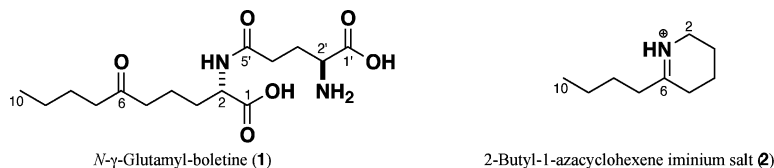


### A novel dipeptide, *N*- $\gamma$ -glutamyl boletine, and a cyclic iminium toxin from the mushroom *Tylopilus* sp. (Boletaceae)

Tetrahedron Letters 43 (2002) 6501

Reiko Watanabe, Masaki Kita and Daisuke Uemura\*

Department of Chemistry, Graduate School of Science, Nagoya University, Chikusa, Nagoya 464-8602, Japan

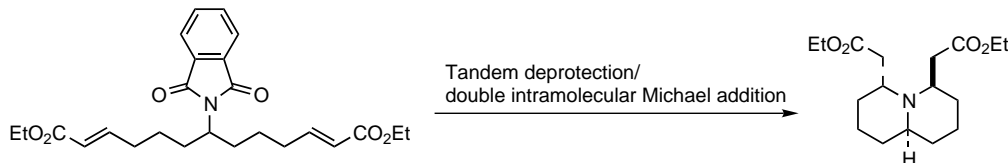


### Two-directional synthesis. Part 2: An expedient entry into the quinolizidine skeleton

Tetrahedron Letters 43 (2002) 6505

Martin Rejzek and Robert A. Stockman\*

School of Chemical Sciences, University of East Anglia, Norwich NR4 7TJ, UK

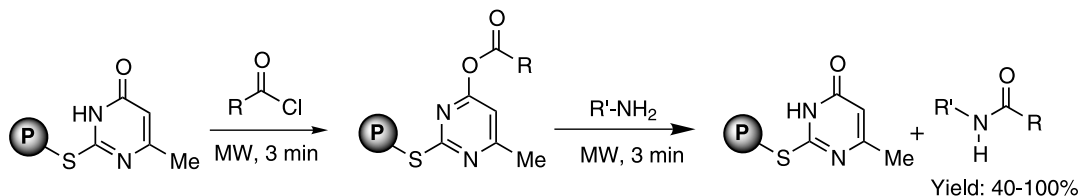


### An improved synthesis of solid-supported reagents (SSRs) for selective acylation of amines by microwave irradiation

Tetrahedron Letters 43 (2002) 6507

Elena Petricci, Maurizio Botta,\* Federico Corelli\* and Claudia Mugnaini

Dipartimento Farmaco Chimico Tecnologico, Università degli Studi di Siena, Via A. Moro, 53100 Siena, Italy



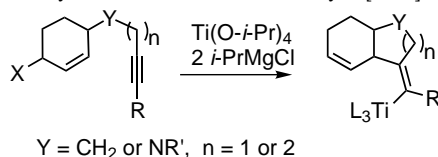
### Synthesis of carbo- and aza-bicyclo[4.3.0] and [4.4.0] compounds by Ti(II)-mediated cyclization of 2,7- or 2,8-enynyl-1-ol derivatives

Tetrahedron Letters 43 (2002) 6511

Yongcheng Song, Sentaro Okamoto and Fumie Sato\*

Department of Biomolecular Engineering, Tokyo Institute of Technology, 4259 Nagatsuta-cho, Midori-ku, Yokohama, Kanagawa 226-8501, Japan

The reaction of 2,7- and 2,8-enynyl-1-ol derivatives where the ene moiety is a part of a ring with a Ti(O-*i*-Pr)<sub>4</sub>/2 *i*-PrMgCl reagent proceeds smoothly with excellent stereoselectivity to afford carbo- or aza-bicyclo[4.3.0] and [4.4.0] compounds, respectively, in high yields.



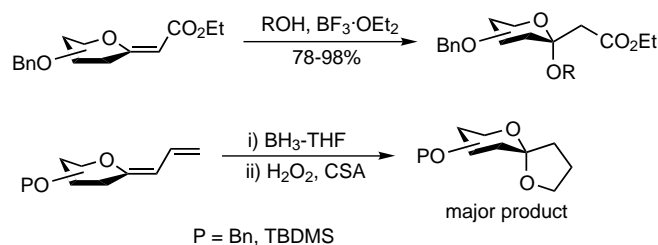
### Inter- and intramolecular alcohol additions to *exo*-glycals

Chuan-Fa Chang,<sup>a,b</sup> Wen-Bin Yang,<sup>c,\*</sup> Che-Chien Chang<sup>b</sup> and Chun-Hung Lin<sup>a,b,\*</sup>

<sup>a</sup>Graduate Institute of Life Sciences, National Defense Medical Center, Taipei, Taiwan

<sup>b</sup>Institute of Biological Chemistry, Academia Sinica No. 128, Academia Road Section 2, Nan-Kang, Taipei 11529, Taiwan

<sup>c</sup>Graduate Institute of Pharmacognosy Science, Taipei Medical University, Taipei, Taiwan



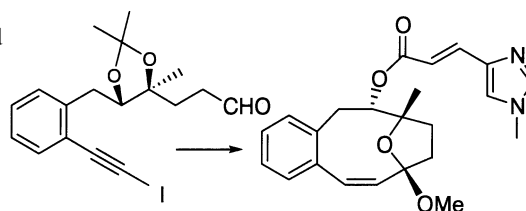
*Tetrahedron Letters* 43 (2002) 6515

### Suitable entry to a 10-membered ring with eleutheside functionality through Nozaki–Hiyama condensation

Celso Sandoval, Elena Redero, Miguel A. Mateos-Timoneda and Francisco A. Bermejo\*

Departamento de Química Orgánica, Universidad de Salamanca, Pza de la Merced sn, E-37008 Salamanca, Spain

Starting from *o*-bromophenethyl alcohol, access to a medium-sized unit of eleutheside analogs has been opened via a NiCl<sub>2</sub>/CrCl<sub>2</sub>-mediated intramolecular condensation of a readily accessible iodoaldehyde.

