

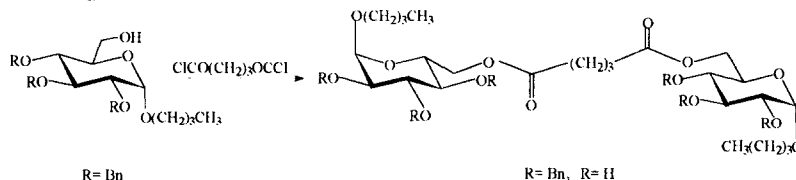
GRAPHICAL ABSTRACTS

Gemini Surfactants from Alkyl Glucosides

Mariano J. L. Castro, José Kovensky and Alicia Fernández Cirelli*

(*CIHIDECAR, CONICET*). Departamento de Química Orgánica. Facultad de Ciencias Exactas y Naturales. Universidad de Buenos Aires. Ciudad Universitaria. Pabellón II. 1428 Buenos Aires. Argentina

Reaction of suitable protected alkyl glucosides with acyl dichlorides yields non ionic gemini surfactants

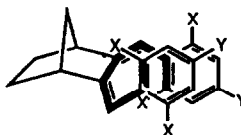


Tetrahedron Letters, 1997, 38, 3995

SYNTHESIS AND PROPERTIES OF AN ARYLSPIRALENE. A CISOID Z,Z-1,4-DIPHENYL-1,3-BUTADIENE.

J. Liu, R. S. H. Liu and C. J. Simmons, Department of Chemistry, University of Hawaii, Honolulu, HI, 96822 and Division of Science & Mathematics, Brigham Young University-Hawaii, Laie, HI 96762, U. S. A.

The synthesis, X-ray crystal structure and properties of the hindered Z,Z isomer of a cisoid 1,4-diphenyl-1,3-butadiene (**4c**, its stability enhanced by substituents at the *ortho* positions) are reported.



4a: X = Y = H
4b: X = H; Y = Cl
4c: X = Cl; Y = H

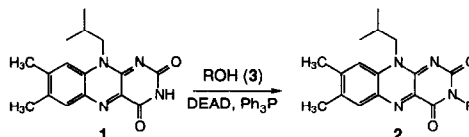
Tetrahedron Letters, 1997, 38, 3999

Model Systems for Flavoenzyme Activity. A Versatile Synthesis of N(3)-Alkylated Flavins

Jason K. Dutra, Alejandro O. Cuello and Vincent M. Rotello*

Department of Chemistry, University of Massachusetts, Amherst, MA 01003, USA

Abstract: Reaction of N(10) isobutyl flavin with primary and secondary alcohols using Mitsunobu conditions provides flavins alkylated at the N(3) position in 37-68% yield using mild conditions. This method provides a versatile and divergent synthesis of N(3) alkylated flavins of biological and chemical importance.



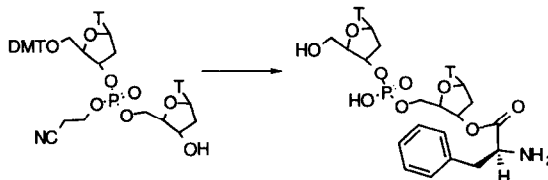
Tetrahedron Letters, 1997, 38, 4003

EFFICIENT PREPARATION OF AMINOACYLATED DINUCLEOSIDE PHOSPHATES WITH N-FMOC AMINO ACID FLUORIDES.

John S. Oliver*

and Adegboyega K. Oyelere, Department of Chemistry, Brown University, Providence, Rhode Island 02912 USA

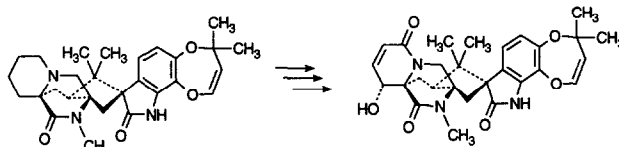
Oligonucleoside phosphates with β -cyanoethyl protecting groups on the phosphate can be aminoacylated with amino acid fluorides. Removal of protecting groups does not affect the newly formed acyl bond.



Tetrahedron Letters, 1997, 38, 4005

**An Improved Synthesis of 14 α -Hydroxy-15,16-dehydro-17-oxomarcfortine A;
A Key Intermediate in the Synthesis of 14 α -Hydroxymarcfortine A**
Byung H. Lee* and Michael F. Clothier, Animal Health Discovery Research,
Pharmacia & Upjohn, Inc., Kalamazoo, MI 49001

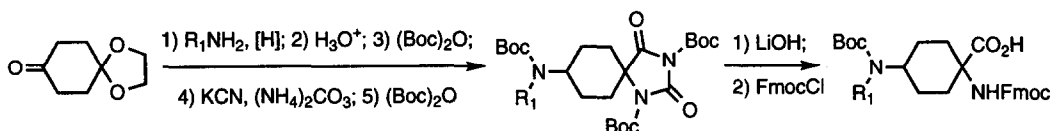
Tetrahedron Letters, 1997, 38, 4009



**SYNTHESIS OF A SERIES OF POLAR, ORTHOGONALLY PROTECTED,
 α,α -DISUBSTITUTED AMINO ACIDS.** T. Scott Yokum, Matthew G. Bursavich,
Sarina A. Piha-Paul, David A. Hall, and Mark L. McLaughlin*, Department of Chemistry, Louisiana State University, Baton Rouge,
Louisiana 70803 USA

Tetrahedron Letters, 1997, 38, 4013

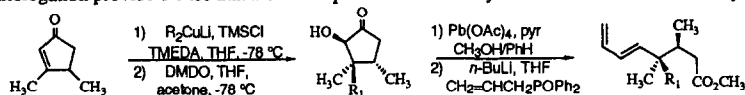
Key synthetic steps are reductive amination where $R_1 = \text{Et, Bu, or ArCH}_2$, Bucherer-Bergs reaction, and selective hydantoin hydrolysis.



