



Equator Initiative Case Studies

Local sustainable development solutions for people, nature, and resilient communities

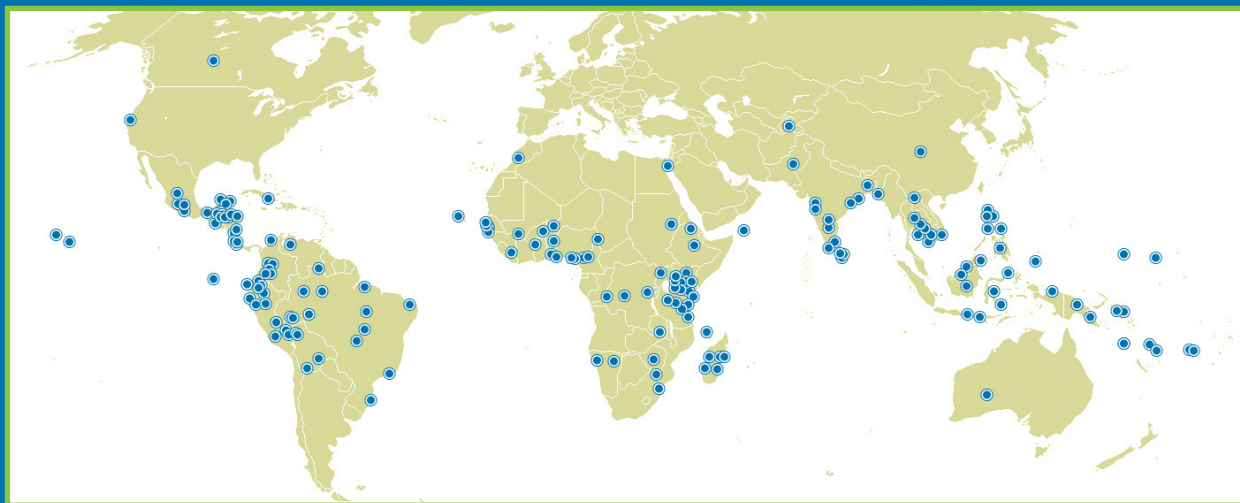
UNDP EQUATOR INITIATIVE CASE STUDY SERIES

Local and Indigenous communities across the world are advancing innovative sustainable development solutions that work for people and for nature. Few publications or case studies tell the full story of how such initiatives evolve, the breadth of their impacts, or how they change over time. Fewer still have undertaken to tell these stories with community practitioners themselves guiding the narrative. The Equator Initiative aims to fill that gap.

The UNDP Equator Initiative, supported by generous funding from the German Federal Ministry for Economic Cooperation and Development (BMZ) and the Norwegian Agency for Development Cooperation (NORAD), awarded the Equator Prize 2020 to 10 outstanding Indigenous and local communities from 10 countries. The winning organizations showcase innovative nature-based solutions (NBS) for tackling biodiversity loss and climate change.

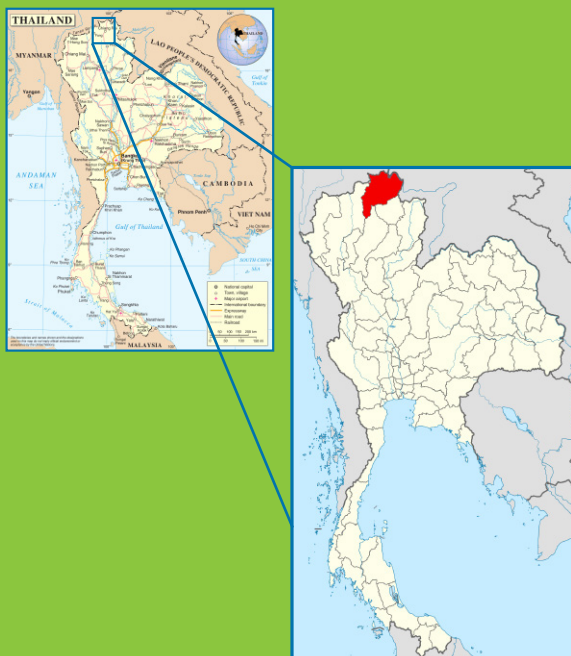
Selected from 583 nominations from more than 120 countries, the winners were celebrated at a high-profile virtual event on 29 September 2020. The event was held in conjunction with the UN Biodiversity Summit and the 75th Session of the UN General Assembly, both also held virtually. The winners are sustainably protecting, restoring, and managing forests, farms, wetlands, and marine ecosystems to mitigate greenhouse gas emissions, help communities adapt to climate change, and create a green new economy. Since 2002, the Equator Prize has been awarded to 255 initiatives.

