

BIOSCIENCES

ZEITSCHRIFT FÜR NATURFORSCHUNG C

EDITORS-IN-CHIEF

N. Amrhein, Zürich

J. Seibel, Würzburg

ADVISORY BOARD

A. Aigner, Leipzig

W. Boland, Jena

U. Bornscheuer, Greifswald

K. H. Hoffmann, Bayreuth

EDITORIAL BOARD

H. Budzikiewicz, Köln

B. Dräger, Halle

T. Opatz, Mainz

E. Rösch, Pforzheim

K.-D. Spindler, Ulm

D. Strack, Halle

DE GRUYTER

ABSTRACTED/INDEXED IN Chemical Abstracts Service (CAS) – SciFinder; Elsevier SCOPUS; Medline; PubMed; SCImago (SJR); Thomson Reuters: BIOSIS Previews, Current Contents/Life Sciences, Journal Citation Reports/Science Edition, Science Citation Index, Science Citation Index Expanded.

The publisher, together with the authors and editors, has taken great pains to ensure that all information presented in this work (programs, applications, amounts, dosages, etc.) reflects the standard of knowledge at the time of publication. Despite careful manuscript preparation and proof correction, errors can nevertheless occur. Authors, editors and publisher disclaim all responsibility for any errors or omissions of liability for the results obtained from use of the information, or parts thereof, contained in this work.

The citation of registered names, trade names, trademarks, etc. in this work does not imply, even in the absence of a specific statement, that such names are exempt from laws and regulations protecting trademarks etc. and therefore free for general use.

ISSN 0939-5075 · e-ISSN 1865-7125

All information regarding notes for contributors, subscriptions, Open access, back volumes and orders is available online at www.degruyter.com/journals/znc.

RESPONSIBLE EDITOR Prof. Dr. Juergen Seibel, Universitaet Wuerzburg, Institut fuer Organische Chemie, Am Hubland, 97074 Wuerzburg, Germany

JOURNAL MANAGER Ulrike Kitzing, De Gruyter, Genthiner Straße 13, 10785 Berlin, Germany. Tel.: +49 (0)30 260 05-344, Email: ulrike.kitzing@degruyter.com

RESPONSIBLE FOR ADVERTISEMENTS Claudia Neumann, De Gruyter, Genthiner Straße 13, 10785 Berlin, Germany. Tel.: +49 (0)30 260 05-226, Fax: +49 (0)30 260 05-264, Email: anzeigen@degruyter.com

© 2016 Walter de Gruyter GmbH, Berlin/Boston

TYPESETTING Compuscript Ltd., Shannon, Ireland

PRINTING Franz X. Stücker Druck und Verlag e. K., Ettenheim
Printed in Germany

COVER ILLUSTRATION Detail of the structure of bryostatin 1. The structure of bryostatin 1 was determined in 1982. To date 20 different bryostatins have been isolated. Bryostatins are potent modulators of protein kinase C. They are currently under investigation as anti-cancer agents, as anti-AIDS/HIV agents and as a memory-enhancing agent.



Contents

Vanessa G. Alves, Elisa A. da Rosa, Laura L.M. de Arruda, Bruno A. Rocha, Ciomar A. Bersani Amado, Silvana M.O. Santin, Armando M. Pomini and Cleuza C. da Silva
Acute toxicity, antiedematogenic activity, and chemical constituents of *Palicourea rigida* Kunth — 39

Melahat Ozcan, Faik Ahmet Ayaz, Yesim Ozogul, Robert Glew and Fatih Ozogul
Fatty acid composition of achenes of *Cirsium taxa* (Asteraceae, Carduoideae) from Turkey — 45

Diana N. Knittel, Peter Lorenz, Ursula Huber, Florian C. Stintzing and Dietmar R. Kammerer
Characterization of the cardiac glycoside and lipid profiles of *Strophanthus kombé* Oliv. seeds — 55

Patrick Y. Ango, Deccaux W.F.G. Kapche, Ghislain W. Fotso, Christian D. Fozing, Elizabeth M.O. Yeboah, Renameditswe Mapitse, Ibrahim Demirtas, Bonaventure T. Ngadjui and Samuel O. Yeboah
Thonningiiflavanonol A and thonningiiflavanonol B, two novel flavonoids, and other constituents of *Ficus thonningii* Blume (Moraceae) — 65

Bertrand Matthaus, Mehmet Musa Özcan and Fahad Al Juhaimi
Some rape/canola seed oils: fatty acid composition and tocopherols — 73

Fahad A.L. Juhaimi, Bertrand Matthäus, Mehmet Musa Özcan and Kashif Ghafoor
The physico-chemical properties of some citrus seeds and seed oils — 79

Ramazan Erenler, Koksai Pabuccu, Ayse Sahin Yaglioglu, Ibrahim Demirtas and Fatih Gul
Chemical constituents and antiproliferative effects of cultured *Mougeotia nummuloides* and *Spirulina major* against cancerous cell lines — 87