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BUILD INDONESIA TO TAKE CARE OF NATURE FOR SUSTAINABILITY (BIJAK)

FINAL REPORT

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Cover photo: Building constituencies for conservation. Seedling planting by youth groups at Mount Halimun Salak National Park, West Java. (Credit: Fazril/Hutan Itu Indonesia)

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ACRONYMS

AMCTN	Youth Love National Parks / Anak Muda Cinta Taman Nasional
APL	Non-forest lands
ARuPA	Volunteer Alliance for Saving Nature
Bappenas	National Development Planning Agency
BBBR	Bukit Baka Bukit Raya
BCC	Behavior change communication
BIJAK	Build Indonesia to Take Care of Nature for Sustainability project
BLU	Public Services Agency
BPEE	Directorate of Management of Essential Ecosystems
CBD	Convention on Biological Diversity
CHM	Clearing House mechanism
CITES	Convention on International Trade in Endangered Species of Wild Fauna and Flora
COP	(CITES) Conference of Parties
CSO	Civil society organization
DAK	Special Allocation Fund
DD	Village Fund
DID	Regional Incentive Fund
EFT	Ecological fiscal transfer
EKKP3K	Aquatic, Coastal, and Small Island Conservation Area Management Effectiveness Tool
FMU	Forest management unit
FOERDIA	Forest and Environmental Research, Development, and Innovation Agency
Gakkum	KLHK's law enforcement unit
GIS	Geographical information system
GOI	Government of Indonesia
HCS	High carbon stock
HCV	High conservation value

ISPO	Indonesia Sustainable Palm Oil
I-Stri	Data visualization dashboard
KEE	Essential Ecosystem Area
Kemitraan	Partnership for Governance Reform
KKHL	Directorate of Marine Biodiversity Conservation
KKP	Ministry of Marine Affairs and Fisheries
KLHK	Ministry of Environment and Forestry
KPHK	Conservation FMU
KPK	Corruption Eradication Commission
KSDAE	Directorate General of Ecosystem and Natural Resources Conservation
LATIN	Indonesian Institute of Tropical Nature
LESTARI	USAID Sustainable Forest Management Project
LIPI	Indonesian Institute of Science
METT	Management Effectiveness Tracking Tool
MIS	Management information system
MPA	Marine protected area
NDF	Non-detriment finding
NGO	Non-governmental organization
PATTIRO	Center for Regional Information and Studies
Perpres	Presidential Decree
PES	Payments for environmental services
PIKA	Directorate of Nature Conservation Planning and Information
PPATK	Indonesian Financial Transactions and Analysis Center
Pusdiklat	KLHK's Center for Education and Forestry Training
RBM	Resort-Based Management
Renstra	Rencana Strategis/Strategic Plan
RKTN	Long-Term National Forestry Plan
RPJMN	National Medium-Term Development Plan
SAJI	Fish species transport permit
SEA	Sustainable Ecosystems Advanced project
SIDAK	Conservation Data Information System
SIPJI	Fish species utilization permit

SMART	Spatial Monitoring and Reporting Tool
SPM	Minimum Service Standards
SRAK	National Conservation Strategy and Action Plan
USAID	US Agency for International Development
USFS	US Forest Service
USG	US government
WCS	Wildlife Conservation Society

EXECUTIVE SUMMARY

The U.S. Agency for International Development (USAID) Build Indonesia to Take Care of Nature for Sustainability (BIJAK) project was implemented in partnership with the Government of Indonesia (GOI) to support enhanced conservation and management of the country's marine and terrestrial biodiversity and natural habitats, reduce greenhouse gas emissions and foster sustainable landscapes and natural resource management. To accomplish this, BIJAK worked primarily at the national level to improve the management of forests and conservation areas and reduce the threats to marine and terrestrial wildlife from illegal or unsustainable trade.

BIJAK's primary government counterpart was the Ministry of Environment and Forestry (KLHK) and a number of its directorates, though the project's partners also included the Ministry of Marine Affairs and Fisheries (KKP) and the Indonesian Institute for Sciences (LIPI) for work with marine species, among others. BIJAK built strong multi stakeholder partnerships among sub-national government agencies, research institutes and universities, non-governmental and community service organizations, the private sector, and others, reflecting the collaborative nature and linkages of BIJAK's initiatives and natural resource governance.

BIJAK's focus at the national level emphasized interventions to improve laws, regulations, policies, and plans and their implementation, together with management approaches, tools, and systems. Moving new initiatives to roll out and implementation, ranging from policies and approaches to technical tools, including the knowledge and capacity to support it, was foundational to much of the work. Behavior change was also an integral element, particularly linked to sustainable wildlife trade. BIJAK designed and carried out its work through a lens of enhanced gender equity and social inclusion.

With a focus nationally, the project collaborated with other USAID partners working at the site level, specifically USAID's Sustainable Forest Management Project (LESTARI) and Sustainable Ecosystems Advanced (SEA) projects, to scale up local-level approaches for nationwide adoption, inform national policy with site-level experience, and support initial roll-out of new national approaches at target sites.

BIJAK's approach was grounded in its theory of change, which defined intervention areas, or "strategic approaches," that ultimately reduced threats to biodiversity and critical habitats for improved conservation and other outcomes. Activities and resources under four broad technical components were aligned during annual work planning under two technical themes for: Improved Conservation Area and Forest Management, and Increased Species Protection. Adaptive management incorporated close attention to evolving political economies, review of results against performance indicator targets, and updates to the theory of change. Perhaps the greatest factor affecting project implementation was the coronavirus (COVID-19) global pandemic, which began in early 2020. While this constrained many activities, especially those requiring face-to-face contact and roll-out of national initiatives to sites, it also presented opportunities; for

example, organizations were more incentivized to institutionalize e-learning for capacity building, and there was enhanced use of technology tools for communications and data for decision-making.

IMPROVED CONSERVATION AREA AND FOREST MANAGEMENT

Under BIJAK's first technical theme, interventions sought to improve the management the country's more than 500 conservation areas as well as state forest outside of conservation areas. A third category, essential ecosystem areas (KEEs) located outside of conservation areas, was added as a significant yet under-protected landscape. At the broad policy and planning level, BIJAK supported national plans and strategies to guide forest management investments, emphasizing conservation performance metrics and incorporating key new initiatives, also supported by the project, to reduce threats to forest and conservation areas. Policy support also came at the ministry and sector level to enhance important components of KLHK's management, such as forest management units (FMUs), resort-based management, land use planning and permitting, and national park structures. The project supported KEE landscapes comprehensively, beginning with greater policy protections and resourcing followed by planning and management frameworks to be applied at the site level.



Figure 1. Meru Betiri Meru National Park, a pilot site for BIJAK's support to pilot a new regulation for conservation partnerships. (Photo: Balai TN Meru Betiri, Ditjen KSDAE KLHK)

Further work with conservation areas and forests emphasized major threats to these landscapes and KLHK priorities for improving their management at national and site levels. The team helped counterparts define issues and needs, as well as solutions, which were typically adopted formally by regulations at the appropriate level in KLHK. See the following for example focus areas.

Reducing encroachment in conservation areas. BIJAK and KLHK identified encroachment identification and handling as a major need for conservation areas, with applications to other landscapes. This resulted in analysis and mapping, action planning, and pilots to address drivers, including tenurial conflict in conservation areas.

Zoning and blocking. Zoning (blocking in conservation areas outside national parks) was also defined as a major need for overall conservation area (and then KEE) management as well as to inform threat handling such as encroachment. BIJAK advanced KLHK's capacity to complete, revise, and ultimately map the zoning and blocking for all conservation areas across the country, leading to managers adopting these maps for management already at dozens of sites. The project helped KLHK institutionalize participatory zonation to involve and foster ownership of local communities, applying it in the real world context of resolving tenurial conflicts.

Conservation partnerships. Multi-stakeholder participation in conservation was a priority of KLHK and BIJAK started by helping the ministry draft a regulation on conservation partnerships so local communities could play an active role with the government in site-level initiatives. Broader capacity building included sharing lessons from the previous few examples of conservation partnerships that were implemented before the regulation, devising and training implementors on technical guidelines for implementation, and developing mechanisms and approaches for engaging communities. Pilots followed in the context of other project priorities to tackle encroachments and tenurial conflict and engage communities participatory rezoning activities.

Data for decision-making. KLHK and BIJAK were well aligned on the importance and need for up-to-date, high quality, useful data for management decisions. The approach tackled KLHK's need to streamline and integrate disparate systems in the ministry with summary dashboards to make key information available to managers, together with site-level needs for data specifically useful for them to define and monitor trends in key threats, such as encroachments. The project focused on quality data fields that inform day-to-day decisions and assessment of progress and trends, with the usefulness of the data supporting the incentive for sustainability.

Financing for management. BIJAK opened new options for sustainable financing for conservation. An especially exciting area was in ecological fiscal transfers (EFTs), a mechanism that allows transfer of funds for conservation purposes from the national government to local governments or directly to villages. Work focused on the policy framework and analysis, leading to a roadmap for applying it for specific province needs. The project also enhanced the regulatory framework for payment for environmental services, providing another option for site-level funding.

Building constituencies for conservation. Communication and behavior change permeated much of BIJAK's work. For conservation, this focused on building constituencies for national parks and the tremendous natural assets they encompass. BIJAK developed government capacity for communications and awareness raising, including traditional news media, social media, and specific focus on enhancing national park web sites. Youth

were a target audience for building constituencies with campaigns aimed at creating a vibrant community of national park advocates.

INCREASED SPECIES PROTECTION

As with the first technical theme, the project team worked with partners to identify crucial national legal and policy needs for BIJAK to support in species protection. A key framework for BIJAK's action was the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) with its adherence to sustainable use principles. BIJAK's work supported the GOI's prominent role in CITES meetings and strong commitment to recently agreed CITES priorities of developing regulations on specific species protection, defining trade quotas, and law enforcement. These elements overarched national policy changes that represented tremendous strides by the GOI in its own legal framework for increasing protections for more terrestrial and marine species. They also informed interventions for building capacity for law enforcement, in determining non-detriment findings (NDF) and quotas, tackling other sustainable trade processes and procedures, and developing and rolling out a national conservation strategies and action plan (SRAK) for target species. In parallel, BIJAK designed and implemented activities focused on the demand behind legal and illegal trade. Project areas of achievement are described below.



Figure 2. The white-rumped shama is one of the most sought-after birds for songbird keeping, a tradition that is driving the species to extinction in the wild. (Photo: Rochmad Setiadi)

Response to unsustainable wildlife trade. Support here started with building the knowledge base on wildlife trade, including crime. BIJAK studied wildlife utilization, Indonesia's wildlife trade footprints, including volumes and routes, as well as demand and how it has shifted with time. To support law enforcement, the project built capacity to identify

trafficked species and raise knowledge and awareness with air transport companies and the public to reduce illegal trade.

Protecting target species. CITES and GOI priorities targeted several species for focused protection and management. This resulted in development and roll-out of a SRAK for the helmeted hornbill, which is now a model for similar SRAKs to be developed by other CITES countries. BIJAK also helped develop an Emergency Action Plan, ahead of the eventual SRAK, to focus immediate response by the government and stakeholders on protecting the Sunda pangolin.

Toward sustainable trade. Trade that does not compromise sustainability of the species is tied to determination of NDFs and setting quotas for harvesting and export. BIJAK worked with the government to develop NDFs and standardize procedures to routinely conduct this work together with quota-setting for vulnerable shark species. Other BIJAK activities supported this, building a roadmap for traceability of species from source through supply chains, enhancing the utilization and transport permitting process to better track products to traders and against quotas, and improving species monitoring through technical protocols and networks to share data.

Reducing unsustainable demand. BIJAK helped inform efforts to curtail demand for several types of wildlife. Most significant was its work with songbirds, where domestic demand for wild-caught birds is large and growing, putting a longstanding cultural practice in conflict with species sustainability. BIJAK's highly successful demand reduction behavior change communication campaign made substantial inroads in changing this. The effort started with an innovative SMS survey and analysis to understand consumer perceptions and behaviors, which BIJAK and other partners used to design the campaign. The campaign made broad use of multiple social media platforms with social listening using social media analytics to adapt over time, tapped key opinion leaders for desired behaviors and messaging, and transferred sustainability of the campaign and newly invigorated policy advocacy elements into the hands of an existing NGO.

SUMMARY OF ACCOMPLISHMENTS

BIJAK was intended to help enhance the national legal and policy framework and go well beyond that with systems, approaches, tools, and practices. Turning policy into practice was a key focus and several examples of this are of note:

- DG Regulation on Conservation Partnerships in Conservation Areas led to establishing partnerships in six national parks to pilot the approach for improved management and encroachment/tenurial conflict handling.
- Ministerial Regulation on the National Conservation Strategy and Action Plan for helmeted hornbill conservation led to establishing a new collaborative network to raise awareness of helmeted hornbill conservation and a related public campaign (Helmeted Hornbill Week); it also led to building capacity in

Kalimantan for Alas Kusuma timber concession staff and park staff to implement conservation measures.

- Ministerial Regulation on the Utilization of Protected Fish Species, DG Regulation on Procedures for Issuing the Trade Recommendation Letter for Sharks and Rays, Directorate decree on standard operating procedures (SOPs) for SIPJI (Fish species utilization permit), Directorate decree on SOPs for SAJI (Fish species transport permit), all laid the foundation for BIJAK and KKP to train officers on how to use the SOPs to improve shark catch and trade documentation. Related to this, the NDFs for silky shark and mako shark, and the new quotas for silky shark based on the NDF, all contribute to improved shark management and sustainable utilization of the species.
- DG KSDAE Regulation on Technical Guidelines for using KSDAE's Integrated Management Information System, SIDAK, led to applying data-driven management in 14 conservation areas.
- DG KSDAE regulation on Communications Strategy for Nature Conservation formalized the new communications strategy, which professionalized KSDAE's communications. After this, staff were trained by BIJAK to use the strategy, and following the training, BIJAK selected the best national parks to mentor staff through developing communications campaigns and applying the skills and techniques they had learned.

BIJAK's important accomplishments can be summarized under several headings that tell the story of the project's work:

Provided proven solutions to urgent conservation area threats

- Developed KSDAE Regulation for Conservation Partnerships, officially enacted.
- Tested and learned from piloting conservation partnerships, with encroachment handling, participatory zoning, MIS.

Made data for decision-making a reality for conservation area management

- Zoning and blocking maps with geospatial data as a key element for managing conservation areas, with 234 of the 500 maps completed and then approved by KSDAE and proposed for integration under the One Map policy.
- Spatial data analysis to develop 225 encroachment maps that help conservation area managers address this important threat.
- Made conservation area data system (SIDAK) more integrated, user-friendly, and useful at the site level with a dashboard to support data-driven management of the most urgent threats facing conservation areas. The dashboard was developed using data deemed most important by site managers to help them monitor and manage progress on conservation priorities.

Defined new options for sustainable financing of conservation and forest management

- In-depth analysis of Public Services Agency (BLU) option for national parks and identified factors favoring and limiting the ability of national parks apply for BLU status.

- Helped government budgeting to including funding to key technical approaches and activities, accompanied by a new Strategic Plan (Renstra) section explaining how conservation area programming will be integrated with provincial, district, and village level planning.
- Developed options and made policy recommendations for EFTs as a viable option for financing conservation management.
- Finalized the proposed ministerial regulation on payment for environmental services.

Built capacity

- Designed and institutionalized trainings with government so that they are standard trainings for KLHK and government officials.
- Trained people on enhanced approaches, including wide-ranging topics like tenurial conflict handling, protected species identification, and spatial data analysis.
- Ensured partners understand why gender matters, and how to integrate gender into every conservation activity.

Professionalized KLHK's communications and public outreach

- Developed key communications strategies.
- Revamped the national park websites.
- Mentored KSDAE public relations and national park staff on communications skills.

Connected with youth as a conservation constituency

- Designed the Youth Love National Parks / Anak Muda Cinta Taman Nasional campaign to connect Indonesian youth with national parks.
- Led the first large-scale collaborative communications effort by Indonesian organizations to support the implementation of the helmeted hornbill SRAK.
- Held nature day events, social media campaigns, contests, and others.

Improved FMUs, key to Indonesia's management framework

- Developed FMU performance criteria and indicators.
- KLHK enacted the first revision of the country Long-term Forestry Plan (RKTN) as mandated by law; it becomes the main reference for forestry, spatial and land use macro and regional planning.
- Evaluated the government's investment in FMUs for production and protection of forests, finding that the approach had a significant impact on the number of forest fire hotspots, although the approach did not have a significant impact on increasing forest cover, informing subsequent action.
- Submitted recommendations to National Development Planning Agency (Bappenas) and KLHK on organizational changes to improve FMU effectiveness.

Made KEEs outside conservation areas less vulnerable

- Developed a policy and management framework for KEEs to enhance their legal protection and conservation-based management and piloted the new approaches.
- Created technical criteria for ranking potential KEEs and used them to identify eight priority areas that will be designated as KEEs in the broader analysis of potential KEEs across the country.
- Set a target of protecting 43 million hectares of high carbon stock and high conservation value areas as KEEs, in the RPJMN 2020 – 2024.

Protected wildlife

- Expanded Indonesia's list of protected species under regulation.
- Developed the Helmeted Hornbill SRAK.
- Drafted and enacted the first Sunda Pangolin Emergency Action Plan, providing direction for relevant stakeholders in Indonesia to conserve the Sunda pangolin.
- Trained government staff and private sector shark traders to monitor and report silky shark landings and how to record data on the catch and trade of sharks and shark products.
- Made recommendations to revise regulations to control wildlife utilization and to improve the captive breeding system, and provided recommendations to improve species population monitoring.
- Revised the regulation concerning Procedures of Utilization of Protected Aquatic Species and/or CITES Appendices Listed Species. This regulation is the legal framework for the conservation of CITES- listed aquatic species.
- Made policy recommendations to improve hammerhead shark management based on lessons learned over the seven years since the species was added to CITES Appendix II.

Connected science to wildlife use policy

- Developed the first NDF analysis for silky sharks.
- Developed the first NDF analysis for mako sharks using the NDF protocols developed with project support.
- Launched the Biodiversity Clearing House Mechanism, which earned the gold award at the CITES Conference of Parties 14.
- Finalized species identification guidelines for the most commonly traded species on Indonesia's protected species.

Built capacity and awareness at airports, the major transit point for trafficked wildlife

- Trained 61 Aviation Security staff from Soekarno-Hatta International Airport and Halim Perdanakusuma Airport on improved screening practices and how to identify and handle protected wildlife and wildlife parts trafficked through the airports.
- Conducted awareness-raising activities, including a protected species photo exhibit, an interactive wildlife trafficking display, and a display of videos on

wildlife trafficking in the departure hall of Soekarno-Hatta International Airport, seen by nearly 5000 visitors.

Reduced unsustainable demand for wildlife

- Carried out a highly successful behavior change communications campaign to shift consumer preference from wild-caught songbirds to captive-bred songbirds.

BIJAK ACCOMPLISHMENTS BY THE NUMBERS

- 106 national and sub-national government and civil society organizations with improved capacity for forest and conservation area management
- 326 institutions using enhanced data, information, and tools to improve conservation practices
- \$1.3 million leveraged from public and private sources for improved forest management and biodiversity conservation
- 2,100 people trained for improved forest management and biodiversity conservation
- 50 laws, regulations, and policies proposed or adopted
- 552 conservation areas, 100 percent of areas nationally, with completed zonation and mapping to inform improved management and community partnerships
- 100,000 hectares prioritized for encroachment handling with new government capacity and tools and 225 new maps covering 56 conservation areas
- 3.5 million hectares mapped for conservation partnerships as the government continues to roll out its new co-management regulation
- 77.1 million hectares of estimated, vulnerable essential ecosystem areas mapped — 56 percent to be verified and brought under new policy and management regime in the next four years
- 4,800 airport visitors educated on countering wildlife smuggling through innovative exhibits and video displays
- 43 percent reduced demand for wild-caught songbirds as result of behavior change campaign reaching nearly 1 million songbird-keepers and group members

RINGKASAN EKSEKUTIF

Proyek Badan Pembangunan Internasional Amerika Serikat (USAID) Bangun Indonesia untuk Jaga Alam demi Keberlanjutan (BIJAK) diimplementasikan melalui kemitraan dengan Pemerintah Indonesia untuk mendukung perbaikan konservasi dan pengelolaan keanekaragaman hayati laut, darat, dan habitat alami, mengurangi emisi gas rumah kaca dan mendorong pengelolaan bentanglahan serta sumberdaya alam berkelanjutan. Untuk mencapai tujuan tersebut, BIJAK bekerja terutama di tingkat nasional untuk meningkatkan pengelolaan hutan dan kawasan konservasi, serta mengurangi ancaman terhadap satwa liar di laut dan di darat dari ancaman perdagangan ilegal atau tidak berkelanjutan.

