

INTRODUCING BIODEGRADABLE ALTERNATIVES FOR MILK RICE OFFERINGS IN *ANURADHAPURA* SACRED SITE

**H.P.S.H. Wijayawardhana, J.P.H.U. Jayaneththi, M.D.P Nayanarangani
and D.M.S.H. Dissanayaka**

*Department of Agricultural Engineering and Soil Science, Faculty of
Agriculture, Rajarata University of Sri Lanka, Anuradhapura, Sri Lanka.*

Milk rice offering is a tradition in Sri Lankan culture, particularly in religious practices at sacred sites like *Anuradhapura*. The traditional method of serving milk rice in clay pots (CPs) poses numerous environmental challenges due to its accumulation over time. This study aimed to propose alternative containers for milk rice offerings in the sacred city of Anuradhapura. *Udamaluwa* Puja Boomi was selected due to a higher observable accumulation of CPs. A preliminary questionnaire survey using 100 respondents and on-site observations provided a clear understanding of the severity of the challenge. Abundantly available biodegradable alternatives were explored through previous literature, and an alternative for CPs was developed. Community acceptance was assessed using a questionnaire survey, providing a clear idea along with a cost-benefit analysis. Data were graphically represented using Microsoft Excel. All the laboratory works were conducted at the Soil and Water Science Laboratory, Faculty of Agriculture, Rajarata University of Sri Lanka. Coconut husks were collected from the surrounding area, crushed, and the coir was separated and sun-dried. Cassava glue was formed by blending the cassava pulp and heating it. Then, the cassava glue and coir were mixed, and the pot was prepared using a plastic cup as a model. The initial questionnaire survey indicated that 88% of respondents (out of 100) observed CP accumulation in *Udamaluwa* premises, with 29.6% agreeing that the accumulation was due to a lack of a proper disposal method. By the end, 69% of respondents accepted the new alternative container instead of traditional clay pots. Unit cost per proposed container is approximately 60.00 LKR, and it proves to be more beneficial than existing CPs (140.00 LKR per pot). Overall, the proposed biodegradable pot could be introduced as a promising alternative to traditional CPs, but significant efforts should be made to promote its acceptance within the community.

Keywords: Biodegradable, Clay pots, Coir, *Udamaluwa*, Sri Lanka