

B065 Chemical composition of the leaf essential oil of *Senecio myricaefolius* Bojer

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Senecio myricaefolius Bojer (Compositae) is a toxic wild-growing tree, an aromatic plant indigenous to Madagascar. A review of the literature reveals that the genus *Senecio* is characterized by the occurrence of 13-membered macrocyclic pyrrolizidine alkaloids (1). These are toxic to both humans and livestock. Other than the previous LPN staff studies (2,3), there have been no investigations reported concerning either the alkaloid contents or the volatile constituents of *S. myricaefolius*. This paper presents the chemical composition of the essential oil hydrodistilled from the fresh leaves of *S. myricaefolius*, obtained at very low yields of 0.03 to 0.04 %. This oil is a clear mobile liquid, pale yellow in color, and having a sweet odor. The components of *S. myricaefolius* oil were identified using the combination of TLC, GC/MS, GC/FTIR and NMR data. The main components are oxygenated monoterpenes (53.9%), with 1,8-cineole (44.1%) as the major compound and oxygenated sesquiterpenes (17.1%); (-)-spathulenol occurs in significant amounts (13.1%). The hydrocarbons are represented mainly by 4 monoterpenes (17.1%). The 10 identified sesquiterpene hydrocarbons account for only 9.3%, among which α -humulene (4.2%) predominates. The 26 identified and assigned constituents represent about 97.30% of the total oil. Further fractionation carried out on the total oil yielded hydrocarbons and oxygenated compounds. Olfactory examination of the former fraction have been performed by a local specialist. From the point of view of the perfumer, the characteristic grassy, hay-like odor with a minty undertone is an interesting olfactory "touch". In conclusion, the complex mixture of hydrocarbons of *S. myricaefolius* essential oil is responsible of its sweet, commercially interesting odor. This is a noteworthy result described for the first time by the present investigation.

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B066 Composition of the essential oil of *Ononis viscosa* L. subsp. *breviflora* (DC.) Nyman

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Ononis viscosa L. is a small annual plant of the Leguminosae family that grows in West Mediterranean area in Turkey. In a previous work, *O. viscosa* was shown to have antibacterial activity against Gram positive bacteria (1). Resorcinol derivatives were found in the chloroform extract of the aerial parts of this plant in Spain (2). The plant subjected to the present study was collected in July 2001, in Fethiye, Turkey. Dried aerial parts were water distilled using a Clevenger-type apparatus to produce essential oil in 0.24 % yield. The oil was analyzed by GC/MS. Hexahydrofarnesylacetone (12.5 %), carvacrol (10.0 %), lauric acid (8.3 %), nonanal (5.5 %), (E)-geranylacetone (4.8 %) and dodecanal (4.8 %) were identified as major constituents.

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