The following case study is one in a growing series that describes vetted and peer-reviewed best practices intended to inspire the policy dialogue needed to scale nature-based solutions essential to achieving the Sustainable Development Goals (SDGs).



PROJECT SUMMARY

Boon Rueang Wetland Forest Conservation Group (BRWFCG) or กลุ่มอนุรักษ์ป่าชุ่มน้ำบุญเรือง in Thai formed in response to threats against the largest wetland forest in the Ing River Basin in Northern Thailand. The community has maintained stewardship over the 483-hectare forest through coordinated advocacy and dialogue with stakeholders, while pursuing a successful community forestry model under a landscape conservation model. The Boon Rueang Wetland Forest ecosystem is critical to protect natural water reserves for agriculture and consumption, provide wildlife habitat, naturally store carbon, and preserve the biodiversity of the Indo-Burma Region. Protection of the ecosystem has been achieved through education, mobilisation, fundraising, and extensive research on the rich biodiversity and significant economic value of the wetland forest. Through thoughtful advocacy, the group successfully reversed an earlier administrative decision to use Boon Rueang Wetland Forest for industrial purposes. The wetland forest is now protected as a community inheritance for generations to come.



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KEY FACTS

Equator Prize winner

2020

Founded

2015

Location

Ban Boon Rueang, Chiang Rai, Kingdom of Thailand

Beneficiaries

6,024 beneficiaries, including 2,944 women

Thematic areas

Forest conservation/sustainable development; Natural climate solutions; Biodiversity conservation

Fields of work

Wetlands conservation; Ecosystem conservation; Nature-based carbon sequestration

Sustainable Development Goals addressed



EQUATOR PRIZE 2020 WINNER FILM





BACKGROUND AND CONTEXT

I am Srongpol Chantharueang, the Chair of Boon Rueang Wetland Forest Conservation Group, and the Chair of Water Users' Group for [the] pumping station. Here, we can see the greenery of the wetland rice paddy field as a result of the water supply. Where does the water come from? There are two main sources: the mountains over there and there. The water pours down into the Ing River. We pump water from the Ing River back to supply both sides of the rice fields.

This is like our supermarket. When we cultivate rice, we will have rice and fish. We can sell the produce to pay for our children's education, to buy vehicles, and to build our houses. We do not receive any financial support. Instead, we set up a contribution for water users. For instance, the operational cost is set at 80 Baht (US\$2.5) per an hour, but we collect 100 Baht (\$3) to cover the electricity per hour. To do so we need to make sure every water-user understands the contribution. The difference of 20 Baht from electricity cost is to finance the management such as cutting grass, fixing the canal path, and other repairs.

Forest conservation and water use in the paddy must be connected. The wetland paddy requires water, which requires management on how best to utilize it. As I work for wetland conservation, I need to foster understanding of the benefits of forest protection for our water supply in the paddy fields here. We can observe during a drought period we have no water. [During a drought] we agree to stop pumping water at night. We pump during the day only. We share the availability of water resources by negotiating amongst ourselves, so we do not cause conflict...

... Now, we are facing a water crisis. In normal circumstances, where we are standing now [on the riverbanks], the water should be above our heads. But today, the water runs dry and low over there. One of the reasons is because of the Mekong River. The Mekong River and its water is not being released. The flow from the Ing River into the Mekong River is therefore more rapid and quickly dries out. A second factor is the weather. We experience drought and resulting forest fires. What can we do to help one another to resolve these and future challenges? One solution is to plant deep rooted trees that can function as the embankment to prevent soil erosion along the rivers. We do not want concrete materials. I would like people in other countries to help carry our similar efforts. Increasing forest area is an important solution—not only in Boon Rueang or Thailand. I would like to see this happening in all countries and continents—and nature will return its benefits back to us.

