

KFI PATROL AND MONITORING REPORT ON FOREST AND BIODIVERSITY APRIL 2021 SUMMARY Pandanan and Bugsuk Balabac, Palawan



24

Bilang ng nagawang
patrolya



110.5

Kabuuang kilometrong naabot
ng patrolya



22

Kabuuang oras ng
patrolya



1

Bilang ng illegal na
kailangang aksyunan



0

Bilang ng nai-report sa KFI



0

Bilang ng naaresto



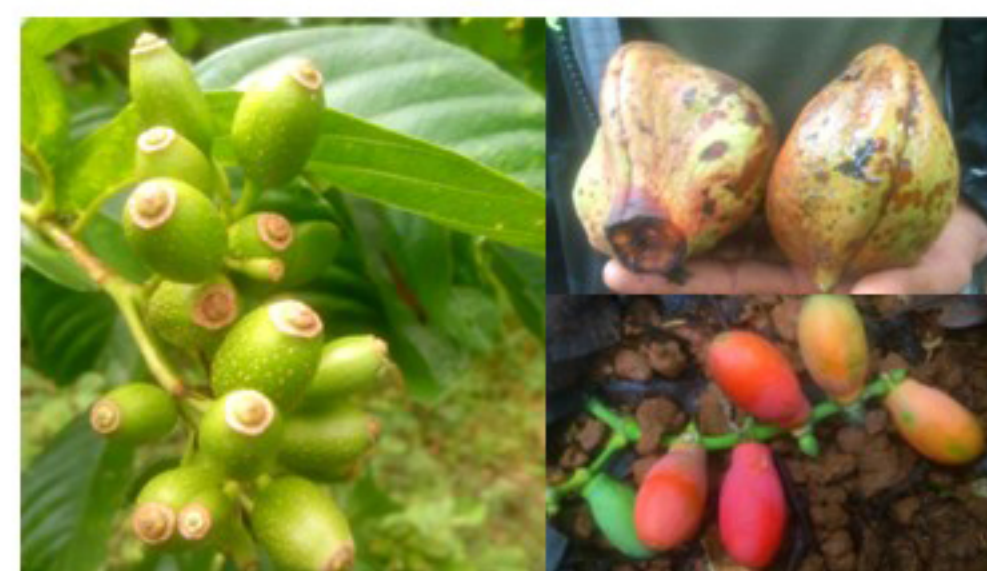
115

Pinakamataas na bilang
sa tulugan ng Katala



180

Bilang ng cavity nesters



19

Bilang ng naitalang
namumunga at
namumulaklak na puno



0

Nakuhang mga silo o patibong



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KFI PATROL AND MONITORING REPORT ON FOREST AND BIODIVERSITY

PANDANAN AND BUGSUK ISLANDS, BALABAC

April 2021

Prepared by:

Rene A. S. Antonio, Peter Widmann and Indira D. L. Widmann

I. GENERAL DESCRIPTION OF THE CONSERVATION AREA, CONSERVATION OBJECTIVES, CONSERVATION TARGETS AND METHODS

Pandanan and Bugsuk Islands belong to the north-easternmost municipality of Balabac in Palawan (Fig. 1). Coastal forests are dense and stock on flat limestone originating from elevated coral reefs. Large trees in the coastal forest are mostly deciduous and widely spaced due to water stress during the dry season. The understorey is very dense with abundant vines. Emergent trees *Pometia pinnata*, *Dracontomelon dao*, *Koordersiodendron pinnatum*, *Intsia bijuga*, and *Ficus* spp. A narrow rim of beach forest with *Erythrina*, *Calophyllum* and *Barringtonia* is present. The dense coastal forest cover is as well protected because the large portion of the island is privately-owned and entries are monitored by security company guards. Extensive mangroves are thriving which mostly dominated by genus *Sonneratia* and *Rhizophora*. Mangrove forest play important role not only to its wildlife inhabitant but act as one of the main food sources for the critically endangered Philippine Cockatoo. Both islands have old growth *Sonneratia* that can sustain food to significant numbers of wild cockatoo population during its fruiting season.

