NUTRITIONAL EVALUATION OF FINGERMILLET(*Eleusine coracana*): PROXIMATE COMPOSITION, MINERAL COMPONENTS, *in vitro* PROTEIN DIGESTIBILITY AND TRYPSIN INHIBITOR ACTIVITY.

by

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ABSTRACT

Millets constitute a major source of energy and protein for many of the rural people in Asia and Africa. The nutritional criteria for cereal improvement are better understood today and in this priliminary study three varieties of finger millet, namely Co 10, MI 302 and KM 1 were analysed for the proximate composittion, mineral components, in vitro protein digestibility and trypsin inhibitor activity.

The protein content of the three finger millet varieties ranged from 11.9 percent to 12.4 percent, fat 1.5 percent and crude fibre 1.9 percent to 2.2 percent. The various mineral components determined are calcium, magnesium, sodium, manganese, copper, iron, potassium and phosphorus. Though potassium is the predominant major element in all three varieties, they also contained high amounts of calcium (241 - 246 mg/100g.) and phosphorus (200 - 280 mg/100g.) The in vitro protein digestibility of the three finger millet varieties ranged from 64.8 to 74.7 percent. The actinutritional studies revealed the presence of trypsin inhibitor in finger millet.

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