— Mr Srongpol Chantharueang, Chair of Boon Rueang Wetland Forest Conservation Group

In the northern reaches of the Kingdom of Thailand (Thailand), a local community is safeguarding a biodiverse wetland forest from the threat of industrial development, preserving it instead for its water, biodiversity, and climate mitigation values. This effort is led by a group of wetland protectors known as Boon Rueang Wetland Forest

Conservation Group (BRWFCG), or กลุ่มอนุรักษ์ป่าชุ่มน้ำบุญเรือง in Thai.

The group is based in a small village in the Chiang Khong District, nestled between the Doi Yao Mountain Range and the Ing River, a 260-kilometre-long tributary of the Mekong

River. The village, known as Boon Rueang Village 2, has a population of 695 individuals among 288 households. Many of the inhabitants are Tai Yuan, who speak the Lanna-Kham Mueang dialect and are the majority ethnic group in Northern Thailand. Community members typically earn their livelihoods from the surrounding landscape by grazing buffalos, fishing, farming, cultivating rice, or collecting non-timber forest products (NTFPs), such as bamboo shoots and mushrooms.

Just west of the village lies Boon Rueang Wetland Forest, a 483-hectare ecosystem that has been jointly and customarily managed by the Boon Rueang community for more than 200 years. The largest wetland forest in the Ing River Basin, this ecosystem provides crucial ecosystem services, such as purifying water for drinking and agricultural use, limiting flooding, storing carbon, and replenishing groundwater. For the local community of Boon Rueang, it also functions as a source of food security, medicinal herbs, and firewood.

The wetland forest is seasonally flooded between August and November. As the landscape floods, fish migrate from the mainstem Mekong River to the connecting Ing River, before reaching the wetlands surrounding Boon Rueang village. There, the wetland forest is transformed into an inundated nursery and breeding ground for aquatic

species. Once the fish mature, some swim back along the Ing River to the Mekong River. Others remain in wet ponds and in the Ing River, where they become a source of food and livelihood for local fisherfolk.

This biodiverse riparian ecosystem is part of the larger Indo-Burma Biodiversity Hotspot recognized by the Critical Ecosystem Partnership Fund (CEPF). The verdant wetland forest is dotted with several species of bamboo (*Bambusa sp.*), known as *Phai Pa* in Thai; Siamese rough bush (*Streblus asper* Lour); and Chumsang (*Xanthophyllum glaucum* Wall). It is also home to numerous species listed on the International Union for Conservation of Nature (IUCN) Red List of Threatened Species, including the critically endangered Sunda pangolin (*Manis javanica*). The area also provides habitat for the Eurasian otter (*Lutra lutra*), listed as near threatened, as well as the fishing cat (*Prionailurus viverrinus*), king cobra (*Ophiophagus hannah*), and black and white spitting cobra (*Naja siamensis*), all listed as vulnerable.

Though Thailand has designated 15 sites under the [Ramsar Convention on Wetlands of International Importance](#), Boon Rueang Wetland Forest is not currently a Ramsar Site. The wetland's economic, ecological, and cultural value is nonetheless crucial to the villagers of Boon Rueang, whose livelihoods and traditional practices depend on it.

Origin and structure

In 2015, village representatives at the district level learned that their wetland forest was to be converted into a Special Economic Zone (SEZ). Boon Rueang villagers quickly recognized that such a demarcation would involve land reclamation, factory construction, concrete laying, and—perhaps most devastatingly—a plan to fill in their treasured wetland. The villagers sprang into action, mobilising to form BRWFCG. Since 2015, the group has advocated for the protection of the community's wetland forest to safeguard the clean water source and riparian ecosystem on which the community depends.

After successfully resisting the conversion of the wetlands into a SEZ in 2018, BRWFCG has developed a four-pronged mission with the following objectives: conserving, restoring, and furthering the sustainable management of Boon Rueang Wetland Forest; supporting area-based academic knowledge production and learning exchange among partners across the Ing and Mekong rivers; revitalizing local culture and traditional livelihood practices in connection with wetland natural ecology; and registering the Lower Ing River Basin both at a national level and as an international Ramsar site.