Mitra kerja utama BIJAK adalah Kementerian Lingkungan Hidup dan Kehutanan (KLHK) dengan sejumlah direktoratnya, namun mitra kerja proyek ini juga termasuk Kementerian Kelautan dan Perikanan (KKP) dan Lembaga Ilmu Pengetahuan Indonesia (LIPI) untuk kerja yang berkaitan dengan, antara lain, spesies laut. BIJAK membangun kemitraan multipihak yang kuat dengan beberapa organisasi pemerintah daerah, lembaga penelitian dan universitas, organisasi masyarakat sipil dan swadaya masyarakat, pihak swasta, dan sebagainya, yang mencerminkan sifat kolaboratif dan keterkaitan inisiatif-inisiatif BIJAK dan tata kelola sumberdaya alam.

Fokus kerja BIJAK di tingkat nasional terutama berupa dukungan perbaikan peraturan perundangan, kebijakan, dan rencana serta implementasinya, juga pendekatan pengelolaan, piranti dan sistem pendukung. Membantu menggerakkan inisiatif baru untuk diluncurkan dan diterapkan - mulai dari kebijakan dan pendekatan hingga piranti teknis - termasuk pengetahuan dan kapasitas pendukung, adalah semangat dasar kerja proyek ini. Perubahan perilaku juga merupakan bagian tidak terpisahkan, terutama berkaitan dengan perdagangan satwa liar yang berkelanjutan. BIJAK merancang dan melaksanakan kerjanya melalui lensa peningkatan kesetaraan gender dan inklusi sosial.

Dengan fokus nasional, proyek ini bekerja sama dengan proyek USAID lain yang bekerja di tingkat tapak - khususnya Proyek LESTARI dan Proyek Sustainable Ecosystems Advanced (SEA) - untuk memajukan pendekatan yang telah berhasil di tingkat lokal agar diadopsi secara nasional, memberi masukan dalam perumusan kebijakan nasional dengan pengalaman di tingkat tapak, dan mendukung pelaksanaan pendekatan nasional baru di tapak yang ditargetkan.

Pendekatan BIJAK didasarkan pada teori perubahan yang merumuskan sasaran intervensinya - atau "pendekatan strategis" – berupa capaian keadaan yang pada gilirannya akan mengurangi ancaman terhadap keanekaragaman hayati dan habitat kritis untuk meningkatkan konservasi serta capaian lain. Kegiatan dan sumber daya di bawah empat komponen teknis yang cakupannya agak luas diselaraskan selama perencanaan kerja tahunan di bawah dua tema teknis: Peningkatan Pengelolaan Kawasan Konservasi dan Hutan, dan Peningkatan Perlindungan Spesies. Pendekatan manajemen yang adaptif dari proyek ini menyertakan perhatian yang cermat pada dinamika ekonomi politik yang

berkembang, tinjauan terhadap pencapaian dibandingkan dengan target indikator kinerja, dan pembaruan teori perubahan. Tantangan terbesar yang mempengaruhi implementasi proyek ini adalah pandemi global virus corona (COVID-19) mulai pada awal 2020. Meskipun situasi ini membatasi banyak aktivitas, terutama yang memerlukan kontak tatap muka dan peluncuran inisiatif nasional di tingkat tapak, situasi ini juga membuka peluang baru - misalnya, organisasi seperti terpacu untuk membiasakan *e-learning* atau pembelajaran virtual dalam penguatan kapasitas, dan berhasil meningkatkan penggunaan piranti teknologi komunikasi dan data untuk pengambilan keputusan.

MENINGKATKAN PENGELOLAAN KAWASAN KONSERVASI DAN HUTAN

Di bawah tema teknis pertama, bantuan BIJAK diarahkan untuk meningkatkan pengelolaan lebih dari 500 kawasan konservasi yang dikuasai negara serta hutan negara di luar kawasan konservasi. Kategori ketiga, yakni kawasan ekosistem esensial (KEE) yang terletak di luar kawasan konservasi disertakan sebagai bentanglahan tambahan yang signifikan namun masih belum dilindungi. Pada tingkat kebijakan dan perencanaan yang luas, BIJAK mendukung penyusunan rencana dan strategi nasional untuk memberi arah bagi investasi pengelolaan hutan, memberi penekanan pada ukuran kinerja konservasi dan memasukkan inisiatif baru untuk mengurangi ancaman terhadap hutan dan kawasan konservasi. Dukungan kebijakan juga diberikan pada kementerian dan unit kerja untuk meningkatkan komponen penting pengelolaan KLHK, seperti kesatuan pengelolaan hutan (KPH), pengelolaan berbasis resor (RBM), perencanaan dan perizinan penggunaan lahan, dan struktur taman nasional. Proyek ini memberi dukungan bagi KEE secara komprehensif, dimulai dengan kebijakan perlindungan dan dukungan sumber daya yang lebih besar, diikuti dengan kerangka kerja perencanaan dan pengelolaan yang akan diterapkan di tingkat tapak.



Gambar 1. Taman Nasional Meru Betiri, satu tapak percontohan dukungan BIJAK untuk implementasi peraturan baru tentang kemitraan konservasi. (Foto: Balai TN Meru Betiri, Ditjen KSDAE KLHK)

Lebih jauh, kerja terkait kawasan konservasi dan hutan ditekankan pada penanganan ancaman utama terhadap bentanglahan dan prioritas KLHK untuk meningkatkan pengelolaannya di tingkat nasional dan tapak. BIJAK membantu mitra kerja menentukan masalah dan kebutuhan, serta merumuskan solusi yang biasanya diadopsi secara resmi melalui peraturan yang sesuai di lingkup KLHK. Berikut adalah contoh-contoh fokus kerja selama ini.

Mengurangi perambahan di kawasan konservasi. BIJAK dan KLHK mengidentifikasi pemerian dan penanganan perambahan sebagai kebutuhan utama untuk kawasan konservasi, dengan penerapan serupa pada bentanglahan lain. Kerja ini menghasilkan analisis dan pemetaan, perencanaan aksi, dan percontohan untuk mengatasi penyebab, termasuk konflik tenurial di kawasan konservasi.

Zonasi dan penataan blok. Zonasi dan penataan blok di kawasan konservasi di luar taman nasional juga merupakan kebutuhan utama pengelolaan kawasan konservasi secara menyeluruh (dan juga KEE) serta untuk mengetahui potensi ancaman berikut pilihan penanganannya seperti perambahan. BIJAK membantu peningkatan kapasitas KLHK untuk menyelesaikan, merevisi, dan pada akhirnya memetakan zonasi dan penataan blok untuk seluruh kawasan konservasi di Indonesia, hingga para pemangku kawasan mengadopsi peta tersebut sebagai panduan pengelolaan di tapak. Dalam hal ini proyek juga membantu KLHK melakukan penataan ulang zona atau rezonasi secara partisipatif untuk melibatkan dan mendorong rasa ikut memiliki masyarakat lokal, menerapkannya dalam konteks nyata seperti menyelesaikan konflik tenurial.

Kemitraan konservasi. Partisipasi multipihak dalam konservasi menjadi prioritas KLHK dan BIJAK, dimulai dengan membantu kementerian menyusun rancangan peraturan tentang kemitraan konservasi sehingga masyarakat lokal dapat berperan aktif bersama pemerintah dalam inisiatif di tingkat tapak. Pengembangan kapasitas yang lebih luas termasuk berbagi pembelajaran dari beberapa contoh kemitraan konservasi sebelumnya yang dilaksanakan sebelum lahir peraturan baru, merancang dan melatih para pengelola kawasan tentang pedoman teknis pelaksanaan, dan mengembangkan mekanisme dan pendekatan pelibatan masyarakat. Percontohan disesuaikan dengan prioritas lain yakni untuk mengatasi perambahan dan konflik tenurial serta penataan ulang zona atau rezonasi secara partisipatif dengan melibatkan masyarakat.

Data untuk pengambilan keputusan. KLHK dan BIJAK sangat sejalan dalam memandang pentingnya dan kebutuhan akan data terkini, berkualitas tinggi, dan berguna untuk keputusan manajemen. Pendekatan demikian menjawab kebutuhan KLHK untuk menyederhanakan dan mengintegrasikan sistem yang berbeda di dalam kementerian dalam suatu laman ringkasan (*dashboard*) untuk menyajikan informasi kunci bagi para pimpinan, sekaligus menjawab kebutuhan di tingkat tapak akan data spesifik yang berguna untuk menentukan tindakan dan memantau kecenderungan ancaman utama seperti perambahan. Proyek ini berfokus pada kualitas sejumlah data yang memberi arah untuk keputusan sehari-hari, serta memantau kemajuan dan kecenderungan situasi, sehingga kemanfaatan data dalam hal ini memberi insentif untuk keberlanjutan.

Pembiayaan untuk pengelolaan. BIJAK membuka opsi baru pembiayaan berkelanjutan untuk konservasi. Bidang yang sangat menarik dalam hal ini adalah transfer fiskal berbasis ekologis (EFT), suatu mekanisme yang memungkinkan transfer dana untuk tujuan konservasi dari pemerintah pusat ke pemerintah daerah atau langsung ke desa. Kerja ini difokuskan pada pengembangan kerangka kebijakan dan analisis yang mengarah pada peta jalan penerapannya untuk kebutuhan provinsi tertentu. Proyek ini juga membantu perbaikan kerangka peraturan untuk pembayaran jasa lingkungan, memberikan opsi lain untuk pendanaan di tingkat tapak.

Membangun konstituen konservasi. Komunikasi dan perubahan perilaku mengalir dalam banyak pekerjaan BIJAK. Untuk konservasi, hal ini difokuskan pada pembangunan konstituen untuk taman nasional dan aset alamiah luar biasa yang tercakup di dalamnya. BIJAK membantu pengembangan kapasitas unit kerja pemerintah untuk komunikasi dan penyadartahuan, termasuk pemanfaatan media tradisional, media sosial, dan fokus khusus pada peningkatan situs web taman nasional. Kalangan anak muda adalah target audiens untuk membangun konstituen dengan kampanye yang bertujuan untuk menciptakan komunitas pendukung taman nasional yang dinamis.

MENINGKATKAN PERLINDUNGAN SPESIES

Sebagaimana tema teknis pertama, tim proyek ini bekerja dengan mitra-mitra kerja dalam mengidentifikasi kebutuhan terkait peraturan perundangan dan kebijakan nasional yang penting untuk didukung oleh BIJAK dalam membantu perlindungan spesies. Kerangka acuan utama dukungan BIJAK adalah Konvensi tentang Perdagangan Internasional Spesies Flora dan Fauna Liar yang Terancam Punah (*Convention on International Trade in Endangered Species of Wild Fauna and Flora*, atau CITES) dengan kepatuhan BIJAK pada prinsip-prinsip pemanfaatan berkelanjutan. Kerja BIJAK dalam hal ini mendukung peran penting Pemerintah Indonesia dalam pertemuan CITES dan komitmen kuat terhadap prioritas CITES yang belum lama ini disepakati dalam mengembangkan peraturan tentang perlindungan spesies tertentu, menetapkan kuota perdagangan, dan penegakan hukum. Elemen-elemen tersebut mencakup perubahan kebijakan nasional yang mewakili langkah luar biasa Pemerintah Indonesia dalam kerangka hukum yang ada untuk meningkatkan perlindungan bagi lebih banyak spesies darat dan laut. Perubahan-perubahan tersebut juga memberi arah bagi intervensi untuk membangun kapasitas penegakan hukum, menentukan temuan yang tidak merugikan (*Non-Detriment Findings*, atau NDF) dan kuota, menangani proses dan prosedur perdagangan berkelanjutan lainnya, serta mengembangkan dan meluncurkan strategi dan rencana aksi konservasi nasional (SRAK) untuk spesies target. Sejalan dengan itu, BIJAK juga merancang dan melaksanakan kegiatan yang difokuskan pada sisi permintaan dalam perdagangan legal dan ilegal. Di bawah ini adalah contoh-contoh pencapaian proyek dalam hal ini.



Gambar 2. Murai batu adalah salah satu burung yang paling dicari untuk pemeliharaan burung kicau, sebuah tradisi yang mengancam spesies ini menuju kepunahan di alam liar. (Foto: Rochmad Setiadi).

Respon terhadap perdagangan satwa liar yang tidak berkelanjutan. Dukungan dalam hal ini dimulai dengan membangun basis pengetahuan tentang perdagangan satwa liar, termasuk kejahatannya. BIJAK mempelajari pemanfaatan satwa liar, jejak perdagangan satwa liar Indonesia, termasuk volume dan rute, serta permintaan dan bagaimana perubahannya seiring waktu. Untuk mendukung penegakan hukum, proyek ini membangun kapasitas dalam mengidentifikasi spesies yang diperdagangkan dan meningkatkan pengetahuan dan kesadaran pihak perusahaan transportasi udara dan publik untuk mengurangi perdagangan ilegal.

Melindungi spesies target. CITES dan Pemerintah Indonesia menargetkan beberapa spesies prioritas untuk perlindungan dan pengelolaan yang terfokus. Hal ini menghasilkan pengembangan dan peluncuran SRAK Rangkong Gading yang kini menjadi model untuk SRAK serupa yang akan dikembangkan oleh negara CITES lain. BIJAK juga membantu penyusunan Rencana Aksi Darurat, sebelum dikembangkannya SRAK, untuk memfokuskan tindakan segera pemerintah dan para pemangku kepentingan dalam melindungi Trenggiling Sunda.

Menuju perdagangan berkelanjutan. Perdagangan yang tidak membahayakan keberlanjutan spesies terkait dengan penentuan NDF dan penetapan kuota untuk panen dan ekspor. BIJAK bekerja sama dengan pemerintah untuk mengembangkan NDF dan membakukan prosedur agar pekerjaan seperti ini dapat dilakukan secara rutin bersamaan dengan penetapan kuota untuk spesies hiu yang rentan. Kegiatan BIJAK lain yang mendukung hal ini adalah membangun peta jalan untuk penelusuran spesies dari titik sumber ke rantai pasok, meningkatkan pemanfaatan dan proses perizinan pengangkutan, memperbaiki ketertelusuran agar petugas mampu melacak produk dengan lebih baik hingga ke

pedagang dan dibandingkan dengan kuota, dan meningkatkan pemantauan spesies melalui protokol teknis dan jaringan pemantauan untuk berbagi data.

Mengurangi permintaan yang tidak berkelanjutan. BIJAK membantu upaya mengurangi permintaan untuk beberapa jenis satwa liar. Yang paling signifikan dalam hal ini adalah pekerjaan terkait dengan burung kicau, di mana permintaan domestik untuk burung yang ditangkap dari alam masih besar dan terus meningkat, menempatkan tradisi yang telah berlangsung lama ini bertentangan dengan kelestarian spesies. Kampanye BIJAK yang cukup sukses untuk komunikasi perubahan perilaku pengurangan permintaan berhasil membuat terobosan besar dalam mengubah hal ini. Upaya tersebut dimulai dengan inovasi survei SMS dan analisisnya untuk memahami persepsi dan perilaku konsumen. Hasilnya digunakan oleh BIJAK dan mitra lainnya untuk merancang kampanye. Kampanye ini memanfaatkan banyak *platform* media sosial dengan mendengarkan percakapan di dunia maya melalui penggunaan analitik media sosial untuk beradaptasi dari waktu ke waktu, memanfaatkan para ahli di bidangnya untuk mengalihkan melalui pesan ke arah perilaku yang diharapkan, dan mengalihkan keberlanjutan kampanye dan elemen advokasi yang baru saja diperbaharui ke tangan mitra organisasi masyarakat sipil yang saat ini terlibat.

RINGKASAN PENCAPAIAN

BIJAK membantu meningkatkan kerangka hukum dan kebijakan nasional dan telah mencapainya dengan sistem, pendekatan, piranti, dan praktik. Mengubah kebijakan menjadi praktik adalah fokus utama BIJAK dengan beberapa contohnya :

- Peraturan Direktur Jenderal (Dirjen) Konservasi dan Sumber Daya Alam dan Ekosistem (KSDAE) tentang Kemitraan Konservasi di Kawasan Konservasi memberi arah peresmian kemitraan di enam taman nasional untuk merintis pendekatan untuk pengelolaan yang lebih baik dan penanganan perambahan/konflik tenurial.
- Peraturan Menteri KLHK tentang Strategi dan Rencana Aksi Konservasi Nasional rangkong gading melahirkan pembentukan jaringan kerjasama baru untuk meningkatkan kesadaran akan konservasi rangkong gading dan kampanye publik terkait (Pekan Rangkong Gading); hal ini juga mengarah pada peningkatan kapasitas di Kalimantan bagi staf perusahaan pemegang konsesi kayu Alas Kusuma dan staf taman nasional untuk melaksanakan langkah-langkah konservasi.
- Peraturan Menteri KKP tentang Pemanfaatan Jenis Ikan yang Dilindungi, Peraturan Dirjen Pengelolaan Ruang Laut (PRL) tentang Tata Cara Penerbitan Surat Rekomendasi Perdagangan Hiu dan Pari, Keputusan Direktur Konservasi Keanekaragaman Hayati Laut (KKHL) tentang Tata Cara Penerbitan (SOP) Surat Ijin Pemanfaatan Jenis Ikan (SIPJI), Keputusan Direktur KKHL tentang Tata Cara Penerbitan (SOP) Surat Angkut Jenis Ikan (SAJI), semuanya menjadi landasan bagi BIJAK dan KKP untuk melakukan pelatihan petugas tentang penggunaan SOP untuk meningkatkan dokumentasi penangkapan dan perdagangan hiu. Terkait dengan hal ini, NDF untuk hiu lanjaman dan hiu mako, serta kuota baru untuk hiu

lanjutan berdasarkan NDF, semuanya berkontribusi pada peningkatan pengelolaan hiu dan pemanfaatan spesies secara berkelanjutan.

- Peraturan Dirjen KSDAE tentang Pedoman Teknis Penggunaan Sistem Informasi Manajemen Terpadu KSDAE, SIDAK, melahirkan penerapan pengelolaan berbasis data di 14 kawasan konservasi.
- Peraturan Dirjen KSDAE tentang Strategi Komunikasi untuk Konservasi Alam meresmikan strategi komunikasi baru yang memprofesionalkan komunikasi di lingkungan KSDAE. Setelah itu, staf dilatih oleh BIJAK untuk menggunakan strategi tersebut, dan setelah pelatihan, BIJAK memilih taman nasional dengan respon terbaik untuk memandu staf mengembangkan kampanye komunikasi dan menerapkan keterampilan dan teknik yang telah dipelajari.

Capaian penting BIJAK dapat diringkas di bawah beberapa subjudul berikut yang juga mengisahkan cerita kerja proyek ini:

Mengajukan solusi jitu atas ancaman terhadap kawasan konservasi yang mendesak

- Membantu penyusunan rancangan Peraturan Dirjen KSDAE untuk Kemitraan Konservasi, secara resmi telah diberlakukan
- Membantu uji coba dan memfasilitasi pembelajaran dari uji coba kemitraan konservasi, dengan penanganan perambahan, zonasi partisipatif, sistem manajemen informasi (SMI)

Membantu realisasi penyediaan data untuk pengambilan keputusan untuk pengelolaan kawasan konservasi

- Peta zonasi dan penataan blok dengan data geospasial sebagai elemen kunci untuk mengelola kawasan konservasi, dengan 234 dari 500 peta diselesaikan telah disetujui oleh Dirjen KSDAE dan telah diajukan untuk diintegrasikan di bawah kebijakan Satu Peta.
- Analisis data spasial untuk mengembangkan 225 peta perambahan yang membantu para pengelola kawasan konservasi mengatasi ancaman penting ini.
- Membantu realisasi Sistem Informasi Pendataan Konservasi (SIDAK) lebih terintegrasi, ramah pengguna, dan berguna di tingkat tapak dengan laman pedoman (*dashboard*) untuk mendukung pengelolaan kawasan konservasi berbasis data dari ancaman paling mendesak yang dihadapi. Laman pedoman dikembangkan dengan menggunakan data yang dianggap paling penting oleh pengelola lokasi untuk membantu mereka memantau dan mengelola kemajuan dalam prioritas konservasi.

Merumuskan opsi baru pembiayaan berkelanjutan untuk konservasi dan pengelolaan hutan

- Analisis mendalam tentang opsi alih status menjadi Badan Layanan Umum (BLU) bagi taman nasional dan mengidentifikasi faktor-faktor yang

mendukung dan membatasi kemampuan taman nasional mengajukan status BLU.

