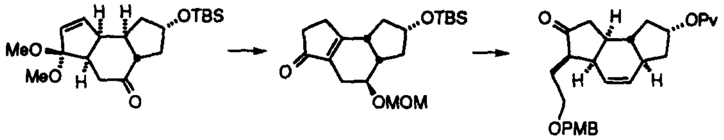
Tetrahedron Letters, **1997**, *38*, 1271

SYNTHETIC STUDIES ON SPINOSYN A. CONVENIENT ENANTIOSELECTIVE CONSTRUCTION OF A SUITABLY FUNCTIONALIZED *trans,anti,cis*-DECAHYDRO-*as*-INDACENE INTERMEDIATE VIA [3.3] SIGMATROPY AND DOUBLE CONFIGURATIONAL INVERSION

Leo A. Paquette,* Zhongli Gao, Zhijie Ni, and Graham F. Smith
Evans Chemical Laboratories, The Ohio State University, Columbus, Ohio 43210

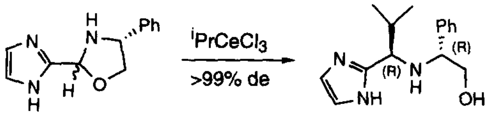
The decahydro-*as*-indacene core of spinosyn A has been synthesized in >99% ee with full stereochemical control.

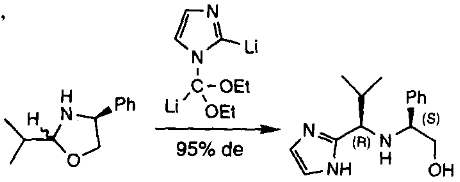


Tetrahedron Letters, **1997**, *38*, 1275

A Stereospecific Synthesis of Both Enantiomers of 2-(1′-Amino-2′-Methylpropyl) Imidazole, a Key Synthon in the Synthesis of SB 203386; a Potent Protease Inhibitor

Lendon N. Pridgen,* Mohamed K. Mokhallalati, and Michael A. McGuire
Synthetic Chemistry Department, SmithKline Beecham Pharmaceuticals,
Post Office Box 1539, King of Prussia, Pennsylvania 19406-0939

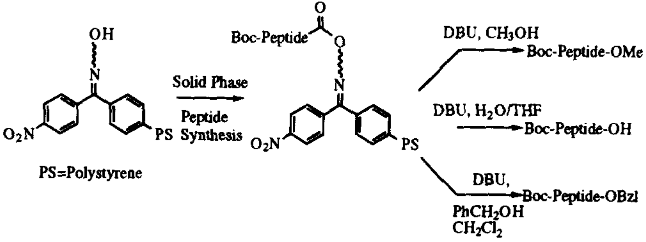




Tetrahedron Letters, **1997**, *38*, 1279

A USEFUL METHOD FOR THE PREPARATION OF FULLY PROTECTED PEPTIDE ACIDS AND ESTERS.

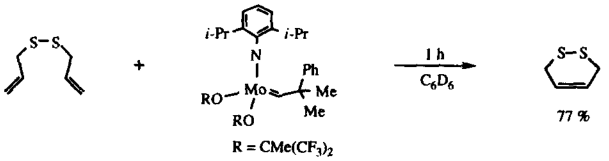
André Pichette, Normand Voyer,* Rémi Larouche, and Jean-Christophe Meillon,
Département de chimie, Université de Sherbrooke, Sherbrooke, QC, Canada J1K 2R1



Tetrahedron Letters, **1997**, *38*, 1283

Catalytic Ring-Closing Olefin Metathesis of Sulfur-Containing Species: Heteroatom and Other Effects. Young-Seok Shon and T. Randall Lee,* Department of Chemistry, University of Houston, Houston, TX 77204-5641

The ring-closing olefin metathesis of diallyl disulfide leads to 3,6-dihydro-1,2-dithiin.

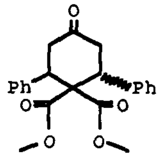


Tetrahedron Letters, **1997**, *38*, 1287

THE CORRECT STEREOCHEMISTRY OF DIMETHYL 2,6-DIPHENYL-4-OXO-CYCLOHEXANE-1,1-DICARBOXYLATE.

Alex T. Rowland,*[a] Mark D. Winemiller,[b] Michal Sabat[b]
[a]Department of Chemistry, Gettysburg College, Gettysburg, PA 17325 USA
[b]Department of Chemistry, University of Virginia, Charlottesville, VA 22901 USA

The confusion in the literature concerning the stereochemistry of the title compound has been resolved by X-ray crystallography. The compound is the trans isomer.

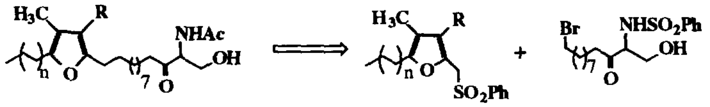


Tetrahedron Letters, **1997**, *38*, 1289

Studies on the Synthesis of Highly Substituted Furans: The Synthesis of Calicogorgins A and C.

David I. MaGee*, James D. Leach and Tammy C. Mallais, Department of Chemistry, Bag Service #45222, University of New Brunswick, Fredericton, New Brunswick, Canada, E3B 6E2, fax 506-453-4981, email DMaGee@unb.ca.

A short and highly efficient synthesis of calicogorgins A and C has been accomplished. Key features of the synthesis include rapid assembly of the furanyl portion and chemoselective alkylation of a sulfonyl anion to join the two halves of the molecule.



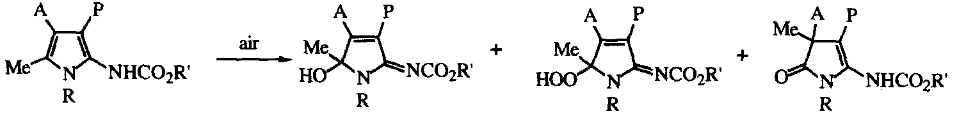
Calicogorgin A R=Me, n=1
Calicogorgin B R=Me, n=2
Calicogorgin C R=H, n=2

Tetrahedron Letters, **1997**, *38*, 1293

AUTOXIDATION OF PYRROLYLURETHANES.

Clotilde Pichon-Santander, Ramaswamy Shankar and A. Ian Scott.*
Center for Biological NMR, Department of Chemistry, Texas A&M University, College Station, Texas 77843-3255,USA.

Oxygen sensitive pyrrolylurethanes have been prepared and their autoxidation products isolated and analyzed by ^{1}H- and ^{13}C-NMR.



