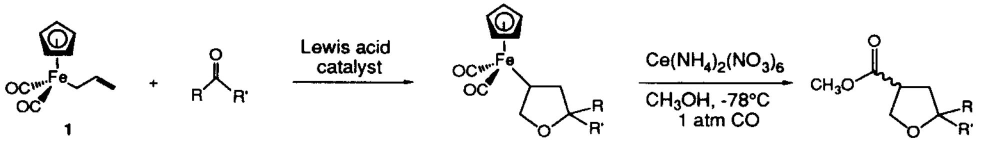
GRAPHICAL ABSTRACTS

Tetrahedron Letters, **1994**, *35*, 7889

LEWIS ACID-CATALYZED [3+2]-CYCLOADDITION REACTIONS OF ALLYL(CYCLOPENTADIENYL)IRON(II) DICARBONYL WITH CARBONYL COMPOUNDS.

Songchun Jiang and Edward Turos*, Department of Chemistry, State University of New York at Buffalo, Buffalo, NY 14214

Methodology is described for the [3+2]-cycloaddition of allyl(cyclopentadienyl)iron(II) dicarbonyl to aldehydes and ketones to give tetrahydrofuran adducts.

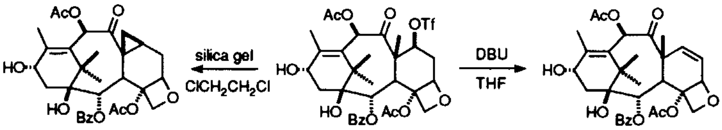


Tetrahedron Letters, **1994**, *35*, 7893

Taxol Chemistry. 7-O-Triflates as Precursors to Olefins and Cyclopropanes

Roy A. Johnson,* Eldon G. Nidy, Paul J. Dobrowolski, Ilse Gebhard,
Samuel J. Qualls, Nancy A. Wicnienski, and Robert C. Kelly*
Upjohn Laboratories, The Upjohn Company, Kalamazoo, Michigan 49001

7-O-Triflates of baccatin III or of taxol analogs are convenient precursors in alternate syntheses of $\Delta^{6,7}$-taxols and 7β,8β-methano (cyclopropyl) taxols.

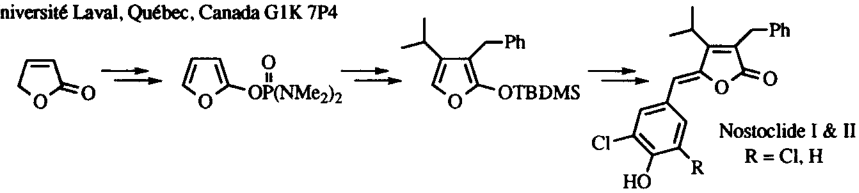


Tetrahedron Letters, **1994**, *35*, 7897

FURANOLATE-BASED STRATEGY FOR SEQUENTIAL 2,3,4-TRISUBSTITUTION OF BUTENOLIDE: TOTAL SYNTHESIS OF NOSTOCLIDES I AND II

John Boukouvalas,* François Maltais and Nicolas Lachance
Département de Chimie, Université Laval, Québec, Canada G1K 7P4

The first synthesis of nostoclide I and II is reported.

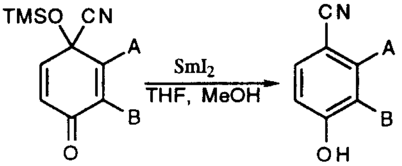


Nostoclide I & II
R = Cl, H

Tetrahedron Letters, **1994**, *35*, 7901

Reductive Desilanolation as a Route to Benzonitriles. An Application to a Concise Synthesis of the Aromatic Sector of Calicheamicin.

Steven H. Olson[a] and Samuel J. Danishefsky[b,c]
[a]Department of Chemistry, Yale University, New Haven CT 06511
[b]Laboratory for Bio-organic Chemistry, Sloan-Kettering Institute for Cancer Research, Memorial Sloan-Kettering Cancer Center, 1275 York Avenue, New York, NY 10021;
[c]Department of Chemistry, Columbia University, New York, NY 10027



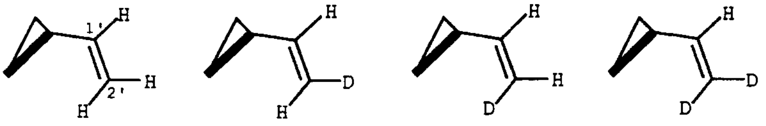
The TMS-cyanohydrins of quinones undergo reductive desilanolation in the presence of samarium iodide to form hydroxybenzonitriles. The aromatic fragment of calicheamicin was prepared by this method.

Tetrahedron Letters, **1994**, *35*, 7905

Diastereotopically Distinct Secondary Deuterium Kinetic Isotope Effects on the Thermal Isomerization of Vinylcyclopropane to Cyclopentene.

John E. Baldwin and Karla A. Villarica, Department of Chemistry, Syracuse University, Syracuse, NY 13244 USA

Rate constants for isomerizations of the vinylcyclopropanes shown to cyclopentenes at 341 °C are indicative of unequal k_H/k_D rate constant ratios, 1.08 and 1.15, for the Z and E isomers.