**AN EFFICIENT ROUTE TO FUNCTIONALIZED DIENES FOR
DECALIN SYNTHESIS.** John W. Benbow, * Reeti Katoch,
Bonnie L. Martinez and Steven B. Shetzline, Department of Chemistry,
Lehigh University, Bethlehem, PA 18015-3172 USA.

Tetrahedron Letters, 1997, 38, 4017

The silyl enol ethers derived from the conjugate addition of organocopper reagents to 3,4-dimethylcyclopentenone react with dimethyldioxirane (DMDO) to form α -hydroxyketones with predominantly the *syn*-dimethyl orientation. Oxidative cleavage of these systems and homologation provide dienes that are useful precursors for the synthesis of clerodane decalin systems.

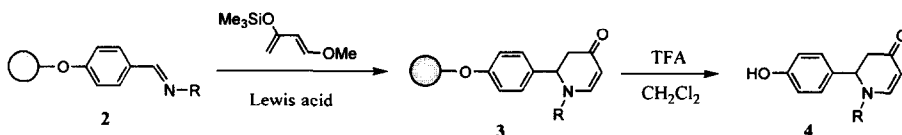


**Solid Phase Synthesis of 2,3-Dihydro-4-pyridones: Reaction
of Danishefsky's Diene with Polymer-Bound Imines**

Tetrahedron Letters, 1997, 38, 4021

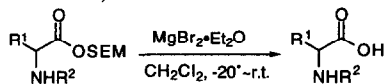
Yihan Wang and Stephen R. Wilson* Department of Chemistry, New York University, Washington Square,
New York, NY 10003

An efficient method for the construction of 2,3-dihydro-4-pyridones on solid support has been developed, which utilized the Lewis-acid catalyzed tandem Mannich-Michael reaction of Danishefsky's diene with polymer-bound aldimines.



Mild, Selective Cleavage of Amino Acid and Peptide **β -(Trimethylsilyl)ethoxymethyl (SEM) Esters by****Magnesium Bromide** Wei-Chuan Chen, Matthew D. Vera and Madeleine M. Joullié*, Department of Chemistry, University of Pennsylvania, Philadelphia, PA 19014-6323, USA

Magnesium bromide has been previously shown to cleave β -(trimethylsilyl)ethoxymethyl (SEM) esters of aliphatic acids. This methodology has now been extended successfully to amino acid and peptide derivatives in the presence of protecting groups typically encountered in peptide chemistry.

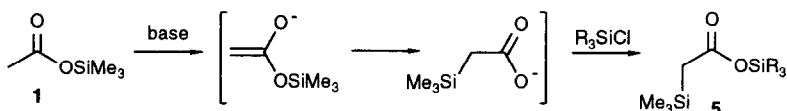


R¹ = amino acid side chains with functional groups and/or protecting groups

R² = Fmoc, Boc, Cbz, Troc or peptide

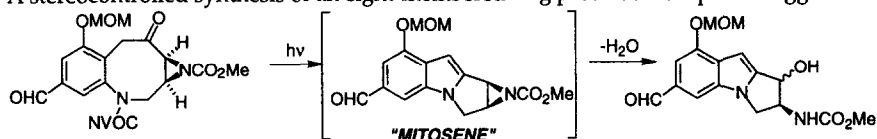
MIGRATION OF TRIMETHYLSILYL GROUPS IN ENOLATES OF SILYL**ESTERS** Paul F. Hudrlík,* Ralph R. Roberts, Da Ma, and Anne M. Hudrlík
Department of Chemistry, Howard University, Washington, D. C. 20059

The lithium enolate of trimethylsilyl acetate (**1**) undergoes a 1,3 O - C migration of the trimethylsilyl group.

**Synthetic Studies on FR900482.****Synthesis of a Photo-triggered Pro-Mitotense****Samuel B. Rollins and Robert M. Williams***

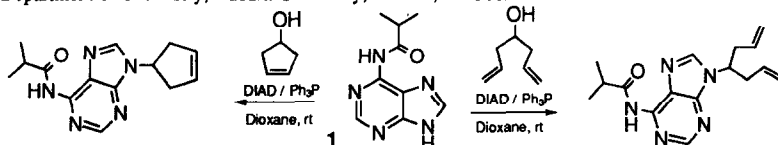
Department of Chemistry, Colorado State University, Fort Collins, Colorado 80523

A stereocontrolled synthesis of an eight-membered ring precursor to a photo-triggered mitotense is described.

**6-Isobutyrylamino-purine: A Convenient Building Block for the Synthesis of Carbocyclic Adenosine Analogs**

Jinglan Zhou, Kamal Bouhadir, Thomas R. Webb and Philip B. Shevlin*

Department of Chemistry, Auburn University, Auburn, AL 36830

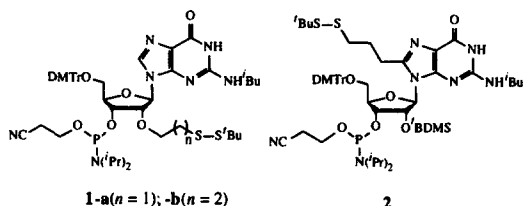


Protected adenine, **1**, is a useful replacement for 6-chloropurine in Mitsunobu coupling.

SYNTHESIS OF GUANOSINE ANALOGS BEARING PENDANT ALKYLTHIOL TETHERS.

C. William Gundlach IV, Todd R. Ryder and Gary D. Glick*, Department of Chemistry, University of Michigan, Ann Arbor, Michigan 48109-1055 U.S.A.