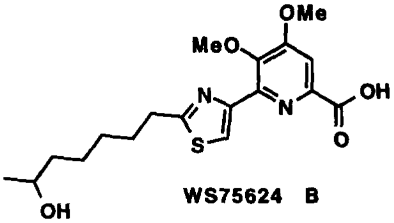
R=H, Me R'=Et, ^{t}Bu, CH_2Ph A=CH_2CO_2Me P=$CH_2CH_2CO_2Me$

Tetrahedron Letters, **1997**, *38*, 1297

THE TOTAL SYNTHESIS OF THE NATURAL PRODUCT ENDOTHELIN CONVERTING ENZYME (ECE) INHIBITOR, WS75624 B.

William C. Patt* and Mark A. Massa. Department of Medicinal Chemistry, Parke-Davis Pharmaceutical Research, Division of Warner-Lambert Company, Ann Arbor, MI 48105.

The first synthesis of WS75624 B an ECE inhibitor produced in a fermentation broth of *Saccharothrix* sp. No. 75624 is reported herein. WS75624 B is synthesized in 14 steps from commercially available kojic acid. The synthetic route employed allows for facile substitution at multiple sites on the molecule.

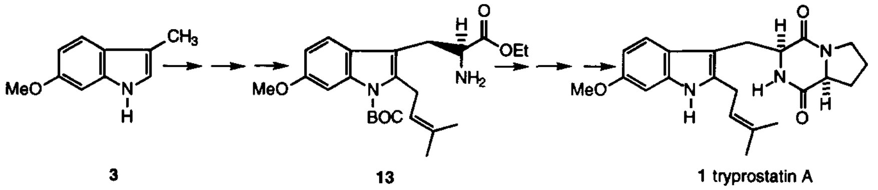


WS75624 B

Tetrahedron Letters, **1997**, *38*, 1301

Enantiospecific Total Synthesis of Tryprostatin A.

Tong Gan and James M. Cook*, Department of Chemistry, University of Wisconsin-Milwaukee, Milwaukee, WI 53201

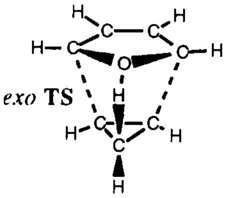


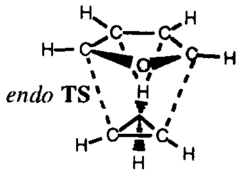
Tetrahedron Letters, **1997**, *38*, 1305

The Importance of Secondary Orbital Interactions in the Stabilization of Isomeric Transition State Structures in the Cyclopropene Addition to Furan.

Branko S. Jursic, Department of Chemistry, University of New Orleans, New Orleans, Louisiana 70148

The hybrid and gradient-corrected density functional theory methods have been applied to demonstrate the importance of the secondary orbital interactions for the stereoselectivity of the cyclopropene cycloaddition to furan



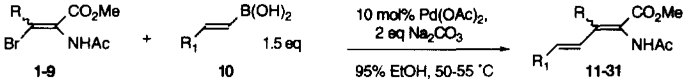


Tetrahedron Letters, **1997**, *38*, 1309

A CONVENIENT CROSS-COUPLING ROUTE TO α,β,γ,δ–UNSATURATED AMINO ACIDS.

Mark J. Burk,* John G. Allen,
William F. Kiesman* and Karen M. Stoffan, Paul M. Gross Chemical Laboratory, Department of Chemistry,
Duke University, Durham, North Carolina 27706 USA

Palladium(0) catalyzed cross-couplings of *E* and *Z* bromoenamide esters **1-9** with several boronic acids gave the dienamide esters **11-31** under mild conditions in good to excellent yields with retention of stereochemistry.

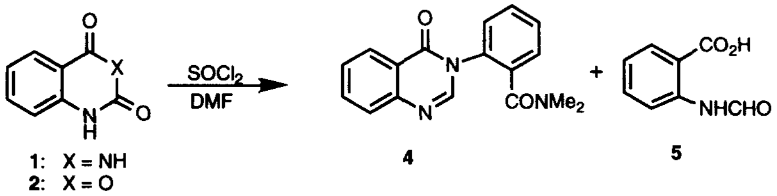


R=H, Me, Et, *i*-Pr, Bn
R_1=*n*-hexyl, *t*-Bu, Ph, Bn

Tetrahedron Letters, **1997**, *38*, 1313

REACTION OF BENZOYLENEUREA AND ISATOIC ANHYDRIDE WITH THE VILSMEIER REAGENT

Mahavir Prashad,* Denis Har, Oljan Repic, and Thomas J. Blacklock, Chemical & Analytical Development and
Jefferson A. Chin and Michael J. Shapiro, Central Technology,
Novartis Pharmaceuticals Corporation, East Hanover, NJ 07936, U.S.A.

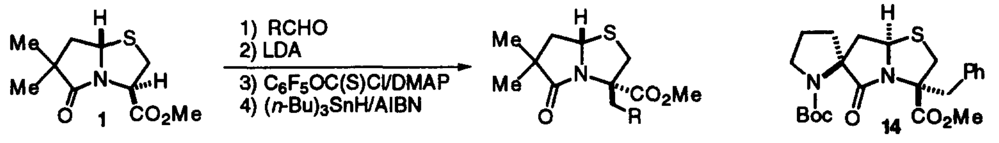


Tetrahedron Letters, **1997**, *38*, 1317

Stereospecific Synthesis of 2-Substituted Bicyclic Thiazolidine Lactams. Nalin L. Subasinghe, Ehab M. Khalil, and Rodney L. Johnson,*

Department of Medicinal Chemistry, University of Minnesota, 308 Harvard Street, S.E., Minneapolis, MN 55455-0343

Bicyclic thiazolidine lactam 1 was used as a model system for developing synthetic methodology into β-turn mimics that would contain side chain functionality. This methodology was applied to the synthesis of the 2-substituted spiro bicyclic thiazolidine lactam type II' β-turn mimic 14.

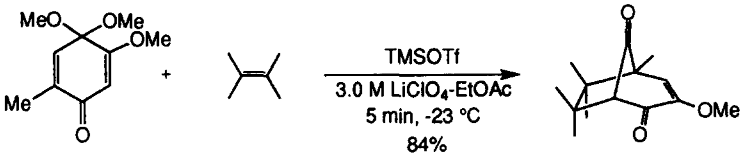


Tetrahedron Letters, **1997**, *38*, 1321

Cationic [5+2] Cycloaddition Reactions Promoted by Trimethylsilyl Triflate in Highly Polar Media

Jon L. Collins, Paul A. Grieco*, and John K. Walker
Department of Chemistry, Indiana University, Bloomington, Indiana 47405

Trimethylsilyl triflate is an effective reagent in 3.0 M lithium perchlorate-ethyl acetate for promoting cationic [5+2] cycloaddition reactions.