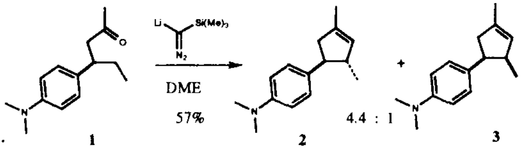


Tetrahedron Letters, **1994**, *35*, 7909

DIASTEREOSELECTIVITY IN *UNCATALYZED* INTRAMOLECULAR C-H INSERTION BY AN ALKYLIDENE CARBENE

Douglass F. Taber and Robert P. Meagley, Department of Chemistry & Biochemistry, University of Delaware, Newark, DE 19716 USA

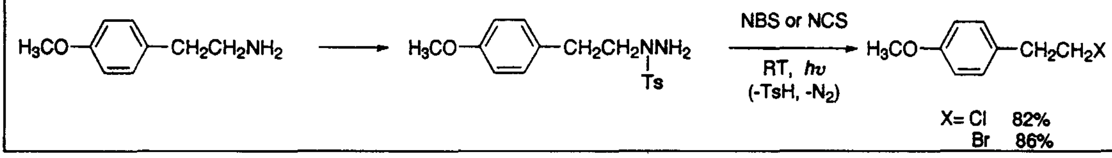
Ketone **1** on exposure to trimethylsilyldiazomethyllithium in DME is cyclized to cyclopentenes **2** and **3** in a ratio of 4.4 : 1. This is the first example of diastereoselectivity in C-H insertion by a simple alkylidene carbene.



Tetrahedron Letters, **1994**, *35*, 7911

A CONVENIENT CONVERSION OF PRIMARY AMINES INTO THE CORRESPONDING HALIDES -- RADICAL PROMOTED HALODEAMINATION VIA N-SUBSTITUTED-N-TOSYLHYDRAZINES

Luis R. Collazo,* Frank S. Guziec, Jr., Wei-Xiao Hu and Ratnadevi Pankayatselvan
Department of Chemistry and Biochemistry - 3C, New Mexico State University, Las Cruces, NM 88003 USA

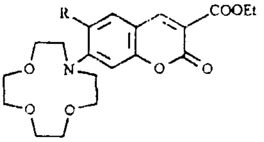


Tetrahedron Letters, **1994**, *35*, 7915

Lithium Responsive Fluorophores Derived from Monoaza-12-crown-4 and Coumarin. The Influence of a Methoxy Side-arm on Photophysical Properties.

Christopher Blackburn*, Mingqi Bai, Karen A. LeCompte and Margaret E. Langmuir. Covalent Associates, 10 State Street, Woburn, MA 01801 USA.

The lithium ion markedly shifts the absorption and fluorescence maxima of **2** towards shorter wavelengths.



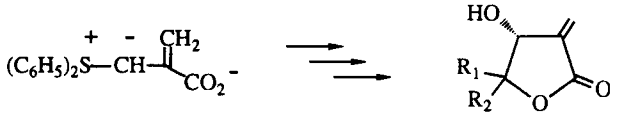
1 R = H
2 R = OMe

Tetrahedron Letters, **1994**, *35*, 7919

A NEW APPROACH TO THE SYNTHESIS OF ALPHA-METHYLENE-BETA-HYDROXY-GAMMA-BUTYROLACTONES

Robert M. Carlson and Qing Yang
Department of Chemistry, University of Minnesota, Duluth, MN 55812

Abstract:
Ylides generated from the sulfonium salts of methacrylic acid derivatives reacted with aldehydes and ketones in a "one-pot" synthesis of α-methylene-β-hydroxy-γ-butyrolactones.

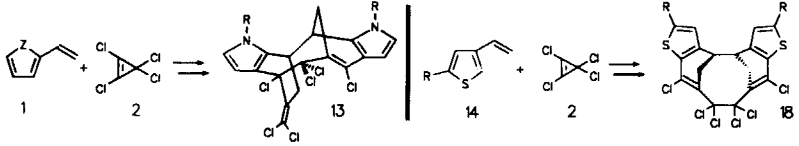


Tetrahedron Letters, **1994**, *35*, 7923

[4+2] CYCLOADDITIONS OF TETRACHLOROCYCLOPROPENE TO 2- AND 3-VINYLHETARENES: NOVEL [6+4] AND [6+6] CYCLODIMERISATIONS AS FOLLOW UP REACTIONS.

Jörg-M. Keil, Werner Massa, Ralf Riedel, Gunther Seitz* and Sigrid Wocadlo,
Pharmazeutisch-Chemisches Institut und Fachbereich Chemie der Universität Marburg, D-35032 Marburg, Germany

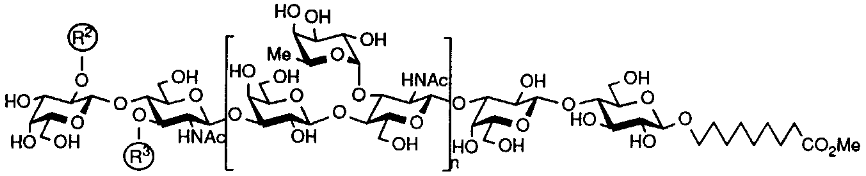
Reactions of the vinylhetarenes **1** and **14** with **2** lead to the novel [6+4] and [6+6] cyclodimerisation products **13** and **18**, resp.



Tetrahedron Letters, **1994**, *35*, 7927

Efficient Synthesis of *lactoneo* Series Antigens H, Lewis X (Le^x), and Lewis Y (Le^y)

Rainer Windmüller and Richard R. Schmidt
Fakultät Chemie, Universität Konstanz, Postfach 5560 M 725, D-78434 Konstanz



R^2	R^3	n	
Fucα	H	0	**1a**
H	Fucα	0	**1b**
Fucα	Fucα	0	**1c**
H	Fucα	1	**2b**
Fucα	Fucα	1	**2c**

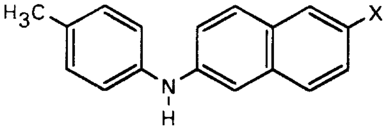
Tetrahedron Letters, **1994**, *35*, 7931