Synthesis of three guanosine monomers substituted with alkylthiol chains at either carbon-8 or the 2' hydroxyl is described.

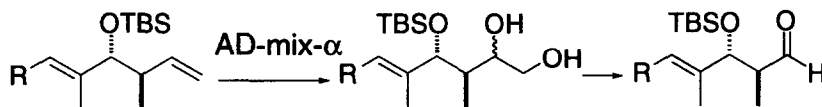


Tetrahedron Letters, 1997, 38, 4039

SELECTIVE DIHYDROXYLATION OF NON-CONJUGATED DIENES IN FAVOR OF THE TERMINAL OLEFIN.

Merritt B. Andrus,* Salvatore D. Lepore, Joseph A. Sclafani
Purdue University, Department of Chemistry, 1393 Brown Laboratories,
West Lafayette, IN 47907

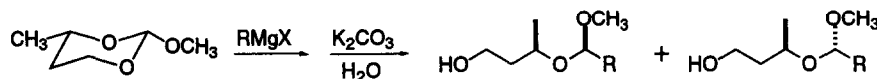
Non-conjugated dienes were selectively dihydroxylated using AD-mix- α at the terminal olefin.



Tetrahedron Letters, 1997, 38, 4043

THE STEREOCHEMISTRY OF THE GRIGNARD - ORTHO ESTER REACTION REVISITED: REGIOSELECTIVE ENDOCYCLIC CLEAVAGE IN THE REACTION OF GRIGNARD REAGENTS WITH CIS-2-METHOXY-4-METHYL-1,3-DIOXANE

William F. Bailey,* Allan A. Croteau and Alberto D. Rivera
Department of Chemistry, University of Connecticut, Storrs, Connecticut 06269-4060



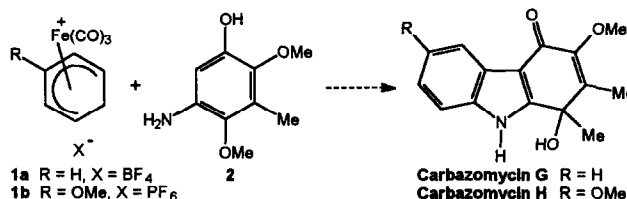
Tetrahedron Letters, 1997, 38, 4047

Transition Metal Complexes in Organic Synthesis, Part 38.

First Total Synthesis of Carbazomycin G and H

Hans-Joachim Knölker* and Wolfgang Fröhner, Institut für Organische Chemie, Universität Karlsruhe, Richard-Willstätter-Allee, D-76131 Karlsruhe

The first total synthesis of the carbazole quinol alkaloids carbazomycin G and H is described by a convergent iron-mediated construction of the carbazole nucleus starting with the complexes 1a, 1b, and the arylamine 2 as precursors.



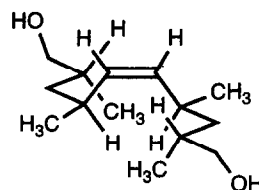
Tetrahedron Letters, 1997, 38, 4051

Z- and U-Shaped Open Chain Molecular Backbones by Conformation Design

Reinhard W. Hoffmann*, Ulrich Schopfer and Martin Stahl
Fachbereich Chemie der Philipps-Universität, D-35032,
Marburg, Germany

Conformation design led to a derivative of 1,10-decanediol which populates essentially a single conformation with a Z-shaped backbone arrangement

Tetrahedron Letters, 1997, 38, 4055

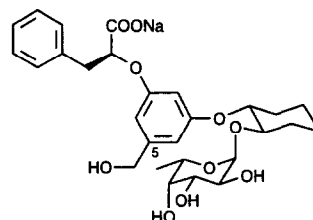


Synthesis of Sialyl Lewis^x Mimics: Replacement of Galactose by Aromatic Spacers

Rolf Bänteli,* Beat Ernst, NOVARTIS Pharma AG, CH-4002 Basel, Switzerland

Six sLe^x mimics where the original galactose moiety is replaced by aromatic spacers substituted in the C-5 position have been prepared and tested for their binding affinity to E-selectin.

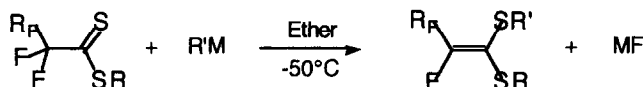
Tetrahedron Letters, 1997, 38, 4059



FLUORINATED KETENEDITHIOACETALS. 5. A NEW SYNTHESIS OF PERFLUOROKETENEDITHIOACETALS FROM ALKYL PERFLUOROALKANEDITHIOCARBOXYLATES

Charles Portella* and Yuri Shermolovich[‡]
Laboratoire "Réactions Sélectives et Applications". Unité Mixte de Recherche CNRS - Université de Reims Champagne - Ardenne
UFR Sciences, B.P. 1039, 51687 Reims Cedex 2, France.

Tetrahedron Letters, 1997, 38, 4063

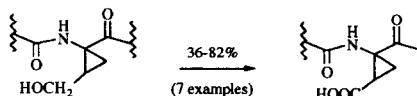


SYNTHESIS OF PEPTIDES CONTAINING 2,3-METHANOASPARTIC ACID

Emmanuelle Godler-Marc, David J. Aitken,* and Henri-Philippe Husson
Laboratoire de Chimie Thérapeutique associé au CNRS,
Faculté des Sciences Pharmaceutiques et Biologiques,
Université René Descartes, 4 avenue de l'Observatoire,
75270 Paris cedex 06, France.

