

Graphical abstracts

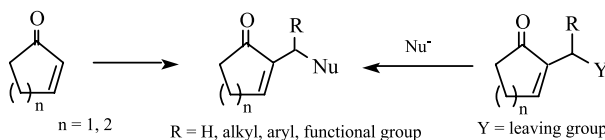
Synthetic methods for α -substituted cyclic α,β -enones

Farhat Rezgui,^a Hassen Amri^{b,*} and Mohamed Moncef El Gaïed^b

^aInstitut Préparatoire aux Etudes Scientifiques et Techniques, 2040 La Marsa, Tunisia

^bDépartement de Chimie, Faculté des Sciences, Campus universitaire, 2092 Tunis, Tunisia

α -Substituted cyclic α,β -enones can be prepared directly from the parent enones or via S_N2 -type reaction from the corresponding β' -functionalised derivatives.



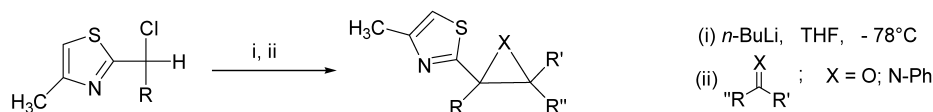
Tetrahedron 59 (2003) 1369

Diastereoselective synthesis of 2-oxiranyl and 2-aziridinyl thiazoles

Fabio Bona,^a Luisella De Vitis,^a Saverio Florio,^b Ludovico Ronzini^a and Luigino Troisi^{a,*}

^aDipartimento di Scienze e Tecnologie Biologiche ed Ambientali, University of Lecce, Via Prov.le Lecce-Monteroni, 73100 Lecce, Italy

^bDipartimento Farmaco-Chimico, CNR 'Istituto di Chimica dei Composti Organometallici—I.C.C.O.M.', University of Bari, Via E. Orabona 4, 70125 Bari, Italy



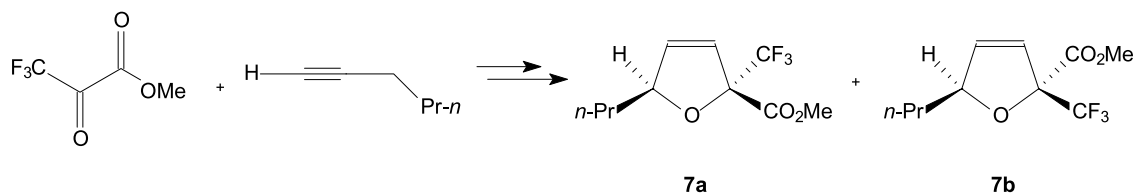
Tetrahedron 59 (2003) 1381

Carbonyl-yne reactions of 3,3,3-trifluoropyruvates

Alexander S. Golubev,^a Natalia N. Sergeeva,^b Lothar Hennig,^b Alexey F. Kolomiets^a and Klaus Burger^{b,*}

^aInstitute of Organoelement Compounds, Russian Academy of Sciences, Vavilov Str. 28, 117813 Moscow, Russian Federation

^bDepartment of Organic Chemistry, University of Leipzig, Johannisallee 29, D-04103 Leipzig, Germany



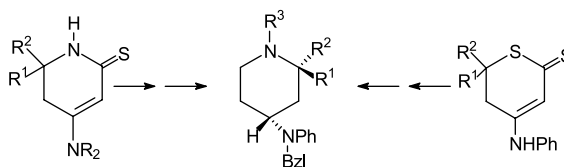
Tetrahedron 59 (2003) 1389

Synthesis of 2-substituted bamipine derivatives

Robert Weis* and Werner Seebacher

Institute of Pharmaceutical Chemistry and Pharmaceutical Technology, University of Graz, Universitätsplatz 1, A-8010 Graz, Austria

2-Alkyl and 2-aryl substituted derivatives of bamipine have been prepared in several steps from dihydropyridine-2(1*H*)-thiones and dihydro-2*H*-thiopyran-2-thiones. The configurations, the conformations and the antimycobacterial activity of the synthesized diastereoisomers have been investigated.