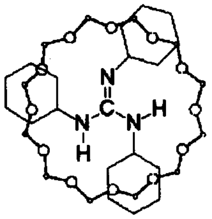


Tetrahedron Letters, **1997**, *38*, 1325

Encapsulation of *N,N',N''*-Tricyclohexylguanidine in Hydrophobic Zeolite Y: Synthesis and Catalytic Activity

Ricardo Sercheli, Alfredo L. B. Ferreira, Mário C. Guerreiro, Rogério M. Vargas, Roger A. Sheldon and Ulf Schuchardt
Institute of Chemistry, State University of Campinas, Cx. Postal 6154, 13083-970 Campinas (São Paulo), Brazil

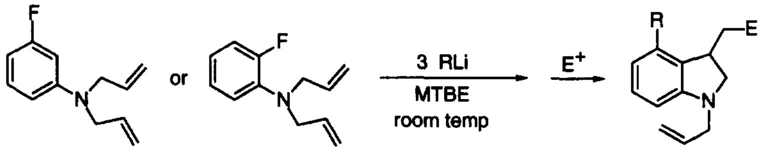
N,N',N''-Tricyclohexylguanidine was encapsulated in hydrophobic zeolite Y and catalyzes the addition reaction of acetone to benzaldehyde.



Tetrahedron Letters, **1997**, *38*, 1329

REACTION OF ORGANOLITHIUMS WITH FLUORO-N,N-DIALLYLANILINES : A BENZYNE–MEDIATED ANIONIC CASCADE LEADING TO 3,4-DISUBSTITUTED INDOLINES

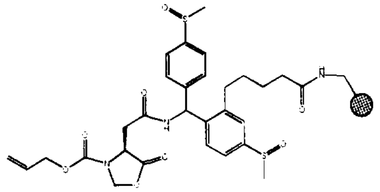
William F. Bailey* and Matthew W. Carson
Department of Chemistry, University of Connecticut, Storrs, Connecticut 06269-4060



Tetrahedron Letters, **1997**, *38*, 1333

Enhanced Resolution in MAS NMR for Combinatorial Chemistry.

Michael J. Shapiro,* Jefferson Chin[†], Roger E. Marti[††], and Mark A. Jarosinski[††]
Department of Central Technologies[†] and Oncology Research Program[††], Preclinical Research,
Sandoz Research Institute, Sandoz Pharmaceuticals Corporation, East Hanover, NJ 07936

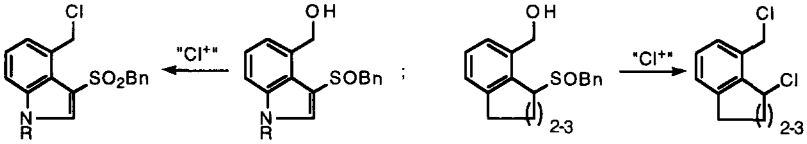


Tetrahedron Letters, **1997**, *38*, 1337

The Synthesis of Sultines from δ-Hydroxy Sulfoxides Revisited

Terrence J. Connolly*, Tony Durst*
Department of Chemistry, University of Ottawa, Ottawa, Ontario, Canada, K1N 6N5

A re-examination of the title transformation has shown that other reactions compete for sultine formation. Using conditions that were successful for sultine formation in the past revealed a more complicated reaction pathway, evident from the products isolated.



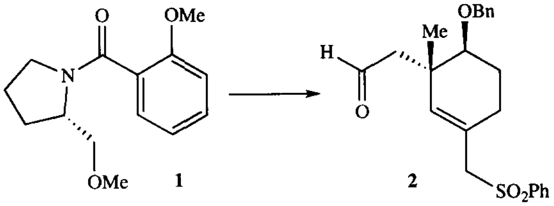
Tetrahedron Letters, **1997**, *38*, 1341

Enantioselective Synthesis of a Taxane C-Ring Component Using the Schultz Asymmetric Birch Reduction Methodology

Philip Magnus,* Francis Tavares and Nicholas Westwood

Department of Chemistry and Biochemistry,
University of Texas at Austin, Austin, Texas 78712.

Birch reduction of **1**, followed by methylation of the amide enolate and subsequent elaboration into **2**, provides a convenient route for the synthesis of the C-ring component of taxol.

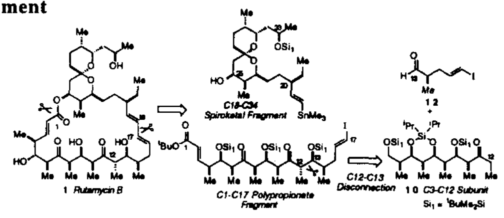


Tetrahedron Letters, **1997**, *38*, 1345

Application of Chiral (*E*)-Crotylsilanes in Synthesis: The Asymmetric Synthesis of the C1-C17 Polypropionate Fragment of Rutamycin B.

Nareshkumar F. Jain and James S. Panek*
Department of Chemistry, Metcalf Center for Science and Engineering,
590 Commonwealth Avenue, Boston University, Boston, MA 02215

The asymmetric synthesis of the polypropionate fragment of rutamycin B is reported employing chiral allylsilane bond construction methodology for the introduction of six of the nine stereogenic centers. In this paper, the construction of the C3-C12 subunit and its coupling to the aldehyde **12** through a Mukaiyama-type aldol reaction are described.

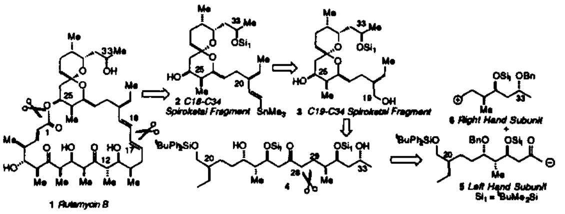


Tetrahedron Letters, **1997**, *38*, 1349

Application of Chiral (*E*)-Crotylsilanes in Synthesis: The Asymmetric Synthesis of the C19-C34 Spiroketal Fragment of Rutamycin B.

Nareshkumar F. Jain and James S. Panek*
Department of Chemistry, Metcalf Center for Science and Engineering, 590 Commonwealth Avenue, Boston University, Boston, MA 02215

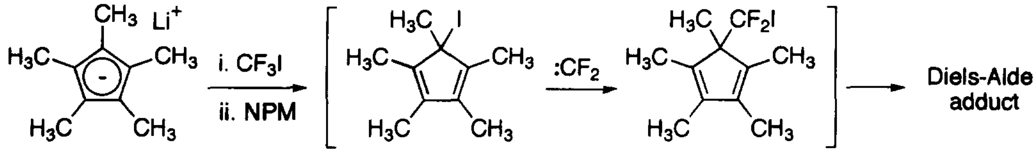
The asymmetric synthesis of the spiroketal fragment of rutamycin B is reported employing allylsilane bond construction methodology for the introduction of five of the eight stereogenic centers. In this paper, the construction of the C19-C28 and C29-C34 fragments as well as their coupling through an alkylation reaction of a lithiated *N,N*-dimethylhydrazone are described.