The governance structure of BRWFCG is composed of 11 committees and 15 advisory committees. A chairperson leads a team of two vice chairpersons, two secretaries, three treasurers, two public relations experts, and one coordinator. The group is made up of 637 community volunteers, including 337 women.

BRWFCG ensures the active and democratic participation of all genders and ages through its monthly village meetings. During these meetings, all social groups within the community are able to participate in the decision-making process through a majority vote.

Women play an important part in BRWFCG. All women are members of the Boon Rueang Women's Group, while a smaller women's conservation working group participates in the Ing Watershed Women Network and plays a key role in the Ing Watershed People's Assembly. An elders' group sustains ritual and religious ceremonies, such as forest orientation. Elders' voices are actively integrated into the decision-making process through the village elders' supervisory meetings.



Planned industrial development

In 1967, the wetland forests in the Ing watershed were legally declared 'public utilization land' by the Thai Ministry of Interior. Under Public Land Certificate no. 2540/2510, approximately 483 hectares were reserved as state land for communal use, including Boon Rueang Wetland Forest. This ministerial declaration reflected the historical land-use practices in the area, recognizing Boon Rueang villagers had communally and customarily managed the wetland forest for more than 200 years using collective harvest rules, zoning, and an irrigation system.

Although the Boon Rueang community secured communal land rights in 1967, numerous external actors have attempted to develop Boon Rueang Wetland Forest. For example, from 1968 to 1969, the wetland forest faced development plans from milling and tobacco curing factories. In response, villagers dissented and mobilised to communicate with the District Chief, resulting in the cancellation of these proposed projects.

Through the mid-2000s, the Thai government began increasing investment in large-scale infrastructure development projects in the region, including highways and transportation hubs to encourage trade. During subsequent years, the government started converting public lands in Chiang Khong, the district in which Boon Rueang is located, to prepare for economic regionalization under the Association of Southeast Asian Nations (ASEAN) Economic Community (AEC). In 2013, the government im-

posed an asset capitalization policy to allocate communal wetlands into private holding. In response, the villagers banded together in a second wave of activism to protect the Boon Rueang Wetland Forest.

In 2014, villagers received word that the National Council for Peace and Order (NCPO) had proposed a Special Economic Zone (SEZ) that could encompass Chiang Khong District. By 2015, the Boon Rueang Wetland Forest was declared a target zone for state land development. The wetland forest would be assigned two different land use types: a 288-hectare industrial estate and a plan to build the 192-hectare Chiang Khong campus of Maejo University. This proposal would involve filling in the wetland forest with compact ground, leading to a loss of natural water retention, biodiversity, and some fishing sites upon which many villagers rely as a source of food and livelihood. In order to carry out this proposal, the government proposed revoking the wetland's 1967 'public utilization land' legal status. This declaration occurred without meaningful prior consultation with the Boon Rueang community.

Many members of the Boon Rueang community felt that this attempt to expropriate the wetland forest did not adequately consider their perspectives. Others voiced concerns that industrialization would compromise their livelihoods and the area's biodiversity, as well as adversely affecting the ecological traditional wisdom accumulated across generations.

Deforestation

Across Thailand, widespread industrialization and deforestation have resulted in a decline of biodiversity. According to the Food and Agriculture Organization of the United Nations (FAO), between 1961 and 1998, the nation's forest cover decreased from 53 percent to 25 percent of the nation's total area. In Boon Rueang, villagers reported that certain species, such as tigers, bears, and buffalo, have disappeared from the area since the mid-20th Century.

Deforestation is also linked to soil erosion and intensified impacts of flooding. When devastating floods swept across the Ing River in 2010, inundating neighbouring villages, the village of Boon Rueang was left comparatively unscathed, in part because the 483-hectare wetland forest acted as a natural buffer. The proposed industrial development associated with the SEZ threatened the wetland forest and its disaster risk reduction capabilities.

