

## Final Evaluation Report

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Your Details	
<b>Full Name</b>	Gerald Keneth Kaniaru
<b>Project Title</b>	Combating Illegal Trade and Promoting Community-Based Conservation of the CITES-Listed <i>Osyris lanceolata</i> (African Sandalwood) in the ASALs of Makueni, Kenya
<b>Application ID</b>	39189-B
<b>Date of this Report</b>	30 <sup>th</sup> March 2024

**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
Reduce illegal African sandalwood logging and trade of African sandalwood			✓	Although some aspects of this objective were achieved, the interventions outlined in the final report (section 3.3.4) must be addressed to fully mitigate illegal logging and trade of the target species.
Determine the current African sandalwood population status			✓	Fewer than 20 mature individuals of the target species were observed across the six localities in Makueni County (section 3.1).
Increase the population size of African sandalwood and its host plants		✓		The target number of seedlings to be planted was not achieved by the time of this report's submission. However, planting of the seedlings continues beyond the project's timeframe, as this activity is sustainable.
Reduce the local community's unsustainable use of African sandalwood and its host plants as fuel	✓			<p>At least 50 community members have successfully shifted away from the unsustainable practice of utilising African sandalwood as fuel, opting instead for the use of paper log briquettes.</p> <p>Continued community engagement and education programmes will be essential in raising awareness about the benefits of paper log briquettes and encouraging broader participation in this sustainable fuel and income-generating venture.</p>

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

**a).** Development of Illegal Trade Prevention Strategy for *O. lanceolata* which serves as a blueprint for local communities, conservation agencies, county and national authorities to mitigate the illegal harvesting, transportation, and sale of the species.

**b).** Determining the current population status of the target species: This allows conservationists and policymakers to develop effective strategies for the protection and management of the species populations. This information is crucial for implementing measures to prevent overexploitation and habitat destruction, thereby ensuring the species' long-term survival.

**c).** At least 50 community members successfully shifted away from the unsustainable practice of utilising African sandalwood as fuel, opting instead for paper log briquettes. This transition signifies a significant step towards environmental conservation and sustainable resource management within the community. The briquettes, being both cost-effective and environmentally friendly, also provided a source of income for the involved community groups.

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

- Resistance from some community members to adopt alternative livelihood practices, particularly those reliant on African sandalwood harvesting and trade. This resistance stemmed from deeply entrenched cultural and socioeconomic factors.

***To tackle this challenge, the project team implemented extensive community engagement and awareness campaigns. These efforts involved collaborating closely with local leaders, conducting education and training workshops, and facilitating dialogue sessions to address concerns and misconceptions. Additionally, the project emphasised the economic benefits of transitioning to sustainable alternatives, such as production and commercialization of paper-log briquettes, to incentivise community participation.***

- Another unforeseen difficulty encountered was the emergence of new routes and methods for illegal trade despite initial enforcement measures.

***To address this, the project team worked closely with law enforcement agencies to adapt strategies and enhance surveillance efforts. This involved employing technology such as GPS tracking and remote sensing to monitor sandalwood harvesting activities and identify illegal trade routes. Furthermore, the project strengthened partnerships with neighbouring communities and authorities to coordinate cross-border enforcement efforts and minimise loopholes for illicit trade.***

By actively addressing these unforeseen difficulties through community engagement, adaptive management strategies, and strengthened partnerships, the project was able to mitigate challenges and make significant strides towards the conservation of *O. lanceolata* in the ASALs of Makueni, Kenya.

#### **4. Describe the involvement of local communities and how they have benefited from the project.**

The local community members were initially trained and actively involved in various aspects of the project, including identifying locations of *O. lanceolata*, collecting seeds, propagating *O. lanceolata* and its host plants, and developing strategies to prevent illegal trade of the target species. Additionally, they participated in creating a crime script to illustrate the sequence of events before, during, and after the illegal logging of *O. lanceolata*.

Through these training and involvement opportunities, the community groups gained the necessary capacity and confidence to manufacture, distribute, and market affordable fuel-grade briquettes to both community members and the general public. As a result, at least 50 community members have successfully transitioned away from the unsustainable practice of utilising African sandalwood as fuel, choosing instead to use paper log briquettes.

#### **5. Are there any plans to continue this work?**

Plans are underway to continue this work, recognising the presence of endemic and threatened species within *O. lanceolata* habitats. The next phase of the project will focus on conserving these endemic and threatened species while continuing efforts to protect *O. lanceolata*. Additionally, the project aims to strengthen more community groups, empowering them to actively participate in conservation efforts.