Peptides containing a 2,3-methanoaspartate residue are prepared by oxidation of the corresponding 2,3-methanohomoserine derivatives

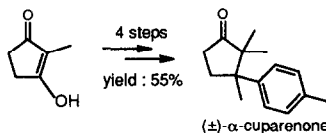
Tetrahedron Letters, 1997, 38, 4065



2-METHYLCYCLOPENTANE-1,3-DIONE: AN EFFICIENT SYNTHON FOR THE SYNTHESIS OF (\pm)- α -CUPARENONE.

Janine Cossy*, Barbara Gille, Samir BouzBouz*, Véronique Bellosta, Laboratoire de Chimie Organique, Associé au CNRS, ESPCI, 10 rue Vauquelin - 75231 Paris Cedex 05 - France.

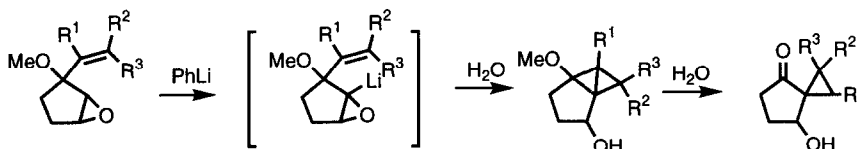
A very short synthesis of (\pm)- α -cuparenone was achieved from the commercially available 2-methylcyclopentane-1,3-dione in 4 steps with an overall yield of 55%.



Tetrahedron Letters, 1997, 38, 4069

METALATED EPOXIDES AS CARBENOIDS. STEREOSPECIFIC SYNTHESIS OF FUNCTIONALIZED SPIRO CYCLOPROPANES VIA HIGHLY STRAINED TRICYCLIC INTERMEDIATES

Claude Agami, Luc Dechoux, E. Doris and C. Mioskowski Laboratoire de Synthèse Asymétrique, Université P. et M. Curie, 75005 Paris, France and CEA, CE-Saclay, Service des Molécules Marquées, 91198 Gif-sur-Yvette, France.

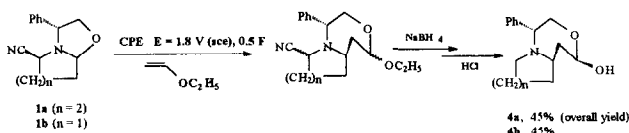


Tetrahedron Letters, 1997, 38, 4071

ANODICALLY INDUCED CYCLOADDITION OF VINYLETHYLETHER TO N-CYANOMETHYL-OXAZOLIDINE SYSTEM. STEREoselective SYNTHESIS OF β -AMINO KETAL COMPOUNDS.

Thierry Martens^a, Florence Billon-Souquet^a, Isabelle Gauthier^b and Jacques Royer^{b*}
^aLaboratoire de Chimie Analytique et d'Electrochimie, associé au CNRS, Université René Descartes, Faculté de Pharmacie, 4, Avenue de l'Observatoire, 75782 Paris. ^bInstitut de Chimie des Substances Naturelles, CNRS, 91198 Gif-sur-Yvette.

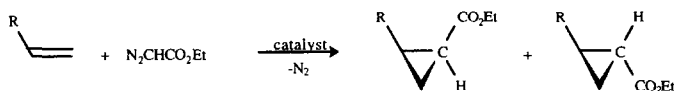
The anodic oxidation of *N*-cyanomethyloxazolidine system (1) initiates an electrocatalytic addition of vinyl ethylether at the *N,O* acetal function and affords, after NaBH₄ reduction and acid hydrolysis, the corresponding enantiomerically pure bicyclic ketal 4a and 4b



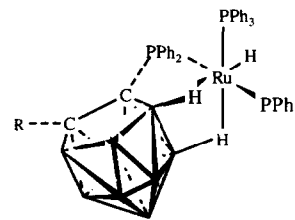
Tetrahedron Letters, 1997, 38, 4075

Cyclopropanation Reactions Catalysed by Ruthenium Complexes with New Anionic Phosphine Ligands

A. Demonceau,* F. Simal, and A.F. Noels
 University of Liège, Sart-Tilman (B.6a), B-4000 Liège, Belgium
 C. Viñas,* R. Nuñez, and F. Teixidor
 Institut de Ciència de Materials de Barcelona, 08193 Bellaterra, Spain



Tetrahedron Letters, 1997, 38, 4079



R = H, Me

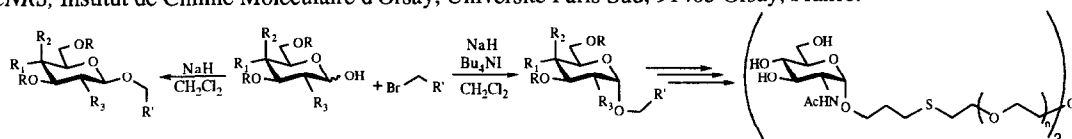
STUDIES TOWARDS THE DESIGN OF A MODIFIED GC BASE PAIR WITH STABILITY SIMILAR TO THAT OF THE AT BASE PAIR.

Hong-Khanh Nguyen, Ulysse Asseline, Daniel Dupret* and Nguyen T. Thuong*.

Centre de Biophysique Moléculaire, CNRS, Rue Charles Sadron, 45071 Orléans Cedex 02, France and Appligène-Oncor, Parc d'Innovation, BP 72, 67407 Illkirch, France*

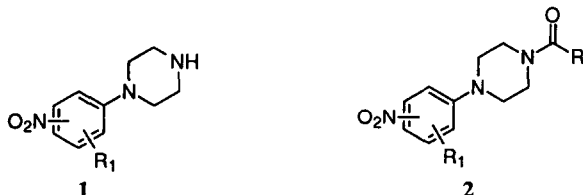
 Comparison of stabilities of duplexes involving modified nucleosides show that the thermal stabilities of modified base pairs G^{4-Me}C, G^{4-Et}C, I^{5-Me}C and I^{5-Br}C are equivalent to that of the AT base pair.