- Membantu perencanaan anggaran pemerintah untuk memasukkan pendanaan bagi pendekatan kunci dan kegiatan teknis utama, disertai dengan bagian Renstra baru yang menjelaskan bagaimana program kawasan konservasi akan diintegrasikan dengan perencanaan di tingkat provinsi, kabupaten, dan desa.
- Mengembangkan opsi dan menyusun rekomendasi kebijakan untuk EFT sebagai opsi yang layak untuk mendanai pengelolaan konservasi.
- Menyelesaikan usulan rancangan peraturan menteri tentang pembayaran untuk jasa lingkungan.

Membangun kapasitas

- Merancang dan melembagakan pelatihan dengan pemerintah sehingga menjadi pelatihan standar bagi KLHK dan pejabat/pegawai pemerintah.
- Melatih orang-orang tentang peningkatan pendekatan, termasuk topik yang luas seperti penanganan konflik tenurial, identifikasi spesies yang dilindungi, dan analisis data spasial.
- Memastikan mitra memahami mengapa gender penting, dan bagaimana mengintegrasikan gender ke dalam setiap aktivitas konservasi.

Membantu memprofesionalkan kerja komunikasi dan penjangkauan publik KLHK

- Mengembangkan strategi komunikasi utama.
- Merombak situs taman nasional.
- Memandu kerja hubungan masyarakat KSDAE dan staf taman nasional tentang keterampilan komunikasi.

Menghubungkan dengan kaum muda sebagai konstituen konservasi

- Merancang kampanye Anak Muda Cinta Taman Nasional untuk menghubungkan pemuda Indonesia dengan taman nasional.
- Memandu komunikasi kolaboratif skala besar pertama oleh organisasi di Indonesia untuk mendukung implementasi SRAK Rangkong Gading.
- Menyenggarakan peringatan hari-hari alam, kampanye media sosial, kontes, dll.

Membantu perbaikan KPH, kunci kerangka pengelolaan Indonesia

- Mengembangkan kriteria dan indikator kinerja KPH.
- KLHK memberlakukan revisi pertama dari Rencana Kehutanan Tingkat Nasional (RKTN) sebagaimana diamanatkan oleh undang-undang; menjadi acuan utama dalam perencanaan makro dan wilayah kehutanan, tata ruang dan tata guna lahan.

- Membantu evaluasi investasi pemerintah di KPH produksi dan lindung, menemukan bahwa pendekatan KPH berdampak signifikan pada jumlah titik api kebakaran hutan, meskipun pendekatan KPH tidak berdampak signifikan pada peningkatan tutupan hutan, sehingga menginformasikan tindakan selanjutnya.
- Menyerahkan rekomendasi kepada Badan Perencanaan Pembangunan Nasional (Bappenas) dan KLHK tentang perubahan organisasi untuk meningkatkan efektivitas KPH.

Mengurangi kerentanan KEE di luar kawasan konservasi

- Menyusun rancangan kebijakan dan kerangka kerja pengelolaan KEE untuk meningkatkan perlindungan hukum dan pengelolaan berbasis konservasi dan mengujicobakan pendekatan baru.
- Membantu penyusunan kriteria teknis untuk memeringkat KEE potensial, dan menggunakannya untuk mengidentifikasi delapan bidang prioritas yang akan ditetapkan sebagai KEE dalam analisis yang lebih luas dari KEE potensial di seluruh negeri.
- Membantu menetapkan target untuk melindungi 43 juta hektar areal dengan stok karbon tinggi dan areal bernilai konservasi tinggi sebagai KEE, dalam RPJMN 2020 - 2024.

Melindungi satwa liar

- Memperluas daftar spesies yang dilindungi di Indonesia berdasarkan regulasi.
- Menyusun SRAK Rangkong Gading.
- Membantu penyusunan dan akhirnya diberlakukan Rencana Aksi Darurat pertama Penyelamatan Trenggiling Sunda, memberi arahan bagi para pemangku kepentingan terkait di Indonesia untuk melestarikan satwa ini.
- Melatih pegawai pemerintah dan pedagang hiu (pihak swasta) untuk memantau dan melaporkan pendaratan hiu lanjaman dan cara mencatat data tangkapan dan perdagangan hiu dan produk hiu.
- Menyusun dan mengajukan rekomendasi untuk revisi peraturan tentang pengendalian pemanfaatan satwa liar dan untuk meningkatkan sistem penangkaran, dan mengajukan rekomendasi untuk meningkatkan pemantauan populasi spesies.
- Membantu revisi peraturan tentang Tata Cara Pemanfaatan Jenis Perairan yang Dilindungi dan/atau Jenis yang Tercantum dalam Appendiks II CITES. Peraturan ini merupakan kerangka hukum untuk konservasi spesies air yang terdaftar di CITES.
- Menyusun dan mengajukan rekomendasi kebijakan untuk meningkatkan pengelolaan hiu martil berdasarkan pembelajaran yang diperoleh selama tujuh tahun sejak spesies tersebut ditambahkan ke CITES Appendiks II.

Menghubungkan ilmu dengan kebijakan pemanfaatan satwa liar

- Membantu dengan mengembangkan analisis NDF pertama untuk hiu lanjaman.
- Membantu dengan mengembangkan analisis NDF pertama untuk hiu mako menggunakan protokol NDF yang dikembangkan dengan dukungan proyek.
- Membantu pembangunan mekanisme Balai Kliring Keanekaragaman Hayati yang memperoleh penghargaan emas pada Konferensi Para Pihak CITES's (*Conference of Parties, COP*) ke-14.
- Membantu penyusunan Panduan Identifikasi Spesies untuk spesies yang paling sering diperdagangkan di antara spesies yang dilindungi di Indonesia.

Membangun kapasitas dan kesadaran di bandara, titik transit utama bagi satwa liar yang diperdagangkan

- Melatih 61 petugas Aviation Security (Avsec) Bandara Internasional Soekarno-Hatta dan Bandara Halim Perdanakusuma tentang praktik *screening* yang lebih baik dan cara mengidentifikasi serta menangani satwa liar yang dilindungi dan bagian satwa liar yang diperdagangkan melalui bandara.
- Menyelenggarakan kegiatan penyadartahuan antara lain berupa pameran foto spesies dilindungi, pameran interaktif perdagangan satwa liar, dan tayangan video perdagangan satwa liar di aula keberangkatan Bandara Internasional Soekarno-Hatta yang disaksikan oleh hampir 5.000 pengunjung.

Mengurangi permintaan satwa liar yang tidak berkelanjutan

- Menyelenggarakan kampanye komunikasi perubahan perilaku yang sangat sukses untuk mengubah preferensi konsumen dari burung kicau yang ditangkap dari alam menjadi burung kicau hasil penangkaran.

PENCAPAIAN BIJAK DALAM ANGKA

Dengan dukungan BIJAK....

- 106 lembaga pemerintah pusat dan daerah serta organisasi masyarakat sipil dengan kapasitas yang meningkat untuk pengelolaan kawasan hutan dan kawasan konservasi
- 326 lembaga menggunakan data, informasi, dan piranti yang disediakan untuk meningkatkan praktik konservasi
- \$ 1,3 juta dana dari sumber-sumber publik dan swasta berhasil dimobilisasi dan dimanfaatkan untuk pengelolaan hutan dan konservasi keanekaragaman hayati yang lebih baik
- 2.100 orang dilatih untuk pengelolaan hutan dan konservasi keanekaragaman hayati yang lebih baik
- 50 peraturan perundangan dan kebijakan yang diusulkan atau diadopsi
- 552 kawasan konservasi, atau 100 persen kawasan secara nasional, dengan zonasi dan pemetaan secara lengkap, memberi arah pengelolaan yang lebih baik dan kemitraan masyarakat
- 100.000 hektar diprioritaskan untuk penanganan perambahan dengan kapasitas dan piranti pemerintah yang baru, serta 225 peta baru yang mencakup 56 kawasan konservasi
- 3,5 juta hektar telah dipetakan untuk kemitraan konservasi karena pemerintah terus mengeluarkan peraturan pengelolaan-bersama yang baru
- 77,1 juta hektar kawasan ekosistem esensial yang rentan dan rentan dipetakan - 56 persen masih akan diverifikasi dan dibawa ke rejim kebijakan dan pengelolaan baru dalam empat tahun ke depan
- 4.800 pengunjung bandara dikenalkan tentang cara melawan penyelundupan satwa liar melalui pameran inovatif dan tayangan video
- 43 persen berkurangnya permintaan akan burung kicau yang ditangkap dari alam sebagai akibat dari kampanye perubahan perilaku yang mencapai hampir 1 juta pemelihara burung kicau dan anggota kelompok

SECTION I

INTRODUCTION AND APPROACH

OVERVIEW

The Build Indonesia to Take Care of Nature for Sustainability (BIJAK) project was designed to support the Government of Indonesia (GOI) and other stakeholders in preserving and managing the country's rich endowment of marine and terrestrial biodiversity and natural habitats, reducing greenhouse gas emissions, and addressing a key driver for sustainable development. To accomplish this, BIJAK worked primarily at the national level to improve the management of forests and conservation areas, and marine and terrestrial wildlife threatened by illegal or unsustainable trade.

BIJAK's primary government counterpart was the Ministry of Environment and Forestry (KLHK) and a number of its directorates, though the project's partners also included the Ministry of Marine Affairs and Fisheries (KKP) for work with marine species. Overall, BIJAK's partners were wide-ranging, reflecting the multi-stakeholder nature of its initiatives and natural resource governance. BIJAK facilitated linkages across stakeholders — GOI, civil society organizations (CSOs), research institutions, and the private sector — to jointly develop and implement effective change. Interventions aligned with objectives to improve related laws, regulations, policies, and plans and their implementation, together with management approaches, tools, and systems. Capacity building was foundational to much of the project's work as was behavior change, particularly linked to sustainable wildlife trade. BIJAK designed and carried out its work through a lens of enhanced gender equity and social inclusion.

BIJAK was also designed to collaborate with other US Agency for International Development (USAID) partners working more at the site level, particularly USAID's USAID Sustainable Forest Management Project (LESTARI) and Sustainable Ecosystems Advanced (SEA) projects, to scale up local-level approaches for nationwide adoption, inform national policy with site-level experience, and support initial roll-out of new national approaches at target sites.

BIJAK's work supported the GOI's commitment to achieve Sustainable Development Goal 12, Responsible Consumption and Production and Sustainable Development Goal 13, Climate Action. The project was also designed to fully align with the USAID/Indonesia Country Development Cooperation Strategy in effect at the project's inception.

The project was implemented from June 2016 to June 2021 in collaboration with the GOI and other local partners with support from prime contractor Chemonics

International, and its subcontractors the Wildlife Conservation Society (WCS) and the Partnership for Governance Reform (Kemitraan).

DESIGN AND APPROACH

The original design of the project aligned resources and activities into four main areas: low carbon and conservation-based land use, improved management of conservation areas and key species, private sector performance, and building constituencies for conservation. In Year 2, as implementation proceeded, sector priorities evolved, and the project narrowed its focus, the BIJAK team, together with USAID, agreed to align resources in the four areas along two “technical themes”: Improved Conservation Area and Forest Management, and Increased Species Protection. This structure targeted activities for greater impact and to more effectively promote the adoption of individual and organizational behaviors, which contribute to a reduction of greenhouse gas emissions and an increase in marine and terrestrial biodiversity conservation.

BIJAK’S STRATEGIC APPROACH AREAS

- Strengthen conservation area management frameworks and systems
- Reinforce management capacity and collaboration to reduce conservation area encroachment
- Build and strengthen constituencies for conservation
- Strengthen forest management units to implement effective multiple use forest management
- Expand use of innovative funding and financing strategies to incentivize forest conservation and sustainable forest management
- Protect essential ecosystem areas (KEEs) outside conservation areas
- Revise legal and policy frameworks and build capacity to confront illegal or unsustainable wildlife trade, and meet national commitments to Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES)
- Increase commitment to tackling wildlife crime and reduce demand for wildlife and their products

BIJAK’s approach is tied to its theory of change, which outlines how BIJAK’s intervention areas, or “strategic approaches,” were expected to lead to specific results, ultimately reducing threats to biodiversity and critical habitats for improved conservation and other outcomes.

BIJAK faced an unprecedented challenge in the global coronavirus (COVID-19) pandemic. From the first calendar quarter of 2020 until contract end, project and partner staff were at risk of serious health consequences and governments and institutions imposed often-severe, yet appropriate, restrictions. BIJAK and its partners adapted to more than one year of remote operations, with limited or no face-to-face site activities, meetings, trainings, or other events. Nonetheless, the project continued on course, achieving the broader impacts described in the following pages. And, with this adversity, the project found opportunity, mainly in the area of accelerating capacity, tools, and motivation for use of digital technology. This included greater interest and institutionalization of training curricula under e-learning platforms, more adoption of digital tools for advocacy and outreach, and spurring interest in using technology tools to collect and share data on environmental threats.

As described in the following sections, BIJAK was a highly integrated project, which maximized national- and site-level impact and sustainability through enhanced capacity, knowledge, and practice in multi-stakeholder settings, including the government, local communities, the research community, civil society groups, and the public.

“Through this collaboration, we achieved government performance targets and goals over the past five years. The project has contributed to several targets for conservation partnerships, zoning and blocking for traditional zone at several national parks, tenurial conflict handling, data management for conservation areas, and the conservation of key wildlife species.

It is my hope that the important lessons learned from the project could improve conservation outcomes and enhance cooperation among stakeholders toward the common goal of a prosperous future for all communities living adjacent to conservation areas in Indonesia.”

Ir. Wiratno, M.Sc
Director General of Natural Resources and Ecosystem Conservation
Indonesian Ministry of Environment and Forestry

SECTION 2

IMPROVING MANAGEMENT OF CONSERVATION AREAS AND FORESTS

In conservation area and forest management, the project worked to enhance overall management in three types of landscapes: conservation areas, the legally established forest estate outside of these areas, and essential ecosystem areas (KEEs) with high conservation value that exist outside of current conservation areas. Interventions, approaches, and tools to address key management challenges in these landscapes were tailored and applied to one — or multiple — setting(s) as appropriate. The project enhanced zoning, with applications to both conservation area and KEE management, as well as concession areas within the forest estate. Tools for tenurial conflict and encroachment handling were applied mainly in conservation areas but have broad applicability across landscapes; conservation partnerships to handle these threats were a valuable option in all areas, together with enhanced data to inform decision-making.

STRENGTHENING CONSERVATION AREA AND FOREST LEGAL AND PLANNING FRAMEWORK

With its focus at the national level and on nationwide impact, BIJAK gave significant support to KLHK and others on enhancing the framework for conservation area and forest management. This ranged from national laws to ministerial and directorate decrees and included broad strategic planning for the sector.

Forestry Strategic Planning. A key guiding document for the sector was the Long-Term National Forestry Plan (RKTN) 2011 – 2030, which will be used as a reference by all provinces in preparing their own long-term forestry plans. In its first year, BIJAK worked with KLHK's Forestry Planning directorate general to revise the RKTN, and bring in expert analysis in forest economics, geo-spatial analysis, regional development planning, and forest policy. The effort incorporated feedback from regional stakeholders, including USAID LESTARI partners, and the process led to an increased allocation of forest area for community activities from 5 to 14 million hectares and a decrease in the vulnerable convertible production forest allocation from 12.5 to 6.5 million hectares. These changes helped to rebalance the RKTN's priorities toward conservation of existing forest areas and small-scale forest management and mitigate extractive risks from larger-scale concessions. Information from the RKTN served as a basis for USAID LESTARI to support development of sub-national forestry plans.

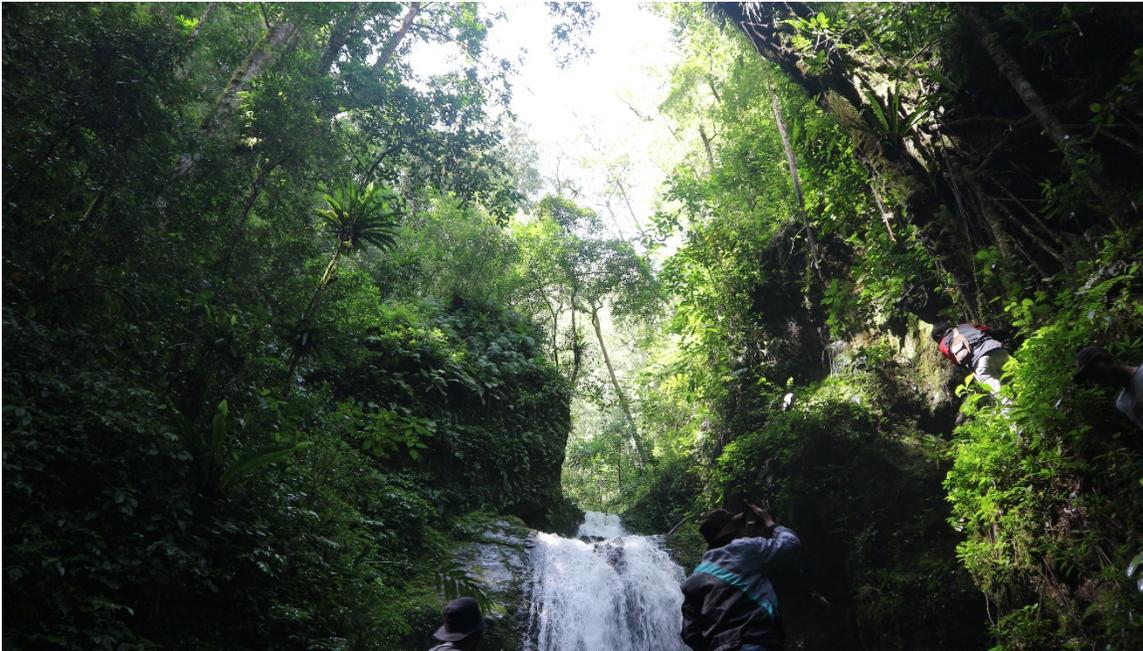


Figure 3. Staff of FMU Unit V Gayolues Aceh and members of the local community conduct participatory mapping. (Photo: Improsula/USAID LESTARI)

The project worked extensively with KLHK’s Directorate General of Ecosystem and Natural Resources Conservation (KSDAE). The mid-term (2020 – 2024) strategic plan (Rencana Strategis/Renstra) is a key document for KSDAE, for planning its programs and activities and allocating budgets to achieve conservation objectives for all directorates and conservation areas during the five-year period covered by the plan. Ensuring that the Renstra includes conservation-focused key performance indicators for species protection, as well as protected area management targets, habitat preservation targets, targets for establishment of KEEs, and targets for reduced social conflicts within conservation areas, is critical to establish the foundation and legal basis for improving conservation area management. In light of this, BIJAK worked closely with KSDAE to review successes and challenges to implementing the previous Renstra and provided expertise to develop conservation-focused key performance indicators, directly engaging each directorate under KSDAE. The project also helped draft a new section on the integration of conservation area programming with provincial-, district-, and village-level planning. Programming for conservation areas included planning to reach the target of handling 1.8 million hectares of tenurial conflicts in conservation areas.

Also with the Forestry Planning directorate general, BIJAK supported efforts to draft a Government Regulation on Planning of Environmental Management and Protection. The project’s value added was to inform the draft with analysis of preventing environmental impacts from commercial activities and establishing targets for the “carrying capacity” or level of activity/development a parcel of land can support and the ability of that land to absorb industrial pollutants to ensure sustainable land use. When enacted, the regulation served as a reference in the preparation of the National Mid-term Development Plan (RPJMN), a key national economic planning document that guides government

programming and underpins the preparation of provincial-/district-level Regional Mid-term Development Plans.

Establishing Conservation Forest Management Units (FMUs). The FMU approach has been the central pillar of Indonesia's forestry sector reform for nearly two decades, established under the Forestry Law. FMUs are intended as an on-site management entity, responsible for maintaining forest services and implementing sustainable forest management. There are three types of FMUs recognized under the law, including Conservation FMUs (KPHKs). BIJAK supported KLHK to develop a ministerial regulation to overlay the KPHK structure and synchronize it with the existing structure for managing conservation areas, establishing FMU design elements and resolving jurisdictional questions (e.g., management of forests under the supervision of local government), and putting in place technical guidelines for central and local governments to establish KPHKs in their respective regions. The regulation ensures that management responsibilities are well defined, and actions are coordinated among actors with jurisdiction within a landscape. For example, a landscape currently fragmented by a variety of land use designations and management authorities will be unified under a single FMU, allowing for more nuanced habitat protection.

Social Forestry. While the administration of President Widodo adopted social forestry as a priority to improve the ability of local forest-dependent communities to manage state forest areas, a key challenge for implementation was a lack of integration with other government programs in the forestry and village development sectors. BIJAK worked to address key elements for integration, which included devising a work plan and monitoring framework for 50 pilot projects to integrate social forestry and village development under a collaboration between KLHK and the Ministry of Villages. This was accompanied by draft guidelines and an implementation strategy for integrating social forestry with FMU and village development and recommendations for multi-stakeholder planning and oversight of projects by local and provincial governments and FMUs.

