Full Length Research Paper

**Detarium microcarpum** Guill and Perr fruit proximate chemical analysis and sensory characteristics of concentrated juice and jam

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This study was carried out to produce food products mainly concentrated juice and jam from the fruit pulp of **Detarium microcarpum** (DM), and compare them with a commercial sample as control. The proximate chemical analysis of the dried fruit pulp of DM showed high proportions of carbohydrate (40-42.0%) and protein (29.1-30.9%); samples from Abu Gibaiha (AB) are the highest in both protein and carbohydrates in comparison with other samples from Ghibaish (GH) and Omdurman (OM). ICP-MS was used to determine the minerals (on mg/100 g dry weight basis). Concentrations of major elements K, Na, Mg and Ca were found to be higher in AB followed by GH and OM, respectively, with low levels in minor elements. The sensory evaluation of the produced jam and concentrated juice from the fruit pulp of DM was significantly preferred (P < 0.05) by the panelists for their color, odor, taste, texture and overall acceptability to the control samples. The results of this study offer the conditions that may lead to a better processing of this fruit.

**Key words:** Concentrated juice, **Detarium microcarpum**, jam, minerals, proximate analysis.