Stereoselective denitrohydrogenation reactions of 4-alkyl-5-glyco-4-nitrocyclohex-1-enes

Tetrahedron: Asymmetry *12 (2001) 1673*

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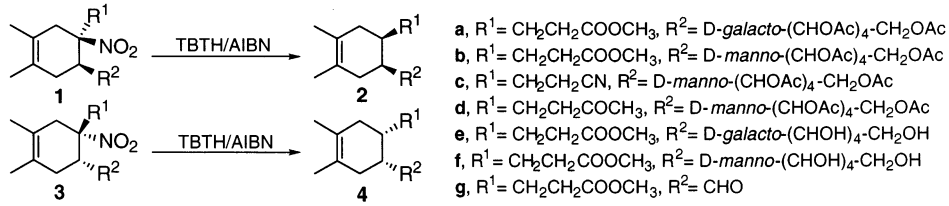
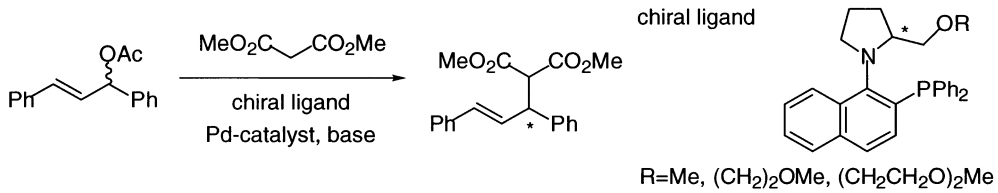


Palladium-catalyzed asymmetric allylic alkylation using chiral aminophosphine ligands

Tetrahedron: Asymmetry *12 (2001) 1677*

Takashi Mino,* Yoh-ichi Tanaka, Koji Akita, Kouhei Anada, Masami Sakamoto and Tsutomu Fujita

Department of Materials Technology, Faculty of Engineering, Chiba University, Inage-ku, Chiba 263-8522, Japan



Enantioselective imine Michael reaction for the preparation of the (8′*R*,8a′*S*)-8,8a′-dimethyl-1′,3′,4′,7′,8′,8a′-hexahydrospiro[1,3-dioxolane-2,2′(6′*H*)naphthalen]-6′-one building block. A formal synthesis of (+)-valencenol

Tetrahedron: Asymmetry *12 (2001) 1683*

Gilbert Revial,[a] Ivan Jabin,[b] Michaël Redolfi[a] and Michel Pfau[a,*]

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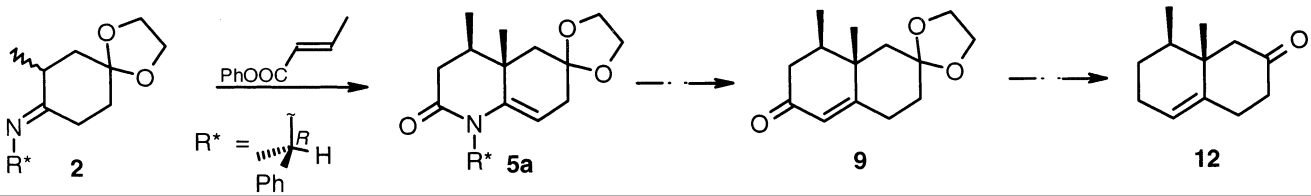


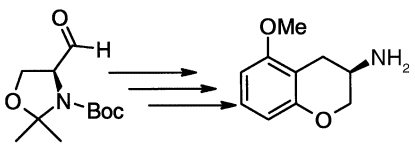
Synthesis of enantiomerically pure 3-aminochroman derivatives

Tetrahedron: Asymmetry *12 (2001) 1689*

Stéphanie Usse,[a] Grégoire Pave,[a] Gérald Guillaumet[a] and Marie-Claude Viaud-Massuard[b,*]

[a]*Institut de Chimie Organique et Analytique, UMR CNRS 6005, Université d'Orléans, BP 6759, 45067 Orléans Cedex 2, France*
[b]*UFR Sciences Pharmaceutiques, Laboratoire de Chimie Organique, 31 avenue Monge, 37200 Tours, France*

Enantiomerically pure (3*R*)-amino-5-methoxy-3,4-dihydro-2*H*-1-benzopyran was successfully synthesised in six steps starting from L-serine. The same synthetic pathway was used to prepared the (3*S*)-aminochroman analogue starting from D-serine.