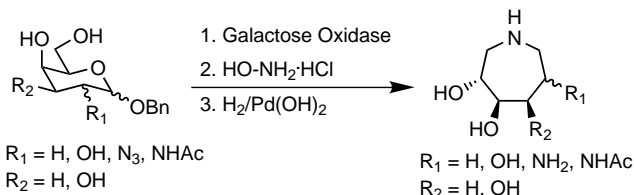


*Tetrahedron Letters* 43 (2002) 6521

### Chemo-enzymatic synthesis of polyhydroxyazepanes

Peter R. Andreana, Tom Sanders, Adam Janczuk, Joshua I. Warrick and Peng George Wang\*

Department of Chemistry, Wayne State University, 373 Chemistry, Detroit, MI 48202-3929, USA



*Tetrahedron Letters* 43 (2002) 6525

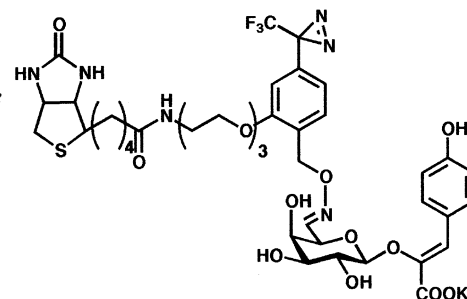
### Syntheses of novel photoaffinity probes for bioorganic studies on nyctinasty of leguminous plants

Takanori Sugimoto,<sup>a</sup> Tomohiko Fujii,<sup>a</sup> Yasumaru Hatanaka,<sup>b</sup> Shosuke Yamamura<sup>a</sup> and Minoru Ueda<sup>a,\*</sup>

<sup>a</sup>Laboratory of Natural Products, Department of Chemistry, Faculty of Science and Technology, Keio University, Hiyoshi, Yokohama 223-8522, Japan

<sup>b</sup>Research Institute for Wakan-yaku, Toyama Medical and Pharmaceutical University, Sugitani 2630, Toyama 930-01, Japan

Novel and non-radioactive photoaffinity probes for the bioorganic study of nyctinasty are designed and synthesized based on potassiumisolespedezate, a leaf-opening substance of *Cassia mimosoides* L.



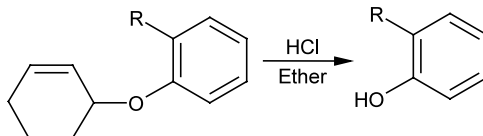
*Tetrahedron Letters* 43 (2002) 6529

## A new mild and rapid deprotecting method for aryl cyclohex-2-en-1-yl ethers to phenols

Tetrahedron Letters 43 (2002) 6533

Pascal Carato, Guillaume Laconde, Chehla Ladjel, Patrick Depreux\* and Jean-Pierre Hénichart  
Institut de Chimie Pharmaceutique Albert Lespagnol, 3 rue du Professeur Laguesse, BP83, 59006 Lille, France

Deprotection of cyclohex-2-en-1-yl ether to phenol with a new mild and rapid method.



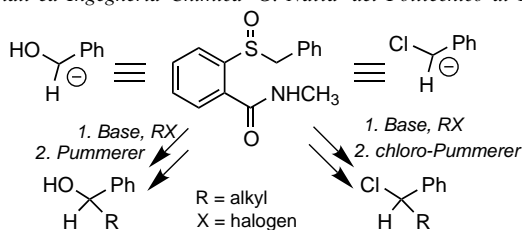
## An umpolung sulfoxide reagent as $\alpha$ -hydroxy and $\alpha$ -chloro benzyl carbanion equivalents

Tetrahedron Letters 43 (2002) 6537

Alessandro Volonterio,<sup>b,\*</sup> Pierfrancesco Bravo<sup>a,b</sup> and Matteo Zanda<sup>a,\*</sup>

<sup>a</sup>CNR, Istituto di Chimica del Riconoscimento Molecolare, sezione 'A. Quilico', via Mancinelli 7, I-20131 Milan, Italy

<sup>b</sup>Dipartimento di Chimica, Materiali ed Ingegneria Chimica 'G. Natta' del Politecnico di Milano, via Mancinelli 7, I-20131 Milan, Italy



## Rational synthesis of regioregular oligothiophenes via palladium catalyzed coupling reactions

Tetrahedron Letters 43 (2002) 6541

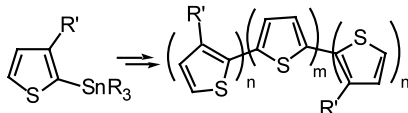
Guillaume Loire,<sup>a,c</sup> Damien Prim,<sup>b</sup> Bruno Andrioletti,<sup>a</sup> Eric Rose,<sup>a,\*</sup> André Persoons,<sup>c,\*</sup> Sonja Sioncke<sup>c</sup> and Jacqueline Vaissermann<sup>d</sup>

<sup>a</sup>Laboratoire de Synthèse Organique et Organométallique UMR 7611, Université P. et M. Curie, Tour 44-45, case 181, 4, Place Jussieu, 75252 Paris cedex 05, France

<sup>b</sup>Laboratoire SIRCOB UPRESA 8086, Université de Versailles, 45, Avenue des Etats-Unis, 78035 Versailles cedex, France

<sup>c</sup>Laboratory for Chemical and Biological Dynamics, University of Leuven, Celestijnenlaan 200D, B-3001 Heverlee, Belgium

<sup>d</sup>LCIM<sup>2</sup> UA 7071 Université P. et M. Curie, Batiment F, case 42, 4, Place Jussieu, 75252 Paris cedex 05, France



