

# COMPLETION REPORT OF ITTO PROJECT

TMT-SPD 017/15 REV.2 (M)

## Improving Sustainable *Pericopsis Elata* Conservation And Trade Regulations In Ghana



## **COMPLETION REPORT**

**Project Number:** TMT-SPD 017/15 REV.2 (M)

**Project Title:** Improving Sustainable *Pericopsis elata* Conservation and Trade Regulations in Ghana

**Host Government:** Ghana

### **Implementing Institution**

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**Starting date:** 01/10/2015

Duration: Eighteen (18) Months

### **The Project Cost**

ITTO	- \$149,997.00
Government of Ghana	- \$36,614.00
Total	- \$186,611.00

### **Collaborating agency (-ies)**

The government of Ghana through the Forestry Commission  
Forestry Commission is the signatory of the Agreement.

### **Project Technical and Scientific Staff**

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Elvis Kuudar – Consultant  
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### **Date and place where the report was issued**

This report was issued on the 30<sup>th</sup> of June 2017 at Accra, Ghana

**Disclaimer**

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## LIST OF ACRONYMS

ATM	Artisanal Millers Groups
CITIES	Convention on International Trade in Endangered Species of Wild Fauna and Flora
CSOs	Civil Society Organisation
DBH	Diameter at Breast Height
DOLTA	Domestic Lumber Traders Association
FAWAG	Furniture and Wood Products Association of Ghana
FC	Forestry Commission
FLEGT	Forest law Enforcement Governance and Trade
FSD	Forest Services Division
GFTN	Global Forest and Trade Network
GoG	Government of Ghana
GREDA	Ghana Real Estate and Developers Association
GTA	Ghana Timber Association
GTMO	Ghana Timber Millers Organization
ITTO	International Timber Trade Organization
KWC	Kumasi Wood Cluster
MLNR	Ministry of Lands and Natural Resources
NDF	Nature and Development Foundation
NGO's	Non- Governmental Organization
<i>P. elata</i>	<i>Pericopsis elata</i>
RMSC	Resource Management Support Centre
TIDD	Timber Industry Development Division
TV	Television
TVD	Timber Validation Department
VPA	Voluntary Partnership Agreement
WAG	Woodworkers Association of Ghana
WD	Wildlife Division
WWF	World Wide Fund for Nature



PLATE 1: *P. elata* tree in Bonkoni forest reserve

## EXECUTIVE SUMMARY

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Many tropical timber species are under serious threat due to over exploitation, adverse environmental condition, unsuccessful conservation and protection. This is due partly to unavailable up-to-date data on vulnerability status of most species, poor successful protection and the lack of conservation information on threatened tree species. If significant and immediate actions are not taken, the potential loss and extinction of timber species will continue to increase with a consequential reduction of the contribution of these tree species to community prosperity and the gene pool. Implementation of the ITTO, TMT-SPD 017/15 Rev.2 (M) titled, “Improving Sustainable *Pericopsis elata* Conservation and Trade Regulations in Ghana” was designed to improve the conservation and market regulation of *P. elata* in and from Ghana. The project achieved its objective of making available current data on the distribution, quantities, habitat and trade on *P. elata* in Ghana by:

**1) Assessing and establishing the conservation status of *P. elata* including its distribution, habitat condition and populations.**

The assessment which was in the form of a study was conducted by the co-ordinator of the scientific authority for CITES in Ghana; (Professor S. K. Opong, of the faculty of Renewable Natural Resources of the Kwame Nkrumah University of Science and Technology). The assessment revealed that, stock density of the species (*P. elata*) is too low (even lower than estimated in the management plans), almost all the forest reserves within the range of the species are in poor conditions and the species stocks have declined with regeneration generally lacking.

**2) Assessment of the market to ascertain whether there is continuous trading of the species in the Ghanaian market.**

The study confirmed that the government has put in place some mechanisms, in addition to CITES requirements, aim at sustainable conservation of the species. Some of these measures are; a higher diameter felling limit of 110 cm DBH, categorization of the species as a restricted timber species thus requiring a prior special permit to harvest the species whenever it is included in a yield allocation. It is noteworthy to state that the Forestry Commission has not issue permit for the harvesting of *P. elata* since 2002. Considering that the Forestry Commission issued any permit for the harvesting of *P. elata* and has not issued CITES certificate for the export of products from the species, the study concluded that, all *P. elata* timber products in or from Ghana are illegal. The study faced challenges in estimating annual volumes traded since those involve were aware of the illegality in trading in the species. Therefore, some interviewees refused to acknowledge their involvement in the trade or under declare the volumes traded. A conservative estimated annual trade volume of the species is 48.74 cubic meters for the last two years. Another important revelation of the study was that, stakeholders’ awareness of the protection status of *P. elata* and the required procedures for its trade is very poor.



### **3) Initiate dedicated country level interventions for the protection of *P. elata*.**

This action delivered through increased visibility and awareness on the species by producing diverse communication toolkits. These included t-shirts, stickers, video documentary and publication of study reports. These communication materials carried information on the conservation and trade status of the species and were disseminated to relevant stakeholders and by airing the documentary on television and uploading onto You Tube ([https://www.youtube.com/watch?v=zwFbN8\\_uRBA](https://www.youtube.com/watch?v=zwFbN8_uRBA)) and Facebook ([https://www.facebook.com/100007236888458/videos/vb.100007236888458/1879948825589662/?type=2&theater&notif\\_t=video\\_processed&notif\\_id=1499427081353568](https://www.facebook.com/100007236888458/videos/vb.100007236888458/1879948825589662/?type=2&theater&notif_t=video_processed&notif_id=1499427081353568) ). Photos of the sticker and t-shirts are included in this report on page 13.

An innovative part of the project was the organization of a one-day Policy-dialogue involving all District Chief Executives within the range of the species, the Forestry Commission and civil society organizations to discuss effective implementation of policies for the conservation of the species, new policies and proposed modification of existing ones. The report of this workshop is attached as annex 4 on page 27.

Implementation of the project spanned for twenty-one (21) months instead of the eighteen months originally scheduled. This was due to the suspension of project activities for three months due to the financial difficulties experienced by ITTO within that period. However, the expansion of project duration did not bring additional cost to the ITTO.

The publication of the findings of the studies represents an essential information to the government and other stakeholders. Indeed, within the project period and due principally to the engagement and awareness created, the government of Ghana has initiated allocated funding under its Forest Investment Program to finance the establishment of plantations or enrichment planting of the species within its range. It can therefore be said that, overall, the project objective has been achieved. It is therefore submitted that an opportunity for Phase II which will concentrate on supporting enrichment planting, engagement with private plantation developers to plant the species as part of the requirement to maintain 10 percent of the land under indigenous tree cover. The other areas will be research and communications.



**PLATE 2: Bole of *P. elata* tree in Mpameso Forest Reserve**

## 1.0 PROJECT IDENTIFICATION

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### 1.1 Context

Ghana has forests that are rich with timber tree species. However, some of the species are currently under serious threat of extinction caused by various disturbance and habitat encroachment in their natural range. The lack of awareness on importance of sustainable management of the species and its contribution to community welfare and national economy has also contributed to this threat. The increased threat to the survival of the species has also been due to dereliction of basic management duties of monitoring and collecting up-to-date information on forest resources especially on species that have been precariously exploited over the years. It is important to note that *P. elata* is currently the most threatened commercial timber species in Ghana because of historical unsustainable exploitations and the demand for the beautiful timber from the species.

*P. elata* (Afromosia or Krokodua) wood is very strong and very durable. Beside its durability and strength properties, the heartwood has yellowish dark veins, which turns dark brown on exposure

and this makes the texture very beautiful. The wood (trade names: Afromosia, Assamela, Kokrodua) is highly valued on the international market, mainly for furniture and as decorative veneer, but also for interior and exterior joinery, stairs, flooring and boat building. It is considered a substitute for teak. It is also suitable for heavy and light construction, railway sleepers, vehicle bodies, interior trim, handles, ladders, agricultural



**PLATE 3: Planed Lumber of *P. elata***

implements, sporting goods, musical instruments, toys, novelties, boxes, crates, carvings, turnery and draining boards. In traditional medicine in Congo pulped bark is rubbed into scarifications as an anodyne.

Increasing demand for the species caused accelerated logging activities including illegal logging. This has caused its population to decrease greatly making it difficult to find in natural forests. It has therefore become imperative to take immediate action to reduce the pressure on the remaining population of species and to enhance conservation gains with respect to the species. For, a loss of the species from Ghana represents a significant loss of biodiversity and the wealth of the nation.

As Natural Resources specialists and with longstanding engagement with industry and government, Nature and Development Foundation (NDF) recognised the danger to the survival of the *P. elata*. The project was therefore initiated as part of the organization's effort of promoting sustainable forest management and protection of biodiversity. During this engagement, it became apparent that the relevant authorities do not have appropriate recent data on the conservation status of *P. elata* and lack market information on its trade. This project was therefore seen as a precursor for establishing the current conservation status and market information on the trade of *P. elata* in Ghana and was in response to the urgent need for conservation status and trading information on the species.

The project covered selected natural forest across the high forest zones in Ghana comprising Ashanti, Brong- Ahafo, and Western regions. Parts of these Administrative regions of Ghana coincide with the geographic range of *P. elata*, that is, the Dry Semi-deciduous forest type. In terms of policy and trade in respect to the species, all actions were nationwide since trade in timber is not restricted to a region.

## 1.2 Origin and Problem

This project was borne out of Nature and Development Foundation's (NDF) longstanding engagement with the Forestry Commission of Ghana, the timber industries and other stakeholders where it was revealed, during the review of forest management plans for forest reserves that, there are few standing trees of *P. elata* within its range in the country. It was also clear during that engagement with the Forestry Commission that current knowledge of the status of the species *in situ* as well as associated trading of it are not available.

Although there was no official trading information on the species, visits to and discussion with some timber companies and wood depots around the forest regions of Ghana indicate some level of trading in the species. In addition, Civil Society organizations and communities



**PLATE 4: Alone standing *P. elata* on a farm at Goaso**

have called on the Forestry Commission to strengthen the protection of forest resources and to provide better information and data that will facilitate the contribution of other non-state actors in the fine- and course-grained protection of forest and species. For example, a National Forest Forum communiqué presented to the Minister of Lands and Natural Resources and encouraged the

Ministry to, as a matter of urgency, develop favourable framework for better management of forest resources through close collaboration with communities.

*P. elata* is one of the few commercial timber species listed under Appendix II of CITES, meaning trading in this species is not permitted without special authorization by the relevant authorities of the exporting country. Ghana is one of the countries where this species occurs in commercial quantities and is heavily logged because of its highly valued timber. Since being listed as CITES Appendix II species, it has been classified as a restricted species for harvesting in Ghana. Besides this classification, nothing more has been done to protect the species. The major problem with respect to the management of *P. elata* is the inadequate data on distribution, conservation and trade of the species in Ghana. This is a problem that is due to the non-assessment of the in-situ conservation status of, non-assessment of market and trade status of, and the lack of dedicated initiative for, the protection of the species. The non-assessment of the conservation and market and trade status of *P. elata* are contributed to by the inadequate monitoring regimes as well as the low scientific capacity to undertake such monitoring. In terms of lack of a dedicated initiative to provide quality data and to save the species from local extinction, there is literally no public awareness of the need to save the species and to be choosy in harvesting and removal of trees. There is also the case of inadequate policy engagement with the sector Ministry and the Forestry Commission to design target projects on *P. elata* as a result of the lack of information and statistics, which are essential for advocacy and meaningful dialogue. Such engagement is paramount for the authorities to take policy measures to ensure in situ regeneration as well as a possible ban on its harvesting.

*P. elata* is a victim of over-exploitation and consumption mainly for its precious wood. Although Ghana has not reported any official export of the species in recent times, the lack of conservation assessment and lack of market studies coupled with low public profile of the species means that, government cannot develop any effective regulatory measures to protect the species from being harvested or traded. Thus, the species might be exported under different trade names or traded in the domestic market. Such an attitude to species conservation has the potential to lead to complete local extinction, a phenomenon that represents loss of valuable genetic resources.

## 2.0 PROJECT OBJECTIVES AND IMPLEMENTATION STRATEGY

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In Ghana, *P. elata* is threatened by excessive logging and has been classified as a restricted species. However, since its classification, there has been lack of conservation assessment and lack of market studies coupled with low public profile of the species. This means that government cannot develop any effective regulatory measures to protect the species from over-exploitation or prevent potential trading under different trade name label. It was therefore imperative that to advance any conservation and protection measures, some critical information on the species needed to be generated. The intervention was therefore in response to this need and the importance of capacity building on market intelligence and improved data.