Stereoselectivity Control in Anomeric O-alkylation. Application to the Synthesis of C₂ Symmetric Glycoconjugates.

 A. Lubineau*, S. Escher, J. Alais and D. Bonnaffé. *Laboratoire de Chimie Organique Multifonctionnelle, associé au CNRS, Institut de Chimie Moléculaire d'Orsay, Université Paris Sud, 91405 Orsay, France.*

SOLUTION PHASE COMBINATORIAL SYNTHESIS OF ARYLPIPERAZINES

Luc Neuville, Jieping Zhu*

Institut de Chimie des Substances Naturelles, CNRS, 91198 Gif-Sur-Yvette, France



A small library of arylpiperazines 1 and 2 was created by a solution phase combinatorial synthesis.

CATALYTIC EFFICIENCY, LIGAND ACCELERATION, AND CONCENTRATION EFFECT IN MAGNESIUM ION MEDIATED
1,3-DIPOLAR CYCLOADDITIONS OF MESITONITRILE OXIDE TO ALLYLIC ALCOHOLS. Shuji Kanemasa,* Kumi Okuda, Hidetoshi Yamamoto, and Shinsuke Kaga, Institute of Advanced Material Study, Kyushu University, Kasugakoen, Kasuga 816, Japan

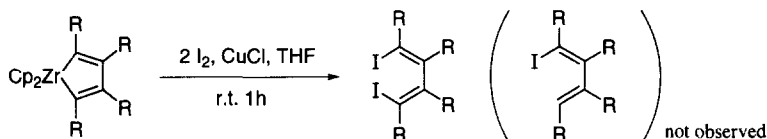
Catalytic cycle, ligand acceleration, and concentration effect in magnesium ion catalyzed nitrile oxide cycloaddition reactions to allylic alcohols are discussed.



REMARKABLE EFFECT OF COPPER CHLORIDE ON DIIODINATION**OF ZIRCONACYCLOPENTADIENES.** Chanjuan Xi, Shouquan Huo, Tarek

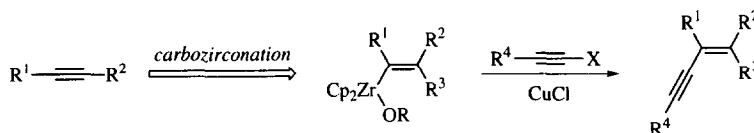
Hassan Afifi, Ryuichiro Hara and Tamotsu Takahashi,* Catalysis Research Center and Graduate School of Pharmaceutical Sciences, Hokkaido University, Kita-ku, Sapporo 060, Japan

Diodination of zirconacyclopentadienes was remarkably improved by addition of 1 equiv of CuCl.

**HIGHLY SUBSTITUTED ENYNE FORMATION BY COUPLING REACTION OF ALKENYLZIRCONIUM COMPOUNDS WITH ALKYNYL HALIDES.**

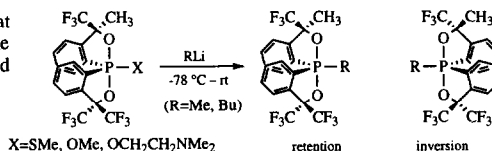
Ryuichiro Hara, Yuanhong Liu, Wen-Hua Sun, Tamotsu Takahashi,* Catalysis Research Center and Graduate School of Pharmaceutical Sciences, Hokkaido University, Sapporo 060, Japan

Highly substituted 1,3-enynes were obtained by the reaction of alkenylzirconium compounds with alkynyl halides in the presence of CuCl.

**STEREOCHEMISTRY OF NUCLEOPHILIC SUBSTITUTION REACTIONS OF STERICALLY RIGID PHOSPHORANES**

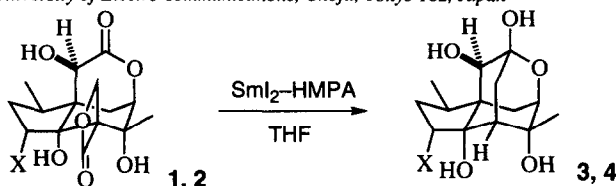
Satoshi Kojima, Masaaki Nakamoto, Katsuhiro Yamazaki, and Kin-ya Akiba*, Department of Chemistry, Faculty of Science, Hiroshima University 1-3-1 Kagamiyama, Higashi-Hiroshima 739, Japan

Nucleophilic substitution reaction stereochemistry at pentacoordinate phosphorus was found to depend on the leaving group, stereochemistry of the reactant, and solvent.

**ABNORMAL REACTIVITY OF ANISATIN AND NEOANISATIN TO SAMARIUM IODIDE-HEXAMETHYLPHOSPHORICTRIAMIDE.**

Kazuyoshi Obitsu, Shojiro Maki, Haruki Niwa,* Takashi Hirano, Mamoru Ohashi

Department of Applied Physics and Chemistry, The University of Electro-communications, Chofu, Tokyo 182, Japan

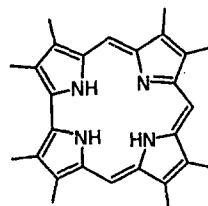
Reactions of anisatin (1, X = OH) and neoanisatin (2, X = H) with SmI₂-HMPA gave the oxaadamanthane derivatives 3 and 4, respectively.