## Antifungal cyclopeptides from *Halobacillus litoralis* YS3106 of marine origin

Tetrahedron Letters 43 (2002) 6545

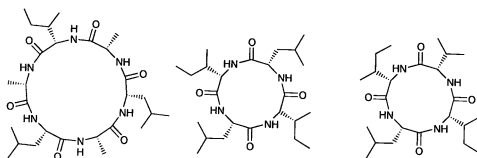
Ling Yang,<sup>a</sup> Ren-xiang Tan,<sup>a,\*</sup> Qian Wang,<sup>b,\*</sup> Wei-yi Huang<sup>c</sup> and Yong-xian Yin<sup>c</sup>

<sup>a</sup>Institute of Functional Molecules, School of Life Sciences, Nanjing University, Nanjing 210093, PR China

<sup>b</sup>Department of Chemistry, The Scripps Research Institute, 10550 North Torrey Pines Road, La Jolla, CA 92037, USA

<sup>c</sup>Department of Microbiology, Nanjing Agricultural University, Nanjing 210095, PR China

A group of unexpected cyclic peptides, constructed exclusively with highly repeated units of hydrophobic L-amino acid residues, were isolated from a high salty marine sediment-derived bacterium strain.



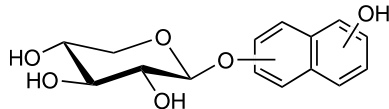
## Synthesis of naphthoxylosides on solid support

Tetrahedron Letters 43 (2002) 6549

Mårten Jacobsson and Ulf Ellervik\*

Organic and Bioorganic Chemistry, Center for Chemistry and Chemical Engineering, Lund University, PO Box 124, SE-221 00 Lund, Sweden

The 14 possible  $\beta$ -D-xylopyranosides of dihydroxynaphthalenes were synthesized on solid support. The aromatic residue was first coupled to the resin and then xylosylated under  $\text{BF}_3 \cdot \text{OEt}_2$  mediated conditions. Deprotection and cleavage from the resin gave xylosides in 6–42% yield with virtually no formation of  $\alpha$ -xyloside.



## Synthesis of *anhydro* psicofuranosyl nucleosides

Tetrahedron Letters 43 (2002) 6553

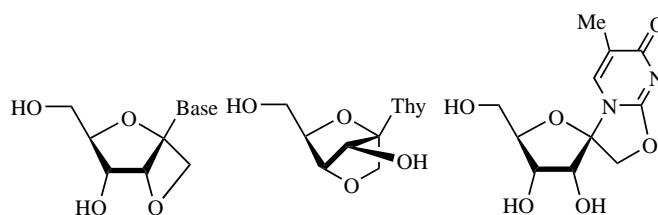
Jarkko Roivainen,<sup>a</sup> Jouko Vepsäläinen,<sup>b</sup> Alex Azhayev<sup>a,\*</sup> and Igor A. Mikhailopulo<sup>c,\*</sup>

<sup>a</sup>Department of Pharmaceutical Chemistry, University of Kuopio, PO Box 1627, FIN-70211 Kuopio, Finland

<sup>b</sup>Department of Chemistry, University of Kuopio, PO Box 1627, FIN-70211 Kuopio, Finland

<sup>c</sup>Institute of Bioorganic Chemistry, National Academy of Sciences, Acad. Kuprevicha 5, 220141 Minsk, Belarus

Two alternative pathways for the preparation of 1',3'-*anhydro* psicofuranosyl nucleosides were developed. The synthesis of 1',4'- and *O*<sup>2</sup>,1-*anhydro* psicofuranosyl thymine nucleosides was also performed.

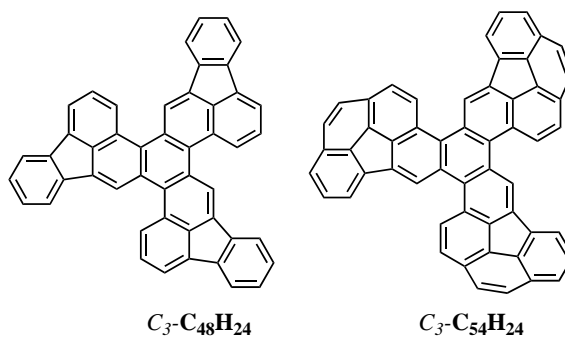


## A rapid, two step construction of novel $\text{C}_{48}\text{H}_{24}$ and $\text{C}_{54}\text{H}_{24}$ polycyclic aromatic hydrocarbons represented on the $\text{C}_{60}$ -fullerene surface via a threefold intramolecular Heck coupling reaction

Tetrahedron Letters 43 (2002) 6557

Goverdhan Mehta\* and P. V. V. Srirama Sarma

Department of Organic Chemistry, Indian Institute of Science, Bangalore 560 012, India



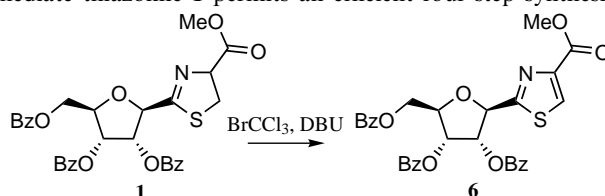
## A concise route to tiazofurin

Tetrahedron Letters 43 (2002) 6561

Richard S. Brown, James Dowden,\* Christelle Moreau and Barry V. L. Potter

Wolfson Laboratory of Medicinal Chemistry, Department of Pharmacy and Pharmacology, University of Bath, Claverton Down, Bath BA2 7AY, UK

Successful oxidation of intermediate thiazoline **1** permits an efficient four-step synthesis of tiazofurin.