Tetrahedron Letters, **1997**, *38*, 1353

An Unusual Alkylation with Trifluoroiodomethane Providing a Difluoroiodomethyl Group

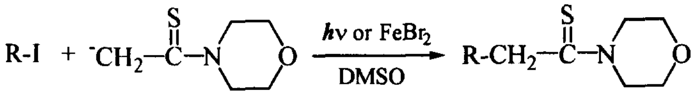
Johnathon E. Letourneau and D. Jean Burnell*
Department of Chemistry, Memorial University of Newfoundland,
St. John's, Newfoundland, Canada A1B 3X7



Tetrahedron Letters, **1997**, *38*, 1355

REACTIONS OF N-THIOACETYLMORPHOLINE ANION WITH IODOARENES AND 1-IODOADAMANTANE BY THE $S_{RN}1$ MECHANISM.

Marcelo C. Murguía, and Roberto A. Rossi*. Departamento de Química Orgánica, Facultad de Ciencias Químicas, Universidad Nacional de Córdoba, A.P. 4, C.C.61, 5000 Córdoba, ARGENTINA.



R = Ph, 1-naphthyl, 1-adamantyl

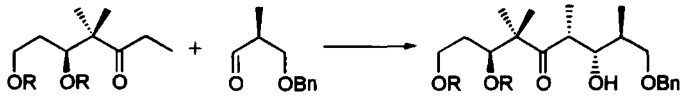
60-87%

Tetrahedron Letters, **1997**, *38*, 1359

SYNTHESIS OF THE C1-C9 SEGMENT OF EPOTHILONS.

Eckhard Claus, Axel Pahl, Peter G. Jones*, Hartmut M. Meyer,*
Markus Kalesse*, Institut für Organische Chemie, Universität Hannover, Schneiderberg 1B, D-30167 Hannover (Germany) and *Technische Universität Braunschweig, Institut für Anorganische und Analytische Chemie, Hagenring 30, D-38106 Braunschweig (Germany)

Aldol reaction of key fragments 3 and 4 generates the C1-C9 segment 2 of epothilons.



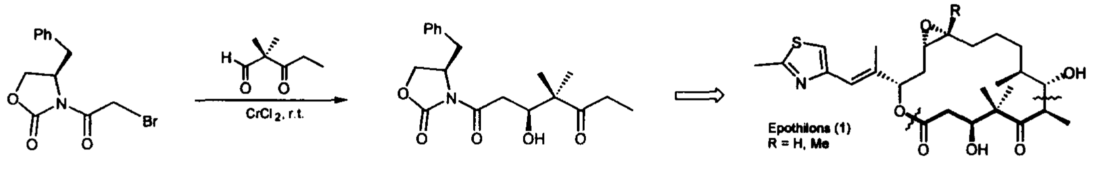
4 3 2

Tetrahedron Letters, **1997**, *38*, 1363

THE CHROMIUM-REFORMATSKY REACTION: ASYMMETRIC SYNTHESIS OF THE ALDOL FRAGMENT OF THE CYTOTOXIC EPOTHILONS FROM 3-(2-BROMOACYL)-2-OXAZOLIDINONES.

Tobias Gabriel, Ludger Wessjohann*
Institut für Organische Chemie, Ludwig-Maximilians-Universität München, Karlstraße 23, D-80333 München, Germany

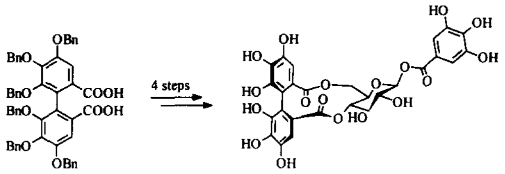
Chromium(III) Evans' enolates provide improved, opposite diastereoselectivity and one pot access to C1-C6-Me of the epothilons.



Tetrahedron Letters, **1997**, *38*, 1367

Synthesis of Enantiomerically Pure Strictinin Using a Stereoselective Esterification Reaction.

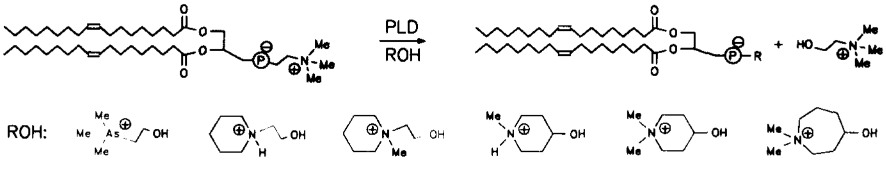
Karamali Khanbabaee*, Christian Schulz, Kerstin Lötzerich, Universität-GH-Paderborn, Fachbereich 13 - Organische Chemie, Warburger Straße 100, 33098 Paderborn, Germany



Tetrahedron Letters, **1997**, *38*, 1369

ENZYMATIC INTRODUCTION OF N-HETEROCYCLIC AND AS-CONTAINING HEAD GROUPS INTO GLYCEROPHOSPHOLIPIDS

Frank Hirche, Angelika Schierhorn, Gerd Scherer, and Renate Ulbrich-Hofmann*, Department of Biochemistry/Biotechnology, University of Halle, D-06099 Halle/S., Germany



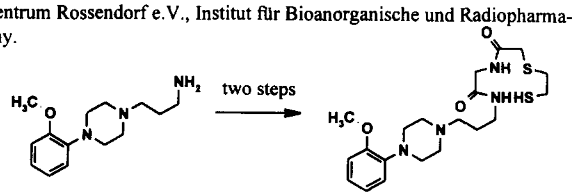
The synthesis of six new glycerophospholipids with choline-analogous head groups by enzymatic transphosphatidylation with phospholipase D (PLD) is described.

Tetrahedron Letters, **1997**, *38*, 1371

A SIMPLE AND EFFICIENT SYNTHESIS OF A DERIVATIZED PSEUDOTRIPEPTIDE CONTAINING A METHYLENE THIOETHER ISOSTERE AND ITS USE FOR THE DESIGN OF BIFUNCTIONAL RHENIUM AND TECHNETIUM CHELATING AGENTS

Matthias Scheunemann* and Bernd Johannsen, Forschungszentrum Rossendorf e.V., Institut für Bioanorganische und Radiopharmazeutische Chemie, Postfach 510119, D-01314 Dresden, Germany.