### 2.1 Objective

The project had a development objective to improve the conservation and market regulation of *P. elata* in and from Ghana and a specific objective to make available current data on the distribution, quantities, habitat and trade on *P. elata* in Ghana. It was expected that, by the end of the project, data on conservation and trade of *P. elata* will be made available. Non-detrimental finding report as well as trade report would be produced and presented to the Forestry Commission.

### 2.2 Implementations strategy

To meet the expectations and achieve the objective, the project adopted collaborative and participatory approaches involving Forestry Commission, Faculty of Renewable Natural Resources Management, the Ministry of Lands and Natural Resources, CSOs, Timber Industry and other stakeholders. Essentially, the implementation approach and methods included the following:

**Strategic partnerships:** This project brought together NDF, Forestry Commission, Timber Industry Associations in a strategic collaboration. In addition, the project ensured the usage of media tools and representatives to help reach a wider stakeholder base. This partnership brought together capacity, expertise and networks that delivered on the project objective and reached relevant stakeholders in the forest sector of Ghana.

**Synergies with other projects:** The project built upon NDF long standing relationship with civil society, timber industry, forest authorities of Ghana with respect to forest governance, conservation and responsible trade. It benefited and complemented allied projects such as:

- i) KWC/WWF/Form International FAO funded project “Preparation of a training centre to support FLEGT implementation and the adoption of Sustainable Forest Management practises in Ghana and the West African Region”,
- ii) WWF/NDF ITTO funded project entitled “empowering civil society organizations and other non-state actors to effectively contribute to forest law compliance in Ghana”
- iii) WWF GFTN publication entitled “Exporting in a shifting legal landscape” (<http://gftn.panda.org/resources/tools/?193890/Exporting-in-a-Shifting-Legal-Landscape>).

- iv) WWF GFTN project on “facilitating compliance with EU Timber Regulation and FLEGT in Ghana, Liberia and Cote d’Ivoire.
- v) WWF GFTN experience in developing guidance for responsible forest management (GFTN guide for Responsible Purchasing of Forest Products) and legal compliance (GFTN Keep It Legal guide).
- vi) EU grant projects supporting participation of national civil society organizations and national private sector federations/entities in FLEGT-VPA related activities (Europe Aid/133760/L/SV/GH).
- vii) GTMO/ITTO Project TMT-SPD 012/12 Rev.1 (M) titled “Improving Intra-African Trade and Market Transparency in Timber and timber Products.

Some of these projects were closed before the start of the intervention. However, the experiences shared were critical for avoiding petty mistakes but allowed the project team to learn from the organizations that implemented those projects. Those that were concurrent to the projects became essential for avoiding duplicative effort and were advantage for engagement of the state institution with respect to *P. elata*.

**Capacity building:** The critical capacity building approaches that were adopted in the implementation of the project included the training of about 30 field staff of the Forestry Commission on the identification and conservation of *P.elata* and conservation measures adopted by field staff during inventory processes (see Activity 1.4 below). The other capacity building and training that was carried out the project was the policy dialogue workshop that brought Local Government Authorities, Forestry Commission and Civil Society together to discuss the adequacy or otherwise of existing policies for the conservation and trade regulation of *P.elata*.

**Awareness Raising and Communication:** Expanding the impact of the project requires that innovative communication were adopted to reach many people as much as possible. In view of this, the project produced varied communication toolkits targeted at different audience to bring information on the species to the people who matter. This included the production of t-shirts with appropriate inscription, stickers with appropriate inscription, video documentary and broadcasting of same and publication of research findings.

During project implementation, further involvement of relevant stakeholders was assured through the organization of an inception workshop that presented and discussed the goals and objectives of the project and established areas of common interests for collaboration.

## 3.0 PROJECT PERFORMANCE

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### 3.1 Specific Objective

The specific objective pursued by this project was to make available current data on the distribution, quantities, habitat and trade on *P. elata* in Ghana. This was achieved through the implementation of the following activities and outputs.

### 3.2 Outputs and related activities

#### **Output 1: Conservation status of *P. elata* including its distribution, habitat condition and population assessed and established.**

The essence of this output was to deliver current statistics on the distribution, quantities and status of *P. elata* as well as their habitat conditions in relation to their conservation. To attain this output, the under listed activities were considered and carried out;

#### ***Activity 1.1 Engage the Scientific Authority to lead and guide non- detrimental findings on P. elata***

The scientific authority for Ghana was engaged as consultant to undertake the studies on the distribution, population dynamics and conservation status of *P. elata* in Ghana. This was done in consultation with the Forestry Commission to avoid dispute with the study findings when completed and presented. The involvement of the Forestry Commission in the selection of the consultant for the study was also to forge acceptability and collaboration in implementing findings and recommendation that would emerge from the study. The Scientific Authority was engaged for a period of four months (February to May 2016) to specifically carry out the under listed terms of reference:

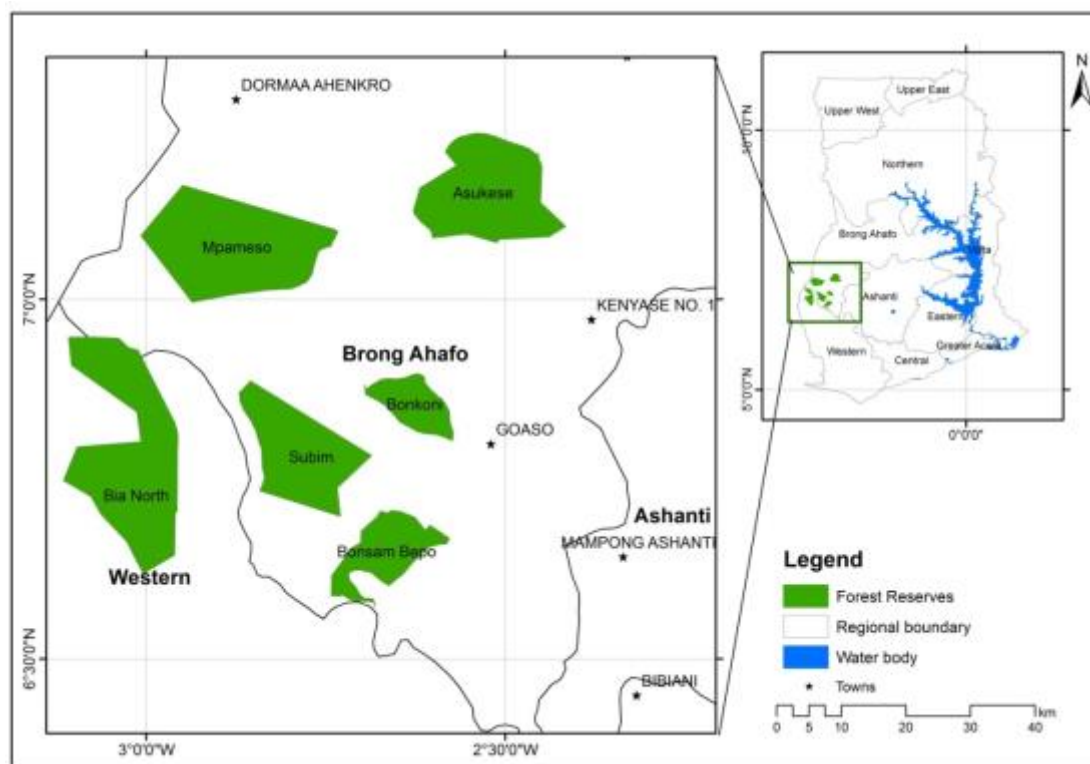
- i. In collaboration with NDF, FSD, RMSC and WD, identify and select forest area for the study. This involved the identification and selection of forest reserves where *P. elata* can be found.
- ii. Plan, organize and undertake surveys on *P. elata* habitat conditions, distribution, quantities and status.
- iii. Develop and present complete research findings (report on the survey with major analysis on the current status and distribution patterns of *P. elata* in Ghana) to NDF.
- iv. Prepare and make a presentation of the final research findings in a stakeholder's workshop to be organized by NDF as a way of sharing the results of the research on the status of *P. elata* to stakeholders.
- v. Develop and submit a report detailing all works done (the entire consultancy).

#### ***Activity 1.2 Identify and select forest areas for study***

This involved the identification and selection of forest areas where *P. elata* could be found. This was done by the consultant (the Scientific Authority) in collaboration with NDF through desk review and interviews with Forestry Commission officials. The consultant had several



informal interviews and formal discussions with staff of the Resource Management Support Centre (RMSC) of the Forestry Commission to acquire knowledge about areas (forest reserves) to select for the study. The selection was based on probability of encountering the species when a search is conducted. The table below shows the reserves selected and the associated forest districts. In all, six (6) forest reserves and twenty-seven (27) compartments were visited for the study.



**Figure 1: Study area**

**Table 1: Forest Reserves Selected for the study**

Forest Reserve	Forest District
Bia North Tributaries	Juabeso
Bonkoni	Goaso
Subim	Goaso
Bonsambepo	Goaso
Mpameso	Dormaa-Ahenkro
Asukese	Sunyani

**Activity 1.3 Undertake surveys on *P. elata* habitat conditions, distribution, quantities and status**

The Scientific Authority engaged in activity 1.1 above undertook the survey. This involved planning, logistics arrangement and field visits to collect data on *P. elata* in the selected forest areas. The data collection was done through field visits and interviews with field workers of the Forest Services Division (FSD) and tree spotters of timber firms operating in the forest districts visited. The findings of this studies were very interesting and formed Chapter 2 of the Publication sent as a separate document to ITTO.



**PLATE 5: Researchers measuring *P. elata* in the field**

**Activity 1.4 Build capacities of authorities in the identification, recording and management of *P. elata***



**PLATE 6: Participant making a submission during the training session**

Workshop on the identification, protection and conservation of *P. elata* was organized to build capacity of forest field staff such as range supervisors, forest guards, and stock survey team members within the range of *P. elata* in Ghana. The training was to enable them to identify the species in the field and in the open market when mislabelled by timber vendors or companies. The training was also to abreast participants on the conservation status of the species as well as share

with them, the study reports to enable them to join in the quest to protect the species from extinction in Ghana.

**Output 2: Market and trade status of *P. elata* including value chain, volumes and level of knowledge of its endangered status evaluated.**

The following activities were carried out to achieve the above stated output;

**Activity 2.1 Identify, Select and Engage market study consultant.**

The project team engaged an expert to undertake market study of *P. elata* including its possible trade in the local market, overland export and other channels. The expert was engaged for a period of four (4) months to undertake studies to establish the current statistics on trade volumes and trade chain of *P. elata*. He was also to evaluate trade regulations mechanisms instituted and their effectiveness in maintaining sustainable trade, assess the level of knowledge of market players on the protection status of *P. elata* and the required procedures in its trade. Specifically, the consultant was to carry out the following actions:

- i. In collaboration with NDF, TIDD and DOLTA, identify representative trade actors and market centres to collect trade data of *P. elata* in Ghana.
- ii. Plan, organize and undertake *P. elata* market survey to establish the value chain, trade volumes and level of knowledge of its protective status.
- iii. Develop and design tools and mechanisms that will ensure regular data collection in routine trade patterns in the future for suggestion to the Forestry Commission.
- iv. Develop and present a complete research finding (report on the survey with major analysis on the current trading and marketing patterns of *P. elata* from and within Ghana) to NDF.
- v. Present final research findings in a stakeholder's workshop to be organized by NDF as a way of sharing the results of the research findings on the trade status of *P. elata*.
- vi. Develop and present a report detailing all works done

**Activity 2.2 Identify traders and market chain of *P. elata* in Ghana**

A search to identify credible sources of data was undertaken in consultation with the FC. This involved the identification of market players within the trade chain (from the forest floor to the consumer) of *P. elata*. Stakeholders (interviewees) for the study were selected based on their roles and experiences in *P. elata* trade chain either as statutory authorities, trade associations, timber traders, timber companies, and/or civil society actors. Markets for the study were selected to span across the Western, Central, Eastern, Greater Accra, Ashanti and Brong Ahafo Regions of Ghana based on probability of encountering the species on the market when a search is mounted.

In all, a total of 43 stakeholders made of thirteen (13) FC officials, five (5) timber companies, twenty (20) timber traders and five (5) CSOs in the timber production and trading hubs of Ghana were

interviewed. The timber trading hubs visited were the Accra Agbobgoloshie timber market, Kumasi Sokoban timber market, Koforidua timber market, Takoradi Kokopo timber market, Mankessim timber market, Techiman timber market and Sunyani timber market.