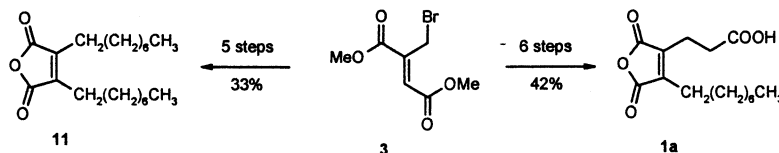
## A facile access to natural and unnatural dialkylsubstituted maleic anhydrides

Tetrahedron Letters 43 (2002) 6563

Anirban Kar and Narshinha P. Argade\*

Division of Organic Chemistry (Synthesis), National Chemical Laboratory, Pune 411 008, India

A facile route to naturally occurring **1a** and unnatural **11** has been described via a chemoselective  $S_N2'$  Grignard reaction.



## Platinum-pincer introduction using active ester chemistry

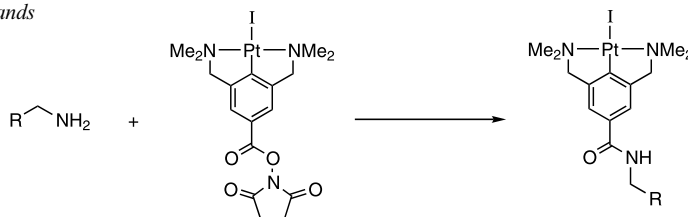
Tetrahedron Letters 43 (2002) 6565

Bart M. J. M. Suijkerbuijk,<sup>a</sup> Martijn Q. Slagt,<sup>a</sup>

Robertus J. M. Klein Gebbink,<sup>a</sup> Martin Lutz,<sup>b</sup> Anthony L. Spek<sup>b</sup> and Gerard van Koten<sup>a,\*</sup>

<sup>a</sup>Debye Institute, Department of Metal-Mediated Synthesis, Utrecht University, Padualaan 8, 3584 CH Utrecht, Netherlands

<sup>b</sup>Bijvoet Center for Biomolecular Research, Department of Crystal and Structural Chemistry, Utrecht University, Padualaan 8, 3584 CH Utrecht, Netherlands



## Studies of organic-inorganic solids possessing sensitive oligoarylene-vinylene chromophore-terminated phosphonates

Tetrahedron Letters 43 (2002) 6569

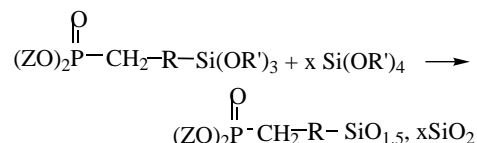
Richard Frantz,\* Céline Carbonneau, Michel Granier,

Jean-Olivier Durand, Gérard F. Lanneau and Robert J. P. Corriu

Chimie Moléculaire et Organisation du Solide UMR 5637, case courrier 007, Université Montpellier 2, place Eugène Bataillon, F-34095 Montpellier cedex 05, France

The syntheses of xerogels possessing a phosphonate group covalently linked to a silica matrix through a fluorescent carbon backbone are described.

BET and fluorescent analyses showed different behaviors for closely related structures. Hydrolysis of Et and *t*-Bu phosphonates in the presence of sensitive  $\pi$ -conjugated anthryl chromophore is described.



$R'$ : Et, Me  $Z$ : Et, *t*-Bu

$R$ : Oligoarylene-vinylene Fluorophore

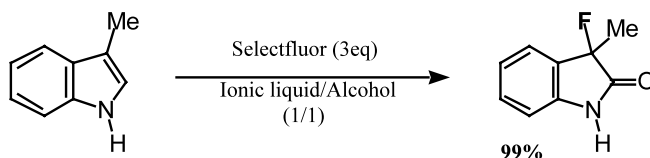
## Ionic liquids as solvents of choice for electrophilic fluorination: fluorination of indoles by F-TEDA-BF<sub>4</sub>

Tetrahedron Letters 43 (2002) 6573

Jérôme Baudoux, Anne-Frédérique Salit, Dominique Cahard and Jean-Christophe Plaquevent\*

Laboratoire des Fonctions Azotées et Oxygénées Complexes, IRCOF et UMR 6014, Faculté des Sciences, Université de Rouen, F-76821 Mont-Saint-Aignan, France

F-TEDA-BF<sub>4</sub> was shown to be soluble in ionic liquids, thus allowing the 'green' electrophilic fluorination of indolic derivative in high chemoselectivity and yield.



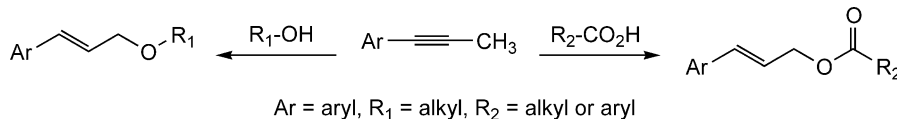
### Palladium-catalyzed coupling of alkynes with alcohols and carboxylic acids

*Tetrahedron Letters* 43 (2002) 6575

Weijiang Zhang,\* Anthony R. Haight and Margaret C. Hsu

*GPRD Process Chemistry & Engineering, Abbott Laboratories, 1401 Sheridan Rd., North Chicago, IL 60064, USA*

The palladium-catalyzed coupling of alkynes with alcohols and carboxylic acids to give allylic ethers and esters has been achieved. With phenols, these conditions furnish the *C*-alkylation products.