Climate change and dam construction

During the last five years, climate change and the presence of upstream dams have altered the flow of the Ing River, which sustains the wetland forest ecosystem. Villagers report that the upstream Mekong River's flood pulse is weakening, and river levels are abnormally low. As a result, fish replenishment patterns provided by the mainstem Mekong River to the connected Ing River have fundamentally changed.

Lower levels of precipitation and water flow from the Mekong River and surrounding mountains play key roles in this phenomenon. From April to September 2019, China's portion of the Upper Mekong River, upstream of where the Ing River joins the Mekong in Thailand, received

abnormally high levels of rainfall. However, during the same time period, downstream countries in the Lower Mekong, like Thailand, experienced drought and blocked or restricted flows from their upstream counterparts. As a result of reduced precipitation and restricted water flow, Boon Rueang villagers have reported that the community's four water pumps, which transport water from the river to the farmland, have been used more frequently than in the past. Villagers have also noticed increasing soil degradations and that tree growth is taking longer than normal. Each of these factors impacts the abundance of fish and the availability of non-timber forest products (NTFPs).

“In the past, people would say there was no need to plant the forest—that it was pointless. But now that we have the group, people are looking out for the areas to be reforested where it's thinned out and where it's patchy. When there are areas that are not looking healthy, they will replenish it by finding trees, anything, to add to it, to make it as green as possible.”

Mr. Srongpol Chantharueang, BRWFCG Chairperson





LOCAL RESPONSES

Wetland forest management

Community members sustainably manage the 483-hectare Boon Rueang Wetland Forest ecosystem using a landscape conservation model. The seasonal wetland forest has been traditionally demarcated as a public space for all villagers to sustainably access resources, such as foods and medicinal herbs. The villagers credit their strong sustainable relationship with the wetland ecosystem to a bond cultivated by their ancestors.

A series of community regulations governs the communal use and protection of Boon Rueang Wetland Forest and the connected Ing River. These regulations are:

1. The felling of any tree with a diameter larger than 6 inches (15.2 cm) is prohibited. A village hearing is required in the event of an exception.
2. Only branches and twigs can be used as firewood.
3. In the case of a standing dead tree, a village hearing is required to discuss its transport from the wetland.
4. Bamboo, including its shoots, can only be harvested for household consumption. Commercial sales are not permitted.
5. Queen's crape myrtle (*Lagerstroemia speciosa*) and wild orchids cannot be harvested for sale.
6. Starting fires for wildlife hunting is prohibited.
7. People can collect insect, wasps, and bees.
8. Fishing methods of electrocution, explosion, or poison are prohibited.
9. Fishing activities are prohibited in conservation zones.
10. Hunting or shooting wildlife is prohibited in conservation zones.

These community regulations help protect numerous local flora and fauna, including mammals and reptiles registered on the IUCN Red List of Threatened Species. The rules further support the sustainable harvest of natural resources, such as fish, bamboo, mushrooms, crickets, and trees.

In addition to these rules, BRWFCG encourages traditional practices that strengthen the connections villagers' ancestors forged between people and nature. The group arranges forest ordination ceremonies and shrine worshiping to fuse spiritual practices with wetland protection and restoration. Partnering with RECOFTC, formerly known as the Center for People and Forests, BRWFCG also created a wetland forest trail and walkway, which functions as a learning site for students and the general public.

KEY IMPACTS

Wetland forest management

- Protected 483 hectares of terrestrial areas, securing the livelihoods of more than 200 families living in Boon Rueang.
- Protected at least 276 species of flora and fauna with habitat in the Boon Rueang Wetland Forest, including 87 local fish species, 16 exotic species, 16 food plants, and 41 medicinal plants.
- Protected numerous mammals registered on the IUCN Red List of Threatened Species, including the critically endangered Sunda pangolin (*Manis javanica*), the near threatened Eurasian otter (*Lutra lutra*), and the vulnerable fishing cat (*Prionailurus viverrinus*).
- Protected numerous reptiles registered on the IUCN Red List of Threatened Species, including the Siamese cobra (*Naja siamensis*) and the king cobra (*Ophiophagus hannah*), both listed as vulnerable.