**Activity 2.3 Plan, organize and undertake *P. elata* market survey to establish the value chain, trade volumes and level of knowledge of its protective status.**



**PLATE 7:A local timber market at Techiman in the Brong Ahafo region of Ghana**

This involved development of questionnaire, logistics arrangement and market visits to collect trade data on *P. elata* at identified timber dealers in the market. The survey was done through desk review and interviews with Forestry Commission officials and timber traders. Data was gathered from NDF, RMSC, TIDD, Wildlife Division, FSD, CSOs/NGOs,

DOLTA and experience individual wood workers and traders. The sources of information searched included TIDD quarterly reports, information on concession areas where *P. elata* is found, yield allocation on *P. elata*, information on CITES certificates issued, and interviews with vendors at markets where *P. elata* trade could be found. An essential part of the findings of the study formed Chapter 3 of the publication sent as a separate document to ITTO

**Activity 2.4 Organize stakeholder workshop to share the research findings on the conservation and trade status of *P. elata***

As a mechanism to ensure that stakeholders are informed of the results of the survey and to provide an avenue for verifying the accuracy of the findings of the survey and facilitate discussion on the possible reasons for the said findings, a one-day validation workshop was organized for stakeholders on 11th August 2016 at the Miklin Hotel, Accra. The workshop had the following objectives;

- To present the major findings of the Market and Habitat Condition studies on *P. elata*
- Get feedback from the stakeholders on the study findings.

The workshop brought together stakeholders from the Forestry Commission (FC) of Ghana, Civil Society Organizations (CSOs) and timber traders associations to witness the presentations of the studies and verify the accuracy of the findings. Prior to the day of the workshop, soft copies of the studies reports were sent to participants and encouraged to review the report before the date. In

addition, hardcopies were given to each participant on the day of the workshop to ensure maximum interaction and scrutiny.

Power-point presentation approaches were employed by both consultants to deliver on their research methodology and findings. Each presentation was however followed by interactive session of questions and answers between participants and consultants. Thus, allowing thorough scrutiny of the study findings by stakeholders and giving clarity to the work done by the consultants. In all, there were two presentations covering the habitat, distribution, population dynamics, and conservation status on the one hand and market and trade survey of *P. elata* on the other.



**PLATE 8: Market study consultant delivering presentation at the validation workshop**



**PLATE 9: Prof.S.K. Opong (Co-ordinator-Ghana, scientific authority for CITE) delivering a Presentation at the validation workshop**

### **Output 3: Dedicated country level interventions for the protection of *P. elata* initiated.**

This output delivered communication material and disseminated information on the conservation status and trade of the species as well as ensured engagement of policy makers on the status of the species. This output was accomplished through media engagement, printing and distribution of stickers and workshops for FC officials, private sector timber operators and communities. In detail, the output was achieved by executing the following activities:

#### **Activity 3.1 Design, print, disseminate and publish reports on studies.**

The study report of the two consultancies commissioned in activity 1.3 and 2.3 was published and disseminated to relevant stakeholders. Five hundred (500) hard copies was produced and distributed to relevant authorities (Forestry commission), Timber Trade Associations (DOLTA, GTA, GTMO, FAWAG, etc), relevant academic institutions, Civil Society Organizations and individuals who found the information useful for their works. The publication represent the most recent effort to document research findings on the species and to make such research information available to the public as reference material. Stakeholders were impressed of the quality of work and the positive impact such a publication is likely to have on policy beyond the project duration.

**Activity 3.2 Produce and distribute at least 3500 communication toolkits on conservation and trade status of *P. elata*.**

For the purposes of the workshops, training and to create visibility for the project and project partners, (ITTO and NDF), a roll-up banner with the logos of the project partners and project name was produced and displayed during all functions under the project. In addition, 3000 pieces of bumper stickers with inscription, “Kokrodua Risks Extinction from Ghana & Extinction is forever: Don’t



**PLATE 10: Bumper Sticker**

buy Kokrodua” was produced and distributed. Adding to that, 500 t-shirts with a front inscription, “Say No To Extinction: Don’t Buy Kokrodua” and back inscription, “Be part of the solution: Don’t Buy Afromosia”



**PLATE 11: *P. elata* conservation inscription on t-shirts**

was also produced and distributed amongst relevant stakeholders. Both the stickers and t-shirts also displayed the logos of project partners. The messages inscribed on the stickers and the shirts were arrived at during the validation workshop where findings of the studies were made known to stakeholders.

**Activity 3.3 Hold at least 10 policy engagement meetings with the Forestry Commission and the Ministry of Lands and Natural Resources.**

To ensure the effectiveness and efficiency of activity in attainment of the overall project objective and to maximize efforts as well as resources, the above stated activity was modified into one big policy engagement workshop which received endorsement from ITTO.

The policy workshop was organized on the 15th June 2017 at the Miklin Hotel in Kumasi. The policy workshop aimed at discussing appropriate policies that would safeguard the survival of the species here in Ghana. The following were the more specific focus of the workshop:

- Are the existing policy directives on *P. elata* sufficient to ensure the regeneration of the species?
- What other policy options can be initiated to increase the chances of regeneration of the species?

There were a total of 59 participants representing the Forestry Commission of Ghana, civil society organizations, Domestic Timber Trade Association, Academia and research institutions, individual consultants and media houses. The workshop adopted multiple approaches including presentations, interactive questions and answer sessions and panel discussions.

**Activity 3.4 Produce a short video documentary to aid in advocacy for the protection and sustainable management of *P. elata*.**

One assumption of this project is that, raising the awareness of the public on the status (endangered timber species and almost extinct from Ghana) of *P. elata* will correspondingly raise their interest to protect the species. To create this awareness, a ten (10) minutes video documentary on *P. elata* (conservation status and current state in Ghana) was developed. The documentary contains interviews with key players in the forestry sector of Ghana and first-hand information from some timber traders and work workers. The documentary is aimed at increasing public interest in protecting the species by desisting from purchasing lumber of the species or any of its products.

**Activity 3.5 Broadcast short video documentary on national TV station, You Tube and Facebook.**

In fulfilment of the objective of reaching out and encouraging individuals, businesses and communities to take action and cease felling, harvesting and buying of *P. elata* or its products, the documentary has been played four (4) times on “JOY NEWS” a popularly watched Television channel in Ghana. The documentary has also been shared on Facebook ([https://www.facebook.com/100007236888458/videos/vb.100007236888458/1879948825589662/?type=2&theater&notif\\_t=video\\_processed&notif\\_id=1499427081353568](https://www.facebook.com/100007236888458/videos/vb.100007236888458/1879948825589662/?type=2&theater&notif_t=video_processed&notif_id=1499427081353568)) and You Tube ([https://www.youtube.com/watch?v=zwFbN8\\_uRBA](https://www.youtube.com/watch?v=zwFbN8_uRBA)).

**Activity 3.6 Organize inception workshop for relevant stakeholders**

In accordance with planned activities of the project, an inception workshop was organized on the 14<sup>th</sup> of October 2015 at the Miklin Hotel, Accra. The workshop marked the commencement of implementation of activities under the project. It was also an avenue for stakeholders to be informed about the project and to develop a cohesive understanding of the scope of the project, specific objective, implementation plan, project site location, expected outcomes and to build synergies with on-going effort. Specifically, there were a total of 27 participants representing the Ministry of Lands and Natural Resources, Forestry Commission of Ghana, civil society organizations, Domestic

Timber Trade Association, Academia and research institutions, individual consultants and media houses. Participants to the inception suggested a number of ways to ensure successful implementation of the project including being critical in the identification of training participants and avoid the situation where familiar faces are brought to training workshops. They also pointed out that, RMSC has done some works on the species in terms of distribution, stems and volumes even to the Providence Protected Areas of the species but have not published any of this information. The project was therefore seen as an opportunity for NDF to liaise with Resource Management Support Centre (RMSC) to bring to light issues on the species in Ghana.

### **3.3 Schedule**

The project had been implemented in accordance with the time schedule with slight delay. Originally, the project duration was scheduled for eighteen (18) months thus; starting on October 2015 and should have been completed on 31st March 2017. However, due to some constraints encountered by the ITTO, the project was halted for three (3) months after which implementation continued without additional ITTO funding. The project ended on 30 June 2017. Thus, it spanned for a period of twenty-one (21) months.



## 4.0 PROJECT OUTCOME, TARGET BENEFICIARIES INVOLVEMENT

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### 4.1 Achievements of Project Objectives

The project had a development objective “to improve the conservation and market regulation of *P. elata* in and from Ghana” and a specific objective “to make available current data on the distribution, quantities, habitat and trade of *P. elata* in Ghana”. This action was aligned with the government of Ghana’s policy of sustainable forest management and resource utilization. It also conformed with NDF’s mission of contributing to the complementarities of development and nature conservation.

In pursuance of the above stated specific objective, the project commissioned two important studies. This studies sought to ascertain the conservation status of *P.elata* within its range in Ghana and whether current measures aim at protecting the species are working on the one hand and on the other hand to determine whether there are on-going trading, both domestic market and export, in or from Ghana. These studies made important revelations. First, there are a number of measures put in place by the government of Ghana in addition to the CITES requirements to protect the species from local extinction. Some of these measures include raising of felling limit to 110cm DBH, classification of the species as a restricted timber species, creation of provenance protection of the species and pilot plantation by the Forestry Research Institute of Ghana (FORIG) at Aframso forest reserve. The second revelation of the studies worth mentioning is the point that there is on-going trading of the species in the local market. Although this is illegal, it further highlight the precarious and vulnerable state of the species.

The findings of these studies have been published and distributed to stakeholders as an important reference material on the subject matter. In this respect, it can be said that the project, has made available current information on the habitat conditions of *P. elata* including information on the availability, distribution and quantities in Ghana. This information and data are invaluable to ensure adequate policy responses by forest authorities and also would give civil society organizations and other non-state actors the required evidence to develop advocacy programs with the aim of supporting government in the protection of the species. It thus contributed to the achievement of the development objective of *improving the conservation and market regulation of P. elata in and from Ghana*.

There is inadequate capacity in the identification and recording of *P.elata* by field staff of the Forestry Commission. The project took this into account. A training was organised for about twenty-five (25) field staff, including Forest Guards, Range Supervisors and Technical Officers, of the Forestry Commission within the range districts of *P. elata*. This was to update them on identification, conservation measures and the recording procedure that are required of inventory and monitoring teams and particular with regard to the conservation status of the species.

The training was also important to build capacity to ensure that relevant data on the species are included in management plans for forest reserves where the species occurs. Therefore, current efforts to develop management plans for all the forest reserves by the Government of Ghana in compliance with FLEGT VPA requirements have benefited from the data collected as part of this project. This was essential to sustain efforts in the conservation of the species and to ensure management directives on *P.elata* are reflected on the ground.

Effective advocacy depends on the quality of information available to Civil Society Organizations (CSOs). By logical reasoning, the ability of civil society and other non-state actors to advocate for effective conservation and protection of *P. elata* depends on the availability of quality information on the species within its range. Therefore, the project has provided data on the conservation status of the species and has renewed the interest for CSOs not just on flagship species of fauna, but to pay critical attention to the impacts of irresponsible harvesting and wood removal on the survival of commercial species such as *P. elata*. CSOs have been involved and benefited from dissemination of information produced as part of the project. The project has provided industry and industry associations with a better perspective on the status of *P. elata* and a motivation for the protection and conservation of the species in their concessions. It has also given timber traders in the local markets a good reason to eliminate *P. elata* from their supply chain.

The project has also achieved the output of creating general public awareness. It is understood that to maintain any conservation gains with respect to the protection of *P.elata*, the project must involve the public by advocating for behavioural change in consumption. The project did exactly that. A component of this action produced a ten (10) minute video documentary that is aiding advocacy and public education on the impact of unsustainable logging and trade in the species and the likely consequence of causing its local extinction in Ghana. It was broadcasted on national Television station and uploaded on NDF pages on Youtube and facebook. This has in turn exerted pressure on authorities to embark on enrichment planting of the species within its catchment area. Although the impact is difficult to quantify or measure, it is our estimate that more than 2 million Ghanaians have been reached and influenced by the documentary considering the listenership of the TV station and the times it was broadcasted, that is, 9pm on Fridays for three weeks. The project also produced 3000 stickers and 500 save *P. elata* branded t-shirts and is estimated to influence additional 50,000 Ghanaians.