Land Use Policy. In 2015, President Widodo launched a moratorium on new land-use permits and an initiative to improve the governance of primary forest and peatland, and reduce the regular resurgence of forest fires from land clearance. However, detailed analysis indicated that the policy was ineffective in reducing permits and land clearance. BIJAK stepped in to review implementation of the current moratorium, identify factors contributing to its ineffectiveness, and examine the delays in enacting a more permanent regulation to extend the moratorium. This work culminated in a policy paper pressing for the government to: implement a moratorium for new palm oil plantation permits through a presidential regulation; improve the governance of palm oil plantations in Indonesia, including establishment of an independent team involving the Corruption Eradication Commission (KPK) to audit permits and recommend permit withdrawal or reductions in cases of violations; and strengthen the oil palm plantation regulatory framework, including planting and replanting practices.

Conservation Law. The national Conservation Law No. 5 serves as the legal foundation for conservation area management in Indonesia. However, the 1990 legal framework is no longer effective in addressing current threats and challenges in conservation area management, factors that have been further complicated by unclear lines of authority between the central government and local governments. BIJAK provided expert analysis and help in drafting one of several revisions of the law with substantial input on species protection, including non-native species, conservation area management, conservation financing, partnership with communities, and institutional authorities. As the political economies around revision of the law shifted, BIJAK provided subsequent inputs for integration of gender issues in the law.

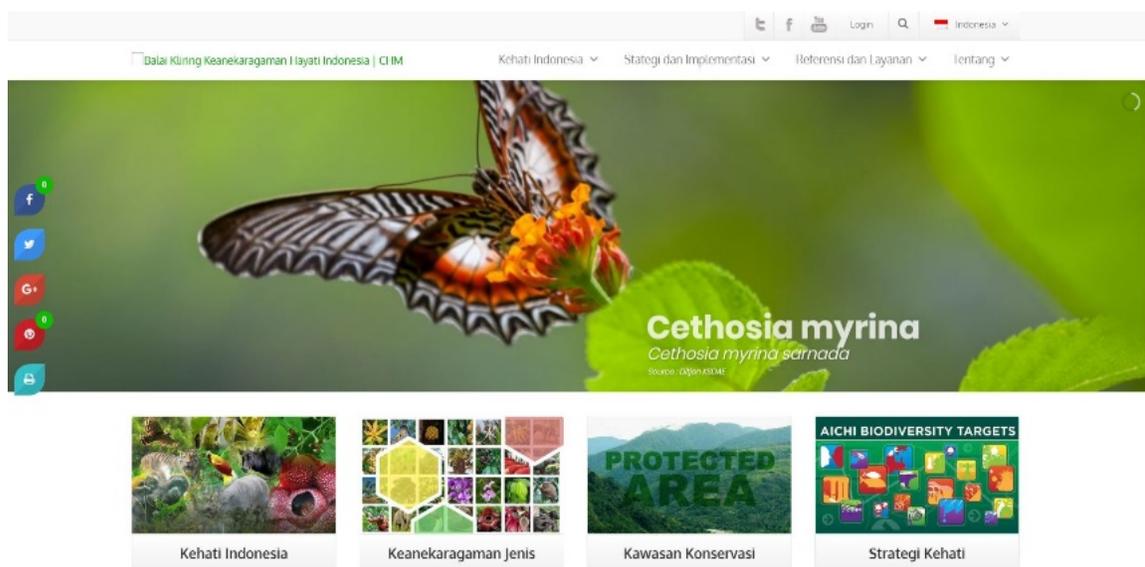


Figure 4. The on-line Biodiversity Clearing House Mechanism provides government officials, experts, and researchers around Indonesia with key information on the status and trends in species and their habitats.

Biodiversity Information Clearing House. Indonesia has been a member of the international Convention on Biological Diversity (CBD) since 2004. One of the mandates for member states is to develop a national-level biodiversity information system, also known as “clearing house mechanism” (CHM), in part to monitor progress toward CBD targets. Beyond simply meeting international convention requirements, the CHM is a valuable tool for centralizing conservation data, allowing government institutions, experts, and the general public access information on wildlife, ecosystems, and threats to biodiversity. The GOI’s effort to set up a clearing house was initiated by KLHK, non-governmental organizations (NGOs), and various institutions, but it was never completed. With a new working group established in 2015, BIJAK was enlisted by KLHK’s directorate of Nature Conservation Planning and Information (PIKA) to provide technical leadership in capacity building and development of the system and aggregation of data on wildlife, ecosystems, and threats to biodiversity. BIJAK helped PIKA complete the initial version of the CHM, which is now accessible to the public (<http://balaikliringkehati.menlhk.go.id>) and which received a Gold Award for the quality of the effort by the CBD Secretariat. KSDAE also adopted BIJAK’s recommendation to establish a CHM working group and

hire a full-time, interministerial data manager tasked with coordinating data collection from all involved ministries.

Furthering sustainable oil palm initiatives. In its initial stages, BIJAK focused on bringing about improvements in land-based business practices through improvements to policy and regulatory frameworks for low-carbon and conservation-oriented business practices. This included support for independent monitoring of both business practices and government oversight, as well as efforts to encourage private sector input in order to strengthen policy reform initiatives and the adoption of sustainable business practices. The focus was on supporting GOI efforts to strengthen the Indonesia Sustainable Palm Oil (ISPO) framework, including input to a new Presidential Decree (Perpres) and parallel support to CSO partners to develop policy papers on critical issues, including protections for indigenous peoples; gender; and conversion of primary forest, high conservation value (HCV) areas, high carbon stock (HCS) areas, and peatland. These policy papers also helped expand ISPO's original seven stated principles to incorporate two additional principles, transparency and traceability, and human rights.

With the draft Perpres, BIJAK helped organize regional public consultations that generated genuine public input on the new policy. BIJAK support was crucial to cultivating buy-in among smallholder associations, a key constituency that controls vast swaths of palm oil production, and whose inclusion under the new ISPO framework marks a sea change in industry practices. Given that the new ISPO framework provides new opportunities for village government engagement, BIJAK developed policy recommendations to align ISPO certification with village development policy, outlining steps by which village institutions could play a greater role in sustainable palm oil certification mechanisms.

Finally, BIJAK provided technical expertise to the KPK's Coordination and Supervision Mechanism on Palm Oil, an interministerial task force to eradicate corruption in the palm oil sector. BIJAK's experts helped develop a monitoring report of deforestation by palm oil plantations; recommendations from the report were used to inform recommendations for improving the Ministry of Agriculture's procedures for issuing plantation registrations. BIJAK also produced a report on palm oil development, which focused on trends in land-use change and environmental policy in the palm oil industry, serving as an important baseline report for policymaker follow-up on issues including: issuance of oil palm plantation permits inside forest areas, especially in conservation areas; rates of natural forest conversion for oil palm plantation; operation of oil palm plantations on peatland; and strengthening monitoring and law enforcement of illegal oil palm plantations.

CONSERVATION AREA GOVERNANCE AND MANAGEMENT

Structuring Parks for Sustainability

Effective conservation area management is often constrained by the lack of available funding and restrictions on national parks collecting, retaining, and managing revenue generated by visitor fees and ecotourism. While a government decree is in place

allowing national parks to apply for status as a Public Services Agency (BLU), which would permit them greater autonomy and the ability to tap additional funding streams, subsequent revisions of the regulations posed challenges for national parks to navigate the regulatory requirements to be established as BLUs. To address this, BIJAK engaged a research partner, Pusat Telaah dan Informasi Regional (PATTIRO), to identify best practices and make policy recommendations aimed at addressing constraints faced by national parks in obtaining BLU status. PATTIRO's work included analyzing the current regulations, complemented by in-depth discussions with high performing national parks interested in applying for BLU status. The study found that there are at least 17 regulations that directly relate to applying for BLU status, deterring parks from applying for this status on their own.



Figure 5. Head of Tahura Nuraksa leads discussion during evaluation of management effectiveness for the park. (Photo: Tahura Nuraksa)

PATTIRO's findings recommended the BLU approach for national parks, with enhanced revenue collection supporting improved protection of conservation areas against threats such as forest fires, wildlife poaching, and illegal logging, and improved coordination between conservation areas and the communities surrounding them. Findings also included how parks can benefit from becoming BLU, how they can meet the BLU technical and administrative requirements, guidance on how to design BLUs using a landscape and a multi-stakeholder approach, and a roadmap for how national parks can become BLUs. A key finding from subsequent discussions was the need to develop Minimum Service Standards (SPM) for BLUs. A KSDAE-led team subsequently began assessing the feasibility and conservation costs and benefits of establishing Komodo

National Park as a BLU and developing a roadmap for the Komodo National Park BLU process.

Capacity for Monitoring Park Management Effectiveness

The Management Effectiveness Tracking Tool (METT), widely used internationally, has been adopted by KLHK to support its management of conservation areas. In 2015 and 2016, the government used the METT approach to assess the effectiveness of the management of 283 out of Indonesia's 556 conservation areas. KSDAE's Conservation Areas directorate requested BIJAK support for capacity building to continue assessing the remaining conservation areas and to sustain the approach beyond that. BIJAK led two trainings: a refresher training for facilitators and a training for national parks and conservation areas in Eastern Indonesia. After the trainings, the site managers began to use the tool to assess their respective conservation areas, drawing on support from the more experienced facilitators, local NGOs, and USAID LESTARI at the sites where that project worked.

Resort-Based Management (RBM) for Conservation Areas

RBM is a form of conservation area management that devolves operational management of the areas to the smallest administrative units within the parks, known as resorts. RBM places limited staff resources on the ground in priority areas and puts them in closer contact and cooperation with local communities. A national workshop supported by the project to take stock and strengthen RBM implementation captured best practices in RBM implementation across Indonesia, including in LESTARI landscapes, and highlighted the great potential the approach holds. It also concluded that there is a sufficient regulatory framework to allow for RBM implementation, and that the major constraint to doing so is the lack of practical experience with conservation area managers.

BIJAK supported the RBM knowledge gap by formally documenting the best practices drawn from conservation areas that successfully implemented the approach, to serve as guidelines to implement RBM. Different management themes were highlighted: thematic, with managers assigned based on technical specialization (wildlife expert, forest fire expert, ecosystem restoration expert); typology, based on assessment of each resort's potential (protection from encroachment, ecotourism, research, forest restoration); research, where local research initiatives inform management; co-management, with a goal of sustainable forest management and improved community welfare; and conservation partnerships that can promote conservation education, local empowerment, and ecosystem recovery.

ENHANCED MANAGEMENT OF THE FOREST ESTATE

FMUs play a crucial role as front-line entities in the management of Indonesia's state forest areas and are aligned with the three forest types under the law—protection, production, and conservation. Since 2010, the GOI has invested in the development of FMUs as the most viable strategy for achieving the country's twin forest management goals: sustainable forest resources and public prosperity. However, FMUs face several

challenges, such as quality and quantity of human resources; limited budget; and changes of regulation, particularly the transfer of management authority from the district level to the provincial level. BIJAK's work focused in two broad areas: review and strengthening of FMU performance, and enhancement and consolidation of FMU data and information.

FMU Review and Impact Evaluation to Inform Government Planning

Following a national FMU workshop and LESTARI's assessment of FMUs in its sites, BIJAK was asked by KLHK and the National Development Planning Agency (Bappenas) to conduct an inventory of FMUs and their operational status, together with an evaluation of the economic, social, and environmental impacts since 2010 of two types of FMUs, those for production forests and those for protection forests. Findings of this effort included that the FMU management approach had a measurable impact on the number of forest fire hotspots; the effectiveness of FMUs in preventing forest fires was linked positively to budget allocations; and the FMU approach, as implemented to date, had not had a significant, measurable impact on increasing forest cover. The findings informed areas for BIJAK support as well as Bappenas' development of RPJMN 2020 – 2024.

Enhanced Programming, Performance, and Organization

BIJAK was also requested by KLHK to review the FMU programming and budgeting process implemented for the 2015 – 2018 period, in collaboration with the US Forest Service (USFS), which had supported a great deal of work in this area. The review found that FMU programming and budgeting performance is only measured in terms of budget spending, and not by how well the program achieved desired outcomes. It was noted that measuring impact is complex, as each FMU can include multiple forest uses, including conservation, protection, and production.

Based on the evaluation findings, developing FMU performance criteria and indicators, as well as FMU programming and budgeting guidelines, was very strategic to achieve desired forest function outcomes in each FMU. BIJAK worked to improve FMU performance indicators that would serve as the foundation for developing FMU programming and budgeting guidelines, and that would be used by FMU managers to measure their progress in achieving the outcomes included in the RPJMN. BIJAK experts developed 10 new FMU performance indicators, tied to FMU area designation, FMU institutional structure, human resources, infrastructure, financial management, FMU forest management plan, FMU business plan, forest product utilization, forest protection and biodiversity conservation, and community empowerment. This led to a ministerial regulation to harmonize FMU performance criteria and indicators, with guidelines to define standards of forest area management performance effectiveness, and to assess effectiveness of forest area management.

Bappenas and BIJAK then developed FMU programming and budgeting guidelines to be used by all three types of FMUs. They cover the current FMU programming and budgeting process; guidance for developing FMU programming and budgeting to support

multi-use forest management; and guidance for Bappenas and the Ministry of Finance to review FMU programming and budgeting activities under central government authority. Support included guidance for Bappenas and the Ministry of Finance to review FMU programming and budgeting activities, which will be used by the GOI to develop annual FMU activity plans and to request budget allocations, in order to achieve the indicator targets.

Following BIJAK and LESTARI discussions with KLHK about improving FMU performance, BIJAK made a recommendation that all FMUs be organized under the management of a single new directorate general of FMU Operations. It also recommended restructuring the administration of forest management under seven directorates general.

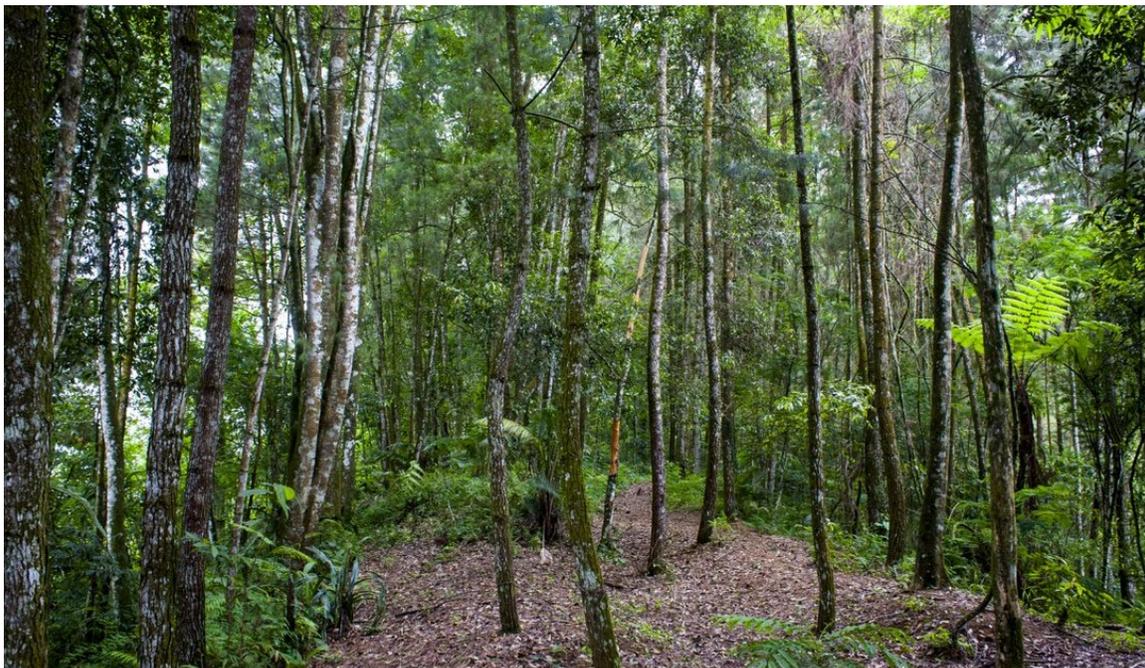


Figure 6. KLHK is shifting to multiple-use forest management to generate optimum benefits for people, the economy, and the environment. (Photo: BIJAK)

FMU Role in Multiple-Use Forest Management

To promote better land use governance, BIJAK supported the GOI's effort to shift from designating forests as either protected or production areas toward models based on multiple-use forests to generate benefits for citizens, the economy, and the environment. With USFS and LESTARI, the project worked closely with Bappenas and KLHK to re-invigorate FMUs as the government institution charged with managing and promoting multiple uses of forests. BIJAK collaborated with a USFS-led working group on forest management, providing technical assistance to review and revise technical guidelines using the Forest and Environmental Research, Development, and Innovation Agency (FOERDIA) Multiple-Use Forest Planning Toolkit, developed with USFS support, on forest planning and workforce development as a key input. The improved guidelines will assist FMUs to effectively collaborate with local communities and other stakeholders

in forest planning and management, in line with current social forestry initiatives. BIJAK, LESTARI and USFS conducted trials with the multiple use forest planning toolkits in several FMUs and used the lessons learned from the trials as references to improve FMU regulations.

BIJAK also worked with USFS to help revise the regulation and technical guidelines on Developing FMU Forest Planning. This included giving FMU managers greater authority to issue concessions and social forestry permits and assigning them the responsibility for developing FMU forest plans. The planning effort was enhanced to integrate climate change mitigation measures, and specific responsibilities, such as conducting forest inventories, was devolved from the central to provincial governments. FMU forest plan development and implementation was to be governed by the revised ministerial regulation.

FMU Data and Information for Management

Among their many roles and responsibilities, FMUs are charged with updating data and information on forest area boundaries, spatial planning changes, and forest gazettement. BIJAK helped improve effectiveness in this area by supporting the Forest Planning directorate general to develop a regulation for the FMU Spatial and Documentation Information System, providing a legal basis to consolidate FMU data and information on concessions, current land use, and functional zoning designations. This can help, through the government's One Map policy, to serve as a spatial reference for the identification, and eventual resolution, of competing forestry tenure claims. The regulation stipulated FMU data and documentation requirements, roles and responsibilities and procedures for data and information flows, and applications and infrastructure for FMU data systems.

PROTECTING AT-RISK ESSENTIAL ECOSYSTEM AREAS

Lands located outside conservation areas can fall within several categories critically important for ecosystem function and biodiversity value, including wildlife corridors, HCV areas, HCS areas, wetlands, and areas that are essential for the preservation of endemic species and watersheds. They can be located within the existing government-managed forest land (termed the forest estate) or outside of it. In some cases, these other areas may have forested land but are termed “non-forest lands,” or APL, and are less regulated and hence vulnerable to conversion to uses such as agriculture. The government classifies areas with a conservation function that are located outside conservation areas KEEs. To date, KEE management has been voluntary and has lacked the regulatory framework to mandate protecting them and ensuring the necessary budget allocations to do so. BIJAK worked with the Directorate of Management of Essential Ecosystems (BPEE), a new directorate under KLHK, to provide guidance to improve the regulation governing the management and monitoring of KEEs.

Defining the Full Scope of KEEs

As a starting point, it was important to have baseline data on the magnitude of the KEE area, so BIJAK worked with BPEE to complete an indicative map of potential KEE areas divided into four typologies: wetlands, HCV and HCS areas, wildlife corridors, and biodiversity parks. The total indicative KEE area is estimated to be 77,136,951 hectares, which is highly significant for the government's management. BIJAK and BPEE then finalized technical guidelines for producing local KEE maps to ensure that district and provincial government KEE maps are verified and can be readily integrated into the national maps. Under the RPJMN 2020 – 2024, the government targets protecting 43 million hectares of the 77.1 million hectares of indicative KEE area, establishing 45 new KEE areas, within the five-year period. BIJAK worked with BPEE to develop technical criteria for ranking potential KEEs, identifying eight priority areas that will be designated as KEEs in 2020, contributing to the five-year target.

KEE Policy, Guidelines, and Capacity

BIJAK worked with BPEE, in coordination with its efforts to develop an overarching KEE regulation, to develop technical guidelines on identifying, managing, and monitoring areas of HCV and HCS in KEE areas. The project collaborated with various partners on all aspects of the technical guidelines, including issues concerning biodiversity, environmental services, social and cultural issues, and concerns involving HCS. The project then piloted these with private sector companies with such areas within their palm oil plantations and logging concessions. The guidelines were integrated into a KSDAE regulation that established the authority of BPEE to collect KEE assessments and reporting by the private sector, in cases where land under their management includes KEEs. BIJAK also worked to improve protection of KEEs by improving the transparency and governance of the land permitting system through a new online procedure. This meant that key forestry permits (forest release for palm oil, borrow-use for mining, social forestry permits, and permit for timber use from natural or plantation forest, and others) have more transparency to help ensure permits are issued to businesses that do not threaten primary forest or HCV areas, and are in compliance with government spatial planning.