NEW FLUORESCENT PROBES FOR THE DETERMINATION OF THE CRITICAL MICELLIZATION CONCENTRATION OF SURFACTANTS

DIETER HEINL AND JÜRGEN SAUER

Institut für Organische Chemie der Universität Regensburg,
D-93040 Regensburg, Germany

New fluorescent probes 2 and 3 have been synthesized and were tested in CMC measurements



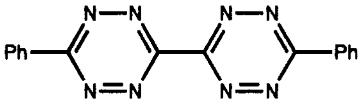
$\underline{2}$: X = $CH_2\overset{+}{N}(CH_3)_3Br^-$, $\underline{3}$: X = CH_2OH

SYNTHESIS AND REACTIONS OF 6,6'-DIPHENYL-3,3'-BIS-1,2,4,5-TETRAZINE

Tetrahedron Letters, **1994**, *35*, 7935

Norbert Biedermann and Jürgen Sauer,
Institut für Organische Chemie der Universität Regensburg,
D-93040 Regensburg, Germany

The synthesis and (4+2)-cycloaddition reactions are reported for the title compound 4.

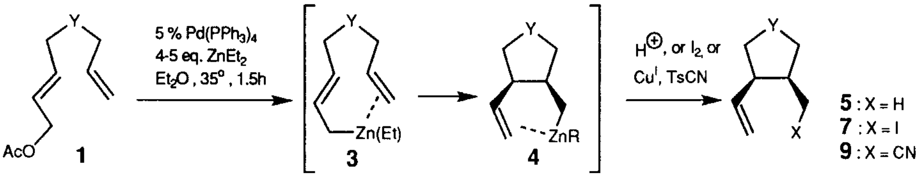


4

Palladium-Catalyzed Intramolecular Zinc-Ene Reactions

Tetrahedron Letters, **1994**, *35*, 7939

Wolfgang Oppolzer* and Fridtjof Schröder
Département de Chimie Organique, Université de Genève, CH-1211 Genève, Switzerland

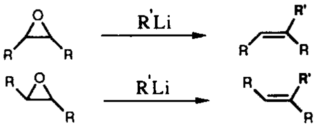


STEREOSPECIFIC SUBSTITUTED ALKENE SYNTHESIS BY ORGANO LITHIUM REDUCTIVE ALKYLATION OF EPOXIDES

Tetrahedron Letters, **1994**, *35*, 7943

Eric Doris [a], Luc Dechoux [b], Charles Mioskowski [a*]. **a**: Laboratoire de Synthèse Bio-Organique associé au CNRS, **b**: Laboratoire de Chimie Thérapeutique, Université Louis Pasteur, Faculté de Pharmacie, 74 route du Rhin, 67401 Illkirch (France).

Stereospecifically alkylated olefins were synthesized in good yields by reaction of various epoxides with organolithium reagents with concommitant introduction of the alkyl group.

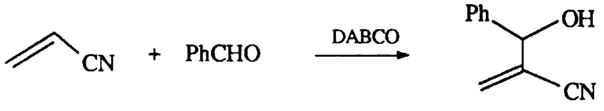


Acceleration in water of the Baylis-Hillman reaction

Tetrahedron Letters, **1994**, *35*, 7947

Jacques Augé*[a], Nadège Lubin[a], André Lubineau[b]
a. Laboratoire des Réactivités Spécifiques, Université de Cergy-Pontoise, 95806 Cergy-Pontoise, France
b. Laboratoire de Chimie Organique Multifonctionnelle associé au CNRS, Université de Paris-Sud, 91405 Orsay, France

DABCO-catalyzed coupling reaction of benzaldehyde with acrylonitrile was accelerated in water compared to organic solvents.



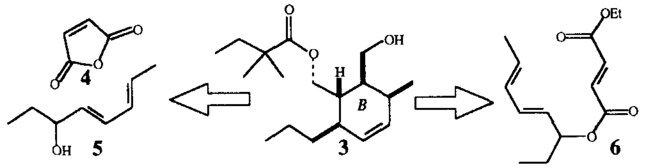
$v_{\text{water}} >> v_{\text{organic solvent}}$

Tetrahedron Letters, **1994**, *35*, 7949

Efficient Route to the Formal Total Synthesis of A-seco Mevinic Acid Analogues

S.Arseniyadis*, R.Brondi Alves, Q.Wang, D.V.Yashunsky and P.Potier
Institut de Chimie des Substances Naturelles, CNRS, F-91198 Gif-sur-Yvette (France)

An expedient Diels-Alder based construction of the B-ring **3** is presented.

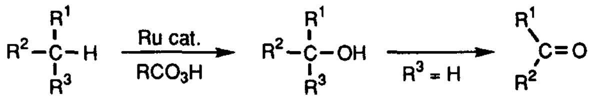


Tetrahedron Letters, **1994**, *35*, 7953

RUTHENIUM-CATALYZED OXIDATION OF ALKANES WITH PERACIDS

Shun-Ichi Murahashi,* Yoshiaki Oda, Naruyoshi Komiya and Takeshi Naota, Department of Chemistry, Faculty of Engineering Science, Osaka University, Machikaneyama, Toyonaka, Osaka 560, Japan

The ruthenium-catalyzed oxidation of alkanes with peracids under mild conditions gives the corresponding ketones and alcohols highly efficiently. Similar treatment of alkanes in trifluoroacetic acid gives alkyl trifluoroacetates.