#### **4.2 Target Beneficiaries Participation**

A number of organisations, institutions and bodies participated in the project implementation. During the implementation of the project, the Faculty of Renewable Natural Resources of the Kwame Nkrumah University of Science and Technology participated actively through the Scientific Authority for CITES for Ghana. He conducted the in-situ conservation studies on the species while a freelance consultant conducted the market study. The Forestry Commission participated in and

contributed to the selection of forest reserves and markets to conduct the study. The Commission also selected field staff that were trained on the identification and recording of data on *P. elata*. In addition, other institutions including industry and civil society organizations participated in the project implementation by participating in training and workshops organized under the project. The Ministry of Lands and Natural Resources (MLNR), Industry (Timber traders and associations) and Civil Society Organizations (CSOs) participated through the provision of data and information on conservation efforts and trading in the species that have been carried on in their jurisdiction.

The project had a number of stakeholders. These were broadly categorised as below and were so recognised during implementation of the project.

- *Trade/Industry Associations,*

The trade/industry associations comprise Ghana Timber Association (GTA), Ghana Timber Millers Organization (GTMO), Furniture and Wood Products Association of Ghana (FAWAG), Woodworkers Association of Ghana (WAG), Ghana Carpenters Association, Artisanal Millers Groups (ATM), Estate Developers, Sokoban Wood Village, Domestic Lumber Traders Association (DOLTA), Ghana Real Estate and Developers Association (GREDA) etc. These stakeholders basically work with timber and wood; they are responsible for harvesting the timber, processing, trading and final consumption. The success of protecting *P. elata* depends on how well these entities are managed and coordinated. They were contacted predominantly during the market survey and they gave great information. They were also invited to the validation workshop where results of the studies were shared and again to the policy engagement workshop to seek their views on how well the species can be protected against extinction in Ghana.

- *Government (Forestry Commission),*

This stakeholder group is comprised of Timber Validation Department (TVD), Timber Industry Development Division (TIDD), and Forest Services Division (FSD), the Wildlife Division (WD), all under the FC of GoG. These institutions have the mandate to develop and manage the forestry sector including the industry and trade associations. The FC is directly responsible for implementing actions that will not risk the status of protected species such as *P. elata*. The action assisted and provided available up to date data on *P. elata* in Ghana which they can utilize for forest planning and operations. The forestry commission was involved in the formulation of this project, subsequently endorsed it on behalf of the government of Ghana and actively participated in the implementation right from inception workshop through to the validation workshop and contributed immensely in the policy engagement meeting.

- *Ministry of Lands and Natural Resources*

The Ministry of Lands and Natural Resources is the overall body responsible for policy formulation and monitoring of the forestry sector of Ghana. The Ministry has the responsibility of developing policies that impact on the sustainability and trade of *P. elata* in Ghana. The project has made available to the ministry current data on *P. elata* in Ghana to serve as evidence to guide formulation of policies to protect the species. The ministry was keenly involved throughout the project implementation.

### **4.3 Sustainability**

It is desirable that project activities are well designed so that the outcomes are sustainable. By sustainability, it meant the mainstreaming of project outcome into government development or sector plans so that the outcome and results are sustained beyond the project life. With this in mind, the project was designed in conformity with a number of forestry sector plans and programmes. Some of these programmes and plans of the forestry sector which are in conformity with the project are as follows:

1. The project is in conformity with the government of Ghana's administrative policy which designated *P. elata* as a restricted species. Hence, findings from the project will be very instrumental in informing the government whether to relax regulations on the species or further restrain overexploitation of the species.
2. The project produced information on the habitat conditions of the species including information on the availability, distribution and estimated quantities in Ghana. This baseline data is invaluable for sustainable policy on maintaining the conservation gains with respect to *P. elata*. This is in line with and would inform the government's own initiative which has resulted in the non-allocation of *P. elata* in harvestable yield to concession holders. Further, the baseline data would be very instrumental to the government of Ghana's efforts of establishing *P. elata* on small scale enrichment plantings, taungya and direct plantations. Again, current effort to develop management plans for all the forest reserves by the Government of Ghana as a compliance with FLEGT VPA requirement will benefit from the data collected as part of this project, thus such management plans will incorporate interventions for the conservation of *P. elata*.
3. This action has also built the capacity of scientific and management staff of the CITES authorities in respect to the collection and analysis of data on the species in Ghana. Such capacity building is indispensable not only in respect to *P. elata* but also in monitoring the status of all other CITES species as well as in using tools for collecting relevant data. Similarly, the action has greatly contributed to meeting the aspirations of the government of Ghana to build national capacity for accurate accounting and timely collection of resource production and utilization data to be linked up with macroeconomic data.

4. The action has contributed to addressing the information gap on the threat to the sustainable management of *P. elata* in Ghana by raising public awareness and interest on the species. A component of this action has produced 8-10-minute video documentary that is aiding advocacy and public education on impact of unsustainable logging and trade in the species and the likely consequence of causing its local extinction in Ghana. This has in turn placed pressure on authorities to develop policy for saving and regenerating the species. Precisely, the government itself has started some small plantations and enrichment planting of the species within its ranges.

The organization of stakeholder workshop to share results of the research (conservation and trade status of *P. elata*) corresponds with strategic direction of the country's forest and wildlife policy which seeks to support the uptake and dissemination of information to improve the management of forest and wildlife resources.

## 5.0 THEMATIC PROGRAMME

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### 5.1 Assessment and Analysis

The project rationale as stated in the project document, including stakeholders and problem analyses, was in line in with the existing situation during the beginning of project implementation.

Study of the in-situ conservation and market status revealed no new information but confirmed our fears that; there are negligible conservation gains with respect to the species in Ghana despite being listed under CITES Appendix II and additional classification as restricted species by the government of Ghana. Project implementation received considerable support from all related stakeholders, especially the scientific authority for CITES in Ghana, the Forestry Commission and trade/ timber industry association. These stakeholders have been involved in all workshops conducted by this project and have given their views on management and conservation strategy for the species.

The project was based on the rationale that, the major problem with respect to the management of *P. elata* is the inadequate data on distribution, conservation and trade of the species in Ghana. It was also envisaged that, the problem was due to the non-assessment of the in-situ conservation status of, non-assessment of market and trade status of, and the lack of dedicated initiative for, the protection of the species. This action therefore conducted studies on the distribution, population dynamics, conservation, and market and trade status of the species and made available current data on the distribution, conservation and trade status of the species here in Ghana to all relevant stakeholders.

The non-assessment of the conservation and market and trade status of *P. elata* was seen to have been contributed to by the inadequate monitoring regimes as well as the low scientific capacity to undertake such monitoring. The project therefore provided the needed logistics and built the capacities of relevant personnel to enable them carry out monitoring on the species with the requisite resources.

It was also suggested that, the lack of a dedicated initiative to provide quality data to save the species from local extinction, was fuelled by literally no public awareness of the need to save the species and to be choosy in harvesting and removal of trees. The project therefore developed stickers, branded t-shirts and a ten minutes video documentary on the species and the fact that it risks extinction in Ghana. These communication toolkits advised the general public to be selective in their purchase of wood and desist from buying lumber or products of *P. elata*. However, due to budgetary constraints, the documentary was only aired few times and stakeholders suggested that, adequate budget ought to be provided for such approaches to allow for extensive engagement with the general public in order to achieve the behavioural change that we seek.

There was also the case of inadequate policy engagement with the sector Ministry and the Forestry Commission to design target projects on *P. elata* as a result of the lack of information and statistics, which are essential for advocacy and meaningful dialogue. This action saw such engagement as paramount for the authorities to take policy measures to ensure in situ regeneration as well as a possible ban on harvesting of the species.

The project adopted multiple implementation approaches including strategic partnership, synergies with other projects, capacity building approaches, field study, training and workshop and awareness raising campaign. Evaluation reports indicated that some of the approaches including training and workshop should have enough training days to allow enough time for interaction and exhaustion of the subject matter of training.

At the tail end of project implementation, the project team realized that there would be value and more could be achieved should one big policy workshop be organised (with all stakeholders sitting around the table) instead of having separate meeting with each of the stakeholders. To correct this activity, a request was made to ITTO for change in activity and adjustment of the budget which was granted. This allowed for smooth implementation of the project. Aside this slight modification, the remaining project activities remained relevant in the context of project objective and time.

## 6.0 LESSONS LEARNED

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### 6.1 Development lesson

The project idea fitted perfectly well with the government of Ghana policy of sustainable forest management and resource utilization. The project therefore set ambitious targets to get the conservation and trade statistics of *P. elata* published and disseminated to relevant stakeholders and increase public interest on conservation of *P. elata*. Indeed, the production and broadcasting of documentary, the dissemination of the public awareness toolkits were among the strategies to get the government of Ghana to develop initiative(s) to eliminate potential export and local trade of the species by the end project implementation period. In light of that, recent data and information on the distribution, population dynamics and conservation status as well as the trade and market status of *P. elata* in Ghana has been obtained, published and disseminated. Based on the data, relevant stakeholders/authorities can formulate policy options and or immediate actions to prevent further threat to extinction of the species.

In addition, 3000 communication toolkits in the form of stickers, branded t-shirts and a ten minutes video documentary has been produced, distributed and aired to increase public awareness on the species and its threatened status. In addition to the above, the policy engagement workshop drafted conservation strategy and action plan for the protection of *P. elata*. However, it should be noted that the formulation is still at preparatory levels as development and implementation of initiatives by government requires ample time, thus, making the period of project implementation inadequate to fully realize government initiatives on eliminating both domestic and export trade in the species.

The project had a total budget including counterpart funding of \$186,611.00, for the entire project period. Specifically, the ITTO cost on the project was \$149,997.00 and the Government of Ghana (counterpart) cost was \$36,614.00

It was recognised that the project was short in both duration and quantum of funding. However, stakeholders stated that the project has been instrumental in putting pressure on government to initiate processes for a long lasting conservation of the species. This is so because, the government through the Ministry of Lands and Natural Resources and the FC have allocated some funding for enrichment planting and establishment of pilot plantations of the species within its range. Government through the RMSC has also initiated move to collect coordinates of all *P. elata* stands in the country. This, according to the Officer in-charge is to ensure easy monitoring and protection of the species.

In terms of project design, it was thought that more concentration should be paid to forest field staff (forest guards, range supervisors and stock survey team members) and local community members within the range of *P. elata* as well as timber industry associations since they live and work closer to



the forest. The project assumed that, training participants will utilize the knowledge gained from the training to combat every form of trading (i.e. domestic trading or mislabelled for international export) within the species. However, there are other factors of logistics, beyond the scope of this project, which are necessary to ensure that participants put their knowledge into effective use to stop all forms of trading in the species and enhance local protection of *P. elata*. They include technological gargets to collect evidence, vehicles to visit the field, among others. Inadequate funding from government to forestry commission is of importance in militating against the effectively utilization of training outcomes.

## **6.2 Operational Lessons**

Project Organization and management was successfully carried out and there were almost no challenges with management. After the first year of project implementation, flow of funds from the ITTO was challenged and this resulted in the halting of project implementation for a three-month period. The break in implementation can therefore be ascribed as the major hiccup experienced during the cause of implementation. This project was implemented on behalf of the government of Ghana. As such, almost all activities, especially those that involved public awareness such as stickers and video documentary, had to be done with the expressed approval of the content by government of Ghana. Within the period of the project implementation, the project team had to request for modification of an activity and the associated budget to ensure effective activity implementation and efficient budget allocation.

## 7.0 CONCLUSION AND RECOMMENDATION

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### 7.1 Conclusion

The project evolved from Nature and Development Foundation (NDF) longstanding engagement with the Forestry Commission of Ghana, the timber industries and other stakeholders where it was revealed, during the review of forest management plans for forest reserves, that there are few standing trees of *P. elata* within its range in the country. It was also clear during that engagement with the Forestry Commission that current knowledge of the status of the species *in situ* as well as associated trading of it were not available. The project was therefore aimed at making available current data on the distribution, quantities, habitat and trade on *P. elata* in Ghana as a response to urgent need for conservation status and trading information on the species. The stakeholders consulted in the development and implementation processes were adequate for and contributed to the achievement of the project aim.

The project was designed to benefit specifically Forestry Commission, trade/ industry associations and other non-state actors by making available to them, current data on the conservation and trade status of *P. elata* in Ghana. Consequently, the general public was engaged to be a part of the solution and help to save *P. elata* from being extinct in Ghana. This was because results from studies conducted revealed that, there are negligible conservation gains with respect to the species in Ghana despite CITES Appendix II restricted species status classification.