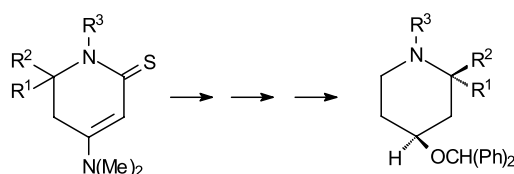
Tetrahedron 59 (2003) 1395

Synthesis of new analogues of diphenylpyraline

Robert Weis,* Andreas J. Kungl and Werner Seebacher

Institute of Pharmaceutical Chemistry and Pharmaceutical Technology, University of Graz, Universitätsplatz 1, A-8010 Graz, Austria

2-Alkyl and 2-aryl substituted analogues of diphenylpyraline were prepared from dihydropyridine-2(1H)-thiones by a new pathway. The configurations, the conformations and the antimycobacterial activity of the synthesized diastereoisomers have been investigated.



Tetrahedron 59 (2003) 1403

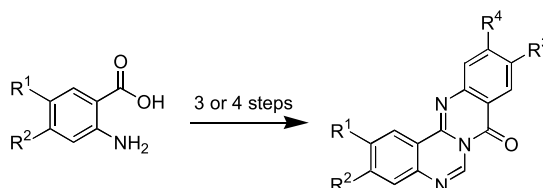
Novel series of 8H-quinazolino[4,3-b]quinazolin-8-ones via two Niementowski condensations

François-René Alexandre,^{a,b} Amaya Berecibar,^a Roger Wrigglesworth^a and Thierry Besson^{b,*}

^a*PFIZER Global Research & Development, Fresnes Laboratories, 3-9 rue de la Loge, BP100, F-94265 Fresnes cedex, France*

^b*Laboratoire de Génie Protéique et Cellulaire, EA3169, Groupe de Chimie Organique, UFR Sciences Fondamentales et Sciences pour l'Ingénieur, Bâtiment Marie Curie, Université de la Rochelle, F-17042 La Rochelle cedex 1, France*

Efficient microwave-assisted multi-step synthesis of 8H-quinazolino[4,3-b]quinazolin-8-one was investigated.



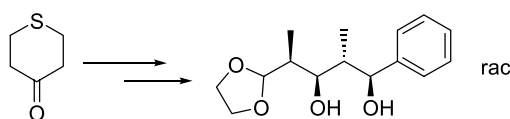
Tetrahedron 59 (2003) 1413

Model studies on a diastereoselective synthesis of the C(33)–C(37) fragment of Amphotericin B

Kaisa Karisalmi,^a Ari M. P. Koskinen,^{a,*} Maija Nissinen^b and Kari Rissanen^b

^a*Laboratory of Organic Chemistry, Helsinki University of Technology, Kemistintie 1, P.O. Box 6100, Fin-02015 HUT Espoo, Finland*

^b*Laboratory of Organic Chemistry, Department of Chemistry, University of Jyväskylä, P.O. Box 35, Fin-40014, Finland*

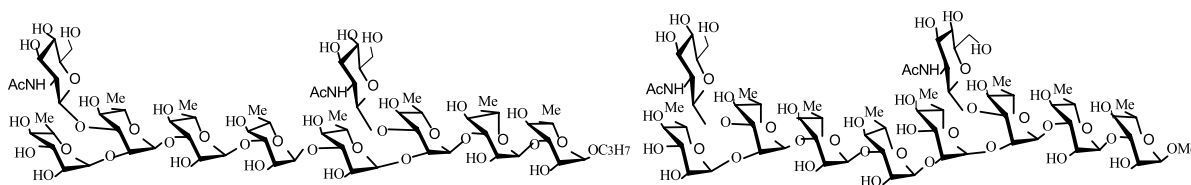


Tetrahedron 59 (2003) 1421

A general method for the synthesis of oligosaccharides consisting of α -(1 \rightarrow 2)- and α -(1 \rightarrow 3)-linked rhamnan backbones and GlcNAc side chains

Jianjun Zhang and Fanzuo Kong*

Research Center for Eco-Environmental Sciences, Academia Sinica, P.O. Box 2871, Beijing 100085, People's Republic of China



Tetrahedron 59 (2003) 1429

Design of novel conformationally restricted analogues of glutamic acid

Tetrahedron 59 (2003) 1443

Paola Conti,^a Marco De Amici,^a Gabriella Roda,^a Giulio Vistoli,^a Tine Bryan Stensbøl,^b Hans Bräuner-Osborne,^b Ulf Madsen,^b Lucio Toma^c and Carlo De Micheli^{a,*}

^aIstituto di Chimica Farmaceutica, Università di Milano, viale Abruzzi, 42-20131 Milano, Italy