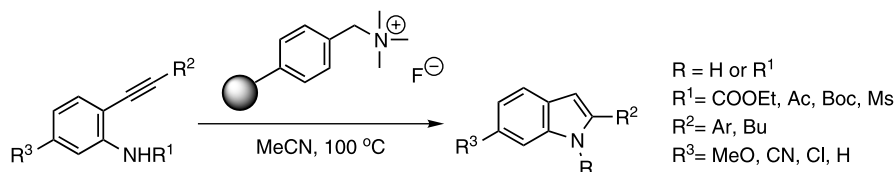


### Convenient indole synthesis from ethynylanilines with a polymer-supported fluoride

*Tetrahedron Letters* 43 (2002) 6579

Akito Yasuhara,\* Naoyuki Suzuki, Takashi Yoshino, Yousuke Takeda and Takao Sakamoto\*

*Graduate School of Pharmaceutical Sciences, Tohoku University, Aobaku, Sendai 980-8578, Japan*

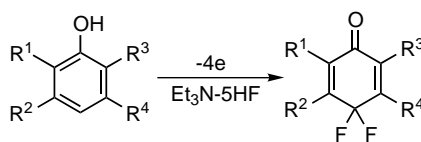


### Effective synthesis of difluorocyclohexadienones by electrochemical oxidation of phenols

*Tetrahedron Letters* 43 (2002) 6583

Tsuyoshi Fukuhara, Yuriko Akiyama, Norihiko Yoneda, Takahisa Tada and Shoji Hara\*

*Division of Molecular Chemistry, Graduate School of Engineering, Hokkaido University, Sapporo 060-8628, Japan*



### Unusual formation of cyclic-orthoesters by Pd(II)-mediated cyclization-carbonylation of propargylic acetates

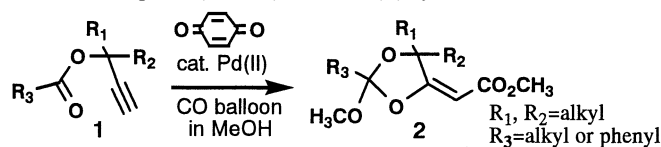
*Tetrahedron Letters* 43 (2002) 6587

Keisuke Kato,<sup>a,\*</sup> Yasuhiro Yamamoto<sup>b</sup> and Hiroyuki Akita<sup>a,\*</sup>

<sup>a</sup>*School of Pharmaceutical Sciences, Toho University, 2-2-1 Miyama, Funabashi, Chiba 274-8510, Japan*

<sup>b</sup>*Department of Chemistry, Faculty of Science, Toho University, 2-2-1 Miyama, Funabashi, Chiba 274-8510, Japan*

The oxidative cyclization-methoxycarbonylation of propargylic acetates **1** in the presence of  $(\text{CH}_3\text{CN})_2\text{PdCl}_2/p$ -benzoquinone in methanol under carbon monoxide atmosphere (balloon) afforded (*E*)-cyclic-orthoesters **2** in moderate yields.

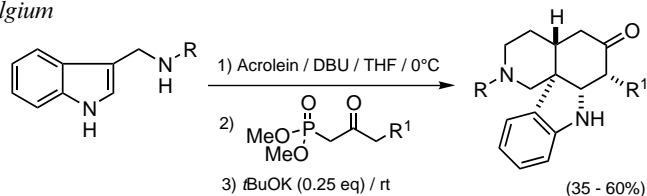


**Novel anionic polycyclisation cascade. Highly stereocontrolled assembly of functionalised tetracycles akin to the middle core of the manzamines**

*Tetrahedron Letters* 43 (2002) 6591

Laurent Turet, István E. Markó,\* Bernard Tinant, Jean-Paul Declercq and Rolland Touillaux

*Université catholique de Louvain, Département de Chimie, Bâtiment Lavoisier, Place Louis Pasteur 1, B-1348 Louvain-la-Neuve, Belgium*

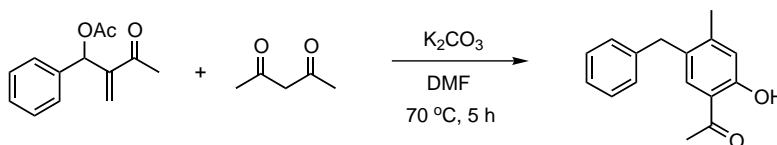


**Synthesis of *ortho*-hydroxyacetophenone derivatives from Baylis–Hillman acetates**

*Tetrahedron Letters* 43 (2002) 6597

Jae Nyoung Kim,\* Yang Jin Im and Jeong Mi Kim

*Department of Chemistry and Institute of Basic Science, Chonnam National University, Kwangju 500-757, South Korea*



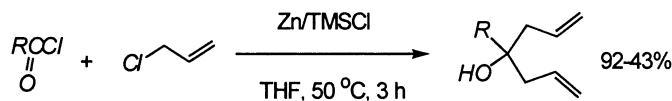
**Metal zinc-promoted *gem*-bisallylation of acid chlorides with allyl chlorides in the presence of chlorotrimethylsilane**

*Tetrahedron Letters* 43 (2002) 6601

Yoshio Ishino,\* Masatoshi Mihara and Manabu Kageyama

*Osaka Municipal Technical Research Institute, 1-6-50, Morinomiya, Joto-ku, Osaka 536-8553, Japan*

Treatment of acid chlorides (**2**) with allyl chlorides (**1**) in the presence of zinc dust and a catalytic amount of TMSCl brought about highly facile and effective coupling to give the corresponding bis-allylation products, 4-hydroxy-penta-1,6-dienes (**3**), in good to excellent yields.



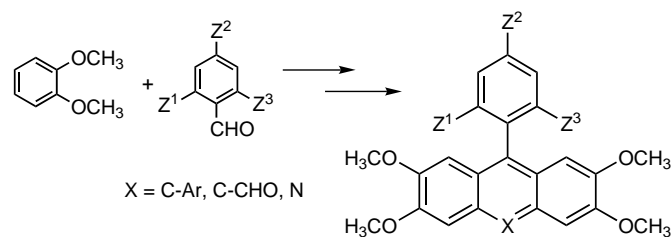
**Brønsted- and Lewis acid-catalyzed cyclization giving rise to substituted anthracenes and acridines**

*Tetrahedron Letters* 43 (2002) 6605

Raf Goossens, Mario Smet and Wim Dehaen\*

*Department of Chemistry, Katholieke Universiteit Leuven, Celestijnenlaan 200F, B-3001 Heverlee (Leuven), Belgium*

A versatile acid-catalyzed strategy for the preparation of substituted anthracenes and acridines is explored. The compounds prepared may be of interest for NLO applications.