AN IMPROVED SYNTHESIS OF CORROLE

Tetrahedron Letters, 1997, 38, 4113

Saburo Neya, Kaori Ohyama, and Noriaki Funasaki
*Department of Physical Chemistry, Kyoto Pharmaceutical University,
Yamashina, Kyoto 607, Japan.*

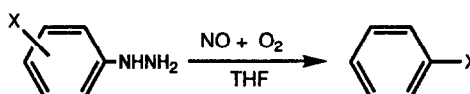
Utilization of readily available tertiary butyl 5-iodo-3,4-dialkylpyrrole-2-carboxylate and 5,5'-diformylpyrromethane opens a simple route to corrole.



REACTION OF ARYLHYDRAZINES WITH NITRIC OXIDE IN THE PRESENCE OF OXYGEN

Tetrahedron Letters, 1997, 38, 4117

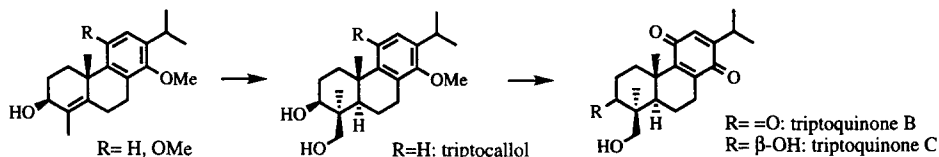
Takashi Itoh, Yūji Matsuya, Kazuhiro Nagata,
and Akio Ohsawa*
*School of Pharmaceutical Sciences,
Showa University, 1-5-8 Hatanodai,
Shinagawa-ku, Tokyo 142, Japan*



ENANTIOCONTROLLED TOTAL SYNTHESIS OF THE DITERPENOID, TRIPTOQUINONE B, C AND TRIPTOCALLOL

Tetrahedron Letters, 1997, 38, 4121

Itsuki Yamamura, Yoko Fujiwara, Toshihiro Yamato, Osamu Irie and Koza Shishido*
Institute for Medicinal Resources, University of Tokushima, Sho-machi 1, Tokushima 770, Japan

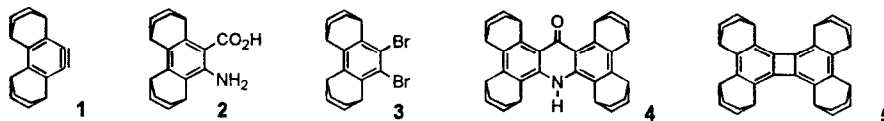


REACTIONS OF A BENZYNE ANNELED WITH TWO BICYCLO[2.2.2]OCTENE UNITS

Tetrahedron Letters, 1997, 38, 4125

Akira Matsuura, Tohru Nishinaga, and Koichi Komatsu*
Institute for Chemical Research, Kyoto University, Uji, Kyoto-fu 611, Japan

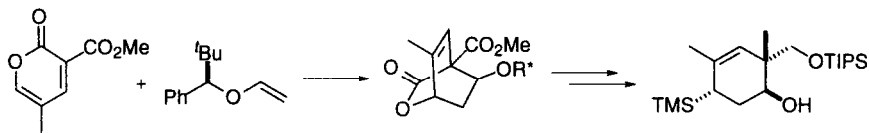
Benzynes **1** generated from **2** gave acridone **4** while that generated from **3** gave biphenylene **5**; the redox behavior of **5** was investigated.



**DIASTEREO- AND ENANTIOSELECTIVE SYNTHESIS OF ALLYLSILANE.
A USEFUL C-RING FRAGMENT OF TAXOL.**

Hirooyuki Kusama, Takeshi Mori, Ikuo Mitani, Hajime Kashima, and Isao Kuwajima*
Department of Chemistry, Tokyo Institute of Technology, Meguro, Tokyo 152, Japan

Diastereo- and enantioselective synthesis of a taxol C-ring fragment containing an allylsilane moiety is described.

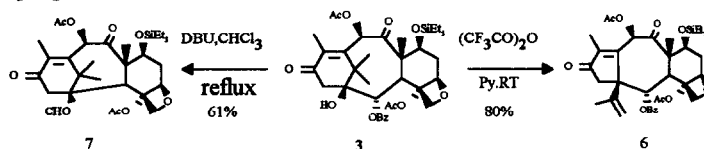


Tetrahedron Letters, 1997, 38, 4129

**SKELETAL REARRANGEMENT OF A AND B RING OF
13-OXOBACCATIN III DERIVATIVE**

Cheng-zhi Yu Zhi-yu Liu*
Shanghai Institute of Organic Chemistry, The Chinese Academy Of Sciences, Shanghai 200032, China

Treatment of 3 with (CF₃CO)₂O or DBU leads to A ring or B ring contracted 6 or 7, respectively.

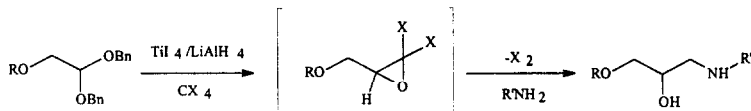


Tetrahedron Letters, 1997, 38, 4133

**A New Route to Amino-2-propanol Structures with Adrenergic
β-blocker Activity Using Low Valent Titanium**

J.L. Bermudez, C. del Campo, J.V. Sinisterra* and E. F. Llama.

Dpto. Química Organica y Farmaceutica. Facultad de Farmacia. Universidad Complutense de Madrid.



Tetrahedron Letters, 1997, 38, 4137

**A MILD OXIDATIVE DECARBOXYLATION OF CARBOHYDRATE
ACIDS**

Cosme G. Francisco, Concepción C. González, Ernesto Suárez*

Instituto de Productos Naturales y Agrobiología del C.S.I.C. Carretera de La Esperanza 3, 38206-La Laguna, Tenerife, Spain.