The project also went further to engage policy makers based on the findings of studies conducted and deliberated on policy options that can be considered to protect the *P. elata* from local extinction in Ghana. The project was also successful in getting the government itself to start some plantations and enrichment planting of the species within its range.

### 7.2 Recommendations

Results from the studies conducted on the species conservation and trade status implicated that, there is currently unknown export of the species from Ghana through both formal and informal channels. Thus; CITES is working but is not enough to ensure proper conservation of the species here in Ghana. In addition, domestic trading has replaced formal export and the worsening condition of the forest reserves has direct impact on the regeneration of the species hence the following recommendations;

1. Investigations should be carried out in the phenological patterns and fertility of the species
2. The history of *P. elata* populations and why regeneration is problematic in its natural distribution areas should be researched
3. The genetic variation and spatial genetic structure of *P. elata* should be examined
4. Regular monitoring of plant densities and estimates of wood volumes of the species must be carried out
5. The project should be replicated on other endangered species.

In addition to the above, there is evidence that, the species risks extinction from Ghana hence, plantation trials should be established to identify affordable and effective enrichment methods to reverse the current situation. It is imperative from this project that a Phase II will be desirable to ensure increased impact and a long lasting awareness.

Responsible for the report

Name: Mustapha Seidu

Project Co-ordinator

Date: 30<sup>th</sup> June 2017.

## **8.0 ANNEXES**

### **8.1 Annex 1: Cash flow for the project**

**PROJECT FINANCIAL STATEMENT**

Project No. TMT-SPD 017/15 REV.2 (M)  
 Project Title: IMPROVING SUSTAINABLE PERICOPSIS ELETA CONSERVATION AND TRADE REGULATIONS IN GHANA

Period ending on 4/20/2017

Component	Original Amount (A)	Modified Approved Amount (A)	Expenditures To-date			Available Funds (E) { A - D }
			Accrued (B) a/	Expended (C)	Total (D) { B + C }	
<b>I. Funds managed by Executing Agency</b>						
10. Project Personnel				\$0.00	\$0.00	\$0.00
10.10 National Experts (long term)				\$0.00	\$0.00	\$0.00
10.3 Project Coordinator	\$36,000.00			\$36,000.00	\$36,000.00	\$0.00
10.4 Project Driver	\$2,700.00			\$2,700.00	\$2,700.00	\$0.00
10.5 Finance and Administrative	\$11,316.00			\$11,316.06	\$11,316.06	(\$0.06)
<b>10.6 Component Total:</b>	<b>\$50,016.00</b>			<b>\$50,016.06</b>	<b>\$50,016.06</b>	<b>(\$0.06)</b>
20. Sub-contracts					\$0.00	\$0.00
20.10 Consultant (Scientific Authority) to lead and guide non-detrimental findings	\$10,000.00			\$10,000.00	\$10,000.00	(\$0.00)
20.20 Consultant to undertake market study of pericupsis elata	\$8,000.00			\$8,000.00	\$8,000.00	\$0.00
20.30 Facilitation and Reporting on workshops	\$3,000.00		\$0.00	\$3,129.41	\$3,129.41	(\$129.41)
20.40 Design, Printing & Publishing of reports	\$2,280.00			\$1,930.47	\$1,930.47	\$349.53
20.50 Distribution of Published report	\$0.00			\$0.00	\$0.00	\$0.00
20.60 Production of communication toolkit	\$3,500.00			\$3,129.41	\$3,129.41	\$370.59
20.70 Development of documentary for advocacy for protection and sustainable management of pericupsis elata	\$3,000.00			\$3,273.81	\$3,273.81	(\$273.81)
20.80 Broadcasting of Documentary	\$3,000.00			\$3,000.00	\$3,000.00	\$0.00
<b>20.90 Component Total:</b>	<b>\$32,780.00</b>		<b>\$0.00</b>	<b>\$32,463.10</b>	<b>\$32,463.10</b>	<b>\$316.90</b>
30. Travel, meetings & Workshops						
31. Daily Subsistence Allowance for at least 2 staff for 20 days within country	\$4,000.00			\$3,986.27	\$3,986.27	\$13.73
30.1 lunch and snacks for policy engagement meetings with authorities	\$0.00			\$0.00	\$0.00	\$0.00
30.2 Vehicle rentals for Mission and Studies	\$3,000.00			\$3,000.00	\$3,000.00	\$0.00
30.3 Fuel for field trips and Missions	\$3,000.00			\$2,725.24	\$2,725.24	\$274.76
30.4 Air tickets	\$0.00			\$0.00	\$0.00	\$0.00
30.5 Workshop meals and refreshments	\$3,900.00			\$4,672.43	\$4,672.43	(\$772.43)
30.6 Transportation for participants	\$9,520.00			\$9,881.35	\$9,881.35	(\$361.35)
30.7 Accommodation for 50 participants outside of the venue city	\$3,000.00			\$2,998.38	\$2,998.38	\$1.62
30.8 Venue for workshops and Training	\$900.00			\$983.85	\$983.85	(\$83.85)
30.9 Workshop logistics	\$100.00			\$109.75	\$109.75	(\$9.75)
30.10 Media for Publicity and visibility enhancement of the project and Donors	\$400.00			\$423.21	\$423.21	(\$23.21)
<b>30.11 Component Total:</b>	<b>\$27,820.00</b>		<b>\$0.00</b>	<b>\$28,780.48</b>	<b>\$28,780.48</b>	<b>(\$960.48)</b>
40. Capital Items						
40.10 Laptop/Computer equipment	\$1,000.00		\$0.00	\$892.86	\$892.86	\$107.14
<b>40.20 Component Total:</b>	<b>\$1,000.00</b>		<b>\$0.00</b>	<b>\$892.86</b>	<b>\$892.86</b>	<b>\$107.14</b>
50. General Office Expenses						
50.10 Telephone and Internet	\$200.00		\$0.00	\$193.45	\$193.45	\$6.55
50.20 Office rent	\$9,000.00			\$9,000.00	\$9,000.00	\$0.00
50.30 Office Supplies	\$400.00			\$124.92	\$124.92	\$275.08
<b>50.40 Component Total:</b>	<b>\$9,600.00</b>		<b>\$0.00</b>	<b>\$9,318.37</b>	<b>\$9,318.37</b>	<b>\$281.63</b>
60. Miscellaneous						
60.10 Sundry	\$0.00			\$0.00	\$0.00	\$0.00
60.20 Audit Costs	\$3,000.00		\$3,000.00	\$0.00	\$3,000.00	\$0.00
60.30 Contingencies	\$0.00			\$0.00	\$0.00	\$0.00
<b>60.40 Component Total:</b>	<b>\$3,000.00</b>		<b>\$3,000.00</b>	<b>\$0.00</b>	<b>\$3,000.00</b>	<b>\$0.00</b>
70. National Management Costs						
70.10 Executing Agency Management Costs				\$0.00	\$0.00	\$0.00
70.20 Focal Point Monitoring				\$0.00	\$0.00	\$0.00
<b>70.30 Component Total:</b>				<b>\$0.00</b>	<b>\$0.00</b>	<b>\$0.00</b>
<b>Sub-Total:</b>	<b>\$124,216.00</b>		<b>\$3,000.00</b>	<b>\$121,470.87</b>	<b>\$124,470.87</b>	<b>(\$254.87)</b>
80. Project Monitoring & Administration						b/
80.10 ITTO Monitoring and Review	\$0.00					b/
82. ITTO Mid-term and Ex-post Evaluation	\$0.00					b/
83. ITTO Programme Support Costs(12% on items 10 to 82 above)	\$0.00					b/
83. Donor Monitoring Costs	\$0.00					b/
<b>89. Component Total:</b>	<b>\$0.00</b>					<b>b/</b>
90. Refund of Pre-Project Costs (Pre-Project Budget)	\$0.00					b/
Sub-Total:	\$0.00		\$0.00	\$0.00	\$0.00	\$0.00
<b>100. GRAND TOTAL:</b>	<b>\$124,216.00</b>		<b>\$3,000.00</b>	<b>\$121,470.87</b>	<b>\$124,470.87</b>	<b>(\$254.87)</b>

Note: Budget Components are those detailed in the Project Document.

- a/ The **Cash Flow Statement must be completed first**, before the input into the Financial Statement.
- b/ Accrued expenditure: expenditures incurred during the reporting period, but not yet settled.
- c/ Amounts under the "Expended" column will be imported from the Cash Flow Statement (with direct link).

## **8.2 Annex 2: Financial statement for the project**

**PROJECT CASH FLOW STATEMENT**

Project No. TMT-SPD 017/15 REV.2 (M)

Period ending on: 20/04/17

Project Title: IMPROVING SUSTAINABLE PERICOPSIS ELETA CONSERVATION AND TRADE REGULATIONS IN GHANA

Component	Reference	Date	Amount			
			in US\$	Local Currency 1st	Local Currency (2nd )	Local currency Total
<b>A. Funds received from ITTO:</b>						
1. First instalment	\$3.36	9/25/2015	\$79,990.00	GHC 268,766.40	GHC 0.00	GHC 268,766.40
2. Second Instalment	\$4.25	2/6/2017	\$43,926.00	GHC 0.00	GHC 186,685.50	GHC 186,685.50
3. Third instalment				GHC 0.00	GHC 0.00	GHC 0.00
4. Fourth instalment				GHC 0.00	GHC 0.00	GHC 0.00
ETC.				GHC 0.00	GHC 0.00	GHC 0.00
Total Funds Received:			\$123,916.00	GHC 268,766.40	GHC 186,685.50	£455,451.90
<b>B. Expenditures by Executing Agency:</b>						
10. Project Personnel						
11. National Experts (long term)						
10.3 Project Coordinator			\$36,000.00	GHC 80,640.00	GHC 51,000.00	GHC 131,640.00
10.4 Project Driver			\$2,700.00	GHC 6,048.00	GHC 3,825.00	GHC 9,873.00
10.5 Finance and Administrative			\$11,316.06	GHC 25,347.97	GHC 16,031.09	GHC 41,379.06
<b>19. Component Total:</b>			<b>\$50,016.06</b>	<b>GHC 112,035.97</b>	<b>GHC 70,856.09</b>	<b>GHC 182,892.06</b>
20. Sub-contracts						
20.10 Consultant (Scientific Authority) to lead and guide non-detrimental findings			\$10,000.00	GHC 33,600.01	GHC 0.00	GHC 33,600.01
20.20 Consultant to undertake market study of pericopsis elata			\$8,000.00	GHC 26,879.99	GHC 0.00	GHC 26,879.99
20.30 Facilitation and Reporting on workshops			\$3,129.41	GHC 4,032.00	GHC 8,200.00	GHC 12,232.00
20.40 Design, Printing & Publishing of reports			\$1,930.47	GHC 0.00	GHC 8,204.50	GHC 8,204.50
20.50 Distribution of Published report			\$0.00	GHC 0.00	GHC 0.00	GHC 0.00
20.60 Production of communication toolkit			\$3,129.41	GHC 0.00	GHC 13,300.00	GHC 13,300.00
Development of documentary for advocacy for protection and sustainable						
management of pericopsis elata			\$3,273.81	GHC 11,000.00	GHC 0.00	GHC 11,000.00
20.80 Broadcasting of Documentary			\$3,000.00	GHC 0.00	GHC 12,750.00	GHC 12,750.00
<b>29. Component Total:</b>			<b>\$32,463.10</b>	<b>GHC 75,512.00</b>	<b>GHC 42,454.50</b>	<b>GHC 117,966.50</b>
30. Travel, meetings & Workshops						
Daily Subsistence Allowance for at least 2 staff for 20 days within country			\$3,986.27	GHC 10,611.00	GHC 3,520.00	GHC 14,131.00
30.1 lunch and snacks for policy engagement meetings with authorities			\$0.00		GHC 0.00	GHC 0.00
30.2 Vehicle rentals for Mission and Studies			\$3,000.00	GHC 7,056.00	GHC 3,825.00	GHC 10,881.00
30.3 Fuel for field trips and Missions			\$2,725.24	GHC 7,310.00	GHC 2,336.00	GHC 9,646.00
30.4 Air tickets			\$0.00	GHC 0.00	GHC 0.00	GHC 0.00
30.5 Workshop meals and refreshments			\$4,672.43	GHC 6,717.96	GHC 11,360.40	GHC 18,078.36
30.6 Transportation for participants			\$9,881.35	GHC 15,002.00	GHC 23,020.00	GHC 38,022.00
30.7 Accommodation for 50 participants outside of the venue city			\$2,998.38	GHC 4,359.00	GHC 7,229.50	GHC 11,588.50
30.8 Venue for workshops and Training			\$983.85	GHC 2,008.00	GHC 1,641.50	GHC 3,649.50
30.9 Workshop logistics			\$109.75	GHC 28.00	GHC 431.00	GHC 459.00
30.10 Media for Publicity and visibility enhancement of the project and Donors			\$423.21	GHC 789.50	GHC 800.00	GHC 1,589.50
				GHC 0.00	GHC 0.00	GHC 0.00
				GHC 0.00	GHC 0.00	GHC 0.00
<b>39. Component Total:</b>			<b>\$28,780.48</b>	<b>GHC 53,881.46</b>	<b>GHC 54,163.40</b>	<b>GHC 108,044.86</b>