Synthesis of homochiral pentadentate sulfonamide-based ligands

Tetrahedron: Asymmetry *12 (2001) 1719*

Karno Ng,[a] Ratnasamy Somanathan[b,*] and Patrick J. Walsh[b,c,*]

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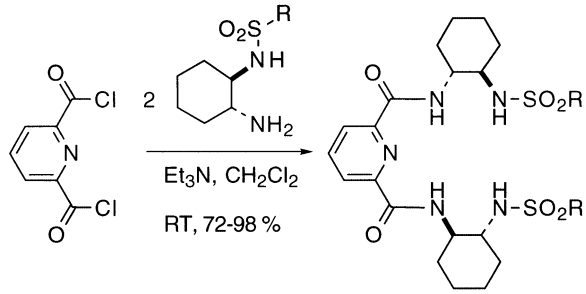
[b]*Centro de Graduados e Investigación, Instituto Tecnológico de Tijuana, Apartado Postal 1166, 22000 Tijuana, BC Mexico*

[c]*Department of Chemistry, San Diego State University, San Diego, CA 92182-1030, USA*

We report the synthesis of a new class of resolved pentadentate ligands. They are readily prepared in two steps from commercially available materials.

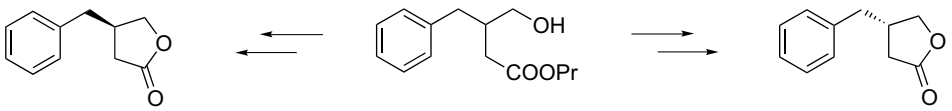


Synthesis of optically active β-benzyl-γ-butyrolactone through lipase-catalyzed kinetic resolution

Tetrahedron: Asymmetry *12 (2001) 1723*

Yolanda Caro, Christian F. Masaguer and Enrique Raviña*

Departamento de Química Orgánica, Laboratorio de Química Farmacéutica, Facultad de Farmacia, Universidad de Santiago de Compostela, E-15782 Santiago de Compostela, Spain



(*R*)-(+)-**1** (±)-**2** (*S*)-(-)-**1**

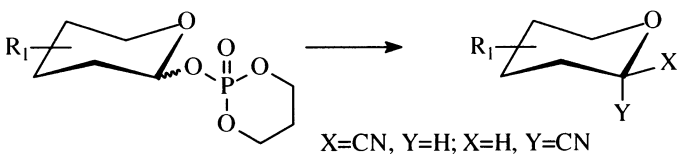
Efficient stereocontrolled synthesis of *C*-glycosides using glycosyl donors substituted by propane 1,3-diyl phosphate as the leaving group

Tetrahedron: Asymmetry *12 (2001) 1727*

Gurdial Singh* and Hariprasad Vankayalapati

Department of Chemistry, University of Sunderland, Sunderland SR1 3SD, UK

The synthesis of α- or β-glycosyl cyanides, per-*O*-acetyl-1,2-*O*-1-cyanoethylidenes and *C*-allyl glycopyranosides were efficiently prepared by treatment of 2,3,4-tri-*O*-acetyl-α,β-L-rhamno-, L-fuco- and 2,3,4,6-tetra-*O*-acetyl-α,β-D-galactopyranosyl propane-1,3-diyl phosphates with trimethylsilyl cyanide and allyltrimethylsilane in the presence of trimethylsilyl triflate. 2,3,4,6-Tetra-*O*-benzyl-α,β-D-manno- and D-glucopyranosyl propane-1,3-diyl phosphates gave the corresponding *C*-glycosides.