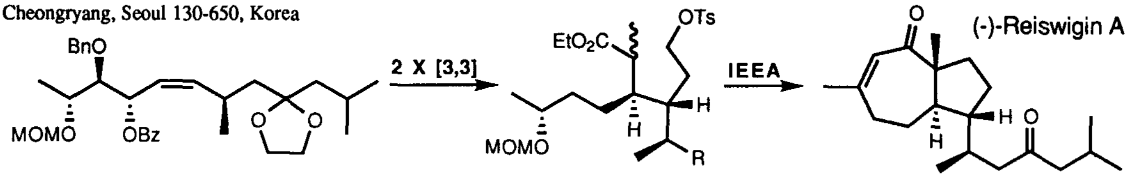


$$R^2\!-\!\overset{R^1}{\underset{R^3}{C}}\!-\!H \xrightarrow[RCO_3H]{\text{Ru cat.}} R^2\!-\!\overset{R^1}{\underset{R^3}{C}}\!-\!OH \xrightarrow[R^3 = H]{} \begin{matrix} R^1 \\ \quad C{=}O \\ R^2 \end{matrix}$$

Tetrahedron Letters, **1994**, *35*, 7957

A TOTAL SYNTHESIS OF (-)-REISWIGIN A VIA SEQUENTIAL CLAISEN REARRANGEMENT-INTRAMOLECULAR ESTER ENOLATE ALKYLATION

Deukjoon Kim[a]*, Kye Jung Shin[a], Ik Yeon Kim[a] and Sang Woo Park[b], a College of Pharmacy, Seoul National University, San 56-1, Shinrim-Dong, Seoul 151-742, Korea b Division of Chemistry, KIST, P.O. Box 131, Cheongryang, Seoul 130-650, Korea

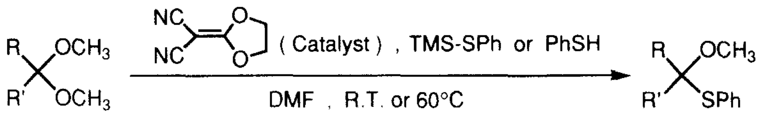


Tetrahedron Letters, **1994**, *35*, 7961

Dicyanoketene Acetals, a Novel Type of π-Acid Catalyst for Monothioacetalization of Acetals

Tsuyoshi Miura and Yukio Masaki*

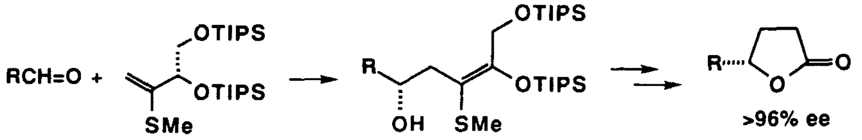
Gifu Pharmaceutical University, 5-6-1 Mitahora-Higashi, Gifu 502, Japan



Tetrahedron Letters, **1994**, *35*, 7965

3-(Alkylthio)-1,2- Bis(siloxy)-3-Butenes as Efficient Chirality Transferred Building Blocks

Keiichi Masuya, Keiji Tanino, and Isao Kuwajima*
Department of Chemistry, Tokyo Institute of Technology, Meguro, Tokyo 152, Japan

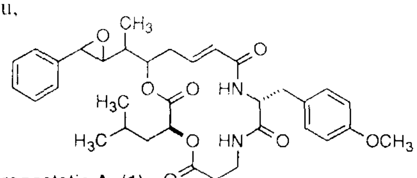


Tetrahedron Letters, **1994**, *35*, 7969

Arenastatin A, a Potent Cytotoxic Depsipeptide from the Okinawan Marine Sponge *Dysidea arenaria*

Motomasa Kobayashi, Shunji Aoki, Naoki Ohyabu, Michio Kurosu, Weiqi Wang, and Isao Kitagawa*
Faculty of Pharmaceutical Sciences, Osaka University,
Yamada-oka 1-6, Suita, Osaka 565, Japan

The chemical structure of arenastatin A (1) has been elucidated. 1 exhibited extremely potent cytotoxicity against KB cells at IC50 5 pg/ml.

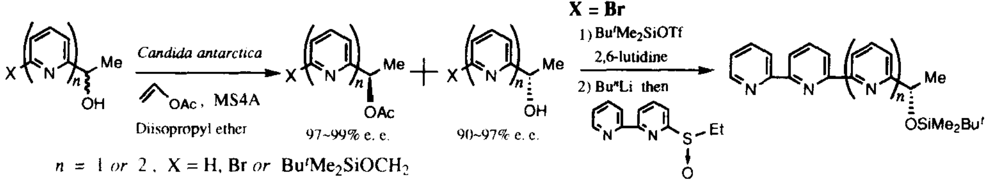


arenastatin A (1)

Tetrahedron Letters, **1994**, *35*, 7973

An Optical Resolution of Pyridyl and Bipyridylethanols and A Facile Preparation of Optically Pure Oligopyridines

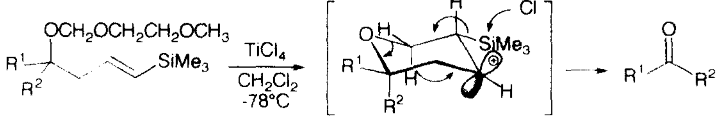
Jun'ichi Uenishi,* Kenji Nishiwaki, Shinichiro Hata, and Kaoru Nakamura*§ Department of Chemistry, Okayama University of Science, Okayama, 700, Japan § Institute of Chemical Research, Kyoto University, Uji, Kyoto, 611, Japan



Tetrahedron Letters, **1994**, *35*, 7977

ACETAL-INDUCED CLEAVAGE OF CARBON-CARBON BOND OF MEM ETHERS OF (*E*)-4-ALKYL-1-TRIMETHYLSILYL-1-ALKEN-4-OLS PROVIDING KETONES

Yoshihiro Horiuchi, Masahiko Taniguchi, Koichiro Oshima,* and Kiitiro Utimoto*
Division of Material Chemistry, Faculty of Engineering, Kyoto University, Yoshida, Sakyo-ku, Kyoto 606-01, Japan