Currently, 101 bird species have been recorded in Pandanan, Bugsuk and adjacent Malinsuno Island. Among these are six globally threatened and six near-threatened species (IUCN 2019). Of outstanding conservation concern are particularly the larger tree cavity nesters, like Palawan Hornbill, all three parrot species of Palawan, Philippine Cockatoo *Cacatua haematuropygia*, Blue-naped Parrot *Tanygnathus lucionensis* and Blue-headed Racquet-tail *Prioniturus platenae*, and other

conservation relevant species like Grey Imperial-pigeons *Ducula pickeringii* and Mantanani Scops-owl *Otus mantananensis* (Widmann et al. 2008). The first and only record for the Philippines of a Fairy Pitta *Pitta nympha* comes from Malinsuno as a result of the conservation

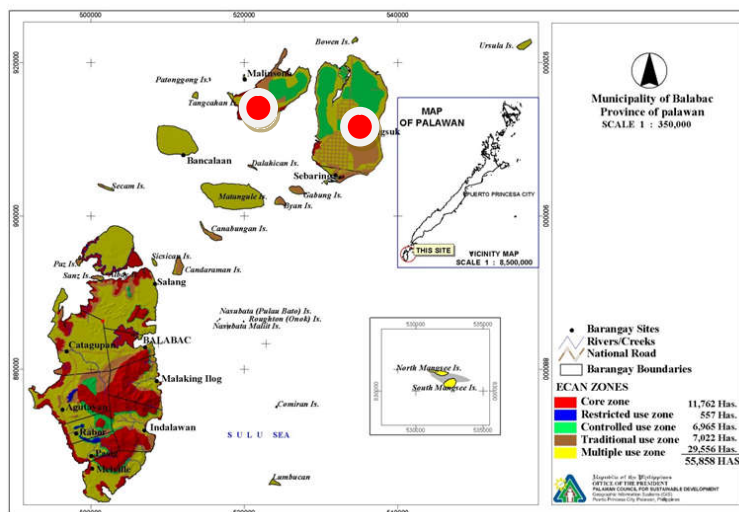


Figure 1. Location map of Pandanan and Bugsuk Island (red dots) in municipality of Balabac, Palawan (Map: PCSDS).

project. On the other hand Bugsuk Island also serves as one of the important habitat for the endemic Balabac Mousedeer *Tragulus nigricans*, due to restricted access of locals and less presence of hunting, deer population thriving in significant numbers. Bugsuk Island is apparently the only place in the world where the highly threatened Balabac Mousedeer, Palawan Porcupine, Philippine Cockatoo and Palawan Hornbill co-exist in the same forest habitat in viable populations.

Both island marine ecosystem harbor several threatened marine turtles species and locally declared as marine protected area that remain as the important breeding sites for grouper, wrasses and other high valued marine products.

Conservation Objectives

1. Maintain the species diversity and function of ecosystems and species at Pandanan and Bugsuk Island.
2. Identify and preserve priority sites for conservation and maintain their ecological functions.
3. Prevent or report to enforcing agencies illegal activities that compromise the integrity of the conservation area.

Conservation Targets

1. To increase Philippine Cockatoo population on Pandanan/Bugsuk by at least 5% from 2018 to 2021.
2. Increase viable population of endangered and endemic target cavity-nesters e.g. Palawan Hornbill, Blue-naped Parrot, Blue-headed Racquet-Tail, among others in Pandanan and Bugsuk Island from 2018-2021.
3. Reduce threats in the area by 50% from 2018-2021.

Methods

Deputised wardens patrol by foot, by boat and by truck monthly within sites. Patrol members use a technology-based system to register all observations (threats, status and wildlife data) in the android and transferred to a smart application to generate report (Critchlow et al., 2017; Teacher et al., 2013). Species to be monitored are based on their red-list status and their value as bioindicators (IUCN, 2019). Ease of identification in the field was considered as well. The maps are generated and analysed through QGIS. Patrols are coordinated with the concerned barangay, private land owner/company and protected area office wherever it applies.

II. PATROL TEAM AND EFFORT

Patrol personnel for this month are deputized wildlife wardens and staff of Katala Foundation and company guards of Jewelmer International Corporation based at Bugsuk Island. We covered 79.91km on Pandanan Island while 30.69km on Bugsuk restricted to JIC areas only. Patrolling was made on foot, via boat and onboard vehicle.

