical ecosystems, use of inappropriate species for restoration and heavy reliance on "fast growing", "high yielding" agricultural and terrestrial crops and aquatic species had the unintended effects of invasion of ecosystems, damaged agricultural crops and have a negative impact on native biodiversity through completion, predation and transmission of diseases[6].

8. *Pollution* and habitat destruction from mining (such as gold, copper, nickel and iron ore) pose a threat to biodiversity, ecosystem health and human wellbeing. Incidents of illegal gold mining are reported from many parts of Indonesia. These practices involve the use of highly toxic chemicals, such as mercury, to extract the gold. In turn, this contaminates the water that is used by millions of rural people on a daily basis for cooking, drinking and washing. In addition, smoke from forest and land fire contributes to biodiversity degradation. Water pollution such as acid rain, garbage and wastewater direct disposal to water reservoirs, irrigation canals and sea can instigate mortality to fish and other water living organisms and plankton, algae or other water plants. The biggest pollution is caused by heavy metals that have high significant toxicity to micro-organism especially in high concentrations. Heavy metal pollution is significant environmental stressor to terrestrial microbe's community. Observation to microbe community and activity in Rancaekek paddy-field area polluted by heavy metal waste from textile shows lowers microbe population and activity in areas close to source of pollution compared to distance areas from source of pollution. Observation in Cipanas area on microbes community in soil with intensive agricultural practices (high pesticide and synthetic fertilizer application), semi-organic agriculture (moderate pesticide and synthetic fertilizer application) and organic farming shows the lowest respiration activity linked to abundance of soil microbe and enzymatic activity involved in nutrient cycle found in land with intensive agriculture compare to land

[5] The Fifth National Report of Indonesia to the Convention on Biological Diversity (2014); Ministry of Environment and Forests
[6] National Biodiversity Action Plan (2015-2020)

with organic farming. Additionally, number of soil fungal population in land with intensive agriculture is lower than land with organic farming.

9. *Climate change* may pose a problem through unpredictable weather patterns that increase the likelihood of natural disasters and failed crop cultivation. A recent study indicated that El Niño-Southern Oscillation may strengthen under the future climate change conditions[7] and this would lead to increased droughts, disease outbreaks, wildfires and even social unrest in Asia. Forest degradation and deforestation is the largest contributor of greenhouse gases in Indonesia[8]. Sumatra, drought and the use of fire to clear forest and land for agriculture would be of greatest concern here. On the long-term climate change may alter habitat structure or species resilience, and may possibly require adjustment of protected area boundaries. Climate projections beyond 2020 indicate a rise in temperatures by 0.5^0C relative to year 2000, sea level rise by 0.7-0.8 cm/year and a 5% increase in extreme weather events.[9]

10. **Project conceptual model:** The complex interacting web of factors that threaten globally significant biodiversity in Indonesia is illustrated in a conceptual model in **Figure 1**. This indicates the key areas (indirect and direct factors) and the points where project intervention can contribute towards a reduction in the level of threats, and therefore contribute towards the conservation of biological ecosystems and globally threatened species – and the integrity of the ecosystems they inhabit. The main project intervention strategies are shown as yellow hexagons in Figure 1. The main elements of these strategies are summarized in the Theory of Change diagram in the following section (**Figure 2**).

Root Causes and barriers that need to be addressed

11. The inter-relationships between the different barriers and threats are defined in Figure 1. The four barriers are the following:

Barrier 1: Ineffective policies, regulations and limited multi-stakeholder consultations in spatial land use planning breeds disjointed governance, planning and management within biological landscapes

12. Currently relevant agencies within the Ministry of Environment and Forestry (MoEF) and among agencies involved with PAs and forest management and those that have remit over lands identified as biological landscapes are guided by their respective mandates and deliver on their individual stated outcomes. As a consequence, the interplay of various policies and programs in the same landscape often times result in unintended results due to the absence of a commonly agreed planning and management framework. Policies and programs in the landscape, particularly those that support industrial plantations, production forest and forest concessions, require review to determine their compliance with sustainable forest conservation management principles. Clearing of natural vegetation in the landscapes surrounding protected areas for agricultural purposes, as well as uncontrolled fires, also contribute to greenhouse gas emission and diminish local resilience to the effects of climate change. Given the primary interest and mission of provincial government on progressing with development target which mainly is indicated by regional productivity, the potential impact of regional activities towards biodiversity conservation has been overlooked within the long-term spatial planning framework at the provincial levels. The lack of compliance monitoring and enforcement of plans, policies, strategies, laws and other measures has contributed to the limited capacity to integrate biodiversity considerations in the landscape level planning and management. Provincial governments and their entities have a very crucial role in landscape level actions because of mandates to reflect the above concerns in land use and local investment programs. However current

[7] KM Cobb, N Westphal, HR Sayani, JT Watson, Lorenzo, ED, Cheng H., Edwards, R. L., Charles, CD. (2013). Highly variable El Niño–Southern Oscillation throughout the Holocene. Science 339: 67-70.
[8] National Biodiversity Action Plan (2015-2020)
[9] The Fifth National Report of Indonesia to the Convention on Biological Diversity (2014); Ministry of Environment and Forests

policy/programs guidance for spatial planning in forested landscapes tend to be unclear and fragmented that can act as disincentive for local conservation action.

Barrier 2: Ineffective monitoring, surveillance and enforcement that effectively address threats to biodiversity and natural resources

13. Barrier 2 is the absence of effective and robust system for monitoring, surveillance and enforcement by well-resourced, trained, professional and merit-based state protected area agencies. These authorities legally authorize to manage the wildlife resources but are frequently under-funded and under-capacitated, which means that there is little effective enforcement, and in some cases a *de facto* open access regime in which people can utilize the wildlife resource for subsistence, for criminal poaching purposes, or for elite recreational hunting, frequently on an unsustainable basis. Given the vast extent of PAs, government resources in terms of human resources and budget is generally insufficient to tackle the threat of poaching in many of the hotspots. Deforestation, especially when conducted illegally and in the absence of good forest management practices, is increasingly associated with elephant and other wildlife poaching. Illegal logging of valuable hardwoods and unsustainable firewood collection for domestic use and the charcoal industry are contributing to widespread deforestation, land degradation, and loss of biodiversity. Gaps in knowledge on wildlife crime and illegal trade coupled with limited skills in basic forensics constraints the ability of protected area and conservation staff to prosecute and enforce illegal wildlife crime efficiently. This is further compounded by the fact that protected area staff do not have the mandate to prosecute law-breakers and have to depend on law enforcement authorities to prosecute. Funding to law enforcement entities is limited and coordination among these agencies is weak, thus hindering effective enforcement and prosecutions. Effective law enforcement is essential to curb illegal wildlife crime and hence protecting the habitat needed for wildlife conservation..

Barrier 3: Weak ownership and support of local communities and private industry for conservation of biodiversity and sustainable natural resources utilization

14. The biodiversity landscapes consist of areas that are managed under various tenure regimes including communally and privately-owned or leased lands. A system of incentives is essential to encourage private sector and land tenure holders in critical spaces within the biological landscapes to contribute to providing stepping stones, or expand the pathways of target or threatened species while ensuring improvement in ecosystem services and resilience. Within private or leased out lands and other tenured areas, transforming land management practices through such mechanisms as conservation agreements need to be tested while certification systems can promote improved practices for incorporating biodiversity considerations for reducing forest degradation or improving conservation outcomes on these lands. In areas managed for agriculture, the promotion of agro-forestry scheme and agro-ecosystem technologies are important. While a number of these mechanisms exist, they have not been applied at the biological landscape level in a way that will result in change. In addition, support for improving management plans of private plantations and forest concessions to recognize the importance of habitat connectivity, as stepping-stones and/or in linking the network of protected areas and forests areas within the biological landscapes is lacking.

Barrier 4: Limited awareness among the sector agencies, public and key industrial sectors on how to integrate landscape planning and lack of awareness amongst communities, private sector and public about risks posed by biodiversity and ecosystem losses.

15. Despite widespread awareness among sectors of the need for integrated spatial planning, there is need for further attention to cross-sector integrated planning. This is further compounded by limited awareness and capacity among the key sector and private institutions on how to integrate planning and management of land and coastal, seascape and marine areas, so as to take into active consideration the biodiversity, natural resources and environmental factors that underpin sustainable management. Major sector agencies including forestry, agriculture, extractive industries and tourism - plan and manage the use of resources within their

individual sectoral interests and operations, but with little cross-sector integration. While, there are efforts to improve integration, particularly at the provincial and national levels, this is constrained by limited baseline data on the extent, location, condition and threats for many important ecosystems and species. There is thus a need for acquiring and distributing data, and building the institutional, technical, human, and infrastructural capacity to support on-going biodiversity assessment, monitoring and informed decision-making. Consequently, the country's limited knowledge base on biodiversity and natural resources, and capacity for stewardship needs to be strengthened, particularly at provincial and local level where the biodiversity importance areas are located. Assessments are also needed to better understand the drivers of, and vulnerabilities to, climate change. Local communities also need to get a better understanding of the importance of biodiversity and natural systems in providing critical ecosystem services so that they can make informed decisions on land use and livelihood options. Extractive industry, tourism and other sectors lack adequate information and assessments on how sound environmental management practices can enhance and sustain their activities, while conserving biodiversity and ecological services. Local communities require sufficient incentives and encouragement for environmental stewardship and improved sex-disaggregated data and appreciation for gender issues that would make it easier to plan and evaluate for gender-based improvements.

16. The direct threats affecting the project target (Indonesia's biodiversity and threatened species) and their relationships with a range of indirect factors (root causes) are illustrated in **Figure 1**, with entry points for project intervention strategies indicated. The relationship between the barriers and the project intervention logic is further illustrated in the theory of change diagram **in Figure 2**.

Baseline scenario or any associated baseline projects.

17. Indonesia has a strong policy framework for managing, conserving and protecting its biodiversity and forest resources. The government is a signatory to the Convention on Biological Diversity (CBD), Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), the Convention Concerning the Protection of World Cultural and National Heritage and the Ramsar Convention. International commitment has been made for elephant, through "Monitoring the Illegal Killing of Elephants (MIKE) in which Indonesia is one of thirteen Asian Elephant range states. There have been numerous conservation and community development initiatives in the target landscapes and range of successful site-specific strategies (e.g. Human-Wildlife Conflict or HWC, Spatial Monitoring and Reporting Tool or SMART-RBM based patrol, wildlife population monitoring) have been developed and enhanced by the MOEF and its Non-Governmental Organization (NGO) partners. Specifically, monitoring, data collection and reporting of MIKE activities are conducted in two sites, namely: in Way Kambas National Park (WKNP) and Bukit Barisan National Park (BBSNP) in Southern part of Sumatra (Lampung province).

18. Some of the baseline projects that are relevant to the proposed project include:

19. The Kerinci Seblat-Integrated Conservation and Development Project (ICDP) exemplifies the problems associated with project implementation for a large-sized donor-funded project, if poor inter-agency coordination exists. It also exemplifies how rural development activities that are designed to provide indirect payment schemes with tenuous links to biodiversity conservation will fail to achieve the intended conservation-development outcomes. A decade after that, Village and Customary Forests are now a proven model for community forest tenure in Indonesia. They continue to offer a unique opportunity for individual villages to secure legal rights to their forests, often preventing allocation of the same forest area for conversion to a third-party extractive concession license. These models precipitate much-needed village-level mapping and land-use planning that will support more efficient use of land beyond their Village and Customary Forests itself. Well-managed Village and Customary Forests will have a key role in the protection of biodiversity and forests throughout Indonesia and bring benefits to the communities involved, in terms of

sustainable use of forest resources, protected ecosystem services and access to performance-based rewards for avoided deforestation and degradation[10].

20. The Community Ranger Project in Ulu Masen demonstrated that while some rangers earned less than they did previously through illegal activities, they wished to remain as community rangers because: i) previously they had no choice but to be engaged in illegal activities due to a lack of alternative income opportunities; ii) their income is now stable; and, iii) they are proud to be community rangers. So, the community ranger project design may mean a lower income over the short term, but it will increase their livelihood security in the future and is, therefore, expected to greatly reduce the likelihood that the rangers would revert to destructive livelihoods after the program ends.

21. Bukit Barisan Selatan Coffee Production Initiative: The project focused on smallholder farmer intensification for improved coffee production in two areas surrounding the national park and engagement with only one coffee company proved insufficient to effectively address the wider supply chain problem that coffee from inside was being sourced by national and international companies. Thus, a supply chain wide focus (across all or the majority of companies engaged in the area) is needed to improve transparency of supply, coupled with better monitoring, to ensure that sourced raw product is not grown in illegal areas.

Current projects in the project landscapes include:

22. GEF-5 Tiger/UNDP (Ministry of Environment and Forestry): Transforming Effectiveness of Biodiversity Conservation Landscape is a five years project (2016-2021), funded by GEF to support the Government of Indonesia in conserving biodiversity in Sumatra. The project's goal is to contribute to conservation and sustainable use of globally significant biodiversity in Indonesia. Whereas the objective of project is to enhance biodiversity conservation in priority landscapes in Sumatra through adoption of best management practices in protected areas and adjacent production landscapes. Tiger recovery is used as key indicator of success of the project. The target landscapes are Gunung Leuser National Park, Berbak-Sembilang National Park, Kerinci Seblat National Park and Bukit Barisan Selatan National Park.

23. Tropical Forest Conservation Act (TFCA) Sumatra Program, 2015-2023 (The Nature Conservancy and WWF, Indonesia), 13 landscape priorities including Ulu Masen landscape in Sumatra. Program objectives are: (i) Strengthened institution and policy at all level, (ii) Strengthened intervention on forest ecology at landscape level, (iii) Ensure sustainability of key species, and (iv) Strengthened the local communities, welfare and income.

24. Forest Program 2, Development of Integrated Biodiversity Conservation and Watershed Management (2019-2020) involving MoEF and FFI. The project objectives are; (i) Reducing threat of natural resources in Kerinci Seblat National Park and its vicinity and increasing capacity development (Kerinci District), and (ii) Developing the effectivity of NP monitoring through the ranger and the community patrol inside the park.

25. Emergency Action Plan for Elephant Conservation – (TFCA 2021-2023). The objectives of the MoEF projects are; (i) Reducing threats of elephant through actively monitoring or patrolling by the ranger or the community patrol, (ii) Developing early warning system and human elephant conflict mitigation including improving its habitat (habitat restoration), and (iii) Involving the private sectors and the communities to develop active management inside the elephant range area.

26. Conservation of Yellow crested Cockatoo, Moyo Island by World Parrot Trust (2018-2019). The objectives of the project are; (i) Survey of the cockatoo population and distribution and (ii) Awareness campaign to

[10] Community Forest Ecosystem Services, Indonesia Plan Vivo Project Idea Note (PIN). https://www.planvivo.org/docs/CFES-Indonesia_PIN_published.pdf

conserve the Yellow-crested Cockatoo. However, the project didn't have an official cooperation with MoEF and BKSDA NTB.

27. Amanwana-Moyo Conservation Fund (2008-2023). The project objectives are; (i) Rehabilitating and releasing the baby turtles, (ii) Protecting and restoring the coral reef inside the Moyo Island area, and (iii) Awareness campaign to conserve the sea turtle.

28. Results achieved under these projects include:
    - Strengthened partnership amongst multiple partners - Ministry of Environment and Forestry, local government in the target sites, and NGO partners - Wildlife Conservation Society, Fauna Flora International, Zoological Society of London, and Sumatran Tiger Conservation Forum.

    - Estimated tiger density in the core areas through camera trap survey in the four landscapes (Leuser, Kerinci Seblat, and Bukit Barisan Selatan Ecosystem) in 2017 and, the average tiger density recorded for the 4 target landscapes was 1.46 tiger/100km^2 indicating increased in tiger density from the baseline data of 1.06 tiger/100 km^2

    - Project facilitated institutional strengthening by collaborating with the Center of Education and Training of Ministry of Environment and Forestry (MoEF). This resulted in the development of curriculum on - Management of Human and Tiger Conflict; and Monitoring Sumatran Tiger Population.

    - Facilitated coordination among law enforcement agencies and in particular, established partnerships between national park agencies and Provincial Police Authority (POLDA). Number of joint initiatives have been undertaken namely - exchange of information, capacity building, joint patrolling, out-reach and awareness activities, etc. The joint effort has resulted in increased number of wildlife crime cases submitted for prosecution.

    - Responded to Human-tiger conflict (HTC), by facilitating establishment of human-tiger mitigation teams in the 5 NPs and, other mitigation measures included: (1) conflict monitoring at high-risk villages; (2) developed syllabus on HTC mitigation; (3) provided trainings to national park/local government staff, veterinarian, and local community to respond and manage the conflict effectively; (4) constructed tiger proof enclosures (TPE).

    - ITHCP (Integrated Tiger Habitat Conservation Program)-International Union for the Conservation of Nature (IUCN) implements in Ulu-Masen Protected forest, Gunung Leuser National Park, Rimbang Baling in Riao province, Kerinci-Seblat National Park, Bukit Barisan Selatan National Park, Berbak-Sembilang National Park (2017-2018, but currently running under the no-cost extension until 2019 due to delay in starting the project). The objective is to stabilize the population of Sumatran tiger by the end of project, through implementation of the National Tiger Recovery Program (NTRP) in the tiger core areas in four priority Tiger Conservation Landscapes (TCLs) accounting for >70% of the remaining population. This will be achieved through supporting: (1) Intensive protection of the core PAs holding the main tiger source populations; (2) Sustainable landscape management across >69,000 km^2 of prime tiger habitat; and (3) Community livelihood buffer zone initiatives at PA borders.

    - GEF-6 Global Wildlife Program (GWP) Phase I/Combatting illegal and unsustainable trade in endangered species in Indonesia (MoEF): this project is part of the GEF Program on Global Partnership on Wildlife Conservation and Crime Prevention for sustainable development (GWP phase I) is a six-year project which started implementation in 2018. The project's objective is to reduce the volume of unsustainable wildlife trade and the rate of loss of globally significant biodiversity in Indonesia and East and South-East Asia. The project focuses on: (i) strengthening national policy, legal and institutional framework for regulating legal commercial wildlife trade and combating illegal wildlife trade; (ii) institutional capacity

for regulatory coordination, implementation and enforcement at the national and international levels; (iii) improve enforcement strategy demonstrated and scaled up at key trade ports and connected subnational regions with key ecosystems - northern Sumatra centered on the Leuser ecosystem and northern Sulawesi centered on the Bogani Nani Wartabone ecosystem and their respective seaport and airport.

- Managing elephants in Aceh, Indonesia (United States Fish and Wildlife Service): Developing capacity to estimate elephant abundance and mitigating human-elephant conflict. In partnership with Fauna and Flora International. The purpose of this project is to ensure the survival and increase the population of the Critically Endangered Sumatran elephant through a comprehensive elephant management strategy that protects the integrity of habitat and benefits rural communities of Ulu Masen, Sumatra, Indonesia.

- Suar Galang Keadilan Consortium. Strengthening the Capacity of Law Enforcers in Handling Crimes Against Protected Wildlife in Aceh.

Alignment with national and global priorities

Indonesia Biodiversity Strategy and Action Plan (IBSAP 2015-2020):

29 The primary vision of IBSAP 2015-2020 for Indonesian biodiversity management is "Indonesian biodiversity preservation and development that contributes to national competitiveness and a fair and sustainable use of resources to improve the welfare of current and future generations (BAPPENAS, 2016)." To achieve this vision, through policies and strategies, three missions were formulated for biodiversity management for the 2015-2020 period. These include the following three missions (BAPPENAS, 2016):

- To improve Indonesia's biodiversity ownership
- To treat biodiversity as source of sustainable welfare and livelihood for Indonesians
- Fully responsible biodiversity management for the sustainability of all creatures in the world

30 To support the implementation of missions and policies and to achieve the intended future conditions, the appropriate organizations and mobilization of resources is required. For the 2015 to 2020 period, three missions were developed to achieve the biodiversity management goals. These include the following:

- improve biodiversity management and ownership, policies are required to implemented. These include the following:
- conduct research on biodiversity, data management and documentation of biodiversity as well as management of its ownership, such as patent and intellectual property rights, in support of Indonesia's needs.
- secure biodiversity and its existence, through management, for Indonesia and to support the development of optimal benefits from it for the country.
- develop sustainable utilization of biodiversity.
- improve the economic value of biodiversity as a way to support economic growth, national competitiveness and the welfare of people.
- increase the utilization of biodiversity in everyday life and activities of communities.
- protect biodiversity resources and their associated ecosystems from any disturbances, which may put Indonesian biodiversity and ecosystems at risk or in danger.

The National Targets for Biodiversity Management

31 In order to ensure that various policy objectives for IBSAP 2015-2020 are achieved national target of biodiversity management for the period of 2015-2020 is prepared. The national targets follow the Aichi Targets framework, but they are adjusted to the national conditions and requirements (Ministry of National Development Planning or

BAPPENAS, 2016). The national targets of biodiversity management for 2015-2020 are introduced in Table 3, where the national target is introduced, its associated Aichi Target, activities implemented to reach the national target and the achievements from the activity. The table focuses solely on terrestrial related activities, which are relevant to the proposed project.

Biodiversity Management Action Plan

32 The biodiversity management action plan aims to achieve the vision, mission and target of biodiversity management as mentioned earlier. For the 2015- 2020 period, the action plan consists of four groups, used to support the mission and policies of biodiversity management, with respect to research, conservation, utilization, and capacity building. The biodiversity management action plans are as followed:

- Action plan for research, data management and documentation of biodiversity and management of ownership.
- Action plan for developing biodiversity to support economic growth, national competitiveness and community welfare.
- Action plan for maintaining and preserving biodiversity for Indonesian people and for supporting the realization of optimal benefits for Indonesia.
- Action plan for improving the capacity to manage biodiversity using a participatory and integrated approach.

Sumatran Elephant and Sumatran Tiger Strategic Action Plans

33 Ministry of Environment and Forestry (MoEF) previously had released these action plan in the last ten year period (2007 to 2017) for the first 4 endangered and protected species for Rhinos, Elephant, Tiger and Orangutan. These action plans are mandated as the detail guidance on how the government aims, directs and pursues its conservation targets. Indonesia Elephant Conservation Strategic Action Plan Document (2019 -2029) contains strategies for protecting and restoring populations and habitats, including funding mechanisms that hopefully will receive serious attention and support from key stakeholder in the landscape sites. It should also be a key instrument that would guide planning of various sectors and spatial planning and cross-sector development planning at various levels, both the Medium-Term Development Plan (RPJM) and the Government of Indonesia's Long Term Development Plan (RPJP). The document also includes a series of conservation strategies for ex-situ elephant populations spread across various conservation institutions such as Pusat Konservasi Gajah and other conservation institutions to play a more strategic function.

Sustainable Development Goals and Aichi Targets

34 The proposed project will support the achievement of the Sustainable Development Goals (SDGs) in Indonesia, most notably SDG15 to *Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss, in particular Target 15.2:* By 2020, promote the implementation of sustainable management of all types of forests, halt deforestation, restore degraded forests and substantially increase afforestation and reforestation globally; *Target 15.5:* Take urgent and significant action to reduce the degradation of natural habitats, halt the loss of biodiversity and, by 2020, protect and prevent the extinction of threatened species; and *Target 15.9*: integrate ecosystem and biodiversity values into national and local planning, development processes, poverty reduction strategies and accounts. The proposed project will contribute to the following Aichi Targets: *Target 11:* By 2020, at least 17 per cent of terrestrial and inland water, and 10 per cent of coastal and marine areas, especially areas of particular importance for biodiversity and ecosystem services, are conserved through effectively and equitably managed, ecologically representative and well connected systems of protected areas and other effective area-based conservation measures, and integrated into the wider landscapes and seascapes; and *Target 14:* By 2020, ecosystems that provide essential services, including services related to water, and contribute to health, livelihoods and well-being, are restored and safeguarded, taking into account the needs of women, indigenous

and local communities, and the poor and vulnerable. The proposed project is aligned to GEF-7 Biodiversity focal area: (i) objective 1 and program 2a (BD-1-2a): Mainstream biodiversity across sectors as well as landscapes and seascapes through global wildlife program to prevent extinction of known threatened species; and (ii) Objective 2, Program 7 (BD-2-7) - Address direct drivers to protect habitats and species by Improving financial sustainability, effective management, and ecosystem coverage of the global protected area estate. The project is proposed as a child project under the Global Wildlife Program (GWP).

Sixth National Report to CBD

35 The project is consistent with the national targets as reflected in Indonesia's sixth national report to the CBD. In particular, this relates to the following:

- National Target 2: Implementation of sustainable management of biodiversity resources in the planning and implementation of national and regional development to improve community economies
- National Target 3: Realization of incentives and disincentives system in business and the sustainable management of biological resources
- National Target 4 Establishment of increased availability and implementation of policies supporting sustainable consumption and production in the utilization of biodiversity resources
- National Target 6: Implementation of policies for sustainable management and harvesting
- National Target 7 Improved sustainably managed land for agricultural, plantation and animal husbandry
- National Target 11 Realization of sustainable maintenance and improvement of conservation areas
- National Target 12: Realization of efforts to maintain the populations of endangered species as a national conservation priority
- National Target 14: Improved functionality of integrated ecosystems to ensure the improvement of essential services
- National Target 15: Realization of conservation and restoration of degraded ecosystems
- National Target 19: Implementation of science and technology capacity building for sustainable management of biodiversity
- National Target 21: Implementation of comprehensive and integrated data gathering and information mapping on biodiversity

Land Degradation Neutrality National Report (2015)

36 The national target for LDN is projected at reduction of degraded land by 27.5 million hectares in 2040, with the assumption that there are no additional degraded lands during the period 2015 to 2040. The strategies proposed includes the following:

- Strategy 1: Promotion on site forest management through forest management unit, divided into 3 categories namely conservation, production, and protection forest management unit.
- Strategy 2: Public support and participation is critical for applying and implementing methods of prevention and rehabilitation control.
- Strategy 3: Developing a partnership with local institutions and community and non-government organizations for an effective implementation of land degradation control.
- Strategy 4: Co-ordination with implementation of Convention to Combat Desertification (CCD) for synergic and effectiveness of the needed supports and resources.
- Strategy 5: Strengthen co-operation with related regional institutions, regional CCD thematic program networks and international organizations.

- Strategy 6: Developing the capacity to be better consolidated, manage and deploy existing financial resources (APBN, APBD) and strengthen the capacity to negotiate with international and national agencies for increased financial support.
- Strategy 7: Establishing priorities and development of action plans through active involvement in the decision-making by local communities in the implementation, monitoring and evaluation.
- Strategy 8: Full participation of representative community should be engaged in all level activities (planning, implementation, monitoring, and evaluation).
- Strategy 9: Use best practice knowledge and robust technologies including traditional knowledge and wisdom.
- Strategy 10: Rising awareness about good quality environment and sustainable agriculture development.
- Strategy 11: Project should be holistically concern about the unique characteristic of the community in the respective degraded land (integrated and sites special project).
- Strategy 12: Project should concern on long-term security investment through a good and attractive land tenure system.

37 The project will also support Indonesia to comply with its CITES requirement. The project will focus on three species listed in CITES Appendix 1 (Sumatran tiger, elephant, yellow-crested cockatoo), the most endangered among CITES-listed animals and plants, which are threatened with extinction. CITES prohibits international trade in specimens of these species except for the purpose of non-commercial export for scientific research. This means that Indonesia will comply with the following CITES requirements: (i) must not allow trade in specimens of these species except in accordance with the provisions of the present Convention; and (ii) shall take appropriate measures to enforce the provisions of the Convention. This entails provision of a regulatory framework for CITES implementation, through national policy and regulation to protect these critically endangered species. This project will support the establishment and/or enforcement of the National Strategy and Action Plan for these targeted species. For the elephant, this is particularly relevant to Res Conf. 10.10 (Rev. CoP 18) on Trade in elephant specimens and Decisions: 18.226 of the CITES.

38 This project will make the following contributions to the GEF-7 GWP framework See Table 1):

Table 1: Contributions to Global Wildlife Program

GWP components	GWP program outcomes	Key project contributions to GWP outcomes	Key project targets
Component 1 Conserve wildlife and enhance habitat resilience	-Stabilization or increase in populations of, and area occupied by, wildlife at program sites -Areas of landscapes and terrestrial/marine protected areas under improved practices and management effectiveness (METT for PAs) -Formal agreements signed to increase connectivity of landscapes and establish transnational conservation areas -Strengthened long-term partnerships, governance, and finance frameworks for PAs	-Enhanced management of the target landscapes including PAs and the surrounding forest under different management options through OECMs (Output 1.3) -Strengthened policy, procedures, institutions and partnerships for managing protection of habitats at landscape level within and outside of PAs (Output 1.2) -Sensitization of local, provincial and national government to support mainstreaming of key threatened species conservation and build political will for more attention on managing and connecting significant key threatened species habitats (Outputs 1.1, 1.3 and 2.3) - Capacity-building of state, district and community-level	-At least **740,000 hectares** (excluding protected areas covered under Indicator 3 and Private Plantations covered under Indicator 12) of biological landscapes under improved management through improved management of Other Effective Area-based Conservation Measures (OECMs) such as KEE mechanism. -Average 15% increase in METT scores Protected Areas created or under improved management and sustainable use -At least 3 key action plans for each threatened species for

GWP components	GWP program outcomes	Key project contributions to GWP outcomes	Key project targets
		institutions to support conservation of key threatened species and their habitats (Output 1.1) -New private sector sustainable financing solutions to support community stewardship of key threatened species habitats (Outputs 3.1 and 3.4)	tiger, elephant and yellow crested Cockatoo implemented within project sites -At least five instruments (update/creation of relevant policies for improved management of OECMs; establishment of OECM Forums; OECM management body in place, establishment of budgetary norms/procedures for financing OECM actions, FMU guidelines, Village Fund use procedures, etc.) for improving biodiversity outcomes within the biological landscapes developed and adopted - Key species population densities stable or increasing from baseline values for: 1. Sumatran tiger 2. Sumatran elephant *3.* Yellow-crested cockatoo
<u>Component 2</u> Promote wildlife-based and resilient economies	-Increased access to finance for enterprises that support wildlife-based economy (WBE) -Strengthened capacity of stakeholders to develop WBE and sustainable use activities -Increased participation of communities in conservation compatible rural enterprises and WBE jobs -Additional livelihood activities established -Increased Human-Wildlife Conflict (HWC) strategies and site interventions deployed	- Innovative solutions for preventing and managing HWC deployed at identified hotspots within project landscapes, and increased adoption of land use and habitat management techniques to minimize potential for conflicts (Output 1.4)	-At least 50% decrease in human-wildlife conflict reported and reduction of agricultural crops and cattle loss reported due to HWC -At least 6 additional forest concessionary business plans effectively implemented for conservation outcomes with 50 % increase in funding -At least 15% average increase in income for 75% of participating households based on action plans for improved business models agreed and under implementation initiated
<u>Component 3</u> Combat wildlife trafficking	-Improved access to and use of actionable information, data, and intelligence through secure sharing mechanisms -Improved enforcement, judicial, and prosecutorial institutional capacity to combat wildlife crime (site-based law enforcement). -Increased use of financial investigations and specialized techniques applied to other serious crime	- Anti-poaching patrolling utilizing improved SMART-RBM patrol system (Output 2.1) - Innovative solutions by engaging local community to minimize poaching, retaliatory killing and illegal trade in key threatened species (Output 2.2)	-Increased frequency of SMART AND Community patrols/year -At least 60% of the DNA-based investigations originating from the three provinces is undertaken by the new capacitated local laboratories -80% average decrease in illegal activities detected from baseline

GWP components	GWP program outcomes	Key project contributions to GWP outcomes	Key project targets
	-Decreased number of target species poached (i.e. use of SMART tools)		
Component 4 Reduce demand	-Improved awareness of wildlife crime through campaigns and advocacy -Increased number of tools used to advocate against consumption of illicit wildlife products and promote ethical behavior	- Communication strategy and outreach (Output 4.1)	-At least twenty good practice in conservation and sustainable resource management codified and disseminated nationally and adapted -At least 60% (of which at least 40% women) of sampled community members, government and sector agency staff, private sector and other stakeholders aware of potential conservation threats and adverse impacts of unplanned developments and behavior change for biodiversity outcomes
Component 5 Coordinate and enhance learning	-Strengthened Public-private partnerships for promoting wildlife-based economies -Improved coordination among countries, donors, and other key stakeholders engaged in the implementation of the GWP -Increased global policy dialogue and engagement on IWT and wildlife for sustainable development -Enhanced GWP management and monitoring platform	- Facilitate coordination and cooperation among key stakeholders including regional level coordination targeting specific species (Outputs 1.1 and 1.3) - Knowledge management to identify, document and share project best practices and lessons learned between project landscapes, and across the Global Wildlife Program (Output 4.3)	-Average increase of institutional capacity as measured by 10 points in UNDP Capacity Development Scorecard from baseline values for the three OECMs -At least 60% (of which at least 40% women) of sampled community members, government and sector agency staff, private sector and other stakeholders aware of potential conservation threats and adverse impacts of unplanned developments and behavior change for biodiversity outcomes

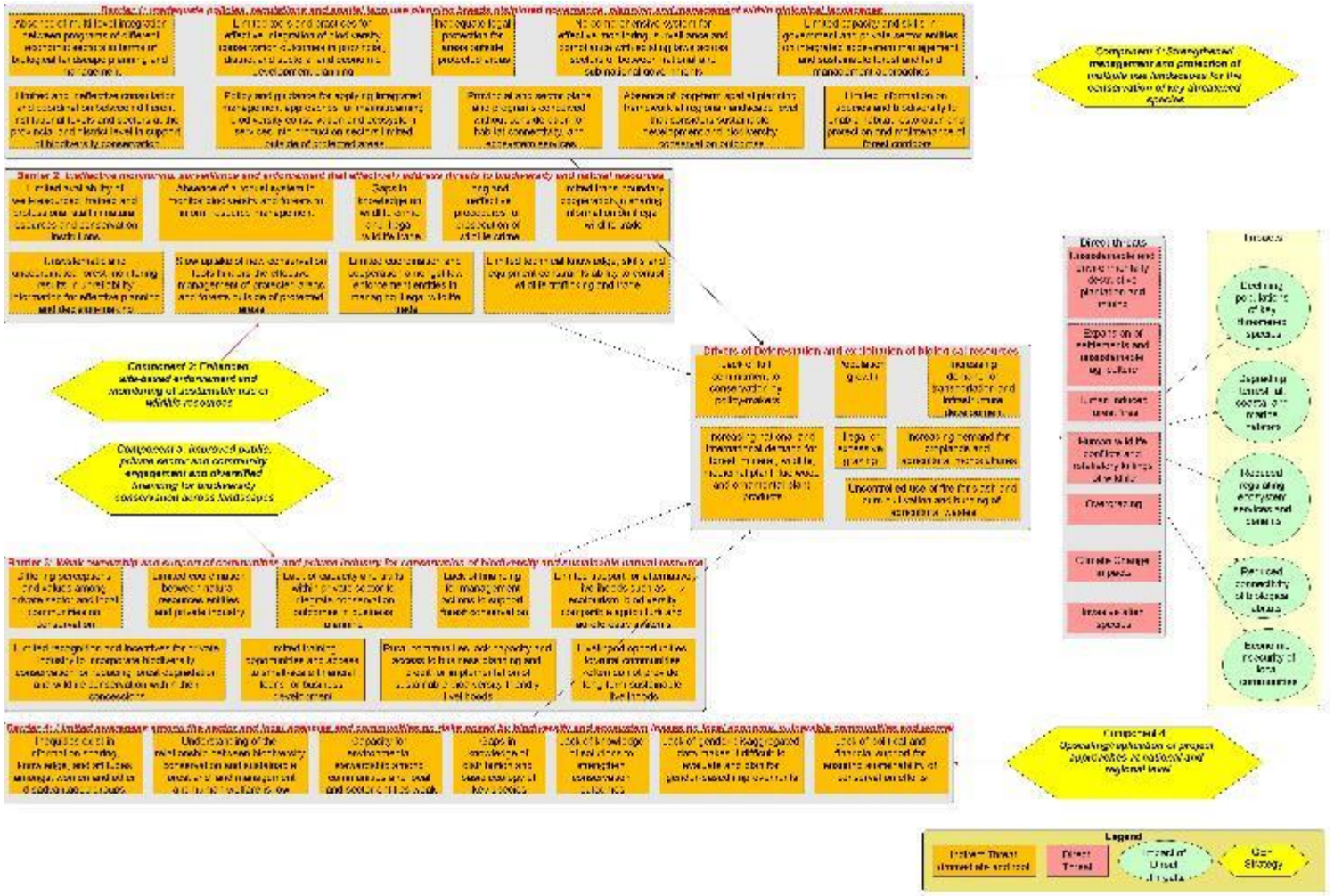


Figure 1: Threats, root causes and barriers to the long-term solution and GEF strategies to address them (*p.20*)

III. STRATEGY

39 The project's objective is to ***Strengthen management of multiple use landscapes to enhance biodiversity conservation, generate sustainable land-use and livelihood practices and address illegal wildlife trade***[11]**.** The intent is to operationalize integrated management of protection and productive landscapes to generate multiple benefits including effective conservation of globally threatened species and high conservation forests, reduce deforestation and degradation, improve sustainability of large-scale commercial plantations, and forest concessions, conserve and enhance ecosystem services and improve local livelihoods. The project recognizes that these productive landscapes, which are important for conservation of species and ecosystems, underpin the lives and livelihoods of local communities and that implementation of such an integrated strategy is an integral part of achieving a balanced approach to development and community and private resource use that conserves biodiversity. To achieve this objective, the GEF alternative aims to (i) take into account the interconnectivity of various ecosystems in the productive landscapes and their impacts on biodiversity, ecological processes and functions of sector development and local community activities; (ii) ensure that relevant agencies and actors, including the private sector have adequate capacities to promote integrated approaches and tackle the threat to biodiversity and effective natural resources management; and (iii) advocate science based approaches and use of traditional and good practice knowledge systems to restore degraded areas while promoting sustainable forestry, agricultural and livelihood practices, and reduced poaching and illegal trade in wildlife products. The project will be implemented over a 6-year period based on the following principles:

- Promoting a holistic, multi-sectoral and integrated biodiversity management approach to resource governance to support the conservation of key threatened species such as the Sumatran elephant, Sumatran tiger and the Yellow crested cockatoo within large biological landscape as compared to the existing planning framework that tends to compartmentalize planning and undervalue biodiversity building on current OECMs or Essential Ecosystem Area procedures as a means of management of large biological landscapes;
- Supporting and implementing a participatory planning and implementation approach that focuses on national, provincial and district governments, private sector and community priorities and decisions that integrate conservation of habitat of threatened species, sustainable resource use, climate risk management and livelihood outcomes;
- Strengthening the role of communities, local community institutions, community-based organizations, private sector entities and non-governmental organizations and increasing their potential for becoming agents of change in promoting sustainable natural resource management, climate risk management and biodiversity conservation for conservation of threatened species;
- Ensuring free prior and informed consent (FPIC) as the basis for negotiating investments for local communities, including specialized groups, and ensuring that any displacement of incomes or access to resources are adequately compensated through alternative livelihood improvement plans;
- Enhancing capacities of communities, lease landowners and private sector for implementing effective biodiversity-friendly plantation, concessions, agriculture, forestry, tourism and income generation and livelihood activities that is linked to the conservation of key threatened species;
- Strengthening the implementation and enforcement of relevant CITES provisions and well as national regulations relating to Animal and Animal Product Import and Export Provisions (2013) and Conservation of Living Resources and their Ecosystems (1990) to ensure that any trade is legal, sustainable and traceable, and that measures are implemented to address illegal trade
- Strengthening the capacity of local communities and customary communities for dealing with the implications of COVID-19 and climate risk management by targeted interventions to the most vulnerable

[11] The project landscapes include the following: Ulu Masen in Aceh, Sumatra; Seblat in Bengkulu, Sumatra and Moyo in West Nusa Tenggara are considered as productive landscapes with extensive areas of conservation forests, protection forests, industrial plantations, concession forests, agriculture and tree crops, agro-forestry, slash and burn agriculture, NTFP collection, etc., with various development sectors (agriculture, environment, forestry, water resources, tourism, etc.) and provincial and district governments operating within the landscape.

groups and enhancing their reliance to manage such risks;

- Ensuring that in its development and implementation, gender is mainstreamed so that the project contributes to equality and equity, through the creation of equitable opportunities and benefits for both women and men;
- Developing, promoting and ensuring an adaptive management approach for the proposed project landscape[12] that progressively identifies threats to key threatened species and habitats and its associated challenges, including those related to ecological, demographical, climatic, market, technological and economic factors and develops and implements iterative strategies to address them, through monitoring key environmental indicators and assessing the effectiveness of conservation measures and proposing new approaches as necessary; and
- Being selective in terms of identification of locations and nature of interventions to serve as demonstration models in the biological landscapes of key threatened species and in addressing the nature of challenges that operate therein taking into considerations the existing institutional capacity and resource constraints.

40 In order to ensure a clear, practical and cohesive implementation strategy, the proposed project will introduce a structured planning and integrated framework for managing the habitats of key threatened species within biological landscapes in Indonesia. This framework will engender a two-pronged, mutually enforcing approach of (i) strengthening management structures for conservation of key threatened species and biodiversity in a large biological landscape through the improved management of areas outside protected areas through a landscape approach called the Essential Ecosystem Areas (KEE[13]) process introduced by the Ministry of Environment and Forestry as a means for management of large biological landscape that is recognized within the framework of Other Ecosystem Conservation Measures (OECMs)[14] defined by CBD Decision of 2018, and (ii) demonstrating sustainable economic and livelihood initiatives for tackling the reduction of pressures and threats to key threatened species habitats, improving forest connectivity to promote species movements, while strengthening direct and indirect economic benefits to local communities and production landscapes. Refer Annex 8 Applicable policies for Essential Ecosystem Areas and principles that could be applied to OECMs. Through this approach, on-the-ground initiatives in these habitats will both be guided by, and provide feedback loops into, enabling policy, legal, institutional and regulatory initiatives at the national level, while linking conservation-oriented actions for protection of threatened species with socio-economic, sectoral and livelihood-focused actions at the landscape level. To date, the KEE application process has been challenged due to lack of incentives to support sub-national governments to allocate areas within the production zone for conservation of key species habitats. Incentives could include an increase of balancing funds from the center government, for example by enhancing special purpose funds (DAK, an earmarked transfer scheme to specific provinces or districts for certain sectoral programs), to support KEE management from the line ministries. As KEE's are usually located within village administrative boundaries, KEE management will thus be influenced by the quality of governance at the village level. KEE stakeholders can assist villages to improve their governance of threatened species habitats, natural resources and mitigate threats (encroachment, fires, peat land degradation, etc.), for example by strengthening village-level governance institutions and negotiation skills, and by raising awareness on the importance of the KEE as natural infrastructure to maintain the sustainability of village economic development. The KEE is managed by a multi-stakeholder platform that is assigned by a Governor or District Head and is intended to ensure multi-stakeholder approach to management of the KEE and benefit sharing, detailing the structure, responsibilities and duties of each party within the KEE. Typically, the forum would include the local village heads, traditional leaders, private landholders (including Palm Oil Companies, Forest Concessionaries and others, as relevant), NGOs and CSOs, Provincial Forest Department and district government (including the Provincial Agriculture, Forestry, Fisheries, Animal Husbandry, Tourism and others are relevant).