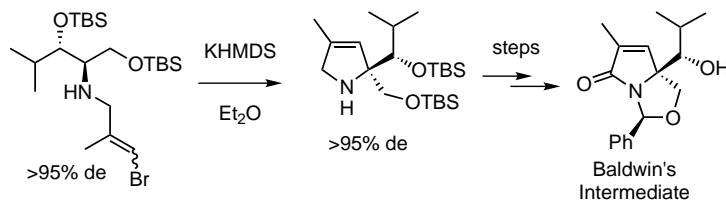
## An enantioselective formal synthesis of the proteasome inhibitor (+)-lactacystin

Tetrahedron Letters 43 (2002) 6609

Martin P. Green,<sup>a</sup> Jeremy C. Prodger<sup>b</sup> and Christopher J. Hayes<sup>a,\*</sup>

<sup>a</sup>The School of Chemistry, The University of Nottingham, University Park, Nottingham NG7 2RD, UK

<sup>b</sup>GlaxoSmithKline, Medicines Research Centre, Gunnels Wood Road, Stevenage, Hertfordshire SG1 2NY, UK

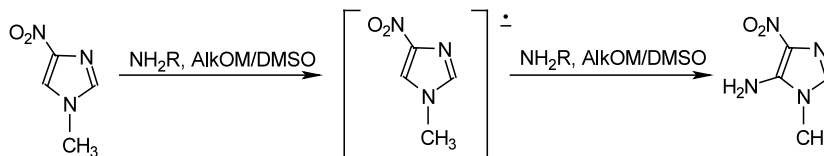


## Vicarious C-amination of 1-methyl-4-nitroimidazole

Tetrahedron Letters 43 (2002) 6613

Olga V. Donskaya,<sup>\*</sup> Valentina N. Elokhina, Anatoly S. Nakhmanovich, Tamara I. Vakul'skaya, Lyudmila I. Larina, Aleksandr I. Vokin, Aleksandr I. Albanov and Valentin A. Lopyrev

A.E. Favorsky Institute of Chemistry of the Russian Academy of Sciences, Siberian Branch, Favorsky Street 1, Irkutsk 664033, Russia

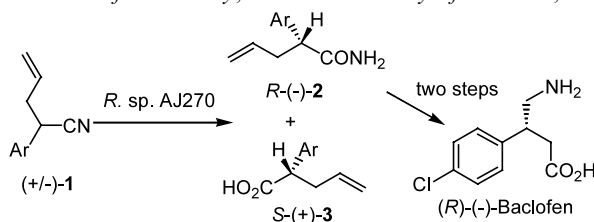


## Highly enantioselective biotransformations of 2-aryl-4-pentenitriles, a novel chemoenzymatic approach to (R)-(-)-baclofen

Tetrahedron Letters 43 (2002) 6617

Mei-Xiang Wang<sup>\*</sup> and Sheng-Min Zhao

Center for Molecular Science, Institute of Chemistry, Chinese Academy of Sciences, Beijing 100080, China



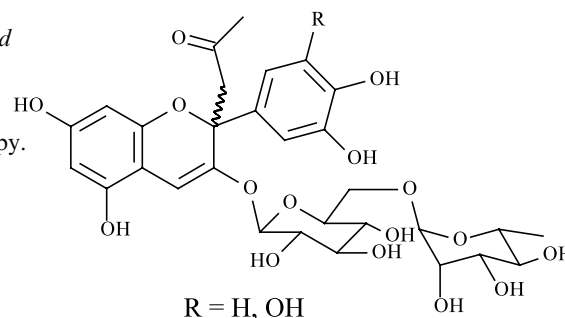
## Isolation of the first C-2 addition products of anthocyanins

Tetrahedron Letters 43 (2002) 6621

Yinrong Lu,<sup>\*</sup> L. Yeap Foo and Herbert Wong

Industrial Research Limited, PO Box 31310 Lower Hutt, New Zealand

The colorless C-2 addition products between acetone and cyanidin- or delphinidin-3-rutinoside were isolated as diastereoisomers and their chemical structures elucidated by 1D and 2D NMR spectroscopy.



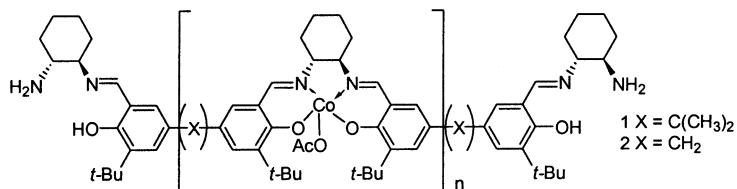


## Highly enantioselective resolution of terminal epoxides using polymeric catalysts

Tetrahedron Letters 43 (2002) 6625

Yuming Song, Xiaoquan Yao, Huilin Chen, Changmin Bai, Xinquan Hu and Zhuo Zheng\*

Dalian Institute of Chemical Physics, The Chinese Academy of Sciences, Dalian 116023, PR China

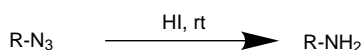


## Simple and facile reduction of azides to amines: synthesis of DNA interactive pyrrolo[2,1-c][1,4]benzodiazepines

Tetrahedron Letters 43 (2002) 6629

Ahmed Kamal,\* P. S. M. M. Reddy and D. Rajasekhar Reddy

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

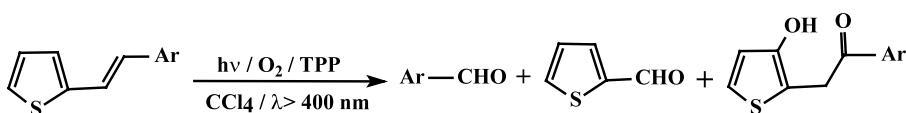


## A comparative study on photosensitized oxidation of *trans*-2-vinylthiophenes with *trans*-3-vinylthiophenes

Tetrahedron Letters 43 (2002) 6633

Kai Song, Ming-Li Peng, Ming Xu, Li-Zhu Wu,\* Li-Ping Zhang and Chen-Ho Tung\*

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## Construction of functionalised medium rings by stereospecific expansions of 2,3-epoxy alcohols under mild conditions

