

# **Solid Waste Management in Guntur, Andhra Pradesh, India**

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**ABSTRACT:** Due to globalization there is a large generation of solid waste in present domestic world. This article mainly focuses information regarding the paper various disposal methods taking into consideration of different parameters of disposing the solid waste in Guntur. Due to inadequate methods of implementation and management strategies. Waste management practices have been proposed for a particular area with challenges to improve the efficiency of proposed solid waste management.

**KEYWORDS:** Solid waste, Guntur, Globalization, Domestic.

## **I. INTRODUCTION**

Usage of solid materials has been increasing eventually due to globalization. In general solid waste is Rubbish. Unwanted materials or products given by human activities. Generation of solid waste in Guntur is high due to its population growth. At the same time the area needs much more developing activities in order to overcome the polluting aspects, so as to provide a clean and healthy atmosphere to the public.

Along with the solid waste these are other most important type of waste which increases the rate of waste production. The waste of construction and demolition, biomass wastes from agriculture waste, forest waste, electronic waste, and other e-waste materials. The generation of solid waste of an area depends on the growth of population and its income factor. In general income of an area is most important factor for waste generation.

The waste generation obtained needs to be managed are an important factor. Different types of waste like medical waste, hazardous waste, industrial wastes give a great throughout the city because of the dangerous emission of harmful toxic substances. Proper management facilities are needed to overcome the spreading of poisonous elements.

## **II. LITERATURE REVIEW**

Vidanaarachchi. C, Yuen, S, Pilapitiya. S (2006), Kadafa. K, Manaf. L, Sulaiman. W (2004), Cleary. J (2005), Mgimba. C, Sanga (2006), Ashwood. K, Grosskopf. M, and Scheider. E (1996), Dittrich. C (2004), Dowie. W. A, McCartney, D. M, and Tamm, J.A (1998), Dahiya. B (2003), Anand, P.B (2003), Ramachandra T.V, and Varghese S.K (2003), Kadafa, A, Manaf, L, Sulaiman, W (2004).

## **III. DIFFERENT TYPES OF WASTES**

Numerous tons of wastes are generated every day which includes garbage, papers, tin, bottles, metals, glasses, clothes etc. In a case study at Guntur, the residential areas produce a portion of 52-80% waste which is followed by commercial sectors, industries, markets etc. The produced waste depends on the variation in raw material used.

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Along with these wastes the wastes from agricultural sector which is used as a raw material for the production of biogas and used for the crops as a good fertilizer, which helps in increasing the yield of crop. Developed countries create a high cost methods to handle waste which developing countries make use of improper handling methods.

## VI. OCCURRING TRENDS IN SOLID WASTE MANAGEMENT IN GUNTUR

One of the burning problems that is being faced by the areas are the method of collection, treatment, transportation, storage& method of disposal practices. People have observed that management practices are characterized by indiscriminate dumping of waste, low salutation levels etc. The major problem is due to insufficient infrastructural facilities & proper use of a particular land is for the purpose of dumping.

As we go on with the previous history, human life existence seems to be very peaceful, as their major constituents of waste are wood, paper, food, and vegetables etc. which are domestic and are easily biodegradable. This appears no industries as well the population is a small ratio which leads to generation of small quantity of waste materials. The waste generated is fed to animals and the remaining was allowed to be decomposed in the ground.

The world's population growth rate has increased tremendously which obviously increases the generation of wastes both domestic and industrial. This increased ratio of waste causes different types of pollutions leading to contamination of water resources.

## IV.COMPOSITION OF SOLID WASTE

The major composition of waste generated is many pouts is biodegradable organic materials which includes plastic, glass, metals, bio waste etc. This is generally given out from kitchens. As a results of which efficient collection can decrease the negative impact on environment.

## V. COLLECTION AND TRANSPORTATIONS OF WASTE

These exits different types of wastes the one is primary phase waste from household community. The collected wastes are transferred from community point to transfer points for final disposal sites.

The other types of collection are by truck. The truck as it comes near to the public it hoots its horn to bring their waste for disposal.

Waste composition	%
Bio waste	70%
Paper	81.7%
Metals	23.6%
Others	40%

Table 1: composition of solid waste generated in Guntur

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## VI. SOLID WASTE MANAGEMENT CHALLENGES

All the areas follow such rules and regulations to manage waste. Responsibilities are distributed among the governmental sector in order to manage the solid waste,

The government sector should provide proper technical facilities to manage solid waste and also provide staff for the collection of waste from the point to point collection. The collated waste is transported and disposal at the landfill site (dumping site). This duty of disposing is mainly carried out by municipalities who are the initiates of the solid waste management.

### The way forward:

The following are some of the suggestions where we can enhance a better solid waste management.

1. Public should be motivated with proper methods of disposal.
2. Private sectors should be actively involved.
3. Proper dumping site should be located in an area which does not disturb the public.

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