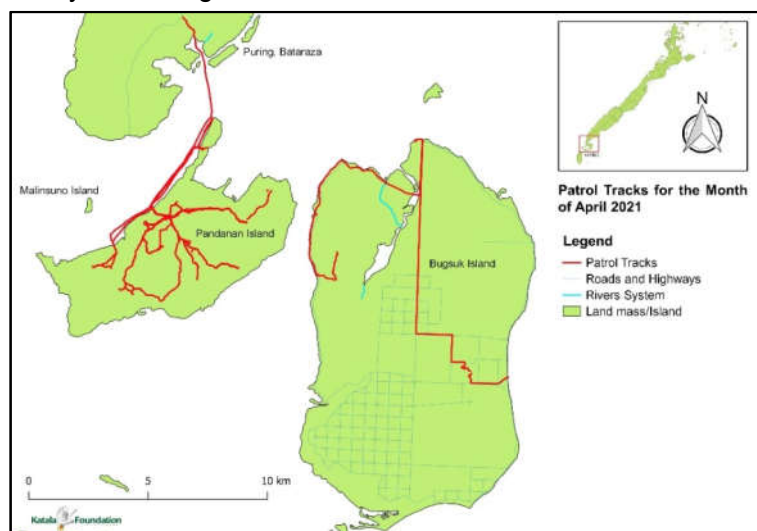


Figure2. Patrol tracks at Pandanan Island as of April 2021(Map: KFI 2021).

III. PATROL OBSERVATIONS

A. Wildlife observations

In Pandanan Island, Philippine Cockatoos (up to 115 individuals) were observed. While other counts include 90 ind. of Palawan Hornbill, 68 ind. of Blue-naped Parrots and 22 ind. of Hill Mynah. Other bird species recorded are Asian Koel, Osprey and Wandering Whistling Duck. The Flying Squirrel was recorded in most active bird nest trees.

In Bugsuk island we recorded the following wildlife species: 20 ind. of Palawan Hornbill, 20 ind. Philippine Cockatoo, 15 ind. Blue-naped Parrot and 9 ind. Hill Mynah. Field observation and nest monitoring was completed in JIC areas.

B. Philippine Cockatoo and Palawan Hornbill nest monitoring

Nest monitoring visit and checking was completed for the 25 cockatoo nest trees with nest preparation and occupation at Pandanan Island. In total, 21 nest trees were recorded active and occupied by cockatoo breeding pair this month. Increase in numbers of hatchlings was recorded with a total of 40 young cockatoos while four nest trees have eggs under incubation. Of these forty hatchlings, nine were banded/ringed as of April (Fig. 3). Individual biometrics and blood samples were collected by team during this event.

In Bugsuk Island, only four cockatoo nest trees were reached and visited by monitoring team given the restrictions. From these four nests trees, eight young cockatoos were recorded, all in good condition and well-fed. Banding/ringing was made at one nest with two young cockatoos, biometrics together with blood samples were gathered. No parasites, injuries or health issues found on these young cockatoos on both island.

For Palawan Hornbill, five hornbill hatchlings and nine eggs were recorded at Pandanan Island. New nest was discovered along the coastal forest of Dalahican, the nest chamber contain an adult female hornbill and two young hornbills. In total, seven nest trees are known active and occupied as of April (Fig. 3). While no active hornbill nest found in Bugsuk Island as restrictions get stricter in areas where most hornbills were known to nest.



Figure 3. The first cockatoo hatchlings from a nest in Bugsuk Island (left) were the first for this year in Palawan to be banded and newly discovered active Palawan Hornbill nest tree along the coastal area of Dalahican, Pandanan Island (Right; Photos: RAntonio).

C. Cockatoo roost counts and food providing tree monitoring

Cockatoo count at the traditional roost site decrease down to 115 individuals as of April monitoring while lowest count is 52. Low counts mainly linked to ongoing cockatoo breeding months which most of adult cockatoos stay at their respective nest trees.

For natural food source, we recorded 19 forest trees and a vine species as follows: Aga (*Ficus sp.*) Amugis (*Koordersiodendron pinnatum*), Antipolo (*Artocarpus blancoi*), Baba-tiyong, Badjang (*Alocasia macrorrhizos*), Balinad, Balangihan, Balite (*Ficus sp.*), Baribedan, Bayoso (*Pometia pinnata*), Bubog (*Sterculia foetida*), Bungyo (*Mussaenda grandifolia*), Girangan, Magdita-dita, Marapisa, Mararango, Magalmod, Rangingi vines, Se-ar and Tarongtong (Fig. 4). Pods of *Moringa* plant was noted in some areas of Pandanan; as of this year less *Moringa* pods are seen inside Pandanan Island particularly at warden's station. Probably, the frequent rainfall affect the fruit cycle of most trees.