[13] No. 5/1990 on Conservation of Natural Resources, Biodiversity and Ecosystems (Law No. 5/1990), and draft Ministerial regulation on Guidelines on Protection of Essential Ecosystem Areas. MOEF applies OECM to KEEs, with KEEs being defined as important ecosystem value areas outside PAs that ecologically supports survival through biodiversity conservation efforts for community welfare and quality of life.
[14] Refer CBD Decision of November 2018. https://portals.iucn.org/library/node/48773

41 In the two Sumatran sites (Ulu Masen and Seblat), while some initial actions have been taken to promote the OECM approach in particular the existence of a KEE Management Forum in Seblat and issuance of a Decree for establishment of a KEE for Aceh Province (including Ulu Masen) and initiation of a feasibility study on KEE options for the province, these actions are very rudimentary. The proposed site in Seblat is narrowly focused on an elephant corridor between oil palm plantations and does not cover a significant part of the elephant habitat that is critical for the survival of the species. There is also limited involvement of key stakeholders and a lack of a comprehensive approach to endangered wildlife species management in these two sites. The project intends to correct some of the weaknesses in implementation of OECM as follows: (i) ensure that the designation process of KEE for conservation of key threatened species habitats be initiated by local champions (local government, private sector, village, local community and local CSOs) through comprehensive stakeholder mapping, followed by intensive engagement to gain full commitment from all; (ii) thorough enhanced and transparent stakeholder consultation and engagement create awareness and a positive attitude towards collaborative conservation actions; (iii) ensure that the provincial government not only identify potential OECM areas, but should also assess best management practices that effectively combine production and conservation objectives, and thereafter seek collaboration with village governments and local land managers (owners), actively promote stakeholders' engagement, establish a multi-stakeholder platform, provide technical assistance, and monitor implementation; (iv) engage CSOs to facilitate stakeholder engagement, identify common interest among partners, strengthen village-level natural resource governance, and stimulate collaborative management among existing land managers (owners) to optimize development and conservation objectives; (v) ensure that the KEE management forum is represented by the key stakeholders (including private companies) within the threatened species landscape and are solely responsible for collective decision-making for the planning and management of the KEE, as stipulated in the KEE guidelines (refer Annexes 8 and 9); (vi) ensure that Forest Management Units (KPH) within the demarcated KEE that have capacity on forest management at site level be part of the multi-stakeholder platform and provided a mandate to cover the entire KEE; (vii) work with national government to develop incentives to companies who maintain and enhance conservation functions in production zones; and (viii) develop a process to nationally recognize well-managed KEE's and become part of Indonesian commitments related to the Aichi targets and the Paris Agreement to combat climate change.

42 In order to ensure that investment activities in strategic locations within the project biological landscapes demonstrate tangible impacts and outcomes in relation of conservation of key threatened species habitats and avoid the ineffective spread of activities, the project will attempt to locate a suitable mix of project investments in critical connectivity corridors and other vulnerable locations within the biological landscape, where tangible impacts on threatened species and biodiversity conservation and threat reduction can be demonstrated. The selection of these strategic locations will be based on specific criteria that help determine areas that are most biologically significant for conservation of threatened species and threat reduction and thus serve to ensure the long-term maintenance of the biological and ecological connectivity and integrity of the biological landscape itself. This will enable establishment of critical conservation linkages necessary to maintain ecological integrity and key threatened species dispersal within the forests system. The strategy is based on the premise that conservation of threatened species and their habitats within such high priority locations will contribute to maintenance of the population of these species and ecosystem linkages and ensure that the results and best practices can be translated to other parts of the landscape. Using this strategy as the basis for project interventions will necessitate that all PA-related, KEE-related, Sustainable Land Management (SLM), Sustainable Forest Management (SFM), sustainable livelihood and community and private sector related biodiversity-friendly business solutions are developed and implemented in an integrated fashion within these high priority locations rather than be diffused throughout the biological landscape (and/or implemented independent of each other) given the constraints of GEF resources, institutional capacity and timeframe of the project.

43 A three-tiered evaluation process will be employed to facilitate the identification of the priority areas within the key threatened species landscapes, ensure connectivity between fragmented habitats and improve the viability of these threatened species populations, by enlarging habitats, ensuring dispersal and daily and seasonal migration of animals and the re-establishment of natural forests in "disturbed" habitats. The first tier entailed the use of biological criteria to identify the best "umbrella" sites, namely those sites that are important for the

conservation of the target key threatened species and habitats (based on species irreplaceability, habitat connectivity and ecological permanence and having representative bio-indicators). Once these important biological sites are identified, these will be subjected to a second tier evaluation in terms of threats (where there is clear and present dangers related to land-use changes and land use conflicts, poaching, IWT and HWC) and drivers of degradation of habitat of the target threatened species. The third tier includes the assessment of the demonstration potential and socio-economic aspects of the proposed sites in terms of management of environmental and social impacts, resource use conflict reduction, enabling policy environment and potential trade-offs.

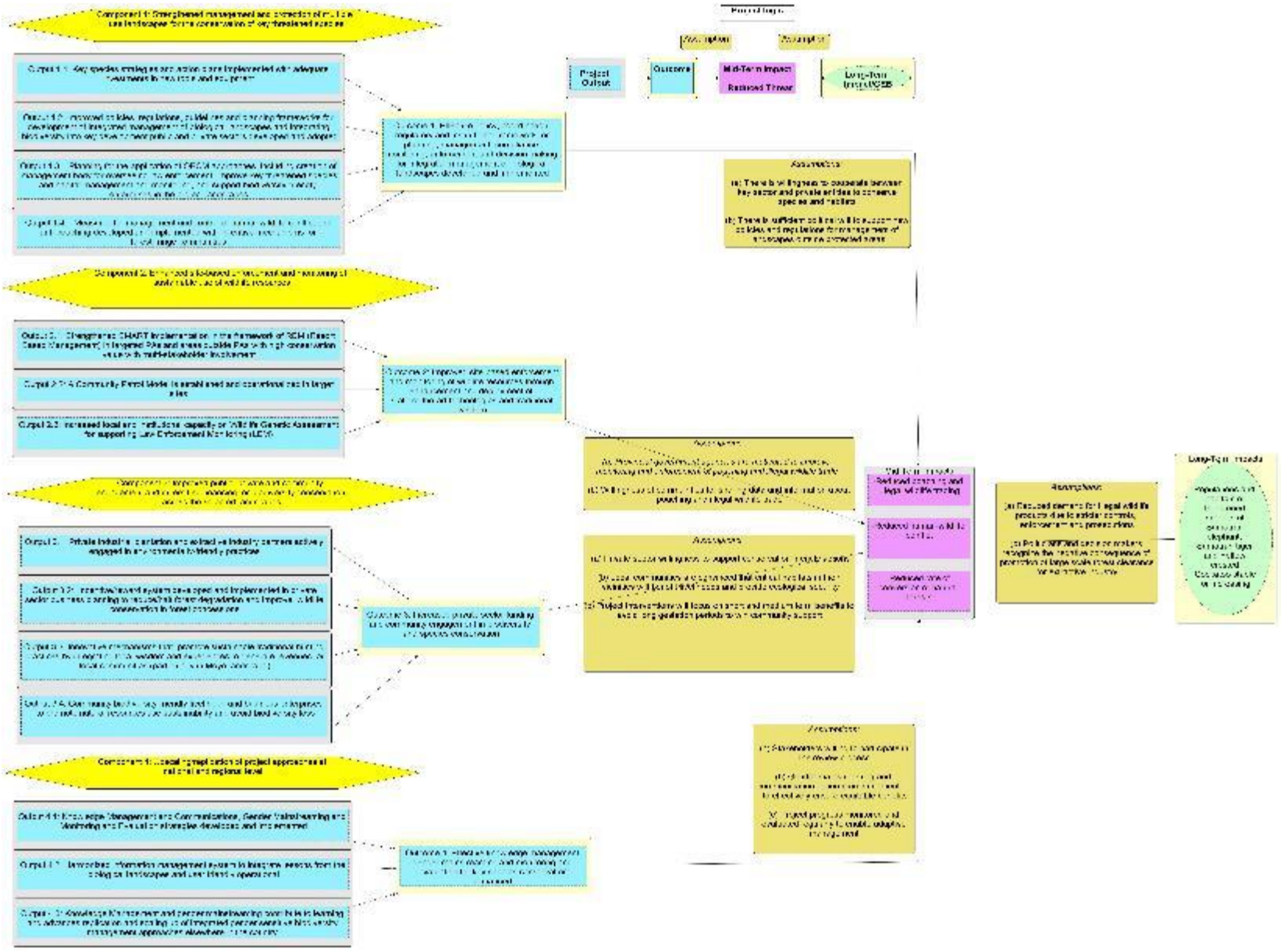
44 The project strategy was endorsed by stakeholders at well-attended national inception (September 10, 2019) and at a virtual validation workshop (April 17, 2020) in Jakarta, as well as during extensive discussions at the Provincial and community levels (see Table 7). The project objective will be achieved via four inter-related and complementary strategies (Project Components comprising Outcomes and Outputs) that focus on removing/reducing the four key barriers to accomplish the long-term solution (**Figure 1**) by means of intervention pathways shown in the theory of change diagram (**Figure 2)**. Indicators and assumptions for the accomplishment of expected Outcomes under the respective Components are given in the Project Results Framework. In particular Component 1 will help develop and implement strategies for conservation of threatened species, define appropriate policies, regulations and capacity at the provincial level for effective implementation of the strategies, that would be complemented by improved site-based enforcement and monitoring of illegal activities (Component 2) and engagement of the private sector (palm oil companies and forest concessions) and local communities to directly contribute to conservation efforts related to the threatened species (Component 3) while Component 4 will enable learning and knowledge that will support replication.

45 The four Components of the project are:

- Component 1: Strengthened management and protection of multiple use landscapes for the conservation of key threatened species
- Component 2: Enhanced site-based enforcement and monitoring of sustainable use of wildlife resources
- Component 3: Improved private sector and community engagement and diversified financing for biodiversity conservation across landscapes; and
- Component 4: Upscaling/replication of project approaches at national and regional level

45. The project's target landscapes have been chosen mainly because of their critical importance as centers of endemism and biodiversity hotspot (based on based on species irreplaceability, habitat connectivity, ecological permanence and having representative bio-indicators) and in particular importance for threatened species and their habitats. Other criteria used was (i) sites where there exist clear and present dangers, including land-use changes and land-use conflicts; (ii) sites where there is demonstration potential in terms of conflict reduction, enabling policy environment, political and social support and socio-cultural considerations. A series of technical discussions were held during the PPG stage to confirm the selection of the target landscape candidate sites to be included in the Project (Refer Annex 25). Figure 3 is a map showing location of project sites, namely: Ulu Masen and Seblat in Sumatra and Moyo Island in Nusa Tenggara. Detailed maps of the three project sites are provided in Annex 1.

Figure 2: Theory of Change *(page 24)*



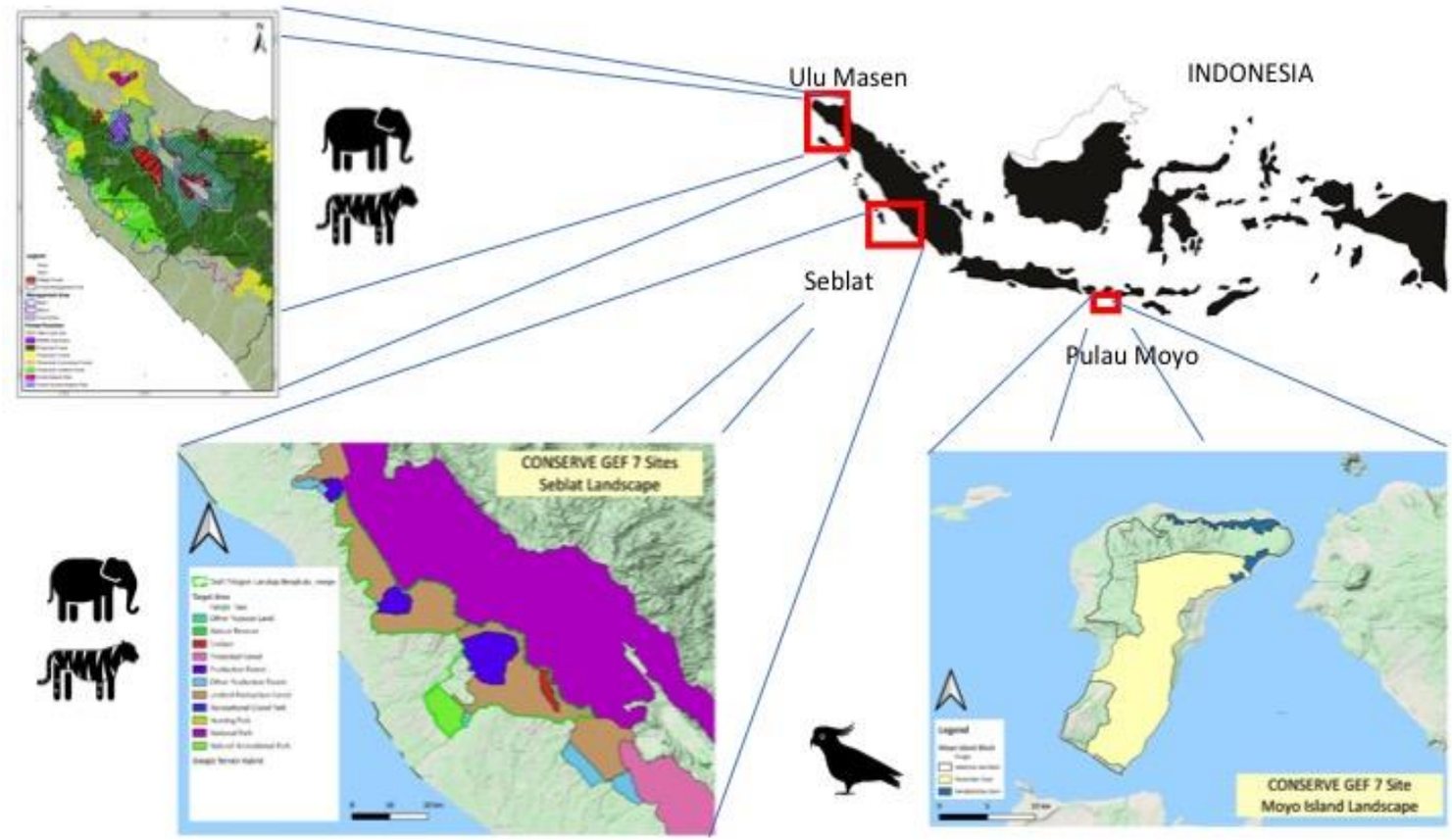


Figure 3: Map of Project Sites[15]: (Map with coordinates in Annex 1)

[15] The designations employed and the presentation of materials in these maps do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations or UNDP concerning the legal status of any country, territory, city or area or its authorities, or concerning the delimitation of its frontiers or boundaries.

Table 2: Geographical, Biological and Socio-Economic Features of Biological Landscapes

Geographic and Biological Features	Socio-Economic Features and Threats
Seblat Biological Landscape	
Covering 150,000 ha in Central Southern Sumatra, the Seblat landscape. In terms of fauna, Seblat contains a range of diverse and critically endangered species such as the Sumatran Elephant and Sumatran Tiger. It is also the home to other large mammals such as the sun bear (*Helarctos malayanus*), wild Boar (*Sus scrofa*). malay tapir (*Tapirus indicus*), sunda pangolin (*Manis javanica*), sambar (*Rusa unicolor*) and indian muntjac (*Muntiacus muntjak*). It is also home to several primates such as the siamang (*Symphalangus syndactylus*), silvery lutung (*Trachypithecus cristatus*), southern pig-tailed macaque (*Macaca nemestrina*). There are also six hornbill species and several raptor species identified in Seblat landscape. This area is the natural habitat for between 70-150 elephants comprised of about 4 smaller groups that are separated by oil palm plantations and mining estates. It is one of the last remaining habitats for the elephant and has a natural connection with the large Kerinci-Seblat National Park. This area contains many vulnerable, threatened and endemic plant species such as the corpse lily (*Rafflesia arnoldii*) (considered vulnerable), titan arum (*Amorphophallus itanium*) (considered endangered), Amboina pitch tree (*Agathis dammara*) (considered vulnerable). In Seblat, there are also carnivorous plants (i.e. *Nepenthes* sp.) and many rare and endemic species of Dipterocarpaceae.	In general, the people around and within the Seblat landscape produce a livelihood from agriculture and plantations. Agriculture is in the form of seasonal farming, coffee growing and rice planting. Plantations are generally palm oil plantations. The total population within and outside this landscape is around 60,000 to 100,000. Threats are high, in particular from expanding palm oil cultivation and land conversions for other uses. The conversion of forests has hindered the movement of Sumatran elephants in the Seblat landscape, especially towards the recreation park. This is largely on account of increased openings from palm oil plantations, between the recreation park and the Kerinci-Seblat National Park. Mining licensing has also caused the takeover of parts of the recreation park. In addition, there are threats related to poaching and IWT of tigers and HWC with elephants. There are no custodian communities in this landscape
Ulu-Masen Biological Landscape (Aceh)	
Covering, Eastern Sumatra, the Ulu Masen ecosystem is the largest and most intact natural forest area and biodiversity resource surviving in Sumatra, and one of the most important such reserves in the world. Given that approximately 60 percent of the land in Aceh is under natural forest in the Leuser-Ulu Masen ecosystem, these forests, which have been classified as having maximum environmental sensitivity, safeguard environmental services that sustain lives and livelihoods throughout Aceh. The mainly forested area of around 7,000 km^2 comprises a number of habitat types, including various forms of lowland to montane rain forest, swamp forest, and, in the north, forest growing on limestone (karst) terrain. The Leuser-Ulu Masen area is the last place where there are viable, or potentially viable, populations of the Sumatran elephant (*Elephas maximus sumatranus*), orangutan, tiger (*Panthera tigris sumatrae*) and the critically endangered two-horned rhinoceros (*Dicerorhinus sumatrensis*), and the only place where all these species are found together. The area is also home to populations of tapir (*Tapirus indicus*), sun-bear (*Helarctos malayanus*) red hunting dog (*Cuon alpinus*), and a full complement of typical Western Sundaland primate species, including gibbons (*Hylobates agilis*), siamang (*Symphalangus syndactylus*), and *Cercopithecine* spp. and Colobine monkeys. The rest of	The key concern is the ability of the government and people to protect the forests in the face of logging, road construction and plantation and forest concessions sponsored by others with short-term interests, in order to ensure the equitable, sustainable and profitable use of this unique resource for local benefit over the long term. Other concerns including encroachment and agricultural expansion. Human-elephant conflict is a serious problem in this landscape that accommodates between 170.000–200,000 people. The key challenges facing the Ulu Masen landscape is (i) regulatory overlaps; (ii) weak law enforcement; (iii) power overlaps between different levels of government; and (iv) lack of coordination between government department and agencies. There are at least the following customary lands identified in this landscape, namely those of the *Mukim Paloh, Mukim Kunyot, Mukim Beungga, Mukim Tungkop, Mukim Lango, Mukim Meuko, Mukim Manjeng, Mukim Krueng Manggie, Mukim Sarah Raya, Mukim Pange, Pasie Gampong, Bintah Gampong, Ranto Sabon,* and *Mukim Blangme*. There are about 8,000 custodian community households (around 28,000 persons) in the landscape. Over 80% of the households do subsistence farming and most depend on forest products for supplementary sources of food and income. Although the dependency on forest products varies from one group to another, on the average about 65% of the households use forest

the biota is extraordinarily rich, with over 1,000 vertebrate species, thousands of higher plants, and an unknown but very large number (hundreds of thousands) of invertebrate species, many of them yet to be discovered. Such richness makes the area ideal for recreation, education and both basic and applied research. Taking all available sources of information the areas of maximum biodiversity value tend to lie in the ecosystem's peripheral and lowland areas.	products. The most common forest products collected are rattan, honey, damar (from *Belanocarpus* sp.), Jernang (sap from *Daemonorops* sp.) That is used as ingredient for coloring agent, cosmetics and medicine), agarwood that is used for making incense, perfume and small carvings, as well as bird and deer meat and fish. Threats are high in particular, from expanding palm oil cultivation, forest concessions and land conversions for other uses. In addition, there are threats related to poaching and IWT of tigers and HWC with elephants.
Moyo Island Biological Landscape (West Nusa Tenngara)	
The island has an area of 35,000 ha. It consists of lowlands to highlands, with a maximum height of 671 meters, and a coastline of 88 km. It provides a great opportunity for establishing a conservation approach that includes both the landscape and the surrounding seascape, particularly in the southern part of the island. Most of Moyo island is a nature reserve called Moyo Island Hunting Park, covering 22,600 ha that provides opportunity for community-based ecotourism. The marine areas surrounding the island have the status of Moyo Island Marine Recreation Park, covering an area of 6,000 ha. Moyo island has an abundance of flora, including at least 60 species of trees that have been documented. Over 52 species have been recorded on the island including the endemic orange-footed scrubfowl (*Megapodius reinwardt*), the small yellow-crested Cockatoo (*Cacatua sulphurea*) is also classified as critically endangered, and other bird species such as the bonelli's eagle (*Aquila fasciata*), dusky moorhen (*Gallinula tenebrosa*) and mollucan scops-owl (*Otus magicus*). The noteworthy mammals on the island are the Javan deer (*Rusa timorensis*), banteng (*Bos javanicus*), wild boar (*Sus scrofa*), long tailed maqaque (*Macaca fascicularis*), Sunda porcuppine (*Hystrx javanica*), dolphins (*Tursiops truncatus)* and whale shark *(Rhincodon typus). The surrounding seascape, especially in the south has important coral species (about 53 species), including* staghorn coral, (*Acropora Formosa),* finger coral *(Acropora humilis), Acropora hyacinthus*, brush coral (*Catalaphylia jardinei*)*,* trumpet coral (*Caulastrea echinulate*)*,* brain coral *(Cypastrea serailia), Diplastrea heliopora,* honeycomb coral *(Euphyllia gabrescens),* moon coral (*Favia pallid*)*,* larger star coral (*Favites abdita*)*,* plate coral (*Fungia paumotensis, Fungia fungites*)*,* crystal coral (*Galaxea astreata*)*, Galaxea fascicularis* (octopus coral), flower pot true red coral *(Goniopora lobata),* striate boomerang coral *(Herpolitha limax),* Sun coral (*Tubastrea aurea),* hedgehog coral (*Echinopora lamellosa),* disc coral *(Turbinaria peltata),* Organ pipe coral *(Tubipora musica),* open brain coral *(Trachyphyllia geofroyyi) etc.* In the waters of Moyo Island, species of high conservation value include turtles, dolphins, whale sharks and dugongs. These species are also found in the waters of Saleh Bay.	Moyo island has become a terrestrial and marine tourist destination with tourist numbers increasing from 3,400 in 2012 and 6,900 in 2017. The agricultural system of community is still traditional, in particular, focusing on intercropping with paddy. Population on Moyo Island is around 1,000, most of whom make a living by farming and fishing. The main threats are encroachment in the north Island (Sebotok village), over-fishing of Napolean wrasse (*Cheilinus undulates*), Bump-head parrotfish (*Bolbometopon muricatum*), sharks, rays and ornamental fish, as well as coral destruction by excessive activity at sea and tourism. There is also illegal harvesting of fish in coral reefs, and the associated damage to coral reef from harvesting, and poaching. Poaching of small game bird species (such as yellow-crested cockatoo) and illegal trade is an issue. Land tenure issues remain unresolved between the local government and communities. The customary lands identified in this landscape are those of the *Sebotok.* The number of customary community population is small (perhaps around 100). They depend on the forests on plants and tubers for food and medicine.

IV. RESULTS AND PARTNERSHIPS

Expected Results*:*

46. Long-term solution: The project is designed to achieve long-term environmental impacts of reduction of direct threats on critical species, ecosystems and biodiversity. This will be achieved through establishing the following institutional and regulatory measures for integrating biodiversity conservation and sustainable natural resource use into sector specific and sub-national socio-economic development planning and community resource management of biodiversity landscapes:
    - *A national policy, regulatory and governance framework for planning, managing, compliance, monitoring, enforcement and decision-making for integrated ecosystem management process and utilized for biological landscapes that includes critical habitats of key threatened species outside protected areas through application of KEE/OECM approaches (refer OECM Guidelines adopted at CBD CoP 14 November 2018);*
    - *Improved site-level planning, regulatory, monitoring and implementation framework for demonstration of integrated ecosystem planning and management of large threatened species landscapes;*
    - *Improved site-level sustainable use and management systems for rich threatened species habitats outside protected areas and sustainable community and private sector use (including industrial plantations, forest concessions and extractive industry) through biodiversity friendly, sustainable land and forest management, and sustainable and better targeted community livelihood investments and business ventures;*
    - *Improved site-based monitoring and enforcement to reduce human-wildlife conflict (HWC) and Illegal Wildlife Trade (IWT) through use of new tools and measures; and*
    - *Improved awareness and knowledge on biodiversity conservation and threats to key threatened species and their habitats that encourage support and commitment from policy makers, planners and local communities to conservation.*

47. The Project Objective is to ***Strengthen management of multiple use landscapes to enhance biodiversity conservation, generate sustainable land-use and livelihood practices and address illegal wildlife trade***. To achieve this objective, the project is designed to develop and test a holistic and well-integrated multi-sectoral and multi-stakeholder approach to planning and management within the large biological landscapes that support key threatened species populations through the application of other area-based conservation measures. This is underpinned by mechanism(s) that address current limitations in multi-stakeholder and sub-national (provincial and district) integrated development planning and coordination between key stakeholders within the biological landscapes, improved private sector cooperation for conservation and improved local community and customary community access and control of resource use to generate improved livelihoods, incomes and benefits.

48. The project's incremental value lies in demonstrating the development of participatory natural resources management, public and private enterprise based sustainable natural resource practices and sustainable livelihoods for local communities in the selected biological landscapes of key threatened species. This approach will concurrently strengthen the conservation of key threatened species and their habitats within protected areas and high biodiversity areas outside of protected areas, improved conservation outcomes in industrial plantations, forest concessions and extractive industry, rehabilitate degraded agricultural and forest lands, maintain the connectivity of habitats, in particular for threatened species and ecosystem values of these biological landscapes, and ameliorate climate change impacts. A biological landscape Information Management System and maps will be developed for each of these target landscapes which will provide the following: (i) mapping of land use in biological landscapes using existing information to ascertain suitable habitats for targeted key threatened species; (ii) identification of areas of high biodiversity conservation significance for target threatened species that are needed to ensure connectivity, (iii) development of spatial tools on land and forest degradation and Invasive Alien Species (IAS) that affect habitats of target threatened

species, and (iv) support data needed for planning for ensuring sustainable and environmentally-friendly industrial plantations, forest concessions, sustainable agriculture and forestry, sustainable tourism development, and land rehabilitation and improvement, climate change adaptation, and community sustainable resource use. The information system will allow for defining which ecosystems can be sustainably used (along with biodiversity-friendly practices) and which should be conserved in order to retain critical populations of threatened species and associated biodiversity, habitat and ecosystem integrity and habitat connectivity. It will also help develop capacities and required enabling frameworks through "learning-by-doing" approaches in the selected target biological landscapes that could facilitate further replication elsewhere in the country. Sustainable biodiversity management approaches will be based on assessments of key biodiversity and ecosystem services and will build on capacities and concepts established during the interventions of the past GEF and donor projects in Indonesia, including recent approaches in establishment of OECMs and application of KEE and key species action plans. The project will be able to develop and demonstrate a matrix of best practices for Indonesia landscapes for scaling up and replication in other landscapes nationally and regionally. A series of knowledge management publications and awareness events will support the achievement of these targets.

Component 1: Strengthened management and protection of multiple use landscapes for the conservation of key threatened species

Total Cost: US$ 20,446,600; GEF project grant requested: US$ 2,446,600; Co-financing: US$ 18,000,000

Outcome 1: ***Effective policy, coordination, regulatory and institutional framework for planning, management, compliance monitoring, enforcement and decision making for integrated management of biological landscapes developed and implemented***

Baseline conditions for this outcome (without GEF project):

49. At systematic level, Indonesia's Natural Resources Conservation and Ecosystem Law (No. 5 of 1990), Forestry Law (No 41 of 1999), Government Regulation No. 7 of 1999, Government Regulation 28 of 2011 and other national and provincial laws and regulations relating to support for management of areas outside traditional PAs will likely continue with limited guidance and application on: (i) applying integrated ecosystem management approaches at the landscape level, in particular to support conservation of habitat of threatened species, (iii) developing policy instruments to enhance biodiversity outcomes in sectoral, provincial and local development planning, as well as private plantations and forest concessions; and (iii) ensuring effective monitoring, enforcement and compliance of existing laws. As a consequence, the biological landscapes systems will likely continue to be managed less effectively, and threats to biodiversity, including threatened species will be likely remain poorly controlled resulting in loss of key habitat for threatened species and their ultimate decline. Institutionally, the Directorate General of Nature Resources and Ecosystem Conservation (KSDAE) of the Ministry of Environment and Forestry (MOEF) that is the main entity for forest protection and nature conservation, however they will need to collaborate and build partnerships with sub-national government and but not limited to land-owners for implementation of comprehensive integrated ecosystem management approaches, particularly incorporating areas outside the protected area network and/or landscape level, that is generally under the jurisdiction of sub-national governments. Therefore, management of the biodiversity-rich ecosystem or landscape that support conservation of threatened species will not be effective and delivering higher results without promoting collaborative institutional arrangements at the targeted areas with the application of the OECM concept promoted national mechanism (i.e. KEE processes). Without GEF financing, Indonesia will not likely be able to guarantee: (i) an effective multi-level integration between national and provincial governments and sector entities in terms of integrated biological landscape planning and management for key threatened species conservation, (ii) an effective consultation between different institutional levels and public and private sectors at the national or provincial level in support of biodiversity conservation, in particular in maintaining conservation outcomes in areas outside PAs that are necessary for ensuring habitat connectivity for threatened species, (iii) an effective integration of biodiversity conservation

targets and outcomes in relation to threatened species specifically, and biodiversity conservation, in general in provincial, district and sectoral social and economic development planning; (iv) an effective means to integrate local community and Custodian community's knowledge and traditional resource management systems into management of biological landscapes, nor (v) effective procedures to include provincial level institutional arrangements that represent the needs of the conservation community, local community, sector and private industry interests and better use of technical expertise to implement effective conservation policies that protect threatened species.

50. While, some provinces have begun to promote the concept of OECMs[16], including promulgation of a decree for establishment of OECMs through the KEE process, the formalization of multi-stakeholder forum for decision-making; development of strategy and plan for these areas, received provincial government financing for plan implementation; strengthened the Natural Resources Conservation Agency (BKSDAs) – entities of MoEF which operates at Provincial Level –and Provincial Government Forest Units with staff and equipment and obtained some support from private industry for forest restoration and protection, without the GEF Project, there will continue to be an incomplete or limited effort to fully operationalize the KEE approach outside of the PAs. In particular, in the two Sumatran sites (Ulu Masen and Seblat sites) aAs a consequence, development will continue to be dominated largely by single sector-based or private industry interventions that lack a more holistic vision and approach. Private and public sector development would continue without a clear policy or regulations on biological and natural resources conservation using OECM approaches within the biological habitats or landscapes, resulting in an inevitable further fragmentation of critical habitats for threatened species. Most relationships between resource owners and private sector industrial plantation developers and forest concessions will continue to remain weak, informal or ad hoc, despite the fact that there are numerous groups and processes in place to facilitate joint planning and implementation to achieve biodiversity goals. Human-wildlife conflict will likely continue, resulting in retaliatory killings of threatened species and an increasing antagonism between local communities and conservation interests. Planning process are likely to have limited support for conservation and as a consequence the trend of degradation of natural systems will likely continue which will further increase fragmentation of natural systems for threatened species within the biological landscapes that would lead to a further reduction in key species populations, including in particular for the Sumatran elephant, Sumatran tiger and other threatened species.

Alternative for this outcome (with GEF project):

51. Under this Outcome, the GEF increment will support strengthening coordination, governance and regulatory arrangements for mainstreaming natural resource management and biodiversity conservation objectives into provincial level development planning through the improved management of areas outside PAs through KEE approaches. This will include strengthening the institutional coordination framework for KEE management to facilitate information sharing, engagement, consultation, planning and mobilization on the strategies and decision-making tools. The KSDAE of MOEF will provide leadership where mandated by various existing laws and agreements or where existing capacities exist to enhance support to provincial governments on the issues relevant to establishment and effective implementation of the OECM approach. Guidelines, plans and best practices for mainstreaming biodiversity concerns in planning for OECMs will be further strengthened as it relates to integrated conservation planning, improving conservation outcomes in industrial plantations, forest concessions and mining areas, improving conservation practices for agriculture, forestry, tourism, human-wildlife conflict management among others, including establishing a set of minimum standards, to guide responsible practices in these sectors while providing a concrete strategy and resource mobilization plan for their sustainable development to enhance economic sectors in Indonesia. These plans will build on and integrate relevant and existing tools, strategies and lessons gained through the baseline work. These tools will also be used to provide a stronger regulatory, monitoring and enforcement framework to avoid, reduce and mitigate adverse impacts of these sectors on biodiversity. Emphasis will specifically be placed on maintaining the ecological integrity of the biodiversity landscapes and corridors for threatened species, in particular, in PAs

[16] KEE institutional forum has been established based on Bengkulu Governor Decree Number: S. 497.DLHK. Year 2017 concerning the Establishment of a Collaborative Forum for Management of the Sumatran Elephant Corridor, the Seblat Landscape, Bengkulu

and critical habitats and migration or movement corridors outside of PAs. At the same time, the project will strengthen the capacity of Provincial BKSDAs and relevant provincial government agencies to develop new, improve existing, and implement regulations and practices for management of impacts on biodiversity and ecosystems in development activities within and outside of protected areas. The outcome would be a coordination and governance structure that promotes an integrated ecosystem management approach. This approach takes into cognizance sustainable resource management, biodiversity conservation, habitat connectivity for threatened species and biodiversity-friendly planning and enforcement in private industrial plantations, forest concessions, extractive industry and in community activities (agriculture, livestock, small-scale plantations, etc.), human-wildlife conflict mitigation, reduction of illegal wildlife trade and climate change. It will also focus on strengthening relevant capacity and skills within agencies, notably KSDAE and its relevant Directorates, Provincial and district agencies, community institutions and private industry and support their ability to balance development and environmental needs. The intent of this Outcome is to maintain or improve the population density of the key threatened species in the project landscapes, reduce the extent of HWC and decrease the level of illegal activities (refer Section V for key indicators) so as to contribute to Indonesia's international objectives and mandates relating to the conservation of key species. Through the OECM approach, the project will ensure that local communities and customary committees, particularly those most vulnerable to zoonotic diseases and climate risks will be directly involved in the OECM planning and decision-making process that ensures that these communities benefit from specifically targeted interventions.

52. This Outcome would be achieved through four outputs, which will contribute to achieving the overall goal of supporting OECM frameworks for integrated ecosystem-based planning, management and enforcement in Indonesia to conserve biodiversity and critical habitats for threatened species in establishing capacity for planning, implementation and monitoring of conservation outcomes and threats. Annex 9 provides a discussion of the objectives and steps for implementation of OECM through, for example, the KEE approach.

Output 1.1: Key species strategies and action plans implemented with adequate investments in new tools and equipment

53. The existence of national strategy and action plans for species conservation as an official document to guide the conservation at national, regional as well as at site level could form the legal basis and reference for all stakeholders in undertaking activities and initiatives related to the conservation of the particular threatened species and its habitat. The status of strategies and action plan for the three target threatened species listed under CITES Appendix 1 in relation to the project sites is varied. The strategy and action plan for Sumatran Tiger conservation (*Strategi dan Rencana Aksi Konservasi Harimau Sumatera*/STRAKOHAS) for period 2020-2029 has been discussed through a series of public consultations during 2017 - 2019. Considering that GEF-5 Tiger Project has provided support for the development and initial implementation of this action plan, this project will support the process for formalizing strategies and action plans for the two other targeted threatened species (Sumatran elephant and yellow-crested cockatoo) and the implementation of the strategy and action plan for the Sumatran Tiger in the two Sumatran project sites. This would entail specific efforts to promote a regulatory and management framework for CITES implementation that focuses on the three species.

54. While the Strategy and Action Plan for Conservation of Sumatran elephant for period 2019 – 2029 has been drafted and public consultation undertaken, the draft strategy and action plan has not been formally legalized to date and therefore has not been enforced. However, there is an Emergency Plan for Sumatran elephant that is being enforced. The Strategy and Action Plan for Conservation of yellow-crested cockatoo has been drafted.

55. Considering the importance of having time-bound and feasible strategies and action plan for threatened species conservation, this project will support the progress of getting the strategy and action plan internalized for the two targeted threatened species, by continuing the earlier effort that has been made to date (for the case of Sumatran elephant) and by initiating the process (for the case of yellow-crested cockatoo), and whenever possible implement them with adequate investment in new tools and equipment, in parallel with

the formalization process for the Sumatran Elephant and the yellow-crested cockatoo strategy and action plan, it will also support the implementation of the Sumatran tiger strategy and action plan in the two project sites in Sumatra.

56. Output 1.1 will support the following indicative activities:

1.1.1 **Formalizing institutional arrangements and technical support for the review of the draft strategy and development of action plan for conservation of yellow-crested cockatoo.** The Directorate of Biodiversity will initiate discussion to developing a species action plan for the yellow-crested cockatoo. This will be supported through a series of consultations/meetings with experts - practitioner, academia, and scientists to develop the draft strategy and action plan. The technical consultants will help identify the threats and priority constraints to conservation of the yellow-crested cockatoo so as to define medium and long-term targets, which are specific, measurable, attainable, realistic, and time-bond.

1.1.2 **Support wide stakeholder consultation to reach consensus and validate key actions and strategies for conservation of yellow-crested cockatoo.** At the next stage, the project will finance meetings with wider stakeholder groups to allow contributions from other agencies, such as Regional Forest Authority, Regional Development Agency, Police, private sectors, NGOs, researchers and interested conservationists. Once the strategy is formalized, a national forum on yellow-crested cockatoo will be established -- and will be responsible to monitor the implementation of the strategy and action plan

1.1.3 **Stakeholder review and government approval process of the draft strategy and action plan - conservation of the Sumatran elephant and yellow-crested cockatoo at national and local level**. In parallel to activity 1.1.1 to 1.1.2, this project will continue the stakeholder review and government approval process of the conservation strategy and action plan of Sumatran elephant. Led by DG KSDAE, and coordinated by FKGI, coordination meetings will be held to seek endorsement from all stakeholders to move forward with the formal government recognition and approval of the strategy within the MOEF, possibly through Decree of Ministry of Forestry or DG of KSDAE. Similar process will be undertaken for the yellow-crested cockatoo, as a follow up to activity 1.1.1 to 1.1.2. For the the next stage, project will support the stakeholder review and government approval process of the national strategy for the Sumatran elephant at local level. This will involve coordination meetings with local authority of the two Sumatran targeted sites to reach concensus and agreement on how to translate the national conservation strategy into local action, that will be in alignment with regional priorities and interest.

1.1.4 **Planning and initial implementation of the strategy and action plan at the targeted sites**. Following activity 1.1.1. through 1.1.3, and the strategies adopted by DG KSDAE, GEF support will be used to finance initial implementation of specific priority activities in the targeted sites. This would require development of site-specific implementation plans for all 3 species in the relevant project sites, along with activities, budgets and defined institutional responsibilities. Initial meeting will be conducted by respective BKSDAs to identify targets or priority areas in the strategy that will suit the need and capabilities of each site. The meeting will also discuss available resources, as well as investment needed (e.g for tools and equipment), to progress with the selected activities in the target sites. The specific support needed from GEF project will be discussed and specifed along with Provincial and other stakeholder financial support. A locally-adapted working plan for this initial implementation will be drawn after several meetings at the site level, while taking into account input from NGO partners and other stakeholders on the site. The Head of BKSDA will oversee the monitoring and evaluation of this initial implementation.

1.1.5 **Monitoring and Evaluation of the success of implementation efforts.** The implementation of site specific plans for the 3 species will be monitored to access the effectiveness of investments. Independent evaluations will be undertaken at mid-term and end of project to ascertain effectivess and recommend changes, if necessary.

Output 1.2: Improved policies, regulations, guidelines and planning frameworks for development of integrated management of biological landscapes and integrating biodiversity into key development strategies of public and private sectors developed and adopted

57. In Output 1.2, the Project will work towards facilitating the improvement of policy, regulations and planning guidelines for promoting integrated OECMs or KEE and biodiversity-friendly management approaches outside of the PAs. In particular, this would also seek to define specific socially and environmentally-friendly guidelines (building on existing practices) for industrial plantations, forest concessions, forest production, agriculture and other land uses and the mainstreaming of biodiversity, ecosystem services and gender in provincial development and sector planning in Indonesia. The intent is to ensure that there is adequate screening, assessment and management of social and environmental risks and impacts of development so as to reduce impact on threatened species habitats. In particular in terms of OECM, the work will focus at the Provincial levels in the 3 landscapes to test the following and in particular to enhance application of OECMs, including: (i) update or new provincial decrees for effective management of Essential Ecosystem Areas (KEEs), (rules and regulations and composition of KEE management Forums; budgetary norms/procedures for financing KEE actions, including provincial and private sector sources of financing, guidelines for integration of threatened species concerns in FMU planning and management, Village Fund use procedures for conservation and sustainable livelihood uses, etc.). The GEF increment will support the following activities under this Output

    1.2.1. **Consultation workshops with sectors, provincial, private industry, civil society and local communities** to ascertain exactly where the integration of social and biodiversity considerations is feasible within existing policies and practices;

    1.2.2. **Technical support and workshops for facilitating development/update of policies, namely** to (i) facilitate the strengthening of the integration of biodiversity and ecosystem services considerations into oil palm plantations, in particular in locations of threatened species habitats; (ii) facilitate the strengthening of the integration of biodiversity and ecosystem services considerations in mining policy; (ii) facilitate the strengthening of the integration of biodiversity and ecosystem services considerations in forest concessions; (iii) support analysis and update of relevant sector policies (e.g. agriculture, forestry, tourism, etc.) to ensure socially and ecologically sensitive development and practices; and (iv) establishing norms for budgetary allocation by Provincial governments for HWC activities, including utilization of village funds for this purpose.