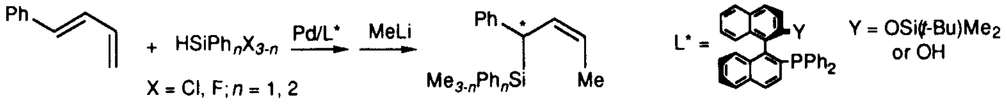


Tetrahedron Letters, **1994**, *35*, 7981

CATALYTIC ASYMMETRIC HYDROSILYLATION OF CONJUGATED DIENES: EFFECTIVE CONTROL OF REGIO- AND ENANTIOSELECTIVITIES

Yasuo Hatanaka,* Ken-ichi Goda, Futoshi Yamashita, and Tamejiro Hiyama,†
Sagami Chemical Research Center, 4-4-1 Nishiohnuma, Sagamihara, Kanagawa, 229, Japan
†Research Laboratory of Resources Utilization, Tokyo Institute of Technology, 4259 Nagatsuda, Midori-ku, Yokohama, 227, Japan

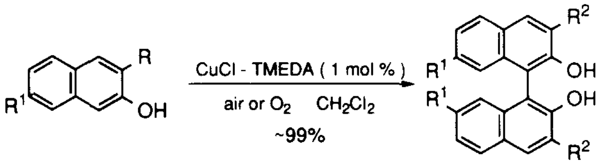
Asymmetric hydrosilylation of (*E*)-1-phenyl-1,3-butadiene was catalyzed by Pd/L* to give optically active allylsilanes in good yields



Tetrahedron Letters, **1994**, *35*, 7983

A New Catalytic System for Aerobic Oxidative Coupling of 2-Naphthol Derivatives by the Use of CuCl-Amine Complex : A Practical Synthesis of Binaphthol Derivatives

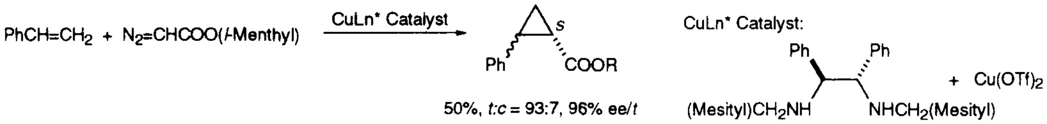
Faculty of Pharmaceutical Sciences, University of Tokyo,
Hongo, Bunkyo-ku, Tokyo 113, Japan
Masahiro Noji, Makoto Nakajima* and Kenji Koga*



Tetrahedron Letters, **1994**, *35*, 7985

C$_2$-Symmetric 1,2-Diamine/Copper(II) Trifluoromethanesulfonate Complexes as Chiral Catalysts. Asymmetric Cyclopropanations of Styrene with Diazo Esters

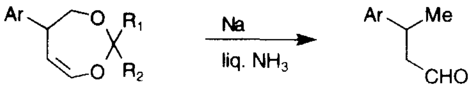
Shuji Kanemasa,* Satoshi Hamura, Etsuko Harada, and Hidetoshi Yamamoto
Institute of Advanced Material Study, Kyushu University, Kasugakoen, Kasuga 816, Japan



Tetrahedron Letters, **1994**, *35*, 7989

Generality and Mechanism of Homobenzylic-Homoallylic Hydrogenolysis of 5-Aryl-4,5-dihydro-1,3-dioxepins

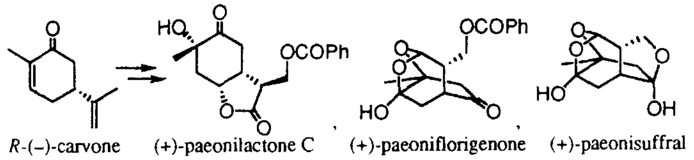
Kiyohiro Samizu and Kunio Ogasawara*
Pharmaceutical Institute, Tohoku University, Aobayama, Sendai 980-77, Japan



Tetrahedron Letters, **1994**, *35*, 7993

Enantiospecific Synthesis of (+)-Paeonilactone C and (+)-Paeoniflorigenone from *R*-(–)-Carvone

Susumi Hatakeyama*[a], Mitsuhiro Kawamura[b], Seiichi Takano[b], and Hiroshi Irie[a]
[a]*Faculty of Pharmaceutical Sciences, Nagasaki University, Nagasaki 852, Japan* [b]*Pharmaceutical Institute, Tohoku University, Aobayama, Sendai 980-77, Japan*



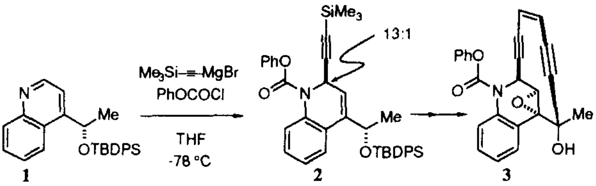
The first total syntheses of (+)- paeonilactone C and (+)-paeoniflorigenone have been accomplished starting with *R*-(–)-carvone. The latter synthesis also means the first total synthesis of (+)-paeonisuffral.

Tetrahedron Letters, **1994**, *35*, 7997

SYNTHESIS OF BOTH ENANTIOMERS OF DYNEMICIN A MODEL COMPOUND. NEW REMOTE ASYMMETRIC INDUCTION IN ACETYLIDE ADDITION INTO QUINOLINE NUCLEUS AS KEY STEP.

Toshio Nishikawa, Maki Yoshikai, Kazuyo Obi and Minoru Isobe*
Laboratory of Organic Chemistry, School of Agricultural Sciences, Nagoya University, Chikusa, Nagoya 464-01, Japan

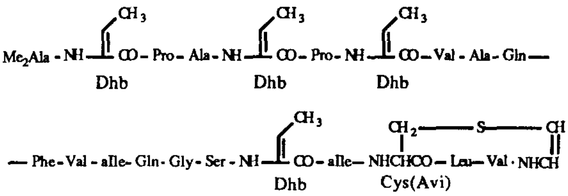
Both enantiomers of dynemicin A model compound 3 were synthesized by novel 1,4-asymmetric induction in 1 → 2 as key step.