Advocacy campaign to block industrial development

BRWFCG used a powerful advocacy campaign to defend the wetland forest from proposed conversion into a Special Economic Zone (SEZ). The group's mobilisation strategies included representation in, and boycotts of, public hearings and referenda; building partnerships with academic institutions and conservation groups; reaching out to diaspora communities in Bangkok through chat groups; and building women's groups, youth groups, and senior groups.

The year 2015 was an impactful year for mobilisation. In September 2015, BRWFCG partnered with the Ing Watershed People's Assembly (IWPA). Through this partnership, BRWFCG strengthened connections with other institutional partners, conservation groups, academic and research groups, and funding sources.

In November 2015, the Boon Rueang community brought together the Chiang Rai Provincial Governor, National Human Rights Commissioners, professors from Chiang Rai, RECOFTC representatives, and other civil society organizations to make the case that industrial development would have detrimental impacts on the wetland forest ecosys-

tem and traditional culture. In response, government officials acknowledged the importance of biodiversity and environmental values of the wetland.

Starting in December 2015, BRWFCG strategically scaled up its advocacy campaign, linking with the Lower Ing Watershed Network to call for the Lower Ing River Basin to be listed as a Wetland of International Importance or Ramsar Site. BRWFCG engaged on social media platforms, including Facebook, YouTube, Messenger, and LINE, to further highlight the importance of the group's community forestry management model. For example, the Boon Rueang Women's Group collaborated with the Mekong Community Institute (MCI) to publish a series of videos on YouTube. The youth group also helps manage the Facebook group, which has more than 1,700 members.

In September 2018, the group's hard work finally paid off. The Chiang Rai Provincial Office withdrew the proposal to use the Boon Rueang Wetland Forest as an industrial estate. With the help of a savvy social media campaign and strong coalitions, the group prevented the industrial development of Boon Rueang Wetland Forest.



KEY IMPACTS

Advocacy campaign to block industrial development

- In 2018, the Chiang Rai Provincial Office withdrew the proposal for the industrial development of the Boon Rueang Wetland Forest, marking a huge victory for the preservation of this 483-hectare valuable ecosystem.
- Villagers were interviewed about this natural resource protection work and conservation victory by media, including Thailand Public Broadcasting Service (TPBS), Green News Agency, and Transborder News.
- The campaign generated a high level of trust and unity among the Boon Rueang community and their partners.



Community-based data collection and ecosystem quantitative valuation

In a bid to prevent the industrialization of the Boon Rueang Wetland Forest, BRWFCG also engaged in scientific measurement and co-produced academic research. From 2015 to 2019, the European Union (EU) funded RECOFTC and Chiang Rai Rajabhat University to implement the Empowerment of Local Networks and Local Authorities for Sustainable Inng Watershed Management project. Through this initiative, the Boon Rueang community collected data and evidence regarding the wetland forest's biodiversity, historical records, ecological services, and carbon stocks.

In 2015, the group shared this information with the Chiang Rai Provincial Governor's Office, the Chiang Khong District Chief's Office, Mae Fah Luang University faculty members, the former National Human Rights Commissioner, and media representatives to demonstrate the value of the wetland forest ecosystems. Throughout this process, community members were able to voice their values in various public arenas and solidify the case that the wetland ecosystems contributed enormous cultural, social, economic, and ecological value.

KEY IMPACTS

Community-based data collection and ecosystem quantitative valuation



- An analysis of the wetland forest's direct and indirect valuation conducted in collaboration with RECOFTC and Kasetsart University found approximately US\$4 million in total annual benefits.
- Approximately \$400,000 is generated annually from direct products, including food and raw materials. Meanwhile, approximately \$3.5 million is generated indirectly from ecosystem services, such as natural water retention reserves, habitats for wildlife, carbon storage, and education and cultural heritage.
- The Empowerment of Local Networks and Local Authorities for Sustainable Inng Watershed Management project measured that, in total, 21,731 metric tonnes of carbon is stored across 160 hectares. If the wetland forest was converted into other land-use types, approximately 79,536 metric tonnes of carbon dioxide equivalent would be released, demonstrating the wetland forest's value as a carbon sink to mitigate climate change. This estimation of carbon storage was carried out in collaboration with BRWFCG' partners, including RECOFTC, IWPA, the Institute of Biodiversity and Environment, Chiang Rai Rajabhat University, the Living River Association, and Chiang Khong Conservation Group.