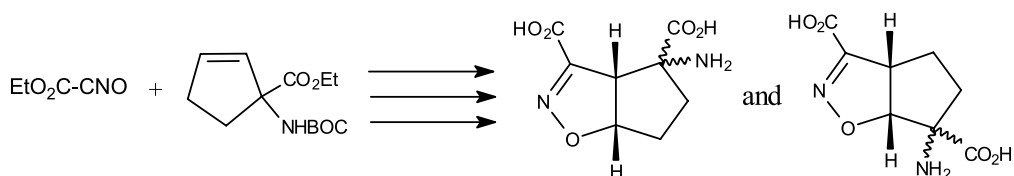
^bDepartment of Medicinal Chemistry, The Royal Danish School of Pharmacy, Universitetsparken 2, DK-2100 Copenhagen, Denmark

^cDipartimento di Chimica

Organica, Università di

Pavia, viale Taramelli,

10-27100 Pavia, Italy



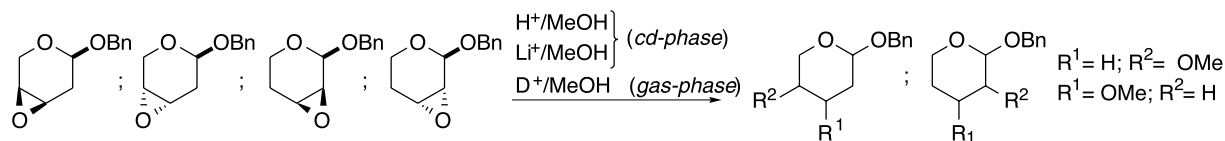
Regiochemical control of the ring opening of 1,2-epoxides by means of chelating processes. Part 15: Regioselectivity of the opening reactions with MeOH of remote *O*-substituted regio- and diastereoisomeric pyranosidic epoxides under condensed- and gas-phase operating conditions

Tetrahedron 59 (2003) 1453

Paolo Crotti,^{a,*} Gabriele Renzi,^{b,*} Lucilla Favero,^a Graziella Roselli,^b Valeria Di Bussolo^a and Micaela Caselli^a

^aDipartimento di Chimica Bioorganica e Biofarmacia, Università di Pisa, Via Bonanno 33, 56126 Pisa, Italy

^bDipartimento di Scienze Chimiche, Università di Camerino, Via S. Agostino 1, 62032 Camerino, Italy



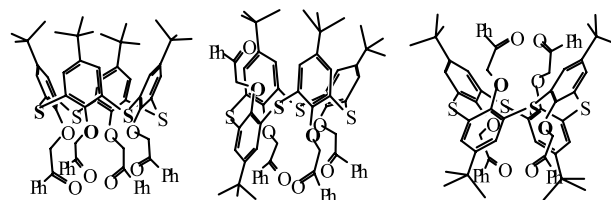
The synthesis of tetracarbonyl derivatives of thiacalix[4]arene in different conformations and their complexation properties towards alkali metal ions

Tetrahedron 59 (2003) 1469

Ivan I. Stoikov,^a Omran A. Omran,^a Svetlana E. Solovieva,^b Shamil K. Latypov,^b Konstantin M. Enikeev,^b Aidar T. Gubaidullin,^b Igor S. Antipin^{a,*} and Alexander I. Konovalov^b

^aKazan State University, Kremlevskaya str. 18, Kazan 420008, Russian Federation

^bA.E. Arbuзов Institute of Organic and Physical Chemistry, Russian Academy of Sciences Arbuзов str. 8, Kazan 420088, Russian Federation



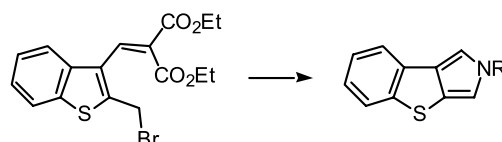
Synthesis and Diels–Alder reactions of the benzo[4,5]thieno [2,3-*c*]pyrrole ring system

Tetrahedron 59 (2003) 1477

Chin-Kang Sha,^{*} Hsi-Yen Hsu, Su-Ya Cheng and Yuan-Liang Kuo

Department of Chemistry, National Tsing Hua University, Hsinchu 300, Taiwan, ROC

The first synthesis of the parent compound of the benzo[4,5]thieno[2,3-*c*]pyrrole ring system and its derivatives, as well as their Diels–Alder reactions with DMAD and *N*-phenylmaleimide are reported. A new synthesis of the benzo[4,5]thieno[2,3-*d*]pyridazine ring system is also described.