Figure 4. Seeds of Balangihan tree, a food source for Hornbill (left) and matured pods of Tarongtong tree (Photos: R.Antonio).

D. Community monitoring and threats observation

Six locals originating from mainland Palawan was recorded at Sitio Dalahican, Pandanan on April 10 to April 11, 2021. These locals are: Henry M. Benavente, Gervel Mama, Johnny Bullawit, Freddie Bullawit, Julhane Macutla and Elita Hulguin. As per conversation these six locals identified themselves as personnel of BFAR and are currently doing inventory on fossilized giant clam's shells within Balabac Islands. They conducted meetings with locals of Dalahican who are interested to collect the shells and sell it to them with the assurance that they are legitimate and their field work are well coordinated with concerned agencies like DENR and PCSDS. However, upon verification from the above mentioned offices, we learned none were affiliated to these government agencies. They also notified the KFI monitoring team and locals that there are members of MNLF based in Palawan.

In terms of threats, an on-going forest clearing or kaingin was documented by KFI wildlife wardens in Sitio Lapisan, Pandanan and within the vicinity of active cockatoo nest tree, approximately 45m distance. The clearing/kaingin is owned by a certain Ian Sarigan of Bancalaan Island and Rubot Daud of Barangay Ramos, Balabac, both transient locals residing at Sitio Lapisan. At the same site we recorded one newly cut Antipulo Tree about 65m distance from cockatoo nest tree, the tree was cut down using chainsaw. No local cutter was found at site. The two locals from Bancalaan and Ramos were informed by patrollers to halt the clearing activity in the area to avoid further disturbances on cockatoo nest. Follow up monitoring was made by team and we found that clearing activity continued despite fair warning.



Figure 5. A newly cut old growth Antipulo tree (left) about 65m distance from cockatoo nest tree and ongoing clearing activity at Sitio Lapisan Pandanan about 45m distance from an active cockatoo nest (Right; Photos: KFI2021).

F. Camera trap installation and deployment

Additional four new camera traps were installed; one unit in Bugsuk Island and three at Pandanan. Regular card replacement and checking of installed units were made by monitoring team every month. The camera footages documented the following animals: Balabac Mousedeer (*Tragulus nigricans*), Southern Palawan Tree Squirrel, Long-tailed Macaque, Palawan Porcupine and Tabon Scrubfowl.



Figure 6. A group of Palawan Porcupine (left) and Balabac mousedeer (Right; Photos: KFI 2021).

IV. ISSUES, CONSTRAINTS AND ACTIONS TAKEN

Documentation of the clearing near the cockatoo nest trees was made by our monitoring team. Assessment of the cleared area will be made by the next monitoring months, location map and coverage of the clear vegetation will be provided then.

V. RECOMMENDATIONS

A collaborative joint monitoring activity by concerned agencies is deemed necessary in both islands but could be prioritized for Pandanan Island.

VI. ACKNOWLEDGEMENT

We are indebted to our wildlife wardens for their patience and work: Ismael S. dela Cruz Jr., Deo E. Aplid and Ariel C. Omog. Likewise, we thank our escorts from SCAA, Philippine Army who restlessly secured us every monitoring visit. Thank you very much to the Jewelmer Corporation by providing the KFI team full assistance during every visit in the islands especially to Sir Jacques Christopher Branellec and Ms. Vianney Brossard. We also extend our appreciation to the Council members of Barangay Bugsuk, Council members of Barangay Pandanan and Local Government Unit of Balabac through the leadership of Mayor Astami for making the conservation project more effective and successful.

We are indebted and grateful for the support of the following organizations and agencies for supporting patrols in Pandanan and Bugsuk Islands in Balabac:



References:

Critchlow, R., Plumtre, A.J., Alidria, B., Nsubuga, M., Driciru, M., Rwetsiba, A., and Beale, C.M. (2017). Improving Law-Enforcement Effectiveness and Efficiency in Protected Areas Using Ranger-collected Monitoring Data. *Conservation Letters* 10, 572-580.