With the new framework for KEE management, BIJAK supported BPEE to ensure capacity existed to ensure proper KEE management. The project helped conduct a gap analysis and needs assessments to inform the development of a curriculum, personnel standard competencies, and training modules for KEE management that addressed topics including: KEE planning and management, evidence-based decision-making, multi-stakeholder participation, using technology for KEE management, and monitoring and evaluation. A specific challenge in identifying, managing, and monitoring KEEs was that geospatial data was not standardized and BPEE staff did not possess capacity for using geographical information systems (GIS) for KEE management. To address these challenges, BIJAK worked with BPEE to build the capacity of staff to develop and manage geospatial data for KEEs, including HCV and HCS, as the foundation for their work in developing policies related to KEE and monitoring their implementation. The effort included a series of trainings on the use of GIS and satellite imagery to identify potential KEE areas. BIJAK and BPEE also developed specifications of qualifications and

competencies for KEE, for eventual integration into the Indonesian National Qualification Framework. Competencies for KEEs will address the identification, managing, monitoring, and auditing of KEEs. Improving the capacity for spatial data management also included development of an indicative map of KEE areas as a baseline for KEE area designation.

The concept of establishing KEEs to protect biodiversity outside of conservation areas involving diverse stakeholders is relatively new, introduced in 2010. BPEE was created for KEE management in 2016. Given this recent history, KEE management needed to be integrated into KSDAE's Renstra in order to set specific targets for KEE protection as well as to ensure that budget allocations are made to support KEE protection activities. Adjustments also had to be made to the RPJMN to allow for interministerial coordination in planning and implementing KEE protection. For this, BIJAK helped KLHK use data from the KEE indicative map to identify 43 million hectares for potential KEE designation over the next five years. BIJAK then worked with KSDAE to develop annual targets for BPEE to analyze and ground truth. The project also provided analysis of potential financing options to KLHK for them to work with provincial governments on budget allocations for KEE management.

KEE Management in Action

With guidelines in place, BIJAK helped KSDAE roll out the new framework with pilots for KEE management at the site level. The first was led by the local NGO ARuPA



Figure 7. ARuPA GIS team presents results from biodiversity inventory and mapping activities at KEE Pantai Taman Kili Kili. (Photo: ARuPA)

(Volunteer Alliance for Saving Nature), a BIJAK grantee. ARuPA worked closely with the existing multi-stakeholder KEE management forum at the selected wetland site in Teluk Pangpang, Banyuwangi District, East Java to create a KEE map and zoning/blocking as the basis for the management plan that was tailored to the biodiversity identified in each block, with the goals of preserving ecosystem functions while allowing some level of sustainable utilization by local stakeholders. ARuPA also helped restructure the management forum and define the roles and responsibilities of stakeholders, develop protocols for monitoring and evaluation to measure the impact of the KEE, and identify options for financing support. ARuPA then supported pilots at three other KEE sites targeting mangroves, sea-turtle conservation, and a wildlife corridor. Pilots strengthened KEE management overall, the management plan, and capacity of the management forum. Planning was grounded in key analyses, including the social use and significance of the KEEs, institutional needs for more effective management, and mapping and blocking (zonation) of the KEE areas.

Building broader capacity for KEE management in the pilot area of East Java, BIJAK and ARuPA worked with the provincial level forest agency, introducing and building capacity using the technique of spatial multi-criteria analysis to inventory high biodiversity areas outside conservation areas at 17 different sites in East Java, toward their annual target for mapping KEE areas.

REDUCING ENCROACHMENT AND RESOLVING TENURIAL CONFLICT

Encroachment on forests and other habitats is a major threat to Indonesia's natural assets, greatly impacting conservation areas and forested areas across the country. It can result from tenurial conflicts/encroachments related to settlement; agricultural use, including plantations; customary claims; boundary conflicts with other parties (local government and concessionaires); illegal mining; illegal logging; and forest fires. BIJAK's focus with KLHK was on defining and planning to address encroachment threats affecting conservation areas, where tens of thousands of hectares of forests are reported to have been encroached upon and illegally converted for various purposes.

Encroachment Typologies and Mapping

Early in the project, KSDAE established a multi-stakeholder task force to manage activities to mitigate deforestation risks in conservation areas, and formalized BIJAK's official participation in the group. Given the lack of data on the nature and extent of encroachments, the group's first objective was to define and analyze encroachments and then develop recommendations for their resolution based on each typology. BIJAK, together with KSDAE, produced the first typology report from Gunung Leuser National Park, which indicated a particularly complex situation regarding the scale of encroachment, potential conflicts, and tenurial arrangements. This was used as a model for subsequent field assessments at five national parks to analyze specific encroachments.

BIJAK also supported KSDAE to analyze spatial data to produce the first national map of encroachments in Indonesia. The map is used by KSDAE to identify priority action areas

and measure its performance in resolving encroachments. BIJAK helped KSDAE to develop a methodology for analyzing spatial data related to encroachment, and to map landcover types, suspected encroached areas, distribution of tenurial conflict areas, degraded land, and potential conservation partnership development areas. The final methodology included ecosystem services and conservation area biodiversity vulnerability values as well as socioeconomic variables, such as whether a community has a significant population of refugees or migrants, or is registered with the Ancestral Domain Registration Agency for *adat* (indigenous) communities. The analysis identified 1.8 million hectares of opened areas inside conservation areas, an indication of the possible scale of encroachments across the country. This figure was approved by KSDAE as the baseline that underpinned development of new technical guidelines and training modules for spatial data analysis and tenurial conflict handling, and against which KSDAE measures its progress in resolving cases of encroachment. With this baseline data, KSDAE and BIJAK developed more than 200 indicative encroachment maps, where most encroachments are the result of customary land claims, illegal mining, and small-scale plantations. KSDAE used the maps to select 100,000 hectares in 56 priority conservation areas for encroachment handling over the next five years and set a target of handling 15,600 hectares of encroached areas in the subsequent year. Site staff were also trained to ground truth indicative maps and continue the mapping in the future.



Figure 8. Head of Tahura Nuraksa, Ms. Samsyiah, and forest rangers monitor illegal human activities, such as encroachment and forest burning, inside the protection block. (Photo: Tahura Nuraksa)

Polices, Guidelines, and Capacity Building

Collecting sufficient encroachment data is the beginning of a process to resolve conservation area encroachment issues. Conservation area managers did not have clear guidelines on how to address the encroachments, from both a practical and legal standpoint. With a wide range of encroachment types, many potential resolution options, and an overall lack of clarity regarding the central government's role,

conservation area managers tended to default to inaction. Given this, BIJAK used prioritization assessments and encroachment typologies to develop standard operational guidelines and supporting regulations for conservation area managers to address encroachments in conservation areas. The guidelines provide steps for assessing tenurial conflicts, explain the different typologies of conflict, and offer suggested handling mechanisms for each; define the authorities and responsibilities of KLHK units in handling the process; and detail the process of developing an action plan for handling conflict. The regulation requires sites to report and monitor their progress on handling encroachments/tenurial conflict using the new integrated management information system (MIS) developed for KLHK with BIJAK support (see below).

To ensure that the site staff tasked with evaluating and handling cases of encroachment have the skills to do so, BIJAK and KSDAE developed a training curriculum and standard personnel competencies on tenurial conflict handling to equip staff with the knowledge and skills to assess and handle conflicts, and to report on them according to the technical guidelines. The trainings called for participants to develop action plans for conflict handling to be implemented over the next 12-month period; the action plans were accompanied by a mandate from the national government for the sites to allocate budget to implement the action plans and report on progress through the enhanced MIS system. The training curriculum was formally adopted into KLHK's course catalogue.

To ensure that conservation areas had the budget resources they needed to handle encroachments and tenurial conflicts, BIJAK worked with KSDAE to include encroachment/tenurial conflict handling as a priority in the 2020 – 2024 Renstra. In addition, BIJAK provided technical assistance to develop program performance indicators for KLHK in encroachment handling.

Turning Capacity into Practice with Encroachment Pilots

Following the development of technical guidelines for encroachment/tenurial conflict handling and training and mentoring sessions, BIJAK supported KLHK to pilot the applicability of the guidelines to ensure personnel could carry out encroachment/tenurial conflict handling in their areas. BIJAK worked with KSDAE to identify several conservation areas to pilot improved conservation area management using the policies, tools, and guidelines developed with project support. Under a grant to the local NGO LATIN (Indonesian Institute of Tropical Nature), BIJAK piloted encroachment/tenurial conflict handling through conservation partnerships and participatory rezoning, supported by enhanced data now available through the improved MIS, working in several national parks. To launch these pilots, BIJAK, LATIN, and KSDAE mentored site personnel through the process of reviewing and finalizing their encroachment/tenurial conflict handling assessments, finalizing action plans and budgets for encroachment handling, and integrating the plans into their annual work plans. See below for more on conservation partnerships. With pilots underway, BIJAK helped KLHK capture lessons learned to inform any revisions to the encroachment and tenurial conflict handling guidelines.

ZONATION FOR BETTER MANAGEMENT

Zoning for conservation areas (including blocking, as it is termed for non-national parks in Indonesia) is a legal requirement and fundamental management tool for conservation areas, delimiting areas with uses ranging from strict protection to buffers and multiple-use scenarios. This in turn affects management plans, resource allocations, and roles and responsibilities of the government and any local partners in co-management. To enhance conservation area management, BIJAK supported KLHK in this important area. Mapping was a major initial focus supporting KLHK PIKA in their role in developing geospatial information for conservation areas and focused on producing updated zoning, and associated maps, for all 552 conservation areas (including 54 national parks) in the country. Maps were integrated into the national One Map system that houses consistent land use, land tenure, and other spatial data and products for management and decision-making across government entities. The project provided hands-on GIS expertise to clear the immense backlog of analysis and mapping and the constraint this posed to effective management.

Initial mapping efforts revealed a need to move further into the zonation process as incomplete and conflicting information came to light, calling for the project team to tap site-level knowledge to resolve zoning conflicts. BIJAK also drew on LESTARI's site-level experience to introduce participatory zonation, incorporating needs and knowledge of communities in and adjacent to conservation areas to define realistic and locally owned zonation configurations, while addressing potential land conflicts. To inform this and future work, BIJAK devised updated technical guidelines as well as an enhanced framework for multi-stakeholder input and review, including participatory zonation with communities. Information from this served as the basis for initial zonation at two new national parks, Gandang Dewata and Gunung Maras. At the same time, the project provided technical training to build staff capacity.

The zoning maps are now the foundation for developing and implementing management plans and validating and managing encroachments. More than 30 conservation area managers have already updated management plans with the updated maps. The technical guidelines were integrated into a training curriculum, adopted by KLHK's Center for Education and Forestry Training (Pusdiklat), and now serve as the official training tool for zoning and blocking practices going forward. BIJAK's documentation of lessons learned and best practices was published in *Adaptive Spaces: Reflections on Zoning and Blocking Arrangements in Conservation Areas*, distributed to both government and civil society members.



Figure 9. Using zoning map for management planning discussions at Sebangau National Park. (Photo: BIJAK)

To pilot the technical guidelines and the participatory zonation approach, BIJAK and LATIN worked with the Sebangau National Park and a local village on the participatory rezoning of 490 hectares to address a longstanding tenurial conflict within the conservation area. BIJAK captured lessons learned from this and other conservation areas to enhance the guidelines and inform future roll-out of the new approaches. Zonation and BIJAK’s support served a critical role in other conservation partnerships to resolve encroachment/land tenure conflicts at sites, as well as in zonation and management of KEE areas, as described below.

INTRODUCING CONSERVATION PARTNERSHIPS FOR CO-MANAGEMENT

Conservation partnerships in Indonesia are a way for the government to actively engage communities in conservation area management. BIJAK began with supporting the regulatory framework and then helped KSDAE launch this co-management approach nationally, in the context of several other critical support areas, establishing conservation partnerships for: encroachment handling and tenurial conflict; zoning and blocking, including participatory zonation; and protection of the helmeted hornbill. Prior to BIJAK support, this important multi-stakeholder engagement approach was little used. During the life of the project, BIJAK capitalized on a key champion, the Director General of KSDAE, who considered it a priority to develop partnerships and multi-stakeholder involvement for effective conservation area management. Much of this work was supported by a BIJAK grant to local NGO LATIN.

Formalizing Conservation Partnerships

The project provided technical expertise to finalize the directorate general regulation for conservation partnerships, including implementation guidelines. BIJAK specifically

focused on strengthening the roles of the community, including customary and village government, in conservation area management and establishing true multi-stakeholder engagement to achieve conservation partnership objectives. The intent was to bring together community groups, customary communities, village governments, local governments, NGOs, academia, and the private sector to forge a unified approach to sustainable use of conservation areas. The regulation defines shared costs, roles, and responsibilities in managing and protecting conservation areas against threats such as agricultural encroachment, illegal logging, and poaching. It gives stakeholders the legal basis for co-management arrangements to be adopted as formal conservation partnerships, providing conservation area managers with a pathway to increase local and indigenous community participation in conservation.

As formalizing community use of sensitive conservation area lands carried with it potential risks and rewards, BIJAK tapped LATIN to map out challenges KSDAE faces with conservation partnership schemes. The analysis captured successes, lessons learned, and best practices from partnerships in 12 locations. It showed that there needed to be a shift in the perspective of many park managers and staff to view local communities as potential partners, and not as adversaries. Improving staff capacity to communicate and engage with communities more effectively would help address this. Clearly articulating the benefits of the conservation partnership approach would encourage park managers to access potential funding sources from district and village governments that can be optimized to support conservation partnerships. This in turn formed the basis of an awareness campaign to encourage commitment across KSDAE and other government stakeholders to the concept of community empowerment in the conservation partnership framework. The LATIN analysis also informed recommendations to strengthen the conservation partnerships regulation based on experience in the field.

To build government capacity, LATIN developed a module for KSDAE to use to train park managers on how to design and manage conservation partnerships and field-tested it at Meru Betiri National Park. The module covered how to plan, structure, and implement a conservation partnership; how to manage collaborations and conflicts; how to conduct monitoring and evaluation; and how to ensure gender and social inclusion across all processes. Following on from the training, LATIN worked with BIJAK specialists to mentor three parks — Meru Betiri, Gunung Halimun Salak, and Gunung Tambora — to develop conservation partnership plans, involving local communities in the planning. The plans included the goals and objectives of each proposed conservation partnership, implementation strategy, any anticipated challenges, stakeholder mapping, roles in partnership implementation, and an action plan to achieve partnership targets over the next five years.

To guide government action and roll-out of the regulation, KLHK and BIJAK developed the first indicative map of potential conservation partnership areas across Indonesia. The map identified a total of 3,452,172 hectares of potential partnership areas. This spatial data was designed to be uploaded for decision-makers and used as a baseline in monitoring the progress of conservation partnership development.

Launching New Conservation Partnerships

LATIN subsequently led BIJAK's effort to pilot enhanced conservation partnerships linked to the new regulation and in synergy with BIJAK's overall efforts to reduce encroachment and tenurial conflicts in conservation areas. This work also included activities to work with parks to prioritize key data for decision-making that should be included in KSDAE's Conservation Data Information System (SIDAK) for site-level conservation activities as well as to monitor the progress of tenurial conflict handling. LATIN supported piloting conservation partnerships in Bukit Baka Bukit Raya (BBBR), Meru Betiri, and Gunung Rinjani National Parks.

Each conservation partnership effort had its unique features to involve communities in co-management and inform further roll-out of the regulation. In Meru Betiri, local farmers groups were interested in participating in a "rehabilitation" partnership. Under this partnership, participating communities are mentored by park staff to carry out activities in a designated rehabilitation zone, including nursery development to produce seedlings of endemic forest trees and reforestation with the seedlings produced. It also involves bringing 50 hectares of land under agroforestry management, where the community will be allowed to plant high economic-value trees, such as durian, jackfruit, and candlenut trees. In one case, the farmers group needed to obtain legal recognition first, which was granted by a decree signed by the head of the village. In Gunung Rinjani National Park, the partnership was to protect the area from further environmental degradation while providing farmers from an adjacent village with a new way to generate income. Under the conservation partnership, farmers group members worked closely with national park staff to develop a nursery for fruit trees to sell and forest tree seedlings to reforest 50 hectares. A key area for this work was ensuring a clear division of roles and responsibilities between the park and two farmers groups, and specifics of monitoring and evaluation activities. At the BBBR National Park, work began with an analysis of the tenurial conflict involving a local village with jurisdiction of the Rantau Malam Resort, combined with stakeholder mapping. The focus was a long-standing conflict between the village and the park over a 190-hectare area where community members carry out illegal gold mining, yielding significant income yet posing environmental problems from mercury contamination, landslides, and biodiversity loss. The partnership identified alternatives to small-scale gold mining, such as collecting non-timber forest products and developing community-based tourism. Analysis of the situation included options for handling the illegal mining, including law enforcement, an awareness campaign about the dangers of gold mining to human health and the environment, establishment of community mining areas, and community empowerment. Upon further deliberation, the park and the village decided against developing a conservation partnership, but opted instead to use a community empowerment approach to develop community-based ecotourism activities in the buffer zone of the conservation area to take the pressure off the park itself. The plan called for improving capacity of the community in ecotourism, constructing ecotourism infrastructure, and developing other income-generating activities that could complement ecotourism, such as the collection of culinary and non-timber forest products.

Subsequent support finalized the conservation partnerships for Meru Betiri and Gunung Rinjani National Parks. The first was signed to restore 27 hectares of the national park ecosystem with agroforestry plantation, serving as a model for later partnerships to restore an additional 50 hectares. The second partnership was signed with farmers groups to develop a nursery to reforest 50 hectares with endemic species for agroforestry; this was accompanied by another collaborative effort to restore and protect, with patrolling, an additional 113 hectares. In BBR, the project supported honey cultivation as part of a community empowerment activity plan. BIJAK grantee LATIN also supported new conservation partnerships in two new sites for piloting tenurial conflict handling: Kateri Wildlife Sanctuary and Bantimurung Bulusaraung National Park. The first was designed to rehabilitate 100 hectares with forest and economically valued trees. Under the second, initial rezoning created a rehabilitation area that incorporated the encroachment from agriculture and illegal logging, and a traditional area based on an existing settlement and land ownership documentation.



Figure 10. Defining farmland limits during a focus group discussion for handling tenurial conflict with the conservation partnership at Meru Bitiri National Park. (Photo: LATIN)

ENHANCING DATA FOR DECISION-MAKING

At the start of BIJAK, assessments with KLHK indicated that data related to conservation areas and biodiversity, including information on habitats and primary threats, were scattered across various units under KSDAE, resulting in inconsistent and often out-of-date information. Data collected by conservation areas tended to stay at the landscape level because there was no effective method for sharing data with KSDAE in Jakarta. In response, discussions with KSDAE concluded that integration and

enhancements of existing systems was a crucial need. The KSDAE-managed SIDAK, which integrates data from all KSDAE directorates and conservation areas served as the backbone of the new system.

An Integrated MIS for National and Site Management

Under the integrated system, data could be used by policymakers at the national level and serve as an important tool for national park managers for more informed site-level decisions. To enhance the utility of the information and foster greater use of data for decision-making, KSDAE requested development of a digital situation room and data visualization dashboards (called I-Stri), where SIDAK would be aggregated with other sources for national-level decision-makers. In addition, the integration would make certain data accessible to other government institutions at the regional and national levels — and to the public — and integrate patrol data from conservation areas under platforms such as Spatial Monitoring and Reporting Tool (SMART), as supported by LESTARI at their sites. Part of this effort entailed a cross-learning visit of KSDAE staff to the Philippines to learn about their national forestry and biodiversity protection system called Lawin, as developed by the Chemonics-led USAID project B+WISER. Based on the visit to the Philippines, ministry officials recommended development of an integrated forest and biodiversity protection system that allows for the aggregation of data at the national level, which was aligned closely with the vision of the Director General of KSDAE and BIJAK support to an integrated system that can help decision-makers respond quickly to problems at the field level.