    1.2.3. **Preparation of guidelines, protocols and best practices** for strengthening the integration of biodiversity, stakeholder engagement and gender considerations in provincial and district development planning and management systems, and local or community-level resource planning and conservation in private lands (forest concessions and palm oil plantations) to preserve threatened species habitats and mobility corridors; and

    1.2.4. **Facilitating the development of strategic plan for promotion of environmentally-friendly** and **sustainable community-based livelihoods** in biological landscapes, including identification of **alternative financial resources and revenue and benefit sharing** (including evaluation of viability of using various financial instruments that can support conservation related environmentally friendly products and services) by provision of new and attractive incentives.

Output 1.3: Planning for the application of OECMs approaches, including creation of management body for overseeing law enforcement, improve key threatened species and habitat management and monitoring, and support biodiversity-friendly enterprises in the project landscapes

58. As 80% of the key endangered and threatened species habitats are found outside currently designated conservation areas, mostly in lowland forest, the management of such habitats are critical for the conservation of Indonesia's threatened species. In order to do so, the project will apply KEE approaches for ensuring the conservation of ecologically important ecosystems located outside conservation areas. The KEE in Indonesia is considered an appropriate approach to manage habitats (outside PAs) that are important for key threatened species and ecosystems. The project will help facilitate its piloting in the key project landscapes that will integrate conservation areas and migratory corridors, production forests and other land use categories that are critical for conservation of key threatened species within landscapes. Law number 23 of 2014 relating to local government allows provincial government to manage important ecosystem and buffer zone of conservation areas and hence the application of the KEE concept at the provincial level will help facilitate the

integration of conservation-friendly measures in provincial, district and private sector planning systems at a landscape level.

59. Establishing a Local Landscape or Wildlife Forum would involve representatives of villages and community groups, industrial plantations and mining company representatives, forest concessionaries, and representative of key provincial and district governments. The KEE Management Forum will be responsible for defining, facilitating agreement, planning and monitoring conservation actions at the ground level (as envisaged by the rules and regulations for KEEs (Annex 8 and 9). Incentive measures will be developed to support district governments to allocate areas within production forests (Forest Management Units or FMUs) for conservation, earmarking provincial funding for KEE conservation activities, and promoting incentives to private sector in support of biodiversity-friendly practices in palm oil plantations, forest concessions and mining leases. Since villages have the rights and responsibilities under Village Law 6 of 2014 to manage and administer their needs and interests within their areas of jurisdiction, the project will assist in improving their governance of natural resources and mitigate threats such as encroachment, fire management and human-wildlife conflict management and mitigation (see Output 1.4) by strengthening village level governance institutions and improve their negotiation skills, raising awareness on importance of the KEEs for sustainability of village economic development, and improving community-private sector collaboration in conservation actions. The KEE management plans will include specific investments to protect threatened species and their migration corridors, improve habitat connectivity, and provide tools/equipment to enhance law enforcement and species and habitat monitoring and improve gender mainstreaming. Key threatened species strategies and action plans relevant to the project will include elephant, tiger and yellow-crested cockatoo, the initial two species for the two Sumatran sites and the latter for the Moyo site. The GEF increment will support the following activities under this Output:

    1.3.1 S**upport a Provincial Decision on establishment/revision of boundaries for applying the KEE approach** (in Seblat and Ulu Masen) after assessment and participatory mapping (using available information that is supplemented by satellite imagery and by field verification to the extent relevant) of biological, socio-economic, environmental and institutional aspects to facilitate assessment of biodiversity and ecosystem services values and threats, identification/validation of conservation values, enhancement of biological connectivity and the distribution, status and ecology of key threatened species etc.;

    1.3.2 Based on the mapping exercise, **official recognition of the KEE area and its internal zoning** highlighting biodiversity priorities, new and additional protection areas or set-asides for non-extractive or sustainable local use to improve connectivity and biodiversity conservation of threatened species (wildlife corridor) and multiple use zones for sustainable natural resource use. Mapping will help identify and prioritize: (i) biologically sensitive areas for conservation of biodiversity and habitats, in particular for endangered, threatened and endemic species and dispersal and/or connectivity corridors, vulnerable interface areas (with human settlements and industrial plantations) and other important ecological sites; (ii) areas for sustainable community natural resources management and use, including sustainable harvesting and extraction, community based conservation and forest management, watershed conservation and climate risk management; (iii) degraded areas for community forest restoration and fire management; and (vi) areas for sustainable agricultural development and livelihood improvement;

    1.3.3 **Integrated KEE collaborative management planning** (involving stakeholder collaboration mechanism forum developed and strengthened) that entails a multi-sectoral shared vision for zoning of the landscape; identifying priority actions for mainstreaming biodiversity conservation into private industrial plantations, forest concessions and mining estates; practices for improving provincial and district spatial planning, sustainable land and forest use, social parameters, etc., are developed and formally adopted by all relevant entities as well as defining partnership arrangements with private partners, district and provincial partners, community groups, etc. with the aim of building a truly coordinated and collaborative effort for conservation of biological diversity and ecological habitats for threatened and endangered species in the landscape;

    1.3.4 **Provide technical and extension support to facilitate mainstreaming biodiversity and social** considerations into the respective provincial district, private sector (business plans) and local

community development planning systems (based and/or informed by policies/regulations/guidelines developed under Output 1.2), building on the multi-sectoral vision and integrated KEE collaborative management plan developed under Activity 1.3.3.

1.3.5 **Provision of investment support for implementation of key priority actions in KEE management plans through the respective plans of stakeholder entities** with interventions within the different prioritize parcels of land to enhance conservation of key threatened species (Output 1.1), livelihood and ecosystem benefits (under Output 3.4), adoption of conservation practices in industrial plantations and extractive industry (Output 3.1) and SLM practices in agricultural and natural resources (Output 3.4), and practices to improve forest and land rehabilitation within the KEE framework. The priority actions will be undertaken by relevant public and private entities and local communities supported by capacity building. Efforts will also be made to ensure that the current Village Funds provided by the Government focus on KEE conservation compatible activities. These plans will be shared with potential and interested local, national and regional donors including NGOs, national and provincial governments and private sector for additional funding support. If required cooperation agreements will be signed with the donor and coordinating agencies. In particular, special efforts will be made to ensure that the most vulnerable communities have livelihood and business opportunities that would help them tide over the hardships as a result of COVID-19 and climate risks;

1.3.6 Provide analysis and recommendations for enabling **application of biodiversity and social considerations in the EIA process** (based on guidance developed under Output 1.2 as well as UNDP Guidance on Social and Environmental Assessment and Management to ensure that screening, assessment and management of social and environmental risks and impacts are assessed as part of the EIA process) and its enforcement for all socio-economic and infrastructure development in the landscape; and

1.3.7 **Support the coordination and monitoring of, and learning from OECM activities** at the landscape level.

Output 1.4: Measures for management and control of human-wildlife conflict and anti-poaching developed and implemented with incentive mechanisms for forest-fringe communities

60. Since, in the currently foreseeable future for Indonesia, natural forest cover will inevitably be reduced to the extent that threatened species and biodiversity, in general will be depleted, wildlife will become restricted to smaller and smaller extents of natural habitats. As a result human-wildlife conflicts are likely to increase, resulting in antagonism and the retaliatory killing of wildlife. As a consequence, to complement the KEE management planning process, the project will further strengthen collaborative efforts with local communities for managing human-wildlife conflict (HWC) and promoting anti-poaching measures, including the promotion of specific incentive measures for forest-edge communities to build community support and reduce antagonism and consequently retaliatory killing of wildlife. The most important solution to prevent losses of human lives and livelihoods, whilst allowing the maintenance of globally important biodiversity and ensuring sustainable development and livelihood opportunities is to develop land-use planning processes that incorporates the avoidance and management of HWC at the core of planning at the KEE level (Output 1.3). Part of this process is to establish KEE approaches to avoid the further degradation of remaining forests and create appropriate corridors for the unhindered movement of wildlife, including if necessary complemented by regeneration of degraded forests or fallow lands. Ecological principles will be integrated into KEE planning to take into consideration land-use decisions that may block or hinder migration of key species (e.g. elephant and tiger). The project will encourage private industrial plantations to undertake appropriate measures (e.g. Guidelines on better management of HWC in and around oil plantations) as well as inclusion of HWC mitigation measures as part of their budgeting exercises. The project will also seek guidance from the GWP HWC Community of Practice on best practices, tools and lessons that could be applied by the project. This will be complemented by promotion of other measures, such as creation of wildlife-friendly products (through potentially a certification scheme) as well as improving capacity and awareness on conflict avoidance and practical field-based solutions such as electric fences, habitat intervention, elephant friendly agriculture management use of repellants, training of community and private sector squads to monitor wildlife

movements and pre-empt conflict situations, as well as development of a community-based compensation system. The project will support, the following activities under Output 1.4:

1.4.1. **Technical assistance to undertake an assessment** of the extent and scale of the HWC problem in each landscape or KEE areas;
1.4.2. Based on this assessment, consultative meetings to **validate HWC problem and identify critical locations or hot-spots** of conflict and underlying factors for such conflict;
1.4.3. Continue consultative meetings with communities and private industry **to identify potential options for management of HWC,** and reflecting these in KEE planning processes as well as in establishment of SMART-RBM patrols (Output 2.1) and community patrols (Output 2.2);
1.4.4. The project will seek technical guidance from the **GWP HWC Community of Practice** on best practices, tools and lessons learned that could be applied by the project while designing HWC management and mitigations measures.
1.4.5. **Support the implementation of Government regulations in relation to HWC** (methods for tackling and preventing HWC) by building local communities, CSOs and private industry capacities to mitigate HWC and establish Provincial Government norms and annual budget allocation for HWC activities;
1.4.6. Initiate support for **establishing task force teams in conflict resilient villages** (linked to Output 2.2), including provision of community training, village fund for conflict mitigation team and provision of communication equipment to facilitate development of early warning systems to pre-empt, develop elephant friendly agriculture management and respond appropriately to conflict situations. Support community participation for the human wildlife spatial planning at the village level to reduce HWC incidents and increase the community acceptance of elephant and other wildlife in their area.
1.4.7. Encourage **private industrial plantations to implement responsible conflict management measures**, including establishing task force teams to pre-empt and respond to conflict management measures. Including provision of adequate budgetary provisions in their business plans for this purpose and training; and
1.4.8. **Strengthen local wisdom** that supports conservation of wildlife habitat, by using appropriate field-based solutions.

Component 2: Enhanced site-based enforcement and monitoring of sustainable use of wildlife resources

Total Cost: US$ 17,756,200; GEF project grant requested: US$ 2,056,200; Co-financing: US$ 15,700,000

Outcome 2: Improved site-based enforcement and monitoring of wildlife resources through enhancement and deployment of state-of-the-art technologies and traditional wisdom

Baseline conditions for this outcome (without GEF project):

61. While the GEF-6 Project entitled Combatting Illegal Wildlife Trade, started in 2017 and is supporting the efforts of Director General of Law Enforcement by enhancing the national policy and legislation framework and building institutional capacity for curtailing wildlife trade, current on-the-ground efforts at protection of species would continue to require more resources, increased and efficient institutional coordination amongst law enforcement entities, local communities and protected area staff to implement these measures in the vast areas in the country where wildlife crime is still prevalent. In addition, without the GEF project there is likely to be limited monitoring and information available and sharing on illegal wildlife trade at the ground level to allow for swift and timely actions to keep up with the current trend of illegal trade. This is particularly relevant given the ongoing outbreak of corona viral pneumonia associated with the smuggling of wild animals. In addition, the application of DNA code information to support species conservation, will continue to be challenged by limited human resources and capable institutions to undertake and support analysis that would be useful in supporting wildlife forensic science that is critical for apprehending and prosecuting illegal hunters and their trading partners. For a long time, the Eijkman institute has been the only institution that is capable of performing the task. However, with increasing IWT and evidence that need timely data analysis, the lack of

local institutions that can perform DNA analysis can continue to be a serious challenge for wildlife crime investigation in the future. While, currently, the University of Bengkulu has started to build their laboratory capacity and human resources to perform DNA Analysis in support of law enforcement in wildlife crime, by coordinating with BKSDA Bengkulu and other relevant local authorities, these efforts need substantial strengthening to make it fully operational.

62. Efforts at species protection and wildlife conservation have increased in particular through the application of the Spatial Monitoring and Reporting Tool (SMART) to complement the RBM (Resort Based Management) approach in managing conservation areas for monitoring of protected areas in Indonesia. The system that KSDAE uses in the field is called SMART-RBM. The RBM approach represents the MOEF core strategy to enhance management effectiveness of the PA system through active participation and feedback from the bottom upwards that can enable protected areas to be collectively managed through smaller administrative units (referred to as "resorts") with the aim to increase accountability and field presence of protected area personnel and help improve information systems on the conditions and development of each conservation area, which is considered the basis for formulating conservation policies which is more adaptive, proportionate and aspirational. The RBM's small administrative unit or "resort" typically includes a ranger and forest technician that is responsible for field monitoring, law enforcement and field management activities within a defined area. While the SMART-RBM scheme has been accompanied by efforts to increase the capacity of officers and establish other supporting facilities and infrastructure and implemented in protected areas, without the GEF project it is unlikely to be expanded widely to areas beyond the formally declared PAs, which covers vast areas with high importance for wildlife corridor and habitat. Consequently, efforts for species protection will continue to be below optimal level and concentrated in PAs without much recognition that a vast percentage of endemic and threatened species populations that continue to occupy areas outside PAs. Hence it is likely that key species population of the Sumatran elephant and Sumatran tiger and other species will continue to decline. For example, in Seblat landscape, of the 70-150 individual Sumatran elephants that occupy this landscape, data from the Collaborative Forum on Management of Essential Ecosystems Areas shows that there are only four small groups of elephants within and outside the Protected Areas. In the absence of good coordination and communication between local government, BKSDA, private sector and communities in management of poaching and related IWT, this could lead to a further decline in species populations, as evident from past population records.

63. The 2018 Performance Report of DG KSDAE recognizes the importance of protecting species beyond PAs, but without the GEF project (at least in the 3 targeted sites) there will continue to be limited engagement and coordination among key provincial, law enforcement, private sector, and community stakeholders in wildlife crime prevention. As a consequence, overall, wildlife crime and law related enforcement issues in Indonesia will continue to rank high, behind drug crime and human trafficking as a serious concern. with an estimated transaction value is IDR 13 trillion (approximately USD 1 billion) per year[17] and this value is expected to increase.

Alternative for this outcome (with GEF project):

64. With the support from GEF-7, under this Outcome, the GEF project will boost three major alternatives in reducing hunting and the unsustainable use of wild flora and fauna, namely by (1) improving the performance and effectiveness of preventive action and law enforcement through combination of state of the art technology and traditional wisdom, building on guidance that emanates from CITES; (2) increasing public awareness of Indonesia's flora and fauna to reduce hunting and (3) encourage protection of species and their habitat inside and outside the protected areas by collaborating with wider stakeholders at local level. In this regard, the project will ensure that collaborate with existing programs, including CITES activities aimed at legal, traceable and trade in products, forest governance, capacity building etc.

[17] https://news.mongabay.com/2018/04/indonesian-conservation-bill-is-weak-on-wildlife-crime-critics-say/

65. The effectiveness of conservation efforts within and outside the PAs will be achieved through strengthening and expanding SMART-RBM Patrol Implementation. This will be accompanied by development of a robust and effective reporting and evaluation system that will be coordinated between the 'resort' and regional PA headquarters to improve its effectiveness in communication and management response. The state-of-the-art technology which will be enhanced through GEF support in the application of DNA Code Information to improving wildlife forensics and help identifying wildlife species, as part of effort to combat illegal wildlife trade. The project will expand efforts to involve and develop the capacity of national research and universities laboratories that will support and complement the open source DNA databases at NCBI (National Center for Biotechnology Information) for protected target species (i.e. the 25 priority species as identified by the MOEF). The wildlife genetics work will involve non-invasive approach (e.g. scat collections, urine sampling) and analysis to develop DNA maps/profiles of key species. This information can also be used in the case of Illegal Wildlife Trade (i.e. checking the DNA from the skin or bones confiscated and cross-reference with the DNA profiles.

66. The project will further, given the complexity and interconnectedness nature of conservation efforts required in targeted landscapes (covering areas outside PAs as well), to bring together different directorates under and beyond DG KSDAE of MOEF, to communicate and coordinate their efforts at management and control of Illegal Wildlife Trade (IWT). For example, to control the impact of hunting practices, the Directorate of Conservation Areas will assess and examine the management of hunting parks and help develop harvesting systems that are aligned with the traditional wisdom. Additionally, the GEF support will enhance the awareness and capacity of local stakeholders in particular to the importance of protecting species outside the formally defined protected areas, by conducting socialization and training and involving them in community patrolling and information gathering on poaching and IWT.

67. The strategies and the outcomes of this project will build on and at the same time enhance the bigger impact of the GEF-IWT Project, GEF-Tiger Project and other similar initiatives in the country. Below are three expected outputs for this outcome.

Output 2.1: Strengthened SMART-RBM implementation in the framework of RBM (Resort Based Management) in targeted PAs and areas outside PAs with high conservation value with multi-stakeholder involvement

68. SMART (Spatial Monitoring and Reporting Tool) is a tool for implementing, documenting, analyzing, reporting and managing biodiversity data, patrols and management interventions at the site level. Simple to use, and it is an open-sourced program that inputs field observational data on incidents and patrol efforts collected by rangers, and output information on levels and trends in threats, carcasses detected and other visual information, performance of patrol teams and individual staff, as well as gaps in patrol coverage. Given the importance of highly reliable patrol data for a robust decision making related to conservation area management, MOEF has integrated the implementation of SMART Patrol within the framework of RBM. In 2016, a task force for SMART-RBM implementation in Sumatra recommended (i) preparing a SMART-RBM system (software, curriculum, syllabus and modules) to meet management needs at every level of management starting from the site to the central level, (ii) preparing implementation in-the-framework of SMART-RBM in stages from the site level to the central level with a focus on Sumatra and (iii) Carrying out an evaluation of the results of the implementation of SMART-RBM. These tasks which finally aimed at having a dedicated and trained officer. In addition to the availability of trained officers, policy support from National Government, Technical Implementing Unit (UPT) leaders was an important factor in the successful implementation of SMART-RBM in the field. This policy support is in the form of a local Decree of SMART implementation for data management, fixed procedures or standard operational procedures for field activities, or SMART-RBM is mentioned in the area management plan as a regional data management system that will support the RBM.

69. Under this output, this project aims to enhance and upscale the current practice of SMART-RBM Patrol in the project sites building on the best practices lessons developed under the GEF 5 Tiger Project. The current limited SMART-RBM patrols in the project sites will be enhanced through improved training and data management and its expansion to areas outside PAs. This will entail establishing additional SMART-RBM Teams to expand

the area covered by the patrols, improving frequency of the patrol, and expanding the stakeholders involved in patrol to include Forest Management Units (FMU) outside the protected areas, private concessions, community and local authority areas. Given the importance of data resulting from the SMART-RBM Patrol, efforts would be invested into establishing highly qualified officers with standardized skill. The project will build on MOEF Guidelines and Modules for SMART-RBM Implementation in Conservation Area that were developed under the GEF 5 Tiger Project as well as support the implementation of the curriculum and syllabus for SMART-RBM Training which has been legalized in 2017 under the Decree of Head of Center for Education and Training of Human Resources of the MOEF.

70. The project will support, the following activities under Output 2.1:

2.1.1. Assessment of current state of forest patrolling system and law enforcement capacity in the respective project sites. Under guidance from, and coordination with the conservation authority in concerned area (BKSDA) and other authorities such as Provincial Forest Departments (for forest management units) in areas outside protected areas (may vary for each landscape), the project will provide national technical support to review in detail the current state of forest patrolling system and law enforcement capacity in the respective project sites, including the number of forest patrol units and the frequency and coverage of the patrol. The review will also identify other existing gaps for effective SMART implementation on the respective sites, capacity of rangers, including minimum facilities and infrastructure that is needed to enhance the effectiveness of SMART-RBM patrol in the project sites;

2.1.2. SMART-RBM Training Plan for patrol officers developed. Based on the review (activity 2.1.1 above), once the review and identification process is completed and the MIKE Site-based Law Enforcement Capacity Assessment is undertaken for each project site, a training plan would be developed, including where, when and how the training for the three project sites should be conducted to achieve an efficient result, and how the training outcome will be monitored and evaluated. The training will follow the curricula and syllabus on SMART-RBM Training that has been developed internalized by the Center for Education and Training of Human Resources (Puslit-SDM) of MOEF, which includes the use of tally sheet, entering the data into SMART-RBM and the use of the data for reporting.

2.1.3. Training of patrol officers for SMART-RBM system. Training activities will be conducted based on the outcome of Activity 2.1.2 building on the existing curriculum and syllabus for SMART-RBM Training which has been legalized in 2017 to cover patrol officers from the respective protected area authorities and patrol officers from other management units within high conservation value outside the protected areas in the landscape sites.

2.1.4. **Development of high-risk poaching area map in selected sites**. In order to better target the patrol area, this activity will support the development of a high-risk poaching area map on the basis of which the SMART-RBM Patrol team will prioritize patrol areas. This map will be updated continuously based on the patrol data overtime. The map will be developed based on historical data series from rangers-collected data from each site, which covers different types of threats that have been monitored and recorded, including commercial hunting of large mammals, setting of snares for smaller wildlife, illegal timber harvesting, and other illegal activities identified at the respective sites. In addition to data recorded by forest rangers, relevant information from community, NGO Partners, and other parties will be taken into account when developing the map. The map will help the patrol team to identify consistent poaching hotspots, and enabling more efficient and effective ranger patrol in the future. The coverage of the map will be expanded beyond the protected areas at best, given that vast areas with high importance for wildlife corridor are located outside the formally defined protected areas, as these areas might become potential targets of poaching.

2.1.5. **SMART-RBM patrol implementation in the project sites.** Based on the review results as discussed above, once the basic training is completed and the prerequisite condition for SMART-RBM implementation is fulfilled, an updated SMART-RBM Patrol plan will be established by the BKSDA in coordination with NGO partners who work in the area. The project will support to set up and/or increase the level of patrol effort in each landscape, in terms of coverage, length of day and number of the team involved. Whilst SMART-RBM Patrol has been known to be useful for monitoring big mammals such as Sumatran tigers and elephants, the application of this technology will also seek to expand to a limited

number of other species including birds and other mammals. The project will support about 16 SMART-RBM patrol teams (10 in Ulu Masen, 4 in Seblat and 2 in Moyo, of which half would be financed by the project and the balance financed by BKSDAs, local government, private sector and NGOs) with the intent that by the end of the project, all financing for SMART-RBM patrols would be accommodated by the BKSDAs, local government, private sector and NGOs .

2.1.6. **Improving capabilities to analyze and manage data**. As the flow of information from the field to the decision-making level is problematic, the project will strengthen the capacity of SMART-RBM Officers, to enhance data compilation, analysis and reporting to complement the efforts to strengthen the SMART-RBM Patrol teams. This will require the development of protocols for data gathering from various sources using the system that was developed by KDSAE. This will ensure that data collected is properly used by Senior Managers for decision-making. The GEF project will support specific training for SMART-RBM Officers in each landscape to make them qualified database auditors. Depending on the number of resorts in the targeted landscape (each likely having three to nine SMART-RBM officers), the number of personnel and frequency of training will be identified in parallel during the review or gap assessment in Activity 2.1.1. The project will support coordination between BKSDA and the MOEF's Center for Education and Training, to ensure that standardized curricula and modules are deployed. To monitor the progress in developing capacities that are critical for environmental sustainability, UNDP Capacity Development Score Card can be applied as a tool to complement the Management Effectiveness Tracking Tool (METT) that has been more widely applied by the MOEF.

2.1.7. **Monitoring and Evaluation of SMART-RBM patrol data and measuring the impacts**. Equipped by a strong SMART-RBM Patrol team and qualified Officers, the next step is to monitor and evaluate the resulting data. For example, by using gridded analysis tools and several queries on SMART-RBM, the coverage of patrol area will be evaluated, along with performance and effort of each patrol team so to monitor trends related to threats to wildlife and forest area, to plan enforcement operations, to monitor patrol team and staff performance, and to showcase effectiveness at the site level. End-of-Project MIKE Site-based Law Enforcement Capacity Assessment completed for each site to assess changes from baseline.

Output 2.2: A community patrol model is established, operationalized and integrated into the SMART-RBM system in target sites

71. In order to support the patrol effort, Ministerial Decree No. 56/2014 enables partnership with community-based ranger, which is called *Masyarakat Mitra Polhut* (MMP), under which communities can be recruited and trained to assist rangers to protect forests and wildlife, join patrols, undertake awareness-raising activities, and provide information about illegal activities. The MMP is established at the initiative of the community with endorsement from their village authority, and facilitated by the conservation authority in the respective location. The membership of MMP can cover one or more than one village. The partnership with the community can add value in terms of bringing in traditional wisdom that support wildlife protection and law enforcement efforts. It will also promote the integration of the community patrol into the SMART-RBM system so as on the long-term to move towards a single integrated SMART-RBM system that includes both BKSDA rangers and community members.

72. MMPs collaborate with the conservation authority in one of many ways, with varying degrees of participation, namely: (i) informing – where the authority provides information to MMP; (ii) information gathering – community provide information as requested; (iii) consultation – external parties consulting MMP on related issues, but MMP is not involved in decision making; (iv) conciliation/placation – where MMP is involved in a limited way in the decision making process (decisions might have been made by the external party prior to the process); (v) partnership – participatory and interactive approach, MMP is fully involved in decision making process; and (i) self-mobilization – MMP fully take initiative on certain process, although might need guidance or support from external parties.

73. The MMP carries out relatively similar activities as the MOEF's forest ranger and are also equipped with patrol techniques and the use of GPS and trekking. They will do the patrol efforts together as SMART-RBM Patrol

Team. However, the technology developed is in the use of traditional wisdom that is based on village regulations (*Perdes*) or written customary agreements. Village regulations and written customary agreements are developed in a participatory manner by the community according to their traditional wisdom standards, but strengthened by the use of map technology, GPS and entering data.

74. Currently there are few MMPs that have been established in, and around the targeted sites, and therefore GEF support will be used to develop and institutionalize the MMP concept and support its initial operationalization and planning, and its internalization as a village priority, in order to establish MMP which will be self-mobilized in the future. In the Kerinci-Seblat National Park (adjacent to the Seblat landscape), with support of NGO, the villagers under management of Village Forest Management Unit (LPHD) patrol their own village forest concessions by using their own village fund that was supported by Payment from Environmental Services using a carbon offset mechanism that has provided a strong incentives for community to maintain a healthy environment in Kerinci Seblat landscape. In 2018, the 19 Community Patrol Teams conducted 114 patrols covering 1,468 km in the buffer zone of Kerinci Seblat National Park (KSNP) and destroyed 18 tiger snares, 159 deer snares and 14 bird snares. Existing regulation at the MOEF level can encourage this initiative and at the local level such as through a special local regulation (locally called *Qanun*) in Aceh, adat or village police throughout Indonesia can be implemented.

75. The project will support, the following activities under Output 2.2:

    2.2.1 **Establish agreement amongst village communities or customary communities to participate in protecting their forests.** This will entail identifying the target village or hamlets in coordination with village authority, traditional elders and the community so as to ensure full commitment of the village leaders, as key actor in the process. The selection of the target villages (particularly poaching hot-spots) will be later confirmed with conservation authority in the area (BKSDA) and/or Forest Management Unit (if it exists in the targeted sites), but based on the high-risk map developed under Activity 2.1.4. This will be accompanied by dissemination and sharing of information on importance of the forest and the diversity, in a way that is in line with the community's traditional value and wisdom through the involvement and contribution of some prominent and traditional elders who might be versed in traditional wisdom related to human-wildlife-forest links. In the next stage, with the support of the project and BKSDA or Forest Management Unit (FMU), the village leader will lead the process of developing community agreements, which basically states village commitment to actively participate in protecting forest areas in their surrounding and practicing livelihood-related activities which follows traditional wisdom and harmless to the environment. The written agreement will be legalized and internalized into a village regulation (*Perdes*), and the enforcement co-monitored by village authorities and communities themselves. Given the time needed to invest in finalizing the agreement in a participatory and interactive process, the project targets at least 20 community agreements that includes 4 existing community patrols. A total of 16 new community patrols will be established (10 in Ulu Masen, 4 in Seblat and 2 in Moyo, half of which would be financed by the project and the remaining financed by BKSDA, local government, private sector and NGOs).

    2.2.2 **Establish community patrol teams in the villages.** In parallel with activity 2.2.1, community-based forest rangers (MMPs) will be identified. The MMPs will support the scheduled SMART-RBM patrol activities led by the official forest rangers under BKSDA or FMU on request basis, but more importantly, the MMPs are expected to be self-mobilized and carry out independent patrol in their villages by using village resources and/or community's equipment. This self-mobilized patrol will be carried out in line with the values and commitment as agreed within the community agreement to protect their surrounding forest. Considering that only a few MMPs exist in the targeted locations, the project will provide support to its expansion guided by BKSDA or FMU and by working together with other partners who work in the area. Similar to activity 2.2.1, full commitment from village authority for MMP establishment as well as support from local forest authority (for example: *Dinas Kehutanan*) would be secured prior to its implementation. The steps involved in the establishment of MMPs are: social mobilization, coordination, building consensus and agreement on the need to establish MMPs, team member recruitment and registration, establishment of the organization structure, and development

of MMP's working plan. This process will require a series of training covering topics such as patrol techniques, data collection and reporting. Some community members may have joined patrol activity in the past (e.g.: through projects of NGO partners on the site), and therefore can be an asset for the respective MMP. GEF support will be used to establish and support the capacity building to convert these into SMART practice and initial operationalization of at least two MMPs team for each landscape, with each team comprising 4-5 community members. The long-term goal is to try to combine the SMART-RBM and Community Patrol to a single SMART Patrol approach.

2.2.3 **Implement community patrols.** Once the MMP is established, the next activity is to operationalize its working plan. The MMP priority will be to establish an independent and self-mobilized patrol, with the purpose of preventing illegal logging, forest fires, area encroachment and hunting of target flora and fauna. By doing so, this independent patrol can supplement and increase the coverage area and frequency of the SMART-RBM patrols, hence increasing the surveillance and protection at very local level. The schedule of the patrol (independent or as part of SMART-RBM patrol) will be listed in the working plan, which is also adaptive, given the unpredictable nature of human-wildlife conflict occurrence. The MMPs would maintain coordination and communication with the SMART-RBM patrol teams (official forest rangers as well as NGO partners) to develop an integrated exchange of information and activities. The village leader will undertake monitoring and evaluation of MMP activities through village meeting forums. Given the nature of wildlife-related and patrol activity, which in general are male dominated, MMP will seek opportunity to increase the role of women at best, for example by involving women as team members.. The project will support increasing capacity of these women informants as relevant and needed, for example capacity in documenting evidence, mapping and reporting to MMP and the village head. Other activities that can be undertaken by MMP include but are not limited to practicing land rehabilitation and ecosystem restoration projects; initiate the development of a sustainable agroforestry system; and it can also function as community fire fighter in the event of a forest fire disaster.

Output 2.3: **Increased local and institutional capacity on Wildlife Genetic Assessment to support Law Enforcement Monitoring (LEM)**

76. Combating crime and illegal wildlife trade in Indonesia requires new approaches, including use of DNA-based wildlife forensics. The DNA-based analysis can help law enforcement authorities trace the origin of trafficked animals. Wildlife genetics can also help to identify species of animals from confiscated animal body parts, including some sources from bile, legs, elephant ivory, bones, fangs, skin, and tiger claws which are often confiscated at airports and ports. Additionally, wildlife genetics information can also support the generation of an accurate data related to number of wildlife population, such as the Sumatran elephant.

77. Currently, biodiversity research in Indonesia that can directly inform wildlife protection and law enforcement effort is relatively limited. More specifically, the importance of the role of molecular biology research institutions in general has been undermined. A national consortium needs to be formed to strengthen wildlife genetic research consisting of various parties such as the government, academics, researchers, and students in order to achieve law enforcement and ensure compliance with CITES obligations, and to promote lessons sharing between different institutions. As Indonesian law does not accommodate justice-court process for flora and fauna originating from outside Indonesian jurisdiction, and law enforcement and prosecutors must prove that the evidence or specimens are indeed Indonesian. As mentioned earlier, currently the Eijkmann Institute for Molecular Biology, located in Jakarta, is the only institute that has the best capacity to perform a reliable DNA-based data analysis. Consequently, the institute has been overburdened to accommodate the needs for this type of analysis from Indonesia. In addition to that, given that the location of the laboratory, it has become a challenge to send and get the result in a timely manner to further the law enforcement process. GEF support will therefore be used to build and increase capacity at local level to perform a reliable DNA-based analysis through closed coordination with the relevant conservation and law enforcement authority at local level. Capacity building will focus on ensuring that the laboratories meet the CITES Directory of Laboratories standards for conducting wildlife forensic testing.

78. The project will continue to build on the work of ongoing GEF-6 project on Combatting Illegal Wildlife Trade, that aims at strengthening the institutional capacity for wildlife forensics techniques by providing necessary equipment and expert support of Wildlife Conservation Society (WCS) and its national partner base (including the Eijkman Institute and TRACE Wildlife Forensics Network) to support the Indonesian law enforcement agencies. This project will expand this effort to the local level institutions, by targeting Universities and NGOs at the targeted sites namely in Aceh, Bengkulu and West Nusa Tenggara.

79. The project will support, the following activities under Output 2.3:

2.3.1. **Initiate a national team forum of wildlife forensic laboratories and research entities**. This project will build on existing effort on establishing a Wildlife Genetic Research Forum (WGRF), led by the Indonesian Institute of Sciences (LIPI), which brings together various institutions, including Eijkman Institute, Forest Development Agency of MOEF (FORDA) and universities (including those located in the project targeted sites). The established forum will be used as a platform for sharing information, lessons learned, and act as a think-tank group for promoting DNA-based analysis for combatting wildlife crime and to support species protection effort in general. The established forum will meet on regular or ad-hoc basis depending on the need. Given the pool of expertise and reliable organization becomes member of this forum, different authorities or institutions can benefit from this forum in the case of relevant feedback, advise or policy considerations are requested.

2.3.2. **Establish a lessons-learned sharing on wildlife DNA forensic issues through the WGRF**. By using the established forum (activity 2.3.1), GEF support will be used to encourage sharing of lessons between different institutions working on DNA-based analysis to support combatting wildlife crime effort. For example, the Eijkman Institute and FORDA can share information and the lesson learned on forensic techniques for species identification already conducted. Including topics to be discussed in this sharing forum is the initial assessment on local laboratory with potential capacity to handle of wildlife DNA forensic, including consideration of quality assurance, lab infrastructure and human resources. The project will also share lessons with other GWP countries working on forensics.

2.3.3. **Establish and enhance capacity of local laboratories to support DNA-based crime investigation on time.** With technical support from WGRF and drawing on result from activity 2.3.2, this project will undertake capacity assessment of three main laboratory candidates, namely University of Syiah Kuala in Aceh, University of Bengkulu in Bengkulu and University of Mataram in West Nusa Tenggara. Depending on the assessment results, capacity-building plans will be developed for each university. Possible training that targets laboratory staff in each university will include some materials related to improved forensic analysis, DNA collections and the development of specific DNA toolkits. Once the laboratory is considered as technically capable by the WRGF, coordination mechanism with relevant conservation authorities and other law enforcement agencies at the local level will be established. This mechanism will ensure that the local laboratory will be contacted and referred to by these agencies in the event DNA-based analysis is needed for crime investigation purpose.

Component 3: Improved public, private and community engagement and diversified financing for biodiversity conservation across the selected landscapes

Total Cost: US$ 9,473,526; GEF project grant requested: USD 973,000; Co-financing: US$ 8,500,526

Outcome 3: Increased private sector funding and community engagement in biodiversity and species conservation

Baseline conditions for this outcome (without GEF project):

80. The MOEF as the national lead institution in conservation and endangered species management has established collaboration with the private sector and community in conservation areas and buffer zones

management programmes in some remote places in Java, Sumatra, Kalimantan, Sulawesi and Nusa Tenggara regulated by the Decree of Minister of Environment and Forestry Regulation no.78/Menlhk-setjen/2015. In this context, the private sector manages forest areas, contributes to the protection of peat ecosystems or encourages sustainable concession management through the implementation of HCVF (High Conservation Value Forest) or HCS (High Carbon Stock) or in the application of compensation to the community. This implementation encourages private sector to pursue the target of Ecolabel certification or Forest Stewardship Council (FSC) for timber, Roundtable on Sustainable Palm Oil (RSPO) for oil palm plantations or national mandatory namely Indonesian Sustainable Palm Oil (ISPO) certification. Government Regulation no. 12 of 2014 also regulates the company's compensation mechanism for water environmental services, especially for companies in the buffer zone of conservation areas that have a connection in the use of water in conservation areas for industry. In PAs that have tourism activities, cooperation with the government can manage the area within the utilization zone of the conservation area and the buffer zone for nature tourism licensing and the use of supporting tourism infrastructure. To date, MOEF has a total of 629 active collaborations at the regional level - in BKSDA West Kalimantan (30 memorandum of cooperation agreement), BKSDA Bengkulu (22 memorandum of cooperation agreements), Bukit Barisan Selatan National Park authority (19 memorandum of cooperation agreements), BKSDA North Sulawesi (18 memorandum of cooperation agreements), the Leuser National Park Office (16 memorandum of cooperation agreements) and BKSDA Aceh (16 memorandum of cooperation agreement). While, this is an excellent initiative, there is a need to expand private sector participation outside of Protected Areas and Conservation Areas to the larger landscapes that is necessary to conserve and protect the larger species such as the Sumatran elephant and Sumatran tiger as well as other threatened and species that are outside of the PAs. Without the GEF project it is unlikely that efforts would be targeted through a more comprehensive landscape planning exercise that collectively protects key migratory routes to promote habitat connectivity, restore and revitalize key corridors, reduce forest fires, reduce wildlife conflict, monitors wildlife movement and supports efforts at reduction of IWT.

Alternative for this outcome (with GEF project):

81. The GEF project will attempt to mobilize the private sector as agents for environmental change. In this regard, GEF project will actively try to address the numerous barriers to expand private sector engagement in conservation, in particular to identify appropriate entry points to engage the private sector in conservation activities within their concession areas in the selected landscapes (mainly in Ulu Masen and Bengkulu) through facilitating training and capacity building and provision of technical support to recognize the business benefits of good environmental stewardship. Such efforts will build on and expand the current successes in commitment from major palm oil producers to “zero-deforestation”, in facilitating training and capacity building for small-holders that form the foundation of the supply chain; cooperation between the National Park Agency and the private sector in Kerinci-Seblat National park for water and environmental services, enhancing existing partnerships in the KEE design between the government, private sector and NGOs in Bengkulu; support for establishment of an elephant corridor through land managed by rubber and palm oil companies. In Moyo landscape, private sector collaboration will involve engagement with tour operators, hotel management and tourism accommodation facilities. This outcome will support the active engagement of the private sector in supporting species conservation practices (including reduction of human-wildlife conflict, promoting conservation best practices and establishment of corridors, partnering with local communities in community conservation and livelihood improvement efforts and engaging in patrolling to reduce poaching and IWT. It will also support the promotion of incentive/reward systems to encourage private sector business participation in reducing forest degradation and promoting wildlife conservation in palm oil plantations and forest concessions in Ulu Masen and Bengkulu and improved private sector financing for conservation actions within the landscapes. In addition, this outcome will support the promotion of community biodiversity-friendly livelihood and business enterprises to avoid biodiversity loss and lead to natural resources use sustainability as well as supporting innovative hunting practices, particular in Moyo island through increasing population of hunting animals and subsequent introduction of sustainable hunting practices and sustainable use of wildlife resources based on agreed regulatory standards that financially benefit local communities. The support for hunting operations will come from private sector or other sources of funding, in particular for training,

marketing and promotion as this activity is expected to be self-financing. The assessment of livelihood practices will emphasize on mapping COVID-19's and climate impact (both socio-economic and health) on vulnerable populations to identify specific investments to respond to, and ensure income recovery for these populations as well as improving awareness of risks of transmission including emergence of zoonotic diseases.

Output 3.1: Private industrial plantation and extractive forest concession partners actively engaged in environmentally-friendly practices

82. Under this Output, the project will support partnerships between private sector-community-local government in order to create incentives for undertaking conservation-friendly activities through introduction of best practices. On the basis of the outcome of Outputs 1.3 (Planning of KEEs) and 1.1 (Development and implementation of Key species strategies and action plans) and the spatial mapping and planning of KEE in the three pilot landscapes, this Output will support negotiations with private industrial plantations (e.g. oil palm and forest concessions) to agree on conservation measures (including in particular creation of corridors, improving biodiversity-friendly plantation and concession operations and monitoring) that needs to be instituted within the private industrial lands. A list of private concessions within the two landscapes sites at Ulu Mased and Seblat is provide in Table 3. The private concessionaries will be selected based on the following criteria: (i) location of concessionaries within the proposed KEE areas, and in particular the wildlife corridor areas; (ii) willingness to participate in conservation action and track record; and (iii) suitability based on completion of UNDP's Due Diligence requirement. This is to conserve key species and their habitats and to reduce or eliminate practices that are detrimental to the survival of such species. The following activities are planned under this Output:

    3.1.1. **Consultation and negotiations with selected private sector entities in each project site** to agree on specific management measures to be instituted by the private entities to conserve key threatened species, protect their migratory routes and minimize threats that are detrimental to these species. This will entail review of key species action plans and KEE management prescriptions with participating private sector entities to agree on key measures that the private sector entities are willing to incorporate within their estates to support conservation. This in particular will include: (i) setting aside certain areas within the plantation or concession areas as corridors to facilitate key species movement; (ii) conservation of forests and forest lands; (iii) other conservation measures to enhance biodiversity outcomes in silvicultural practices within their areas of operation; and (iv) measures to be instituted to monitor and patrol their estates with the intent to facilitate unhindered key species movements, reduce conflict and poaching;
    3.1.2. **Private companies within the KEE areas adopt agreements** with the Provincial BKSDA (or relevant authority) to implement activities under 3.1.1 that might entail spatial set-asides or restore forests for corridor space within the concession, a change in the company's corporate responsibility to the environment, and its commitment to key species conservation and business model;
    3.1.3. **Provision of technical support, extension services and collaboration** to enhance the capacity of the participating private sector entities to implement and monitor the agreed conservation measures;
    3.1.4. **Critical corridors set-aside within plantation areas with improved protection** as a means to facilitate key threatened species conservation and movement.
    3.1.5. **Promote private-community partnerships to improve cooperation and engagement in conservation activities in areas adjacent to industrial plantations and forest concessions** with improved private financing and cooperation. This could include support for village and customary forest conservation and community patrolling within and adjacent to plantations.