Using a one-pot reaction, a given ω-aminoalkyl compound has been converted to a methylene thioether peptide isostere by two consecutive ring opening reactions:

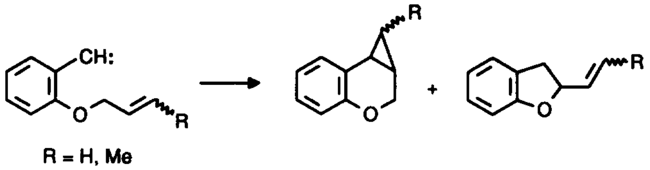


Tetrahedron Letters, **1997**, *38*, 1373

INTRAMOLECULAR REACTIVITY OF FUNCTIONALIZED ARYLCARBENES: 2-ALLYLOXYPHENYLCARBENES

Frank Gotzhein and Wolfgang Kirmse*, Fakultät für Chemie, Ruhr-Universität Bochum, D-44780 Bochum, Germany

The intramolecular reactions of the title carbenes proceed predominantly from the triplet state. Trapping of the singlet carbenes by MeOH indicates that $k_T \sim k_{TS}$.

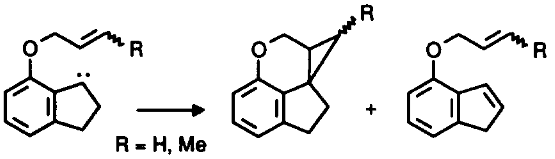


Tetrahedron Letters, **1997**, *38*, 1377

INTRAMOLECULAR REACTIVITY OF FUNCTIONALIZED ARYLCARBENES: 7-ALKENYLOXY-1-INDANYLIDENES

Frank Gotzhein and Wolfgang Kirmse*, Fakultät für Chemie, Ruhr-Universität Bochum, D-44780 Bochum, Germany

The intramolecular reactions of the title carbenes proceed predominantly from the singlet state, even if the carbenes are generated by triplet-sensitized photolysis ($k_T < k_{TS}$).

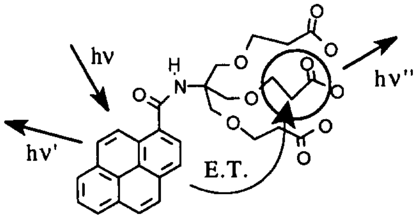


Tetrahedron Letters, **1997**, *38*, 1381

SENSITIZED LUMINESCENCE EMISSION OF THE EUROPIUM(III) ION BOUND TO A PYRENE-CONTAINING TRIACID LIGAND.

Jean-Ernest Sohna Sohna, Frédéric Fages, Photophysique et Photochimie Moléculaire, URA 348 CNRS, Université de Bordeaux I, 33405 Talence Cedex, France

Intracomplex energy transfer is reported to occur between the pyrene chromophore and the bound europium(III) metal ion.

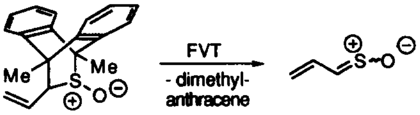


Tetrahedron Letters, **1997**, *38*, 1385

THIOACROLEIN *S*-OXIDE

Nadia Pelloux-Léon, Roger Arnaud, Jean-Louis Ripoll, Pierre Beslin and Yannick Vallée*. L.E.D.S.S., Université Joseph Fourier, 38041 Grenoble, France. LCMT. ISMRA, Université de Caen, 14050 Caen, France.

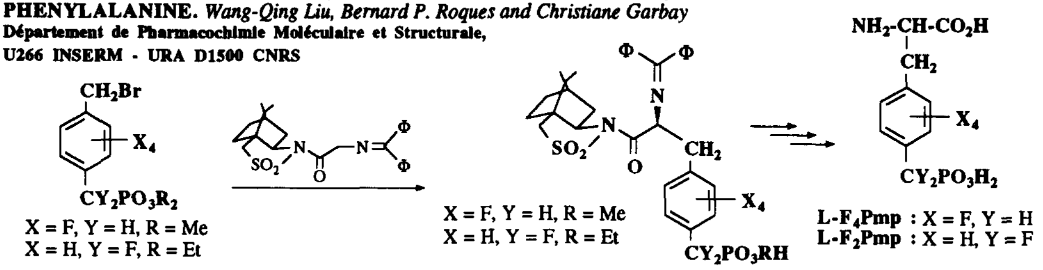
Thioacrolein *S*-oxide was obtained by FVT of a thiaethanoanthracenic precursor.



Tetrahedron Letters, **1997**, *38*, 1389

SYNTHESIS OF L-2,3,5,6-TETRAFLUORO-4-(PHOSPHONOMETHYL) PHENYLALANINE, A NOVEL NON-HYDROLYZABLE PHOSPHOTYROSINE MIMETIC AND L-4-(PHOSPHONODIFLUOROMETHYL) PHENYLALANINE.

Wang-Qing Liu, Bernard P. Roques and Christiane Garbay
Département de Pharmacochimie Moléculaire et Structurale,
U266 INSERM - URA D1500 CNRS

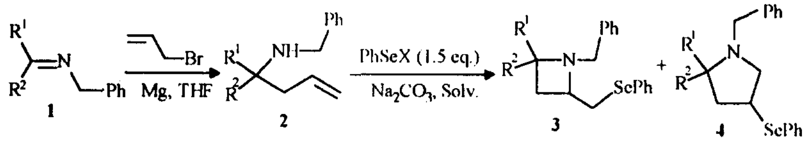


Tetrahedron Letters, **1997**, *38*, 1393

SYNTHESIS OF AZETIDINES BY ELECTROPHILIC SELENIUM-INDUCED CYCLIZATION OF HOMOALLYLIC BENZYLAMINES

Bénédicte Berthe, Francis Outurquin and Claude Paulmier*, Laboratoire de Synthèse de Composés Thio- et Sélénoorganiques (I.R.C.O.F), Université de Rouen, UFR Sciences, F-76821 Mont-Saint-Aignan Cedex, France.

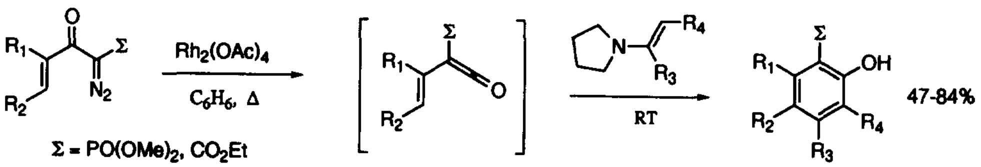
Azetidines 3 were formed for the first time through a selenium-induced 4-exo cyclization of homoallylic amines 2.



Tetrahedron Letters, **1997**, *38*, 1397

VINYLKETENE-ENAMINE CYCLOCONDENSATION : A NEW ACCESS TO FUNCTIONALIZED PHENOLS

Didier Collomb and Alain Doutheau.
Laboratoire de Chimie Organique. I. N. S. A.. 20 av. A. Einstein, 69621 Villeurbanne, France.

