

Mismanagement of chemical wastes from light industries and motor vehicle garages results to pollution of the natural environment and poses substantial danger to public health and welfare. The present study reports levels and forms of Pb and Cd in garage soils obtained from Ngara-Nairobi and their levels in vegetables and water bodies found nearby. The concentration levels of cadmium obtained ranged from 0.40-4.80 mg/kg and a mean of 2.95 ± 0.14 mg/kg. Its concentration levels were highest in the residual, followed by exchangeable, then oxidisable and least amount in the reducible bound fraction. Thus, a high percentage of cadmium is associated with non-residual fractions and can easily be transferred into the food chain through water reservoirs or uptake by plants growing in the soils. The concentration levels of lead were found to be within the range of 22.00-313.60 mg/kg and had a mean of 128.36 ± 6.51 mg/kg. Its concentration levels in the fractions from highest to lowest followed the order; reducible, residual, oxidisable and exchangeable. The mobility factor of cadmium was found to be 33.4405 while that of lead was 7.05. Concentration levels of cadmium in nearby kales ranged from 0.73 to 1.50 mg/kg while those of lead ranged from 10.25 to 19.60 mg/kg. In spinach the concentration levels of cadmium and lead ranged from 0.84 to 1.75 and 7.83 to 20.53 mg/kg respectively. Concentration levels in water samples ranged from 0.77 to 1.50 mg/L for cadmium and 4.60 to 8.89 mg/L for lead. These high concentration levels of the metals in water and vegetable pose great danger to human health as their consumption can lead to serious depletion of some essential nutrients in their bodies thus leading to decrease in immunological defenses. This calls for proper waste management procedures, continuous education and training to the artisans and efficient soil remediation programs at the sites.