40. Capital Items						
40.10 Laptop/Computer equipment			\$892.86	GHC 3,000.00	GHC 0.00	GHC 3,000.00 GHC 0.00
<b>49. Component Total:</b>			<b>\$892.86</b>	<b>GHC 3,000.00</b>	<b>GHC 0.00</b>	<b>GHC 3,000.00</b>
50. General Office Expenses						
50.10 Telephone and Internet			\$193.45	GHC 650.00	GHC 0.00	GHC 650.00
50.20 Office rent			\$9,000.00	GHC 20,160.00	GHC 12,750.00	GHC 32,910.00
50.30 Office Supplies			\$124.92	GHC 419.73	GHC 0.00	GHC 419.73
				GHC 0.00	GHC 0.00	GHC 0.00
				GHC 0.00	GHC 0.00	GHC 0.00
<b>59. Component Total:</b>			<b>\$9,318.37</b>	<b>GHC 21,229.73</b>	<b>GHC 12,750.00</b>	<b>GHC 33,979.73</b>
60. Miscellaneous						
60.10 Sundry				GHC 0.00	GHC 0.00	GHC 0.00
60.20 Audit Costs				GHC 0.00	GHC 0.00	GHC 0.00
60.30 Contingencies				GHC 0.00	GHC 0.00	GHC 0.00
<b>69. Component Total:</b>			<b>\$0.00</b>	<b>GHC 0.00</b>	<b>GHC 0.00</b>	<b>GHC 0.00</b>
70. National Management Costs						
71. Executing Agency Management Costs				GHC 0.00	GHC 0.00	GHC 0.00
72. Focal Point Monitoring				GHC 0.00	GHC 0.00	GHC 0.00
				GHC 0.00	GHC 0.00	GHC 0.00
<b>79. Component Total:</b>			<b>\$0.00</b>	<b>GHC 0.00</b>	<b>GHC 0.00</b>	<b>GHC 0.00</b>
Total Expenditures To-date:			\$121,470.87	GHC 265,659.16	GHC 180,223.99	GHC 445,883.15
Remaining Balance of Funds (A-B):			\$2,445.13	GHC 3,107.24	GHC 6,461.52	GHC 9,568.75

- Notes:
- (1) Amounts in U.S. dollars are converted using the average rate of exchange when funds were received by the Executing Agency.
  - (2) Amount of expenditures in US dollar should be the same as amount shown in column (C) of the Financial Statement (exported with direct link from the Cash Flow Statement).
  - (3) Submit bank reconciliation statement along with the bank statements to support the remaining balances/funds in the Cash Flow Statement.



### **8.3 Annex 3: Report on Policy Engagement Workshop**

# **Improving Sustainable *Pericopsis elata* Conservation and Trade Regulations in Ghana**



## **Report on Policy Engagement Workshop on the Conservation of *Pericopsis elata***

**15<sup>th</sup> June 2017**

**POLICY ENGAGEMENT WORKSHOP REPORT**

**“IMPROVING SUSTAINABLE *PERICOPSIS ELATA* CONSERVATION  
AND TRADE REGULATION IN GHANA”**

**PROJECT SPONSORED BY ITTO**



**IMPLEMENTED BY, NATURE AND DEVELOPMENT FOUNDATION  
(NDF) IN GHANA**



**Report written by:**

**Deborah Baiden & Abena Woode**

## **LIST OF ABBREVIATIONS AND ACRONYMS**

CITIES	Convention on International Trade in Endangered Species of Wild Fauna and Flora
DCE	District Chief Executive
FC	Forestry Commission
FSD	Forest Services Division
FLEGT	Forest Law Enforcement, Governance and Trade
MCE	Municipal Chief Executive
NDF	Nature and Development Foundation
P. elata	Pericopsis Elata
ITTO	International Timber Trade Organization
IUCN	International Union for Conservation of Nature
RMSC	Resource Management Support Centre

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## 1.0 INTRODUCTION

### 1.1 Background

*Pericopsis elata* (Afromosia) produces one of the highest commercial valued timbers of the moist semi-deciduous African forest. However, because of decades of excessive logging; it is now considered as threatened and listed on the IUCN Red List under CITES appendix II. This means there cannot be commercial export trade in the species without a CITES certificate from the authorized agency. Accordingly, Ghana has not issue permit for harvesting of the species in a very long while. Nevertheless, there is little information on its regeneration, growth dynamics and stocks within its range in Ghana as well as trading information on the species.

This project is borne out of Nature and Development Foundation's (NDF) longstanding engagement with the Forestry Commission of Ghana, the timber industries and other stakeholders where it was revealed, during the review of forest management plans for forest reserves that, there are few standing trees of *Pericopsis elata* within its range in the country.

Funded by the ITTO (International Tropical Timber Organization); Nature and Development Foundation (NDF) with the aim to make available current data on the distribution, quantities, habitat and trade on *Pericopsis elata* in Ghana have carried out studies on the distribution, conservation and trade of the species in Ghana. NDF has also built the capacity state monitoring officers to enable them undertake periodic monitoring of the species and make available current data on the species.

The project "Improving Sustainable *Pericopsis elata* Conservation and Trade Regulation in Ghana" when completed will contribute to strengthen conservation statistics on *Pericopsis elata* in Ghana through publication of the research findings on distribution, quantities, habitat conditions, conservation and trade status of the species.

In the course of the project implementation and as part of project activities, NDF deemed it necessary to meet with policy makers and stakeholders to ensure there is appropriate governmental policy in response to the current threat posed to the survival of the species here in Ghana. Hence NDF organized this policy engagement workshop to discuss with stakeholders and stakeholders.



## 1.2. Workshop Objective

The policy workshop aimed at discussing appropriate policies that would safeguard the survival of the species here in Ghana. The following were the more specific focus of the workshop:

- Are the existing policy directives on *P. elata* sufficient to ensure the regeneration of the species?
- What other policy options can be initiated to increase the chances of regeneration of the species?

## 1.3. Date and Venue

The policy workshop was organized on the 15th June 2017 at the Miklin Hotel Conference Room in Kumasi.

## 1.4 Workshop Attendance

The workshop brought together relevant stakeholders from civil society organizations, government, industry and the media to deliberate on the most commercially endangered timber species in Ghana; *Pericopsis elata*. Specifically, there were a total of 59 participants representing the Forestry Commission of Ghana, civil society organizations, Domestic Timber Trade Association, Academia and research institutions, individual consultants and media houses. The workshop adopted multiple approaches including presentations, interactive questions and answer sessions and panel discussions.

## **1.0 WORKSHOP PROCEEDINGS**

### **2.1 Opening and Welcoming address**

Mr. Mustapha Seidu opened the meeting by welcoming all participants. He explained that *Pericopsis elata* species for which we have all gathered is distributed across Cote D'Ivoire, through Ghana and can also be found in Cameroon. He said in Ghana, the species can be found in the moist semi deciduous through to the dry semi deciduous zones – around Goaso, Bechem, Dormaa-Ahenkro, Sunyani, Sefwi Wiawso and Nkawie Forest districts. He also explained that this is the reason why stakeholders from these areas were invited for this workshop. He charged all present to participate fully in a bid to conserve the species.

#### **2.2.1 Donor Awareness**

Acknowledgement of the donor (ITTO) was the first and a special feature of the project presentation. The Director of NDF (Mr Seidu) took time to further bring into recognition the crucial role of ITTO (donor) in the project, aside the display of the ITTO logo on his presentation slides and the rollout banner which had been produced for the project.

#### **2.2.2 CITES**

Presenting on the sustainable conservation of *P.elata* in Ghana, the director of NDF, Mr. Mustapha Seidu refreshed participants on CITES (the Convention on International Trade in Endangered Species of Wild Fauna and Flora). He said that, it is an international agreement between governments which aims to ensure that, international trade in specimens of wild animals and plants does not threaten their survival. Some notable CITES Appendix species in Ghana are: Chimpanzee, Bear-headed rockfowl, African Manatee, Leopard, African elephant, *Pericopsis elata* (Afromosia) and *Cedrella odorata*.

#### **2.2.3 Relevance to Ghana's Policies**

The project is in line with Ghana's policies as it fits into Strategic Direction 5.1 of Ghana Forest and Wildlife policy which support the uptake and dissemination of information built on indigenous and scientific knowledge to improve on the management of forest and wildlife resources. Also, the project is in alignment with Strategic Direction 5.3 which seeks to Support Research and Development to enhance efficiency in the wildlife industry. In summary, this project is in line with the aspiration of the government of Ghana to build national capacity for





accurate accounting and timely collection of resource production and utilization of the resource data to be linked up with macroeconomic data.

#### **2.2.4 Scope of the Project**

The project will focus on the *in situ* and market survey of the species and in turn create public awareness of the status of the species and engage policy makers on the species. All of which are believed, will contribute to the management of the high forest zone of the country.

### **3.0 SUSTAINABLE CONSERVATION OF *Pericopsis elata* (Afromosia) IN GHANA BY MUSTAPHA SEIDU**

Exploitation of *Pericopsis elata* for international export is estimated to have started in the 1940s. As at 1992, the species was listed in CITES appendix II as an endangered species. Last yield allocated to the *P. elata* species was somewhere in 2001. However, it is now uncommon due to over logging (economic extinction) and loss of habitat through wildfire.

The beauty of this species is its own victim as it is unmatched by other species. It is now classified as a restricted species together with other threatened species. There have been isolated attempts to establish plantations previously by FORIG and recently by Forest Investment Program. He explained that this workshop seeks to bring all relevant stakeholders to brainstorm on policies on the conservation of the species.

### **4.0 PROPOSED POLICY ACTIONS FOR THE CONSERVATION OF *Pericopsis elata* BY MR. AFFUM BAFFUOR**

Studies suggest that despite the restriction and ban on harvesting and trading in the species, they are still spotted on the local domestic timber market. Most of these species on the local market are mislabeled.

Without enough education semi processed species are not easily identifiable on the market by the law enforcement agencies – police, Military, Customs and some FC staff.

Some corrupt FC staff, Timber companies and other law enforcement agencies connive to illegally trade in the species.

Currently measures to control illegal logging in general is ineffective. The FC does not have specific measure to track down illegal harvesting and trade in *P. elata* on the local market. There are also no specific and effective measures to track, verify, arrest and prosecute offenders

Recommended refinement of current policies:

1. **Law enforcement:** The FC should form a special monitoring team tasked with the enforcement of trade in all listed species under L.I 1649, IUCN Red list, CITES and other conventions and treaties to which Ghana is a signatory

2. **Public education:** Sustained public awareness creation and education using various media against illegal trade in *P. elata* targeted FC officials, Timber Companies, Timber traders and Civil Society
3. **Tracking devices:** Exploration and development of DNA coded devices/mechanisms for the identification of *P. elata* wood products along our roads and in the domestic market
4. **Plantation and Enrichment Planting:** Embark on establishment of plantations of *P. elata* and enrichment planting across the home regions of the species and intensify raising of seedlings and/ or research on reproduction/propagation so that it could be included among species earmarked for indigenous species plantation development / enrichment planting in the numerous forest enhancement programs in Ghana.
5. **Training:** Continue training on identification of the species at various developmental stages (seedling, sapling, pole, mature) among all stakeholders (FC staff, farmers, fringe communities, and selected NGOs)
6. **Create a database:** Currently, information on locations as well as the general phenological status of the species within the species home range is lacking. FC should place as a premium to include it in all forest inventories (stock surveys, special purpose inventories etc.) the following:
  - a. Reserve name
  - b. compartment No.
  - c. co-ordinates of the tree
  - d. diameter
  - e. Phenological Status (fruiting, flowering, seeding etc.)
  - f. Develop a Database at RMSC of the above information for monitoring

## 5.0 DISCUSSION

There were discussions on the need for Forestry Commission to task a special monitoring unit to ensure enforcement of laws and regulations, provide detailed information in all forest inventories such as reserve name, compartment number, coordinates of the tree, diameter, phenological status (Fruiting, flowering, seeding, etc.) and develop a database with this information. There is the need to use the generated information to continue training among all stakeholders (FC, Farmers, Fringe communities and some selected NGOs)

Also discussed was the need to generate information and continue training on identification of the species at the various developmental stages (seedlings, sapling, pole, mature, etc.), locations, phenological status and establishment of plantations of *P. elata*.