Tetrahedron Letters, **1994**, *35*, 8001

STRUCTURE OF CYPEMYCIN, A NEW PEPTIDE ANTIBIOTIC. Yoshinori Minami,* Ken-ichiro Yoshida, Ryotaro Azuma, Akira Urakawa, Takashi Kawauchi, and Toshio Otani, Tokushima Research Center, Taiho Pharmaceutical Co., Ltd., Kawauchi-cho, Tokushima 771-01, Japan; Kanki Komiyama and Satoshi Ōmura, The Kitasato Institute and School of Pharmaceutical Sciences of Kitasato University Shirakane, Minato-ku, Tokyo 108, Japan

The structure of cypemycin, a new peptide antibiotic, was determined by means of FAB-MS, NMR, and amino acid analysis.



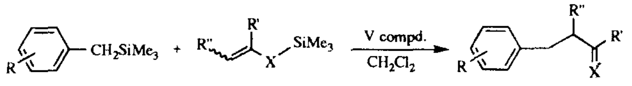
Cypemycin

Tetrahedron Letters, **1994**, *35*, 8005

Selective Cross Coupling via Oxovanadium(V)-Induced Oxidative Desilylation of Benzylic Silanes

Toshikazu Hirao,* Takashi Fujii, Yoshiki Ohshiro
Department of Applied Chemistry, Faculty of Engineering, Osaka University, Yamadaoka, Suita, Osaka 565, Japan

Benzylic silanes bearing an electron-donating group underwent the oxovanadium(V)-induced desilylative intermolecular coupling with allylic silanes or silyl enol ether.



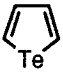
$X = CH_2, O$

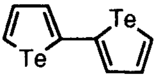
Tetrahedron Letters, **1994**, *35*, 8009

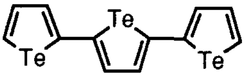
2,2'-Bitellurophene and 2,2':5',2"-Tertellurophene as Novel High Homologues of Tellurophene.

S. Inoue, T. Jigami, H. Nozoe, T. Otsubo* and F. Ogura, Department of Applied Chemistry, Faculty of Engineering, Hiroshima University, Higashi-Hiroshima 724, Japan

The title heterocycles (2) and (3) were prepared from tellurophene (1). Their electropolymerizations gave poly(bitellurophene) and poly(tertellurophene) as black films, which both had higher electrical conductivities than poly(tellurophene).


1


2

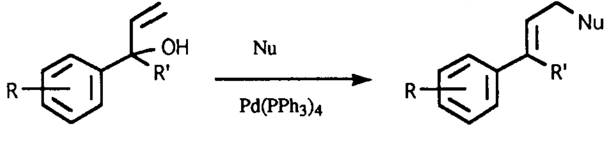

3

Tetrahedron Letters, **1994**, *35*, 8013

Pd-CATALYZED ALLYLIC ALKYLATION OF PHENYLVINYLCARBINOLS WITH SOME NUCLEOPHILES

Masayuki Sakakibara* and Aki Ogawa, Kirin Brewery Co., Ltd.,
Pharmaceutical Research Laboratories, Miyahara-cho, Takasaki, Gunma, 320-12 Japan

$Pd(PPh_3)_4$ catalyzes allylic alkylation of phenylvinylcarbinols with nucleophiles under a mild condition. The reaction may lead to an effective method for the synthesis of estrogens and their analogs.

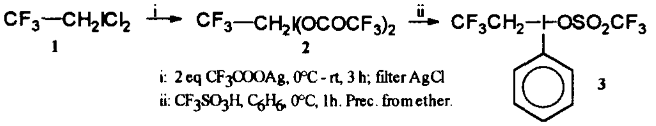


Tetrahedron Letters, **1994**, *35*, 8015

TRIFLUOROETHYL PHENYL IODONIUM TRIFLATE: MODIFIED PREPARATION AND N-TRIFLUOROETHYLATION OF AMINO ALCOHOLS.

Vittorio Montanari*, Giuseppe Resnati.
CNR-Centro Studio Sostanze Organiche Naturali, Politecnico, via Mancinelli 7, 20131 Milano, Italy.

The title compound 3 is prepared from routinely available reagents. Alaninol, phenylglycinol, prolinol and ephedrine are N-trifluoroethylated by 3 (79-88%).



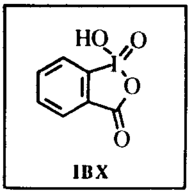
$$\underset{1}{CF_3{-}CH_2ICl_2} \xrightarrow{i} \underset{2}{CF_3{-}CH_2I(OCOCF_3)_2} \xrightarrow{ii} \underset{3}{CF_3CH_2{-}\underset{\displaystyle C_6H_5}{I}{-}OSO_2CF_3}$$

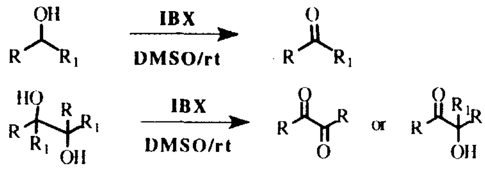
i: 2 eq CF_3COOAg, 0°C - rt, 3 h; filter AgCl
ii: CF_3SO_3H, C_6H_6, 0°C, 1h. Prec. from ether.