Tetrahedron Letters 43 (2002) 6637

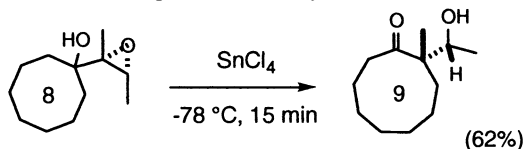
Charles M. Marson,<sup>a,\*</sup> Afzal Khan,<sup>b</sup> Rod A. Porter<sup>c</sup> and Alexander J. A. Cobb<sup>a</sup>

<sup>a</sup>Department of Chemistry, University College London, Christopher Ingold Laboratories, 20 Gordon Street, London WC1H 0AJ, UK

<sup>b</sup>Department of Chemistry, Queen Mary College, University of London, London E1 4NS, UK

<sup>c</sup>SmithKline Beecham Pharmaceuticals, New Frontiers Science Park, Third Avenue, Harlow CM19 5AW, UK

Highly stereocontrolled ring expansions afford aldol products formally derived from medium ring ketones.

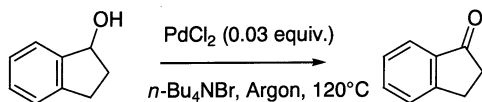


## Palladium-catalyzed dehydrogenation of benzylic alcohols in molten ammonium salts, a recyclable system

Tetrahedron Letters 43 (2002) 6641

Benjamin Ganchegui, Sandrine Bouquillon, Françoise Hénin and Jacques Muzart\*

Unité Mixte de Recherche 'Réactions Sélectives et Applications', CNRS-Université de Reims Champagne-Ardenne, B.P. 1039, 51687 Reims Cedex 2, France



	Conv. %	Yield %
First run:	100	95
Fifth run:	67	64

Neither oxygen nor additive required.

## Oxydation et addition des dihalocarbènes sur le β-himachalène

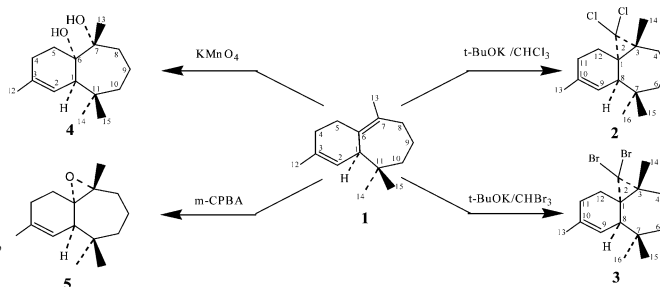
Tetrahedron Letters 43 (2002) 6645

H. Eljamili,<sup>a</sup> A. Auhmani,<sup>a,\*</sup> M. Dakir,<sup>a</sup> E. Lassaba,<sup>a</sup>  
A. Benharref,<sup>a</sup> M. Pierrot,<sup>b</sup> A. Chiaroni<sup>c</sup> et  
C. Riche<sup>c</sup>

<sup>a</sup>Laboratoire de Chimie des Substances Naturelles et des Hétérocycles, Département de Chimie Faculté des Sciences, Semlalia, Marrakech, Maroc

<sup>b</sup>2 LBS-UMR 6517, Centre Scientifique Saint-Jérôme, 13397 Marseille, CEDEX 20, France

<sup>c</sup>Institut de Chimie des Substances Naturelles (ICSN|CNRS), 91198 Gif sur Yvette, France

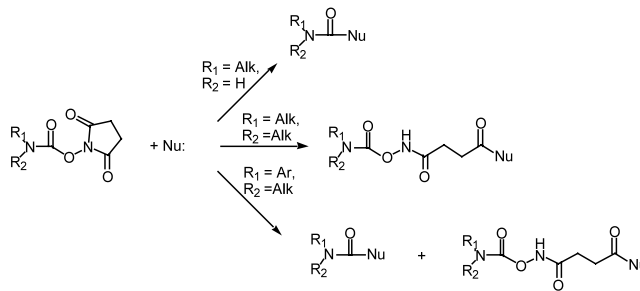


## Conversion of *O*-succinimidyl carbamates to *N*-(*O*-carbamoyl)-succinmonoamides and ureas: effects of *N*-substituents and reaction conditions on the reaction pathway

Tetrahedron Letters 43 (2002) 6649

Natalya I. Vasilevich\* and David H. Coy

Peptide Research Laboratory, Tulane Health Sciences Center, 1430 Tulane Avenue, SL12, New Orleans, LA 70112, USA



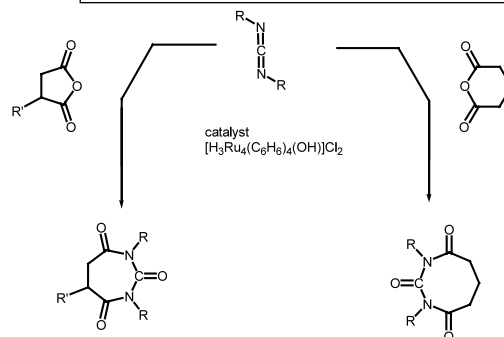
## A surprising double carbon–nitrogen coupling reaction catalyzed by [H<sub>3</sub>Ru<sub>4</sub>(C<sub>6</sub>H<sub>6</sub>)<sub>4</sub>(OH)]<sup>2+</sup>: synthesis of unusual barbiturate analogues

Tetrahedron Letters 43 (2002) 6653

Frédéric Chérioux\* and Georg Süß-Fink

Institut de Chimie, Université de Neuchâtel, Case Postale 2, CH-2007 Neuchâtel, Switzerland

Seven- and eight-membered analogues of barbituric acid are easily accessible by insertion of carbodiimides into cyclic anhydrides catalyzed by the cationic hydroxo cluster [H<sub>3</sub>Ru<sub>4</sub>(C<sub>6</sub>H<sub>6</sub>)<sub>4</sub>(OH)]<sup>2+</sup>.

