

## **Characterization of Minor Components in Specialty Vegetable Oils**

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Oils obtained by cold pressing from hempseed, pumpkin seed, and argan nuts have been analyzed for specific minor components especially in the unsaponifiable fraction: tocopherols, tocotrienols, free and esterified sterols.

The minor components are not only important for their functional properties (e.g. antioxidant) but also for health benefits and sensorial properties.

The analysis of these minor components together with the triacylglycerides, fatty acid and polyphenol profile are important tools for the authentication of oils.

The tocopherols and tocotrienols were determined by normal phase liquid chromatography (LC), while the sterol profile was analysed by GLC. GC-MS was used for the identification of the phytosterols which characterise these specialty oils.

A multivariate analysis has been developed for authenticity studies.