With plantations of such species there is the need to intensity rising of seedlings, research on propagation methods and enrichment planting of the species across the home regions. There is also the need to include *P. elata* among species that are earmarked for planting in the numerous forest enhancement programs.

The following questions were raised during the discussion section:

1. How does one identify if a tree is a restricted species?

*Response:* Restricted species in forestry are about 16 (Mahogany, Iroko, Opepe, Hyedua, etc.) and the reason for classifying these trees as restricted species is because they have been over exploited and there is the need to regulate them. There is a special way of regulating these species. In Ghana two species namely Afromosia and Rosewood are put under CITIES to prevent further logging and these species are not to be traded but for the other restricted species not under cites can be traded only when a permit is being granted by an authorized agency. Cities species either Afromosia or Rosewood are under restriction but allowed to be logged if there is assurance of a CITIES permit. But depending on the ecology and number of species present at the time of harvesting, a contractor can be denied access to log the species. Before Kokrodua can be harvested, there is the need to understudy the laws and regulation guiding the species, what you ought to do and not. Currently a procurement policy is being made to guide all government sectors, loggers, contractors to help prevent over logging of *Pericopsis elata*.

2. Is this forum large enough to propagate the message about conserving *Pericopsis elata*?

*Response:* Though not a large forum but publication of the report concerning this workshop will serve as a source of information for both the government and forestry commission to help enforce the laws regulating Afromosia.

3. What are the modalities that in country put in place when a species is enlisted under CITIES appendix II?

*Response:*

- Any species whether flora or fauna under cities appendix ii before it could be logged and traded, CITIES must certify it.
- An annual Felling quota is going to be introduced in all forest districts and assemblies as a way of regulating the tree species. But CITIES need to agree with it before it could be implemented.

4. In terms of law enforcement what's the way forward to help conserve this species?

*Response:* Implementation of laws both locally and nationally is very difficult, as forest managers, district and municipal assemblies' executives, we all must come together to help in the enforcement of the laws governing the tree species.

5. What kind of plantation are we recommending in helping reduce over exploitation of the tree species?

*Response:* most indigenous species do not thrive under monoculture, to identify the sort of plantation which will favor *P. elata* more research need to be done. Enrichment plantation in their natural environment should be encouraged because monoculture planting leads to adverse diseases which will not be favorable to *P. elata* because of its environmental conditions.

6. In terms of law enforcement agency what can the government and fc do differently to protect *P. elata*?

*Response:*

- Everybody should get involve both the government and forestry commission to help curb the extinction of *Pericopsis elata*.
- Politicians are sort of threat to Forestry Commission staff, we must be judgmental in decision making to be able to protect the tree species.
- Nationwide education on the laws governing the species.
- Every check point should have technological devices to track illegal timber logs.
- Seek assistance of DCE and MCE to collapse illegal sawmill millers.

## 6.0 RECOMMENDATIONS

Stakeholders advised;

- Collapsing of wood villages which are practicing illegal wood logging.
- Enforcement of the regulation of this species should be ensured.
- Sacred grooves should be protected.
- Public awareness of the benefit of the forest should be done.
- Forestry Commission and the government should come together with a strategy to preserve *P. elata*.
- Special tracking using technological advances by putting certain devices on trees to track illegal logging.
- Forest Service Divisions should educate their forest guards on the identification of *Pericopsis* within each compartment.
- Once we identify any stem of *P. elata* we must find the compartment of it within the reserve, coordinates and status should be kept in a strong data base to help in easy harvesting and seed collection.
- Research on the propagation of *P. elata*.
- Mapping out all *Pericopsis elata* when identified with their coordinates to help in assessment.
- Commitment of forest staffs will help solve the protection of *Pericopsis elata*.
- More restricted measures should be put on board.
- The police, forest staffs, government should come together to fight for the protection of *P. elata*.
- Provenance areas and the reserve should be protected to help in seed collection and easy identification.
- Synchronism with FLEGT mobile tracking systems should be encouraged.

- DCE and MCE should make good use of the whooping funds of the forest revenue for development funds to develop our communities and help conserve our tree species in our forest.
- The greater part of plantation is mostly done by Forest Services Division; during plantation government should take the ecology aspect of the species into consideration to help produce more extinct tree species.



## 7.0 CONCLUSION

In all 6 Policy options were proposed: Law enforcement, Public education, Tracking devices, Plantation and enrichment planting, Trainings and Database creation. Topics discussed with the group present included more efforts from Government to enact laws to be enforced on the conservation of *Pericopsis elata*, increase education through various media against illegal trade and on the need to regulate the trade of *P. elata*.

The workshop was successfully attended by MCEs, DCEs, industry players from the Forestry Services Division, Forestry Commission officers within the Moist Semi deciduous forest zone in Ghana, reps from Coalitions such as DOLTA, DOGMA, FAWAG, GTMO and the media was a vibrant team with fruitful discussions.

## ANNEXES

### Annex 1: List of participants

Name	Organization	Destination	contacts	email address
Nicholas K. Awuku	FC/FSD	Bechem	0244940746	<a href="mailto:nickyawuku@gmail.com">nickyawuku@gmail.com</a>
Samuel Mawutor	Civic Response	Accra	02446852432	<a href="mailto:smawutor@gmail.com">smawutor@gmail.com</a>
Elizabeth Sarpong	Atwima Nwabiagya	Nkawie	0244184300	<a href="mailto:abenaanimapoh@yahoo.com">abenaanimapoh@yahoo.com</a>
Samuel Frimpong	CIOB	Kumasi	0209858726	<a href="mailto:sfrimpong88@gmail.com">sfrimpong88@gmail.com</a>
Martin Obeng	DCE, Sunyani West	Odomasei Sunyani	0209319769	<a href="mailto:martikobeng71@gmail.com">martikobeng71@gmail.com</a>
Yaw Osei Boahen	MCE, Asunfo North	Goaso	0244137266/0202088144	<a href="mailto:yoseiboahen@yahoo.com">yoseiboahen@yahoo.com</a>
Obed Owusu-Addai	Civic Response	Accra	0203800800	<a href="mailto:obed@civicresponsegh.org">obed@civicresponsegh.org</a>
Francis Y. Opoku	FC/TIDD	Takoradi	0242111181	<a href="mailto:francisopoku40@yahoo.com">francisopoku40@yahoo.com</a>
Frederick K. Yeboah	FC/FSD	Sefwi Wiawso	0244411094/0200845636	<a href="mailto:fredericky469@gmail.com">fredericky469@gmail.com</a>
George Owusu	DOLTA	A/R	0243318649	<a href="mailto:georgeowusu295@yahoo.com">georgeowusu295@yahoo.com</a>
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## Annex II: Program Outline



### POLICY WORKSHOP ON CONSERVATION OF AFROMOSIA

**Date:** 15<sup>th</sup> June, 2015

**Venue:** Miklin Hotel, Nhyiaeso

#### PROGRAM

No.	Item	Time (duration)
1	Arrival and registration of participants	9.00 – 9:30
2	Welcoming address & purpose of gathering	9.30 – 9:45
3	Presentation on the project	9.45 – 10:15
<b>COFFEE BREAK</b>		<b>10:15 – 10:30</b>
4	Presentation on Policy options	10:30 – 11:10
5	Question Time	11.10 – 11:20
6	Group Discussions	11.20 – 12.20
7	Group presentation and Questions	12:20 – 1:00
8	Lunch & Departure	1:00

*Facilitator; Abena Wood*

*Wishing you a fruitful program*

### **Annex III: Power Point Presentations**

1. Sustainable Conservation of *Pericopsis elata* (Afromosia) in Ghana
2. Proposed Policy Actions for the Conservation of *Pericopsis elata*



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*Pericopsis elata* in Ghana

# Sustainable conservation of *Pericopsis elata* (Afromosia, Kokrodua) in Ghana

Mustapha Seidu

Nature and Development Foundation

15<sup>th</sup> June 2017

# Content

1. Some uniqueness about Kokrodua
  2. Historical facts about the species
  3. Why we initiated this project on the species
  4. Why we are here today
- 





*Pericopsis elata* in Ghana

"If we've learned any lessons during the past few decades, perhaps the most important is that preservation of our environment is not a partisan challenge; it's common sense. Our physical health, our social happiness, and our economic well-being will be sustained only by all of us working in partnership as thoughtful, effective stewards of our natural resources."

— **Ronald Reagan**

# Uniqueness of the species

- *Pericopsis elata* (Kokrodua) is a large tree
- The bark is conspicuous, smooth, brownish grey to grey, peeling off naturally leaving bright red-brown patches hence Kok(r)o dua, red tree by F.R Irvine (Woody plants of Ghana).



# Uniqueness of the species

**Distribution:** Ivory Coast, Ghana, Cameroon and Congo.

**The timber:** A victim of its own beauty, unmatched by other species

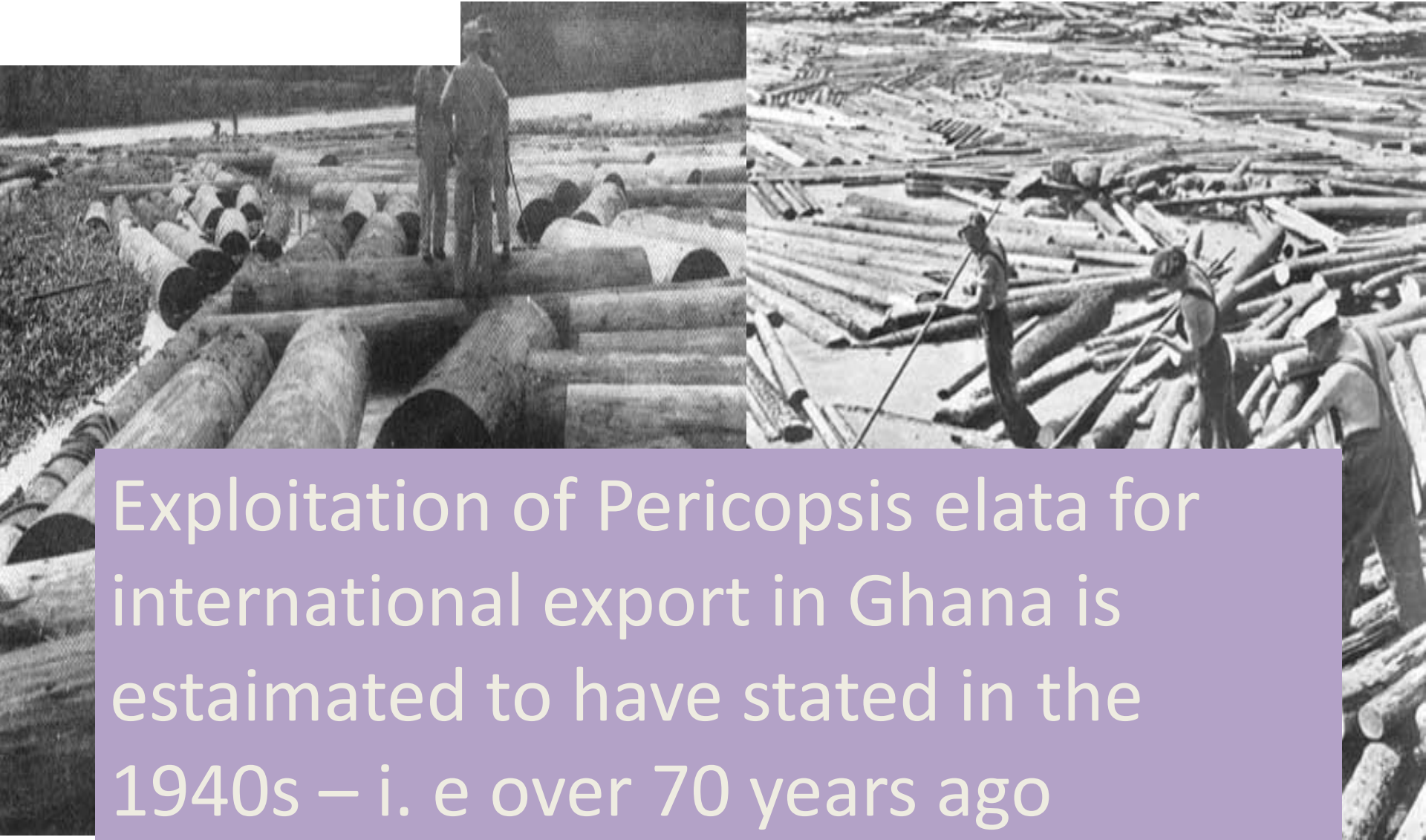
**Status in Ghana:** It is now uncommon due to over-logging (economic extinction) and loss of habitat through wildfire...(I will return to this point later)