As integration of KSDAE information systems developed, the team worked with KSDAE to define priority information needs. BIJAK also ensured that information needs of other intervention areas were prioritized, including data for enhanced RBM, conservation area zoning and blocking, and tenurial conflict/encroachment handling. BIJAK's effort supported improved database structures to facilitate the broader integration; developing a roadmap for adoption of enhanced information collection and use for conservation; and standard operating procedures (SOPs) for integrated data management, including standards and guidelines on patrolling and other data collection. Key elements were formally adopted as a directorate general regulation. Support included protocols for uploading site-level data to be used with relevant data in the national SIDAK system, including landcover data, encroachment maps, and species data from the Biodiversity CHM that was previously brought online with BIJAK technical assistance.

Data for Decision-Making in the Hands of Park Managers

As an overarching objective of BIJAK was improving conservation area management, ongoing information management system support focused on site-level needs. A workshop of national park managers identified the greatest needs tied to threats in the areas under their management, including tenurial conflicts/encroachments related to settlement, agriculture plantations, customary claims, boundary conflicts with other parties (local government and concessionaires), illegal mining, illegal logging, and forest fires. This included a need for data on status and progress on handling threats, for

example, encroachments through conservation partnerships. During the collaboration with park managers, the team found that park data in SIDAK were often outdated while parks collect data that is not shared with national managers. One reason for this was that under the current system, data encoded into SIDAK by the site managers had to be organized according to the needs of the KSDAE directorate. While this time-consuming approach served the needs of central KSDAE decision-makers, it did not inform decision-making at the conservation area level, and therefore provided little incentive for park staff to provide quality data.

Subsequent activities modified SIDAK and I-Stri to improve data entry specifically to meet site needs for the threats park managers identified. BIJAK helped KSDAE develop new I-Stri sidebars focused on the conservation area threats identified by managers, which included types and severity of threats; specific threat data, including background documents, typology analysis, handling recommendations, progress; and final status of threat handling. These sidebars can be further customized for individual park needs. Fourteen parks selected for piloting the enhancements included those already supported under the project for conservation partnerships addressing encroachment and participatory rezoning, as well as others for threats such as forest fires. The pilots also introduced mobile technology for more efficient data collection in day-to-day work, easing the upload of field data from patrols and other sources to dashboards for decision-making. Checks of park data show that staff now enter data that both uploads to the national-level MIS and is used by the park manager to make decisions, develop action plans, and allocate resources to handle threats.

INNOVATIVE FUNDING AND FINANCING FOR CONSERVATION

Insufficient financing can severely undermine conservation when funds cannot support management needs. At the same time, financial incentives can catalyze greater commitment to conservation and lay a foundation for sustainable use of natural resources. A cornerstone of BIJAK's work is to identify and expand the use of innovative and effective funding and financing strategies to fund and incentivize forest conservation and low emissions development.

Fiscal Transfers to Bring Funding for Site Needs

BIJAK initially completed a report that reviewed funding and financing options for areas with conservation function, including forests, conservation areas, and KEEs. The review covered a range of options, including: GOI fiscal sources, such as taxes derived from natural resource use; non-tax revenue, profit-sharing from forestry sector utilization, specific budget allocations, village funds, green bonds, green *sukuk*, off-treasury funds (through BLU); investments from the private sector, such as biodiversity offsets, private equity, carbon markets, and corporate social responsibility; and hybrid schemes involving GOI and private resources, such as environmental trust funds.

Further discussion with KLHK highlighted ecological fiscal transfers (EFT) as a possible source of sustainable funding, also considering that the most critical funding needs for forest management and biodiversity financing are at the sub-national level due to the

escalation of ecological challenges at the site level. The most viable option identified for addressing these challenges was a fiscal transfer from central to local government based on an ecological approach, hence EFT. An advantage of EFTs is that they provide incentives for local governments to carry out conservation activities for biodiversity, including forest management and improving the welfare of communities around forest areas.

BIJAK analysis with local partner Kemitraan identified two special funds that could be used as a mechanism for EFTs, a village fund and special budget allocation fund. Using the Village Fund (DD) is strategic because funds are directly transferred to and managed by village governments, which are often most familiar with the ecological aspects at the site level. In addition, the village fund scheme is very flexible and can be earmarked for specific climate change and forest conservation activities to improve biodiversity and forest management. They also provide an opportunity to access substantial budget allocations. Special Allocation Funds (DAK) are a well-known financing option for local governments. DAK is a flexible mechanism that allows GOI ministries to earmark funds based on current priorities. DAK funds are transferred directly from the national level to the provinces and districts to implement priority programs, which could be forestry and environmental management activities as defined with conservation managers. Regional Incentive Funds (DID) were also identified to fund conservation activities.

BIJAK completed a policy paper, titled “Designing Ecological Fiscal Transfers in Indonesia using DID, DAK and DD,” to inform decision-making on EFTs with ecology-based indicators and formulas to calculate the fiscal transfers to be used for biodiversity and forest conservation. The policy paper recommended applications for all three mechanisms, DID, DAK, and DD. BIJAK then developed several policy briefs and engaged others working on the EFT issue to educate various stakeholders and advocate for revision of the fiscal transfer regulation allowing for EFTs through DID, DAK, and DD. In parallel, the project collaborated with the Institute for Economic and Social Research of the University of Indonesia to prioritize environmental and disaster risks and develop roadmaps for EFT use in South Sulawesi and North Kalimantan provinces, helping local officials define how to apply for DID, DAK, or DD funds through established mechanisms for sustainable forest management.

Other Financing Options

Payments for environmental services (PES) schemes that are used to value ecosystem services and provide a framework for payments is a tool of growing importance for conservation finance. Under PES schemes, the sustainable use of forests to provide services such as clean air and water and carbon sequestration is supported by payments to maintain those services to parties who conserve and protect them. While some experience existed implementing PES schemes in Indonesia, gaps in the policy framework were one factor limiting the wider adoption of the mechanism. BIJAK provided technical support to KLHK to develop a ministerial regulation on PES for services such as water utilization, carbon sequestration, and ecotourism to further the implementation of the government’s regulation on Environmental Economic

Instruments. To meet the terms of the government regulation, BIJAK’s support emphasized the specific funds transfer mechanisms for non-governmental arrangements, such as private party to community, and detailed the institutional arrangements to manage the PES funds. Ultimately, the draft regulation addresses environmental services identification; approach for environmental services valuation; verification and validation for providers and users of environmental services; development of a PES information system; and roles of PES participants, including the GOI as the regulating authority. At project close, the regulation awaits legal review with other draft regulations to ensure they are synchronized with Indonesia’s new Omnibus Law prior to enactment.

BUILDING CONSTITUENCIES FOR CONSERVATION

Helping the Government Promote Conservation

A primary focus of BIJAK’s communications work with the government was to help them build and expand the country’s national park constituencies. Some of the most profound conservation successes in Indonesia resulted from the actions of strong champions for conservation, both within and outside the government. BIJAK’s support was focused significantly on national parks, reflecting the tremendous natural assets these parks possess, the very real threats to those assets, the great potential to engage the public, and specific ties to LESTARI’s experience at parks. Prior to BIJAK, the government did not have a formal approach to communications, marketing, or branding. They also had limited visibility with journalists, bloggers, and other influencers who could promote Indonesia’s natural assets.



Figure 11. E-poster developed by Teluk Cenderawasih National Park to educate visitors.

To support this need, BIJAK helped KSDAE develop its first communication plan, consisting of a media strategy, a social media and online communication strategy, and a communication strategy on nature conservation, specifically targeting the public for national parks. BIJAK then worked with KSDAE to develop and implement a social marketing campaign to boost national pride in Indonesia’s national parks and encourage volunteerism and advocacy to improve and protect them. To deepen the capacity from

training on plan implementation and piloting at multiple national parks, BIJAK helped KLHK create a social media content plan, a calendar for social media activities, and SOPs for mass media and social media engagement, to be applied across participating directorates. As a result, KLHK's communications and public and media outreach efforts are now synchronized with the work plans of its directorates and coordinated to promote wildlife conservation, forest protection, and essential ecosystem conservation activities as well as strengthen engagement with specific audiences to build support for KLHK's work.

The project also helped to standardize and professionalize national park media and outreach efforts, building a recognizable brand and consistent public messaging to promote conservation values and responsible park use. A main thrust here was on national park websites, which before BIJAK lacked standardization, quality content, and even existence. Standardizing and professionalizing national park websites was an opportunity to promote the parks to a large population and provide visitors with important information, guidelines, and rules for responsible park use. BIJAK's support professionalized this important tool, ensuring consistent quality and resources by centralizing national park microsites under a main KSDAE site. The effort drew on experience and lessons learned from the US Department of Interior in developing US National Park websites. The project provided additional support to 10 conservation areas, mentoring them in rolling out their enhanced communications strategies, which led to enhanced use and effectiveness of Instagram, Facebook, and YouTube platforms by parks, and the conservation area staff seeing the value of collaborating with other parks, the media, and other stakeholders for communications initiatives.

BIJAK supported other initiatives of the government to further their mandates in conservation and wildlife protection, in part increasing transparency of the government as prioritized by the president. The project worked with KLHK's law enforcement unit (Gakkum) on two aspects of its role: educating the public on environmental crimes, law enforcement, and criminal cases; and disseminating the policy and regulations on the environment. With this in mind, BIJAK designed and delivered Gakkum staff training for important communications skills, from creating press releases and videos, to overall improvement of social media and digital literacy skills, including designing social media strategies and using analytical tools for assessing the impact of digital campaigns. These skills were then used to cover issues such as forest fires, wildlife trafficking, and encroachment of conservation areas.

Building the Youth Constituency

BIJAK's support to grow the public constituency for conservation had wide-ranging activities to build this constituency in context: for policy reform, among target groups such as youth, and around priority issues that included supporting national parks, protecting target species, and various timely environmental topics. Project work was also framed by a public perception study designed to guide downstream activities.

A primary target for BIJAK's work in this area were youth, with the recognition that the millennial generation alone, ages 20 to 35, comprise nearly a quarter of Indonesia's population and nearly half of the population is projected to be under 30 by 2030. As a group, they are environmentally and socially aware, tech-savvy, adventurous, and active consumers. Activities centered around social media campaigns and storytelling to raise awareness and drive change at the individual level, public events to bolster individual commitment and build momentum for an environmental youth movement, and promoting conservation leadership in existing environmental groups to develop awareness-raising campaigns and advocacy efforts, both locally and nationally.

The project considered increasing youth awareness and understanding of Indonesian national parks' environmental value, the importance of preserving them, and a better understanding of how visitors can responsibly visit and contribute to their well-being as essential to building a sustainable constituency among youth to support and protect national parks. To accomplish this, BIJAK worked through established youth groups such as Indonesian Young Foresters and Relawan for Life, who were engaged jointly with government officials in awareness-raising activities. Events showcased national parks in person and through remote webinars. One such event provided participants with an "up close and personal" experience of two national parks through a virtual online tour led by national park staff and social influencers, broadcast live on YouTube. Other events featured talk shows with prominent influencers on conservation topics; a webinar on ethical wildlife photography with experts including a National Geographic Indonesia photographer; and panels highlighting the importance of nature conservation for the welfare of local communities and how to responsibly enjoy and protect national parks.

The cornerstone of BIJAK's youth engagement was developing a social media campaign strategy for the overall national park-focused awareness-raising campaign. The strategy outlined three main campaign stages to grow awareness around the topic, recruit and retain supporters, and turn supporters into advocates. Aimed at creating a vibrant community of national park advocates, the campaign was designed to promote a deeper understanding of parks by providing accurate, engaging, and timely content and news about events in the parks, targeting university students as the main audience. One of the main approaches in the strategy involves building a coalition of like-minded organizations who have a strong volunteer base. Doing so allows the campaign to tap into deep subject matter expertise and an existing network of supporters who are already committed to environmental causes.

The campaign, with the commitment of 23 NGOs and CSOs and branded as Youth Love National Parks / Anak Muda Cinta Taman Nasional (AMCTN), launched in late 2020 with an event featuring presentations by young environmental champions, biodiversity warriors, and social media influencers to inspire and influence young people to learn about and support the national parks. Subsequent activities included a blog writing competition with a coaching clinic led by well-known Indonesian bloggers, resulting in 50 blog posts — 57 percent from women — on wildlife conservation, climate change, CSO activities in conservation areas, marine species and ecosystems, and responsible visitation. Following this, BIJAK worked with CSOs to produce and

release vox-pop videos to generate compelling awareness-raising content featuring authentic, unfiltered responses and thoughts from young Indonesians. The videos were released on Facebook, Instagram, Twitter, and YouTube by AMCTN members to shine a spotlight on youth and to spark a conversation on the national parks on social media.



Figure 12. Participants with their cameras at Yayasan KEHATI Biodiversity Warrior birdwatching and photography competition at Bromo Tengger Semeru National Park. (Photo: Photo: Rahmadiyahono Widodo/Biodiversity Warriors Yayasan)

Raising the Public Voice with Policy Communities

BIJAK initiated policy reform work with the concept of policy communities, multi-stakeholder groups supporting inclusive, transparent policy reform and accountable government. The project worked with NGOs and CSOs to help them engage effectively in policy reform initiatives, including revisions to Conservation Law 5 and Forestry Law 41, a new sustainable palm oil regulation, and the national Criminal Code. With project support, these groups developed greater capacity for policy analysis, including promotion of gender equality, and advocacy and public awareness campaigns through social media channels and enhanced digital literacy.

The project worked with policy community groups to build capacity of journalists as crucial voices in conservation awareness raising and behavior change. BIJAK coached journalists to delve deeper into conservation issues, linking the basic science of conservation to ongoing policy issues. Results included better, more complete coverage of a variety of targeted issues: wildlife trade, illegal logging, mining within forest areas, poaching, sustainable economy surrounding conservation areas, and illegal sand mining.

SECTION 3

INCREASING PROTECTION OF SPECIES

BIJAK's efforts to combat illegal and unsustainable wildlife range from enhancing the policy framework for terrestrial as well as marine species, to shifting to more sustainable consumer demand. The policy framework was rolled out through capacity building and awareness raising and then by applying the new requirements to priority species, building full ownership with implementing stakeholders for them to continue the work after the project ended.

GOVERNANCE FOR WILDLIFE PROTECTION

Enhancements to the Legal and Policy Framework

Support for CITES implementation. The Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) framework adheres to sustainable use principles. Its aim is to prevent species extinction by developing export/import regulations that will ensure that the international trade of specimens is sustainable. The listing of species in CITES Appendix II signifies that although the species is not necessarily threatened with extinction, international trade must be controlled to avoid utilization incompatible with its survival. As a party to CITES, the GOI should ensure that trade is not detrimental to the wild population of the traded species, and has an obligation to prove that any species caught or harvested from the wild is obtained legally, and that its origin is traceable. Authority lies with the Directorate of Biodiversity Conservation at KLHK as the CITES Management Authority and the Indonesian Institute of Science (LIPI) as the CITES Scientific Authority. KKP also plays an important role for the protection of marine species. Among recent requirements agreed at international CITES meetings are: developing regulations on specific species protection, defining trade quotas, and law enforcement. Early in the project, BIJAK created a roadmap for CITES implementation, particularly for recent resolutions. BIJAK also provided technical assistance to develop a ministerial decree providing legal protection for 112 shark species within all marine protected areas across Indonesia, a landmark achievement. Other, deeper engagements are further described below.

Indonesia plays a key role in CITES Standing Committee meetings because of its position as the current representative country from Asia. BIJAK provided technical assistance to the Indonesian delegations to participate in various CITES meetings. Project experts assisted the Indonesia delegation to prepare and present on specific species as well as the progress Indonesia was making on its commitments, including shark and rays, helmeted hornbill, elephant ivory, issues on demand reduction and its correlation with wildlife cybercrime, and strengthening coordination and networking between parties. A focus of the presentations was ensuring they are science-based and aligned with the

research and findings of LIPI as the CITES Scientific Authority. Following its decision to establish the Intersessional Sharks and Rays Working Group, Indonesia was commended for taking on the working group chair. BIJAK was then invited to provide technical support to KKP in its role as the chair of the working group. At the national level, BIJAK helped KLHK establish a national taskforce, called the Shark and Rays National Working Group, with the secretariat's headquarters at the KKP office. Indonesia's helmeted hornbill National Conservation Strategy and Action Plan (SRAK) was the first presented to the CITES Secretariat and received a standing ovation for its announcement, followed by a decision that it would serve as a model for other countries' efforts. With technical support from BIJAK, the Indonesian delegation has become a more active participant in CITES meetings overall.

Greater legal protection for more of Indonesia's wildlife. Protection of key species begins with the legal framework and the GOI has made great strides in ensuring species have this protection. Nonetheless, there were gaps, and BIJAK worked closely with KLHK to advocate for the expansion of the list of protected species under the law. KLHK ultimately enacted an expanded list under a ministerial regulation on the List of Protected Species, increasing the number of

protected species by 36 percent to 904. BIJAK contributed 46 species to the list, including such prominent species as the Asian elephant and the Sumatran orangutan. This action, together with expansion of a separate government regulation, was the result of more than two years of BIJAK's intense collaboration with the government and represented some of the most significant pieces of environmental legislation to be enacted in Asia in the last decade, putting Indonesia at the forefront of efforts to halt the illegal trade in wildlife.

Securing this legal protection was only the first step in reducing unsustainable trade. A central part of enforcing wildlife crime is ensuring that officers on the front line can confidently identify protected species and distinguish them from other, seemingly similar species. To support the new regulation, BIJAK developed species identification



Figure 13. Indonesia's helmeted hornbill SRAK, a priority to address continued trafficking, will serve as a model for other countries under CITES. (Photo: Dewantara/WCS)

guidelines for birds, mammals, and herpetofauna that are the most popular traded species in Indonesia. The species guidelines feature images and include methods to identify a species status (protected or not). To implement the guidelines, BIJAK and the government developed a species identification training curriculum, including pre- and post-tests to measure knowledge, for government officials working at entry and exit points. The curriculum was then formally adopted by KLHK's training center, and, due to the COVID-19 pandemic, delivered through its e-learning platform, with enhancements such as videos. As airports were considered priority trafficking hotspots, the training, which included training of trainers, was first rolled out to customs and airport management staff. BIJAK and KLHK have also created a communications platform using WhatsApp to verify species identifications in real time and enhance coordination on cases.



Figure 14. Species identification guidebooks, a key resource for front-line officers in enforcing wildlife crime. (Photo: BIJAK)

Zoonotic disease support as response to the global pandemic. Since 2018, the Ministry of Health, Ministry of Agriculture, and KLHK have worked together under the One Health approach to anticipate and respond to emerging zoonotic diseases, i.e., infectious diseases spread between animals and people. With the emergence and devastating impacts of COVID-19, the ministries increased their efforts to ensure optimal health for people, animals, and the environment. BIJAK supported KLHK by developing SOPs for staff in the field to systematically monitor wildlife populations of four taxa for zoonotic diseases consistent with international best practices and protocols. This effort complemented ongoing USAID investments to provide technical support and coordination for the One Health Approach through another project. The SOPs were developed to provide detailed guidance for use by non-veterinarian field staff for wild populations. In addition to targeting zoonotic diseases, the SOPs were to be used to detect and monitor non-zoonotic diseases that endanger wildlife populations.

The protocols have become immediately relevant given a recent spread of African Swine Fever causing wild boar mortalities in several conservation areas in Sumatra. They are expected to serve as a practical guide that is easy to implement in the field and support

a systematic disease management process. The protocols were socialized, and training was provided for local veterinarians and CSOs.

Toward Improved Utilization and Trade

For aquatic species, BIJAK contributed to the revised regulation on Utilization of Protected Aquatic Species, including provisions on quotas, international trade schemes, and traceability, in part based on the project's work with non-detriment findings (NDFs) and quotas for sharks (see below). The regulation was subsequently enacted and now serves as the legal umbrella for Indonesia to fulfill its commitments for effective utilization and the conservation of aquatic species under CITES. To support its initial implementation, BIJAK helped KKP develop and train staff in the use of SOPs for fish species utilization and transport permits, which functioned to register business actors, including shark and ray fishers, processors, and exporters. Following this work, the project provided a gap analysis to inform potential KKP enhancements in shark and ray management according to CITES protocols.

In general, the GOI has used captive breeding, population monitoring, and quota-setting as its main tools to achieve sustainable trade of wildlife, but ensuring the sustainability, traceability, and legality of wildlife utilization has proven to be challenging. To assist the government to address the challenges, BIJAK assessed the existing government regulation and supporting technical regulation. Working with Auriga Nusantara Foundation (Auriga), the project proposed revisions to address loopholes in the current legislation to support sustainable use of wildlife, including strengthening the use of the precautionary principle for improved management in captive breeding, population monitoring, and quota-setting.