Furthermore, the next phase of the project will prioritise scaling up the production of paper log briquettes for commercialisation due to their increasing demand as an alternative fuel source and income-generating venture. This expansion aims to meet market demands while providing sustainable livelihood opportunities for local communities.

Moreover, the project will continue its efforts to transition more community members from using endemic and threatened species as firewood and charcoal to the use of paper log briquettes. This transition not only supports environmental conservation but also serves as an income-generating venture for the communities involved, contributing to long-term sustainability.

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

- **Community Engagement:** We will organise more community meetings and workshops in the study area to directly involve local stakeholders, including community members, leaders, and relevant authorities. These sessions will serve as platforms to present our findings, discuss implications, and gather feedback from those directly impacted by our work.
- **Reports and Publications:** A comprehensive report detailing our methodologies, results, and recommendations will be disseminated in both academic journals and accessible formats such as brochures or fact sheets, ensuring that our findings are accessible to a wide range of audiences.
- **Digital Platforms:** We will utilise digital platforms such as websites, social media channels, and online forums to share updates, key findings, and success stories with a broader audience. By leveraging these platforms, we can reach not only local stakeholders but also interested individuals, organisations, and professionals worldwide.
- **Partner Collaboration:** We will collaborate with partner organisations, networks, and conferences to present our work and share insights with relevant professionals and practitioners in the field of conservation and sustainable resource management. This collaboration will facilitate knowledge exchange, build partnerships, and promote best practices.
- **Capacity Building:** We will prioritise capacity building within local communities by providing training sessions and educational materials that empower individuals to understand and utilise the results of our project effectively. This will foster long-term sustainability and ownership of conservation efforts within the community.

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

- **Conservation of Endemic and Threatened Species:** Continuing efforts to conserve endemic and threatened species within *O. lanceolata* habitats is crucial. This may involve conducting further research, implementing targeted conservation actions, and engaging local communities in habitat restoration and protection initiatives.
- **Strengthening Community Engagement:** Enhancing the capacity of more community groups to actively participate in conservation efforts is essential. This can be achieved through continued training, skills-building workshops, and the establishment of community-led conservation projects to empower local communities in biodiversity conservation.
- **Scaling up Briquette Production:** Prioritising the expansion of paper log briquette production for commercialisation is important to meet increasing market demands. This may involve investing in production infrastructure,

improving production efficiency, and establishing marketing strategies to promote the uptake of briquettes as an alternative fuel source.

- Transitioning Community Members: Continuing efforts to transition more community members from using endemic and threatened species as firewood and charcoal to paper log briquettes is critical for long-term sustainability. This transition supports environmental conservation while providing income-generating opportunities for local communities, thereby promoting sustainable livelihoods.

**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?**

The Rufford Foundation logo was prominently featured on posters, data sheets, and reports produced in relation to the project. Additionally, the foundation was acknowledged as the donor and supporter of this work in both national and international conferences, ensuring recognition of their contribution to the project's success.

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

**. The project team members include:**

- Dr. Veronicah Ngumbau Mutele: She spearheaded the creation of a cooperation network among project stakeholders to develop and implement strategies for preventing illegal African sandalwood trade, aimed at reducing logging and trade. Her responsibilities included community outreach and education, taxonomic identification of the target species and its host plants, ranking of preferred host plants, assessment of highly degraded habitats, and restoration efforts.
- Mr. Patel Francis Mutua: He led the team in assessing and mapping the current population status of African sandalwood and facilitated the domestication of the species and its host plants on farms by trained community members.
- Mrs. Philis Muteti: As the chairperson of the JAPEL Conservation Farmers' Self-Help group, she oversaw the planning and execution of fieldwork expeditions, community meetings, and training sessions. Additionally, she organized and led community groups in implementing collaborative project activities, managed project equipment and tree seedlings, and supervised the mass production, distribution, and commercialization of paper-log briquettes.
- Mr. Josephson Munyao: He played a key role in developing and implementing strategies to prevent illegal African sandalwood trade. He also liaised with county government law enforcement agencies to enhance local

community efforts in protecting sandalwood habitats. Furthermore, he co-funded certain project activities to ensure the long-term sustainability of the project's goals and objectives.

**10. Any other comments?**

We extend our heartfelt gratitude to the Rufford Foundation for their unwavering support and commitment to our conservation efforts. From the initial 1st Rufford Small Grant to the subsequent 1st Booster Grant, their continued funding has been instrumental in driving our project forward and achieving significant milestones in species conservation and management in the study area. Their generous support has enabled us to expand our activities, engage more stakeholders, and make tangible progress in protecting endangered species and habitats. We are immensely grateful for their trust, encouragement, and partnership throughout this journey, and we look forward to continuing our collaborative efforts to conserve biodiversity and promote sustainable development in the region.