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Restoration of endangered *Lagenandra kalugalensis* (Araceae): A multi-sector collaboration

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Lagenandra kalugalensis is a critically endangered endemic aquatic discovered recently in the wet zone of Sri Lanka. It is confined to a single location bordering the proposed Kalugala Forest Reserve. Anthropogenic activities in the vicinity and adverse climatic conditions raise an urgent need for its conservation. This present study attempted to develop a propagation technique to restore plant poupulations in the wild. t . Multisector involvement was carried out to ensure the sustainability of the project. Phenological observations were made, and seeds and rhizome cuttings were used as propagules to raise plants. Flowering was recorded from January-April and seeds were available from March-June. Seed germination trials recorded 43% germination rate. However, none of the seedlings survived after two months. Alternatively, 2 and 5 cm rhizome cuttings were used as propagules. The maximum likelihood analysis of variance indicated a significantly high ($P < 0.01$) survival in 5 cm rhizome cuttings (79%) compared to 2 cm (20%). Plantlets were successfully hardened and transferred to sacs, filled with leaf litter, coir dust, sand, and soil (1:1:1:1), prepared using fabric waste in the original site. After a six-month period, 64% survival was recorded and plants started regeneration by producing new growth. The restoration was supported by academics, undergraduates, industry and the local community. Preparation of sacs was performed by the local community and the simple propagation technique adopted will be transferred to the local community for commercial propagation for future restoration activities of other *Lagenandra* species. This initiative is aligned with the United Nations Ecosystem Restoration and SDG Goal 15 and sets a model for future biodiversity conservation activities, emphasizing the success of collaborative efforts with various stakeholders by adopting sustainable techniques.