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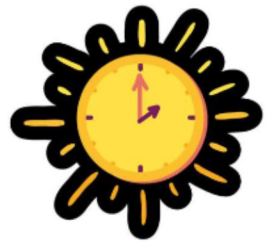
21

Bilang ng nagawang
patrolya



63.3

Kabuuang kilometrong naabot
ng patrolya



15

Kabuuang oras ng
patrolya



2

Bilang ng illegal na
kailangang aksyunan



2

Bilang ng nai-report sa KFI



0

Bilang ng naaresto



131

Pinakamataas na bilang
sa tulugan ng Katala



85

Bilang ng cavity nesters



12

Bilang ng naitalang
namumunga at
namumulaklak na puno



0

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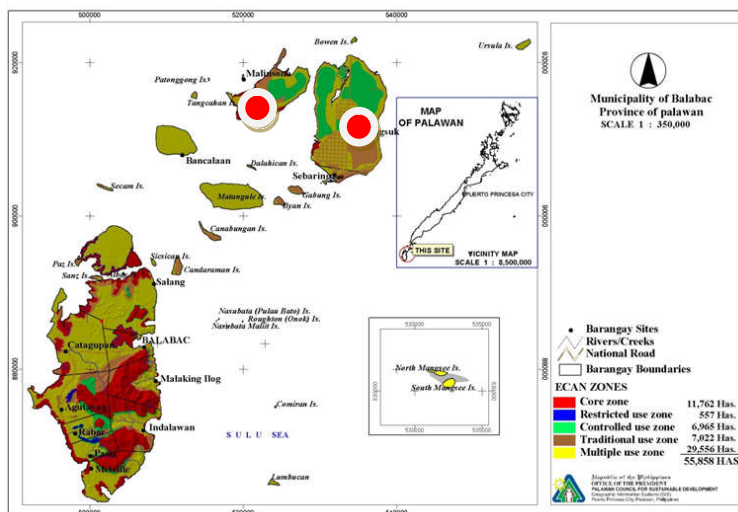


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3. Reduce threats in the area by 50% from 2018-2021.

II. PATROL TEAM AND EFFORT

As of this month patrolling and monitoring was made only in Pandanan Island covering the total area of 63.3km. Patrolling was made mostly by deputized wildlife wardens of Katala Foundation and assistance from barangay tanod was made on May 3rd 2021. Coastal patrolling along Pandanan northern area were made together with community.

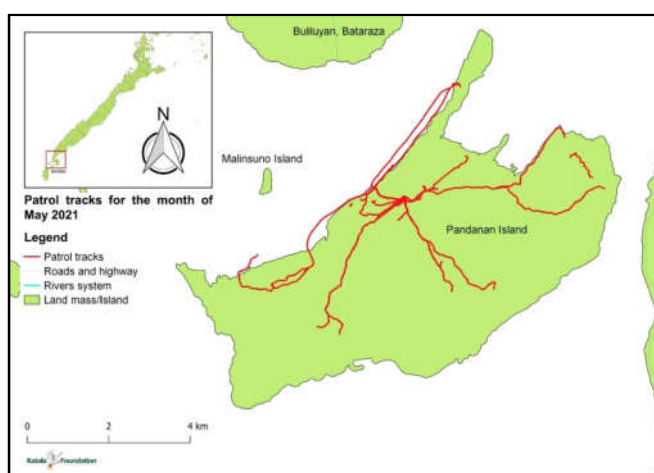


Figure 2. Patrol tracks at Pandanan Island for the month of May 2021(Map: KFI 2021).

III. PATROL OBSERVATIONS

A. Wildlife observations

Four target cavity-nesting birds of conservation importance were recorded at Pandanan: Philippine Cockatoo, Palawan Hornbill, Blue-naped Parrot and Hill Mynah. As of this period, absence of Blue-headed racquet tail in the island was noted; we assume that this species is also at its breeding activity. Its nesting behavior remain unknown at least on Pandanan Island.

We recorded a total of 131 individuals (ind) of Philippine Cockatoo, 40 Blue-naped Parrots, 33 Palawan Hornbills, and 22 Hill Mynah. Other bird species listed are Green-imperial Pigeon

(125 ind), Asian Koel (10 ind), Tabon Scrubfowl (10 indi) and a Red bellied Pitta (locally known as Romoroko).

