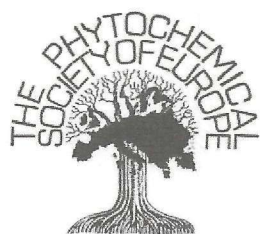


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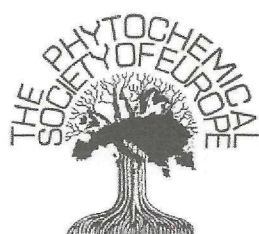
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BOOK OF ABSTRACTS



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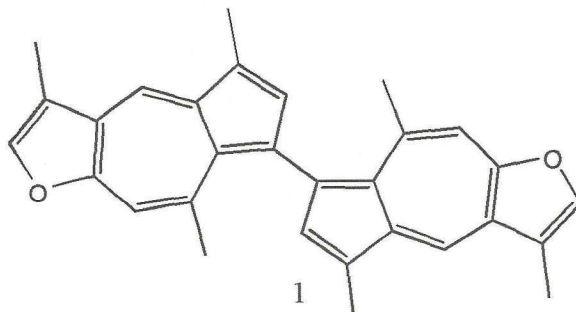
Metabolites from deep sea marine organisms

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Deep sea marine organisms offer promising possibilities for extending the frontiers in drug discovery and development.¹ The vastly different environmental conditions which are at play in the deep sea (elevated pressures, depressed temperatures, lower light penetration) favor the development of extreme bio- and chemical diversity. Here, we report the isolation and structure elucidation of a new natural product and a number of previously reported metabolites from two deep sea marine organisms.

Specimens of the gorgonian *Paramuricea clavata* were collected by dredging in Samos island (Greece) at depths of 100-110 m, while specimens of the sponge *Suberites carnosus* were collected using the same method in Cape Pappas in the Ionian Sea (Greece) at depths of 130-150 m. Fractionation of the gorgonian extract yielded one new azulene dimer (**1**), along with linderazulene² and cholesta-5-ene-3 β -19-diol. Metabolite **1** is a symmetric dimer of linderazulene with the new C-C bond formed between C-7 and C-7'. The sponge extract was subjected to a series of chromatographic separations to afford the known diterpenes dehydroabietic acid, *trans*-communic acid and isopimaric acid. The structures of the isolated metabolites were elucidated on the basis of 1D and 2D NMR and MS data.



[1] Skropeta, D., *Nat. Prod. Rep.*, **2008**, *25*, 1131.

[2] Imre, S., Thomson, R.H., Yalhi, B., *Cell. Mol. Life Sci.*, **1981**, *37*, 442.

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