Measuring Effectiveness of Marine Conservation Management

The KKP routinely assesses the effectiveness of its management efforts of marine protected areas (MPAs) using accepted tools, primarily the Aquatic, Coastal, and Small Island Conservation Area Management Effectiveness Tool (EKKP3K), evaluating 129 MPAs. Based on this experience, officials believed the tool needed to be enhanced to add specific guidance and timelines for action, with more focus on impacts rather than outputs. BIJAK supported this by drafting a new EKKP3K score card along with recommendations for additional enhancements, including assessing how the productive management of MPAs impacts the social and economic health of the area, how that can be complemented by efforts toward improved livelihood of communities within MPAs, as well as other recommendations for simplifying the tool for KKP needs.

REDUCING WILDLIFE CRIME AND UNSUSTAINABLE TRADE

Knowledge and Capacity to Counter Wildlife Crime

Enhancing knowledge on wildlife crime volumes and trends. Indonesia is one of the largest suppliers of wildlife in Asia, as well as a critical hub and transit point for global illegal wildlife trade. While the volume of wildlife trafficking is high, issues of wildlife trade have

yet to be prioritized. There is still a lack of comprehensive data of legal and illegal trade, which makes it challenging to develop and implement effective policies and regulations for species protection. BIJAK engaged by conducting studies on wildlife utilization, including the quota mechanism, and Indonesia's wildlife trade footprints, including volumes and routes, and the extent to which Indonesia is a contributor to global wildlife trade. The studies helped to raise awareness on the urgency of setting quotas and efforts to reduce demand for illegal wildlife products. They also contributed to the assessment of Mutual Legal Assistance Treaties to identify ways to support coordination opportunities between Indonesia and regional partners. The information on destination countries for Indonesia's wildlife resulting from the study informed discussion of which countries Indonesia should prioritize for coordination related to wildlife trafficking. The project also shared information on pangolin crime cases, tracked by partner WCS, together with the Indonesian Financial Transactions and Analysis Center (PPATK), to enhance overall knowledge leading to more effective enforcement by Indonesian authorities.

Understanding the baseline of domestic demand. Indonesia is known to be a major global source and transit hub for the trafficking of legal and illegal wildlife. Although international demand for Indonesian species is still high, domestic markets are also significant, both for domestic and international products. While several legal and institutional gaps are known to help facilitate the trade and trafficking of wildlife, consumer behaviors and motivations that drive the legal and illegal domestic trade in Indonesian wildlife are not yet well understood. To help fill this gap, BIJAK conducted a review of opportunities and lessons learned from behavior change campaigns. The study compared 24 wildlife demand reduction campaigns that have been conducted in Asia (mostly Vietnam and China), the Americas, and Europe. Based on the findings of the study, BIJAK developed a behavioral questionnaire to measure the level of community knowledge about wildlife management issues and the intentions and behaviors of communities, to inform interventions focused on behavior change.

Making inroads with air travel. As a top global biodiversity hotspot, Indonesia occupies an important place in fighting wildlife trafficking, both as the source of many trafficked species and as the market for trafficked wildlife goods. Air travel has proven to be a particularly cost-effective means for smuggling animals and animal products. The ever-growing global travel network and volume of air travel routes allows for rapid transit and the volume of passengers and air shipments can overwhelm many screening systems. Lack of awareness and knowledge among airport, airline, security, and customs personnel also makes many airports relatively low risk transport nodes for traffickers.

Within this context, BIJAK sought to build awareness and commitment among Indonesia's transportation companies to reduce wildlife trade in the air transport sector. Targeting airline participation, the project worked through meetings of the United for Wildlife Transport Taskforce, which featured presentations by transportation companies from around the world on their efforts to reduce wildlife trade. These discussions provided a model that informed a dialogue with the country's two biggest airlines, Lion Air and Garuda, on the role of airlines and airports in illegal wildlife trafficking. Top

managers of these two airlines are now aware of the framework of the Buckingham Palace Declaration, a commitment to shut down routes exploited by wildlife traffickers, why it is important, and how the screening practices they already have in place are supportive of the commitments the declaration.

BIJAK also helped to improve airport screening practices, specifically at Soekarno-Hatta Airport, through a collaboration with the Angkasa Pura II airport management company. At Soekarno-Hatta International Airport, BIJAK assessed gaps and opportunities for improving the capacity and screening protocols of airport screeners to identify and intercept illegal wildlife products carried by passengers or in checked baggage and cargo. This assessment drew on the work of the USAID ROUTES project but was adapted to the Indonesia context. The effort focused on raising awareness of wildlife trafficking issues among airport staff and improving passenger and luggage screening to detect illegal wildlife and wildlife products. Training targeted Aviation Security staff for protected species identification, methods to improve detection of smuggled wildlife, and wildlife evidence handling procedures. The training was the first time KLHK collaborated with the airport company to combat wildlife crime.



Figure 15. Exhibits at Soekarno-Hatta Airport international terminal raise awareness to combat illegal wildlife trade. (Photo: BIJAK)

Awareness raising for staff and passengers included highly effective exhibits at the airport and messaging on airport video screens. This included a protected species photo exhibit, an interactive wildlife trafficking display, and a display of two short videos on wildlife trafficking in the international departure terminal. The photo exhibit featured large-scale photos of protected Indonesian wildlife species that are frequently trafficked through the airports, and calls to action to save them. The interactive display featured two mannequins dressed as passengers with animals concealed in their luggage and clothing to show the common modus operandi of wildlife smugglers. Signage invited the public to search through the display to find as many smuggled animals as possible. Facilitators engaged visitors in conversations on the importance of protecting wildlife. BIJAK estimated that more than 4,800 visitors saw the exhibits during a two-week period. The airport company committed to displaying short, animated videos on the airport's closed-circuit digital TVs. The one-minute videos, produced by BIJAK, were

developed based on ROUTES data and training materials and information from the WCS Wildlife Crimes Unit and covered Indonesia's most trafficked species and how to recognize the red flags of wildlife trafficking at the airport and report them.

Improving legal system capacity for tackling wildlife crime. The high rate of illegal trade in protected wildlife has accelerated the degradation of forest quality in Indonesia. GOI efforts to reduce illegal activities have been strengthened through an increase in enforcement, which has led to an increasing number of criminal cases in the courts annually. In order to effectively process environmental cases, the Indonesian Supreme Court developed a training curriculum on environmental issues for the country's judges, and the USAID Changes for Justice project developed a separate curriculum for judges focusing on forestry and wildlife cases; unfortunately, the two trainings were not integrated. BIJAK provided technical assistance for revisions that provided integrated training for the Supreme Court, enhancing judges' capacity to handle cases involving wildlife trafficking and environmental damages, which had previously resulted in light sentences for convicted parties.

Crucial Protections for Target Species: Helmeted Hornbill

Indonesia is one of the native habitats for the helmeted hornbill, which plays an important role in maintaining its habitat's ecosystem by dispersing seeds over a wide area. However, poaching and illegal trade have threatened the bird's population in Indonesia. The helmeted hornbill has a solid ivory-like casque, which is easily carved and highly desired for making ornaments and trinkets, and global demand has had a devastating impact on the species. Concerned with the species' imminent extinction, the GOI acted on a recommendation from BIJAK and proposed a resolution entitled "Conservation of and Trade in helmeted hornbill in Indonesia" at the CITES 17th Conference of Parties (COP). This was an important show of international leadership by Indonesia and a key step in the protection of the helmeted hornbill.

Toward a conservation strategy and action plan. BIJAK was added as a member of the helmeted hornbill SRAK development working group chaired by KLHK, providing inputs to the SRAK itself as well as a ministerial regulation to support the SRAK. The project worked with LIPI and KLHK to validate helmeted hornbill population data, and to review helmeted hornbill trafficking cases. The SRAK incorporates a five-pillar strategy: population and habitat management, regulation and policy framework, partnership and collaboration for conservation, communication and awareness raising, and funding. The completed SRAK served as a coordinating tool for those tasked with implementing it, primarily local governments and NGOs. BIJAK also supported a formal KLHK ministerial regulation on the SRAK to provide a clear legal basis for local governments to take action. Without this there is often hesitation by local government officials to act for fear of making legal missteps. The formal endorsement as well as socialization with local government and other stakeholders fostered coordination and provided a basis for local governments to include SRAK activities in their annual budgets, enhancing the sustainability of conservation efforts.

To organize SRAK implementation, KSDAE established a multi-stakeholder National Partnership for Hornbill Conservation in Indonesia and with BIJAK support developed a roadmap for SRAK implementation. With BIJAK support, the partnership also began training key stakeholders for helmeted hornbill conservation, including staff from national parks and private sector logging concessionaires. BIJAK also mentored members of the Partnership to complete the SRAK communications strategy, which includes specific messaging and a map of target audiences, such as community groups, concessionaires, online shops, related government agencies, mass media, and e-commerce associations. Following this, BIJAK worked with seven NGOs and four universities to design a coordinated social media campaign for helmeted hornbill conservation. One aspect was an Instagram comic strip-storytelling competition called “Helmeted Hornbills Through the Eyes of Youth,” targeting this important group. The overall social media campaign was a success and brought in other groups and led to op-eds in prominent newspapers. The project also worked to include helmeted hornbill conservation messaging at relevant national parks under KSDAE’s BIJAK-supported communication strategy and training. As BIJAK was ending, the project supported KLHK in its monitoring efforts, designing an evaluation of SRAK implementation three years following its enactment.

Crucial Protections for Target Species: Sunda Pangolin



Figure 16. BIJAK supported immediate attention for Sunda Pangolin conservation supporting development of the Emergency Action Plan. (Photo: Paul Hilton/WCS)

The Sunda pangolin is one of four pangolin species in Indonesia. With eight other pangolin species globally, the pangolin is the most trafficked mammal in the world. It is typically killed for its scales as the main ingredient for traditional medicines. During CITES COP 17, the pangolin was listed as an Appendix I species, indicating a status of "critically endangered" and mandating all party countries with pangolin populations to strengthen their law enforcement efforts to combat illegal pangolin trade, and develop a

SRAK. Taking immediate action, KLHK asked BIJAK to help develop an Emergency Action Plan to define both strategic approaches and urgent actions to address poaching and trafficking, ranging from intergovernmental coordination to SMART patrolling, digital forensics, and setup of rescue centers. It also addressed activities in law enforcement, evidence handling, funding, and advocacy and awareness raising. BIJAK's support ended with the Emergency Action Plan, as KLHK reassessed the SRAK process, given uneven implementation of existing SRAKs.

Toward Sustainable Trade of CITES Shark Species

NDFs and sustainable quotas. Determination of NDFs, as called for in CITES, is an essential element in ensuring sustainable use of species and also ensuring that the utilization does not harm their habitat and ecosystem. To assist Indonesia with completing NDFs and ultimately improving management of the shark trade, BIJAK helped develop and institutionalize protocols for completing NDFs and quotas for CITES Appendix II listed sharks.

BIJAK's approach was to develop NDF protocols while working hands-on with government counterparts to initially complete two NDFs, those for the silky shark and the hammerhead shark. The process was designed to provide mentoring to government counterparts at LIPI and ensure the content of the protocols is appropriate for the Indonesian context. BIJAK helped LIPI complete the NDFs for both hammerhead and silky sharks. The hammerhead shark effort included an assessment of an existing export ban, and recommended sound quotas and a series of management enhancements should export be reopened. With both NDFs complete, LIPI went on to recommend a catch quota, which was subsequently legally adopted by KLHK. BIJAK was then able to support LIPI in completing the NDF and quota-setting protocols for sharks, adapting them to specific aspects of the trade in Indonesia and incorporating extensive public consultation. These protocols enabled the GOI to produce high quality, science-based NDFs and quotas on its own. With subsequent developments, LIPI prioritized an NDF and catch quota for mako sharks and updating the NDF and management for hammerhead sharks. For these, BIJAK assumed a mentoring role, including training additional LIPI staff in NDF development, leading to NDFs for both species of sharks, which will be used to inform export quota development. BIJAK also developed a policy brief on enhanced hammerhead shark management to be included in KKP's National Action Plan for Shark and Ray Conservation and Management.

Population monitoring to support quotas and management. Sustainable catch and export quotas can only be effective if they are based on sound scientific data. LIPI is responsible for establishing quotas, yet collecting species population data across Indonesia has proved a challenge. To help address this, BIJAK and LIPI developed new species monitoring guidelines for several CITES Appendix II species to yield consistent and reliable data. The guidelines are both scientifically sound and consistent with relevant government policies, and are more practical for field staff to implement, addressing what was previously a major constraint. BIJAK then worked with LIPI to provide training for field staff focused on population monitoring for species of special concern, including

joint data collection with local communities, based on BIJAK's report on the scale of Indonesia's wildlife trade. BIJAK also reviewed the legal framework for monitoring, which revealed a challenge to monitoring in the limited resources available to government agencies. To address this, BIJAK helped the government take a new approach by creating a network of universities, NGOs, and CSOs to participate in the collection and sharing of data for all target species. Establishing the network included defining the mission and roadmap for implementation, developing data protocols, and setting network structure and funding needs. The project also played a role in training participating representatives from member organizations, and coalition-building sessions. Collected data was slated to be added to the National Biodiversity CHM.



Figure 17. The NDF for the silky shark was a coordinated effort by officials to improve the management of this species. (Photo: Benaya Simeon, WCS)

With monitoring guidelines and SOPs for fish species utilization and transport permits (see earlier discussion) in place, BIJAK began piloting them to document the silky shark catch at Tanjung Luar, in West Nusa Tenggara province, one of the largest shark and ray landing ports in eastern Indonesia. The pilot began with hands-on training for local government staff as well as traders to implement the guidelines and procedures for monitoring and reporting landings. Following the pilot, BIJAK, along with KKP and local officials, conducted an assessment of the pilot to inform additional training needs or any needed modifications to the guidelines and SOPs. Ultimately, the project updated the training curriculum to help KKP with the national roll-out of their approach to improved quota monitoring. KLHK also developed an online transport permit application system based on the SOPs to monitor and manage catch and trade of CITES Appendix II fish species, including adherence to quotas by consolidating applications from traders across the country, and collecting data to track the origin, processing, and transfer of fish across supply chains.

Traceability for enhanced shark management. Exports of CITES Appendix II species require export permits detailing the source location from which they were harvested. This information and the permits are an essential management element to ensure trade is

legal and non-detrimental for sustainability of the species, in line with established quotas. As traceability of the catch to its source was a gap in the Indonesian process, BIJAK began work with LIPI and KKP to develop such a system for better managing catch levels. Knowledge of a product's supply chain is a prerequisite for developing and implementing an effective traceability system. BIJAK thus carried out an assessment of the shark and ray supply chain from point of harvest through each critical traceability point, including landing site, first buyer, processor, and exporter. The assessment identified critical areas to be strengthened to improve control, such as whole-body landing requirements and updating non-tax revenue rates for exports. The effort incorporated input from stakeholders, including fishers, aggregators and processors, exporters, and various units of the government. The recommendations proposed a traceability system design detailing the responsible actors, the required documentation, and a coding system for each stage in the shark catch, processing, and trade process. This served as the basis for the Directorate of Marine Biodiversity Conservation (KKHL) to complete a roadmap with BIJAK support to develop a system for shark catch documentation and traceability.

Using export data and non-tax revenue for improved shark management. Indonesia's online system used to apply for trade licenses has the potential to complement efforts related to NDF determination and quota-setting as well as the development of a traceability system to improve management of the shark trade. Requiring shark traders to use this system will make it an important node in KKP's planned shark traceability system. However, in the case of sharks, the functionality of the system is directly tied to the issue of non-tax revenue, which defines how export data is collected and reported. In coordination with KKP, BIJAK conducted an assessment of the current non-tax revenue rates structure for sharks and shark parts. The assessment showed that limited data collected for sharks made accurate estimates of shark catch impossible. Also, the benchmark prices set for shark parts were outdated and did not factor in the cost of management and conservation. Based on these findings, the assessment recommended restructuring non-tax revenue for a revised set of product types, each with an updated benchmark price. The report also recommended changes for determining the non-tax revenue assessment rates for each product category, more accurately assessing shark parts in relation to their market value, including the relatively high value of shark fins. KKP endorsed the project's recommendations and planned to incorporate them into the revision of the regulation on Types and Tariffs of Non-Tax Revenue. This would give KKP responsibility to collect non-tax revenue for Appendix II-listed shark species at landing ports around the country, with a more direct mechanism to monitor and enforce provincial catch quotas and national export quotas for regulated shark species.

REDUCING UNSUSTAINABLE DEMAND FOR WILDLIFE

Addressing Unsustainable Domestic Demand for Songbirds

Indonesia has the second highest number of globally threatened bird species in the world and poaching and unsustainable trade of birds is a leading threat to many bird species. Songbird-keeping, which is mostly legal though unsustainable, is firmly entrenched in Indonesian culture and especially Javan culture, where bird keeping and

songbird competitions signify social status. The huge increase in demand for songbirds is accompanied by a lack of understanding of the problem among songbird-keepers in Indonesia. BIJAK helped tackle this threat by developing a behavior change campaign that promoted greater awareness and protection of songbirds, specifically shifting consumer preferences from wild-caught to captive-bred birds to reduce numbers taken from the wild. The effort involved first identifying hotspots of songbird-keeping activities (including who, where, what species, the volume, and the market) as well as the motivations for enthusiasts keeping songbirds. The project, in collaboration with the University of Oxford Martin School, also conducted a survey to measure consumer perception and behavior on songbird-keeping, obtaining responses from nearly 6,000 respondents.

The project then worked with the university to design the behavior change communication (BCC) campaign, including a theory of change, action plan, timeline, communications channels, messages, audiences, and specific locations. West Java was identified as a hotspot for songbird keepers and was selected as the target area. Next steps included an Idea Incubator to examine consumer behavior and define interventions, interviews with songbird keepers to understand their motivations and social drivers, and analysis to define key messages. BIJAK, LIPI, and KLHK then worked with a social marketing partner, Daun Digital Indonesia, to finalize and launch a campaign targeting 100,000 songbird-keepers, with the objective to reduce demand for wild-caught birds. The campaign used “guerilla marketing,” with materials distributed by key contacts within eight Facebook songbird groups. BIJAK also identified songbird influencers from songbird associations, YouTube vloggers, media companies, and songbird competitors to help disseminate messages and materials.

The campaign, called #BijakBerkicau, was launched in mid-2020 with materials and messages disseminated very effectively on Facebook and YouTube. In parallel, BIJAK began its monitoring strategy of social listening using social media analytics and simple sentiment analysis of the interactions and comments users made as well as other online discussions. Using these means, BIJAK was able to track changing narratives around the campaign messages and observe shifts in the discourse about consumer preferences.

These insights were used to inform messaging and dissemination. BIJAK also supported

REDUCING DEMAND FOR WILD-CAUGHT SONGBIRDS

THE MESSAGES

- Captive-bred songbirds are the best quality and value.
- Be a conscientious songbird-keeper. Ask before you buy.
- Don't buy the one without the ring (captive-bred). A secure hobby depends on having the ring.
- You get what you pay for – price reflects value. Buy captive-bred songbirds instead.
- Javanese philosophy teaches us to respect nature and love our *kukilo* (bird); not exploit it.
- Love only one bird because one is enough. One bird for forever.
- Are you sure you know how to care for your songbird? Think again, you may not know what your songbird truly needs.
- Love your songbird to the fullest before you think about buying more.

THE IMPACT

- 37% increase in buyers asking the origin (wild or captive) of birds
- 73% increase in owners practicing good husbandry
- 63% of buyers now preferring captive-bred birds over wild-caught (up from the 35% baseline)

the BCC campaign with a series of wider awareness-raising activities, such as BIJAK social media posts and in-person events to increase the reach of messaging. The project also launched a webinar series in response to social distancing requirements from the COVID-19 pandemic. Monitoring and evaluation, with innovative, “gamified” survey techniques to increase interest, was a key part of the BCC campaign, and revealed significant impact (see box).

To sustain the songbird campaign, BIJAK created a Facebook Fan Page to ensure continued availability of campaign material, and worked with a local NGO, Burung Indonesia, to continue campaign activities through a formal agreement and handover, including capacity building, at the end of the project. BIJAK also fostered a network of key opinion leaders to promote sustainable songbird keeping as they were found to be very influential.

Unexpectedly, these key opinion leaders subsequently decided to advocate with KLHK for enhanced policies, registration processes, and data collection to support sustainable practices and protect popular and threatened songbird species and will work with Burung Indonesia on these initiatives. Finally, BIJAK, together with partners WCS, Burung Indonesia, and Daun Digital developed a roadmap for continued campaign implementation, including new collaborative ideas, with roles and resource contributions from each organization. The success of the campaign drew significant interest through webinars held by USAID’s global Combatting Wildlife Trafficking learning group, and the Indonesian Communication4Development Forum.

Siapa yang Pernah Begini?

