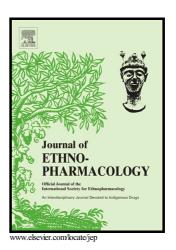
Author's Accepted Manuscript

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ACCEPTED MANUSCRIPT

Clausenidin from *Clausena excavata* induces apoptosis in hepG2 cells via the mitochondrial pathway.

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Abstract

Ethnopharmacological relevance

Clausena excavata Burm.f. is used locally in folk medicine for the treatment of cancer in South East Asia.

Aim of the study

To determine the mechanism action of pure clausenidin crystals in the induction hepatocellular carcinoma (hepG2) cells apoptosis.

Materials and methods

Pure clausenidin was isolated from *Clausena excavata* Burm.f. and characterized using ¹H and ¹³C NMR spectra. Clausenidin-induced cytotoxicity was determined by MTT assay. The morphology of hepG2 after treatment with clausenidin was determined by fluorescence and Scanning Electron Microscopy. The effect of clausenidin on the apoptotic genes and proteins were determined by real-time qPCR and protein array profiling, respectively. The

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