Geographic Information System for solid waste management: a case study in Rabukkana city limit

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There is a considerable amount of disposal of waste without proper management which has lead to create both environment and economic problems. Ultimately these problems are generating social problems. These negative impacts of west can be seen in major and small cities in Sri Lanka. There is a huge amount of loss in terms of economic and social values. At the same time, environmental degradation and health hazards that are significant due to the dumping of waste in urban areas.

It is better to separate the waste at the initial stages where it is generated to get economic benefit and clean the environment, rather than going for a later options which is inconvenient and expensive. There should be appropriate planning for proper waste management by means of analysis of the waste situation of the area.

This paper would deal with, how Geographical Information System (GIS) can be used as a decision making tool for planning waste management. A model is designed for the Rambukkana urban area. The suggestions based on the GIS based model, would reduce the waste management workload to some extent and exhibit remedies for some of the Solid Waste Management problems in the Rambukkana area. The waste management issues are considered to solve some of the present problems. Environmental degradation

Keywords: Environment, GIS, Urban area, Solid, Model

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