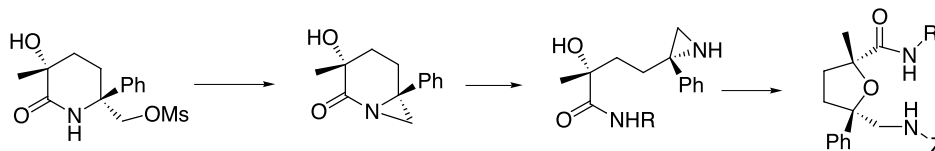


An unusual bicyclic aziridine, 1-azabicyclo[4.1.0]heptan-2-one, and its reaction with nucleophiles

Tetrahedron 59 (2003) 1483

Xiujuan Wu, Suzanne Toppet, Frans Compennolle and Georges J. Hoornaert*

Laboratorium voor Organische Synthese, Department of Chemistry, K. U. Leuven, Celestijnenlaan 200F, B3001 Leuven (Heverlee), Belgium



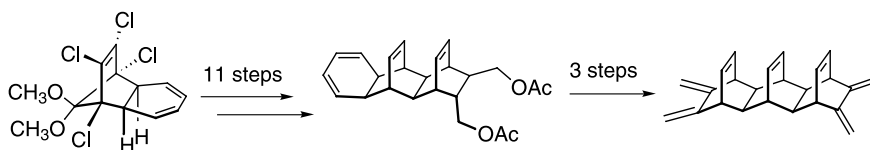
Synthesis and characterization of tetramethylene-syn-esterbicyclo[2.2.2]octene

Tetrahedron 59 (2003) 1493

Cheng-Tung Lin,^{a,*} Kun-Ze Chen^a and Teh-Chang Chou^b

^aDepartment of Chemistry, Tung Hai University, Taichung 400, Taiwan, ROC

^bDepartment of Chemistry and Biochemistry, National Chung Cheng University, Chai Yi 621, Taiwan, ROC



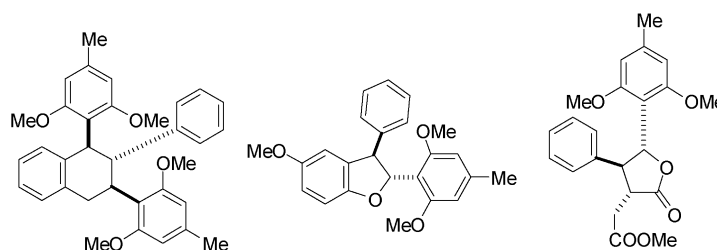
Stereoselective cyclization of stilbene derived carbocations

Tetrahedron 59 (2003) 1501

Xing-Cong Li* and Daneel Ferreira*

National Center for Natural Products Research, Research Institute of Pharmaceutical Sciences, School of Pharmacy, The University of Mississippi, University, MS 38677, USA

2,6-Dimethoxy-4-methylstilbene is subject to facile transformation into a 1,2,3-trisubstituted tetrahydronaphthalene derivative under acidic conditions. Similar reactions in the presence of 1,4-benzoquinone and maleic anhydride lead to the formation of dihydrobenzofuran and butanolide derivatives, respectively.



Dibromomethane as one-carbon source in organic synthesis: microwave-accelerated α -methylenation of ketones with dibromomethane and diethylamine

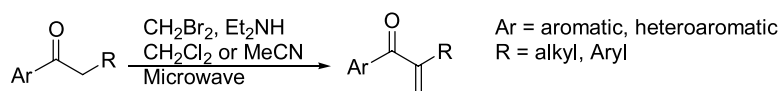
Tetrahedron 59 (2003) 1509

Yung-Son Hon,^{a,b,*} Tzyy-Rong Hsu,^a Chun-Yan Chen,^a Yi-Hui Lin,^a Fong-Jong Chang,^b Cheng-Han Hsieh^a and Ping-Hui Szu^a

^aDepartment of Chemistry and Biochemistry, National Chung Cheng University, Chia-Yi 621, Taiwan, ROC

^bInstitute of Chemistry, Academia Sinica, Nankang, Taipei 115, Taiwan, ROC

Under microwave condition, the cyclic 1,3-dicarbonyls, aryl alkyl ketones, heteroaryl alkyl ketones gave modest to good yields of the α -methylenation products.