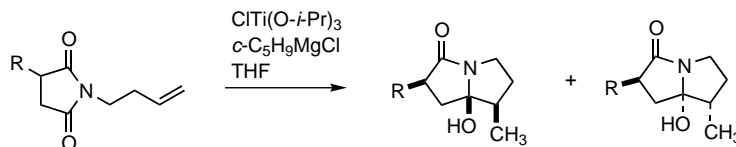


### Regio- and stereochemistry of inter- and intramolecular titanium-mediated coupling of imides and mono-substituted olefins

Tetrahedron Letters 43 (2002) 6657

Se-Ho Kim, Yongyoub Park, Hyunah Choo and Jin Kun Cha\*

Department of Chemistry, University of Alabama, Tuscaloosa, AL 35487, USA

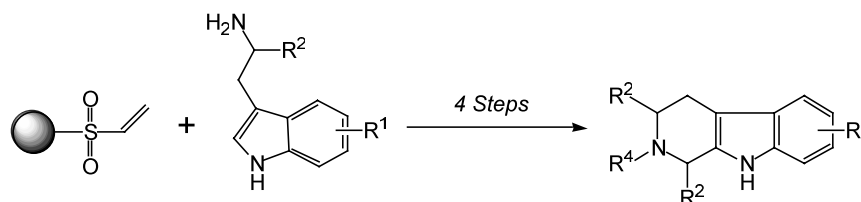


### Pictet–Spengler synthesis of tetrahydro- $\beta$ -carbolines using vinylsulfonylmethyl resin

Tetrahedron Letters 43 (2002) 6661

Richard V. Connors, Alex J. Zhang and Stephen J. Shuttleworth\*

Tularik Inc., Two Corporate Drive, South San Francisco, CA 94080, USA



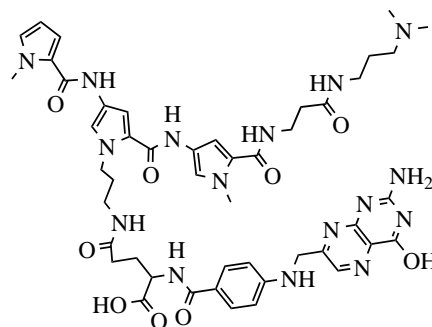
### Solid-phase synthesis of a folate conjugate of a DNA binding polyamide

Tetrahedron Letters 43 (2002) 6665

Sanjay K. Sharma and J. William Lown\*

Department of Chemistry, University of Alberta, Edmonton, AB, Canada T6G 2G2

Solid-phase synthesis of a folate tripyrrolocarboxamide conjugate of a DNA binding polyamide is described. The synthesis of a new building block monomer Boc-Py-[( $\text{CH}_2$ )<sub>3</sub>-NHfmoc] acid is also reported.



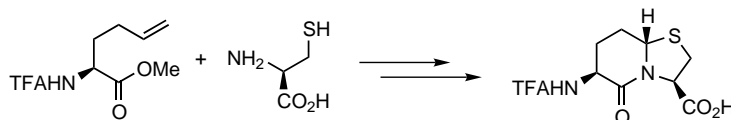
### A novel strategy toward [6,5]-bicyclic $\beta$ -turn dipeptide

Tetrahedron Letters 43 (2002) 6669

Xuyuan Gu,<sup>a</sup> Xuejun Tang,<sup>b</sup> Scott Cowell,<sup>a</sup> Jinfa Ying<sup>a</sup> and Victor J. Hruby<sup>a,\*</sup>

<sup>a</sup>Department of Chemistry, University of Arizona, 1306 East University, Tucson, AZ 85721, USA

<sup>b</sup>CB Research and Development, Inc. 27 McCullough Drive, New Castle, DE 19720, USA



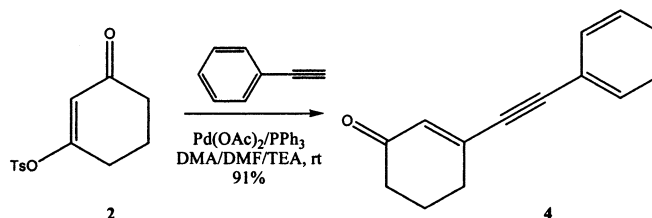
## A copper-free palladium catalyzed cross coupling reaction of vinyl tosylates with terminal acetylenes

*Tetrahedron Letters* 43 (2002) 6673

Xiaoyong Fu,\* Shuyi Zhang, Jianguo Yin and Doris P. Schumacher

*Synthetic Chemistry Department, Schering Plough Research Institute, 1011 Morris Avenue, Union, NJ 07083, USA*

The tosylate (**2**) derived from 1,3-cyclohexanedione is reacted with terminal acetylene under the copper-free conditions at ambient temperature, in the presence of Pd(OAc)<sub>2</sub> and P(Ph)<sub>3</sub> to provide the conjugated en-yn-one product in excellent overall yield while leaving other functional groups intact.



## Enantioselective synthesis of $\alpha$ -carbon deuterium-labelled L- $\alpha$ -amino acids

*Tetrahedron Letters* 43 (2002) 6677

Barry Lygo\* and Luke D. Humphreys

*School of Chemistry, University of Nottingham, Nottingham NG7 2RD, UK*

A simple and efficient method for the synthesis of  $\alpha$ -carbon deuterium labelled L- $\alpha$ -amino acids via asymmetric PTC alkylation of a benzophenone-derived glycine imine is described.

