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FACULTY OF NATURAL RESOURCES AND ENVIRONMENTAL SCIENCES

DEPARTMENT OF NATURAL RESOURCE ECONOMICS

THE EFFECTIVENESS OF SOLID WASTE MANAGEMENT PRACTICES

A CASE OF SOROTI MUNICIPAL COUNCIL (SMC)

BY

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DECLARATION

I **OKWAKOL WILSON** do hereby declare that this research report is my own work and has never been submitted to any other University or institution of higher learning education for any award.

Signature.....

Date.....15th / 07 / 2017

APPROVAL

I hereby certify that this research report titled "*The effectiveness of solid waste management practices, case of Soroti municipal council*" is the original, authentic and individual work of **OKWAKOL WILSON**. It has been done under my supervision and is ready for submission to the faculty of Natural Resources and Environmental Sciences of Busitema University with my approval.

Signature.....

MR. KIFUMBA DAVID NSAJJU (SUPERVISOR)

Date.....

DEDICATION

I honestly, truthfully and sincerely dedicate this piece of work to the entire family of Mr. Ogeatum Francis and my beloved late mother Mrs. Isuka Hellen (the message is I really miss you mom) as a token of appreciation for whatever you did to me, my sister Betty Ajilong, my uncle Mr.Otim Robert Elogu, my high school teachers most especially Mr. Edyegu James Michael and Mr. Bazira Daniel, head teacher Namasagali College Kamuli, and not forgetting my most beloved friend Ariokot Jemimah, you are really my happiness.

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LIST OF ABBREVIATIONS/ACRYONMS

SMC.....Soroti Municipal Council

USWM.....Urban Solid Waste Management

EPA.....Environmental Protection Agency

NEMA.....National Environmental Management Authority

USEPA.....United States Environmental Protection Agency

PEAP.....Poverty Eradication Action Plan

UNEP.....United Nations Environmental Programme

ABSTRACT

Solid waste management practices especially storage, collection and disposal are increasingly becoming a big problem in many municipalities in Uganda. This is attributed to poor storage, collection and disposal facilities, the delayed solid waste collection due to few garbage transportation trucks and indiscriminate dumping of solid wastes. The study aimed at establishing the effectiveness of solid waste management practices in Soroti municipality.

The study was conducted in Soroti municipality with the major objective to establish the fundamental causes of poor solid waste management and to seek the local people's opinions on how the problem would be handled. The objectives were to find out what methods are used to store, collect and dispose of different solid wastes generated in Soroti municipality, to establish reasons for delayed removal of solid wastes from storage and collection sites and to establish reasons for indiscriminate dumping of solid wastes in Soroti municipality.

Self administered questionnaires, personal interviews and Purposive sampling were used to obtain data on the different solid waste management practices. The data was coded, entered in excel, filtered and then exported to SPSS soft ware for analysis because it was considered to be user friendly as compared to other soft wares.

Most of the residents in Soroti municipality store solid waste by use of plastic bins mainly provided by the residents themselves. Solid waste collection is by manual lifting because of few garbage transportation trucks which has led to delayed removal of solid wastes from collection sites especially in Eastern division and solid waste disposal is by burning mainly because disposal sites are far away from residential areas. The main reasons for scattered rubbish in Soroti municipality are mainly residents being unbothered, wind blowing rubbish, heavy rain down pours which sends rubbish to trenches, and carelessness across all education levels.

CHAPTER ONE

1.0. INTRODUCTION

1.1 Background of the study

1.1.1 What is solid waste?

Solid waste is anything solid or semi solid that the processor considers of sufficient no value to retain (Ngategize, 2001). Ngategize (2001) observes that sources of waste are generally related to the land use and zoning and are usually categorized in the following categories residential, commercial, institutional, construction and demolition, municipal services, industrial and agricultural. Residential waste consists of the organic solid waste from residential and commercial establishments. Ngategize (2001) also observes that the organic fraction of residential waste consists of materials such as food waste, paper and the inorganic consist of all types of items such as rubber, polythene bags, leather, and glass among others.

Data on distribution of MSW shows that residential and commercial make up 50-70% of the MSW generated in the community and the actual percentage of distribution depends on the extent of municipal services provided (Ngategize,2001).

1.1.2. Global perspective about solid waste generation and its management

Poor solid waste management is not an individual country's problem but rather it is increasingly becoming a big problem in many cities and towns of the world, according to the State of the Environment Report for South Africa. DEAT (1999) observes that over 42million tonnes of solid waste are generated every year. This is about 0.7 kg per person per day, which is more typical of developed countries than a developing country(by comparison the figure in the UK is 0.73kg, 0.87kg in Singapore and 0.3kg in Nepal). In addition, 5 million tonnes of hazardous waste is generated every year (DEAT, 1999). Over 2.6 million tonnes of domestic and commercial solid waste is processed at treatment works. The last figure does not include agricultural and some industrial waste, which are the largest sources of waste (DEAT, 1999).

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