X=CN, Y=H; X=H, Y=CN
X=1-propene, Y=H; or
X=H, Y=1-propene

Di[(*S*)-1-(9-anthryl)-2,2,2-trifluoroethyl]sulphite, a case of diastereotopic anthracene groups

Tetrahedron: Asymmetry *12 (2001) 1737*

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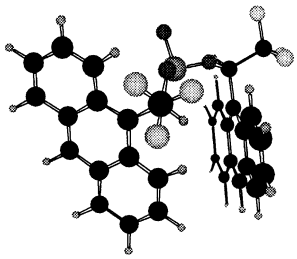
Departament de Química, Unitat de Química Orgànica, Universitat Autònoma de Barcelona, 08193 Cerdanyola, Barcelona, Spain

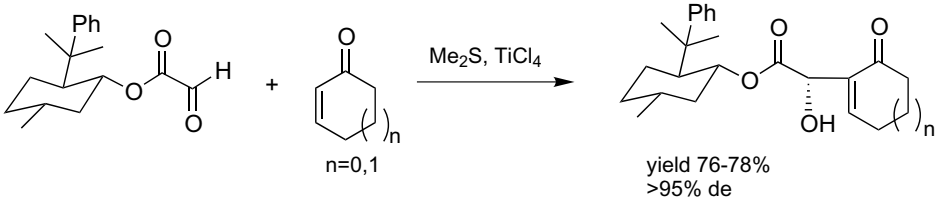


Asymmetric Morita–Baylis–Hillman reaction of chiral glyoxylates

Tetrahedron: Asymmetry *12 (2001) 1741*

Tomasz Bauer* and Joanna Tarasiuk

Department of Chemistry, Warsaw University, Pasteura 1, PL-02-093 Warsaw, Poland



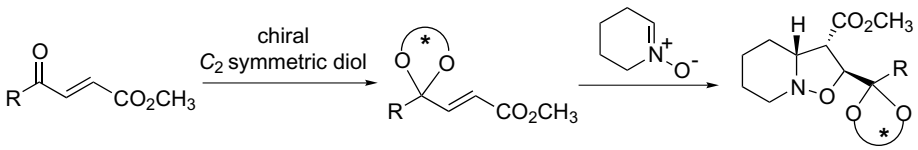
Acetals of γ-oxo-α,β-unsaturated esters in nitrone cycloadditions. Regio- and stereochemical implications

Tetrahedron: Asymmetry *12 (2001) 1747*

Ramon Alibés,[a] Félix Busquè,[a] Pedro de March,[a,*] Marta Figueredo,[a] Josep Font,[a] Maria Esmeralda Gambino[a] and Brian A. Keay[b]

[a]*Departament de Química, Universitat Autònoma de Barcelona, 08193 Bellaterra, Spain*

[b]*Department of Chemistry, University of Calgary, Calgary, Alberta, Canada T2N 1N4*



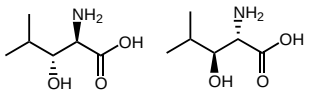
Efficient enantioselective synthesis of (2*R*,3*R*)- and (2*S*,3*S*)-3-hydroxyleucines and their diastereomers through dynamic kinetic resolution

Tetrahedron: Asymmetry *12 (2001) 1757*

Kazuishi Makino, Naoki Okamoto, Osamu Hara and Yasumasa Hamada*

Graduate School of Pharmaceutical Sciences, Chiba University, Yayoi-cho, Inage-ku, Chiba 263-8522, Japan

(2*R*,3*R*)- and (2*S*,3*S*)-3-Hydroxyleucines, which are components of cyclodepsipeptides, papuamides and polyoxypeptins, were efficiently synthesized along with their diastereomers from the corresponding β-keto-α-amino acid ester through dynamic kinetic resolution using $RuCl_2$(binap)-catalyzed hydrogenation.



