

ABSTRACT

Pharmaceuticals are critical in maintaining the health of people and improving the quality of life for millions of Kenyans, but not all pharmaceuticals dispensed are consumed. They become waste when they are no longer usable for intended purpose or are being discarded for other reasons such as contamination and expiration. Improperly disposed pharmaceuticals end up in garbage collection centres and water purification systems which are not sufficiently equipped to manage this form of waste. There is growing public concern over presence of active pharmaceutical ingredients in water and the environment. This pharmaceutical waste also includes antimicrobials which interfere with water treatment process since most depend on biodegradation. Pharmaceuticals have immense effects on non-target organisms, such as medicine resistance in humans, increases in morbidity and mortality of the population due to unintentional poisoning. The main objective of this study was to assess the disposal practices of pharmaceutical waste among households in Nakuru Town. This was achieved through conducting a social survey. Data was then processed and analysed using descriptive and inferential statistics. Out of 384 households who participated in the study, 35.8% and 14.4% of the respondents indicated that antibiotics and pain killers were the most commonly disposed of pharmaceuticals respectively. In this study the most commonly used method of disposal was flushing in the toilet. Seventy eight percent (78.4%) of the respondents had no knowledge of pharmaceutical waste handling and management, whereas 71.6% were aware of the risks associated with storing unwanted pharmaceuticals in the house. Eighty percent (80%) have never received any information on how to dispose unwanted pharmaceuticals. Fifty five percent (55%) of the respondents were willing to participate in take-back programs as the most feasible and safe disposal strategy that can be used to manage pharmaceutical waste. However, over 80% of them expressed their scepticism on implementation of the mail-back programs since it is expensive and neither practical nor feasible under the prevailing economic conditions and governance structure. In conclusion, there are a lot of unwanted pharmaceuticals among households and the public has no knowledge on how to manage them hence they end up using unsafe methods which can pollute the environment. Sensitization of the public on the dangers of poor disposal of pharmaceuticals and provision of collection points for proper disposal are recommended.

Keywords

Disposal practices -- Pharmaceutical waste

from current recommendations for enhanced maize yields.