“Our forefathers agreed to delineate the wetland as commons for community use, rather than private accumulation. The intention is to provide the source for food, fuel wood, and timber. This practice is carried on to the present generation and we must sustain the legacy to protect the wetland for our children and nature.”

Mr. Phitchayetsaphong Khurupratchamak, BRWFCG Coordinator



POLICY IMPACTS

National policy impacts

Boon Rueang Wetland Forest Conservation Group's (BRWFCG's) work is influencing policy at local and national levels. BRWFCG regularly participates in meetings and forums at the provincial and district levels, particularly regarding matters concerning national wetland registration by the Thai authorities. For example, the group recently participated in an alternative policy dialogue about Special Economic Zones (SEZs) at Chiang Mai University.

During the group's advocacy campaign to prevent the development of a SEZ in the Chiang Rai District, BRWFCG participated in a provincial forum alongside other communities protesting the proposal. Representatives from the Boon Rueang community also met with a former senator in Chiang Rai Province. As a result of the group's thoughtful advocacy efforts, the Chiang Rai Provincial

Office withdrew the proposal to use Boon Rueang Wetland Forest as the site for an industrial estate.

Although the efforts of the Boon Rueang community to protect the wetland forest from land-use change have not influenced national policy on SEZ development, the mobilisation has raised recognition among national government bodies of the unique characteristics of Ing River Basin wetland forests. These bodies, including the Office of Natural Resources and Environmental Policy and Planning, as well as the Chiang Rai Provincial Office for Natural Resources and Environment, are among the alliance of Boon Rueang and other communities that support wetland registration at a local level in the Lower Ing River Basin.

Contributions to the global agenda

At the global level, BRWFCG supports the implementation of several important multilateral agreements, including the [Convention on Biological Diversity](#) (CBD), the [United Nations Framework Convention on Climate Change](#) (UNFCCC), and the [2030 Agenda for Sustainable Development](#) (2030 Agenda).

Related to the UNFCCC in particular, by sequestering an estimated 21,731 metric tonnes of carbon across 160 hectares, the Boon Rueang Wetland Forest serves as a valuable natural carbon sink. This directly supports Article 4 (d) of the UNFCCC, which promotes the "sustainable management . . . of sinks and reservoirs of all greenhouse gases . . . including biomass, forests, and oceans . . ."

The work of BRWFCG likewise contributes to the achievement of numerous [Sustainable Development Goals](#) (SDGs) of the 2030 Agenda. For example, by safeguarding the wetland forest, BRWFCG preserves a disaster-reducing natural flood buffer and helps contribute to carbon storage. In turn, this supports the goals of climate action (SDG 13), life on land (SDG 15), and sustainable cities and communities (SDG 11) through disaster risk reduction. By preserving seasonal fish nurseries, BRWFCG sustains local fish populations and the livelihoods of local fisherfolk. This supports the goals of zero hunger (SDG2). On a social level, the Boon Rueang Women's Group supports the goal of gender equality (SDG5). Moreover, by partnering with various academic institutions and conservation groups to sustain their advocacy campaign, BRWFCG supports the goal of partnerships for the goals (SDG17).



REPLICATION, SCALABILITY, AND SUSTAINABILITY

Replication

While BRWFCG has not recorded any formal details on replication efforts, the Boon Rueang community provides a replicable model of wetland forest resource conservation. BRWFCG has been engaged in various knowledge-sharing efforts. Between 2016 and 2018, the community functioned as a site of learning and study for

at least 1,000 people from 30 organizations. A number of international organizations have collaborated in research studies and dissertations with more than 11 universities and 10 research projects in the area. Moreover, many neighbouring communities in the Lower Ing River Basin also practice forest ordination inspired by BRWFCG.

