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Study on element content of some Antidiabetic medicinal plants grown in North East India by Atomic Absorption Spectroscopy (AAS) and Flame Photometry

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Abstract: Diabetes is rapidly emerging as serious and major public health-care problem throughout the world. Diabetes mellitus has been found to be managed by various medicinal plant extracts. Many plant derived products are used as antidiabetic supplements. Among the factors attributable to the antidiabetic potential of these medicinal plants, are the various trace elements present in them.The aim of the present study was to investigate the content of trace elements in three antidiabetic medicinal plants traditionally used to manage diabetes mellitus in North East India by Flame Photometry andAtomic Absorption Spectroscopy (AAS) techniques. The elements such as sodium, potassium, iron, manganese, zinc, chromium, copper and nickel were identified and quantified which play vital roles in blood glucose reduction.This study suggested that the analyzed medicinal plants are potential sources for providing a reasonable amount of the required elements to the patients of diabetes mellitus.

Keywords : *Aeglemarmelos*,*Musaparadisiaca*, *Garciniapedunculata*, Atomic Absorption Spectroscopy **(**AAS), Flame Photometry, diabetes mellitus, trace elements, medicinal plants.

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