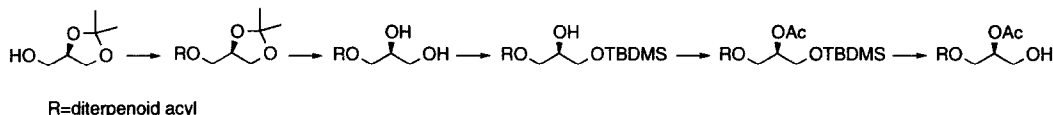
The oxidative decarboxylation of carbohydrate uronic or ulosonic acids with simultaneous replacement by an acetoxy group has been accomplished using the (diacetoxyiodo)benzene (DIB) and iodine system under mild conditions. A general synthesis of derivatives of tetrodialdoses, and pentodialdoses in furanose or pyranose form is described.



Tetrahedron Letters, 1997, 38, 4141

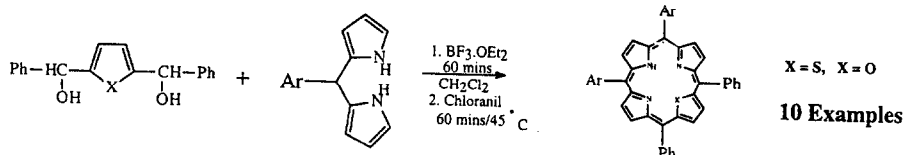
REGIOSELECTIVE SYNTHESIS OF DITERPENOID 1,2-DIACYL-*sn*-GLYCERIDES. Angelo Fontana,* Nikon Ungur, Margherita Gavagnin, Ciro Salierno and Guido Cimino, Istituto per la Chimica di Molecole di Interesse Biologico (CNR), via Toiano 6, 80072 Arco Felice (Na), Italy.

The stereospecific synthesis of 1-diterpenoid acyl-2-acetyl-*sn*-glycerols is reported. The chemical route may be regarded as a general way to prepare 1,2-diacylglycerides.



IMPROVED SYNTHESIS OF MESO SUBSTITUTED 21-OXA AND 21-THIA TETRAPHENYL PORPHYRINS. A.Srinivasan, B.Sridevi, M.Venkat Ram Reddy, S.Jeyaprakash Narayanan and T.K.Chandrashekar, Department of Chemistry, Indian Institute of Technology, Kanpur-208016, INDIA.

Reaction of dipyrromethanes with furan or thiophene diols leads to exclusive formation of 21-Oxa and 21-thia meso aryl porphyrins.



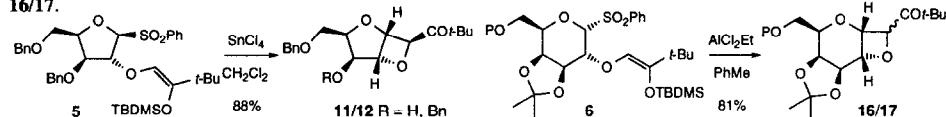
TEMPLATE-DIRECTED INTRAMOLECULAR C-GLYCOSIDATION. STEREOSELECTIVE SYNTHESIS OF BICYCLIC KETOXETANES FROM ANOMERIC SULFONES

Donald Craig,^a Jason P. Tierney^a and Christopher Williamson^b

^aDepartment of Chemistry, Imperial College of Science, Technology and Medicine, London SW7 2AY, U.K.

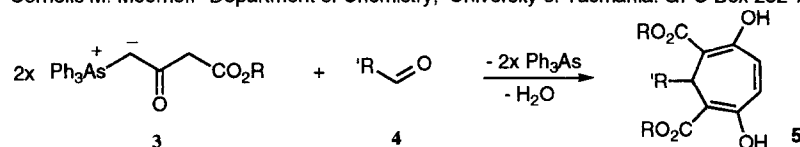
^bGlaxo Research and Development Limited, Greenford Road, Greenford, Middlesex UB6 0HE, U.K.

Lewis acid treatment of thioglycosidic silyl enol ethers **5** and **6** gives respectively bicyclic ketoxetanes **11/12** and **16/17**.



AN UNUSUAL CONDENSATION OF ALKYL 3-OXO-4-(TRIPHENYLARSORANYLIDENE)BUTANOATE WITH ALDEHYDES; SYNTHESIS OF SYMMETRICAL SUBSTITUTED 1,3,5-CYCLOHEPTATRIENES

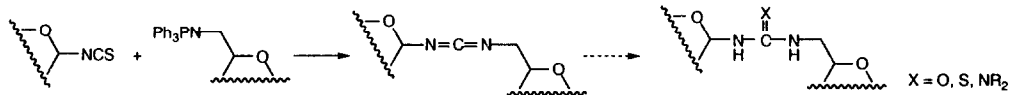
Cornelis M. Moorhoff* Department of Chemistry, University of Tasmania. GPO Box 252-75, Hobart, Australia 7001



AZA-WITTIG REACTION OF SUGAR ISOTHIOCYANATES AND SUGAR IMINOPHOSPHORANES: AN EASY ENTRY TO UNSYMMETRICAL SUGAR CARBODIIMIDES.

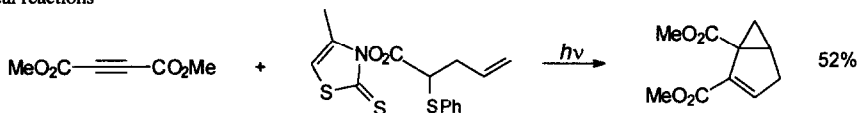
José M. García Fernández,^a Carmen Ortiz Mellet,^b Víctor M. Díaz Pérez,^b J. Fuentes,^b József Kovács^c and István Pintér^c, ^aInstituto de Investigaciones Químicas, CSIC, Américo Vespucio s/n, Isla de la Cartuja, E-41092 Sevilla, Spain, ^bDepartamento de Química Orgánica, Facultad de Química, Universidad de Sevilla, Aptdo. 553, E-41071 Sevilla, Spain, ^cCentral Research Institute for Chemistry, Hungarian Academy of Sciences, P.O.B. 17, H-1525 Budapest, Hungary.