For terrestrial mammals, Long tailed macaque continue to list in significant numbers, observation of Flying squirrel were noted in most cockatoo nest trees were they accidentally flush off during the nest intervention by wardens. This mammal species hid in tree cavity numbering 2-3 individuals in a hole during day time and forage by nightfall.

B. Philippine Cockatoo and Palawan Hornbill nest monitoring

Monitoring and nest checking events were completed for 22 active and occupied cockatoo nest trees in Pandanan Island. As of May 30th, a total of 45 young cockatoos were recorded in the island. Of these, 31 hatchlings were recently banded by our team and nine were banded in April. The remaining five young cockatoos are set for banding by second week of June, as it is best to band hatchlings 2.5 weeks before fledgling. We also closely monitor two more nest trees that were occupied in later part of the season and there might be additional hatchlings in June. Mortality of five nestlings was documented from three nests. These are due to either predation e.g. by snakes, and competition between other cavity-nesting bird species.

As part of breeding season and bird health monitoring protocols, biometrics and blood samples were collected from each young cockatoo. Collection of blood is primarily for DNA sexing and PBD testing (Fig. 3).

This month, first successful fledglings for this breeding season were noted from one nest where two banded young cockatoos safely left its nest hole. Others are expected to follow within the next monitoring days.



Figure 3. Banding and blood sample collection activity at Pandanan Island as of May 2021 (Photos: RAntonio, KFI).

For Palawan Hornbill, eight active and occupied nest trees were listed this month. A total of 14 hornbill hatchlings verified and confirmed and six of these successfully fledged before the end of month. While eight young remain in nest hole and these are expected to fledge by second week of June. One nest remains at incubation period and another one was left unchecked due to presence of black ants at tree trunk. Monitoring continues.

C. Cockatoo roost counts and food-providing tree monitoring

Cockatoos at the roost site in Malinsuno Island recorded 131 as the highest while 35 individuals as the lowest count this month. As breeding month nearly ends, cockatoo numbers are expected to increase at roost site until the month of October. Other known temporary roost site particularly at Dalahican is on watch, this area is used as roost site by new recruits every year.

Eleven forest trees and a vine species were recorded at fruiting stage: Amugis (*Koordersioden dronpinnatum*), Antipolo (*Artocarpus blancoi*), Arimogdan, Baba-tiyong, Badjang (*Alocasia macrorrhizos*), Balangihan, Balite (*Ficus sp.*), Bubog (*Sterculia foetida*), Magdita-dita, Marapisa, Mararango, Rangingi vines and Se-ar (Fig. 4).

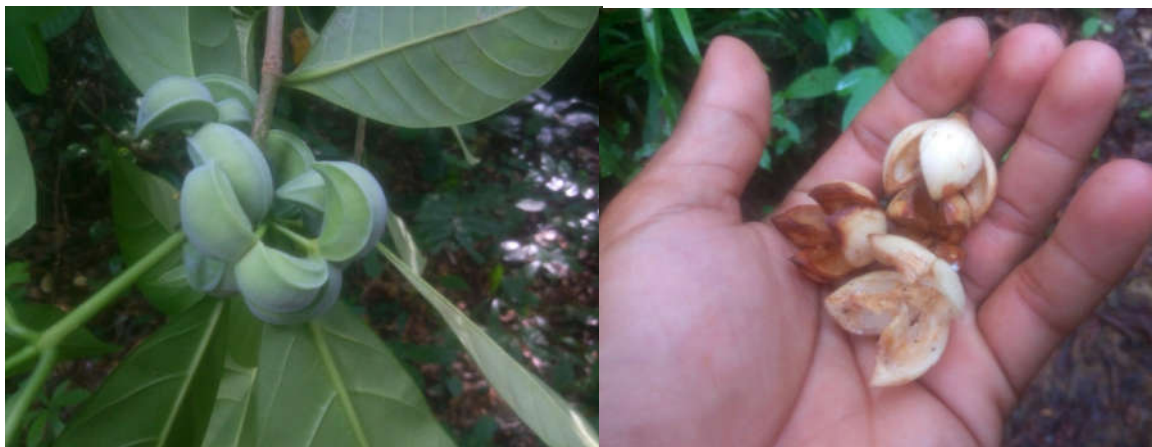


Figure 4. Young fruit of Magdita-dita tree (left) and fruit of Baba-tiyong tree (Right, Photos: R. Antonio, KFI).