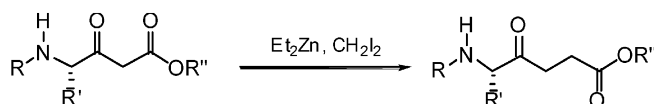


Chain extension of amino acid skeletons: preparation of ketomethylene isosteres

Tetrahedron 59 (2003) 1521

Cory R. Theberge and Charles K. Zercher*

Department of Chemistry, University of New Hampshire, Parsons Hall, Durham, NH 03824, USA



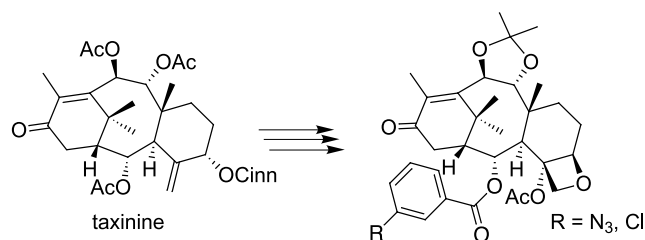
Synthesis and antitumor activity of 2-(*m*-substituted-benzoyl)baccatin III analogs from taxinine

Tetrahedron 59 (2003) 1529

Tohru Horiguchi, Takayuki Oritani and Hiromasa Kiyota*

Division of Life Science, Graduate School of Agricultural Science, Tohoku University, 1-1, Tsutsumidori-Amamiya, Aoba, Sendai, Miyagi 9818555, Japan

2-*m*-Azidobenzoyl and 2-*m*-chlorobenzoyl baccatin III analogs were prepared from taxinine, a major component in Japanese yew leaves. The antitumor activity of these compounds was evaluated.

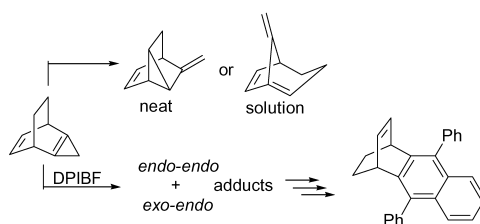


Synthesis and chemistry of tricyclic cyclopropene-tricyclo[3.2.2.0^{2,4}]nona-2(4),6-diene

Tetrahedron 59 (2003) 1539

Gon-Ann Lee,* Chih-Hwa Cherng, Ai Ni Huang and Yu-Hsien Lin

Department of Chemistry, Fu Jen Catholic University, 510 Chung Cheng Road, Hsinchuang, Taipei Hsien 24205, Taiwan, ROC

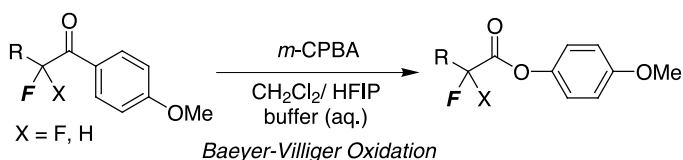


A new finding in selective Baeyer–Villiger oxidation of α -fluorinated ketones; a new and practical route for the synthesis of α -fluorinated esters

Tetrahedron 59 (2003) 1547

Satoru Kobayashi, Hiroaki Tanaka, Hideki Amii and Kenji Uneyama*

Department of Applied Chemistry, Faculty of Engineering, Okayama University, Tsushimanaka 3-1-1 Okayama 7008530, Japan



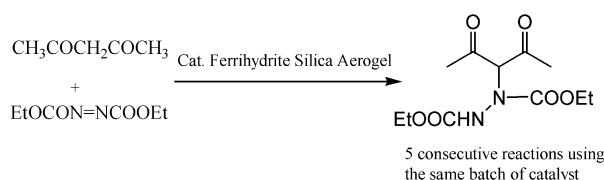
Silica aerogel-iron oxide nanocomposites: recoverable catalysts in conjugate additions and in the Biginelli reaction

Tetrahedron 59 (2003) 1553

Sandra Martínez,^a Miriam Meseguer,^a Lluís Casas,^b Elisenda Rodríguez,^b Elies Molins,^{b,*} Marcial Moreno-Mañas,^a Anna Roig,^b Rosa M. Sebastián^a and Adelina Vallribera^{a,*}

^aDepartment of Chemistry, Universitat Autònoma de Barcelona, Edifici C. Unitat de Química Orgànica, 08193 Cerdanyola (Barcelona), Spain

^bInstitiut de Ciència de Materials de Barcelona, Campus de la UAB. 08193 Cerdanyola (Barcelona), Spain

