



Pollution caused by dental clinic wastes

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Abstract

Dental (Medical) waste has been defined as all wastes generated from health care or health related facilities. The waste generated from the dental hospital are of various materials, sizes, shades and shapes and are therefore regarded as heterogeneous. There are dental liquid wastes such as X-ray (developer and fixer) wastes and other chemicals and drugs generated within the dental facilities in general. The waste can also be in form of solid generated from the diagnosis, investigations and treatment of human beings.

Dental waste has been demonstrated to contribute significantly to pollution of the environment if poorly treated and that it can lead to cross-infection risks such as deadly HIV and Hepatitis among others heavy metals such as Chromium, Cadmium and Amalgam are frequently generated from the dental hospitals and are known to be hazardous. These metals have been known to cause diseases in humans such as liver, kidney and respiratory damage by Chromium while cadmium may cause kidney disorders and lung cancer .

The proper and standardized management of dental waste will assist in controlling health risks among humans and safe environment. These are the main reasons for proper managing of dental waste to render such non-infectious /hazardous. It is the sole responsibility of generators of (dental) waste to dispose them adequately and so it is for the handlers as well.

This paper therefore aims at sorting, characterizing and quantifying wastes generated in clinics of a dental hospital. This is with a view to providing information on waste classification in dental hospitals in developing nations. It is expected that such information will aid sustainable dental waste disposal in the clinics of a dental hospital.

Keywords: Dental waste, hazardous waste; solid waste, new model, waste management.