

Final Evaluation Report

Your Details				
Full Name	Apinya Chaitae			
Project Title	An assessment of the sustainability of the legal ivory trade in Thailand			
Application ID	28424-1			
Date of this Report	21 November 2022			



1. Indicate the level of achievement of the project's original objectives and include any relevant comments on factors affecting this.

Objective	Not achieved	Partially achieved	Fully achieved	Comments
To understand the Thai ivory trade chain and potential factors involving ivory stock.				The correspondence article has been published open access (https://www.tandfonline.com/doi/full/10.1080/10871209.2022.2143600).
To estimate the potential ivory supply.				 This part of the study was unable to fully delivered due to the constraints imposed by COVID 19 pandemic for the following reasons: Hard-copy record access was impossible during the work-fromhome period. Validation of compiled data was not feasible because I could not effectively access reference records from abroad while international travel restricted.

2. Describe the three most important outcomes of your project.

- a). The Thai ivory trade chain consists of the activities of five key groups: elephant owners, intermediaries, ivory product manufacturers, product retailers, and ivory users. Raw tusks enter the supply chain by direct transaction involving the elephant owners or via an intermediatory. There are two main manufacturing sites: Nakhonsawan and Uthai Thani in the north, and Surin of northeast of Thailand. Manufacturers in Surin sourced raw ivory either from local elephants or other regions. Surin traders are advantaged in sourcing raw material via established connections or networks among elephant owners. Nakhonsawan and Uthai Thani, have no access to raw ivory within provinces, and rely on materials from other areas. Ivory sourcing by the northern traders is facilitated through intermediaries, who are also local elephant owners. Most ivory items pass to buyers via manufactures, after the production processes. Some whole tusks are purchased directly by users without manufacturer participation. These tusks are generally pairs of complete tusks, which are mostly used for decorative purposes.
- **b).** Factors influencing the supply of raw ivory to the trade chain vary among three relevant steps: harvesting, use, and sale destination, but the financial needs of elephant owners and market factors are particularly influential. Elephant owner decisions also depend on elephant management, sentimental values, ivory beliefs,



tusk forms, and legal awareness. These findings have the potential to inform the design of monitoring the Thai ivory market.

c). Annual ivory production from domesticated elephant in Thailand is at least 376.8 kg on average. This estimate was based on new raw ivory obtained during 2015 - 2019 from elephant management cuttings, breaks, and removals from dead elephants. Around 36% of the weight was under commercial-held possession. The raw ivory for manufacturing was estimated at 170 kg a year. The contribution to commercially held stock largely came from new ivory (83%), while the remaining proportion was that transferred from pre-law registration stock (private-held registration). These numbers represent a minimum volume due to the limitation in data collection explained above. Key sources of raw ivory are northeast (37%), south (31.5%), north (31%), and others (0.5%). Most of northeast ivory was obtained from Surin elephants, while ivory from in other regions came from elephants working in tourism businesses and forest plantation logging.

3. Explain any unforeseen difficulties that arose during the project and how these were tackled.

The study is situated in Thailand, but I am based at a University in Australia. Overseas travel was restricted during the period of data collecting. The ivory stock estimate section of the project was impacted by the COVID 19 pandemic. Field work in Thailand for compiling data from government records was cancelled. The raw data are stored in hard copies, and careful extraction is needed by persons who understand the ivory trade. In addition, the data are accessible only by government staff. Data collection using other transcribers was protracted. Access to hard copies from abroad was limited preventing full validation of the raw data. Validated records were only used for estimating a minimum supply volume of raw ivory.

4. Describe the involvement of local communities and how they have benefitted from the project.

All participants in my interviews were locals including elephant owners and ivory traders. The responses reflected their personal and community experiences, particularly their views about ivory-related laws. Concerns included a lack of clarity and complications in understanding of legal procedures related to obtaining raw ivory and corresponding activities. Our findings would be informed by responsible authorities for further facilitating their legal compliance as appropriate.

5. Are there any plans to continue this work?

There are still many interesting aspects of Thai ivory trade that need to be understood to improve trade regulation. Among various issues, I found compliance of the law is very important to maintain the effective regulation. Further work in related compliance is expected as conditions allow.



6. How do you plan to share the results of your work with others?

I have published article "Domestic ivory trade: the supply chain for raw ivory in Thailand is driven by the financial needs of elephant owners and market factors" to disseminate the findings in international level. The citation of the article is

Apinya Chaitae, Jane Addison, Iain J. Gordon & Helene Marsh (2022) Domestic ivory trade: the supply chain for raw ivory in Thailand is driven by the financial needs of elephant owners and market factors, Human Dimensions of Wildlife, DOI: 10.1080/10871209.2022.2143600.

I also plan to provide the Thai Government a brief report for further uses.

7. Looking ahead, what do you feel are the important next steps?

Use of the research findings to inform the management of the ivory trade in Thailand is one of the most important steps. Further research to develop understanding about ivory consumption and trade in Thailand would be useful.

8. Did you use The Rufford Foundation logo in any materials produced in relation to this project? Did the Foundation receive any publicity during the course of your work?

I have included The Rufford Foundation as funder in acknowledgments section in the correspondence manuscript and my PhD thesis. I will also use the logo in the report I provide for the Thai Government.

9. Provide a full list of all the members of your team and their role in the project.

Apinya Chaitae is responsible for developing the project, collecting, and analysing data, as well as writing the manuscript for publication.

The project was conducted under the supervision of Emeritus Prof. Helene Marsh, **Prof. lain J. Gordon** and **Dr Jane Addison**. The supervisory team has provided encouragement and insightful inputs over the project period from developing the project to producing the manuscript.

10. Any other comments?

I greatly appreciate The Rufford Foundation for supporting this project. We also thank relevant staff of The Rufford Foundation for understanding the complicated situation of COVID-19 pandemic.