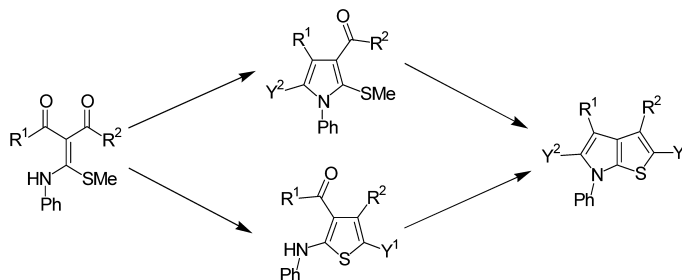


Preparation of thieno[2,3-*b*]pyrroles starting from ketene-*N,S*-acetals

Tetrahedron 59 (2003) 1557

Geoffroy Sommen, Alain Comel and Gilbert Kirsch*

Laboratoire d'Ingénierie Moléculaire et Biochimie
Pharmacologique, Faculté des Sciences, Université de Metz,
Ile du Saulcy, 57045 Metz Cedex, France



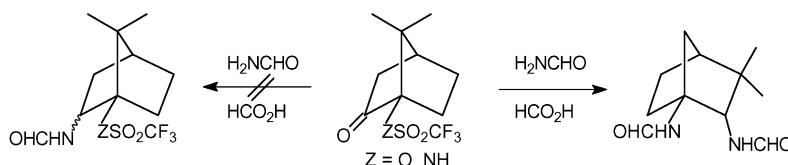
About the Leuckart reaction of chiral 2-norbornanones bearing electron-withdrawing groups: reaction of bridgehead triflates and triflamides

Tetrahedron 59 (2003) 1565

Antonio García Martínez,^{a,*} Enrique Teso Vilar,^{b,*} Amelia García Fraile^b and Paloma Martínez-Ruiz^a

^aDepartamento de Química Orgánica I, Facultad de Ciencias Químicas, Universidad Complutense de Madrid, Ciudad Universitaria s/n, E-28040, Madrid, Spain

^bDepartamento de Química Orgánica y Biología, Facultad de Ciencias, UNED, c/Senda del Rey 9, E-28040, Madrid, Spain

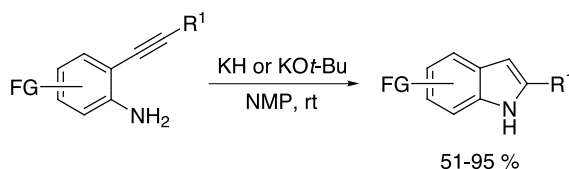


Synthesis of polyfunctional indoles and related heterocycles mediated by cesium and potassium bases

Tetrahedron 59 (2003) 1571

Christopher Koradin, Wolfgang Dohle, Alain L. Rodriguez, Bertram Schmid and Paul Knochel*

Department of Chemistry, Ludwig-Maximilians-Universität München, Butenandtstrasse 5-13, D-81377 München, Germany



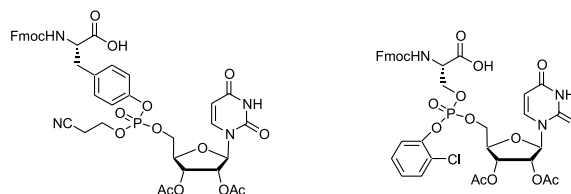
Stepwise solid phase synthesis of uridylylated viral genome-linked peptides using uridylylated amino acid building blocks

Tetrahedron 59 (2003) 1589

Nicole M. A. J. Kriek,^a Dmitri V. Filippov,^a Hans van den Elst,^a Nico J. Meeuwenoord,^a Godefridus I. Tesser,^b Jacques H. van Boom^a and Gijs A. van der Mare^{a,*}

^aGorlaeus Laboratories, Leiden Institute of Chemistry, Leiden University, P.O. Box 9502, 2300 RA Leiden, The Netherlands

^bLaboratory of Organic Chemistry, Catholic University Nijmegen, Toernooiveld, 6525 ED Nijmegen, The Netherlands



Aza-Diels–Alder reactions in ionic liquids: a facile synthesis of pyrano- and furanoquinolines

Tetrahedron 59 (2003) 1599

J. S. Yadav,* B. V. S. Reddy, J. S. S. Reddy and R. Srinivasa Rao

Division of Organic Chemistry, Natural Products Laboratory, Indian Institute of Chemical Technology, Hyderabad 500 007, India