Scalability

While BRWFCG's initiatives have not been formally scaled, they have the potential to be scaled up across Thailand and beyond. The group has fostered strong connections with government agencies, NGOs, and academic institutions. As an active participant in meetings and forums at

provincial and district levels, BRWFCG is forging alliances with district, regional, and national bodies, including the Office of Natural Resources and Environmental Policy and Planning, as well as the Chiang Rai Provincial Office for Natural Resources and Environment.

Sustainability

The outlook for BRWFCG is bright, having garnered national and international recognition for its wetland forest resource conservation. In 2016, BRWFCG received an award supporting forest restoration and conservation from the Thai Fund Foundation, as well as a European Union (EU)-funded grant from the Empowerment of Networks and Local Authorities for the Sustainable Ing Watershed Management Project. BRWFCG is sustainably supported by community donations, learning group donations, and small-scale one-time project contributions. Looking ahead, the group plans to generate further income from renewable forest products.

Despite gaining global attention, members of BRWFCG are aware that there are many factors that could challenge the long-term sustainability of the wetland forest, including new economic development plans, government policies, and changing livelihoods. Challenges remain to ensure that all stakeholders in the Ing River watershed share the Boon Rueang villagers' sustainable watershed management approach. For this reason, recognition and registration of Boon Rueang Wetland Forest as an international Ramsar Site remains a key strategy to permanently safeguard the ecosystem.

FUTURE PLANS

BRWRCG plans to use its Equator Prize funds to pursue three related goals. First, BRWFCG will develop a wetland forest management plan supported by its key partners. The wetlands will be delineated into specific zones, such as restoration, agroforestry, wilderness conservation, and fish sanctuaries. The group will build a plant nursery and organic fertilizer production space for seedlings; enrich the understanding of native species and forest restoration through learning visits in partnership with the Forest Restoration Research Unit (FORRU) of Chiang Mai University; and continue wetland forest ordination ceremonies.

Next, BRWRCG will develop value-added non-timber forest products (NTFPs) and other products from wetland forest resources. This includes growing toothbrush trees, harvesting honey, and generating biomass for organic fertilizer that restores soil quality.

Finally, working alongside the Ing Watershed People's Assembly and other local partners, BRWFCG hopes to shift the public land title status into a wetland forest registered at both local and national levels. Wetland registration at a national level would precipitate formal protection through a cabinet resolution. The group is also attempting to designate part of Lower Ing River Basin as a Ramsar Site. In preparation for such registration, BRWFCG will enrich its database of wildlife and bird surveys. The group will also conduct workshops with the goal of developing a community research team for wildlife and bird data collection. The group plans to publish its collected data from bird and wildlife surveys. In sum, it is clear that BRWFCG remains staunchly committed to the sustainable use and protection of its wetland forest for generations to come.

PARTNERS

- **Chiang Khong Conservation Group:** Local activist group works on Chiang Khong and Mekong natural resources and local community rights protection.
- **Chiang Rai Provincial Natural Resources and Environment Office and Chiang Rai Fisheries Provincial Office:** Coordinates and facilitates submission of notifications at provincial levels, as well as fosters understanding with community leaders and the public.
- **Chiang Rai Rajabhat University:** Supports scholarly work and research on biodiversity and resource assessment.
- **Hill Area and Community Development Foundation:** Local NGO works to promote wellbeing and education of people in mountainous and border areas.
- **Kasetsart University:** Supports scholarly work and research on biodiversity and resource assessment.
- **Living River Association:** Campaign-based organization works to support local communities' rights to water resources, promote local knowledge-based sustainable water resource management, and oppose threats, including dams and water diversion, to rivers and riverine ecosystems in Thailand and neighbouring countries in the Mekong and Salween River basins.
- **Mae Fah Luang University:** Supports scholarly work and research on biodiversity and resource assessment.
- **Mekong Community Institute (MCI):** Environmental NGO works on water resource management and watershed ecosystems.
- **RECOFTC (formerly The Center for People and Forests):** Collaborated with partners to provide capacity-building for BRWFCG members and helped collect data and evidence for BRWFCG to protect their wetland forest.
- **Secretariat of Ing Watershed People's Assembly (IWPA):** Supported the development of sustainable agriculture programs.

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