Table 3: Private Concessions within Landscape Sites (Ulu Masen and Seblat)

Company Name	**Type of Concession**	**Total Area (Ha)**
ULU MASEN (WEST SUMATRA)		
PT. BEUNA COKLAT CORP	Oil palm company	4714.91

PT. PAOH LAOT PERKASA	Oil palm company	4927.45
PT. HASPUTRA GEULIGA	Oil palm company	3545.53
TEUMARON (BAPCO)	Oil palm company	7047.81
PT. MOPOLI RAYA	Oil palm company	3603.41
PT. MOPOLI RAYA	Oil palm company	3285.17
PT. BENIH TAMIANG	Oil palm company	5865.39
PT. POTENSI BUMI SAKTI	Oil palm company	6430.85
PT. POTENSI BUMI SAKTI	Oil palm company	320.81
PT. Fajar Baizury & Brother	Oil palm company	3150.98
PT. Fajar Baizury & Brother	Oil palm company	5229.02
PT. BOSWA MEGALOPOLIS	Oil palm company	3286.67
KSU. MUDA MUFAKAT	Oil palm company	170.65
KEBUN SAWIT RAKYAT	Oil palm company	452.39
KEBUN SAWIT RAKYAT	Oil palm company	580.99
PT. MEKAR ARESTA UTAMA	Oil palm company	114.75
PT. MOPOLI RAYA	Oil palm company	2668.73
PT. UJUNG RAJA NUSA	Oil palm company	116.93
PT. DAYA SEMPURNA SEJATI	Oil palm company	119.51
PT. PULAU RAYA SENTOSA	Oil palm company	133.82
PT. RS. LEUPUNG	Oil palm company	158.22
PT. GASCO INDAH	Oil palm company	190.43
PT. ACEH NUSA INDRAPURI	Forest concession	122,462.33
PT. TUSAM HUTANI LESTARI	Forest concession	87,731.00
SEBLAT (CENTRAL SUMATRA)		
DARIA DHARMA PRATAMA	Oil palm company	12,625.14
PT. PD PATI	Oil palm company	3126.00
PT. ALNO AGRO UTAMA	Oil palm company	13,283.43
PT. AGRICINAL (PONDOK SUGUH)	Oil palm company	1756.00
PT. AGRICINAL (PUTRI HIJAU)	Oil palm company	8902.00
PT. ANUGERAH PRATAMA INSPIRASI	Forest concession	33070.00
PT. SIPEF	Restoration Ecosystem (for C Trade)	12672.00

Output 3.2: Incentive/reward system developed and implemented in private sector business planning to reduce/halt forest degradation and improve wildlife conservation in forest concessions

83. While there is currently the green award for private companies working on ecosystem restoration activities, there is a lack of similar rewards/incentives for entities that are involved in production related businesses, such as industrial timber plantation (HTI), forest concession right holders (HPH), or palm oil plantations. This project will support the initiation of recognition to support species conservation at the provincial level, initially as a trail, with the hope that this can be later extended nationally. For example, the Governor can provide yearly awards to private sector operating in its territory that have contributed to conservation efforts to conserve the elephant and/or tiger as part of their business operations.

84. To promote such an incentive/award system, the project will support the following indicative activities:

3.2.1. **Providing technical support to help interested large private industry to develop business models oriented to species conservation** through the study of already existing business models, assessing its suitability in the local context and provide recommendations for improved business planning processes. The project will provide technical support to assess economic feasibility of alternative business models for plantations and extractive industries premised on good environmental governance and practice

3.2.2. **Technical support, extension and training to smallholders** to adopt environmentally friendly plantation and production systems that support species conservation

3.2.3. **Develop best management practice material for private sector** to support interest in a new business models that are environmentally appropriate

3.2.4. **Develop and operationalize recognition for good environmental practices through award systems at the provincial level,** including in particular criteria and procedures for initiating a **Governor Award at provincial level for companies and smallholders providing support for elephant/tiger conservation.**

Output 3.3: Innovative mechanisms that promote sustainable traditional hunting practices by integrating local wisdom and experiences to generate revenues for local communities (particularly in Moyo landscape)

85. In Indonesia, hunting parks (e.g. Moyo Hunting Park) are intended to provide an alternative conservation model to traditional protected areas, where protection is a high priority. As there is a tradition of hunting in Indonesia, this alternative model is intended to encourage traditional hunting practices with strict rules and protocols to ensure that it is ecologically and economically sustainable. The hunting park that is targeted is Taman Buru Moyo, in the Moyo landscape in Nusa Tenggara. Traditionally, people have hunted the Javan deer (*Rusa timorensis*) and in the context of the project it is proposed to select appropriate species (1-2) and pilot community breeding, rehabilitation and introduction of species to the wild with the intent of creating a sufficiently large and stable population to promote sustainable use of wildlife resources and selective trophy hunting, the proceeds of which can be channeled to local communities to create incentives for conservation. While this is novel idea, it would necessitate extensive biological and economic feasibility assessment and preliminary studies to assess suitability of species, specific forest locations and communities to promote the breeding and reintroductions, habitat improvements, defining viable population numbers before harvest and hunting is open, harvest times and harvest takes, etc. For this output, non-GEF resources will be used for initial assessments and studies, and any investment on the activity (captive breeding, restoration and trophy hunting) will either be funded by the government or private sector and the operation itself, is expected to be self-financing. This will require establishing scientific monitoring protocols that are overseen and monitored by scientific experts.

86. The following are indicative activities for this Output:

3.3.1**. Detailed assessment of viability of promoting sustainable use of wildlife resources and hunting from a biological and economic perspective and development of planning approaches** mainly from the context of the target hunting species, captive breeding techniques and strategy, habitat restoration strategy, release strategy, etc.

3.3.2. **Implement captive breeding of selected species** defining guidelines and procedures for captive breeding within the park and also community breeding if appropriate, infrastructure needs for captive breeding, acquiring breeding stock, animal health and veterinary facilities, guidelines for release to the wild and establishing population numbers for trophy hunting;

3.3.3 **Preparation of regulations for sustainable harvest and hunting** including population thresholds in the wild, harvest seasons and numbers, harvest and hunting methods and locations, hunting trophy rates and revenues to be channeled to the conservation area and local communities, health aspects linked to zoonosis, etc. The regulations for sustainable hunting should also take into account the needs of local communities who might also hunt for their own use within the hunting park.

3.3.4 Establishing and demonstrating fund flow mechanisms to channel revenues to local communities as part of the effort to improve conservation support.

3.3.5. **Promotion and marketing of trophy hunting** through various social media channels and special publicity events; and

3.3.6 **Establishing a robust monitoring program** to assess the health of the selected hunting species to determine harvest and hunting limits, recuperation rates, ex-situ breeding rates, etc.

Output 3.4: Community-based biodiversity-friendly livelihood and business enterprises promoted for sustainable use of natural resources and avoid biodiversity loss

87. In order to address the lack of opportunities for alternative livelihoods for rural communities and stem the impacts of unsustainable practices, this Output will work towards improving direct financial benefits from biological resources by engaging communities and the private sector in promotion of economically important biodiversity-friendly livelihoods and business enterprises within the three landscapes. Creation of new and/or enhancing existing value chains will be the strategy to secure local livelihoods. Some value chains identified are non-timber forest products, including bamboo, ratan, kepayang (*Pangium edule*) and honey, as well as high value fruit trees and other perennials such as rambutan (*Nephelium lappaceum*), durain (*Durian zibethinus*) and nutmeg (*Myristica fragrans*). Special investments will be targeted to livelihoods and enterprises that can directly benefit women and disadvantaged groups. This Output builds on the lessons from previous ICDP-related programs (such as the Kerinci-Seblat ICDP) in that it is more narrowly focused on promotion of improved livelihoods and community managed small business enterprises through partnership with private sector rather than on physical village infrastructure development, goods and cooperatives that might not demonstrate short-term obvious tangible economic benefits to the community. Further this activity will support efforts to attract non-GEF resources through a promising number of financial instruments that have been evaluated by BIOFIN. These can be one or more of the following, depending on the assessment of their feasibility, including in particularly the BIOFIN identified prioritized financial solutions for biodiversity, such as green-financing initiatives of Islamic funds for biodiversity and environment (including zakat, waqf, sadaqa and infaq), ecological fiscal transfers (EFT), green sukuk, Corporate Social Responsibility (CSR), crowdfunding and optimization of village funds[18]. The lessons from previous project was that community engagement was entirely dependent of GEF funds over a short-term period of the project, but that ensuring sustainability dependent on long-term engagement and availability of resources to enable communities to develop sustainable livelihoods and business enterprises that need time to develop. Additionally, unlike previous ICDPs, the KEE approach provides a formal institutional arrangement (KEE management forum) for direct engagement of stakeholders, including local communities and ensuring that they have a voice in decision-making and potential access to funding from provincial governments for maintenance of KEE investments on the longer-term.

88. The project will undertake inventories, evaluation and profiling of existing biodiversity-friendly enterprises (agricultural products, NTFPs, ecotourism) to (i) create databases for best practice biodiversity-friendly enterprises; (ii) recognize their practices/operations and provide necessary support for their development; and (iii) use them for knowledge-sharing and learning for details of procedures for establishing biodiversity-friendly livelihood and business enterprises. A potential menu of livelihood options is presented in Table 4. In particular this Output would entail the following:

3.4.1 **Inventory and development of databas**e on biodiversity-friendly enterprises that are suitable for each project landscape;

3.4.2 **Identification of biodiversity-friendly enterprises and analysis of value chains** based on market potential, economic and environmental feasibility, and will require mapping of (i) market potential of product/services; (ii) customer requirements; and (iii) the challenges faced by marketers/customers.

[18] *Zakat*: supported by obligatory contribution by wealthy Muslims that is available for the economically insecure communities: *Waqf*: charitable trust created by legal actions of donors to transfer physical assets or cash to benefit the general public; *Sadaqa*: Voluntary charity for small infrastructure, water supply, crops and small local business; *Infaq*: type of charity in Islam that is given without any expectation of reward or return; *Green Sukuk*: leveraged private finance for green sustainable projects; ETI: fiscal transfers for environmental and ecological initiatives through revenue-sharing arrangements between various levels of government; Crowdfunding: It allows individuals to contribute directly to, and invest in biodiversity-related activities.

Based on market data, existing value chain gaps will be assessed where gaps and opportunities will be identified. Interventions will be designed and implemented to complement and enhance ongoing interventions of the government, donor agencies and the private sector. Potential enterprises may center around non-timber forest products, including bamboo, rattan, kepayang (*Pangium edule*) and honey as well as high value fruit trees and other perennials such as durian (*Durian zibethinus*), rambutan (*Nephelium lappaceum*), and nutmeg (*Myristica fragrans*) that can be promoted through partnership with the Provincial departments of Agriculture, Forest Management Unit and private sector business houses, NGOs, research institutions, and other relevant provincial-government-led initiatives such as village forest and kebun rakyat or community garden

3.4.3 **Capacity building and linkages with service providers for supporting at least 20 small start-up grants for product development, branding and commercialization in each landscape,** including smallholders producers and service providers to help them understand customer requirements, increase productivity, learn business and marketing skills, and develop new products/services. The project will ensure to focus on women beneficiaries or women headed households to ensure the project achieve intended target of 30% women beneficiaries. The project will help access technical, financial and infrastructure support (small processing, storage and marketing facilities) from private sector and relevant provincial government entities. It will also explore the potential of local branding, and GI registration where relevant;

3.4.4 **Community grants for co-investment in biodiversity-friendly micro-small-medium enterprises (MSMEs)** involving at least five existing or new community associations/organizations in each landscape will be organized and/or existing ones supported, to initiate collective production and marketing of biodiversity-friendly products, in partnership with private institutional buyers. The selection criteria must ensure gender equality and women's empowerment. The project will directly support co-investment schemes to establish biodiversity-friendly Micro, Small and medium Enterprises (MSMEs) and seek to specifically ensure that vulnerable communities that are affected by COVID-19 pandemic and face risks from emergence of future zoonotic disease are targeted. The latter will entail an assessment of the social and economic impacts of ongoing COVID-19 on vulnerable populations and climate risks as part of the ESMP preparation, map hotspots and develop plans for those affected communities in responding to and ensuring income recovery for affected vulnerable populations and target specific livelihood interventions to facilitate such recovery as well as improve awareness of risks to zoonotic diseases. The project's intervention will also focus on increasing awareness and knowledge of communities to risks from future emergence and transmission of zoonotic diseases and prevention. Additionally, this activity will investigate opportunities for access to additional sources of financing, such as through the green-financing initiatives, the village fund and resources through the annual budgets of the provincial governments. The grants for community activities (including in Components 1 and 2) will build on lessons from the GEF-EPASS project (GEF ID: 4867) that has established guidelines for outlining the selection procedure, fund disbursement and reporting. UNDP will work with IP to develop a project specific SOP/technical guideline to administer and govern small grants to local community-based or NGO. The SOP/technical guidelines will also include UNDP's CSO engagement process along with IP's policies and procedures. Transparency, accountability and impartiality are the important values to be applied in the selection process of grantees. UNDP's project assurance representative will sit as observer in the selection of the grantees and ensure due diligence to oversee the grant administration and ensure minimum fiduciary standards of fund utilization and reporting are practiced. This will be ensured through the Annual Work Planning (AWP) process, through verification of supporting documents at the time of fund requisition and expenditure reporting, spot checks, NIM audit, field monitoring and interaction with the grantees.

3.4.5 **Promote community-based ecotourism ventures** through: (i) assessing tourism opportunities and opportunities for participation of local communities, including customary communities; (ii) development and improvement of guidelines and training to support voluntary conservation ethics amongst hotels, guesthouses and tourism facilities, tourism activities, and tourism products that operate in the landscapes; and (iii) strengthening selected tourism products and services that recognize KEE conservation principles. The project can build on a number of successful community

ecotourism models such as *Tangkahan* that allows tourists to join captive elephants at the Conservation Response Unit (CRU) at Gunung Leuser National Park in their afternoon baths in the river and generate revenues to the local community. While international tourism is not a big revenue generator in the three project sites, given the pandemic situation, the emphasis initially would be on options for promoting national tourism and other income generation. Project activities will be designed to enhance capacities of local ecotourism actors in practicing Covid-responsive measures for ecotourism and adjust tourism activities packages accordingly (for example: small group tour, selling local product through an online platform, etc), in accordance with the guidelines from MoEF and other reliable sources. Additionally, innovation for virtual ecotourism will be sought for, by collaborating with qualified NGOs or institutions which have successfully established a robust platform for virtual ecotourism.

Table 4: Potential menu of alternative livelihood options

Moyo	Ulu Masen	Seblat
Cashew	Honey collection	Cocoa
Sesame seed farming	Cocoa	Sustainable coffee
Coconut cultivation	Ecotourism	Small holder rubber
Textiles	Sustainable Coffee	Ecotourism, home stay
Culinary expertise	Fish ponds	Bamboo plantation
Rain fed rice	Livestock	Bamboo handicraft
Livestock, chickens	Patchouli - aromatic mint	Rattan handicraft
Ecotourism: home stays, tour guides, etc.	Stingless bee (*Trigona*) farm	Livestock, cattle
Sustainable Fishing	Jernang – natural dyes	Indigenous rice
Honey collection	Bamboo and rattan handicraft	Agroforestry
Tassel jewelry	Pine tree Resin	Mushroom
	Shrimps farm	Horticulture and aromatic plant value chains
	Bamboo plantation	Home gardens
	Horticulture and aromatic plant value chains	Candlewood
	Indigenous rice	Apiculture
	Agroforestry	Agroforestry stinky bean / *jengkol* (*Archidendron pauciflorum*)
	Mushroom	
	Home gardens	
	Palm sugar (aren)	
	Candlenut (Kemeri)	
	Bitter bean (petai)	
	Fruit-cocoa agroforestry	
	Cinnamon monoculture	
	Apiculture	

Component 4: Upscaling/replication of project approaches at national and regional level

Total Cost: US$ 5,398,053; GEF project grant requested: US$ 498,053; Co-financing: US$ 4,900,000

Outcome 4: Effective knowledge management, gender mainstreaming and monitoring and evaluation for key species conservation enhanced

Baseline conditions for this outcome (without GEF project):

89. Some inequities exist in terms of gaps in information sharing, knowledge, and attitudes amongst women and other disadvantaged groups in the country in particular related to conservation. Local traditional knowledge on sustainable forest and land management practices, while it exist, will likely continue to be guarded and segregated by gender, and while there are currently efforts at sharing knowledge using public media and other social networks, this is likely to continue to advance at its own slow pace. Knowledge and understanding of the relationship between biodiversity conservation, threatened species conservation, protected areas and sustainable forest and land management and human welfare will remain unclear. Likewise, priorities for information collection to include gender, indigenous people and vulnerable people's concerns will also likely be undervalued. Considerations on gender and biodiversity that require examining the influence of gender roles and gender relations on the access and attitudes to use and management and conservation of biodiversity by men and women are required to advance awareness and conservation action. Without this project, gender inequality in relation to access to resources, including time; differences in impacts that men experience in relation to agriculture and impacts of climate and disaster risks and; differences in relation to knowledge at the institutional and ground level regarding biodiversity would persist. This has an impact on men and women's roles in conservation of habitat of threatened species and their associated habitats. Traditional wisdom if it persists, will likely continue to be unappreciated, only partly documented and segregated by gender. The overall limited appreciation of conservation values in general and limited understanding of the concept of landscape or landscape level planning and need to protect habitats outside PAs, will persist. Significant gaps in understanding of terrestrial and freshwater habitats, both at the institutional level and at the community level will continue to exist, and the impacts of poor land management and exploitative industrial plantation and extractive practices will remain not well understood. Management of land, forest, freshwater and biological resources data will continue to be limited. Despite its growing use of media, without the GEF increment, communications will modernize only slowly. While much information is generated through "projects", this information is likely to continue to be compartmentalized and not widely shared outside of the close circle of project implementers and likely not broadly shared with the international community.

Alternative for this outcome (with GEF project):

90. The goals of Outcome 4 that will be implemented at the provincial/landscape levels are: (i) improving knowledge and information collection and management systems to enhance awareness about best practices on conservation of habitats and migratory corridors of threatened species like the elephant and tiger and their associated biodiversity and ecosystems through communication, documentation and dissemination; (ii) supporting the strengthening provincial policies and programs that support conservation and sustainable use at a landscape level so as to ensure inter-connectivity of habitats; (iii) ensuring gender considerations are mainstreamed into conservation and natural resources planning and management at the landscape level; (iv) monitoring and evaluating project investments to ensure that these are meeting project outcomes and contribute to Indonesia's efforts at conservation of the elephant, tiger and yellow-crested cockatoo and ongoing development agendas; and (v) contribute to the knowledge generation and dissemination across GWP partner countries of best practices in conservation of threatened species as well as benefit from the knowledge generated through wide network of partners coordinated by GWP. To achieve such an objective requires the improved understanding and participation of key target groups (decision makers and staff from key sectors), non-governmental organizations, as well as community groups (including indigenous people), private sector investors, researchers and others, including in particular women and the most vulnerable segments of the population on best practices at species and habitat conservation, particularly at the provincial and landscape levels.

91. The development of a knowledge management and communication strategy (Annex 13) is intended to promote meaningful stakeholder awareness, understanding and participation in threatened species and biodiversity conservation, promote connectivity between key habitats through production landscapes, sustainable natural

resource use and alternative livelihood as well as to document, disseminate and scale up successful lessons and best practices in resource conservation from the target landscapes in the project area and beyond. This will be accomplished through awareness campaigns, and creation and maintenance of an online public access database and documentation repository. Expanding the role of knowledge management is key to enabling a gender-equity perspective to inform how information is collected, prioritized, shared, communicated, and used within multiple use landscape planning, agriculture and forest development, tourism development, and biodiversity conservation and management, according to the Gender Analysis and Mainstreaming Action Plan (Annex 12). Similarly, the development and implementation of the Environmental and Social Management Plan (ESMP) and conduct of an Environmental and Social Impact assessment (ESIA) based on the Social and Environmental Screening Procedures (SESP – Annex 10) and Environmental and Social Management Framework (ESMF – Annex 20) will ensure that social and environmental impacts are adequately managed and that Indigenous People are adequately informed, consulted, participate and benefit from project investments (refer Annex 11 of Customary Communities Engagement Framework).

92. One of the main outcomes of the project will be to contribute to the GWP's overall impact, including specifically tolearn from other country programs, initiatives and evaluations on efforts at conservation of threatened species and habitst. In this respect the project will ensure that lessons and best practices are made available through the formal knowledge management platforms created for sharing lessons across GWP countries as well as through other means of communications with relevant countries to share information of IWT and other common aspects.

Output 4.1: Knowledge Management and Communications, Gender Mainstreaming and Monitoring and Evaluation strategies developed and implemented

93. The implementation of the Knowledge Management and Communication Strategy (Annex 13) and Gender Analysis and Mainstreaming Action Plan (Annex 12) will be key to the overall goal of creating bridges between the stakeholders from the grass-roots to the provincial, district and community levels to document best practices and results of the project in terms of management of multiple use landscapes in support of conservation at the project landscape level. It will also ensure the flow of information, exchange of ideas and implementation and mainstreaming of gender in community-based conservation practice and sustainable natural resources management. The communication strategy is aimed at making "mainstreaming biodiversity and sustainable natural resource use" a priority for large terrestrial multiple use biological landscapes that will help build visibility to the conservation needs of these ecosystems (as relevant depending on the biological landscape site and its components) and support conservation of threatened species. The strategy will serve to connect stakeholders such as policy makers, media, research and academic institutes, the private sector, NGO's, Community-based Organizations (CBOs) and the general public through a comprehensive program, from consultations, brand building to outreach and information dissemination. Annex 13 also provides a list of indicative knowledge management and communication tools for the project. It also intends to develop among stakeholders ownership to the goals of the project – of shared knowledge, experiences, inputs and ideas for effective action. An objective the gender analysis and mainstreaming action plan (Annex 12) is to enhance the role of women in conservation-based actions by providing for their voice to be heard in the decision making process related to conservation, sustainable resource management, livelihood from and local to national level activities.

94. This Output would be supported through the following activities:

4.1.1 Following a KAP survey in the first quarter of project implementation, develop a **knowledge management and communication action plan for the project landscapes** based on overall knowledge management and communication framework (Annex 13) so that (i) the project is well understood, accepted, and implemented effectively and equitably; (ii) knowledge and lessons learned in terms of conservation best practices in production landscapes and protection of connective corridors for the elephant and tiger, in particular of this project are captured,

documented and used to improve current and future project practices; (iii) understanding of biological landscape planning and management is increased as a effective tool to enhance protection of key species habitats; (iv) implementation and upscaling of best practices is improved; (v) the public develops an environmental ethic and an increased awareness and understanding of biodiversity conservation and threats to key threatened species, and (vi) knowledge management products are shared and used;

4.1.2 **Implementation of a gender analysis and mainstreaming action plan at the landscape levels** (Annex 12) so that: (i) a gender and socially inclusive perspective is applied to every set of activities; (ii) research on gender and social roles in the biological landscape informs resulting plans and ensures equitable distribution of benefits; and (iii) information and sex-disaggregated data are collected and shared within all components of the project;

4.1.3 **Implementation of Environmental and Social Management Plan (based on Annex 20) and Customary Community Management Plan (based on Annex 11)** so that (i) any potential environmental and social impacts are adequately managed; and (ii) customary communities are adequately consulted, participate and directly benefit from project investments and any impacts on these communities are adequately managed, respectively;

4.1.4 **Training of staff of Provincial BKSDA and provincial government agencies and other stakeholders such as CSOs and community organizations** on application of gender mainstreaming, management of environmental and social impacts and ensuring that customary communities are adequately informed, consulted, participate and benefits from and project activities;

4.1.5 **Design of communication materials and programs for the three landscapes** (local language, teaching materials for schools, etc.)

4.1.6 **Conduct of awareness and outreach activities** for a variety of stakeholders at the provincial, district and local levels such as competitions, website, mass media, video and film, ranger programs, festivals, etc. Special efforts will be targeted at vulnerable populations in hotspots of Covid-19 disease outbreaks and those that are vulnerable to climate impacts on the risks associated with the disease and measures to prevent disease infection**;**

4.1.7 **Preparation of an Monitoring and Evaluation (M&E) plan** including Identification of a suite of biological and socio-economic indicators, a strategy for collecting information on them, and for sharing information to facilitate review and regular update of M&E plan, including results framework baselines, tracking tools, Theory of Change to subsequently adopt these findings to implement all aspects of the project; and

4.1.8 Conduct **mid-term and terminal evaluation** in line with UNDP/GEF requirements and incorporate and adapt recommendations of mid-term review (MTR) to revised project plans and monitor their implementation.

Output 4.2: Harmonized information management system to integrate lessons from the biological landscapes and user friendly operational

95. The project will complement and build on existing information management systems established under the on-going GEF project in Indonesia, in particular the GEF IWT, Tiger and EPASS projects. The IWT project has developed a specific database related to law enforcement that provides intelligence/cybercrime analyses covering all IWT priority species and supported by protocols for information sharing. The GEF Tiger project aims to establish a tiger, prey and forest habitat monitoring information management system and the GEF EPASS project has developed an island wide biodiversity monitoring system for PAs.

96. However, while the information generated through the project will feed into the existing database related to IWT and law enforcement, the GEF database developed for tiger and the EPASS related to PAs - the project in particular will try to integrate the information generated in relation to landscape-based interventions. In this regard there are numerous databases in Indonesia that are relevant, and the project will contribute to these existing databases and information sharing platforms, including at the Provincial BKSDAs and Provincial

Government Level in the project landscapes. Data collection at landscape level will be integrated along with an improvement of the existing databases at Provincial BKSDA and National KSDAE. Standards and information developed in Components 1, 2 and 3 will include transferring all information into a digital format as well as establishing regular periods for information transfer. This database will support the collection and documentation of detailed information on threatened and endangered species, habitats, threats, and conservation actions, ultimately improving the overall provincial capacity (as well as national capacity) and the ability to effectively target threats and risks. Initial data management will be at the project levels that could be later expanded at the provincial and subsequently at the national level. Mechanisms for protecting sensitive data will be put in place. Output 4.2 will support the following activities:

4.2.1 Development or strengthening design of a **simplified and standardized information management** (including website and social media platforms) for biological landscapes, including standards for information collection and sharing that would be integrated into existing databases at Provincial BKSDA levels initially and later into national KSDAE database; and

4.2.2 **The above upgraded system** operationalized, initially collection and documentation of detailed information on threatened, endangered and other key species, habitats, threats, and conservation actions from the project landscape, ultimately expanding and improving the overall provincial and later to national capacity and the ability to effectively target threats and risks, including data collection, input, on-line website and dissemination. This would be initially undertaken at the three pilot landscapes. While the EPASS database is confined to PAs, this activity will either integrate information into a broadened EPASS database that is expanded to cover non-PAs or in the alternative supports a stand-alone database that specific is relevant to non-PAs;

4.2.3 Setting up **information collection standards** that are gender and socially inclusive; identify software and devices for standardized inputting and recording of information; and provide for digital access and sharing, including compatibility with existing databases as feasible, building on the data generated from project landscape;

4.2.4 **Development of guidelines on information** needs for management of threats, apprehensions, evidence collection and prosecutions;

4.2.5 **Support an institutional platform to collect, digitally catalog and disseminate biological information** at the three landscape sites that would later feed into the national system developed by KSDAE.

4.2.6 **Training and skills development** of staff of KSDAE and its directorates, Provincial BKSDA, Provincial Forestry Departments, Provincial administration, CSOs, local community organizations and other relevant entities for effective mobile application and data management; and

4.2.7 **Improving server facilities** at KSDAE and Provincial BKSDAs at the project landscape level.

Output 4.3: Knowledge Management and gender mainstreaming contribute to sharing of learning and advance replication and scaling up of gender sensitive biodiversity management approaches elsewhere in the country.

97. Promotion of integrated OECMs or KEE, as well as innovative approaches to conservation, sustainable land and industrial plantation, IWT and HWC conflict management, and sustainable livelihoods will be facilitated through a set of recommendations that can guide and influence future provincial and later national level plans, programs and practices. Consultations with stakeholders from government, research organizations, CSOs and others would be expanded to further assess needs and gaps in policy outreach and advocacy. Additionally, as part of the GWP, the project will share lessons and best practices, including on forensics, and benefit from similar experiences in other countries through various mechanisms instituted under the GWP/MSP. Sharing of lessons will be achieved through making available knowledge management products, reports and publications and monitoring results with the GWP global platform. Project staff will also participate in GWP events, annual lesson sharing and IWT networks

98. A sustainability/replication strategy will be formulated in the second half of the project based on lessons learned at the project landscape level that will ensure that the integrated OECMs or KEE management planning approaches and models developed and tested in the project landscapes can be scaled up to other biological landscapes within the country. This Output would support the analysis, documentation and dissemination of best practices and lessons learned from the project that deliver tangible improvements in threatened species conservation and biodiversity and natural resources status, industrial and extractive industry biological sustainability and corridor management to provide examples for replication. It would also entail participation of project staff and partners in national, regional and international workshops, conferences and field visits to improve learning and exchange of experiences in mainstreaming biodiversity and gender considerations with threatened species habitats. Based on these best practices and lessons learned, the sustainability/replication strategy will provide a basis for actions in other key landscapes and areas, identify required institutional and coordination arrangements, resources and partnership commitments.

99. Key activities under Output 4.3 will include:

4.3.1 **Documentation and dissemination** of case studies, best practices and lessons learned from the project;

4.3.2 Development of **policy guidance notes** that addresses current constraints and gaps in existing policies and legislation for KEE management, HWC and IWT mitigation and management and monitoring of KEE site health;

4.3.3 **Technical reports, publications and other knowledge management products** (including popular versions for use by community groups in local languages and accessible to women and customary communities) documented and disseminated via mass media;

4.3.4 **Documentation of traditional wisdom** related to conservation, natural resources management and dissemination to avoid the erosion of such wisdom;

4.3.5 **National and provincial level workshops** to facilitate dissemination of field lessons and help inform legal and policy reform relevant to large threatened species landscape conservation practice. The initial documentation of these lessons will be included as part of the participatory monitoring process, that would be complemented by additional national technical support to distil and document lessons and experiences. The project will support workshops at the landscape level (Year 5) to share lessons and experiences and a national workshop at the end of Year 6 to facilitate the sharing of lessons more widely, but importantly to be able to further develop and refine successful approaches for replication nationally;

4.3.6 Efforts would be made to **institutionalize some of the best practices** through promotion of sectoral and/or national regulatory instruments in order to expand access to finance for replication and up-scaling. The project will collaborate with the private and public sector financial institutions to support local associations, landowners and other land users;

4.3.7 Sharing lessons and best practices, including on forensics through various mechanisms instituted under the GWP. Sharing of lessons will be achieved through making available knowledge management products, reports and publications and monitoring results with the GWP platform.

4.3.8 Capacity building and technical support for **dissemination and upscaling** of project best practices to facilitate integrated landscape planning approaches, initially within the project provinces and later in other areas within Indonesia

4.3.9 **Inclusion of public engagement pages** on national and provincial websites and social media platforms that link to information about the project and its products, including development of a specific public information sharing platform. This in particular could serve to share information with KSDAE, Provincial BKSDAs, Conservation Area managers, sector agencies, provincial institutions, private industry, beneficiaries, local communities, NGOs and government entities;

4.3.10 Preparation of a **replication and scaling up strategy** based on project experiences and best practices for promotion of integrated planning and management (including conservation corridors), including

institutional, financial and resource requirements, partners and coordination arrangements;

4.3.11 An **Implementer's Manual and Lessons Learned guide** (with contributions from project partners) that captures the process of project implementation, and describes Integrated OECMs or KEE management approach, monitoring OECMs or KEE strategies for landscapes, SFM and SLM approaches, conservation practices in industrial plantations and extractive industry, sustainable livelihood improvements, mainstreaming of biodiversity in provincial and private sector planning, etc.; and

4.3.12 **End of project national seminar on** outcomes of integrated gender sensitive integrated OECMs or KEE approaches in Indonesia

Partnerships:

100. The proposed project will coordinate with selected government programs and projects to share lessons learned and best practices. They key national Environment and Natural Resources sectors to work with include: Central Government Agencies (Ministry of Environment & Forestry-MOEF, Ministry of Agriculture, Ministry of Marine & Fisheries Affairs, Ministry of Tourism & Creative Economic, National Development Agency), local government units (Forestry Services, Agriculture Services, Fisheries Services, Forest Management Unit), universities (University of Syiah Kuala, University of Bengkulu & University of Sumbawa), Conservation NGOs and others. In the industrial plantation sector, the key national agencies to work with would be the Ministry of Agriculture, MOEF, etc. On Customary Community concerns, the project would work closely with the AMAN foundation and Indonesian Indigenous People Alliance and Customary Land Registration Body (BRWA).

101. In the context of the above and related core programs, the project will collaborate with agencies on knowledge and lessons learned from important, recently completed projects (which are described in the various sections of the project design), as well as ongoing and pipeline projects (usually assisted by donor/development partners). Collaboration with ongoing and pipeline projects would primarily aim to synergize planning and implementation with concerned projects in common sites. For projects without common sites, the main purpose is to build on each other's field methodologies and share information needed for policy dialogue. The following are the key ongoing and pipeline projects [19]

Table 5. Partnership Arrangements

Name of on-going and planned program/project, years of implementation and sites	Program/project objectives and targets	How proposed UNDP/GEF project will collaborate with the program/project?
Ulu Masen: Tropical Forest Conservation Act (TFCA) Sumatra Program, 2015-2023, 13 landscape priorities in Sumatra	Strengthen institution and policy at all level Strengthen intervention on forest ecology at landscape level Ensure sustainability of key species Strengthen the local communities, welfare and income	GEF CONSERVE Project focuses on supporting elephant and tiger corridor and monitoring areas to ensure that several important species are safe from threats. The reduction of the Sumatran elephant or tiger conflict and policy in the long-term status of habitat protection are niches of activities that are expected to be synergistic with the TFCA project.
Ulu Masen: Governors' Climate and Forests Task Force Support Network, 2020-2023	Support the implementation of climate change mitigation	GEF CONSERVE Project will share the same objective to protect and monitor Ulu Masen forest area, to provide the most benefit of carbon stock from the area. This network will contribute and guide actions of the project

[19] The list includes Projects that officially ended in Dec 2019, although some may be extended. They would have important knowledge products that can help in the implementation planning of this Project.

Name of on-going and planned program/project, years of implementation and sites	Program/project objectives and targets	How proposed UNDP/GEF project will collaborate with the program/project?
Ulu Masen: GEF Combatting illegal and unsustainable trade in endangered species (GEF 6)	Reduce the volume of unsustainable wildlife trade and the rate of loss of globally significant biodiversity in Indonesia and East and South-East Asia.	GEF CONSERVE will build on the investments under GEF 6, to further strengthen in-country capacity for wildlife forensics techniques through the Eijkman Institute and TRACE Wildlife Forensics Network to improve local regional capacity by targeting Universities and NGOs at the targeted sites namely in Aceh, Bengkulu and West Nusa Tenggara. It will also expand the application of national policies, legal and institutional frameworks and enforcement built under the GEF 6 project to the project sites. The target site in Ulu Masen is Gurung Leuser national park
Seblat: Sumatran Tiger Project, GEF-UNDP, 2017-2021	To enhance biodiversity conservation in priority landscapes in Sumatra through adoption of best management practices in protected areas and adjacent production landscapes, using tiger recovery as a key indicator of success.	The GEF CONSERVE Project focuses on strengthening the Seblat elephant corridor, supporting monitoring of the Seblat region from threats, reducing the conflict between the Sumatran elephant and tiger with humans and capacity development for the government and community. The GEF CONSERVE project will build on and strengthen existing programs of the Tiger project, share data and capacity building efforts
Ulu Masen: Fauna & Flora International (FFI) – Aceh Program (www.fauna-flora.org). FFI has been working in Aceh since 1998, and in Ulu Masen since 2006 and expected until to long-term conservation program. FFI has supported by variously donor (US Wildlife Fish Services, DEFRA-UK/DARWIN, Disney Conservation Fund, Trust and Foundation Fund, Private Donor, and Governors' Climate and Forest Task Force.	FFI mission in Ulu Masen to conserve threatened species and ecosystems, choosing solutions that are sustainable, based on sound science and that take into account human needs, through various project activities: Research/Survey for Elephant (*Fecal* DNA); Tiger (camera trapping, occupancy survey); Variously and thematic capacity building and conservation training to support government staff and community; Collaboration with BKSDA and DLHK for Human-Elephant Conflict (HEC) and Human-Tiger Conflict (HTC) mitigation; SMART Patrol, collaboration with Forest Management Unit/DLHK and Community Rangers; Support BKSDA, DLHK and Aceh Regional Police in Illegal Wildlife Trade (including; training, setup informant and conduct law enforcement; Established 11 sites for Social Forestry Scheme (Hutan Desa and Hutan Kemasyarakatan);	GEF CONSERVE Project and FFI could work collaboratively to share data, baseline information and benefit from FFI experiences working in Ulu Masen (including; protected species, community engagement through social forestry and policy intervention), and also co-financing activities.

Name of on-going and planned program/project, years of implementation and sites	Program/project objectives and targets	How proposed UNDP/GEF project will collaborate with the program/project?
	Initiatives for Payment Environmental Services through PDD REDD Ulu Masen with Government of Aceh, and establish small-scale PES Plan-Vivo; Support policy and strengthening of institutions of forest management.	
Seblat: Forest Program 2, Development of Integrated Biodiversity Conservation and Watershed Management, 2019-2020.	Biodiversity conservation and Watershed management Reducing threat of natural resources in Kerinci Seblat NP and its vicinity and increasing capacity development (Kerinci District) Developing NP monitoring through the ranger and the community patrol inside the park	Project FP II focuses on the Jambi Province region, so GEF CONSERVE Project will expand the efforts of FP2 to cover gaps in Bengkulu Province not supported by FP2, and will improve coordination between the two projects
Seblat: Emergency Action Plan for Elephant Conservation-TFCA. 2021-2023	Saving Sumatran elephants Reducing threats of elephant through actively monitoring or patrolling by the ranger or the community patrol. Developing early warning system and human elephant conflict mitigation including improving its habitat (habitat restoration). Involving the private sectors and the communities to develop active management inside the elephant range area.	GEF Conserve and TFCA complement each other to support the elephant conservation emergency plan and provides opportunity for synergy across the regions and programs to reduce threats related to the Sumatran elephants in Seblat through intensive monitoring and reducing conflict and poaching. The TFCA scheme does not cover development of environmental services, community empowerment or activities that do not have a direct impact on reducing threats or increasing elephant protection, that will be covered under CONSERVE Project.
Seblat: GEF Combatting illegal and unsustainable trade in endangered species (GEF 6)	Reduce the volume of unsustainable wildlife trade and the rate of loss of globally significant biodiversity in Indonesia and East and South-East Asia.	It will also expand the application of national policies, legal and institutional frameworks and enforcement built under the GEF 6 project to the project sites
Moyo: World Parrot Trust. 2018-2019	Conservation of Yellow crested Cockatoo. www.parrots.org Survey of the cockatoo population and distribution Campaign and awareness to the people about the Yellow-crested Cockatoo conservation.	The CONSERVE Project can support the conservation of Yellow-crested Cockatoo, which actively fills the monitoring and protection gap. The initiative can support the development of the Cockatoo sanctuary and rehabilitation and release areas.
Moyo: Amanwana-Moyo Conservation Fund. 2008-2023	Natural conservation of Moyo Island. Rehabilitating and releasing the baby turtles. Protecting and restoring the coral reef inside the Moyo Island area. Awareness and campaign about the turtle's conservation	The Moyo Fund conservation can be directed towards financing some activities which are not covered by the GEF CONSERVE Project, especially action on the ground.
Moyo: Conservation International. Whale shark tagging and monitoring in Saleh Bay. 2019 - 2022	Whale shark monitoring Initiating the whale shark ecotourism and based on the activities on Labuhan Jambu (Saleh Bay area).	CI support does not directly overlap with CONSERVE Project for Moyo. This CI-funded activity can support information on best practices in the development of Moyo's ecotourism.

Name of on-going and planned program/project, years of implementation and sites	Program/project objectives and targets	How proposed UNDP/GEF project will collaborate with the program/project?
Sumbawa University of Technology	Monitoring of wildlife Sustainable Natural resources Socio-economic surveys	Supports exotic bird rescue, DNA analysis, IT based biodiversity monitoring and social surveys and technical support
FOLUR Project Indonesia: Strengthening sustainability in commodity and food systems, land restoration and land use governance through integrated landscape management for multiple benefits in Indonesia [2021-2027]	The project specifically focuses on generating multiple benefits for biodiversity, climate change, and land degradation through integrated landscape management, sustainable and resilient commodity production and farming systems, and participatory restoration and forest governance. The project aims to foster and strengthen sustainable value chains of palm oil, coffee, cocoa and rice through implementation of a comprehensive landscape management approach integrating biodiversity conservation, ecosystem restoration and the sustainable production of cash and food crops at scale. The project has selected five target geographies, each one corresponding to provincial administration boundary (jurisdiction) and containing one key district, considered the intervention landscape. Target jurisdiction: Aceh Province (target district: Central Aceh), North Sumatera Province (target district: Mandailing Natal), West Kalimantan Province (target district: Sanggau), South Sulawesi Province (target district: Luwu), and West Papua Province (target district: Sorong).	CONSERVE can complement FOLUR efforts at land use governance through integrated landscape management (KEE) to reduce loss of habitats. CONSERVE supports collaborative actions between governments, private sector (palm oil companies, forest concessions, etc.). In addition, CONSERVE will promote policy, coordination, regulatory and institutional framework for planning, management, compliance monitoring, enforcement and decision making for integrated management of biological landscapes will to some extent complement FOLUR and GGP approach. Further, coordination will be supported through regular meetings, work planning and sharing of monitoring results. Both FOLUR and CONSERVE will work with Aceh Provincial Government and similar stakeholders, for which a joint Technical Advisory Group will be considered at the Provincial level to avoid repetition/duplication of project intervention and sharing of lessons.
Good Growth Partnership (GGP)/ Green Commodities Programme (GCP)	Focuses on taking deforestation out of commodity supply chains to reduce global impacts of agricultural commodities on greenhouse gas emission and biodiversity by meeting the growing demand of palmoil, soya and beef through supply that does not lead to deforestation. Consequently it has a positive impact on safeguarding the rights of forest dependent communities	CONSERVE objective is to ensure that oil palm companies are actively engaged in conserving threatened species habitats that can build on lessons from the GCP, including application of measures to safeguard the rights of IPs and forest dependent communities, which will build on the lessons from GGP.
USAID Lestari project	Low emission development in terms of landscape management, community forest conservation and combatting wildlife trafficking and illegal logging	Complements KEE being applied through CONSERVE that can benefit from lessons in village-based forest conservation, SMART patrols and integrated landscape planning. CONSERVE will further enhance village-based forest conservation linked to improved livelihoods and sustainable resource use within a broader KEE

Name of on-going and planned program/project, years of implementation and sites	Program/project objectives and targets	How proposed UNDP/GEF project will collaborate with the program/project?
		landscape approach through multi-stakeholder participation in planning, decision-making (through the multi-stakeholder KEE management forum), private-community partnerships, linkage to non-GEF green funding instruments (to ensure post-project sustainability and replication), inclusion of customary communities, participatory monitoring. It will also extend current SMART patrols outside PAs to include surrounding lands and transfer of gradual roles and responsibilities to local partners as well as defining a data management system and improved regional capacity for forensics related to IWT that would facilitate enforcement and prosecution.