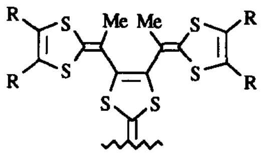


Tetrahedron Letters, **1997**, *38*, 1399

Bis and Tetrakis(6-methyl-1,4-dithiafulven-6-yl) Substituted Tetrathiafulvalenes (TTF) and their Vinylogs as Novel π-Donors

Philippe Leriche,[a] Ahmed Belyasmine,[a] Marc Sallé,[a] Alain Gorgues,[a]* Michel Jubault,[a] Javier Garín[b] and Jesus Orduna[b]
[a] Laboratoire d'Ingénierie Moléculaire et Matériaux Organiques, CNRS, Université d'Angers, 2 Bd Lavoisier, 49045 Angers, France
[b] Departamento de Química Orgánica, Universidad de Zaragoza, CSIC, 50009 Zaragoza, Spain

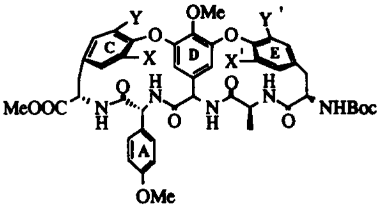
The synthesis and the good π-donor ability of the title compounds are presented.



SYNTHESIS OF FOUR ATROPDIASTEREOISOMERS OF C-O-D-O-E RING OF VANCOMYCIN BY SEQUENTIAL CYCLOETHERIFICATIONS

Tetrahedron Letters, **1997**, *38*, 1403

Caroline Vergne, Michèle Bois-Choussy, René Beugelmans, Jieping Zhu*
Institut de Chimie des Substances Naturelles, CNRS, 91198 Gif-Sur-Yvette, France



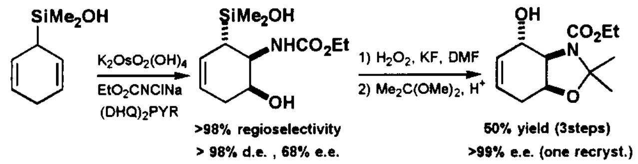
2a X = Y' = NO_2, Y = X' = H
2b X = X' = NO_2, Y = Y' = H
2c X = X' = H, Y = Y' = NO_2
2d X = Y' = H, Y = X' = NO2

Synthesis of all four atropdiastereoisomers of model bicyclic C-O-D-O-E ring of vancomycin was reported.

ASYMMETRIC AMINO-HYDROXYLATION OF DIENYLSILANES. AN EFFICIENT ROUTE TO AMINO-CYCLITOLS.

Tetrahedron Letters, **1997**, *38*, 1407

Rémy Angelaud, Yannick Landais,* Kurt Schenk.
Institut de Chimie Organique, Université de Lausanne, Collège Propédeutique, 1015 Lausanne-Dorigny, Switzerland.

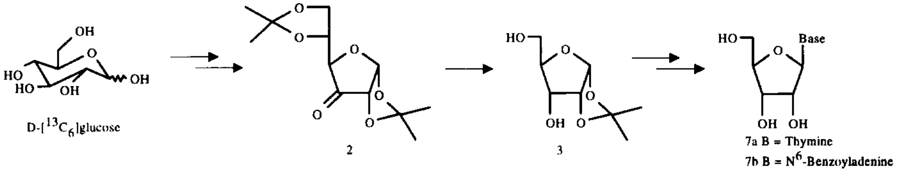


Sharpless asymmetric amino-hydroxylation of a silyl-2,5-cyclohexadiene occurs with complete regio- and diastereocontrol. An enantioselectivity of up to 68% e.e. was also observed. An application of the methodology to the synthesis of relevant examples of amino-cyclitols is described.

A MULTIGRAM, STEREOSELECTIVE SYNTHESIS OF D-[$^{13}C_5$]RIBOSE FROM D-[$^{13}C_6$]GLUCOSE AND ITS CONVERSION INTO [$^{13}C_5$]NUCLEOSIDES.

Tetrahedron Letters, **1997**, *38*, 1411

Luigi A. Agrofoglio,*[a] Jean-Claude Jacquinet,[a] and Gérard Lancelot[b] (a) I.C.O.A. URA 499, UFR Sciences, Université d'Orléans, B.P. 6759, 45067 Orléans-Cedex France; b) Centre de Biophysique Moléculaire, UPR 4301, 1A Avenue de la Recherche Scientifique, 45071 Orléans Cedex 2-France.



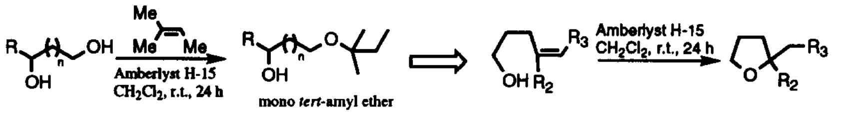
^{13}C-labeled ribonucleosides **7a** and **7b** were prepared from D-[$^{13}C_6$]glucose. Dehomologation of di-O-isopropylidene hexofuranose **2** by a "one-pot" reaction (periodic acid and $NaBH_4$) afforded stereoselectively the labeled ribofuranose derivative **3** in high yield.

From Intermolecular Alcohol Additions on a Double Bond to Electrocyclizations of Non-Activated γ, δ-Unsaturated Alcohols : An Easy Synthesis of Tetrahydrofurans

Tetrahedron Letters, **1997**, *38*, 1413

Xavier Franck, Bruno Figadère*, André Cavé

Laboratoire de Pharmacognosie, associé au CNRS (BIOCIS), Université Paris-Sud,
Faculté de Pharmacie, rue J. B. Clément, 92296 Châtenay-Malabry (France)

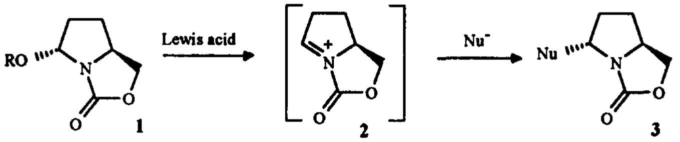


Tetrahedron Letters, **1997**, *38*, 1415

STEREOSELECTIVE ACCESS TO TRANS-2,5-DISUBSTITUTED PYRROLIDINE DERIVATIVES BY NUCLEOPHILIC ADDITION TO BICYCLIC N-ACYLIMINIUM ION

Hamid Dhimane, Corinne Vanucci and Gérard Lhommet*
Université P. et M. Curie, Laboratoire de Chimie des Hétérocycles,associé au CNRS, 4 Place Jussieu, F 75252 Paris cédex 05 (France)

Preparation of N-acyliminium precursors 1 and stereoselective nucleophilic displacement of the alkoxy groups are described.

