

Medical, Municipal and Plastic Waste Management Handbook

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Waste management is the collection, transport, processing, recycling or disposal, and monitoring of waste materials. Concern over environment is being seen a massive increase in recycling globally which has grown to be an important part of modern civilization. The consumption habits of modern consumerist lifestyles are causing a huge global waste problem. Rapid urbanization and industrial diversification has led generation of considerable quantities of municipal, plastic, hazardous and biomedical waste. Further the rapid industrial developments have, led to the generation of huge quantities of hazardous wastes, which have further aggravated the environmental problems in the country by depleting and polluting natural resources.

Therefore, rational and sustainable utilization of natural resources and its protection from toxic releases is vital for sustainable socioeconomic development. Hazardous waste management is a new concept for most of the Asian countries including India. The utilization of resources and generation of waste is for beyond the limit that the biosphere was made to carry. Recycling of plastics should be carried in such a manner to minimize the pollution level during the process and as a result to enhance the efficiency of the process and conserve the energy. The concern for bio medical waste management has been felt globally with the rise in infectious diseases and indiscriminate disposal of waste. It is to be understood that management of bio medical waste is an integral part of health care. There is a clear need for the current approach of waste disposal in India that is focussed on municipalities and uses high energy/high technology, to move more towards waste processing and waste recycling (that involves public private partnerships, aiming for eventual waste minimization driven at the community level, and using low energy/low technology resources.

This book basically deals with characterization of medical waste, medical waste data collection activities, medical waste treatment effectiveness, gas sterilization , medical waste reuse, recycling and reduction, selection of waste management options, fundamental concepts related to hospital waste incineration , linkage of bio medical waste management with municipal waste management , waste identification and waste control program for the health care establishments, waste treatment and disposal : the rules and the available options , recycle spoiled photographic film and paper etc.

Waste management is one of the essential obligatory functions of the country. This service is falling too short of the desired level of efficiency and satisfaction resulting in problems of health, sanitation and environmental degradation. This book provides overview of the status of medical, municipal and plastic waste management. A treatment technique includes sterilization, incineration and number of recycling methods.

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About NIIR

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