Risks*:*

102. As per standard UNDP requirements, the Project Manager will monitor risks quarterly and report on the status of risks to the UNDP Country Office. The UNDP Country Office will record progress in the UNDP ATLAS risk log (Annex 5). Risks will be reported as critical when the impact and probability are high (i.e. when impact is rated as 5, and when impact is rated as 4 and probability is rated at 3 or higher). Management responses to critical risks will also be reported to the GEF in the annual PIR.

Table 6: Project Risk and Mitigation Matrix

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
A. General Risks					
Risk 1: Agencies will fail to agree on the KEE framework as basis for integrated planning, management and implementation of programs in the corridor. The inherent conflicts in policies and orientation of mandates and programs will make it difficult for agency representatives to be flexible in their interpretation, thus hindering them to agree to a re-orientation of their planning and management frameworks.	Institutional	I- 3 P- 3 Moderate	The Project will try to demonstrate the interrelationships and cross-sectoral impacts of various programs on the ability of the biological landscape to sustainably deliver ecosystem goods and services. The Project will use such information available through previous successful programs to make the case for a multisectoral approach to deliver sustainable benefits. There have been numerous examples of OECM in the form of KEE success examples that will be shared. Efforts will be made by the Project to make the case for greater cooperation by demonstrating the added benefits of doing so, rather than the traditional independent approach to natural resources management and biodiversity conservation.	DG - KSDAE	Implementation phase

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
Risk 2: A myriad of government agencies involved in combating wildlife crime have low capacity and/or suffer from lack of information	Institutional	I- 3 P- 3 Moderate	To mitigate this risk, the Program will work in partnership with stakeholders to enhance their capacity and governance mechanisms to implement existing laws related to wildlife crime, enhance cooperation and information sharing across law enforcement agencies and prosecution through enhancement of DNA analysis.	NPD	Implementation phase
Risk 3: It will take time for inherent resource conflicts to be resolved which could delay Project start up and progress. In many of these resource rich areas, the reality on the ground is that administrative failures, fragmented mapping, absence of coherent management framework, have brought about overlaps in community tenure and long term commercial leases on public lands.	Socio-political	I- 3 P- 3 Moderate	The Project duration is proposed to be 6 years to account for time for negotiations and settlement of resource use conflicts. Nonetheless, the essence of the Project is really to minimize such 'conflicts' and ensure synergy by developing a common framework for KEE management that is based on sufficient information, system of incentives, and mechanisms for resolving inconsistencies in natural resources use. Measures for minimizing conflicts are reflected in the guidelines established by MoEF for KEEs and the project will strengthen the application of these procedures, including participatory decision-making through a multi-stakeholder KEE Management Forum, etc.	NPD	Implementation phase
Risk 4: Long gestation periods for alternative livelihoods, and restoration of forest resources and livelihoods can undermine community participation	Social-Political	I-3 P-2 Moderate	KEE planning will entail a menu of options (including activities with short-term gestation periods as buffer until longer-term investments generate sustainable benefits) to help diversify the livelihood and resource base, including linkage with on-going governmental, private enterprise and NGO programs to supplement and complement project activities. The project will also seek to identify additional options through ecotourism as means to improve incentives for local people	NPD	Implementation phase
Risk 5: The lack of international coordination and data exchange between law enforcement agencies is an obstacle to a addressing illegal wildlife trade	Institutional	I-3 P-3 Moderate	The project aims to engage specifically with other countries in South East Asia on IWT issues through strengthened presence in the ASEAN Senior Officials Meeting on Transnational Crime (SOMTC) and bilateral cooperation with key neighbouring countries that are transit or destinations for Indonesian wildlife, such as Vietnam, Thailand, Malaysia, Singapore and China. Through these cooperation mechanisms, Indonesia will seek to improve data sharing and coordination	DG-KSDAE	Implementation phase
Risk 6: Private sector involvement and financing for	Institutional	I = 3 P=2	The project activities require the private sector to take a long-term view of the plantations and extractive industries under	NPD	Due Diligence process to engage private

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
environmentally friendly activities may require strong oversight and monitoring due diligence to ensure compliance.		Moderate	their control. The challenge is to work with the industry to invest in models where the return is necessarily long-term. As such, the project will encourage a mix of financing models tied to a broad basing of the core business (eco-tourism, tree crops, sustainable tree cropping) that provides both long term and short-term gain. The project will build on already functioning models of best practices that promote uptake by private sector.		sector to contribute co-financing and implement activities that contribute to project's objective will be undertaken in the first year of the project.
B. Social and Environmental Risks					
Risk 7: Provincial Policy-level activities related to KEE and biodiversity-friendly management approaches, in particular in industrial plantations, forest concessions, extractive industry forest production, and other land uses outside PAs could inadvertently have social impacts on marginalized individuals or groups	Socio-political	I -3 P-2 Moderate	The SESA and ESIA will include a review of potential policy related interventions related to smallholders and propose safeguards including monitoring arrangements that will be integrated into the ESMP.	NPD	Implementation phase
Risk 8. The three project landscapes have resource conflicts within the proposed OECM/KEEs (e.g. CAs, production and protection forests, private plantations, etc.) that could be exacerbated if the activities are not well implemented or stringent enforcement measures are instituted	Socio-political	I- 3 P- 2 Moderate	As the project is categorized as High, an ESMF has been prepared during the PPG. Per that ESMF, an ESIA will be undertake and based on it an ESMP will be prepared during the first year of project implementation – covering this and all other risks (listed below). All thematic management plans (CCP, etc.) will be prepared holistically as part of the ESMP. In addition, the following requirements of High risk projects will be / have been met: • Comprehensive Stakeholder Engagement Plan (Annex 4) • Customary Communities Planning Framework (Annex 11) • Gender Action Plan (Annex 12) • GRM (to be prepared with ESIA/ESMP) Additionally, other measures to be applied include: (i) implementation of the KEE procedures for identification and its planning and management decision-making (Annex 9) that will strengthened and applied to ensure that community (including customary communities) concerns are addressed in a	NPD	Implementation phase

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
			timely and efficient manner; (ii) use of the screening checklist based on the SESP (Annex 10) to ensure that they comply with sound social and environmental principles and is sustainable; and (iii) recruitment of community engagement specialist at provincial level to ensure the application of effective participatory processes, inclusive decision-making and application of the GRM process.		
Risk 9: Stringent enforcement measures that will be put in place to curb IWT might increase conflict between park authorities and local communities	Social	I - 4 P -2 High	As with all other risks and as noted under Risk 8, this risk will be further assessed during the ESIA and additional measures (beyond those included in project design; also described under Risk 1 above) will be included in the subsequent ESMP as necessary for SES compliance. Additionally, project staff would be trained in conflict management practices and protocols to reduce potential for conflict and reduction of situations that might turn violent	NPD	Implementation phase
Risk 10: Development interventions in terms of community livelihoods, community-based enterprises (e.g. eco-tourism and natural resources based value addition, etc.) and captive breeding can have adverse impacts on species and habitats if not well managed.	Environmental	I - 3 P -2 Moderate	In addition to response noted under Risk 8, this risk will be managed through: (i) sites selected for project investment conformed to the project's objective of 'enhancing the conservation of biodiversity and project interventions will benefit from improved conservation, environmentally friendly agricultural and land use practices to reduce impacts on species and ecosystems, improved monitoring, private sector participation in environmentally-friendly practices and enhanced environmental stewardship local communities. (ii) all community agriculture and production systems and livelihood activities will take place outside the high value biodiversity areas through appropriate mapping and zoning arrangements; (iii) use of screening checklist developed using SESP (Annex 10) will be applied to screen all investments to ensure that they comply with sound social and environmental principles and is sustainable; (iv) setting acceptable sustainable limits on harvest of non-timber forest products based on status and health of such populations and establishment of monitoring protocols; and (v) setting improved guidelines for conservation-friendly practices in private plantations and mining area and (iv) In terms of captive breeding, release and monitoring ensure that initial extensive assessment and preliminary studies will assess	NPD	Implementation phase

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
			suitability of breeding and reintroductions, etc. Monitoring protocols will access the health of the selected hunting species to determine hunting limits, recuperation rates, ex-situ breeding rates, etc. will be implemented as well as options for adjusting program targets and methods.		
Risk 11: Improved management of the OECM for multiple uses might have an unintended impact on community rights, including access could be restricted to resources from OECM areas, potentially leading to economic displacement. This might include customary community groups located within and adjacent to these areas	Social	I-4 P-3 High	In addition to response noted under Risk 8, this will be addressed by applying the following management actions: (i) applying the Framework for KEE for promotion of OECMs (Annex 9) to ensure that project activities are detailed in collaboration with Provincial and local governments, KEE Management Forums and local communities, to delineate areas to be set asides in a manner to avoid limitations on existing community resource use rights and access; (ii) strengthening management of KEE and corridors will be planned and managed under community governance mechanisms that will take into consideration current uses of these resources; (iii) use of a screening checklist for project investments based on SESP (Annex 10) to screen all investments (including set-asides) to ensure that they comply with sound social and environmental principles and ensure avoidance of restriction in access to the extent feasible; (iv) investment planning will ensure that decisions regarding restrictions, if any, on resource use will not be imposed, but will involve through an informed, transparent and consultative community consensus building process and any restrictions, if any will be adequately compensated to match or exceed loss of incomes or livelihoods. An alternative livelihood development plan will be prepared early in project implementation (Year 1) for any households that are likely to be denied access to resources or current livelihood practice and (v) use of the project's grievance redressal mechanism (refer Section IV, Part iii of UNDP Project Document) and FPIC procedures provides a mechanism to address any specific community concerns.	NPD	Implementation phase
Risk 12: The project could possibly affect land tenure arrangements and/or community-based property rights/customary rights to land, territories	Social	I – 4 P – 3 High	In addition to response noted under Risk 8, this will be managed through: (i) Applying the steps for KEE identification and its planning and management decision-making (Annex 9) that already exists will ensure that consultations and feasibility studies,	NPD	Implementation phase

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
and/or resources of marginalized and customary community groups			particular related to lands claimed by local community and customary community is carried out early project implementation to ensure that effective consultation takes place and community consent based on FPIC procedures prior to deciding on specific location, nature and scope of project investments to reduce potential for conflict and ensure that these do not infringe on human rights, lands, natural resources on land under ancestral domains; (ii) MoUs will be signed between the customary communities and local communities and project proponents on project investments before activities are implemented on the ground; (iii) engagement of parties through the Grievance Redressal Mechanism to address any conflict between the government/local entities and customary communities; (iv) Use of project screening checklist based on SESP (Annex 10) to facilitate the screening of all investments to ensure that they comply with sound social and environmental principles, and in particular do not conflict with customary community resource uses; (v) Implementation of the Customary Community Engagement Plan based on the framework (Annex 11) developed at PPG stage will address specific concerns relating to IPs, including tenure issues; (vi) The NPMU will include consultant expertise in FPIC, IPP and M&E to ensure that customary community issues are adequately addressed and monitored, by providing training to staff and key stakeholders, providing advice in the development of key regulatory frameworks and work programs on conservation, restoration and sustainable land use. At the Provincial level, Community and Gender Engagement Specialists will oversee and ensure that community rights will not be comprised; and (vii) At MTR and TE, independent consultants will evaluate the extent to which the project has helped maintain and protect such community rights. An ESMF (Annex 20) has been developed at PPG stage, on the basis of which an ESIA and ESMP will be prepared early in project implementation to address the high risks		

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
Risk 13: Women (IP and rural women in particular) and other marginalized groups may not be fully involved in planning, implementation and monitoring of project interventions and getting benefits from such initiatives, rather influential leaders and/or groups at the local level may have more control on local level decision making.	Social	I - 3 P-2 Moderate	In addition to response noted under Risk 8, this risk will be managed as follows: (i) application of the "*Gender Analysis and Mainstreaming Action Plan*" (Annex 12) to ensure that the project contributes to gender equality and creates equitable opportunities for women and men at all levels of engagement; (ii) a gender and socially inclusive lens will be applied to every project activity and output to further analyze impacts on the rights of women and vulnerable peoples, as well as support land reform initiatives that benefit women and indigenous groups; (iii) special investments would be planned based on women's requirements to ensure that they adequately benefit from project investments; (iv) a series of capacity building programs would be conducted to enhance the capacity of women and vulnerable members to take an active part in the planning and decision making process at the corridor/cluster level; (v) a Gender Consultant will be posted at the Project Management Unit and s/he will be supported by technical staff members at the MOEF and Provincial BKSDA level to ensure implementation of the gender action plan; and (vi) a Monitoring Plan and Gender Action has gender responsive indicators to access gender dimensions, including that the project scores a Gender Scorecard 2 Marker that will be monitored and reported by the M&E specialist and further evaluated during the MTR and TE evaluations	NPD	Implementation phase
Risk 14 Natural disasters and climate change may affect the implementation and results of project initiatives	Environmental	I – 3 P – 3 Moderate	In addition to response noted under Risk 8, this risk will be managed by: (i) applying the Participatory Steps for KEE identification and its planning and management decision-making (Annex 9) to ensure that activities are environmentally sustainable and supporting best practices managed for their climate risks; (ii) enhanced KEE management and conservation practices would improve protection and management of critical ecosystems services to help to increase the overall resilience of the natural systems to climate risks in the areas compared to business as usual; (iii) In terms of the Monitoring Plan, the condition of the natural ecosystems would be monitored to ensure that activities do not damage these sensitive ecosystems so that it is in a better overall situation to manage climate changes and (iv) Applying The Management	NPD	Implementation phase

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
			Knowledge and Communications to improve awareness of climate and ensuring measures to improve climate resilience. Refer to Section below "Summary analysis and project implications for climate change considerations" from Para 108-112 and Table 6(c) for detailed discussion of climate risks.		
Risk 15 – The absence of adequate recognition of FPIC in the national law would result in the failure to apply FPIC principles in project planning and implementation	Institutional /Political	I - 5 P – 3 High	In addition to response noted under Risk 8, this will be managed by: (i) Applying the Participatory Steps for KEE identification and its planning and management decision-making (Annex 9) to ensure that consultations and feasibility studies, particularly related to lands and resource rights claimed by customary community and local community is carried out early project implementation to ensure that these are not compromised. FPIC principles for customary communities, smallholder farmers and local communities will be developed. The application of the FPIC process will be overseen and facilitated by the Provincial Community Engagement and Gender Specialists and ESMP (including FPIC principles) overseen and monitored by the national Safeguard/M&E Officer. No on-the-ground investments will be made until the FPIC principles are developed and implemented (Refer Annex 11); (ii) MoUs will be agreed through a open and free dialogue between the customary communities and local communities on project investments before activities are implemented on the ground; and (iii) use of Grievance Redressal System to address any conflict between the government/municipal entities and in particular to ensure that there is free and prior consultation with custodian communities and other local community groups before project activities and their locations are decided on.	NPD	Implementation phase
Risk 16 – The cultural identity of the customary community groups might not be respected and/or their traditional knowledge (or other forms of cultural heritage) might be inadvertently harmed during project activities that intend to preserve and/or utilize it.	Political	I-3 I-2 Moderate	In addition to response noted under Risk 8, this risk will be managed by (i) implementation of the Customary Community Engagement Plan based on the Framework (Annex 11) prepared during early project implementation will form the basis for dealing with the interests of the custodian and other special interest groups; (ii) The effective use of the grievance redressal system Section IV, Part *iv)* to address these specific concerns; (iii) use of a screening checklist based on SESP (Annex 10) to screen all investments from an	NPD	Implementation phase

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
			environmental, social and cultural perspective to ensure that these take into consideration all potential impacts and implementation would be monitored to ensure that there is no impacts on cultural heritage of customary communities or special interest groups; and (iv) Any project related economic development initiatives proposed by custodian communities and other special interest groups will rest on the maintenance of the integrity of their culture and defined through the use of FPIC procedures (Refer Annex 11)		
Risk 17: The continued use of chemicals in the palm oil plantation could pose a significant health hazard to plantation labor and to the environment	Environmental	I-3 P-3 Moderate	In addition to response noted under Risk 8, The ESMP will include additional measures, if necessary to further reduce the health and ecological hazards associated with chemical use, and in particular to negotiate the restricted or reduced use of chemicals in plantation lands close to streams and human habitations. In addition, the project will seek to work with the private plantations to ensure best practices in promotion of safety measures are taken in the selection, transport, storage, application and storage and disposal of chemicals and to ensure that workers are advised on safe application processes	NPD	Implementation phase
Risk 18: Activities related to oil palm plantation and mining could inadvertently support child labor and other violations of international labor standards and measures are necessary to avoid these concerns	Social	I-3, P-2 Moderate	In addition to response noted under Risk 7 additional measures will be identified through the ESIA to further reduce or eliminate the potential for supporting employment of child labor and in particular to negotiate with the private palm oil plantations and mining companies to ensure that appropriate measures are taken to comply with international labor standards. (ii) Agreements signed with private companies for project participation will include specific requirements to comply with international labor standards and work conditions. (iii) Compliance with these agreements will be monitored by the RPMUs with oversight provided by the national Safeguard/M&E officer. Awareness activities will be carried out at the project sites to create support for preventing use of child labor and unacceptable working conditions.	NPD	Implementation
Risk 19: The COVID-19 and other potential	Social &	I-4	The emergence of any zoonotic disease outbreaks can affect vulnerable groups in the	NPD	Implementation

Project risks					
Description	**Type**	**Impact, Probability and Risk Level**	**Mitigation Measures**	**Owner**	**Status**
zoonotic disease outbreaks could pose serious difficulties for effective project implementation and benefit sharing	Environmental	P-3 High	project area the most and leave them out from participating and accruing benefits from the project in particular from the livelihood activities. The project will undertake an assessment of the social and economic impacts of ongoing COVID-19 on vulnerable population as part of the ESMP preparation, map hotspots and develop plans for responding to and ensuring income recovery for affected vulnerable populations and target specific livelihood interventions and captive breeding. This would facilitate recovery from the impact of COVID-19 as well as improve awareness of risks from emergence and transmission of zoonotic diseases. Increase awareness and knowledge of zoonotic diseases and prevention. Refer Section below "Analysis of Implication of Covid-19" from para 103-107 and Tables 6(a) and 6(b) for further discussion of Covid risk management.		
Overall Risk Rating		HIGH			

Analysis of Implications of COVID-19

103 The emergence of the COVID-19 coronavirus has potential for disrupting the project development and implementation in profound ways. A major risk element for the project is the time it takes to achieve project outcomes, particularly if the Covid-19 infection lingers. As such, there is a risk in key area of focus of project implementers, beneficiaries and co-financiers. While a certain amount of "flexibility" is always built into project schedules, analyses will need to account for the potential of lingering and recurring Covid-19 impacts and similar outbreaks. In addition, project needs to reduce the likelihood of similar pandemics in the future, and therefore it becomes necessary to minimize root causes of infectious diseases and consider measures that strengthen resilience. The socio-economic system underlying effective project success must also recognize that the phenomena such as climate change and the loss of ecosystems and biodiversity are thought to be underlying factors associated with the pandemic. Therefore, the project has built in certain provisions, as is permissible within the framework of the project to attempt to address some of the implication of COVID-19 and potential future zoonotic outbreaks. The project will deal with COVID-19 from three perspectives: opportunity, risk, and ecology. The tables below summarizes the risks and opportunities. The ecological perspective is described above, but to summarize, the intention of the project is to recover an intact ecosystem, preserve ecosystem diversity and integrity and ensure a well-managed production landscape, where wildlife harvest is done in an ecologically sound manner, healthy wildlife populations are protected, and as the more intact landscape develops over time, that the possibility of zoonoses is substantially reduced.

104 To effectively address COVID-19 and future zoonoses requires sharing of information about the ways these affect peoples' health and wellbeing and measures for its prevention. It is also necessary, where possible to recognize the links between zoonotic diseases and the condition of the natural ecosystems. This would require controlling the degradation of natural ecosystems, resource exploitation, or conversion of land for agriculture or plantations and effectively protecting areas to restore and maintain the integrity of natural habitats, recognizing that there is a concomitant need to enhance the means of sustainable livelihoods and resource use to ensure that local communities have the means to economically survive and meet the health challenges.

105 Currently UNDP has a long-term program with ongoing focus on green business in Indonesia through BIOFIN and other donor funding programs (also an emphasis on country's recovery following Covid to "build it back better", in a more sustainable way. There are a number of promising financial instruments that are available that can be utilized to support affected population and bring about economic recovery that would be investigated. These can be one or more of the following, depending on the assessment of their feasibility, including in particularly the BIOFIN identified prioritized financial solutions for biodiversity, such as green-financing initiatives of Islamic funds for biodiversity and environment (including *zakat*, *waqf*, *sadaqa* and *infaq*), ecological fiscal transfers (EFT), green *sukuk*, Corporate Social Responsibility (CSR), crowdfunding and optimization of village funds[20]. Tourism opportunities will be one of the many possible options available for diversification of local community and business revenues. Specifically, for the tourism sector, the WTO guidelines will be followed but more importantly application will be made to their technical assistance package for tourism recovery. Other livelihoods business development will necessarily follow government safety protocols under Covid (see Risks/opportunities from COVID below in the Risks section).

Table 6 (a): Covid-19 Potential Risks and Mitigation

Risk category	Potential Risk	Mitigations and Management Strategy
Economic disruptions in livelihoods due to COVID-19.	The COVID-19 outbreak could accelerate deforestation, resource exploitation and associated biodiversity loss due to reduced demand for certain crop products and services provided by local people and hence, an increased demand on forest products for subsistence (conversion to agriculture, charcoal production and other informal and at times illegal activities	During the early part of project implementation particularly during the preparation of livelihood and small business enterprise planning, a rapid assessment of the current social and economic impacts of ongoing Covid-19 (likely as part of the ESMP and IPP), in particular on vulnerable and affected populations in disease outbreak hotspots and assessing the options for provision of income generation opportunities. The gender actions will also specifically focus on vulnerable women population in high-risk areas. The livelihood and business planning exercises in KEE areas will help develop suitable investment plans for responding to and ensuring income recovery for affected vulnerable populations. Special efforts would be made to enhance technical support, extension services and materials to enable the successful implementation of such activities. Convening discussions with financial institutions, particularly the green funding programs available in the country to catalyze interactions and increase options for direct financing for these livelihood activities, including grant support for tiding over the initial difficult period of recovery. Also, efforts will be made to improve access to village funds provided by the government and ensure these funds are targeted to the most vulnerable.

[20] *Zakat*: supported by obligatory contribution by wealthy Muslims that is available for the economically insecure communities: *Waqf*: charitable trust created by legal actions of donors to transfer physical assets or cash to benefit the general public; *Sadaqa*: Voluntary charity for small infrastructure, water supply, crops and small local business; *Infaq*: type of charity in Islam that is given without any expectation of reward or return; *Green Sukuk*: leveraged private finance for green sustainable projects; ETI: fiscal transfers for environmental and ecological initiatives through revenue-sharing arrangements between various levels of government; Crowdfunding: It allows individuals to contribute directly to, and invest in biodiversity-related activities.

Risk category	Potential Risk	Mitigations and Management Strategy
Stakeholder engagement process	Given, the nature and impact of COVID-19, there is concern that the priorities of community, private entities and government and other stakeholders would shift to address the priority of COVID-19 thus, affecting their active participation in project-related activities	The Government of Indonesia has certain measures in place for staff, particularly at the provincial and local levels to ensure that they continue to perform their official duties. Meetings are being conducted in small groups and via other communication methods, to the extent these are feasible in given situations. The Provincial Governments have now become more effective in dealing with their responsibilities and ensuring that staff response times are normal, as much as possible. MoEF and Provincial Governments were fully engaged with this proposal, and expect UNDP and GEF to move forward with the work. At the Provincial levels, governments are functioning at normal, or near normal with precautions in place. However, engagement of communities and private sector will likely require precautions, including following government COVID-19 protocols, meeting at the community levels will be restricted to smaller numbers of staff and community members, using precautions of masks and social distancing.
Availability of technical expertise and capacity and changes in timelines	If COVID-19 continues or is not effectively contained, project start-up and implementation could be delayed	The project development work plan and team will take these constraints into consideration when planning, for technical support by maximizing experts in country.
Enabling financial environment	The COVID-19 and other potential zoonotic disease outbreaks could pose serious difficulties for ensuring effective implementation of co-financing agreements	There is likelihood that if the COVID-19 continues or is not effectively contained, the availability of co-financing could be affected by shifts in government and private sector fiscal priorities and exchange rates. The government has shown strong support for the project that might help to ensure some level of commitment to financing. Additionally, some co-financing is solicited through ongoing donor funded programs where funding has already been committed, so likely these co-financing activities might not be affected. Additionally, the project team will seek potential co-financing from a number of green funding programs available in the country to complement the GEF financing, and in particular to mobilize resources for community development activities.
Project start-up and implementation	The COVID-19 and other potential zoonotic disease outbreaks could pose serious difficulties for effective project implementation and benefit sharing	With regard to potential delays in start-up and implementation, the project team will take this into consideration when developing annual plans and implementation schedules, using best possible means to try to reduce and minimize delays. While this is a reality, the project will ensure that effective methods for bio-secure implementation are planned and implemented including the use of remote communication, where feasible, coupled with the use of PPE and following the safe COVID-19 guidelines and protocols of the government of Indonesia. The project will consult with the national and provincial governments to ensure that effective safety protocols are in place before any consultations are undertaken at the field level. While, in the rural areas of the project, these areas may not be well equipped for remote work, in terms of wifi availability. However, Covid will not change how work will be carried out in terms of fieldwork preparations, holding consultations in the villages, other than by observing government safety protocols. Local level consultation will only be undertaken if it complies to national and local government guidelines and UNDP guidelines.

Risk category	Potential Risk	Mitigations and Management Strategy
		For example, it is likely that the consulting team will be small (1-2 people), national staff, and may have to be across design, gender, social and environmental issues, and they will likely consult with small group sizes (under 10 people or per local guidelines) and will have PPE for themselves and for people they talk to in person. Additionally, COVID protocol will be developed and followed, such as testing, and supply of sanitizer and masks. In any case where either party is not comfortable to engage in discussions; it will not proceed. As much as possible, remote connections will be sought, for example via local government offices visiting communities. In all cases, continued attention will be given to ensuring the voices of IP, women, youth, and any underrepresented community members using gender and community development specialists. The Stakeholder Engagement Plan for implementation will be updated to address such restrictions and define mitigation measures.
Travel restrictions for tourists	Given, that tourist visits to the sites would be affected due to the restriction placed by the pandemic, business and local incomes would be affected	While international tourism is not a big revenue generator in the three project sites, options for promoting national tourism and other income generation would be investigated with financial support that might be available through a number of financial instruments, all of which have potential for supporting the poor and economically disadvantaged, who are likely to be most affected by zoonotic disease outbreaks.
Awareness of impacts of COVID-19	There could likely be lack of information on implications of COVID-19 and means for its prevention, particularly in some of the remote settlements	The project will develop, through its communication and KM strategy in the target sites to a maintain system of on-going communication to foster improve coordination, speed and efficiency of directing awareness of COVID-19 protocols for management and control of the disease. The project team will disseminate lessons of COVID-19 control from other parts of the country and make communities aware of resources that might be available for control, testing and management of the disease
Future zoonotic outbreaks	Potential for adverse impacts that might contribute to future pandemics, for example, provided there is no action taken to reduce the human-wildlife interface or any actions that cause degradation.	This will be closely reviewed in the ESMP preparation and in safeguards analysis and documentation. The project will proactively work to reduce risky human-wildlife interface, towards reducing the risk of future pandemics, while over the long-term promoting an intact forest landscape with healthy wildlife populations.

106 The Covid outbreak has helped improve the realization regarding the fragility of current societies in regard to the pandemic that could also positively affect people's perception of the climate emergency. Social concern and awareness are key factors in bringing about behavior and political change. Similarly, the role of science when making decisions in the context of the health crisis could highlight the benefits of drawing up and implementing policies substantiated by the scientific community to deal with crises, both current and new. Covid has also helped to recognize the need to redefine economic frameworks to focus on the promotion of human wellbeing and equality within clear environmental and social boundaries, rather than on GDP growth and the accumulation of capital—all inadequate proxies for wellbeing.

107 While there are many risks posed by the virus, it also offers the opportunity for project planners to build improved mechanisms for forest conservation and resource management that might have positive impact on biodiversity, ecosystems and local livelihoods, and hence improved community welfare and health related benefits. The project will therefore seek means to enhance these opportunities as discussed below.

Table 6 (b): COVID-19 Opportunities

Opportunity Category	Potential	Project Strategy
New opportunities that promote protection and restoration of ecosystems	Conservation of forests, ecosystems and restoration of ecosystem functionality can be a mechanism to reduce impacts of zoonotic diseases	The intent of CONSERVE is to protect existing forests, ecological habitats and consequently ecological services they provide through the KEE approach that intends to safeguard against forest destruction and degradation. The promotion of a healthy forest ecosystem with intact wildlife habitats and connectivity through landscape planning will help in the recovery of wildlife populations and thus serve to reduce the risk of zoonotic diseases.
Poaching, wildlife consumption and illegal wildlife trade	Regulation of consumption of wildlife and reduction of access to illegal markets for wildlife products can have a positive impact on mitigation of future zoonotic disease outbreaks	IWT has regional (and sometimes international) dimensions that require coordination with other countries in the region. Opportunities for coordination will be identified through discussions with the GWP Steering Committee and through bilateral agreements with countries in the region with the support of GWP. Additionally, the project will strengthen SMART patrols (including communities), improved enforcement supported by improved DNA forensics and improved livelihoods to deter wildlife poaching in the project area.
Improved efforts towards protection of forests and ecosystems at the landscape level	Support for landscape level conservation has high potential for improved management of production areas (palm oil plantations, forest concessions, etc.) that can enhance natural habitats	The KEE approach supported through the project is intended to enhance the health of the forests and ecosystems with natural and production areas and hence mainstream biodiversity and ecosystem service considerations into all aspects of landscape planning, including reducing human-elephant conflicts. Among the proposed several alternative livelihoods will be solutions based on agro-forestry, establishment of forest corridors through plantations and forest concessions and improved management of FMUs that would promote intact forest and wildlife habitats that could have a positive impact for a healthy environment that might reduce impacts from the virus.
Reduction of unsustainable resource extraction and environmental degradation	Improved agreements with stakeholders will support improved and sustainable practices within the KEE landscape	Planning on the production landscapes within the KEE through appropriate zonation measures and signed MOUs with private plantation, forest concessions and communities will ensure commitments to protection of forests, reduction of degrading agricultural and other practices as well as measures to enhance restoration of degraded forests.
Opportunities to support Covid economic recovery	The project support for environmentally-friendly livelihood opportunities will facilitate both short and long-term responses to COVID-19	The project will provide small grants to local communities to facilitate the development of improved incomes and community-based entrepreneurship programs to reduce unsustainable practices that can facilitate some level of Covid recovery

Summary analysis and project implications for climate change considerations

Climate change can pose serious concerns to community wellbeing through unpredictable weather patterns that increase the likelihood of natural disasters and failed crop cultivation. A recent study indicated that El Niño-Southern Oscillation may strengthen under the future climate change conditions[21] and this would lead to increased droughts, disease outbreaks, wildfires and even social unrest in Asia. Forest degradation and deforestation is the largest contributor of greenhouse gases in many Asian countries. Drought and the use of fire to clear forest and land for agriculture would be of greatest concern here. In the longer-term, climate change may alter habitat structure or species resilience, and may possibly require adjustment of protected area boundaries. Climate projections beyond 2020 indicate a rise in temperatures by 0.5^0C relative to year 2000, sea level rise by 0.7-0.8 cm/year and a 5% increase in extreme weather events.[22]

A large section of the rural population is directly dependent on forest resources, which contribute 3.5 per cent to GDP and contribute to the livelihoods of 15 million people. The pulp and paper manufacturing and forest plantation employ around 1.5 million people and contribute around 1.8 per cent of Indonesia's GDP. Hence, the benefits of forests are likely to be greatest for rural populations where alternative income earning opportunities are limited. Further, the all-important ecosystem service of water quality and quantity through groundwater and run-off associated with forest cover will become even more important as climate conditions change. Therefore, the importance of reducing forest degradation, increasing forest cover, and reducing soil loss is important to both ecosystem service provision and industrial and agricultural crop applications. Ground-water protection will become an even more important ecosystem service in future, especially in drought years. The expected increase in demand for water resources, combined with lower replenishment rates in reservoirs, rivers and groundwater sources due to a changing climate, will probably lead to freshwater shortages in some years, especially under current conditions of increased forest loss and degradation. Under expected irregular drought conditions, fires could also become a new problem in some years.

The challenge of climate change is recognized by the Government and there is commitment to policy reforms to ensure that economic growth in Indonesia is more inclusive, resilient and sustainable. In recognizing the domestic and international importance of its tropical landscape and the people in it, the Indonesian government has made encouraging decisions; it has voluntarily committed to a minimum 29% reduction in greenhouse gas emissions by 2030 and developed a strategy for land use and forestry emissions, extended a moratorium on new clearing of primary forests and peat lands from 2 to 4 years (2013-2015), and increasingly recognized the rights of forest communities and indigenous peoples. This project will attempt to integrate climate change considerations into project activities, into species conservation strategies and action plans, conservation of large biological landscapes, improving conservation in production areas and enhancing community resilience to climate change.

Potential Impacts of Climate Change in the project areas

110 Indonesia is highly vulnerable to the adverse impacts of climate change. The Aceh province and parts of Sumatra has already experienced extreme climate events such as floods and drought, and is anticipating long-term impacts from sea level rise. Sumatra has also witnessed catastrophic climate events such as tsunamis, floods and droughts. As the population grows, climate change induced natural disasters are expected to affect a greater number of people and their assets, making it difficult for them to escape poverty. The impacts of climate change on livelihoods are superimposed on a number of other environmental and social stresses, as livelihoods, particularly in rural areas, depend upon the endowment and conservation of natural resources, as well as infrastructure assets and institutional support systems. For example, changing cropping patterns in some parts of the country exacerbate

[21] KM Cobb, N Westphal, HR Sayani, JT Watson, Lorenzo, ED, Cheng H., Edwards, R. L., Charles, CD. (2013). Highly variable El Niño–Southern Oscillation throughout the Holocene. Science 339: 67-70.
[22] The Fifth National Report of Indonesia to the Convention on Biological Diversity (2014); Ministry of Environment and Forests

certain environmental hazards such as landslides, forest fires, and floods. Global warming poses significant risks to local communities, e.g., heat stresses, vector-borne diseases, and water contamination are expected to intensify.

111 In the project provinces, the following are potential climate and disaster hazards.

- River flood hazard
- Urban flood hazard
- Coastal flood hazard
- Earthquake hazard
- Landslide hazard due to rainfall patterns, terrain slope, geology, soil, land cover, etc.
- Cyclone hazard
- Water scarcity hazard
- Extreme heat hazard
- Wildfire hazard that is potentially high
- Tsunami hazard

112 Hazard levels associated with flooding, water scarcity and extreme weather conditions are high in some of the project areas and could affect local beneficiaries. Future projected changes with respect to climate risks will be incorporated into the set of management measures included in the KEE plans. Moreover, increased protection of high conservation value (HCV) and high carbon stock (HCS) will help safeguard important ecosystem services, such as soil and water conservation, thus securing livelihoods for local farmers. Proposed project activities also include delivering technical assistance for palm oil, forest concession and forest management improvements and facilitating conservation and restoration of degraded lands and forest areas. The KEE management plans developed will include considerations on implementing good agricultural practices to protect against climate and disaster hazards, e.g., constructing vegetative strips to help minimize erosion. The full-time technical positions on the project, including the National M&E Specialist, Regional Landscape Specialists, Regional community engagement and gender specialists and technical consultants for agricultural-livelihood improvement, will provide oversight and ensure appropriate safeguards are implemented that account for current and future-projected hazards.

Table 6 (c): Climate Risk Analysis

Risk	Risk Management Objective	Project Climate Mitigation and Management Strategy
Climate risks posed by clearing of forests and promotion of palm oil plantations could be substantial	Improve design of landscape conservation outcomes to enhance protection and maintenance of forests and natural habitats that can act as an effective means to reduce impacts of climate change	The project will mitigate this impact by the following means: i) Applying the Participatory Steps for KEE identification and its planning and management decision-making to ensure that as much as possible of forests and natural ecosystems are conserved; ii) Promoting conservation practices to improve protection and management of critical ecosystems services to help to increase the overall resilience of the natural systems to climate risks in the areas compared to business as usual; iii) In terms of the Monitoring Plan, the condition of the natural ecosystems would be monitored to ensure that activities do not damage these sensitive ecosystems so that it is in a better overall situation to manage climate changes; iv) Applying the knowledge and communications to improve awareness of climate and ensuring measures to improve climate resilience; v) In addition, the project will incorporate CC (say using climate screening tool developed by the World Bank) to identify climate change adaptation and mitigation needs

Risk	Risk Management Objective	Project Climate Mitigation and Management Strategy
		for the project activities that will be incorporated in the project ESMP.
Climate sensitivity for local communities recognizing the profound relationship between climate change, Covid and local community vulnerabilities	Enhancing community resilience and capacity to cope with climate impacts	The project recognizes the need to assist the vulnerable local population to cope with climate impacts through the following measures: i) The project strategy places a strong emphasis on supporting small holder farmers and facilitating more sustainable farming practices; ii) The project will provide technical support and extension for on-farm improvements, land management and erosion management that support climate smart best practices; iii) Through the KEE planning approach, the project will help identify locations and appropriate practices that favor environment-friendly agricultural, sustainable resources uses, use of less harmful inputs, protect water courses etc. that could have a positive impact on improving resilience to climate impacts; iv) The forestry related interventions planned under the project will provide opportunities for forest related livelihood diversification and sustainable forest management as a means to enhance incomes and diversified livelihoods; v) Project teams will provide training and extension to enable improved adaptation practices in agriculture, agro-forestry and livelihood diversification; vi) The ESMP will evaluate climate risks and proposed measures to be instituted under the project to manage climate risks. These will be designed into the community livelihood activities to ensure that these are best adapted to the situation
Forest conversion can enhance climate risks and impacts	Enhancing conservation of intact forests	Peat lands and degraded forests are far more likely to burn than the fire resistant, multistory, intact forests planned under this project. As a consequence, the project will support the following activities to reduce forest degradation: i) An objective for this project is to conserve and increase area of intact forest, reduce conversion of peat lands to oil palm, which is much less vulnerable to the effects of climate and fire than fragmented landscapes; ii) The project will ensure that private oil palm companies, forest concessions and other sectors will agree (through MOUs) to ensure no loss of forest areas and enhance conservation outcomes in their practices; iii) Reduce the effects of non-climate stressors, such as pollution, overexploitation of natural resources, and land use change.
Social inequalities can exacerbate impacts of climate change on women and indigenous groups	Reduce vulnerabilities of women and indigenous groups to climate impacts	i) Identify populations most at risk and target adaptation measures toward them; ii) Ensure that measures/activities are implement by the project to enhance women and IPs capacity to adapt to climate impacts; iii) Empower women and marginalized populations and ensure that they are part of the decision-making process

Risk	Risk Management Objective	Project Climate Mitigation and Management Strategy
		through their participation in the KEE management forum and other local decision-making processes with regard to adaptation efforts, particularly regarding risks that differentially affect them (e.g., droughts, crop diseases, human-wildlife conflict, etc.); iv) The project will provide training and awareness to women and IPs regarding the risks associated with climate change and measures to reduce such risks; v) The IPP will evaluate climate risks on indigenous communities and propose measures to manage climate risks. These will be designed into the IP natural resource and livelihood activities to ensure that these are best adapted to the situation.
Limited technical and institutional capacity and information for climate management can exacerbate impacts	Information management	i) The project will provide technical and extension support to address climate effects, adaptation and mitigation actions as part of the KEE planning and community engagement process; ii) The ESMP and IPP will evaluate information access and propose measures to improve access and availability of information on climate risks and best practices for their management.
Monitoring of climate risks will be critical to ensure that the project benefits are effective	Monitoring of climate risks	i) The ESMP will detail out the actions for management and mitigation of potential social, environmental and climate risks associated by the project and will develop the indicators, baselines, protocols and procedures for identification, management, mitigation and reporting on these measures. ii) The RPMUs in particular, the Regional landscape specialists and the regional community engagement and gender specialists will have prime responsibility for ensuing that safeguard measures (including climate risk management) are implemented during project planning and implementation and in monitoring their outcomes. iii) The RPMU will regularly report the results of monitoring to the NPMU, where the safeguard and M&E specialist will be responsible for quality control, ensuring due diligence and overseeing and guiding this process.
Limited awareness of climate risks and its impacts	Improved awareness	i) Increasing awareness on climate and disaster risks through multi-stakeholder dialogues; ii) Capacitate extension services on delivering climate and disaster risk management assistance; iii) Sharing best practices among the CONSERVE/GWP Community of Practice.
Lack of financial support for local communities can constraint their ability to respond effectively to climate risks on the long-term	Financial support for climate risk management	i) The project will provide small-grant support to support diversification and support for improving livelihoods and incomes for local communities; ii) Additionally as a measure to attract non-GEF resources as a complementary support for climate responses, including on the longer-term, the project will seek to identify promising financial instruments that have been evaluated by BIOFIN; iii) These can be one or more of the following, depending on the assessment of their feasibility, including in particularly green-financing initiatives of Islamic funds for

Risk	Risk Management Objective	Project Climate Mitigation and Management Strategy
		biodiversity and environment (including zakat, waqf, sadaqa and infaq), ecological fiscal transfers (EFT), green sukuk, Corporate Social Responsibility (CSR), crowdfunding. Some of these green funds are particularly geared towards climate risk management; iv) The project will also seek opportunities for optimization of village funds so that it can be effectively used to enhance community productivity and diversification of incomes; v) The project will work with provincial governments to promote access to funding from provincial governments for maintenance of KEE investments on the longer-term.