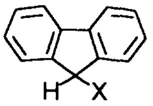


Tetrahedron Letters, **1997**, *38*, 1419

SOLVOLYSIS OF 9-FLUORENYL BROMIDE AND TOSYLATE. NUCLEOPHILIC SOLVENT INTERVENTION AND INSIGNIFICANCE OF ANTIAROMATICITY.

Kwang-Ting Liu* and Yen-Shyi Lin, Department of Chemistry, National Taiwan University, Taipei 107, Taiwan, Republic of China

From the solvolysis of 9-fluorenyl bromide (3) and tosylate (4) the existence of significant solvent intervention in 3 and extensive charge delocalization throughout the fluorenyl ring at both cationic transition states were concluded

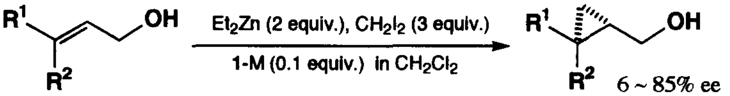


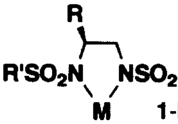
3 : X = Br
4 : X = OTs

Tetrahedron Letters, **1997**, *38*, 1423

A NEW CHIRAL DISULFONAMIDE LIGAND DERIVED FROM α-AMINO ACID FOR CATALYTIC ENANTIOSELECTIVE CYCLOPROPANATION

Nobuyuki Imai,* Katsumasa Sakamoto, Masahiro Maeda, Kazushi Kouge, Kenji Yoshizane, and Junzo Nokami*
Faculty of Engineering, Okayama University of Science, 1-1 Ridai-cho, Okayama 700, Japan





1-M

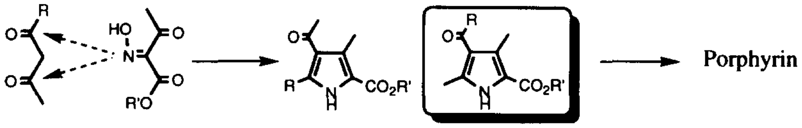
R^1 = Ph, $PhCH_2CH_2$, $TrOCH_2$, Me_2PhSi, Bu_3Sn, H; R^2 = $TrOCH_2$, H
R = Me, Me_2CH, Me_3C, Ph, $PhCH_2$; R' = Me, Ph;
R" = Me, CF_3, Ph, p-MeC_6H_4, p-$NO_2C_6H_4$, 2,4,6-$Me_3C_6H_2$; M = Zn or Al-Bu-*i*

Tetrahedron Letters, **1997**, *38*, 1427

REGIOSELECTIVE PYRROLE SYNTHESIS FROM β-DIKETONE AND CONVERSION TO STERICALLY HINDERED PORPHYRIN

Hiroshi Fujii,* Tetsuhiko Yoshimura, and Hitoshi Kamada
Institute for Life Support technology, Yamagata Technopolis Foundation, Matsuei, Yamagata 990 Japan

The Knorr condensation of Asymmetric β-diketones afforded pyrroles regioselectively.



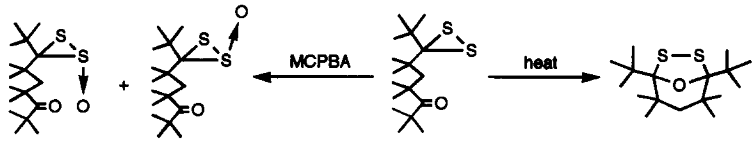
a: R = Et, R' = Et
b: R = n-Pr, R' = Et
c: R = i-Pr, R' = Et
d: R = t-Bu, R' = Et
e: R = t-Bu, R' = t-Bu
f: R = Ph, R' = Et

Tetrahedron Letters, **1997**, *38*, 1431

PREPARATION AND PROPERTIES OF A 3,3-DIALKYLDITHIIRANE.

Akihiko Ishii, Kazuyo Umezawa and Juzo Nakayama,*
Department of Chemistry, Faculty of Science, Saitama University, Urawa, Saitama 338, Japan

The first 3,3-dialkyldithiirane derivative was synthesized, and its oxidation and thermal reactions were examined.

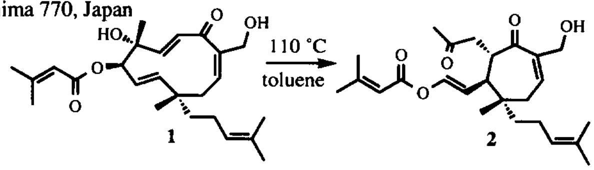


Tetrahedron Letters, **1997**, *38*, 1435

ABSOLUTE STRUCTURE OF VIBSANINS B AND C, AND THEIR CHEMICAL CORRELATION

Y. Fukuyama, * H. Minami, S. Takaoka, M. Kodama, K. Kawazu[†] and H. Nemoto,[‡] Institute of Pharmacognosy, Faculty of Pharmaceutical Sciences, Tokushima Bunri University, Yamashiro-cho, Tokushima 770, Japan, [†]Department of Bioresources Chemistry, Okayama University, Tsushima, Okayama 770, Japan, [‡]Faculty of Pharmaceutical Sciences, The University of Tokushima, Kuramoto-cho, Tokushima 770, Japan

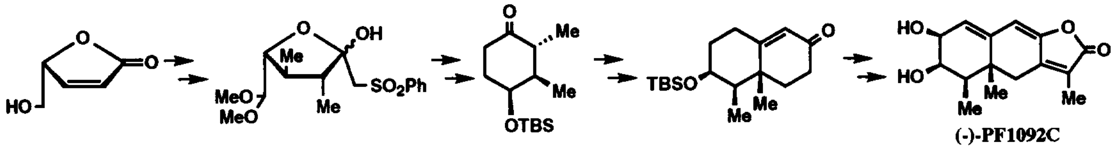
The absolute structure of vibsanin C (**2**) isolated from the leaves of *Viburnum awabuki*, has been established by X-ray crystallographic analysis of its derivative. Vibsanin C has been proved to be one of Cope rearranged products from vibsanin B (**1**).