D. Community monitoring and threats observation

Continued influx of non-island residents were noted at Dalahican and Gabong. New comers mostly came from mainland Palawan. Ten locals were recorded at Dalahican as of May 20, 2021; while 11 others stayed in Gabong from May 20-21, 2021. Of these 11, nine of them originated from Barangay Puring, Bataraza while two from Barangay Candawaga, municipality of Rizal. These locals allegedly attended the wedding celebration of their relatives.

We pursued monitoring to document the continued clearing near active cockatoo nest tree at Sitio Lapisan. During the monitoring period, trees bigger 20cm diameter were seen purposely cut off using chainsaw (Fig. 5). Other illegal activity recorded include the massive cutting of old forest trees inside Kamilet to Siminnop to Tagbinwan forest. Cutting was made using chainsaw, during the monitoring and patrolling by wildlife wardens, no local cutter was found inside these sites though during the visits. Anecdotal reports from concerned locals said that chainsaw operation was mainly done between 4pm to 9pm. Further, it was known from locals that generated lumber were hauled the soonest possible time to avoid confiscation by authorities. As of May 06, 2021 a total of 23 old growth forest trees were cut, these trees are locally identified as Baro (1), Bobog (1), Dao(1), Mangupak (4), Amugis (5), Ipil (3), Marampuso (4), Bayog (1), Baris (1) and Nato (2) (Fig. 6).



Figure 5. Monitoring team inside the cleared/kaingin area at Sitio Lapisan, Pandanan. The cleared area is situated within the active cockatoo nest tree (Photos: KFI 2021).

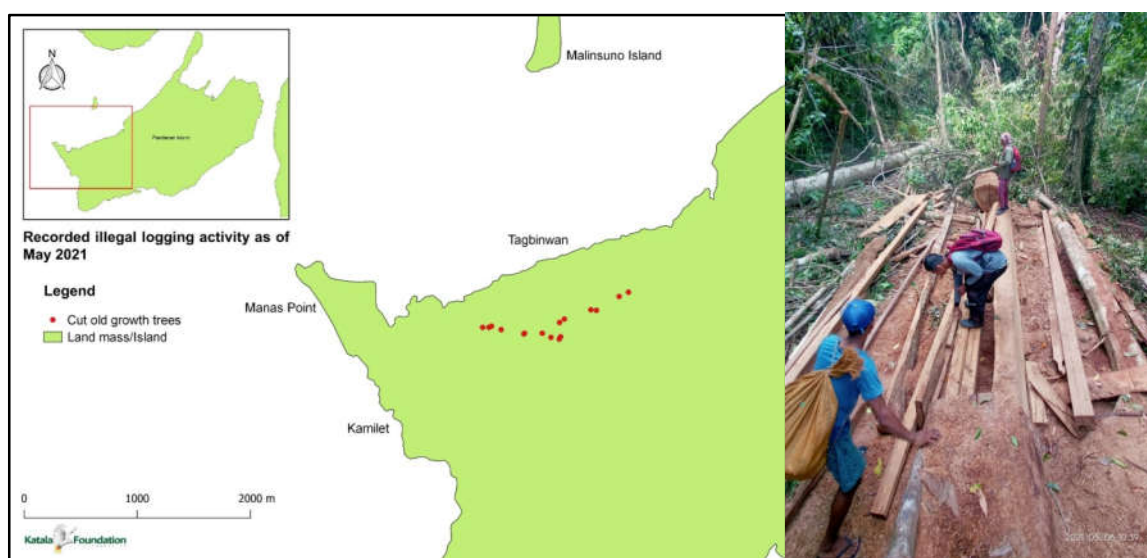


Figure 6. Spatial distribution of cut old growth trees inside Kamilet-Siminnop-Tagbiwan coastal forest (left) and one of cut trees in the area, the tree is identified locally as Bares Tree (Map and Photos: KFI 2021).