Tetrahedron Letters, **1994**, *35*, 8019

A Mild Oxidizing Reagent for Alcohols and 1,2-Diols: o-Iodoxybenzoic Acid (IBX) in DMSO

Marco Frigerio* and Marco Santagostino. Prassis - Istituto Ricerche Sigma-Tau, Via Forlanini , 20019 Settimo Milanese (Milan), Italy


IBX



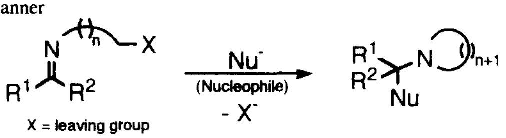
IBX oxidises alcohols to aldehydes or ketones and 1,2-diols to α-ketols or α-diketones without any cleavage of the glycol C-C bond.
Yields: 75-100%
R, R^1 = H, Alkyl, Aryl, Heteroaryl

Tetrahedron Letters, **1994**, *35*, 8023

SYNTHESIS OF AZIRIDINES AND AZETIDINES FROM N-(ω -HALOALKYL) IMINES.

Norbert De Kimpe and Dirk De Smaele,
Department of Organic Chemistry, Faculty of Agricultural and Applied Biological Sciences, University of Gent,
Coupure Links 653, B-9000 Gent, Belgium.

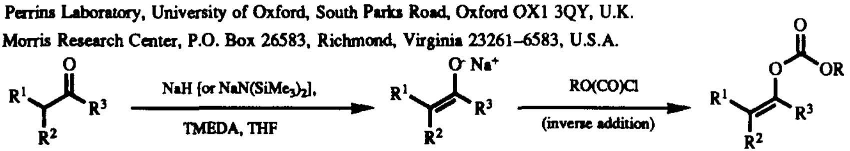
Aziridines and azetidines were prepared from N-(2-haloalkyl) and N-(3-haloalkyl) imines *via* a two-step process in a straightforward manner



Tetrahedron Letters, **1994**, *35*, 8027

EFFICIENT PREPARATION OF ENOL CARBONATES BY SELECTIVE *O*-ACYLATION OF KETONE SODIUM ENOLATES GENERATED IN THE PRESENCE OF TMEDA.

Laurence M. Harwood,[a] Yoram Houminer,[b] Ajith Manage[a] and Jeffrey I. Seeman.[b]
[a] Dyson Perrins Laboratory, University of Oxford, South Parks Road, Oxford OX1 3QY, U.K.
[b] Philip Morris Research Center, P.O. Box 26583, Richmond, Virginia 23261–6583, U.S.A.



Substrates include cyclic and acyclic aliphatic ketones, aromatic ketones and cyclic and acyclic α,β–unsaturated ketones

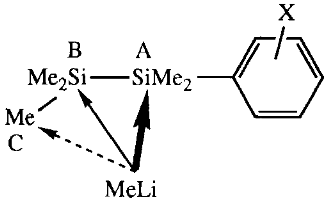
---

Tetrahedron Letters, **1994**, *35*, 8031

PECULIARITIES IN THE CLEAVAGE BY METHYLLITHIUM OF UNSYMMETRICAL DISILANES

L. Hevesi * and M. Dehon
Department of Chemistry, Facultés Universitaires N.-D. de la Paix,
61, rue de Bruxelles, B-5000 NAMUR (Belgium)

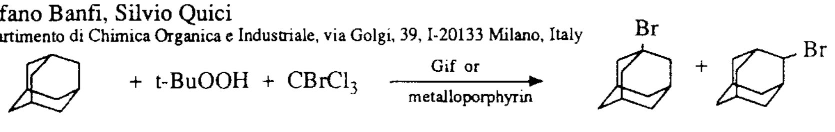
Predominant attack occurred at Si$_A$ to give eithertrimethylsilyllithium or aryllithium depending on the nature of X; attack at Si$_B$ was negligible, and in one case, predominant attack may have occurred at Me$_C$



Tetrahedron Letters, **1994**, *35*, 8033

REGIO- AND CHEMO-SELECTIVITY OF ADAMANTANE HALOGENATION BY GIF-BARTON AND METALLOPORPHYRIN CATALYSIS AND BY CLASSICAL FREE-RADICAL REACTIONS.

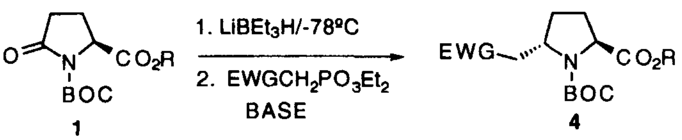
Francesco Minisci*, Francesca Fontana, Lihua Zhao
Dipartimento di Chimica del Politecnico, via Mancinelli,7, I-20131 Milano, Italy
Stefano Banfi, Silvio Quici
Dipartimento di Chimica Organica e Industriale, via Golgi, 39, I-20133 Milano, Italy



Tetrahedron Letters, **1994**, *35*, 8037

DIASTEREOSELECTIVE FUNCTIONALIZATION OF 5-HYDROXY PROLINATES BY TANDEM HORNER-EMMONS-MICHAEL REACTION

Ivan Collado[a], Jesús Ezquerra[a], Juan José Vaquero[b] and Concepción Pedregal[a]*
a. Centro de Investigación Lilly, S. A. Paraje de la Cruz s/n. 28130 Valdeolmos, Madrid. Spain.
b. Departamento de Química Orgánica, Universidad de Alcalá. 28871 Alcalá de Henares. Madrid. Spain.



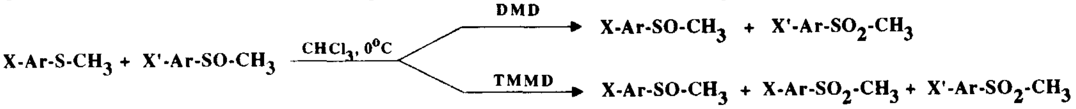
The tandem Horner-Emmons-Michael reaction of the hemiaminal derived from *N*-Boc protected pyroglutamic esters with stabilized phosphonates gives 5-substituted prolines in high diastereomeric and enantiomeric excess.