Tetrahedron Letters, **1997**, *38*, 1439

TOTAL SYNTHESIS OF PROGESTERONE RECEPTOR LIGANDS, (-)-PF1092A, B AND C

Kuniaki Tatsuta*, Shohei Yasuda, Ken-ichi Kurihara,[a] Kiyoshi Tanabe,[a] Rie Shinei,[a] and Tsuneo Okonogi[a]
Graduate School of Science and Engineering, Advanced Research Institute for Science and Engineering, Waseda University, Ohkubo, Shinjuku-ku, Tokyo 169, Japan and [a]Drug Discovery, Pharmaceutical Research Center, Meiji Seika Kaisha, Ltd., Morooka, Kohoku-ku, Yokohama 222, Japan

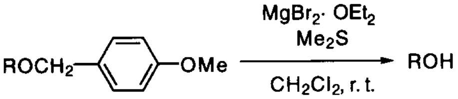


Tetrahedron Letters, **1997**, *38*, 1443

A MILD AND SELECTIVE DEPROTECTION OF *p*-METHOXYBENZYL (PMB) ETHER BY MAGNESIUM BROMIDE DIETHYL ETHERATE-METHYL SULFIDE

Toshihiko Onoda, Ryuichi Shirai and Shigeo Iwasaki*
Institute of Molecular and Cellular Biosciences, The University of Tokyo,
1-1-1 Yayoi, Bunkyo-ku, Tokyo 113, Japan

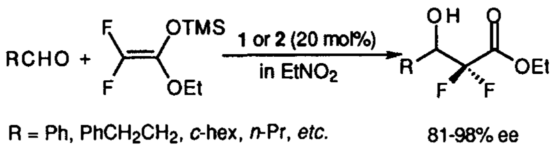
The magnesium bromide diethyl etherate ($MgBr_2{\cdot}OEt_2$)-methyl sulfide (Me_2S) system is useful for the mild and chemo-selective deprotection of *p*-methoxybenzyl (PMB) ether in the presence of 1,3-diene, *t*-butyldimethylsilyl (TBDMS) ether, benzoate, benzyl ether and acetonide.

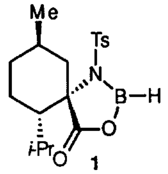


Tetrahedron Letters, **1997**, *38*, 1447

ISOLATION OF α,α-DIFLUOROKETENE SILYL ACETAL AND ITS APPLICATION TO ASYMMETRIC ALDOL REACTIONS

Katsuhiko Iseki,* Yoshichika Kuroki, Daisuke Asada and Yoshiro Kobayashi
MEC Laboratory, Daikin Industries, Ltd., Miyukigaoka, Tsukuba, Ibaraki 305, Japan





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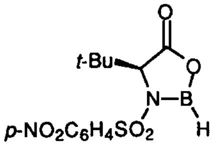


2

Tetrahedron Letters, **1997**, *38*, 1449

$BiCl_3$ OR CdI_2 CATALYZED MICHAEL ADDITION OF 1,3-DICARBONYL COMPOUNDS UNDER MICROWAVE IRRADIATIONS

Bipul Baruah, Anima Boruah, Dipak Prajapati and Jagir S. Sandhu*
Regional Research Laboratory, Jorhat-785006, Assam, India.

$BiCl_3$ or CdI_2 proves to be an efficient catalyst for Michael addition of 1,3-dicarbonyl compounds under microwave irradiations, through a simple solvent free reaction.

$$\underset{\mathbf{1}}{R^1COCH_2COR^2} + \underset{\mathbf{2}}{R^3\text{-}CH{=}CH\text{-}COR^4} \xrightarrow[MW]{BiCl_3 \text{ or } CdI_2}$$

$$\begin{array}{l} R^1CO\text{-}CH\text{-}COR^2 \\ \quad\;\; | \\ R^3\text{-}CH\text{-}CH_2\text{-}COR^4 \end{array}$$

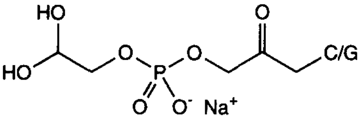
3

Tetrahedron Letters, **1997**, *38*, 1451

Synthesis of Potentially Prebiotic RNA Precursors: Cytosine and Guanine Derivatives

John D. Sutherland* and J. Nicole Whitfield
The Dyson Perrins Laboratory, South Parks Road, Oxford OX1 3QY, U.K..

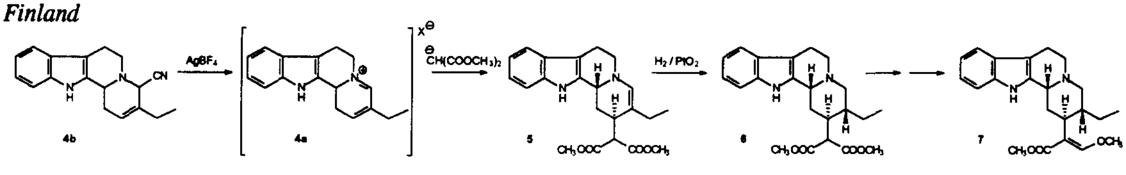
The synthesis of two potentially prebiotic monomers of RNA containing cytosine and guanine is reported.



Tetrahedron Letters, **1997**, *38*, 1455

Short Synthesis of (±)-Hirsutine: Direct Addition of Dimethyl Malonate Anion to a 1,4-Conjugate Iminium Salt of Appropriate 3-Ethylindolo[2,3-*a*]quinolizidine

Mauri Lounasmaa*, Jari Miettinen, Pirjo Hanhinen, and Reija Jokela
Laboratory for Organic and Bioorganic Chemistry, Technical University of Helsinki, FIN-02150 Espoo, Finland

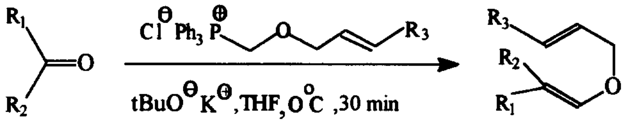


Tetrahedron Letters, **1997**, *38*, 1459

WITTIG OLEFINATION: AN EFFICIENT ROUTE FOR THE PREPARATION OF ALLYL VINYL ETHERS- PRECURSORS FOR THE CLAISEN REARRANGEMENT.

Mukund G. Kulkarni,* Dhananjay S. Pendharkar
and Ravindra M. Rasne
Department of Chemistry,
University of Pune, Pune 411 007(India)

Reaction of alloxymethylenetriphenylphosphorane with aldehyde or ketones furnishes respective allyl vinyl ethers.



Tetrahedron Letters, **1997**, *38*, 1463

DIASTEREOSELECTIVE INTRAMOLECULAR DIELS-ALDER REACTION OF THE FURAN DIENE. A FACILE ACCESS TO ENANTIOPURE EPOXY TETRAHYDROISOINDOLINES.

C. Andrés, G. Maestro, J. Nieto, R. Pedrosa,* S. García-Granda and E. Pérez-Carreño. Departamento de Química Orgánica, Facultad de Ciencias, Universidad de Valladolid. 47011-Valladolid, Spain. Departamento de Química-Física y Analítica. Facultad de Químicas, Universidad de Oviedo, 33006-Oviedo. Spain.

Enantiomerically pure isoindoline derivatives were prepared by diastereoselective IMDAF reaction on 2-(2´-furfuryl)-N-acryloyl tetrahydro -1,3-benzoxazine and further elimination of the menthol appendage.