Social and Environmental Safeguards

113. The Social and Environmental Screening Procedure (SESP) was followed during project preparation, as required by the SESP Guidance Note of the UNDP. Accordingly, the social and environmental sustainability of project activities is in compliance with the SESP for the project (see Annex 10). The SESP identified high social (particularly as there are customary communities in the project areas) and environmental risks for this project that would have potential negative impacts in the absence of safeguards. The overall project risk is assessed as "high". The following safeguards are triggered Principle 1: Human Rights, Principle 2: Gender Equality and Women's Empowerment, Principle 3, Standard 1: Biodiversity Conservation and Natural Resource Management; Standard 2: Climate Change Mitigation and Adaptation; Standard 3: Community Health, Safety and Working Conditions; Standard 4: Cultural Heritage and Standard 5: Displacement and Resettlement; 6 Indigenous Peoples; and Standard 7: Pollution Prevention and Resource Efficiency. The high risks relate to Principle 1 (Human Rights), Standard 3 (Community safety, health and working condition); Standard 5 (Displacement and Resettlement) and Standard 6 (IPs). An ESMF (Annex 20) has been developed at PPG stage, on the basis of which an ESIA will be undertake and based on it an ESMP will be prepared during the first year of project implementation – covering all the risks. All thematic management plans (CCP, etc.) will be prepared holistically as part of the ESMP. In addition, the following requirements of High Risk projects will be/have been met: (i) Comprehensive Stakeholder Engagement Plan (Annex 4); Customary Communities Planning Framework (Annex 11); Gender Action Plan (Annex 12) and GRM (to be prepared with ESIA/ESMP). All project activities contributing to these risks will not commence until the assessments have been completed and the management plan(s) have been approved and put in place. Additionally, to avoid any potential for any likely impacts, the project will ensure social and environmental screening of all proposed investments to determine if there are any impacts. If the impacts are considered significant or cannot be managed by simple and practical mitigation measures that can be implemented within the capacity of the communities, these activities will be avoided. When impacts are easily manageable, the National Project Management Unit (NPMU) would include responsibilities for ensuring oversight for these measures and monitoring of its implementation. Annually supervision missions will assess the extent to which the risks have been identified and managed. Overall, the project is expected to result in positive impacts for biodiversity conservation and socio-economic benefits through the greater participation of local communities in OECM management processes, sustainable use of forest and resources, and improved natural resources-based livelihood activities. A national safeguard/M&E officer will oversee and monitor the implementation of ESMP (including CCP, GAP, FPIC principles, etc.) for the project.

114. Specific efforts will be made while evaluating the condition of resources that will be used in livelihood and value chain programs to ensure that extraction is permissible within sustainable limits. Harvest of non-timber forest products such as abaca (*Musa textile*), rattan, nito fiber, medicinal plants and other products) that are currently practiced will follow ecologically friendly and sustainable practices. The project will ensure defining

specific areas and harvest rates on the basis of good practice criteria backed by scientific information and close monitoring.

115. The project does not involve large-scale infrastructure development. The project will not support employment or livelihoods interventions that may pose a potential risk to health and safety of communities and/or individuals or to biodiversity and ecosystem functions. While the project will not propose any temporary or permanent physical displacement, nor will there be the need for land acquisition or access restrictions, in cases where this is unavoidable, the project will prepare a Livelihood Action Plan for affected households to ensure that this risk is effectively managed and affected households have access to similar or better land and livelihood options. Similarly, activities related to oil palm plantation and mining could inadvertently support child labor and other violations of international labor standards and measures are necessary to avoid these concerns.

116. Any restrictions on access to and use of natural resources would not be imposed by the project proponents but would evolve through a collective decision-making process amongst the community members and be supported by alternative livelihood and resource measures that adequately compensate for any loss of income or resources. Grievance redress mechanisms will facilitate the resolution of any conflict related to resource use and access. The Customary Communities Plan to be developed as part of the ESMP will ensure that customary community groups and vulnerable groups (including rural women) are fully involved in decision-making in terms of resource use, livelihood and income generation investments and conservation action. The project will support the recruitment of consultants to undertake the ESIA and subsequent development of the ESMP and monitor the application of ESMP, CCP, GAP, FPIC principles, undertake social assessments in customary community areas and train and sensitize staff in the application of FPIC principles and practices. Specific institutional and administrative arrangements have been defined that encourages active participation of all households in a village and capacity building programs. Project proponents will apply FPICs as the basis for involvement of customary communities in project related activities. A Safeguard/M&E officer will be recruited and placed at the NPMU to oversee the implementation of environmental and social safeguard measures. All on-the-ground investments in terms of threatened species conservation, establishment of corridors, small-scale micro-enterprise development, land management and livelihood improvement will only commence once the SESA and ESIA have been completed as well as the ensuing ESMP, SESP screening procedures, and CCP has been developed and approved. Activities related to threatened species planning, SMART patrols, training and knowledge management that are risk-free can commence in parallel to the undertaking of the SESA and ESIA, but will integrate any specific recommendations coming out of the safeguard process, as relevant.

117. In line with UNDP standard procedures, the Project will set up and manage a **grievance redress mechanism** (GRM) as recommended by UNDP (2014) that would address project affected persons' (PAP) grievances, complaints, and suggestions. Measures will be included to ensure that that recognition of human rights are fully incorporated into the project plans. An oversight mechanism including GRM will be put in place to ensure that all project activities are carried in accordance with Indonesian Law and international legal obligations, and that any prosecutions supported by the project are carried out correctly and fairly. The GRM will be managed and regularly monitored by the NPMU and Regional Project Management Units (RPMUs). As part of the ESIA/ESMP process, the GRM procedures will be established.

Stakeholder engagement plan:

118. Consultations were conducted during the Project Preparation Grant (PPG) stage with key stakeholders. Initial stakeholder analysis during the PIF stage was followed up with consultation during the PPG stage in terms of the design of the project. During the PPG stage, the stakeholder analysis was updated and elaborated following consultations undertaken by international and national consultants at the landscape sites and with the national and provincial governments addressing both institutional stakeholders in the context of their statutory involvement in the project, and more broadly for non-governmental stakeholders including natural resource-dependent communities. A number of landscape level stakeholder workshops were conducted to obtain the perspective of the different stakeholders during the period September 2019 through January 2020. A number

of bilateral meetings with future partners were also conducted. A series of inception workshops were conducted in Jakarta and the three provinces between September – October 2019 to discuss the project design and reach general consensus on project outcomes, outputs, activities and institutional arrangements for the project. See Table 7 below of listing of consultations. The list of stakeholders consulted has been downloaded in PIMS.

Table 7: Consultations Meetings

CONSULTATIONS	DATE	STAKEHOLDERS
Kick off meeting of the Project Preparation	10 September 2019	Director General of Conservation on Natural Resources and Ecosystem, GEF Operational Focal Point Indonesia, Director of Biodiversity Conservation, Director of Conservation Area, Director of Environmental Services Utilization on Conservation Area, Director of Essential Ecosystem Management, BAPPENAS, BKSDA Aceh, BKSDA South Sulawesi, Wasur National Park, BKSDA NTB, International Cooperation Bureau, Financial Bureau, Planning Bureau, Overseas Cooperation Bureau, Environment and Forestry Human Resource Education and Training Center, Extension and Human Resources Development Agency, Biology Research Centre-LIPI, UNDP, PPG Team etc.
Consultation meeting in Ko'mara	Sept 13, 2019	National Agencies, Regional Agencies, Civil Society Organizations (CSOs), Non-Government Organizations (NGOs) and other key stakeholders
Consultation Meeting with NGOs on CONSERVE project initiation	Sept 14, 2019	Indonesian Elephant Conservation Forum, Indonesian Tiger Conservation Forum, Indonesian Rhino Conservation Forum, Wildlife Conservation Society (WCS), WWF, Fauna & Flora International (FFI), Zoological Society of London (ZSL), Burung Indonesia (BI), YIARI, YAPEKA.
Coordination meeting with BKSDA Bengkulu	16 September	Head of BKSDA Bengkulu, BKSDA Bengkulu Secretary, Head of Section Region I, Head of Bengkulu Forest Ranger, Head of Unit forest ranger, Coordinator of Ecosystem control officer, Head of administration division.
Consultation meeting with Bengkulu Government	16 September	Bengkulu Planning Body, Provincial Public Work Service, Begnkulu Environment and Forestry Service, District Research, Planning and Development Body, Muko-Muko District Public Work and Spatial Planning Agency, Regional Planning agency-North Bengkulu, North Bengkulu District-Public Work and Spatial Planning Agency, FMU Muko-muko, FMU North Bengkulu
Consultation meeting in Seblat	17 September 2019	Head of sub district Marga Sakti, chairman of village leader forum of Marga Sakti, head of village Suka Baru, Suka Maju, Suka Makmur, Suka Medan, Suka Merindu, Suka Negara,
PPG Team, UNDP & KKH-	5 November 2019	Mrs. Nining Ngudi- KKH , Mrs. Febri-BPEE, Mr. Fifien-KKH, Mr. Yayat Afianto-UNDP, Mr. WIshnu Sukmantoro- PPG – UNDP
Consultation meeting with director of KKH and KK	18 November 2019	PPG team members, UNDP, Dir KKH, Fifien-KKH, Krismangko-KKH, Eka-KKH
Problem tree and gap analysis meeting	22 November 2019	PPG team
Consultation meeting with BKSDA NTB	23 November 2019	PPG team, head of BKSDA and Staff
Consultation meeting in Moyo Island	December 2, 2019	Hunting park manager, village leader from Labuhan Haji and Sebotok village, NGO Sumbawa Biodiversity, and other key stakeholders

CONSULTATIONS	DATE	STAKEHOLDERS
Stakeholder consultants in Ulu Masen	February 10, 2020	Key Government and non-government stakeholders
Consultation meetings for UNDP capacity scorecard	February 17-18, 2020	Key provincial stakeholders in 3 provinces
National Consultations on project design	March 2020	All Key stakeholders (national, provincial, NGOs, etc.)
Private Sector	March 23, 2020	APHI and associated stakeholders
Validation workshop	April 17, 2020	Virtual meeting with key stakeholders
Stakeholder Consultation	November 24, 2020	MOEF and its directorates, BAPPENA, Provincial BKSDA, Private Sector Oil Palm Plantations, Institute of Forestry, FFI and other conservation NGOs, etc.

119. The purpose of the Stakeholder Involvement Plan (SIP) for the project (as reflected in Annex 4) is to ensure long-term sustainability of the project achievements, based on transparency and the effective participation of the key stakeholders. The objectives include the following: (a) to identify the main stakeholders of the project and their basic roles and responsibilities in relation to the project; and (b) to take advantage of the experience and skills of the main stakeholders, safeguard their active participation in different activities, reduce obstacles in project implementation, and sustain gains after project completion. The approach is based on the principles of fairness and transparency in selection of stakeholders, ensuring consultation, engagement and empowerment of relevant stakeholders. This is to ensure: (i) better coordination between them from planning to monitoring and assessment of project interventions; (ii) access of information and results to relevant persons; (iii) accountability of stakeholders; (iv) implementation of grievance and redress mechanism; and (v) sustainability of project interventions after its completion.

120. Stakeholder involvement will enhance the planning and management of biological landscapes in Indonesia. Their engagement will secure the conservation of globally and nationally important biodiversity within these landscapes, and help mainstream biodiversity and sustainable natural resource use in industrial plantation, forest concession and socio-economic activities. KSDAE will be instrumental in establishing collaborative links with other national and local governments, private sector, CSOs and local communities, while local governments will coordinate with sector and local level stakeholders. The Project may solicit the services of NGOs/Civil Society Organizations (CSOs) to implement project activities.

Identification of Potential Stakeholders

121. The SIP involves the identification of stakeholders at the national and subnational levels that would be engaged as project partners. These include government entities, private sector entities, CSOs and local communities.

Role and responsibilities of key stakeholders and their Involvement Mechanisms and Strategies

122. The SEP involves the identification of stakeholders at the national and subnational levels that would be engaged as project partners. These include government entities, both at national level and Provincial level, CSOs, private sector, academician and local communities.

123. Mechanisms and strategies for stakeholder involvement will ensure that relevant shareholders: (i) receive and share information, (ii) provide inputs in the planning, design, implementation, monitoring and evaluation of project initiatives, and (iii) play a role in sustaining the initiatives during and after the closure of the project. Roles and responsibilities of main stakeholders of the project are summarized in Annex 4. Early in project implementation, the KSDAE will develop a more detailed Stakeholder Engagement plan that would ensure: (a)

stakeholders' involvement in project planning, implementation and monitoring; (b) stakeholders engagement in social and environmental screening and risk monitoring; (c) free, fair and transparent methods of information sharing; (d) implementation of gender mainstreaming strategy and action plan; (e) measures to empower stakeholders and potential project beneficiaries; and (f) disclosure and accessibility of information.

Information dissemination means

124. As discussed in Annex 4, information will be disseminated to stakeholders through the following means: (i) project inception workshops at national and provincial levels to improve awareness of stakeholders to their respective roles in project planning, implementation and monitoring and the means/methods for their engagement; (ii) use of locally available communication channels (FPIC, village meetings, local community leaders, KEE management forum, etc.) to engage communities (including IPs) and private entities in the development of KEE plans, identification of roles/responsibilities for activity implementation; (iii) development of a KM and communication plan for each site that would identify the tools and methods for communication and dissemination; (iv) quarterly meetings with stakeholders; (v) sharing of dissemination notes and use of social media, as appropriate; (vi) stakeholder workshops; and (vii) end of project dissemination workshops. Refer Annex 4 for further details including stakeholder engagement approach; stakeholder participation mechanisms; stakeholder communication framework; etc.

Gender equality and Women's Empowerment:

126. In general, women are directly engaged in forestry, fishing, hunting, agriculture and animal husbandry as their main occupation in urban and rural areas and appear not to have pursued any further education beyond primary school, compared to the national average on education attainment (refer Annex 12). In Indonesia, land is a considered a crucial resource for poverty reduction, food security, and rural development. For women, land is closely related to a women's prosperity, where for example improved land tenure security can lead to the improvement of living conditions for both women and their children. Men and women do not, however, always have the same rights to land. In Indonesia, under both customary and formal laws and tenure systems, both men and women have rights to land ownership and land inheritance, but despite formal laws allowing women to own land and to inherit it from parents, certain cultural and religious practices, such as in Shari'ah law, constrain women's land rights and entitlements. Women's land rights are also constrained by cultural and traditional division of roles between men and women, where men subsume the role of heads of households and owners of land, and women subsume the roles of being wives and mothers.

127. In Indonesia, women are disproportionally vulnerable to the impacts from environmental perturbations and climate change. Women are more inclined to depend on forest resources and agriculture for food security, and they are often responsible for collecting potable water. Impacts from environmental perturbations and climate change, chiefly natural disasters, affect women's livelihoods, income and future employment, and therefore, endangering their health, decreasing their quality of life, increasing their time burdens and challenging their ability to provide adequate food for themselves and their families. Most women that depend on agriculture are engaged in subsistence farming, which often suffers from low productivity and has high vulnerability to climate change-related natural disasters, such as droughts and floods. When confronting natural disasters, many married women often have the ability to rely on the incomes of their husbands, who may work in other sectors. Single mothers and widowed women, however, do not have this luxury. Therefore, they are more prone to vulnerability, primarily because they have limited social safety nets, such as depending on the livelihoods and incomes of their husbands.

128. Traditionally, Indonesia's indigenous forest women have had the role of managing seeds that support food security of their communities, where their overall contribution to maintaining flora biodiversity is substantial. These women are also the bearers of traditional knowledge of skills associated with their livelihoods. These skills, among others, include shifting cultivation/rotational agriculture and the collection of non-timber forest products. Unfortunately, however, indigenous forest women face many obstacles such as poverty and

discrimination based on gender and ethnicity, which inhibit their ability to fully participate in community development. When it comes to role of gender in conservation, women are more concerned with biodiversity conservation, particularly plant biodiversity. Men, on the other hand, are more concerned with soil and land conservation. Forest conversion, for various reasons not just agricultural, has had deleterious impacts on local communities, especially for women, who are dependent on forest resources for subsistence. The loss of forest through conversion has also affected the availability of clean water and has, in turn, resulted in water scarcity for smallholder farmers. As a result, this negative outcome directly undermines human health and food security. Furthermore, indigenous women are even more negatively impacted because they have to take greater efforts, as part of their primary responsibilities, to collect forest products such as firewood, fodder, food items and other non-timber products. This is also harder for land-poor or landless households that exclusively rely on forest resources for their subsistence.

129. At the local level, forest management institutions are still dominated by male community members. Despite playing active roles in the management of forest resources, women's participation in all the stages of forest management and planning and decision-making processes in minimal, due primarily to social norms and power structures. It should be noted that women from marginalized local and customary communities are less likely to participate in community meetings. At these meetings, community governance matters are discussed and decided, including decisions on forest management. At the same time, communities are not homogenous, each community has its own social, economic and gender dynamics that influence the ability of women to access resources from forests. These differences are important to consider when implementing initiatives and interventions, such as social forestry programs. Without accommodations and safeguards for gender, in place, promoting interventions may be susceptible to elite capture and further marginalization of women and other community members. Moreover, having women's participation in forest management and governance is critical to achieving both forest sustainability and gender equality.

130. In order to ensure that women have a voice in project planning and decision-making, the project will seek to understand and expose gender-differentiated biodiversity practices, gendered knowledge acquisition and usage of, as well as gender inequalities in control over resources in selected biodiversity sites, which will inform policies regarding biodiversity conservation, sustainable use and the sharing of its benefits. It will also consider the influences of gender differences and inequalities on the conservation and sustainable use of biodiversity, and the ways in which these differences and inequalities influence how women and men in selected sites are affected by biodiversity policies, planning and programming.

131. The direct beneficiaries from the project will be at least 4,500 individuals (at least 30% of beneficiaries are women of which 25% would be women from the Customary Community groups) who will benefit from four inter-related components of the project. Likewise, the project will support a number of villages in the three sites that are expected to benefit from capacity building programs under this project.

132. A screening of the UNDP social and environmental screening (SESP) (see Annex 10) revealed a potential risk related to gender: "Project potentially may limit women's ability to use, develop and protect natural resources, taking into account different roles and positions of women and men in accessing environmental goods and services while also facing potential of having adverse impacts on gender equality and/or the situation of women and girls". A gender analysis was undertaken at PPG stage to determine the differentiated roles of women and men in biodiversity conservation and natural resources management, the impacts of biodiversity loss and resource degradation on women, and their potential role in reversing these trends. The results have been used to develop gender-responsive project interventions including sex-disaggregated indicators that will become the basis for monitoring and evaluation of the Project's impact on promoting gender equality and empowerment of women and youth including through the application of the UNDP gender maker. In addition, this gender assessment will also identify areas where negative impacts can be reduced and positive ones enhanced. During the implementation, the project will ensure equal opportunities for women and men to participate in decision-making. Steps will be taken to ensure that women's needs and interests are taken into account in management arrangements set up by the community, including encouraging women (particularly

customary community groups and rural women) to actively participate in community meetings and platforms that discuss project activities. In addition, gender and social inclusion considerations have been integrated into the project design (under Output 4.1).

133. Gender mainstreaming in the project will be addressed (see Annex 12) through the following actions:

- Identify and recognize the areas in which women play a key role in existing management systems and provide opportunities for women to further develop their existing roles.
- Meaningful consultations with women during the identification and design of models of management and incentive mechanisms, to ensure that women's perspectives help form the models and mechanisms developed. These models and mechanisms will reflect women's livelihood and subsistence priorities and needs.
- Equal representation of women in local forest management associations and agencies, collaborative and partnership working groups, which will implement local, community-based activities.
- Targeted training and technical assistance to women in local communities, ensuring that at least 40% of those are women and that training supports them to achieve livelihood objectives.
- Targeted training of women professionals among provincial and local governmental units, ensuring that 40% percent of the total trained staff is women.
- All targeted training and assistance should be organized separately for women to ensure that women can receive information about activities and opportunities specific to their needs, preferences, priorities, and so that they may ask questions.
- In sites where activities will involve land-based resources, targeted training and information will be provided to women on land ownership and tenure rights.
- Development and implementation of targeted forest management in the form of women's empowerment programs and/or activities, to increase women's participation in managing forest resources and services in their local communities and villages.
- Establishment of business and trade ventures run by women or have a majority women employees.
- Equal consideration of women in targeted awareness-raising actions for the project's integrated knowledge management strategy and action plan.
- Recruitment of a gender consultant to support the gender mainstreaming objectives of the project at national level and Community Engagement and Gender Specialist at the site level.
- Ensure and encourage equal opportunity recruitment of women for positions within the project management office, consultancies and other service providers.

South-South and Triangular Cooperation (SSTrC):

134. The project is a child project under the GEF Global Wildlife Program (GWP). Under this programmatic framework, with the coordination through the program steering committee, coordinated knowledge management and cross-fertilisation of the individual regional and national projects will be assured, including African and Asian countries. Beyond this general framework for SSTrC, the project does aim to engage specifically with other countries in South East Asia on IWT issues through strengthened presence in the ASEAN Senior Officials Meeting on Transnational Crime (SOMTC) and bilateral cooperation with key neighbouring countries that are transit or destinations for Indonesian wildlife, such as Vietnam, Thailand, Malaysia, Singapore and China. This will facilitate collaboration in forensics, HWC and Wildlife-Based Economy (WBE). In addition, efforts will be made to connect with Southern Africa in relation to the trade in African ivory as well as the Latin America and Caribbean in terms of managing landscapes for species such as the jaguar.

Innovativeness, Sustainability and Potential for Scaling Up:

135. The project will address sustainability as follows:

136. ***Financial sustainability*** will be achieved through ensuring that the KEE concept is tried and tested in the 3 sites that bring both the financial resources of the provincial governments and private oil palm companies, forest concessions and extractive industry in support of conservation. The project will demonstrate the benefits of conservation friendly new private sector business models that recognize the full range of environmental ecosystem services provided by KEE managed landscapes and their attendant ecosystems. Additionally, the project will support community livelihood and value chains that can provide a good model for promoting long-term community support for conservation, while enjoying the economic benefits of conservation-friendly enterprises. The project will also support development of market linkages for sustainable forest and agriculture products and services, ecotourism and local handicrafts and establishment of "brand" labels will ensure financial sustainability of local livelihoods that can provide economic benefits. The project will investigate support for establishment of Community level revolving funds that will help to financially sustain and expand investments beyond the project period and support green certification of biological landscape products and services to improve sustainability and value addition and train local entrepreneurs and enterprises. Implementation of such models through carefully developed business plans could lead to a diversification of funding base from sources such as ecotourism, non-timber forest products (NTFPs) and other mechanisms, when these becomes available. Further Output 3.4 will support efforts to attract non-GEF resources through a promising number of financial instruments that have been evaluated by BIOFIN. These can be one or more of the following, depending on the assessment of their feasibility, particularly the BIOFIN identified prioritized financial solutions for biodiversity, such as green-financing initiatives of Islamic funds for biodiversity and environment (including zakat, waqf, sadaqa and infaq), ecological fiscal transfers (EFT), green sukuk, Corporate Social Responsibility (CSR), crowdfunding and optimization of village funds[23]. The lessons from previous project were that community engagement was entirely dependent of GEF funds over a short-term of the project, but ensuring sustainability is dependent on a much longer-term engagement and availability of resources to enable communities to develop sustainable livelihoods and business enterprises that need enough time to develop.

137. ***Institutional sustainability*** will be improved capacity development and learning by doing within the three project sites. Provincial institutions such as Provincial BKSDA, provincial government sector agencies, OECM management forums, etc.), local government, customary communities, civil society organizations and local community groups, will cooperate with private sector entities to bring about an integrated OECM approach and consequently benefit from improved cooperation and sharing of responsibilities. Overall, this would facilitate establishment of alliances for conservation and sustainable use of landscape resources that can continue beyond the project period if properly developed and nurtured. To facilitate capacity building the project will support the development and operationalization of tailored training and capacity building to enhance the skills of the private sector companies and provincial governments in environmentally-friendly plantation development, forest concession management and extractive industry operations. In addition local communities will have enhanced skills in ecotourism, sustainable livelihoods and management of smallholder plantations as well as skills and capacity for small-scale local entrepreneurship development. The building of coordination structures at the landscape level (such as multi-stakeholder OECM Management Forums with decision-making power) will help improve institutional support and hopefully long-term sustainability. As part of the replication strategy, the project will seek to disseminate the results of the project experiences regionally and nationally, and with the support of the KSDAE work towards institutionalization of these coordination and KEE implementation mechanisms throughout the country.

138. ***Social sustainability*** will be improved through the strengthening of multi-stakeholder participation in the target sites. In addition, the community participation in the KEE management forum can facilitate community

[23] *Zakat*: supported by obligatory contribution by wealthy Muslims that is available for the economically insecure communities: *Waqf*: charitable trust created by legal actions of donors to transfer physical assets or cash to benefit the general public; *Sadaqa*: Voluntary charity for small infrastructure, water supply, crops and small local business; *Infaq*: type of charity in Islam that is given without any expectation of reward or return; *Green Sukuk*: leveraged private finance for green sustainable projects; ETI: fiscal transfers for environmental and ecological initiatives through revenue-sharing arrangements between various levels of government; Crowdfunding: It allows individuals to contribute directly to, and invest in biodiversity-related activities.

involvement in the decision-making process and ensure that activities are socially acceptable. A GRM system is also envisaged that would enable the resolution of any social conflicts that may emerge. The Knowledge Management and Communication Framework (see Annex 13) will facilitate creation of awareness and benefits of the integrated KEE approach. The Framework for Implementation of Essential Ecosystem Areas based on existing steps for planning and Implementation of KEEs (see Annex 9) is expected to ensure adequate consultation and participatory decision making to ensure that project activities are detailed in collaboration with local communities, so that extensive consultation including all affected groups is undertaken prior to delineation of landscape areas for KEE management and its zoning so as to avoid excessive community resource use areas or to improve the management of such uses. Social sustainability will also be achieved by strengthening of community institutions, ensuring their active participation in planning and implementation of conservation and sustainable natural resources management and improving community capacity for decision-making and management of natural resources.

139. ***Environmental sustainability*** will be achieved through efforts to ensure that biodiversity and habitats outside PAs are managed in a biodiversity-friendly manner consort with the effective and integrated managed of the varied activities within the broader multi-use landscapes. The project intends to support a coordinated effort with the support of the stakeholders within the landscape to support improved protected area management, sustainable forest and land management, private sector participation in development of new, environmentally sustainable extractive and plantation industry plans so as to ensure environmental sustainability. By involving a multitude of stakeholders and economic interests within these landscapes, the project will try to bring in a more sustainable management regime that can ensure environmental sustainability. Through such an integrated management approach it is anticipated that threats to key species and habitats could be reduced or managed as well as to control poaching and illegal and unsustainable wildlife trade. The environmental sustainability of the captive breeding and sustainable use of wildlife resources is governed by clearly defining regulations for sustainable harvest and hunting including population thresholds in the wild, harvest seasons and numbers, harvest and hunting methods and locations, hunting trophy rates and revenues to be channeled to the conservation area and local communities, health aspects linked to zoonosis, etc. A robust monitoring program will be established to assess the health of the selected hunting species to determine harvest and hunting limits, recuperation rates, ex-situ breeding rates, etc. and thus justify the environmental and ecological sustainability of the activity.

140. ***Innovation:*** The project design is innovative in several ways. First, it proposes to pilot some of the first programs in Indonesia for integrated landscape and management planning in large biologically important landscapes for species conservation, in particular for areas outside PAs. This approach, called OECMs or Essential Ecosystems Areas (KEE) sets in motion a defined step-by-step process that ensures active participation of all relevant stakeholders in planning, decision-making and management to ensure that conservation is integrated into production landscapes outside of the PA network. It is particularly innovative, and different from other landscape approaches for the following reasons; (i) it is the formally agreed approach of the Government of Indonesia for management of landscapes; (ii) it delegates decisions regarding application of the KEE approach to the local level (district or provincial administration) to ensure local political support and legalization by the Governor; (iii) it clearly defines a consultative process (within defined timeframes) for identification of the KEE landscape; (iv) sets out the stakeholder coordination arrangements, partnerships and collaboration through a multi-stakeholder management forums; (v) it supports a balanced approach between conservation, sustainable resource use and community livelihoods so as to ensure benefits are wide spread; (vi) defines responsibilities and outcomes at different steps (area definition, conservation, ecosystem recovery and sustainable use) in the guidelines; (vii) defines budgetary options for support to KEE (including from provincial government budgets; regional expenditure, private sector funding, green financing, etc.); (viii) ensures corporate social and environmental responsibility; and (ix) defines a system for reporting, monitoring, evaluation and feedback. The innovation is further demonstrated by ensuring an ecology-based zonation by using a patch-matrix model for biodiversity conservation, taking account of landscape ecology, inter-connectedness, vegetation zoning, regional land-use planning, nature and cultural landscape integration, etc. (i.e. landscape planning). It is also innovative because it would seek to link “corridors” and forest protection as part of a larger effort to improve biodiversity conservation outcomes and improve connectivity of individual

parts of the larger biological landscape. It will also serve as a pilot to develop and test sustainable financing mechanisms at the local level (community or village level) to improve incentives for community engagement in conservation, including establishment of local level revolving funds, accommodation surcharges, etc.

141. ***Potential for scaling up****:* The project will provide integrated KEE models that can provide the learning and experiences to enable up-scaling in Indonesia. The development and application of biodiversity-friendly guidelines for application in palm oil plantations, forest concessions and extractive industry can help promote new business models that can be applied by the private sector. Lessons learnt from the demonstration sites can be disseminated widely to help generate demand throughout the country. The Project will also try to attract private sector and government budgetary resources with objective of raising additional investments that will fund and expand models within and outside of the targeted landscapes. The replication and scaling up strategy to be developed (Output 4.3) will assess sustainable financial and institutional arrangements for scaling up, support identification of new biological corridor sites, develop a best practice manual and conduct dissemination events to encourage uptake of integrated KEE management approaches in other sites. In particular activities to be undertaken as part of the effort of scaling up are reflected in Output 4.3.

V. PROJECT RESULTS FRAMEWORK

This project will contribute to the following Sustainable Development Goal (s):

SDG Target 15: Life on Land (Sustainably manage forests, combat desertification, halt and reverse land degradation, halt biodiversity loss

1. Target 15.1: By 2020, ensure the conservation, restoration and sustainable use of terrestrial and inland freshwater ecosystems and their services, in particular forests, wetlands, mountains and drylands, in line with obligations under international agreements
2. Target 15.5: Take urgent and significant action to reduce the degradation of natural habitats, halt the loss of biodiversity and, by 2020, protect and prevent the extinction of threatened species
3. Target 15.7: Take urgent action to end poaching and trafficking of protected species of flora and fauna and address both demand and supply of illegal wildlife products
4. Target 15.9: By 2020, integrate ecosystem and biodiversity values into national and local planning, development processes, poverty reduction strategies and accounts
5. Target 15.c: Enhance global support for efforts to combat poaching and trafficking of protected species, including by increasing the capacity of local communities to pursue sustainable livelihood opportunities

SDG Target 1: End Poverty in all its form everywhere:

Target 1.1. By 2030, ensure that all men and women, in particular the poor and the vulnerable, have equal rights to economic resources, as well as access to basic services, ownership and control over land and other forms of property, inheritance, natural resources, appropriate new technology and financial services, including microfinance

This project will contribute to the following country outcome (UNDAF/CPD, RPD, GPD): Outcome 3 (UNCPD 2021-2025): By 2025, Institutions, communities and people actively apply and implement low carbon development, sustainable natural resources management, and disaster resilience approaches that are all gender sensitive.

CPD Output 3.2: Strengthened and expanded protection, governance and management of terrestrial and aquatic ecosystems, habitats and species (Strategic Plan output1.4.1)

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
Project Objective: *Strengthen management of multiple use landscapes to enhance biodiversity conservation, generate sustainable land-use and livelihood practices and address illegal wildlife trade*	***Indicator 1*** *(GEF Core Indicator 4):* *Area of landscapes under improved practices (excluding Protected areas) to benefit biodiversity.* *This is measured by the development and operational of new OECMs under existing KEE guidelines with integrated multi-stakeholders' programs and budgeting as defined by:* *(i) promulgation of decree for establishment of OECMs through under existing Essential Ecosystem Areas (KEEs) guidelines;*	*Around 70% of remaining HCV forests under threat of further fragmentation, particularly in Sumatra due to oil palm cultivation (this figure will be validated for each site in Year 1)* *Around 29.091 hectares Elephant Corridor in the Landscape Seblat* *Meanwhile, of the six ecoregions in Sumatra, some are still in good condition based on* *the amount that is included in the classification of essential ecosystems. Sumatran tropical pine forest and Sumatran montane rain forest has the*	*Biological landscape integrated frameworks agreed among all stakeholders, for achieving long-term conservation outcomes corridors and at least* ***150,000*** *hectares under improved management*	*At least* ***740,000 hectares*** *(excluding protected areas covered under Indicator 2) of biological landscapes under improved management through establishment and improved management of Other Effective Area-based Conservation Measures (OECMs) through existing KEE mechanism* Targeted area with high biodiversity inventoried and verified by UPT KSDAE until 2025: 1. Aceh 333,203 Ha (708,389.7 Ha total area biodiversity scoring analysis) 2. Bengkulu and Lampung 294,180 Ha (583,940,38 Ha)

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
	(ii) formalization of multi-stakeholder forum for decision-making on OECMs; *(iii) Approval of strategy and plan for OECMs;* *(iv) Provincial government financing for OECM plan;* *(v) Commitment of provincial government for continuation of FMU mechanism for production forests within OECMs;* *(vi) Strengthened BKSDA and provincial Forest Units with staff and equipment for KEE plan implementation;* *(vii) Private sector commitment and financing for OECM plan forest restoration and protection;* *(viii) Village Fund focused on OECM compatible actions; and* *(ix) monitoring system operational to monitor OECM effectiveness, etc.* *Source of baseline:* 1. *Analisis kesenjangan keterwakilan ekologis Kawasan Konservasi di Indonesia, 2010. Ditjen PHKA. Kemenhut.* 2. *LKJ Dit. BPEE tahun 2020.* 3. *https://www.theguardian.com/world/2013/may/26/sumatra-borneo-deforestation-tigers-palm-oil*	*largest area of essential ecosystems, sized 76.87% and 63.76%. While the smallest ecoregion area in an essential ecosystem is the Sumatran freshwater swamp forest with only the size 8.80%.* *Essential ecosystems in Sumatra reach around 12.8 million hectares or 30.37% of the total area of Sumatra. Only 26.18% of this area is represented in the conservation area, while the rest is divided into areas: protection forest (25.32%), production forest (19.11%), and limited production forest (16.47%).*		3. There is no target for Moyo.
	Indicator 2 *(GEF Core Indicator 1.2):* *Protected Areas under improved management and sustainable use covering 81,845 hectares*	*Baseline METT scores (in point):* *Jantho Nature Reserve - 33* *Jantho Nature Recreation Park - 36* *Seblat Nature Recreation park – 36*	*Increased of average of 5 points from existing baselines*	*Increased of average of 15-20 points from existing baselines*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
		Moyo Nature Recreation Park– 35 *Moyo Hunting Park - 27*		
	Indicator 3 *(GEF Core Indicator 11):* *Number of direct beneficiaries disaggregated by gender as co-benefits of GEF investment*	*Actual number of individuals participating in co-benefits will be validated in Year 1*	*At least 1,000 individuals are directly benefiting from sustainable natural resources management, sustainable use of wildlife resources and improved and alternative livelihoods and incomes (at least 300 women beneficiaries of which at least 100 are women from custodian communities)*	*At least 4,500 individuals, directly benefit through sustainable natural resource management, sustainable use of wildlife resources and livelihood improvement approaches (at least 1,350 women beneficiaries, of which at 450 are women from custodian communities)*
Component 1: Strengthened management and protection of multiple use landscapes for the conservation of key threatened species				
Outcome 1 Effective policy, coordination, regulatory and institutional framework for planning, management, compliance monitoring, enforcement and decision making for integrated management of biological landscapes developed and implemented	***Indicator 4****: Number of actions from existing key species strategies and action plans (elephant, tiger, and yellow crested Cockatoo) agreed with stakeholders and applied within pilot sites*	*Key threatened species strategies and emergency action plans under finalization*	*Action plans formally approved and key species actions integrated into KEE management plans and budgetary provisions made through the project and provincial budgets for their effective implementation*	*At least 3 key action plans for each threatened species for tiger, elephant and yellow crested Cockatoo implemented within project sites, monitored for their effectiveness and included in provincial budgets for their continued implementation beyond the project period.*
	Indicator 5*: Number of policy instruments that are in place and applied to integrate biodiversity outcomes in sector and national and local planning policy and programs*	*Current policies need to better address impacts on broader ecological principles and processes for the survival of species, maintenance of ecological services, and habitat connectivity.*	*Policies reviewed, gap assessed and draft policy instruments under review*	*At least five instruments (update/creation of provincial decrees for establishment of KEEs; establishment of KEE Forums; KEE management body in place, establishment of budgetary norms/procedures for financing KEE actions, FMU guidelines, Village Fund use procedures, etc.) for improving biodiversity outcomes within the biological landscapes developed and adopted*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
	***Indicator 6**: Level of institutional capacities for planning, implementation and monitoring integrated biodiversity management planning in OECMs as measured by UNDP's capacity development scorecard for the following institutions:* *1. Directorate of Biodiversity Conservation of Ministry of Environment and Forestry (KSDAE)* *2. Provincial BKSDA of Bengkulu* *3. Provincial BKSDA of Aceh* *4. Provincial BKSDA of West Nusa Tenggara*	*Limited institutional capacities for planning, implementation and monitoring of multiple use OECM planning and management in biological landscapes as measured by UNDP Capacity Development Scorecard baseline values as indicated below:* *KSDAE/MOEF-29* *BKSDA Bengkulu: 12* *BKSDA Aceh: 12* *BKSDA West Nusa Tenggara 10*	*Average increase of institutional capacity as measured by a 5 point increase in UNDP Capacity Development Scorecard baseline values for the 3 OECMs*	*Average increase of institutional capacity as measured by 15 points in UNDP Capacity Development Scorecard from baseline values for the three OECMs*
	***Indicator 7**: Population density of key species in the target landscapes* *1. Sumatran tiger* *2. Sumatran elephant* *3. Yellow-crested cockatoo* *[Baselines sources are FFI tiger team, FFI 2019 (unpublished data) for Ulu Masen and Seblat; and Source for Moyo island is BKSDA (* *Naïve occupancy estimate is the proportion of the area occupied by a particular species during the transect surveys. These figures are currently being converted to density estimates that would be available by the launch workshop}*	*Key species under continued threat from forest loss, degradation, loss of connectivity and poaching. Baselines are:* *Seblat* • *Sumatran Tiger: Naïve occupancy estimate 0.88/100km²* • *Sumatran Elephant: naive occupancy estimate 0.1/100km²* *Aceh:* • *Sumatran Tiger: naive occupancy estimate 0.80/100km²* • *Sumatran Elephant: naive occupancy estimate 0.69/100km²* *Moyo* *Yellow crested cockatoo: 0.27 individuals/km²*	*Density of key species populations validated and monitoring protocols established*	*Key species population densities stable or increasing from baseline values*
	***Indicator 8**: Number of HWC cases reported and responded by authorities and communities* *- Human-tiger conflict* *- Human-elephant conflict*	*HWC based on:* *ii) Number of HWC conflicts reported* *Ulu Masen. E: 56, T: 7* *Seblat: E:3 T:6*	*At least 30% decrease in human-wildlife conflict reported based on HWC responded*	*At least 50% decrease in human-wildlife conflict reported and reduction of agricultural crops and cattle loss reported due to HWC*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
	- *Crop damage and livestock depredation*	*Moyo: no conflict* *(ii) Number of reports of destruction of agricultural crops, and/or cattle losses* *Ulu Masen E: 45, T: 5* *Seblat: E:0, T:2* *Moyo no conflict* *Baseline data on frequency above will be validated in Year 1*	*At least 50% reduction of agricultural crop and cattle loss reported based on HWC*	
Outputs to achieve Outcome 1	***Output 1.1: Key species strategies and action plans implemented with adequate investments in new tools and equipment*** ***Output 1.2: Improved policies,*** *regulations, guidelines and planning frameworks for development of integrated management of biological landscapes and integrating biodiversity into key development strategies of public and private sectors developed and adopted* ***Output 1.3:*** *Planning for the application of OECM approaches, including creation of management body for overseeing law enforcement, improve key threatened species and habitat management and monitoring, and support biodiversity-friendly enterprises in the project landscapes* ***Output 1.4:*** *Measures for management and control of human-wildlife conflict and anti-poaching developed and implemented with incentive mechanisms for forest-fringe communities*			
Component 2. Enhanced site-based enforcement and monitoring of sustainable use of wildlife resources				
Outcome 2 Improved site-based enforcement and monitoring of wildlife resources through enhancement and deployment of state-of-the-art technologies and traditional wisdom	***Indicator 9:*** *Reduction in threats at target sites as measured by the increase of foot patrol distances (kilometers) and decrease in illegal activity (as measured by traps encountered, people apprehended, etc.)*	*Total number of current SMART-RBM patrols in 3 sites as follows:* *Ulu Masen – 18.29 kilometers/month (1 patrol twice a month)* *Seblat: 36.58 kilometers/month (2 patrols/ twice a month)* *Moya: 9.14 kilometers/ month (1 patrol/once a months)* *Baseline based on average distances covered by single patrol teams/month from Gurung Leuser NP (2016-2019) that will be validated in Year 1 for each of the 3 sites.* *Baselines in terms of average number of annual recorded illegal activities*	*Number of SMART-RBM patrols* *Ulu Masen – 54.87 kilometers/month (3 patrols/twice a month)* *Seblat: 54.87 kilometers/ month (3 patrols/twice a month)* *Moya: 18.28 kilometers/ month (1 patrol/twice a month)* *30% average decrease in illegal activities detected from baseline*	*Number of SMART-RBM patrols* *Ulu Masen – 109.74 kilometers/month (6 patrols/twice a month)* *Seblat: 73.12 kilometers/month (4 patrols/twice a month)* *Moya: 36.56 kilometers/month (2 patrols/twice a month)* *80% average decrease in illegal activities detected from baseline*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
		(poaching, IWT, etc.) will be assessed in Year 1		
	***Indicator 10**: frequency and effectiveness of community patrols to reduce threats from poaching and illegal activities*	*Ulu Masen – 212 patrols days/year* *Seblat – 168 patrol days/year* *Moyo – 60 patrol days/year* *Baseline in terms of frequency of patrols available from Ulu Masen (FFI data 2019), Seblat (BKSDA-Bengkulu), and Moyo (BKSDA-NTB).*	*Increased frequency of Community patrols/year* *Ulu Masen – 275 patrol days/year* *Seblat – 218 patrol days/year* *Moyo –78 patrol days/year*	*Increased frequency of Community patrols/year* *Ulu Masen – 424 patrol days/year* *Seblat – 251 patrol days/year* *Moyo – 96 patrol days/year*
	***Indicator 11**: Number of IWT crime investigations conducted using DNA analysis through enhanced site-based genetics technology accredited in project provinces*	*No capacity at provincial level to support DNA-based investigation related to IWT* *Currently only a single national DNA-based data analysis institute in the country has ability to DNA-based investigation* .	*The capacity ta provincial level to support DNA-based investigation related to IWT established* *Aceh Province – 1 laboratory* *Bengkulu Province - 1 laboratory* *West Nusa Tenggara Province - 1 laboratory*	*The capacity at provincial level to DNA-based investigation related to IWT operational to support:* *At least 60% of the DNA-based investigations originating from the three provinces is undertaken by the new capacitated local laboratories*
Outputs to achieve Outcome 2	***Output 2.1: Strengthened SMART implementation in the framework of RBM (Resort Base Management) with multi-stakeholder involvement in high conservation areas by strengthening existing SMART patrol system*** ***Output 2.2: Community Patrol Model established, operationalized and integrated into SMART-RBM system in target sites*** ***Output 2.3 Strengthened local institutional capacity for Wildlife Genetic Assessment to support Law Enforcement Monitoring (LEM)***			
Component 3: Improved private sector and community engagement and diversified financing for biodiversity conservation across the selected landscapes				
Outcome 3 Increased private sector and community engagement in biodiversity and species conservation	***Indicator 12**:* *Area of forests and forest lands set-aside as wildlife corridors and/or under improved conservation practice in private holdings* *This will include forests in private forest concessions and industrial plantations that will support improving key threatened species*	*0 (no wildlife corridors established in project sites)*	*Around 5,000 ha of forests and forest lands set-aside as wildlife corridors and/or under improved conservation practice*	*At least 60,000 hectares of forests and forest lands set-aside as wildlife corridors and/or under improved conservation practice*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
	habitats in Sumatra (Aceh and Bengkulu)			
	***Indicator 13**: Number of private forest concessionary and industrial plantation business models with improved conservation outcomes under effective implementation as measured by:* *-Business plans fully integrating conservation outcomes* *-Increase in private funding allocated for conservation activities* *-Number of dedicated staff implementing conservation activities*	*Baseline of existing conservation-friendly business models will be assessed in Year 1*	*At least 6 additional forest concessionary and industrial plantation business plans developed and agreed to and staff trained to implement these plans*	*At least 6 additional forest concessionary and industrial plantation business plans effectively implemented for conservation outcomes with 50 % increase in funding*
	***Indicator 14**: Increase in income of community members that includes women headed households from community enterprise.* *-High-value products from coffee, cacao, turmeric, durian, rattan fiber and rattan fruit ("Dragon's Blood" dye)[=].* *-Status of community development fund* *This list will be refined during initial consultation with local communities* *Baseline incomes of households are as follows: Ulu Masen between USD 750-1980/year (Source Socioeconomic and Gender Profiles of North Sumatra 2016)* *Bengkulu around USD 750/year (Source: Senoaji 2009)*	*Baselines of average incomes will be established in Year 1 for each site.* *No village Development Fund exists*	*At least 5% average increase in income for 25% of participating households based on action plans for improved business models agreed and implementation initiated in Year 2 (at least 20% beneficiary households must be women-headed). Village Development Funds established*	*At least 15% average increase in income for 75% of participating households based on action plans for improved business models agreed and under implementation initiated (at least 20% beneficiary households must be women-headed). Village Development Funds operational*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
	Moyo island USD 865 – 1,500/year (Source: Achmand, B and Diniyati D 2018). The variance in earnings within landscapes is dependent on livelihood sources. These figures will be validated for the project sites during the community consultation process in Year 1			
Outputs to achieve Outcome 3	***Output 3.1: Private sector partners actively engaged in environmentally-friendly practices*** ***Output 3.2: Incentive/reward system developed and implemented in private sector business planning for reducing forest degradation and improving to promote wildlife conservation in forest concessions*** ***Output 3.3:*** *Innovative mechanisms that promote sustainable traditional hunting practices by integrating local wisdom and experiences to generate revenues for local communities (particularly in Moyo landscape)* ***Output 3.4: Community-based biodiversity-friendly livelihood and business enterprises promoted for sustainable use of natural resources and avoid biodiversity loss***			
Component 4: Upscaling/replication of project approaches at national and regional level				
Outcome 4 **Effective knowledge management, gender mainstreaming and monitoring and evaluation for key species conservation enhanced**	***Indicator 15****: Level of awareness on IWT, KEE and threatened species conservation in the landscapes as indicated by KAP survey.*	*Baseline survey will be established in Year 1* *Currently coordinated outreach on conservation threats lacking. Limited awareness of impact of unplanned development among general public.*	*At least 40% sampled community members, government and sector agency staff, private sector and other stakeholders (at least 40% women) aware of potential conservation threats and adverse impacts of unplanned developments and actions needed for corridor conservation*	*At least 60% (of which at least 40% women) of sampled community members, government and sector agency staff, private sector and other stakeholders aware of potential conservation threats and adverse impacts of unplanned developments and behavior change for biodiversity outcomes*
	Indicator 16*: Number of good practice conservation and sustainable resource management approaches documented and shared via GWP platform and other media.* *-Information management systems strengthened* *-Annual learning workshops including participation in GWP annual*	*Limited number of good practices in conservation and sustainable resource management codified, disseminated and applied*	*At least five good practices in conservation and sustainable resource management codified and adopted and shared with GWP platform and other media*	*At least twenty good practice in conservation and sustainable resource management codified and disseminated nationally and adapted and shared with GWP platform and other media.*

	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
	meetings, regional workshops, HWC COP etc.			
Outputs to achieve Outcome 4	***Output 4.1: Knowledge Management and Communications, Gender Mainstreaming and Monitoring and Evaluation strategies developed and implemented*** ***Output 4.2: Harmonized information management system to integrate lessons from the biological landscapes and user friendly operational*** ***Output 4.3: Knowledge Management and gender mainstreaming contribute to sharing of learning and advance replication and scaling up of gender sensitive biodiversity management approaches elsewhere in the country.***			

VI. MONITORING AND EVALUATION (M&E) PLAN

142. The project results, corresponding indicators and mid-term and end-of-project targets in the project results framework will be monitored annually and evaluated periodically during project implementation. If baseline data for some of the results indicators is not yet available, it will be collected during the first year of project implementation. The Monitoring Plan included in Annex details the roles, responsibilities, frequency of monitoring project results.

