

Extracting Determinants of Solid Waste Generation in Urban Areas of Sri Lanka

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ABSTRACT. Today, people are experiencing the impacts of solid waste generation very rigorously in Sri Lanka, making it the current topic throughout the country. This problem is aggregated in urban areas, polluting the urban environment and spreading diseases. At present Local Authorities are struggling to manage this problem spending an increase capital annually. However, the methods used by Local Authorities are overcoming by the increased level of solid waste generation. There is a large body of research on how to manage solid waste and its generation (Jones et al, 2008; Mohd et al, 2002; Chen et al, 2002). All these studies proved that minimization of the waste generation are much preferred than the management of solid waste. In order to minimize the generation, it is essential to identify the determinants of solid waste generation. In this context, the study focused on extracting the determinant factors of solid waste generation in Sri Lankan urban areas. In this connection Rough Sets approach was applied to extract the determinants. It further demonstrates the usefulness of Rough Sets approach in qualitative data analysis. We hope that in future various types of solid waste generation determinants can be identified by using this study as a useful guide. Further, it is anticipated that these results will be useful for professionals and other officials who engage in solid waste management to make effective decisions in solid waste management.

Key words: Residential Solid Waste, Rough Sets Approach, Municipal Council Areas.

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