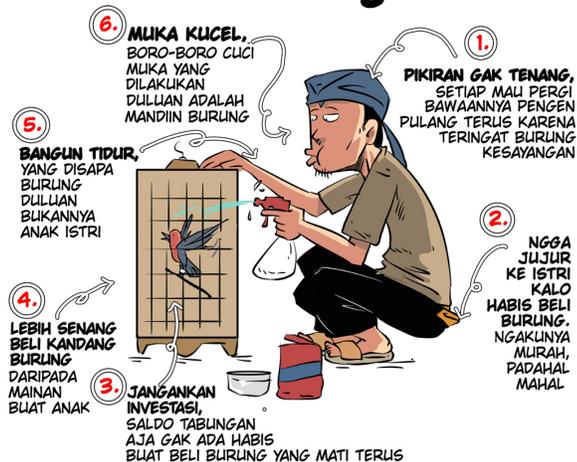


Figure 18. Comics inviting the audience to reflect on their songbird-keeping responsibilities. (Photo: BIJAK)

Assessing the Demand for Shark Products

Indonesia is recognized as one of the world’s largest shark fisheries. Of the hundreds of shark species in Indonesia, only six species are fully protected under the national regulation framework. While international export of protected species is illegal under Indonesian law, domestic use is still only partially regulated and is poorly monitored. BIJAK conducted a study to determine specific behaviors of actors in the shark fin trade with the intent to use this information to effectively target the key actors through a behavioral change campaign.

Working with the University of Oxford, BIJAK first conducted media monitoring to gather data on shark fin online trading. The findings informed the survey design and content of the face-to-face and SMS survey questionnaires for the consumer perception of survey shark consumption. Findings of the survey indicated that shark product demand reduction would require extensive alternative livelihoods work in some locations, and that domestic demand — BIJAK's focus — is greatly outstripped by international demand for shark products. For these reasons, BIJAK thereafter focused its resources on songbirds, passing its findings on to KKP.

Supporting Improved Management of Wildlife Stockpiles

With increased enforcement actions significant stockpiles of confiscated wildlife products accumulate, yet there is pervasive uncertainty surrounding the actual contents of these stockpiles, management responsibility, tracking and storage practices, and disposal protocols. This in turn presents a risk of leakage of these products back onto the market, further fueling trade in illegal wildlife products. To address this, BIJAK initiated an assessment aimed at clarifying the current state of wildlife stockpiles and their management in Indonesia and providing policy recommendations to secure and properly dispose of these products.

BIJAK completed stockpile assessments covering Sumatra, West Java, and Jakarta, covering the vast majority of Indonesian stockpiles. The assessment captured data on current inventories, handling and practices, and compliance with the current management guidelines for wildlife evidence, and made recommendations for improving stockpile management.



Figure 19. Confiscated ivory from stockpile in Riau. (Photo: WCS)

An important aspect of management is destroying stockpiles, which eliminates the risk of leakage of illegal wildlife products back into the market. This also sends a powerful message to the public, illegal traders, and poachers that the government takes the issue seriously. BIJAK's stockpile assessment drew KLHK's attention to the current state of government-held wildlife evidence and the need to clarify roles and responsibilities for evidence management. This increased attention helped inform a decision by KLHK and Gakkum to hold a stockpile disposal event, during which 10,000 confiscated wildlife items deemed unworthy of preservation (for research, museums or otherwise) were destroyed.

SECTION 4

GENDER AND SOCIAL INCLUSION

BIJAK designed and implemented activities that were responsive to gender equality considerations in accordance with the GOI's approach to gender mainstreaming and USAID's Gender Equality and Female Empowerment policy, both designed to engage and empower women and other marginalized groups and help ensure equality of project impacts. Women and men engage with natural resources, including forest management and wildlife trade, differently, due to traditional gender roles and differing positions within society. Similarly, changes in policy and practices related to natural resource conservation and exploitation also affect women and men differently.

Project activities helped ensure that women, as key users and beneficiaries of forest and marine resources, were empowered to participate in and benefit from decisions and practices related to forest management and conservation. To ensure women were equal partners in national-level decision-making, consultations, policy implementation, and advocacy efforts, BIJAK identified how gender biases influence policies, regulations, legal frameworks, practices, public opinion, and advocacy efforts. Technical approaches sought to empower women policymakers, community members, and members of advocacy groups to participate equally in activities and outcomes.

One way to achieve BIJAK's gender and inclusion goals was to mainstream strategies into technical trainings to raise awareness and encourage forest managers and conservation practitioners to promote gender equality and empowerment in their day-to-day activities, in addition to building the capacity of women. To do this, BIJAK's gender specialist delivered a gender equality and empowerment awareness training to BIJAK staff, so that they could integrate these elements into their day-to-day work. The specialist also developed gender equality and empowerment content to be integrated generally into BIJAK trainings, with further tailoring to the scope and audience of specific trainings.

The project measured gender impact quantitatively by counting the number of women who participated in policy development, trainings, focus group discussions, and other activities. BIJAK also monitored the qualitative impact of the inclusion of gender awareness and empowerment in technical trainings, including changes in approaches or behaviors as a result of the training. Examples of gender and inclusion initiatives follow.

Revisions to national policy. BIJAK increased access for women to the policymaking process, actively engaging women in policy dialogues for the revision of the RKTN, on efforts to strengthen FMUs and improve conservation area management, and to provide greater species protection. BIJAK also commissioned a gender impact assessment of an

amendment to the national Conservation Law (Law No. 5), and the results were presented to policymakers as input on the final draft of the amendment.

Surveillance of emerging zoonotic diseases. The gender team informed development of the zoonotic disease surveillance protocol by furthering understanding of the role of women, including their part in managing animals kept by their households for food production and as pets. This showed the value of involving women (as opposed to only inviting the heads of households) in discussions about zoonotic diseases; everyone agreed that socialization of the protocol should be planned to facilitate women's participation, and that background research for the surveillance protocols should include women's knowledge and perspectives.

Conservation partnership development. BIJAK worked with grantee LATIN to integrate gender and social inclusion principles across the seven steps of conservation partnership development under the new BIJAK-supported regulation. For specific pilots this included mapping the division of labor between women and men in agriculture, revealing that women play a lead role in the production of horticulture, leading to a more active role in this aspect of the partnerships.

National park communications and website development. After participating in a BIJAK training on national park website development, Komodo National Park communications staff launched a program at the park to raise awareness of gender issues among the predominantly male staff. These staff now understand the importance of developing communications materials and programs that are gender-sensitive and encourage the participation of both women and men in the national park's activities. BIJAK also conducted training with a gender component for site staff in charge of managing national park websites and developing communications materials and messaging. Pre- and post-tests showed that there was an increase of participants' knowledge of gender concepts and theory, as well as an improved understanding of how the new knowledge is relevant to their everyday work.

Youth national parks campaign. In working with youth for the AMCTN awareness campaign, the gender team explained how core messages should be designed to reach both women and men, and depict women as strong, active participants and as role models in the conservation world. The blog writing coaching clinic featured a panel of well-known Indonesian women bloggers who shared their tips and tricks for writing about the environment and national parks. Fifty-seven percent of the entries to the blogging contest were from women, and two of the three winning entries were written by women.

Shark and ray catch and trade monitoring. The team delivered gender sessions during the training for government staff and stakeholders on how to use the updated SOPs and guidelines for monitoring the catch and trade of protected fish species. The sessions focused on applying the SOPs to ensure that government officers capture women's knowledge and participation in the shark export value chain — as fisherfolk, processors, traders, and exporters.

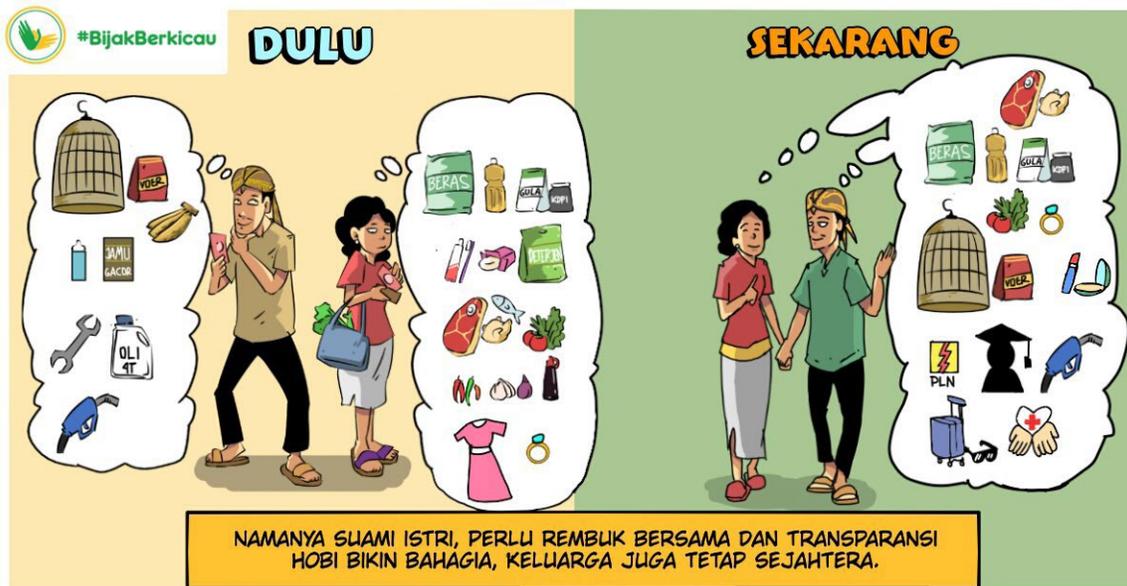


Figure 20. Songbird demand reduction campaign materials show women and men making important household spending decisions together. (Photo: BIJAK)

Songbird demand reduction campaign. Songbird-keeping is a highly male-dominated hobby, yet women play a critical role in the care and feeding of birds and household decisions. Young women are also rising stars in the songbird-keeping community as winning competitors and social media influencers. BIJAK’s campaign messaging was designed to show women and men as equally knowledgeable and accomplished songbird-keepers and emphasized the valuable role of women in the care and nutrition of songbirds. Materials showed women and men discussing household spending as equals and making joint decisions on spending for the hobby and other related expenses. BIJAK also produced content starring a prominent woman songbird-keeper who has won several prestigious competitions, to recognize women’s contributions to the hobby and highlight the benefits of captive-bred songbirds.

SECTION 5

LESSONS LEARNED AND RECOMMENDATIONS

BIJAK's work and the team's achievements and challenges provide a number of lessons to inform future work as well as recommendations for proceeding with continued progress and enhancements to the sector and beyond.

LESSONS LEARNED

- *Integration with other projects afforded great benefits, along with challenges.* BIJAK's focus at the national level was envisioned to link closely with the sub-national and site focus of other USAID projects, primarily LESTARI. With time, this reaped great benefits. LESTARI site experience could be scaled with BIJAK's national focus, with policy work and approaches factoring in on-the-ground lessons learned. The project was able to then roll out and pilot national changes in policies and procedures with LESTARI activities and benefitted from existing relationships and knowledge of the nuances in operating at sites. Some examples of this were broader adoption of participatory zonation by tapping site experience, and roll-out of national enhancements to conservation area data collection and MIS, rezoning, and conservation partnerships at the site level. At the same time, integration and opportunities for synergy were incomplete. This was due to the realities of different project teams operating from different offices, implementing different contract requirements overall, and scopes of work that spanned different contract periods.
- *Integrated, mutually reinforcing activities maximize impact and create broader constituencies to sustain them.* The BIJAK team, together with KLHK, "connected the dots" to unify activities to tackle threats and management needs. Disparate starting points, such as conservation partnerships, zoning and blocking maps, encroachment handling, integrated MIS, and participatory planning all came together for improved conservation area management, community participation, and reduced encroachment threats. Some aspects of this, like zonation for planning and community involvement, informed more effective management of new KEEs. More integration meant more stakeholders to own and sustain management enhancements. BIJAK's own management approach avoided siloing and constantly promoted finding synergies.
- *Pilots moved new approaches to a tipping point.* BIJAK used piloting as a means to help the government put new policy measures and approaches into use. More than just trials, these pilots served to bring changes to real applications, building hands-on experience, familiarity, and ultimately ownership of the approaches and measures. This experience and familiarity in part "de-risked" the work with real examples that managers can use as a reference for proceeding further. For KEE

management, pilot efforts focused in East Java are now the shining example of how to do it right. For MIS, getting the tools into the hands of the park managers and getting them familiar with using them is a major step toward the national roll-out.

- *Multi-stakeholder approaches are essential but complicated, and can work.* Multi-stakeholder engagement and management are integral to some aspects of forest and conservation area management as well as species protection. BIJAK's work with building constituencies for conservation to promote national parks, promoting KEE management, developing the helmeted hornbill communications campaign, establishing a population monitoring network, and launching a songbird demand reduction campaign are all examples of working through multi-stakeholder groups. Collaboration between these groups can be a challenge, often because of incomplete alignment of interests. For example, at the local level, conservation and economic development interests may compete. The project learned that the best, most successful partnerships were created when BIJAK was able to support them through initial small wins, so that various partners could have the experience of working together for a common goal with mutual benefits. This increased the likelihood that they would continue to work together on future activities, as they already had the connections and positive experience of working together.
- *Aligning with counterpart priorities provides a foundation for extending enhancements beyond their core needs.* A key element of creating ownership and sustainability is supporting counterpart priorities. An example of this was when BIJAK responded to an important KSDAE need to complete the zoning and blocking mapping effort and align them with One Map. By building credibility and the counterpart relationship with this support, BIJAK was able to introduce much greater value-added management changes. The project tapped the mapping effort as a means to complete the site zonation itself, introduce participatory zonation approaches with local communities, and use zoning and blocking maps for management planning and active priorities such as resolving tenurial conflicts and other encroachments. Working with KSDAE champions extended the work from sites for institutionalization in government planning documents and budgets.
- *Adaptive management worked in two directions, narrowing in and adjusting to maximize impact.* The BIJAK design encompassed four broad components. A wide range of activities was included in the first year of the work plan, in part to define initial work and monitor if the work gained traction and further investment could therefore achieve lasting impact. Evaluating initial performance guided the adaptive response, focusing subsequent project work along two narrower project themes, fully integrating the four-component inputs to the thematic objectives and results. Shifting political economies informed this focus and ongoing emphasis of interventions. For example, BIJAK helped align the

project's multi-stakeholder capacity building with KSDAE's specific priority on adopting multi-stakeholder approaches.

- *The COVID-19 pandemic as tragedy and opportunity.* At the time of this writing, the coronavirus pandemic is not fully under control in Indonesia or elsewhere in the world. The pandemic has created health, economic, and other consequences still unknown and created tremendous disruptions, from government functioning down to BIJAK operations. At the same time, it forced new energy into certain initiatives, specifically digital and IT-based solutions. Not only were day-to-day activities conducted online, but training sessions for counterparts, and the training programs designed for formal, long-term adoption by the government shifted to online, e-learning platforms. Integrated MIS for conservation, with data-sharing and dashboards for decision-making, capitalized on a greater interest in digital solutions.

RECOMMENDATIONS

- In future project design, consider the tradeoffs of national and sub-national/site work being done under the same or multiple projects. Integration at both levels is critical for both policy reform and improved management and implementation, for projects and counterpart work alike. BIJAK found tradeoffs specifically in the BIJAK/LESTARI differences and synergies.
- On-the-ground implementation of conservation initiatives by local authorities is increasingly more effective. At the same time, BIJAK encountered cases, for example with KEE management, where decentralization is still evolving. Future efforts should continue to emphasize the increased and dominant role of sub-national government in management together with the crucial role of the national government in policy, coordination, and other aspects of implementation.
- Project timelines naturally leave “unfinished business.” The roll-out of new and enhanced regulations and policies, guidelines, and tools and approaches such as zoning and block mapping developed under BIJAK need to continue. BIJAK put the elements in place, from roadmaps to institutionalized capacity and ownership, for counterparts to do this. Further pilots in government priority areas to build experience and examples to replicate may lead the full national roll-out.
- Enacting key policy reforms will solidify certain changes. As with any project, not all policy changes could be formally enacted during the project period. Supporting final adoption will help cement the project gains. As one example, delay in enactment of ministerial regulations on KEEs means that designated KEE areas remain vulnerable to changes by local government policies and leaders. The legality of approaches themselves is a crucial consideration in government staff and managers taking action.

- Beyond the 14 pilot national parks chosen for data-driven decision-making, management improvements in other conservation areas may be slowed until they have a good platform to compile, manage, and analyze their data. This initiative will need budget support for remaining parks and other conservation areas currently lacking in equipment and capacity.
- Sustainable financing for conservation is critically important and BIJAK inroads should continue to progress in this area. Financing conservation on a national scale will take a “mosaic” of options and sources depending on the application and setting. With the regulation on PES, BIJAK put a key building block in place for PES schemes when favorable political dynamics are in place. BIJAK’s work on EFTs defined three fund options to provide budget support for local conservation priorities. Bringing EFT schemes to implementation can help finance BIJAK’s terrestrial conservation initiatives as well as other environmental programs, from climate change to fisheries.
- Maintaining and growing constituencies for conservation, such as youth for national parks and songbird enthusiasts for captive-bred birds, will take ongoing activities and visibility. Calling on strong local institutions such as Burung Indonesia to lead and provide continuity should be supported.

ANNEX. ACCOMPLISHMENTS AGAINST PERFORMANCE INDICATORS

BIJAK's Monitoring, Evaluation, and Learning effort was a crucial piece of project implementation and adaptive management. Performance indicators shifted somewhat with the evolution of project scope emphasis, particularly in the adjustment of the four project components to support two technical themes. Review of progress against indicator targets was integral to regular reviews of work plan implementation and annual pause-and-reflect meetings that accompanied work planning. The table below highlights BIJAK's accomplishments for each performance indicator.

BIJAK PROJECT PERFORMANCE INDICATORS

INDICATOR NAME	LIFE OF PROJECT TARGET	LIFE OF PROJECT ACTUAL (DISAGGREGATION)	ACHIEVED (%)
USAID F INDICATORS			
Number of people trained in sustainable natural resources management and/or biodiversity conservation as a result of US government (USG) assistance. (F-EG.10.2-4)	440	1,387 (Male: 977, Female: 410)	315%
Number of laws, policies, or regulations that address biodiversity conservation and/or other environmental themes officially proposed, adopted or implemented as a result of USG assistance. (F-EG.10.2-5)	12	29 (Proposed: 16, Adopted: 10, Implemented: 3)	250%
Number of people trained in sustainable landscapes supported by USG assistance. (F-EG.13-1)	215	786 (Male: 614, Female: 172)	366%
Number of institutions with improved capacity to address sustainable landscapes issues as supported by USG assistance. (F-EG.13-2)	70	106 (National government: 1, Sub-national government: 103, CSO: 2)	151%
Number of laws, policies, regulations, or standards addressing sustainable landscapes formally proposed, adopted, or implemented as supported by USG assistance. (F-EG.13-3)	24	24 (Proposed: 16, Adopted: 8)	100%
Amount of investment mobilized (in USD) for sustainable landscapes as supported by USG assistance. (F-EG.13-4)	\$645,000	\$699,401 (Public, domestic: \$562,235, Public, international: \$4,104, Private, domestic: \$133,064, Private, international: 0)	108%
Number of persons trained with USG assistance to advance outcomes consistent with gender equality or female empowerment through their roles in public or private sector institutions or organizations. (F-GNDR-8)	341	384 (Male: 254, Female: 130)	113%

INDICATOR NAME	LIFE OF PROJECT TARGET	LIFE OF PROJECT ACTUAL (DISAGGREGATION)	ACHIEVED (%)
BIJAK CUSTOM INDICATORS			
Amount of investment leveraged in USD from private and public sources for biodiversity conservation as a result of BIJAK assistance.	\$480,800	\$624,703	130%
Number of institutions using data, information, or tools related to low carbon conservation-oriented practices developed, enhanced, or shared by BIJAK.	251	371	148%
Number of forums convened by BIJAK or BIJAK partners to discuss and/or develop action plans or policy recommendations in support of BIJAK objectives.	181	196	108%
Number of stories featuring BIJAK's or BIJAK-supported partner's sustainable landscapes or conservation messages covered in media.	560	655	117%
Number of women who are active in policy dialogue activities implemented by BIJAK or BIJAK partners.	505	310	61%
Number of actions taken by key related stakeholders to implement species protection-related policy as result of BIJAK support.	6	5	83%
Number of people who participate in BIJAK or BIJAK's partners public awareness campaign events.	800	7,038	880%
Number of visitors to website pages or social media channels which contain BIJAK's targeted issues or campaign messages.	400,000	688,326	172%
Number of people from CSOs, think tanks, media, government staff or private sector entities trained by BIJAK reporting improvements in addressing conservation area management, protecting key species, or raising awareness of issues related to BIJAK.	107	274	256%

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