143. Project-level monitoring and evaluation will be undertaken in compliance with UNDP requirements as outlined in the UNDP POPP and UNDP Evaluation Policy. The UNDP Country Office is responsible for ensuring full compliance with all UNDP project monitoring, quality assurance, risk management, and evaluation requirements.

144. Additional mandatory GEF-specific M&E requirements will be undertaken in accordance with the GEF Monitoring Policy and the GEF Evaluation Policy and other relevant GEF policies[24]. The costed M&E plan included below, and the Monitoring plan in Annex, will guide the GEF-specific M&E activities to be undertaken by this project.

145. In addition to these mandatory UNDP and GEF M&E requirements, other M&E activities deemed necessary to support project-level adaptive management will be agreed during the Project Inception Workshop and will be detailed in the Inception Report.

Additional GEF monitoring and reporting requirements:

146. Inception Workshop and Report: A project inception workshop will be held within 60 days of project CEO endorsement, with the aim to:

- Familiarize key stakeholders with the detailed project strategy and discuss any changes that may have taken place in the overall context since the project idea was initially conceptualized that may influence its strategy and implementation.
- Discuss the roles and responsibilities of the project team, including reporting lines, stakeholder engagement strategies and conflict resolution mechanisms.
- Review the results framework and monitoring plan.
- Discuss reporting, monitoring and evaluation roles and responsibilities and finalize the M&E budget; identify national/regional institutes to be involved in project-level M&E; discuss the role of the GEF OFP and other stakeholders in project-level M&E.
- Update and review responsibilities for monitoring project strategies, including the risk log; SESP report,; project grievance mechanisms; gender strategy; knowledge management strategy, and other relevant management strategies.
- Review financial reporting procedures and budget monitoring and other mandatory requirements and agree on the arrangements for the annual audit.
- Plan and schedule Project Board meetings and finalize the first-year annual work plan.
- Formally launch the Project.

GEF Project Implementation Report (PIR):

147. The annual GEF PIR covering the reporting period July (previous year) to June (current year) will be completed for each year of project implementation. Any environmental and social risks and related management plans will be monitored regularly, and progress will be reported in the PIR. The PIR submitted to the GEF will be shared with the Project Board. The quality rating of the previous year's PIR will be used to inform the preparation of the subsequent PIR.

[24] See https://www.thegef.org/gef/policies_guidelines

148. Knowledge management: The project team will ensure extraction and dissemination of lessons learned and good practices to enable adaptive management and upscaling or replication at local and global scales. Results will be disseminated to targeted audiences through relevant information sharing fora and networks. The project will contribute to scientific, policy-based and/or any other networks as appropriate (e.g. by providing content, and/or enabling participation of stakeholders/beneficiaries)

GEF and/or LDCF Core Indicators:

149. The GEF and/or LDCF/SCCF Core indicators included as Annex will be used to monitor global environmental benefits and will be updated for reporting to the GEF prior to MTR and TE. Note that the project team is responsible for updating the indicator status. The updated monitoring data should be shared with MTR/TE consultants prior to required evaluation missions, so these can be used for subsequent ground truthing. The methodologies to be used in data collection have been defined by the GEF and are available on the GEF website. The required Protected Area Management Effectiveness Tracking Tool (METTs) have been prepared and the scores include in the GEF Core Indicators.

Independent Mid-term Review (MTR):

150. The terms of reference, the review process and the final MTR report will follow the standard templates and guidance prepared by the UNDP IEO for GEF-financed projects available on the UNDP Evaluation Resource Center (ERC).

151. The evaluation will be 'independent, impartial and rigorous'. The consultants that will be hired by UNDP evaluation specialists to undertake the assignment will be independent from organizations that were involved in designing, executing or advising on the project to be evaluated. Equally, the consultants should not be in a position where there may be the possibility of future contracts regarding the project under review.

152. The GEF Operational Focal Point and other stakeholders will be actively involved and consulted during the evaluation process. Additional quality assurance support is available from the BPPS/GEF Directorate.

153. The final MTR report and MTR TOR will be publicly available in English and will be posted on the UNDP ERC by June 30, 2024. A management response to MTR recommendations will be posted in the ERC within six weeks of the MTR report's completion.

Terminal Evaluation (TE):

154. An independent terminal evaluation (TE) will take place upon completion of all major project outputs and activities. The terms of reference, the evaluation process and the final TE report will follow the standard templates and guidance prepared by the UNDP IEO for GEF-financed projects available on the UNDP Evaluation Resource Center.

155. The evaluation will be 'independent, impartial and rigorous'. The consultants that will be hired by UNDP evaluation specialists to undertake the assignment will be independent from organizations that were involved in designing, executing or advising on the project to be evaluated. Equally, the consultants should not be in a position where there may be the possibility of future contracts regarding the project being evaluated.

156. The GEF Operational Focal Point and other stakeholders will be actively involved and consulted during the terminal evaluation process. Additional quality assurance support is available from the UNDP-GEF Directorate.

157. The final TE report and TE TOR will be publically available in English and posted on the UNDP ERC by *30 March 2027*. A management response to the TE recommendations will be posted to the ERC within six weeks of the TE report's completion.

Final Report:

158. The project's terminal GEF PIR along with the terminal evaluation (TE) report and corresponding management response will serve as the final project report package. The final project report package shall be discussed with the Project Board during an end-of-project review meeting to discuss lesson learned and opportunities for scaling up.

159. Agreement on intellectual property rights and use of logo on the project's deliverables and disclosure of information**:** To accord proper acknowledgement to the GEF for providing grant funding, the GEF logo will appear together with the UNDP logo on all promotional materials, other written materials like publications developed by the project, and project hardware. Any citation on publications regarding projects funded by the GEF will also accord proper acknowledgement to the GEF. Information will be disclosed in accordance with relevant policies notably the UNDP Disclosure Policy[25] and the GEF policy on public involvement[26].

Monitoring and Evaluation Plan and Budget

This M&E plan and budget provides a breakdown of costs for M&E activities to be led by the Project Management Unit during project implementation. These costs are included in Component 4 of the Results Framework and TBWP. For ease of reporting M&E costs, please include all costs reported in the M&E plan under the one technical component. The oversight and participation of the UNDP Country Office/Regional technical advisors/HQ Units are not included as these are covered by the GEF Fee.

GEF M&E requirements	Indicative costs (US$)	Time frame
Inception Workshop(s) including national and provincial	10,000	Within 60 days of CEO endorsement of this project.
Inception Report	None	Within 90 days of CEO endorsement of this project.
M&E of GEF core indicators and project results framework	59,000	Annually and at mid-point and closure.
GEF Project Implementation Report (PIR)	None	Annually typically between June-August
Monitoring of safeguards including SESP, ESMP, Customary Community Management Plan, Grievance redressal and gender action plan	59,000	On-going.
Supervision missions	None	Annually
Contract evaluator to conduct Independent Mid-term Review (MTR) and management response	27,000	28 February 2025
Contract evaluator to conduct Independent Terminal Evaluation (TE) and management response	27,000	31 August 2027
TOTAL	**182,000**	

[25] See http://www.undp.org/content/undp/en/home/operations/transparency/information_disclosurepolicy/

[26] See https://www.thegef.org/gef/policies_guidelines

VII. GOVERNANCE AND MANAGEMENT ARRANGEMENTS

Roles and responsibilities of the project's governance mechanism:

160. Implementing Partner (IP): The Implementing Partner for this project is the Ministry of Environment and Forestry (MoEF) and will be executed by its Directorate of Biodiversity Conservation, Directorate General of Natural Resources and Ecosystem Conservation (KSDAE).

161. The Implementing Partner is the entity to which the UNDP Administrator has entrusted the implementation of UNDP assistance specified in this signed project document along with the assumption of full responsibility and accountability for the effective use of UNDP resources and the delivery of outputs, as set forth in this document.

162. The Implementing Partner is responsible for executing this project. Specific tasks include:
    - Project planning, coordination, management, monitoring, evaluation and reporting. This includes providing all required information and data necessary for timely, comprehensive and evidence-based project reporting, including results and financial data, as necessary. The Implementing Partner will strive to ensure project-level M&E is undertaken by national institutes and is aligned with national systems so that the data used and generated by the project supports national systems.
    - Risk management as outlined in this Project Document;
    - Procurement of goods and services, including human resources;
    - Financial management, including overseeing financial expenditures against project budgets;
    - Approving and signing the multiyear workplan;
    - Approving and signing the combined delivery report at the end of the year; and,
    - Signing the financial report or the funding authorization and certificate of expenditures.

Key Partners:

163. The key partners to be involved for this project are the Provincial Governments, university, research institutions, civil society organizations, community-based organization and private sector entities. In addition, there are a number of NGOs in the project areas (refer list of NGOs in Annex 4 Table 4) that could be potentially to be engaged in the implementation of project activities at the sites through competitive procurement process. Relevant NGOs will be identified during project implementation by the IP based on clear criteria such as capacity, operation experience, working relations in the specific area, etc.).

Private Sector:

164. The private sector is also important key players in supporting successful implementation of the project. They will be invited to build collaboration in harmonizing corporate sustainable strategy and operations within the oil palm plantations and forest concessions. Co-financing in designing and implementation of human-wildlife conflict and HCV areas management within and surrounding their concessions will be explored during the project implementation. The challenge is to work with the industry to invest in models where the return is necessarily long-term. As such, the project will encourage a mix of financing models tied to a broad basing of the core business (eco-tourism, tree crops, sustainable tree cropping) that provides both long term and short-term gain. The project will build on already initiated models of best practices that promote uptake by private sector. During the PPG stage, the Association of Forest Concessionaires (APHI) has stated their commitment to take part in OECM effectiveness management within their surrounding working areas. As part of the process, this may require strong oversight and monitoring due diligence to ensure compliance. Given, the time taken to negotiate and gain interest of oil palm plantation and forest concessionary participation in the project compounded by the COVID-19 situation and need to conduct due diligence, the intent is to begin this process during very early project implementation following selection of private sector companies on the basis of the following criteria: (i) location of concessionaries within the proposed OECM areas, and in particular in the proposed wildlife corridor areas; (ii)

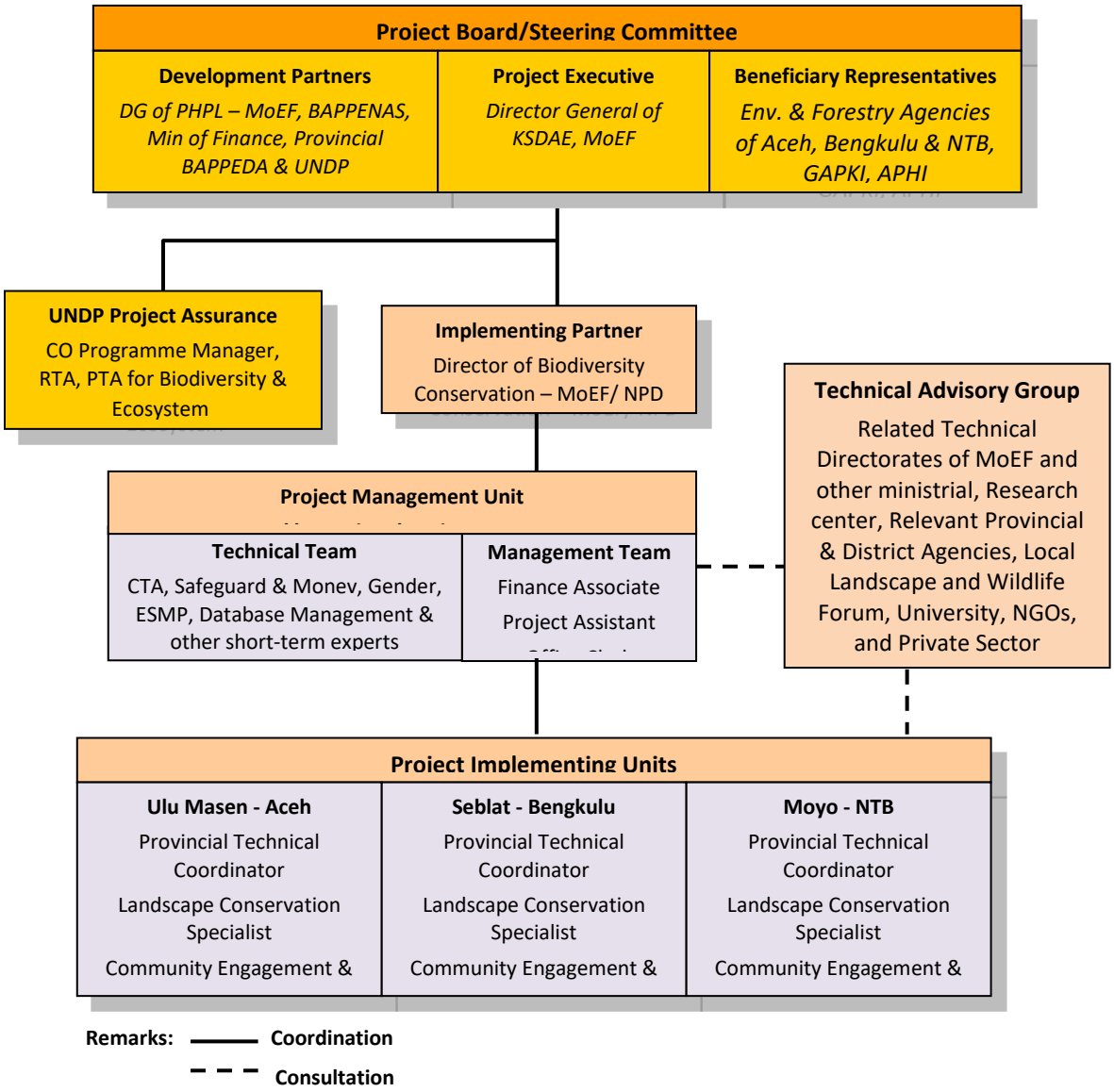
willingness to participate in conservation action and track record; and (iii) suitability based on completion of due diligence.

Project stakeholders and target groups:

165. Local stakeholder involvement will start out with identifying key communities within each demonstration provincial region to work with on specific issues, according to baseline information and consultations during the PPG on landscape profiles and socioeconomic assessment respectively). It recognizes the need for strong local CSOs and CBOs as effective partners for addressing wildlife conservation outside of PAs as well as dealing with human-wildlife conflict, illegal and unsustainable wildlife trade issues, and will seek to strengthen existing local CSOs/CBOs (refer Annex 4 Table 4 for potential list of CBOs/CSOs),and/or develop new CBOs to fulfil such roles. The CSOs/CBOs will be responsible for specific tasks in the landscape sites and will be supported by national project management unit and the respective regional project management units. Experienced consultants will be appointed to act as focal points for community engagement, gender and development, and will assign and train CSOs to lead the community participation and capacity development processes. There will be proactive consideration of the involvement of women and ethnic minorities on local level committees and groups related to project activities including community co-management, training and awareness activities. See the **Results and Partnerships Section IV** for further details.

166. UNDP: UNDP is accountable to the GEF for the implementation of this project. This includes oversight of project execution to ensure that the project is being carried out in accordance with agreed standards and provisions. UNDP is responsible for delivering GEF project cycle management services comprising project approval and start-up, project supervision and oversight, and project completion and evaluation. UNDP is also responsible for the Project Assurance role of the Project Board/Steering Committee.

Project Organization structure



167. Project Board: The Project Board (also called Project Steering Committee) is responsible for taking corrective action as needed to ensure the project achieves the desired results. In order to ensure UNDP's ultimate accountability, Project Board decisions should be made in accordance with standards that shall ensure management for development results, best value money, fairness, integrity, transparency and effective international competition. The Project Board will comprise of: DG-KSDAE, BAPPENAS, Ministry of Finance (Directorate General of Budget Financing and Risk Management), Directorate General of Nature Resources and Ecosystem Conservation- Directorate of Biodiversity Conservation and Directorate General of Nature Resources and Ecosystem Conservation- Directorate of Essential Ecosystem Management. At the discretion of the Board, others members can be added.

168. In case consensus cannot be reached within the Board, the UNDP Resident Representative (or their designate) will mediate to find consensus and, if this cannot be found, will take the final decision to ensure project implementation is not unduly delayed.

169. Specific responsibilities of the Project Board include:

- Provide overall guidance and direction to the project, ensuring it remains within any specified constraints;
- Address project issues as raised by the project manager;
- Provide guidance on new project risks, and agree on possible mitigation and management actions to address specific risks;
- Agree on project manager's tolerances as required, within the parameters set by UNDP-GEF, and provide direction and advice for exceptional situations when the project manager's tolerances are exceeded;
- Advise on major and minor amendments to the project within the parameters set by UNDP-GEF;
- Ensure coordination between various donor and government-funded projects and programs;
- Ensure coordination with various government agencies and their participation in project activities;
- Track and monitor co-financing for this project;
- Review the project progress, assess performance, and appraise the Annual Work Plan for the following year;
- Appraise the annual project implementation report, including the quality assessment rating report;
- Ensure commitment of human resources to support project implementation, arbitrating any issues within the project;
- Review combined delivery reports prior to certification by the implementing partner;
- Provide direction and recommendations to ensure that the agreed deliverables are produced satisfactorily according to plans;
- Address project-level grievances;
- Approve the project Inception Report, Mid-term Review and Terminal Evaluation reports and corresponding management responses;
- Review the final project report package during an end-of-project review meeting to discuss lesson learned and opportunities for scaling up.
- Ensure highest levels of transparency and take all measures to avoid any real or perceived conflicts of interest.

170.The composition of the Project Board must include the following roles:

- Project Executive: Is an individual who represents ownership of the project and chairs the Project Board. The Executive is normally the national counterpart for nationally implemented projects. The Project Executive is: Director General of Nature Resources and Ecosystem Conservation (KSDAE) of the Ministry of Environment and Forests

- Development Partner(s): Individuals or groups representing the interests of the parties concerned that provide funding and/or technical expertise to the project. The Development Partner(s) is/are: Ministry of Finance, BAPPENAS, Provincial Environment and Forestry Offices (DLHK Aceh, Bengkulu, and NTB) and UNDP.

- Beneficiary Representative(s): Individuals or groups representing the interests of those who will ultimately benefit from the project. Their primary function within the Board is to ensure the realization of project results from the perspective of project beneficiaries. Often civil society representative(s) can fulfill this role. The Beneficiary representative (s) are CSOs and KEE Forums of Aceh, Bengkulu and NTB, Private sector agencies (Forest Concessions, Palm Oil Companies, etc.) and CBOs/CSOs.

- Project Assurance: UNDP performs the quality assurance role and supports the Project Board and Project Management Unit by carrying out objective and independent project oversight and monitoring functions. This role ensures appropriate project management milestones are managed and completed. The Project Board cannot delegate any of its quality assurance responsibilities to the Project

Manager. UNDP provides a three – tier oversight services involving the UNDP Country Offices and UNDP at regional and headquarters levels. Project assurance is totally independent of the project execution.

171. Project Management: The **National Project Management Unit (NPMU)** will be established within the Directorate of Biodiversity Conservation (KKH) at MoEF Headquarters in Jakarta headed by the National Project Director (senior staff of KKH) and staffed by project hired personnel, and supported by project partner staff according to the terms of related agreements for cooperation between the MOEF and the project partners. The National Project Management Unit will include contract staff as follows: National Project Manager, Finance Associate, Administrative Associate and a Safeguard/M&E Officer. The Safeguard/M&E officer will be overall responsible for overseeing the implementation of the preparation and implementation of the ESMP. Senior staff experts from the project partners will provide the primary technical assistance required by the project for policy, legal and regulatory analysis and development, and information management for OECM related activities (component 1); institutional capacity building and training for management of IWT (component 2); support for private sector and community engagement in conservation-friendly practices (component 3); and knowledge management and monitoring (component 4). These inputs will be delivered through agreements between the project partners and service providers. Beyond these inputs, additional technical experts will be recruited to assist the Project Manager, NPMU and RPMUs with implementation of specific project activities**.**

172. Recruitment of specialist services for the project will be done by the NPD (Director of KKH, MoEF) in consultation with the UNDP. The NPD will also liaise and work closely with all partner institutions to ensure strong coordination with other complementary national programs and initiatives. The organogram for project management illustrates the working relationship between the main project implementing units and parties.

173. The demonstration activities in the project will be coordinated by **Project Implementation Units (PIUs)**, each of which will be led by the Head of relevant regional office (BKSDA) supported by project staffs who will be based at sites level including Field Technical Coordinator, Landscape Conservation Specialist, and Community Engagement/Gender Specialist (see **Annex 7).**

174. The Terms of Reference for key staff at national and regional levels are provided in Annex 7.

Technical Advisory Committee (TAC)

175. A TAC will be constituted at the national level to advise and guide the NPMU in the planning and implementation of the project. The Technical Advisory Committee will include technical staffs of related directorates within the MoEF, BAPPENAS, LIPI, CSOs, experts and other institutions on *ad hoc* basis. While the TAC will primarily focus on project-related issues, the intention of this group would evolve to provide technical support to the KKH on a wide range of issues concerning OECM approaches, HWC, illegal and unsustainable wildlife trade. During the project period, the TAC will provide a means of updating related stakeholders at the national level about project implementation progress, to share lessons learned from project implementation, to obtain information about and coordinate with related initiatives, and to obtain technical advice on specific issues. There should be an option to request the TAC or a subset of its members to undertake specific project-related tasks, such as preparing or reviewing analytical reports, strategies and action plans, etc.

176. **Project extensions**: The UNDP Resident Representative and the UNDP-GEF Executive Coordinator must approve all project extension requests. Note that all extensions incur costs and the GEF project budget cannot be increased. A single extension may be granted on an exceptional basis and only if the following conditions are met: one extension only for a project for a maximum of six months; the project management costs during the extension period must remain within the originally approved amount, and any increase in PMC costs will be covered by non-GEF resources; the UNDP Country Office oversight costs during the extension period must be covered by non-GEF resources.

VIII. FINANCIAL PLANNING AND MANAGEMENT

177. The total cost of the project is USD **57,272,544**. This is financed through a GEF grant of USD 6,272,018, and additional support of USD 51,000,526. UNDP, as the GEF Implementing Agency, is responsible for the oversight of the GEF resources and the cash co-financing transferred to UNDP bank account only.

178. Confirmed Co-financing: The actual realization of project co-financing will be monitored during the *mid-term review* and terminal evaluation process and will be reported to the GEF. Note that all project activities included in the project results framework that will be delivered by co-financing partners (even if the funds do not pass through UNDP accounts) must comply with UNDP's social and environmental standards. Co-financing will be used for the following project activities/outputs:

Co-financing source	Co-financing type	Co-financing amount (USD)	Planned Activities/Outputs	Risks	Risk Mitigation Measures
Government: Ministry of Environment and Forests -Directorate General of Nature Resources, Conservation and Ecosystem (DG-KSDAE) and its National Directorates (KK, KKH and BPEE) and its 3 Provincial Natural Resources Conservation Agencies (BKSDAs)	Grant	46,000,000	Management of conservation areas and protected areas, species conservation, investments in essential ecosystem areas (KEEs), planning and information management for biodiversity conservation and provision of technical services For PMC, GoI grant amount of $ 157,500 will be contributed in terms of staff as follows: (i) National Project Director (15% time) at US$3,750/year (ii) National treasurer (20% time) at US$ 3,000/year; (iii) Provincial Project Directors (3 positions) (20% time) at US$ 4,000/year/person; and (iv) Provincial Financial Assistant (3 positions) (25% time) at US$2,500/year	Limited risk related as these are planned and programmed government commitments	The PMU, as annual monitoring will assess extent to which co-financing commitments are met and seek remedial actions through Steering committee, if necessary
University: Sumbawa University of Technology	In-Kind	1,000,000	Use of existing laboratory facilities for development of DNA database for selected species, expert staff time for IT-based biodiversity monitoring and social science expertise	No significant risks as facilities and technical support is already available with the University	This a core mandate of the institutions
Fauna and Flora International	In-kind	700,526	Parallel programs to support capacity development of staff and communities; preparation of species action plans; tiger and elephant habitat conservation and	No significant risk and funds already available with FFI and they are engaged in some of the project areas	The PMU will annually monitor collaboration activities

Co-financing source	Co-financing type	Co-financing amount (USD)	Planned Activities/Outputs	Risks	Risk Mitigation Measures
			community empowerment in the KEE areas		
UNDP Multi-Partner Trust Fund (The Lion Share)	Grant	2,000,000	Parallel program in tiger conservation in Sumatra that will provide best practices and learning in safeguard key species habitats through coordination with civil society, private sector, communities etc.	No significant risk and funds already available with FFI and they are engaged in some of the project areas	Project funding already committed. PMU will monitor collaboration
UNDP CO	Grant	1,300,000	Parallel programs to generate lessons and effective utilization of resources, that will include pilot interventions for protection of forests and its biodiversity through participatory management approaches and recognition of the rights of indigenous communities and other collectives	No significant risk as program funds already available	This is an recently approved UNDP program
Total		**51,000,526**			

179. Budget Revision and Tolerance: As per UNDP requirements outlined in the UNDP POPP, the project board will agree on a budget tolerance level for each plan under the overall annual work plan allowing the project manager to expend up to the tolerance level beyond the approved project budget amount for the year without requiring a revision from the Project Board. Should the following deviations occur, the Project Manager and UNDP Country Office will seek the approval of the UNDP-GEF team to ensure accurate reporting to the GEF: a) Budget re-allocations among components in the project with amounts involving 10% of the total project grant or more; b) Introduction of new budget items that exceed 5% of original GEF allocation.

180. Any over expenditure incurred beyond the available GEF grant amount will be absorbed by non-GEF resources (e.g. UNDP TRAC or cash co-financing).

181. Audit: The project will be audited as per UNDP Financial Regulations and Rules and applicable audit policies. Audit cycle and process must be discussed during the Inception workshop. If the Implementing Partner is an UN Agency, the project will be audited according to that Agencies applicable audit policies.

182. Project Closure: Project closure will be conducted as per UNDP requirements outlined in the UNDP POPP. All costs incurred to close the project must be included in the project closure budget and reported as final project commitments presented to the Project Board during the final project review. The only costs a project may incur following the final project review are those included in the project closure budget.

183. Operational completion: The project will be operationally completed when the last UNDP-financed inputs have been provided and the related activities have been completed. This includes the final clearance of the Terminal Evaluation Report (that will be available in English) and the corresponding management response, and the end-of-project review Project Board meeting. **Operational closure must happen with 3 months of posting the TE report to the UNDP ERC**. The Implementing Partner through a Project Board decision will notify the UNDP Country Office when operational closure has been completed. At this time, the relevant parties will have already

agreed and confirmed in writing on the arrangements for the disposal of any equipment that is still the property of UNDP.

184. Transfer or disposal of assets: In consultation with the Implementing Partner and other parties of the project, UNDP is responsible for deciding on the transfer or other disposal of assets. Transfer or disposal of assets is recommended to be reviewed and endorsed by the project board following UNDP rules and regulations. Assets may be transferred to the government for project activities managed by a national institution at any time during the life of a project. In all cases of transfer, a transfer document must be prepared and kept on file. The transfer should be done before Project management Unit (team) complete their assignments.

185. Financial completion (closure): The project will be financially closed when the following conditions have been met: a) the project is operationally completed or has been cancelled; b) the Implementing Partner has reported all financial transactions to UNDP; c) UNDP has closed the accounts for the project; d) UNDP and the Implementing Partner have certified a final Combined Delivery Report (which serves as final budget revision).

186. The project will be financially completed **within 6 months of operational closure or after the date of cancellation**. Between operational and financial closure, the implementing partner will identify and settle all financial obligations and prepare a final expenditure report. The UNDP Country Office will send the final signed closure documents including confirmation of final cumulative expenditure and unspent balance to the UNDP-GEF Unit for confirmation before the project will be financially closed in Atlas by the UNDP Country Office.

187. Refund to GEF: Should a refund of unspent funds to the GEF be necessary, this will be managed directly by the UNDP-GEF Directorate in New York. No action is required at CO level on the actual refund from UNDP project to the GEF Trustee.

IX. TOTAL BUDGET AND WORK PLAN

Award ID:	00126223	Project ID(s):	00120339
Award Title:	**C**atalyzing **O**ptimum Management of **N**atural Heritage for **S**ustainability of **E**cosystem, **R**esources and **V**iability of **E**ndangered Wildlife Species (CONSERVE)		
Business Unit:	IDN10		
Project Title:	**C**atalyzing **O**ptimum Management of **N**atural Heritage for **S**ustainability of **E**cosystem, **R**esources and **V**iability of **E**ndangered Wildlife Species (CONSERVE)		
PIMS no.	6380		
Implementing Partner (Executing Agency)	Ministry of Environment and Forests – Natural Resources Conservation and Ecosystem (KSDAE)		

GEF Component/Atlas Activity	Responsible Party/Atlas Implementing Agent	Fund ID	Donor Name	Atlas Budgetary Account Code	ATLAS Budget Description	Amount Year 1 (USD)	Amount Year 2 (USD)	Amount Year 3 (USD)	Amount Year 4 (USD)	Amount Year 5 (USD)	Amount Year 6 (USD)	Total Budget (USD)	Budget Note
COMPONENT 1: Strengthened management and protection of multiple use landscapes for the conservation of key threatened species	MoEF (KLHK)	62000	GEF	71300	Local Consultants	40,140	28,980	28,980	28,980	24,480	21,240	172,800	1
				71600	Travel	7,900	15,500	21,500	21,500	21,500	11,500	99,400	2
				71800	Contractual Services - Impl Partner	18,425	18,425	18,425	18,425	18,425	18,425	110,550	3
				72100	Contractual Services - Companies	100,000	200,000	200,000	150,000	100,000	45,000	795,000	4
				72400	Communication & Audio Visual Equip.	3,000	2,000	2,000	2,000	2,000	1,850	12,850	5
				72600	Grant	-	100,000	150,000	150,000	150,000	70,000	620,000	6
				72800	IT Equipment	15,000	15,000	-	-	-	-	30,000	7
				74200	Audio Visual & Printing Production	5,000	10,000	18,000	10,000	10,000	18,000	71,000	8
				75700	Meeting/Workshops	45,000	90,000	100,000	100,000	100,000	100,000	535,000	9
					Sub Total Component 1	**234,465**	**479,905**	**538,905**	**480,905**	**426,405**	**286,015**	**2,446,600**	
				71300	Local Consultants	32,220	21,240	21,240	21,240	16,740	15,120	127,800	10
				71600	Travel	9,000	11,000	11,000	11,000	11,000	11,000	64,000	11

GEF Component/Atlas Activity	Responsible Party/Atlas Implementing Agent	Fund ID	Donor Name	Atlas Budgetary Account Code	ATLAS Budget Description	Amount Year 1 (USD)	Amount Year 2 (USD)	Amount Year 3 (USD)	Amount Year 4 (USD)	Amount Year 5 (USD)	Amount Year 6 (USD)	Total Budget (USD)	Budget Note
COMPONENT 2: Enhanced site-based enforcement and monitoring of sustainable use of wildlife resources	MoEF (KLHK)	62000	GEF	71800	Contractual Services - Impl Partner	39,875	39,875	39,875	39,875	39,875	39,875	239,250	12
				72100	Contractual Services - Companies	-	150,000	150,000	100,000	-	35,150	435,150	13
				72400	Communication & Audio Visual Equip.	3,000	5,000	3,000	3,000	3,000	3,000	20,000	14
				72600	Grant	30,000	100,000	100,000	100,000	70,000	50,000	450,000	15
				72800	IT Equipment	50,000	100,000	-	50,000	-	-	200,000	16
				75700	Training, Workshops and Conference	60,000	100,000	100,000	100,000	80,000	80,000	520,000	17
					Sub Total Component 2	**224,095**	**527,115**	**425,115**	**425,115**	**220,615**	**234,145**	**2,056,200**	
COMPONENT 3: Improved public, private and community engagement and diversified financing for biodiversity conservation across the selected landscapes	MoEF (KLHK)	62000	GEF	71300	Local Consultants	18,420	14,640	14,640	14,640	13,140	11,520	87,000	18
				71600	Travel	1,700	4,700	9,700	9,700	9,700	9,700	45,200	19
				71800	Contractual Services - Impl Partner	24,200	24,200	24,200	24,200	24,200	24,200	145,200	20
				72100	Contractual Services - Companies	-	90,000	50,000	50,000	-	-	190,000	21
				72600	Grant	-	50,000	75,000	75,000	50,000	40,000	290,000	22
				74200	Audio Visual & Printing Production	1,600	2,000	5,000	5,000	5,000	5,000	23,600	23
				75700	Training, Workshops and Conference	20,000	32,000	35,000	35,000	35,000	35,000	192,000	24
					Sub Total Component 3	**65,920**	**217,540**	**213,540**	**213,540**	**137,040**	**125,420**	**973,000**	

GEF Component/Atlas Activity	Responsible Party/Atlas Implementing Agent	Fund ID	Donor Name	Atlas Budgetary Account Code	ATLAS Budget Description	Amount Year 1 (USD)	Amount Year 2 (USD)	Amount Year 3 (USD)	Amount Year 4 (USD)	Amount Year 5 (USD)	Amount Year 6 (USD)	Total Budget (USD)	Budget Note
Component 4: Upscaling/replication of project approaches at national and regional level	MoEF (KLHK)	62000	GEF	71200	International Consultant	15,000	15,000	39,000	15,000	15,000	39,000	138,000	25
				71300	Local Consultants	40,500	26,100	29,100	26,100	21,600	24,600	168,000	26
				71600	Travel	3,800	4,800	6,800	6,800	6,800	6,800	35,800	27
				71800	Contractual Services - Impl Partner	2,750	2,750	2,750	2,750	2,750	2,750	16,500	28
				72100	Contractual Services - Companies	-	20,000	15,000	-	-	10,000	45,000	29
				72400	Communication & Audio Visual Equip.	500	1,000	1,000	1,000	1,000	1,000	5,500	30
				72500	Supplies	503	1,900	1,900	1,900	1,900	1,150	9,253	31
				72800	IT Equipment	8,000	-	-	-	-	-	8,000	32
				74200	Audio Visual & Printing Production	500	5,000	5,000	5,000	5,000	6,000	26,500	33
				75700	Training, Workshops and Conference	15,000	5,000	5,000	6,000	6,000	8,500	45,500	34
					Sub Total Component 4	**86,553**	**81,550**	**105,550**	**64,550**	**60,050**	**99,800**	**498,053**	
Project Management Cost	MoEF (KLHK)	62000	GEF	71600	Travel	1,000	1,000	1,000	1,000	1,000	1,000	6,000	35
				71800	Contractual Services - Impl Partner	39,600	39,600	39,600	39,600	39,600	39,600	237,600	36
				72400	Communication & Audio Visual Equip.	500	500	500	500	500	500	3,000	37
				72200	Equipment & Furniture	8,000	-	-	-	-	-	8,000	38
				72500	Supplies	1,500	1,400	1,400	1,400	1,400	1,265	8,365	39

GEF Component/Atlas Activity	Responsible Party/Atlas Implementing Agent	Fund ID	Donor Name	Atlas Budgetary Account Code	ATLAS Budget Description	Amount Year 1 (USD)	Amount Year 2 (USD)	Amount Year 3 (USD)	Amount Year 4 (USD)	Amount Year 5 (USD)	Amount Year 6 (USD)	Total Budget (USD)	Budget Note
				74100	Professional Services	-	3,240	3,240	3,240	3,240	3,240	16,200	40
				75700	Training, Workshops and Conference	4,000	4,000	3,000	3,000	3,000	2,000	19,000	41
					Sub Total PMC (GEF)	**54,600**	**49,740**	**48,740**	**48,740**	**48,740**	**47,605**	**298,165**	
					Total GEF Project Costs	**665,633**	**1,355,850**	**1,331,850**	**1,232,850**	**892,850**	**792,985**	**6,272,018**	

Summary of Funds:

	Amount Year 1	Amount Year 2	Amount Year 3	Amount Year 4	Amount Year 5	Amount Year 6	Total
GEF	**665,633**	**1,355,850**	**1,331,850**	**1,232,850**	**892,850**	**792,985**	**6,272,018**
UNDP CO	200,000	200,000	300,000	200,000	200,000	200,000	**1,300,000**
UNDP Multi-Partner TF	500,000	500,000	500,000	500,000			**2,000,000**
Co-financing (NGO)	633,368	67,158					**700,526**
Co-financing (University)	100,000	200,000	200,000	200,000	200,000	100,000	1,000,000
Co-financing (Government)	4,900,000	8,800,000	9,800,000	8,800,000	6,800,000	6,900,000	46,000,000
TOTAL	**6,999,001**	**11,123,008**	**12,131,850**	**10,932,850**	**8,092,850**	**7,992,985**	**57,272,544**

Budget note number	Description
COMPONENT 1: Strengthened management and protection of multiple use landscapes for the conservation of key threatened species GEF Total Budget: US$ 2,446,600	
1	National/Local Consultants (**US$ 172,800** out of US$ 573,600), it is allocated for hiring following posts: Total Local Consultant (US$ 172,800 of total of US$ 573,600) a. Chief Technical Advisor (40% of total contract amount) for supervising technical quality of expected outputs under Component 1: US$ 300/day x 120 days x 6 years = US$ 216,000 or US$ 14,400/year to be charged under Component 1. b. Gender Specialist (40% of total contract amount): US$ 150/day x 60 days x 6 years = US$ 54,000 or US$ 3,600/year to be charged under Component 1. c. Information Management Systems & Data Templates (30% of total contract amount): US$ 125/day x 120 days x 4 years = US$ 60,000 or US$ 4,500/year to be charged under Component 1. d. ESMP Specialist (40% of total contract amount): US$ 150/day x 120 days x 1 year = US$ 18,000 or US$ 7,200 to be charged under Component 1 in 2021. e. CCP Specialist (40% of total contract amount): US$ 150/day x 120 days x 1 year = US$ 18,000 or US$ 7,200 to be charged under Component 1 in 2021.

