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## Determination of metal content in *Rasna Saphaka Kwatha*

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### Abstract

*Rasna saphaka kwatha* is a widely used Ayurvedic decoction. Medicinal plants that are the ingredients of this decoction are collected from different habitats of the country. The decoction can be contaminated with metals during the growing, collecting, and storing of the raw material and also during the processing of this product. Hence, the evaluation of metal concentration in pharmaceutically available decoction is of utmost significance. Therefore, the main objective of this research was to determine the concentration of Al, Cr, Cd, Cu, and Pb in decoction samples of *Rasna saphaka kwatha* collected from different areas of Sri Lanka. Ten samples of decoction were randomly collected from Anuradhapura, Kurunegala, Kandy, Polonnaruwa, Thambuththegama, Galadiulwewa and Gampaha. Atomic Absorption Spectrometry was used to detect the metal concentration. Wet digestion was carried out prior to the analysis. The mean concentration value of Al, Cd, Cr and Cu were 1.010ppm, 0.232 ppm, 0.387 ppm and 0.155 ppm respectively. Pb was below the detected level of the instrument. Al, Cd, Cr and Cu contents in decoction samples were found in the range of 0.39-2.208 ppm, 0.18-0.348 ppm, 0.33-0.462 ppm, and 0.042-0.408 ppm respectively. Results revealed that the mean values of metal concentration of tested samples were below the recorded WHO permissible level of metals in herbal medicine.

**Keywords:** *Kwatha*, Spectrometry, Concentration

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