On separate monitoring and patrolling conducted by wildlife wardens last May 02, 2021 one new cutting of forest trees was found inside the coastal area of Arananan-Dalahican. The cut tree is situated within the vicinity of active cockatoo nest trees and within the designated timberland based on DENR classification. The cut tree is locally identified as Ugayan and it was cut and sliced into different lumber sizes; no locals or personnel found on site. Eleven pieces of abandoned lumber with a total of 78.55 board feet was documented and confiscated by KFI wildlife wardens. The confiscated lumbers were turned over to and under custody of barangay council of Pandanan (Fig. 7).



Figure 7.Confiscated lumber from Arananan-Dalahican coastal forest (left and upper right) and lumbers transferred to barangay compound of Pandanan for temporary custody (Lower right, Photos: KFI 2021).

F. Camera trap installation and deployment

Two camera traps were installed at known nest trees; one on cockatoo nest and the other on a hornbill nest. This camera helps us monitor presence of predators, possible poacher presence, as well as other wildlife in the area. For ground camera traps installed in Pandanan, most captured footages are daily presence of Long tailed macaque, Southern Palawan red squirrel and Tabon Scrubfowl. While at Bugsuk, footages show the presence of threatened mammal's species namely; Balabac Mousedeer (Fig. 8), Palawan Porcupine and Civet cat. Ground dwelling bird species recorded by camera trap are Nicobar pigeon (Fig. 8), Hooded Pitta, Tabon Scrubfowl and White-vented shama.

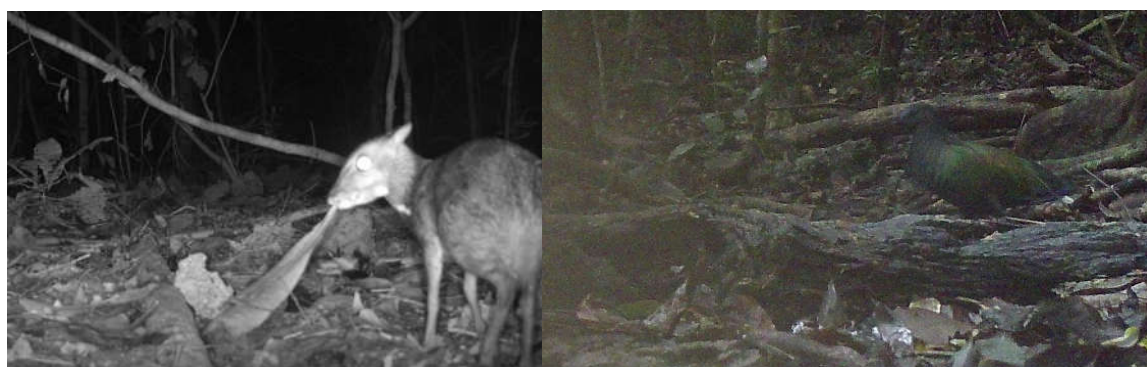


Figure 8. A Balabac Mousedeer feeding on fallen forest tree leaves (left) and Nicobar pigeon feeding on ground (Right; Photos: KFI 2021).

IV. ISSUES, CONSTRAINTS AND RECOMMENDATIONS

Illegal cutting of forest trees in southwestern part of Pandanan particular at Kamilet to Tagbinwan continued and persists. This activity affect most the fauna species in particular the Philippine Cockatoos which are breeding nearby. Two active nests are situated in close proximity and birds are disturbed by chainsaw. This could result to decreasing food providing trees for threatened birds in the area. We ask for a joint monitoring with law enforcement agencies and local government units in coordination with the Jewelmer group.

V. ACKNOWLEDGEMENT

We are indebted to our wildlife wardens for their patience and work: Ismael S. Della Cruz Jr., Deo E. Aplid and Ariel C. Omog. Likewise, we thank our escorts from SCAA, Philippine Army who restlessly secured us every monitoring visit. Thank you very much to the Jewelmer Corporation by providing the KFI team full assistance during every visit in the islands especially to Sir Jacques Christopher Branellec and Ms. Vianney Brossard. We also extend our appreciation to the Council members of Barangay Bugsuk, Council members of Barangay Pandanan and Local Government Unit of Balabac Municipality for making the conservation project more effective and successful.

Thanks to KFI family and board members, J-Kris Gano and PCCP staff for the help, assistance and sharing expertise and ideas.

We are indebted and grateful for the support of the following organizations and agencies for supporting patrols and implementation of our work in Pandanan and Bugsuk, Palawan (logos below):



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