Reactions of glycosyl isothiocyanates with 6-deoxy-6-triphenylphosphoranylideneaminohexoses lead to the corresponding sugar carbodiimides in high yield. The adducts can be transformed into ureido-, thioureido- and guanidinosugars by standard methodologies.

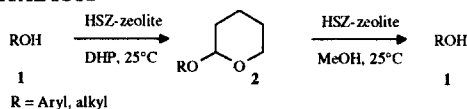
**FREE RADICAL MEDIATED CONSTRUCTION OF SMALL RING COMPOUNDS: THE DOUBLE ANNULATION OF BICYCLO [3.1.0]HEX-2-ENES**

Zorana Ferjančić, Radomir N. Saičić* and Živorad Čeković, Faculty of Chemistry, University of Belgrade, Studentski trg 16, P.O.B.158, 11000 Belgrade, and I.C.T.M. Center for Chemistry, Njegoševa 12, 11000 Belgrade, Yugoslavia

Synthesis of fused cyclopropane derivatives from two acyclic molecules is accomplished in one step by a cascade of radical reactions

**SOLVENT FREE TETRAHYDROPYRANYLATION OF PHENOLS AND ALCOHOLS OVER HSZ ZEOLITES AS REUSABLE CATALYSTS**

R. Ballini^a, F. Bigi^b, S. Carloni^b, R. Maggi^b, G. Sartori^{a*}
^aDipartimento di Chimica Organica e Industriale dell'Università, Viale delle Scienze, I-43100 Parma, Italy.
^bDipartimento di Chimica Organica e Industriale dell'Università, Viale delle Scienze, I-43100 Parma, Italy.

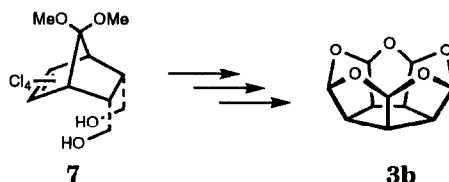


Phenols and alcohols are tetrahydropyranylated at room temperature in good to excellent yields and selectivities in the presence of zeolites HSZ-330 and HSZ-360 respectively. Addition of methanol leads to the complete deprotection.

Oxa-Bowls: The Pentaoxa[5]peristylane

G. Mehta and R. Vidya, School of Chemistry, University of Hyderabad, Hyderabad 500 046, India

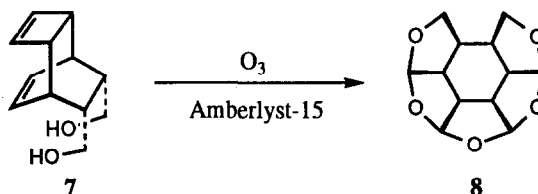
A short synthesis of the novel 'oxa-bowl' **3b** from the norbornene derivative **7** is reported.



Oxa-Bowls: Towards Hexaoxa[6]peristylane

Tetrahedron Letters, 1997, 38, 4177

G. Mehta and R. Vidya
School of Chemistry, University of Hyderabad
Hyderabad 500 046, India



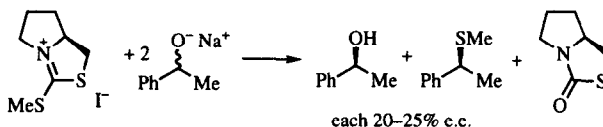
KINETIC RESOLUTION OF SECONDARY ALCOHOLS USING PROLINE-DERIVED BICYCLIC IMINIUM SALTS

Tetrahedron Letters, 1997, 38, 4179

R. Alan Aitken,* Karamat Ali and Shaun T. E. Mesher

School of Chemistry, University of St. Andrews, St. Andrews, Fife KY16 9ST, UK

The readily obtained salts show a preference for reaction with the (*R*)-enantiomer of sodium 1-phenylethoxide to give the (*S*)-methylsulfide together with the unreacted (*S*)-alcohol after hydrolysis both in up to 20–25% e.e. as shown.

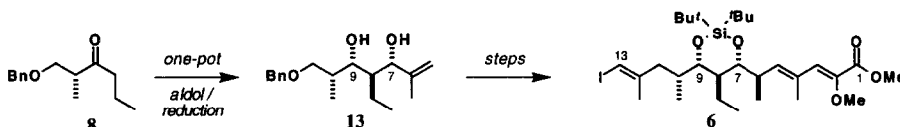


STUDIES IN MACROLIDE SYNTHESIS: SYNTHESIS OF A C₁-C₁₃ SEGMENT OF CONCANAMYCIN A.

Ian Paterson* and Malcolm D. McLeod

University Chemical Laboratory, Lensfield Road, Cambridge CB2 1EW, UK.

Tetrahedron Letters, 1997, 38, 4183



GENERATION AND 1,3-DIPOLAR CYCLOADDITIONS OF FLUORINE-CONTAINING AZOMETHINE YLIDES DERIVED FROM DIFLUOROCARBENE AND IMINES.

Mikhail S. Novikov,* Alexander F. Khlebnikov,* Alexander E. Masalev, Rafael R. Kostikov,* Department of Chemistry, St. Petersburg State University, Universitetskii pr. 2, Petrodvorets, 198904 St. Petersburg, Russia

Iminodifluoromethanides, generated by the reaction of difluorocarbene with N-benzylideneamines, undergo 1,3-dipolar cycloaddition to electron-deficient alkenes to give pyrrolidine derivatives in moderate to good yields.

Tetrahedron Letters, 1997, 38, 4187