# Uniqueness of the species...where found in Ghana?

- Goaso Forest District (Subim and Bia-Tano Forest Reserves)
- Bechem Forest District
- Dormaa – Ahenkro Forest District (Mpameso Forest Reserve)
- Sunyani Forest District (Asukese Forest Reserve)
- Sefwi Wiawso Forest District
- Nkawie Forest District

# Early 1940s

*Pericopsis elata* in Ghana



Exploitation of *Pericopsis elata* for international export in Ghana is estimated to have started in the 1940s – i. e. over 70 years ago



*Pericopsis elata* in Ghana

# Some historical events

1948

- Commercial exploitation and export perhaps to Europe

1966

- Exported 28,200 m<sup>3</sup> Afromosia from Ghana

1975,

- Export of logs of Afromosia was banned in 1975
- Felling limit set at 110 cm DBH (before or after 1975)

1992-

- Listed in CITES Appendix II in 1992
- Last yield allocation of Afromosia was somewhere in 2002



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*Pericopsis elata* in Ghana

# After enlistment in Appendix II of CITES

- What does enlistment in appendix II of CITES mean?
- Classified as restricted species together with other threatened species
- Isolated attempts of establishment of plantation eg by FORIG and recently under the Forest Investment Program



*Pericopsis elata* in Ghana

# What necessitated the project

## Questions rather than answers

- What is the current knowledge of the status of the species *in situ* as well as associated trading?
- Has the enlistment helped to improve the conservation status of the species?
- Are there on-going trading in the species, both local and export?
- Are the existing policies enough to save the species from local extinction?



# We are not government but we complement government...

- No law on species specific protection in Ghana ....  
**However, by the letter and spirit of the Law governing forestry....**



- Section 2(1) of the Forestry Commission Act 1999, Act 571, FC is responsible for the ..., the conservation and management of those resources and the co-ordination of policies related to them”
- Section 18 (k) of Timber Resources Management Act 1998, Act 547: ...empowers the Ministry to make regulation prescribing species of trees considered "depleted", "threatened," "endangered" or "economically extinct" and specifying the conditions under which they may be felled;

# Restricted species protection

**LI 1649**

## **Regulation 40—Restricted Timber Species**

(1) The species of timber specified in Schedule 6 to these Regulations shall not be felled except under a special permit issued by the Chief Conservator of Forests with the approval of the Forestry Commission.



Microsoft Word Document



(2) A person who contravenes subregulation (1) commits an offence.  
(any convictions?)

# In an attempt to answer some of the questions posed above...

1. Distribution, population dynamics and conservation status of *Pericopsis elata* (Afromosia) in Ghana
2. Domestic timber consumption and conservation of *Pericopsis elata* (Afromosia) in Ghana

# The resulting publication



## **Conservation of *Pericopsis Elata* (*Afromosia*) in Ghana: *Evidence from the Field***





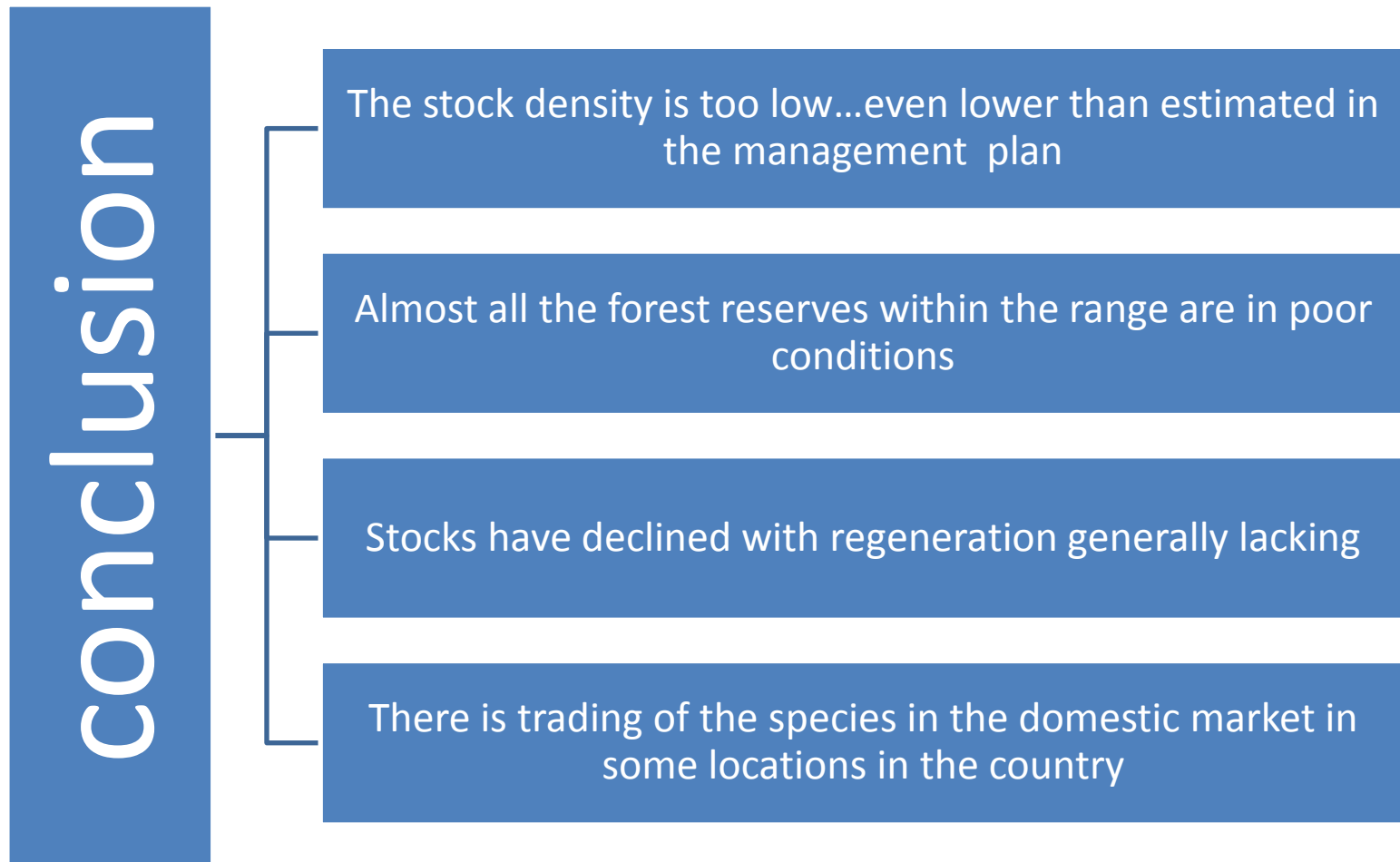
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*Pericopsis elata* in Ghana

# Evidence from the field ...conclusion



# Evidence from the field ...conclusion



# Implication of the results of the studies

1. There is currently on known export of the species from Ghana through formal channel. CITES is working but is not enough....
2. Placement under restricted species category is not enough
3. Domestic trading has replaced formal export
4. The worsening condition of the forest reserves has direct impact of the regeneration of the species
5. There is no research in regeneration of the species etc

# Are the policies enough? Do we need other policies?



- Can a species specific conservation policy help conserve the species notwithstanding general degradation of the forest?
- Today's workshop is for us to consider some of these questions



# Conclusion...

Extinction is forever...

Let's have a dispassionate discussion on curbing local extinction of Kokrodua by suggesting other policy options for consideration



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# Thank you for your attention

*Pericopsis elata* in Ghana



# PROPOSED POLICY ACTIONS FOR THE CONSERVATION OF P. ELATA

RMSC/NDF

June 15, 2017

# ECOLOGY OF P. ELATA

- *Pericopsis elata* (Kokrodua) belongs to the family Fabaceae.
- In Ghana the species occurs in a limited range of the Dry-Semi-deciduous forests and Moist-Semi-deciduous North West subtype forests with annual rainfall of between 1,250-1,500mm
- Current stock densities are estimated to range from 0.013 -0.429 stems per hectare.
- It is distributed mainly in the Western, and Brong Ahafo regions of Ghana and particularly in the Juabeso, Goaso and Dormaa Ahenekro Forest Districts.



# ECOLOGY OF *P. ELATA* (CONT.)

- There is inadequate information on *P. elata* ecology and therefore the need for more research in the phenological patterns and fertility of the species (Howland, 1979; Anglaaere, 2008).
- Also phylogenetic studies of the species is recommended to better understand the ancestry of the species aimed at finding solutions to the poor regeneration of the species



# EXISTING POLICY IN GHANA TO CONSERVE *PERICOPSIS ELATA*

- Between 1988 to 1992, a national inventory (FIMP) was conducted within reserves in the High Forest Zone. This survey provided static estimates of all species including *P. elata*.
- *P. elata* was placed among the 16 restricted species. What this means is that the species can only be harvested by special permit
- The highest felling limit of 110 cm dbh was placed on *P. elata* as a way of limiting the harvesting of the species. Prior to that any tree of diameter beyond 70 cm was permissible for harvesting
- RMSC has stopped issuance of special permit for *P. elata* harvesting. Available felling records at RMSC confirms *P. elata* has not been officially approved for harvesting in the last decade



# EXISTING POLICY IN GHANA TO CONSERVE *PERICOPSIS ELATA*

- In 1998, the species was given a conservation legal backing by placing it under schedule 6 (Regulation 40(1)) of Timber Resources Management Regulations
- Internationally, it is listed in Ghana under CITES Appendix II.
- The species is also listed under IUCN Red List species in Ghana
  - These last two international placement brought to bear the urgent need to control or stop exploitation of the species in order to curb the threat of extinction
  - Secondly, One can only harvest and trade in *P. elata* under a special permit. This has also been stopped currently



# CURRENT CHALLENGES ASSOCIATED WITH CONSERVATION OF P. ELATA

- Studies suggest that despite the restrictions / ban, the species is still being traded in the domestic market
- Widespread miss-labeling of species by timber operatives and inability to identify the semi processed species especially among the various law enforcement agencies (Police, Military, Customs, and Some FC staff) in our roads.
- Connivance of some FC staff and Timber companies to illegally trade in the species





# EXISTING CHALLENGES ASSOCIATED WITH CONSERVATION OF *P. ELATA*

- Currently, measures by FC to control illegal logging in general is waning and ineffective.
- FC do not have specific measures to track illegal harvest and trade in *P. elata* on the local market
- The FC also has a difficulty to effectively track, verify and arrest offenders for prosecution



# RECOMMENDED REFINEMENT OF CURRENT POLICY

- The FC should form a special monitoring team tasked with the enforcement of trade in all listed species under L.I 1649, IUCN Red list, CITES and other conventions and treaties to which Ghana is a signatory
- Sustained public awareness creation and education using various media against illegal trade in *P. elata* targeted FC officials, Timber Companies, Timber traders and Civil Society
- Exploration and development of DNA coded devices/mechanisms for the identification of *P. elata* wood products along our roads and in the domestic market
- Embark on establishment of plantations of *P. elata* and enrichment planting across the home regions of the species.

# RECOMMENDED POLICY ON MANAGEMENT

- Currently, information on locations as well as the general phenological status of the species within the species home range is lacking.
- FC should place as a premium to include it in all forest inventories (stock surveys, special purpose inventories etc) the following:
  - Reserve name,
  - compartment No.,
  - co-ordinates of the tree,
  - diameter,
  - Phenological Status (fruiting, flowering, seeding etc)
- Develop a Database at RMSC of the above information for monitoring
- Intensify raising of seedlings and or research on reproduction/propagation so that it could be included among species earmarked for indigenous species plantation development / enrichment planting in the numerous forest enhancement programmes in Ghana
- Continue training on identification of the species at various developmental stages (seedling, sapling, pole, mature) among all stakeholders (FC staff, farmers, fringe communities, and selected NGOs )



THANKS