Budget note number	Description
	f. Regional Landscape Specialist (50% of total contract amount): US$ 60/day x 72 days x 5 years x 3 persons = US$ 64,800 or US$ 6,480/year to be charged under Component 1.
2	Travel (**US$ 99,400** out of US$ 250,400): airfares and daily allowance for project staffs, key institutions and partners, and consultants for data collection, consultation and fields visits of technical staff related to Component 1.
3	Contractual Services - Implementing Partner (**US$ 110,550** out of US$ 749,100): salary of project staffs at national and site levels with technical deliverables. The posts are as follow: a. Database Management Officer: US$ 1000/month x 66 months = US$ 66,000 (to be charged 25%) – Component 1 b. Provincial Technical Coordinator Leuser: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 30%) - Component 1 c. Regional Technical Coordinator Seblat: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 30%) - Component 1 d. Regional Technical Coordinator Moyo: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 30%) - Component 1 e. Community Engagement & Gender for Leuser: US$ 1000/month x 66 months = US$ 66,000 (to be charged 10%) - Component 1 f. Community Engagement & Gender for Seblat: US$ 1000/month x 66 months = US$ 66,000 (to be charged 10%) - Component 1 g. Community Engagement & Gender for Moyo: US$ 1000/month x 66 months = US$ 66,000 (to be charged 10%) - Component 1
4	Contractual Services – Companies (**US$ 795,000** out of 1,465,150): hiring project partners (consulting companies, national NGOs, universities and/or research institutions). It will be used to deliver following outputs: • Costing and resource mobilization strategy for the Sumatran Elephant Conservation Action Plan (SRAK Gajah) implementation (Output 1.1) • Communication strategy for effective results of the SRAK Gajah implementation (Output 1.1) • Innovative platform (IT-based) for monitoring, reporting and evaluation of the Sumatran elephant and Cockatoo action plan (Output 1.1) • Study on ecological needs for Yellow-crested Cockatoo conservation in Moyo island, West Nusa Tenggara (Output 1.1) • Study on institutional capacity needs assessment at different levels to enable impactful achievement of the key species conservation (Output 1.1) • Reviewed existing national, provincial and district legislations to identify key gaps in promoting biodiversity friendly development with special emphasis on OECM approaches outside the PA networks (Output 1.2) • Strategy to promote environmentally friendly and sustainable community-based livelihoods in project sites (Output 1.3) • Innovative Human Wildlife Conflict (HWC) management, including design and procure equipment for HWC responses (Output 1.4) • Compilation and synthesis of local knowledge/wisdom related to NRM and conservation (Output 1.3) • Design wildlife corridors in selected project sites for piloting Ecosystem Essential Areas management (Output 1.3)
5	Communication & Equipment (**US$ 12,850** out of US$ 41,350): mobile charges, internet connection, modem device & satellite phone for regional field staff – Component 1
6	Investment-related small grants (**US$ 620,000** out of US$ 1,360,000): for CBOs, local NGOs and appropriate institutions to support community-based initiatives. It is included field level actions for key species conservation and implementation of HWC best practices in 3 sites. Use of grants will follow UNDP guidance on LVGs grant policy.- Component 1
7	IT Equipment (**US$ 30,000** out of US$ 238,000): procuring laptops, printers, other office support for project's field personnel and innovative IT-based biodiversity monitoring.
8	Audio Visual & Printing Production (**US$ 71,000** out of US$ 121,100): production and printing of audio-visual materials, translations, and audio – visual equipment.
9	Meeting/Workshops & Training (**US$ 535,000** out of US$ 1,311,500), a range of consultation workshops and meeting (Output 1.1, 1.2, 1.3, and 1.4) related to: • Consultation workshops with experts for preparation of draft Cockatoo Action Plan. (Output 1.1) • Consultation workshops at West Nusa Tenggara with local stakeholders to validate Cockatoo action plan. (Output 1.1) • Workshop to validate and internalize the approval of Elephant Action Plan. (Output 1.1) • Regional workshops to develop site specific action plan for elephant and Cockatoo. (Output 1.1) • Provincial consultation workshops to validate consultant reports on gaps in policy and facilitate update of policy and legislation improvements. (Output 1.2) • Provincial meetings to validate mapping exercise in Ulu Masen and Seblat. (Output 1.3) • Stakeholder meetings and consultations for OECM planning in each site. (Output 1.3) • National workshop to review national consultant recommendations for protocols/guidelines for application of biodiversity considerations in EIA process. (Output 1.3)

Budget note number	Description
	• Consultations at site levels (including with private sector) to support assessment of HWC and develop recommendations and best practices for HWC management. (Output 1.4) • Workshops for task force teams at each site to develop communication and extension to pre-empt and respond to conflict management measures. (Output 1.4)
COMPONENT 2: Enhanced site-based enforcement and monitoring of sustainable use of wildlife resources GEF Total Budget: US$ 2,056,200	
10	National/Local Consultants (**US$ 127,800** out of US$ 573,600), it is allocated for hiring following posts: a. Chief Technical Advisor (30% of total contract amount) for supervising technical quality of expected outputs under Component 2: US$ 300/day x 120 days x 6 years = US$ 216,000 or US$ 10,800/year to be charged under Component 2. b. Gender Specialist (30% of total contract amount): US$ 150/day x 60 days x 6 years = US$ 54,000 or US$ 2,700/year to be charged under Component 2. c. Information Management Systems & Data Templates (30% of total contract amount): US$ 125/day x 120 days x 4 years = US$ 60,000 or US$ 4,500/year to be charged under Component 2. d. ESMP Specialist (30% of total contract amount): US$ 150/day x 120 days x 1 year = US$ 18,000 or US$ 5,400 to be charged under Component 2 in 2021. e. CCP Specialist (40% of total contract amount): US$ 150/day x 120 days x 1 year = US$ 18,000 or US$ 7,200 to be charged under Component 2 in 2021. f. Regional Landscape Specialist (25% of total contract amount): US$ 60/day x 72 days x 5 years x 3 persons = US$ 64,800 or US$ 3,240/year to be charged under Component 2.
11	Travel (**US$ 64,000** out of US$ 250,400): airfares and daily allowance for project staffs, key institutions and partners, and consultants for data collection, consultation and ,fields visits of technical staff related to Component 2.
12	Contractual Services - Implementing Partner (**US$ 239,250** out of US$ 749,100): salary of project staffs at national and site levels related with technical deliverables. The positions are as follow: a. Database Management Officer: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 25%) -Component 2. b. Provincial Technical Coordinator Leuser: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 50%) - Component 2 c. Regional Technical Coordinator Seblat: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 50%) - Component 2. d. Regional Technical Coordinator Moyo: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 50%) - Component 2. e. Community Engagement & Gender for Leuser: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 50%) - Component 2. f. Community Engagement & Gender for Seblat: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 50%) - Component 2. g. Community Engagement & Gender for Moyo: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 50%) - Component 2.
13	Contractual Services – Companies (**US$ 435,150** out of 1,465,150): hiring project partners (consulting companies, national NGOs, universities and/or research institutions). It will be used to deliver following outputs: a. Implementation in the framework of RBM (Resort Base Management) by strengthening the existing SMART patrol system site-based system (Output 2.1) b. Community Patrol Model and implementation in target landscapes (Output 2.2) c. Crime investigation using DNA analysis through dedicated regional laboratories (Output 2.3) d. High-risk poaching maps for the 3 sites (Output 2.1) e. Contract to Eijkman Institute to provide technical support and training for set up of 3 additional DNA laboratories (Output 2.3)
14	Communication & Equipment (**US$ 20,000** out of US$ 41,350): mobile charges, internet connection, modem device & satellite phone in relation to field related activities.
15	Grant (**US$ 450,000** out of US$ 1,360,000): grant for CBOs, local NGOs and appropriate institutions to support community-based initiatives. It is included field level actions for community-based patrol, local knowledge monitoring for sustainable use of wildlife resources, and enforcement support related activities. Use of grants will follow UNDP guidance on LVGs grant policy. (Output 2.2)
16	IT Equipment (**US$ 200,000** out of US$ 238,000): procuring laptops, printers and other office support to be used by project's field personnel; IT-based equipment for SMART Patrol; equipment for DNA laboratories; and equipment for community patrol. (Component 2)
17	Meeting/Workshops & Training (**US$ 520,000** out of US$ 1,311,500), a range of consultation workshops and meeting related to: • Review findings and recommendation for improving patrols (Output 2.1) • Training of SMART-RBM patrol teams (Output 2.1)

Budget note number	Description
	• Data analysis and recoding of SMART-RBM patrols (Output 2.1) • Training of Community patrol teams at 3 sites (Output 2.2) • Training of staffs of the 3 new laboratories (Output 2.3)
COMPONENT 3: Increased private sector and community engagement in species conservation GEF Total Budget: US$ 973,000	
18	National/Local Consultants (**US$ 87,000** out of US$ 573,699), it is allocated for hiring following posts: a. Chief Technical Advisor (20% of total contract amount) for supervising technical quality of expected outputs under Component 3: US$ 300/day x 120 days x 6 years = US$ 216,000 or US$ 7,200/year to be charged under Component 3. b. Gender Specialist (30% of total contract amount): US$ 150/day x 60 days x 6 years = US$ 54,000 or US$ 2,700/year to be charged under Component 3. c. Information Management Systems & Data Templates (10% of total contract amount): US$ 125/day x 120 days x 4 years = US$ 60,000 or US$ 1,500/year to be charged under Component 3. d. ESMP Specialist (30% of total contract amount): US$ 150/day x 120 days x 1 year = US$ 18,000 or US$ 5,400 to be charged under Component 3 in 2021. e. Regional Landscape Specialist (25% of total contract amount): US$ 60/day x 72 days x 5 years x 3 persons = US$ 64,800 or US$ 3,240/year to be charged under Component 3.
19	Travel (**US$ 45,200** out of US$ 250,400): airfares and daily allowance for project staffs, key institutions and partners, and consultants for data collection, consultation and fields visits related to Component 3.
20	Contractual Services - Implementing Partner (**US$ 145,200** out of US$ 749,100): salary of project staffs at national and site levels with technical deliverables. The posts are as follow: a. Database Management Officer: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 25%) - Component 3. b. Provincial Technical Coordinator Leuser: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 20%) - Component 3. c. Regional Technical Coordinator Seblat: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 20%) - Component 3. d. Regional Technical Coordinator Moyo: US$ 1,250/month x 66 months = US$ 82,500 (to be charged 20%)- Component 3. e. Community Engagement & Gender for Leuser: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 40%) - Component 3. f. Community Engagement & Gender for Seblat: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 40%) - Component 3. g. Community Engagement & Gender for Moyo: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 40%) - Component 3.
21	Contractual Services – Companies (**US$ 190,000** out of 1,465,150): hiring project partners (consulting companies, national NGOs, universities and/or research institutions) to facilitate implementation of key activities, including specific arrangements for implementing safeguards. It will be used to deliver following outputs: • Technical Support to Private sector for new business planning (Output 3.1) • Design of corridor revitalization from biological perspective (Output 3.1) • Technical support to small business for adopting environmentally friendly measures (Output 3.1) • Development of best practice models for private sector and small holders (Output 3.1) • Design of good environmental practice award systems (Output 3.2) • Design of monitoring program for Moyo island (Output 3.3) • Development of livelihood options and business enterprise development (Output 3.4) • Assessment and development of ecotourism options (Output 3.4)
22	Grant (**US$ 290,000** out of US$ 1,360,000): grant for CBOs, local NGOs and appropriate institutions to support community-based initiatives. It is included field level actions for Conservation Response Unit, biodiversity friendly livelihood and business enterprises. Use of grants will follow UNDP guidance on LVGs grant policy. (Output 3.4)
23	Audio Visual & Printing Production (**US$ 23,600** out of US$ 121,100): printing awareness raising materials, lesson learned, training modules, technical guidelines and relevant project knowledge projects. – Component 3
24	Meeting/Workshops (**US$ 192,000** out of US$ 1,311,500), a range of consultation workshops and meeting related to: • Consultation workshops with the private sector industry (Output 3.1)

Budget note number	Description
	• Consultation workshops for smallholder groups for environmentally friendly measures (Output 3.4) • Capacity building for livelihoods and business enterprises (Output 3.4)
COMPONENT 4: Upscaling/replication of project approaches at national and regional level GEF Total Budget: US$ 498,053	
25	International Consultants (**US$ 138,000**), will be used to hired: a. Writer & Editor for Project Knowledge Products: US$ 500/day x 30 days per year x 6 year = US$ 90,000 (Output 4.3) b. Project Mid-term Review (spot check) in 2023: US$ 600/day x 40 day = US$ 24,000 (Output 4.1) c. Project Terminal Evaluation (TE) in 2026: US$ 600/day x 40 day = US$ 24,000 (Output 4.1)
26	National/Local Consultants (**US$ 168,000** out of US$ 573,600), it is allocated for hiring following posts: a. Chief Technical Advisor (10% of total contract amount) for supervising technical quality of expected outputs under Component 1: US$ 300/day x 120 days x 6 years = US$ 216,000 or US$ 3,600/year to be charged under Component 4. b. Safeguard, Monitoring & Evaluation Officer (100% of total contract amount): US$ 150/day x 120 days x 6 years = US$ 108,000 to be charged under Component 4. c. National Consultant for Knowledge, Attitude & Practice (KAP) Survey Design (100%): US$ 120/day x 90 days x 1 year = US$ 10,800 (Output 4.1) d. Information Management Systems & Data Templates (30% of total contract amount): US$ 125/day x 120 days x 4 years = US$ 60,000 or US$ 4,500/year to be charged under Output 4.2 e. CCP Specialist (20% of total contract amount): US$ 150/day x 120 days x 1 year = US$ 18,000 or US$ 3,600 to be charged under Component 4 in 2021. (Output 4.1) f. Project Mid-term Review (MTR) in 2023 (100%): US$ 100/day x 30 day = US$ 3,000 (Output 4.1) g. Project Terminal Evaluation (TE) in 2026 (100%): US$ 100/day x 30 day = US$ 3,000 (Output 4.1)
27	Travel (**US$ 35,800** out of US$ 250,400): airfares and daily allowance for project staffs, key institutions and partners, and consultants for data collection, consultation, fields visits and monitoring related to Component 4.
28	Contractual Services - Implementing Partner (**US$ 16,500** out of US$ 749,100): salary of project staffs at national and site levels with technical deliverables. The posts are as follow: a. Database Management Officer: US$ 1,000/month x 66 months = US$ 66,000 (to be charged 25%) (Output 4.2)
29	Contractual Services – Companies (**US$ 45,000** out of 1,465,150): hiring project partners (consulting companies, national NGOs, universities and/or research institutions) to facilitate implementation of key activities, including specific arrangements for implementing safeguards. It will be used to deliver following outputs: • Development of communication products, campaign on gender mainstreaming and relevant project knowledge products. • National public knowledge sharing on innovative biodiversity conservation & lesson learned.
30	Communication & Equipment (**US$ 5,500** out of US$ 43,350): mobile charges, internet connection, & modem device for awareness activities in the field – Component 4
31	Supplies (**US$ 9,253** out of US$ 11,618): Materials for awareness activities and communication programs – Component 4
32	IT Equipment (**US$ 8,000** out of US$ 238,000): procuring laptops and other office support for field activities
33	Audio Visual & Printing Production (**US$ 26,500** out of US$ 121,100): printing awareness raising materials, lesson learned, technical guidelines and relevant project knowledge projects. - (Output 4.1)
34	Meeting/Workshops (**US$ 45,500** out of US$ 1,311,500), a range of consultation workshops and meeting related to: • Inception Workshops and project launch (national and 3 regional) (Output 4.1) • Monitoring review of project deliverables (Output 4.1) • Writing workshop on human interest stories, features etc. (Output 4.3)
Project Management Costs GEF Budget: US$ 298,165	
35	Travel (**US$ 6,000** out of US$ 250,400): airfares and daily allowance for project manager for fields visits, coordination and project monitoring.
36	Contractual Services - Implementing Partner (**US$ 237,600** out of US$ 749,100): salary of National Project Manager and Project Finance Officer (100%) a. National Project Manager: US$ 2,400/month x 72 months = US$ 172,800

Budget note number	Description
	b. Project Finance Officer: US$ 900/month x 72 months = US$ 64,800
37	Communication & Equipment (**US$ 3,000** out of US$ 36,120): mobile charges, internet connection.
38	Equipment & Furniture (**US$ 8,000**): additional PMU office support equipment.
39	Supplies (**US$ 8,365** out of US$ 11,618): stationary, other PMU office support.
40	Audit costs
41	Meeting/Workshops & Training (**US$ 19,000** out of US$ 1,311,500), a range of consultation workshops and meeting related to: • Project Board Meeting twice a year • Project SOP Development

X. LEGAL CONTEXT

The project document shall be the instrument envisaged and defined in the Supplemental Provisions to the Project Document, attached hereto and forming an integral part hereof, as "the Project Document".

This project will be implemented by the Nature Resources and Ecosystem Conservation of Ministry of Environment and Forests (KSDAE) ("Implementing Partner") in accordance with its financial regulations, rules, practices and procedures only to the extent that they do not contravene the principles of the Financial Regulations and Rules of UNDP. Where the financial governance of an Implementing Partner does not provide the required guidance to ensure best value for money, fairness, integrity, transparency, and effective international competition, the financial governance of UNDP shall apply.

The designations employed and the presentation of material on this map do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations or UNDP concerning the legal status of any country, territory, city or area or its authorities, or concerning the delimitation of its frontiers or boundaries.

XI. RISK MANAGEMENT

Consistent with the Article III of the SBAA *[or the Supplemental Provisions to the Project Document]*, the responsibility for the safety and security of the Implementing Partner and its personnel and property, and of UNDP's property in the Implementing Partner's custody, rests with the Implementing Partner. To this end, the Implementing Partner shall:

a) put in place an appropriate security plan and maintain the security plan, taking into account the security situation in the country where the project is being carried;

b) assume all risks and liabilities related to the Implementing Partner's security, and the full implementation of the security plan.

UNDP reserves the right to verify whether such a plan is in place, and to suggest modifications to the plan when necessary. Failure to maintain and implement an appropriate security plan as required hereunder shall be deemed a breach of the Implementing Partner's obligations under this Project Document.

The Implementing Partner agrees to undertake all reasonable efforts to ensure that no UNDP funds received pursuant to the Project Document are used to provide support to individuals or entities associated with terrorism and that the recipients of any amounts provided by UNDP hereunder do not appear on the list maintained by the Security Council Committee established pursuant to resolution 1267 (1999). The list can be accessed via http://www.un.org/sc/committees/1267/aq_sanctions_list.shtml.

The Implementing Partner acknowledges and agrees that UNDP will not tolerate sexual harassment and sexual exploitation and abuse of anyone by the Implementing Partner, and each of its responsible parties, their respective sub-recipients and other entities involved in Project implementation, either as contractors or subcontractors and their personnel, and any individuals performing services for them under the Project Document.

In the implementation of the activities under this Project Document, the Implementing Partner, and each of its sub-parties referred to above, shall comply with the standards of conduct set forth in the Secretary General's Bulletin ST/SGB/2003/13 of 9 October 2003, concerning "Special measures for protection from sexual exploitation and sexual abuse" ("SEA").

Moreover, and without limitation to the application of other regulations, rules, policies and procedures bearing upon the performance of the activities under this Project Document, in the implementation of activities, the Implementing Partner, and each of its sub-parties referred to above, shall not engage in any form of sexual harassment ("SH"). SH is defined as any unwelcome conduct of a sexual nature that might reasonably be

expected or be perceived to cause offense or humiliation, when such conduct interferes with work, is made a condition of employment or creates an intimidating, hostile or offensive work environment.

a) In the performance of the activities under this Project Document, the Implementing Partner shall (with respect to its own activities), and shall require from its sub-parties referred to in paragraph 4 (with respect to their activities) that they, have minimum standards and procedures in place, or a plan to develop and/or improve such standards and procedures in order to be able to take effective preventive and investigative action. These should include: policies on sexual harassment and sexual exploitation and abuse; policies on whistleblowing/protection against retaliation; and complaints, disciplinary and investigative mechanisms. In line with this, the Implementing Partner will and will require that such sub-parties will take all appropriate measures to:

i. Prevent its employees, agents or any other persons engaged to perform any services under this Project Document, from engaging in SH or SEA;

ii. Offer employees and associated personnel training on prevention and response to SH and SEA, where the Implementing Partner and its sub-parties referred to in paragraph 4 have not put in place its own training regarding the prevention of SH and SEA, the Implementing Partner and its sub-parties may use the training material available at UNDP;

iii. Report and monitor allegations of SH and SEA of which the Implementing Partner and its sub-parties referred to in paragraph 4 have been informed or have otherwise become aware, and status thereof;

iv. Refer victims/survivors of SH and SEA to safe and confidential victim assistance; and

v. Promptly and confidentially record and investigate any allegations credible enough to warrant an investigation of SH or SEA. The Implementing Partner shall advise UNDP of any such allegations received and investigations being conducted by itself or any of its sub-parties referred to in paragraph 4 with respect to their activities under the Project Document, and shall keep UNDP informed during the investigation by it or any of such sub-parties, to the extent that such notification (i) does not jeopardize the conduct of the investigation, including but not limited to the safety or security of persons, and/or (ii) is not in contravention of any laws applicable to it. Following the investigation, the Implementing Partner shall advise UNDP of any actions taken by it or any of the other entities further to the investigation.

The Implementing Partner shall establish that it has complied with the foregoing, to the satisfaction of UNDP, when requested by UNDP or any party acting on its behalf to provide such confirmation. Failure of the Implementing Partner, and each of its sub-parties referred to in paragraph 4, to comply of the foregoing, as determined by UNDP, shall be considered grounds for suspension or termination of the Project.

Social and environmental sustainability will be enhanced through application of the UNDP Social and Environmental Standards (http://www.undp.org/ses) and related Accountability Mechanism (http://www.undp.org/secu-srm).

The Implementing Partner shall: (a) conduct project and program-related activities in a manner consistent with the UNDP Social and Environmental Standards, (b) implement any management or mitigation plan prepared for the project or program to comply with such standards, and (c) engage in a constructive and timely manner to address any concerns and complaints raised through the Accountability Mechanism. UNDP will seek to ensure that communities and other project stakeholders are informed of and have access to the Accountability Mechanism.

All signatories to the Project Document shall cooperate in good faith with any exercise to evaluate any program or project-related commitments or compliance with the UNDP Social and Environmental Standards. This includes providing access to project sites, relevant personnel, information, and documentation.

The Implementing Partner will take appropriate steps to prevent misuse of funds, fraud or corruption, by its officials, consultants, responsible parties, subcontractors and sub-recipients in implementing the project or using UNDP funds. The Implementing Partner will ensure that its financial management, anti-corruption and anti-fraud policies are in place and enforced for all funding received from or through UNDP.

The requirements of the following documents, then in force at the time of signature of the Project Document, apply to the Implementing Partner: (a) UNDP Policy on Fraud and other Corrupt Practices and (b) UNDP Office of Audit and Investigations Investigation Guidelines. The Implementing Partner agrees to the requirements of the above documents, which are an integral part of this Project Document and are available online at www.undp.org.

In the event that an investigation is required, UNDP has the obligation to conduct investigations relating to any aspect of UNDP projects and programs in accordance with UNDP's regulations, rules, policies and procedures. The Implementing Partner shall provide its full cooperation, including making available personnel, relevant documentation, and granting access to the Implementing Partner's (and its consultants', responsible parties', subcontractors' and sub-recipients') premises, for such purposes at reasonable times and on reasonable conditions as may be required for the purpose of an investigation. Should there be a limitation in meeting this obligation, UNDP shall consult with the Implementing Partner to find a solution.

The signatories to this Project Document will promptly inform one another in case of any incidence of inappropriate use of funds, or credible allegation of fraud or corruption with due confidentiality.

Where the Implementing Partner becomes aware that a UNDP project or activity, in whole or in part, is the focus of investigation for alleged fraud/corruption, the Implementing Partner will inform the UNDP Resident Representative/Head of Office, who will promptly inform UNDP's Office of Audit and Investigations (OAI). The Implementing Partner shall provide regular updates to the head of UNDP in the country and OAI of the status of, and actions relating to, such investigation.

UNDP shall be entitled to a refund from the Implementing Partner of any funds provided that have been used inappropriately, including through fraud or corruption, or otherwise paid other than in accordance with the terms and conditions of the Project Document. Such amount may be deducted by UNDP from any payment due to the Implementing Partner under this or any other agreement. Recovery of such amount by UNDP shall not diminish or curtail the Implementing Partner's obligations under this Project Document.

Where such funds have not been refunded to UNDP, the Implementing Partner agrees that donors to UNDP (including the Government) whose funding is the source, in whole or in part, of the funds for the activities under this Project Document, may seek recourse to the Implementing Partner for the recovery of any funds determined by UNDP to have been used inappropriately, including through fraud or corruption, or otherwise paid other than in accordance with the terms and conditions of the Project Document.

Note: The term "Project Document" as used in this clause shall be deemed to include any relevant subsidiary agreement further to the Project Document, including those with responsible parties, subcontractors and sub-recipients.

Each contract issued by the Implementing Partner in connection with this Project Document shall include a provision representing that no fees, gratuities, rebates, gifts, commissions or other payments, other than those shown in the proposal, have been given, received, or promised in connection with the selection process or in contract execution, and that the recipient of funds from the Implementing Partner shall cooperate with any and all investigations and post-payment audits.

Should UNDP refer to the relevant national authorities for appropriate legal action any alleged wrongdoing relating to the project, the Government will ensure that the relevant national authorities shall actively investigate the same and take appropriate legal action against all individuals found to have participated in the wrongdoing, recover and return any recovered funds to UNDP.

The Implementing Partner shall ensure that all of its obligations set forth under this section entitled "Risk Management" are passed on to each responsible party, subcontractor and sub-recipient and that all the clauses under this section entitled "Risk Management Standard Clauses" are included, *mutatis mutandis*, in all sub-contracts or sub-agreements entered into further to this Project Document.

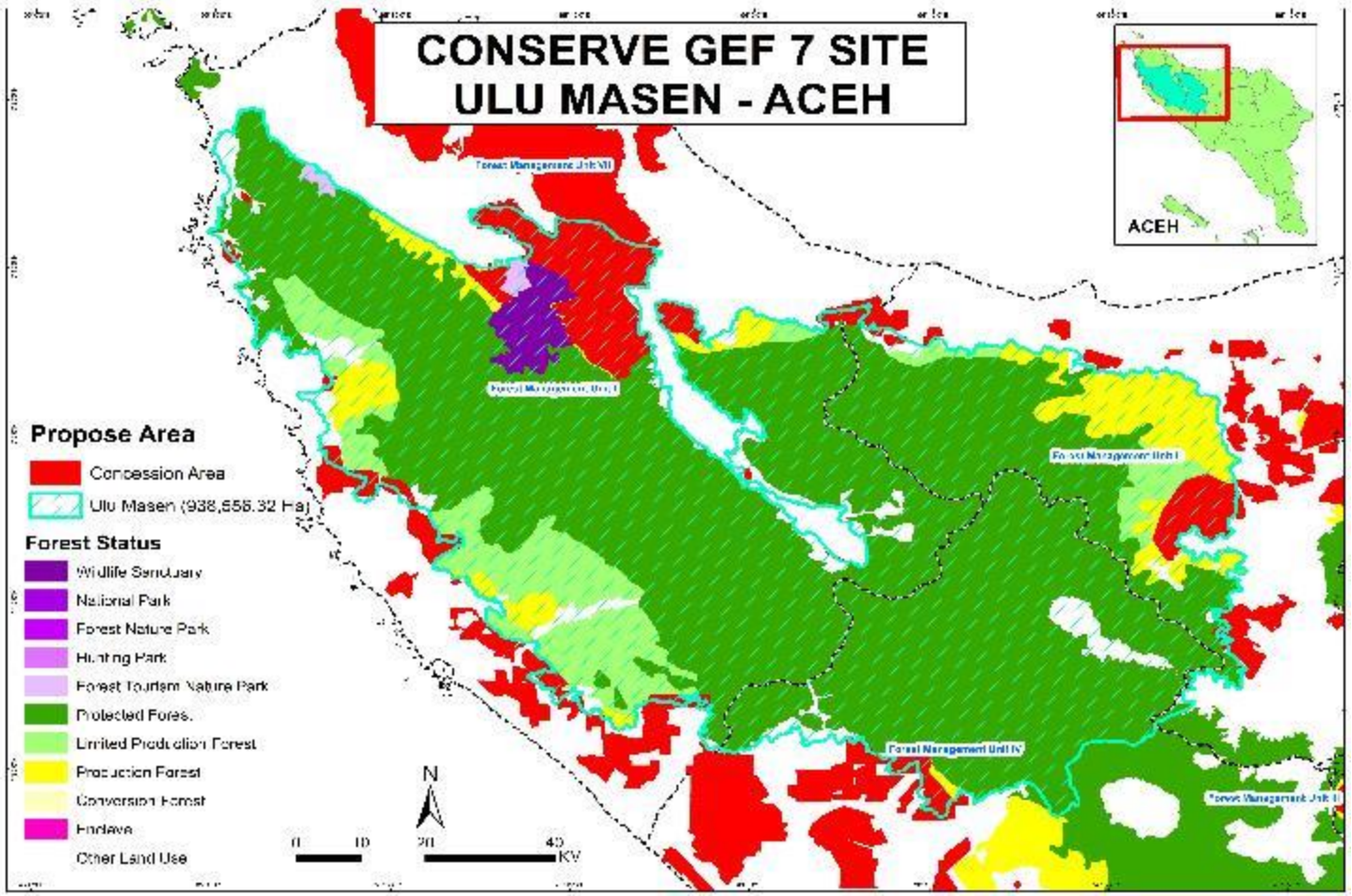
XII. MANDATORY ANNEXES

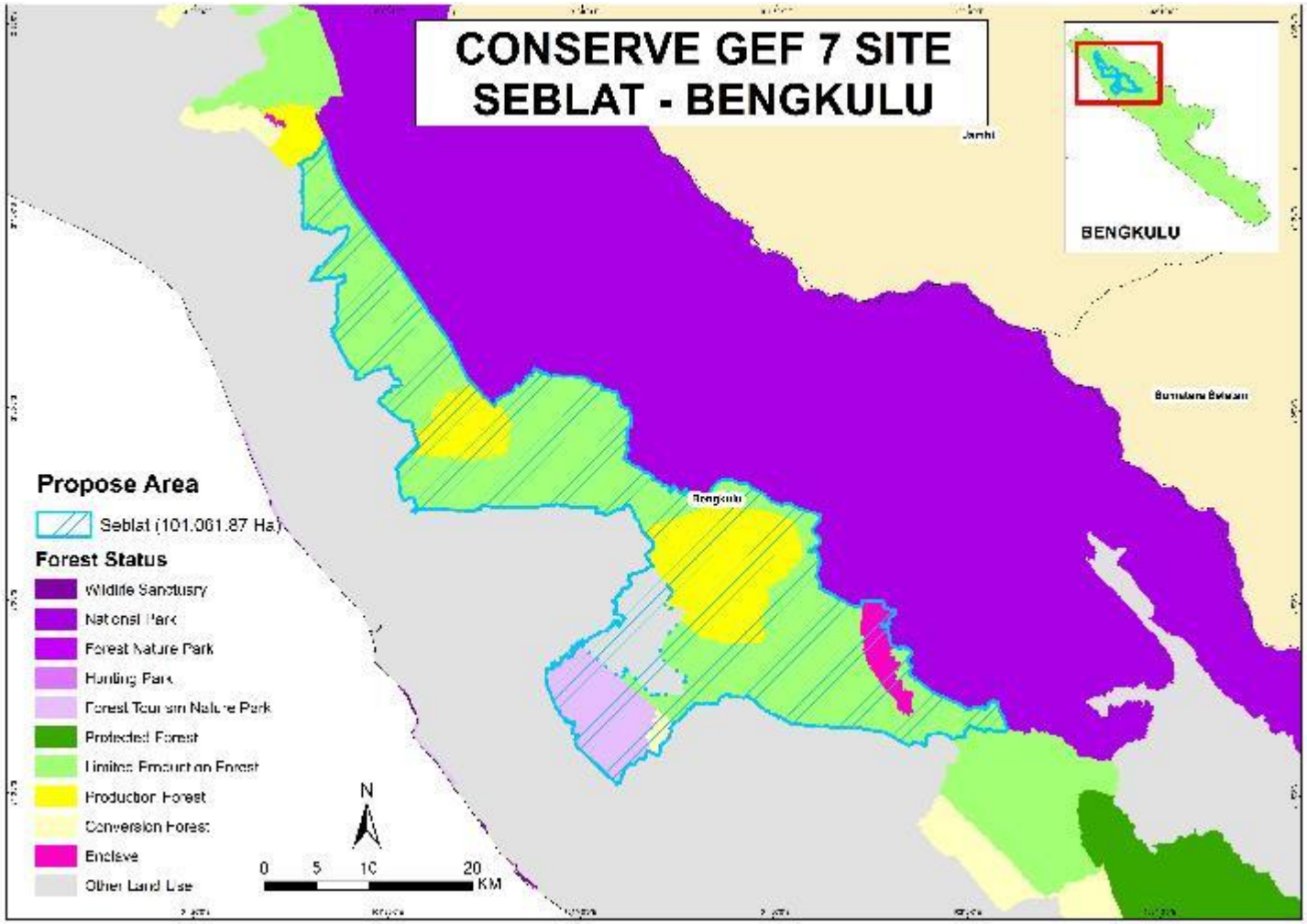
1. Annex 1: Project Map and geospatial coordinates of the project area
2. Annex 2: Multiyear Workplan
3. Annex 3: Monitoring Plan
4. Annex 4: Stakeholder Engagement Plan
5. Annex 5: UNDP Atlas Risk Log
6. Annex 6: Overview of technical consultancies/subcontracts
7. Annex 7: Terms of Reference for Key Project Staff
8. Annex 8: Applicable Policy for Essential Ecosystem Areas
9. Annex 9: Steps for implementation of Essential Ecosystem Areas
10. Annex 10: Social and Environmental Screening Procedure (SESP)
11. Annex 11: Customary Communities Planning Framework
12. Annex 12: Gender Analysis and Gender Action Plan
13. Annex 13: Knowledge Management and Communication Framework
14. Annex 14: Procurement Plan – for first year of implementation especially
15. Annex 15: GEF focal area specific annexes (e.g. METT)
16. Annex 16: Capacity Development Scorecards
17. Annex 17: GEF and/or LDCF/SCCF Core indicators
18. Annex 18: GEF Taxonomy
19. Annex 19: PPG consultations
20. Annex 20: Environmental and Social Management Framework
21. Annex 21: Partners Capacity Assessment Tool and HACT assessment
22. Annex 22: UNDP Project Quality Assurance Report (to be completed in UNDP online corporate planning system)
23. Annex 23: Co-financing letters
24. Annex 24: Site selection matrix

Annex 1: Project map and Geospatial Coordinates of project sites and ongoing activities[27]



[27] The designations employed and the presentation of materials in these maps do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations or UNDP concerning the legal status of any country, territory, city or area or its authorities, or concerning the delimitation of its frontiers or boundaries.


CONSERVE GEF 7 SITE
ULU MASEN - ACEH
ACEH
Propose Area
Concession Area
Ulu Masen (938,858.32 Ha)
Forest Status
Wildlife Sanctuary
National Park
Forest Nature Park
Hunting Park
Forest Tourism Nature Park
Protected Fores.
Limited Production Forest
Production Forest
Conversion Forest
Mangrove
Other Land Use
N
0
10
20
40
KM


CONSERVE GEF 7 SITE
SEBLAT - BENGKULU
BENGKULU
Propose Area
Seblat (101.061,87 Ha)
Forest Status
Wildlife Sanctuary
National Park
Forest Nature Park
Hunting Park
Protected Forest
Production Forest
Conversion Forest
Enclave
Other Land Use
N
0 5 10 20
KM

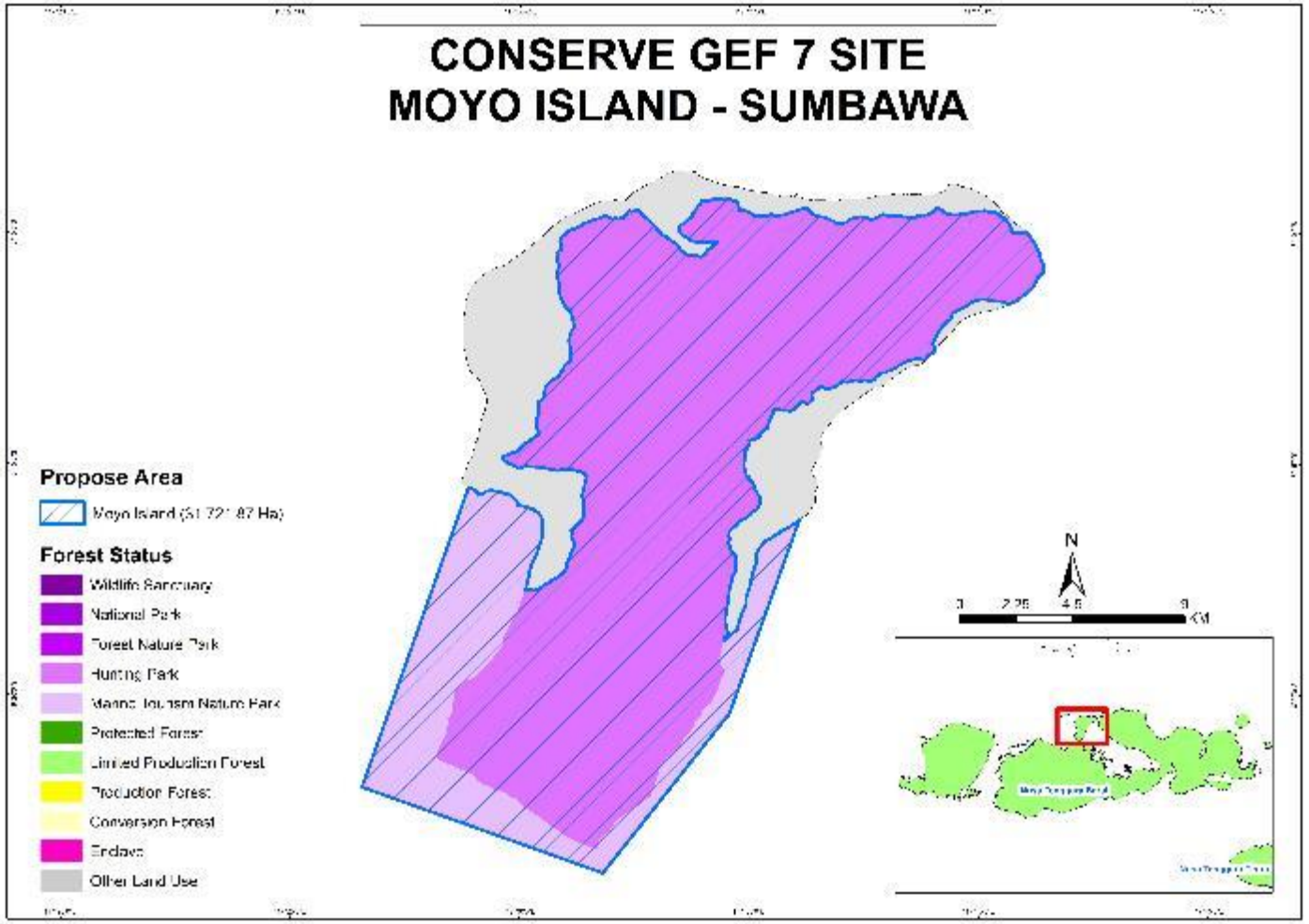

CONSERVE GEF 7 SITE
MOYO ISLAND - SUMBAWA
Propose Area
Moyo Island (51 721.87 Ha)
Forest Status
Wildlife Sanctuary
National Park
Forest Nature Park
Hunting Park
Marine Tourism Nature Park
Protected Forest
Limited Production Forest
Production Forest
Conversion Forest
Enclave
Other Land Use
N
0
2.25
4.5
9
KM

Table 1A: Ongoing Activities in Project Sites

Comparison of approach/issues handled by the on-going works and the proposed project at the targeted landscapes

Location	Thematic issues	Fund/Sources	The Proposed CONSERVE Project

Ulu Masen Landscape	- HWC team operations
	  o Barriers assessments and preconstruction
	  o HWC early warning system through GPS collar
	- IWT specific for elephant killing
	- SMART collaborative patrol
	- Rescue and handling of injured wildlife, translocation process
		TFCA Sumatera (Cycle 8)
		2020-2023
			• Different and innovative approach for addressing human -wildlife conflict mitigation, which is through the **Essential Ecosystem Area (KEE) mechanism –** avoiding habitat fragmentation (connecting Protected and non-protected area), thus reducing risk of HWC. At the same time the KEE approach also address the **spatial planning** issue at provincial level by channeling coordination with central government.

	- IWT for key wildlife species - SMART collaborative patrol - HWC team operationalization	Darwin DEFRA 2018-2021	
	- HWC team operationalization	Private sectors Occasionally / as needed	• The IWT coverage is not limited to elephant, but also other important wildlife in the area
	- IWT monitoring and reporting	GEF-6 Combatting Illegal Wildlife Trade 2017– 2023	• SMART-Patrol – filling in the gap by increasing coverage area and patrol frequency. It should be noted that this is a massive landscape, and resources from TFCA and BKSDA alone is insufficient to cover the landscape efficiently. Given that all this projects will work in collaboration and under coordination with BKSDA Aceh, overlap of budget and patrol area coverage, including targeted villages can be avoided. • By pulling out different resources, that can provide spatial and temporal coverage throughout the landscape overtime, more effective and wider impact can be anticipated.

Seblat Landscape	- HWC team operationalization
	  o Barriers assessments and preconstruction
	  o HWC early warning system through GPS collar
	- IWT specific for elephant killing
	- SMART collaborative patrol
	- Rescue and handling of injured wildlife, translocation process
		TFCA Sumatera (Cycle 8)
		2020-2023
			Same as above

	- HWC team operationalization - SMART collaborative patrol	IEF & Elephant Family 2019	
Moyo	- Monitoring of wildlife - Sustainable Natural resources	Sumbawa University of Technology (ongoing)	- DNA assessment - IT-based biodiversity monitoring - Social science surveys

- Socio-economic surveys