Tetrahedron Letters, **1994**, *35*, 8041

The Relative Reactivity of Thioethers and Sulfoxides toward Oxygen Transfer Reagents: the Case of Dioxiranes.

F.P. Ballistreri,[†] G.A. Tomaselli,[†] R M. Toscano,[†] M. Bonchio,[‡] V. Conte[‡] and F. Di Furia[‡]. [†]Univ. Catania, Dip. Scienze Chimiche, Viale Andrea Doria 6, 95125 Catania, Italy. [‡]Univ. di Padova, Dip. di Chimica Organica, Via Marzolo 1, 35135 Padova, Italy.

Thioether and sulfoxide oxidations by both DMD and TMMD are electrophilic processes. The mixture of products observed with competitive oxidations with TMMD is due to its greater reactivity or reduced selectivity compared with DMD.



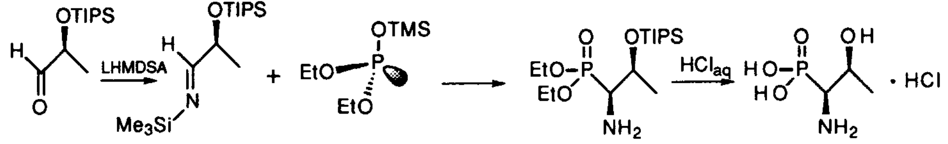
$$X\text{-}Ar\text{-}S\text{-}CH_3 + X'\text{-}Ar\text{-}SO\text{-}CH_3 \xrightarrow{CHCl_3,\ 0^oC} \begin{cases} \xrightarrow{DMD} X\text{-}Ar\text{-}SO\text{-}CH_3 + X'\text{-}Ar\text{-}SO_2\text{-}CH_3 \\ \xrightarrow{TMMD} X\text{-}Ar\text{-}SO\text{-}CH_3 + X\text{-}Ar\text{-}SO_2\text{-}CH_3 + X'\text{-}Ar\text{-}SO_2\text{-}CH_3 \end{cases}$$

Tetrahedron Letters, **1994**, *35*, 8045

Synthesis of (*1S, 2S*)-Phosphothreonine *via N*- Trimethylsilylimine of (*S*)-Lactic Aldehyde.

Alessandro Bongini*, Roberto Camerini, Sven Hofman and Mauro Panunzio*.
Dipartimento di Chimica "G. Ciamician" Via Selmi, 2 - 40126 Bologna Italy

Preparation of (*1S, 2S*)-Phosphothreonine in high diastereomeric purity.



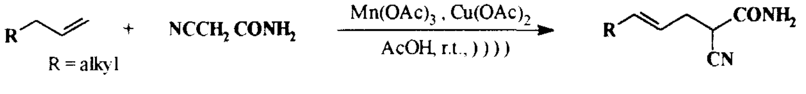
TIPS=SiPr$^i_3$; ; TMS=SiMe$_3$

Tetrahedron Letters, **1994**, *35*, 8049

SONOCHEMICAL REACTION OF CYANOACETAMIDE WITH Mn(OAc)$_3$ AND Cu(OAc)$_2$ IN PRESENCE OF ALKENES: A NOVEL ROUTE TO α-CYANO-γ,δ-UNSATURATED AMIDES.

Cesare Bosman, Andrea D'Annibale,* Stefano Resta and Corrado Trogolo,* Centro C.N.R. di Studio per la Chimica delle Sostanze Organiche Naturali, Dipartimento di Chimica, Università degli Studi di Roma "La Sapienza", P.le Aldo Moro 5, 00185 Roma, ITALIA

Alkyl substituted olefins reacted with cyanoacetamide, Mn(OAc)$_3$·2H$_2$O and Cu(OAc)$_2$ to give α-cyano-γ,δ-unsaturated amides. Ultrasound irradiation caused relevant yield enhancements and the shortening of reaction times.

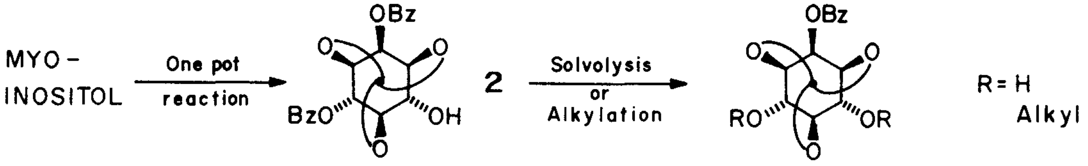


Tetrahedron Letters, **1994**, *35*, 8053

NEIGHBOURING HYDROXY GROUP ASSISTED O-ALKYLATION AND SOLVOLYSIS OF AN UNSYMMETRICAL DIESTER DERIVATIVE OF *MYO*-INOSITOL.

Tanya Banerjee and Shashidhar M. Srikantiah* Division of Organic Chemistry (Synthesis), National Chemical Laboratory, Pune 411 008, India.

Alkylation (Ag_2O/RX) and solvolysis (methanol/pyridine) of **2** proceed with the assistance of the axial hydroxy group.



Tetrahedron Letters, **1994**, *35*, 8057

6-HYDROXYMETHYL-1,2,4-TRIOXANES AND DERIVATIVES: AN ALTERNATIVE 1,2,4-TRIOXANE SYNTHESIS FROM β'γ'-UNSATURATED β-HYDROXYHYDROPEROXIDES

A. J. Bloodworth* and Karen A. Johnson
Chemistry Department, University College London, 20 Gordon Street, London WC1H 0AJ.