Chiral α,ω-diaminoethers derived from D-mannitol and L-treitol as building blocks for the synthesis of macrocyclic compounds possessing 1,3-benzenedicarboxamide or 2,6-pyridinedicarboxamide subunits

Tetrahedron: Asymmetry *12 (2001) 1763*

Piotr Piątek,[a] Mariusz M. Gruza[a] and Janusz Jurczak[a,b,*]

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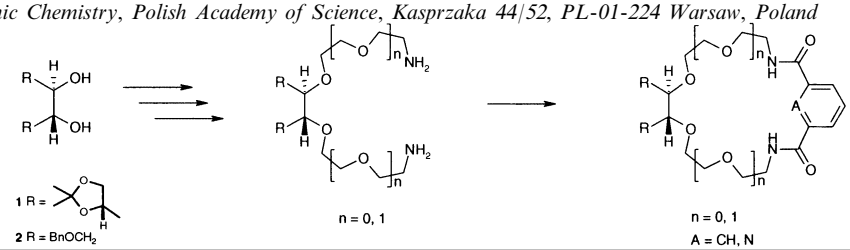
[b]*Institute of Organic Chemistry, Polish Academy of Science, Kasprzaka 44/52, PL-01-224 Warsaw, Poland*

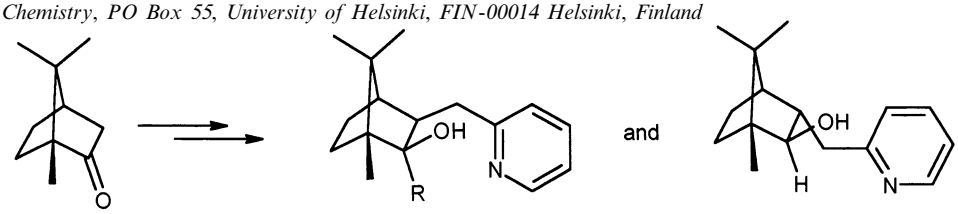


(+)-Camphor-derived amino alcohols as ligands for the catalytic enantioselective addition of diethylzinc to benzaldehydes

Tetrahedron: Asymmetry *12 (2001) 1771*

Marta Nevalainen and Vesa Nevalainen*

Department of Chemistry, PO Box 55, University of Helsinki, FIN-00014 Helsinki, Finland



R=H (2-*exo*,3-*exo*/2-*endo*,3-*endo* mixture), Ph
Me, Bu (mixture of diastereoisomers)

Catalyze the addition of Et2Zn to PhCHO with ees up to 89%

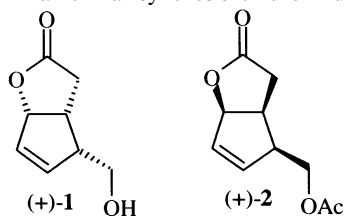
Enantioselective syntheses of isoprostane and iridoid lactones intermediates by enzymatic transesterification

Tetrahedron: Asymmetry *12 (2001) 1779*

Giuseppe Zanoni, Fabio Agnelli, Alessia Meriggi and Giovanni Vidari*

Dipartimento di Chimica Organica, Università di Pavia, Viale Taramelli 10, 27100 Pavia, Italy

Enzymatic resolution of (±)-**1** by acylation with *Pseudomonas cepacia* lipase (Amano PS-30) afforded (+)-**1** and (+)-**2** with e.e. of ≥95%. Acetate (+)-**2** was utilized in a formal synthesis of the iridoids (+)-isoiridomyrmecin and (−)-teucriumlactone.



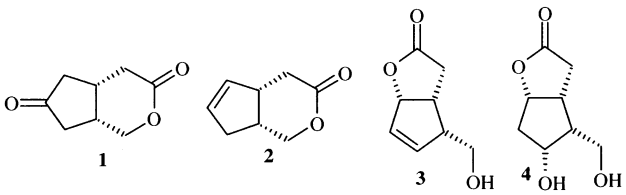
Enantioselective synthesis of *cis*-1,2-dialkyl substituted cyclopentanoid and isoprostane building blocks via 6-*exo*-trigonal radical cyclizations

Tetrahedron: Asymmetry *12 (2001) 1785*

Giuseppe Zanoni, Savino Re, Alessia Meriggi, Francesca Castronovo and Giovanni Vidari*

Dipartimento di Chimica Organica, Università di Pavia, Viale Taramelli 10, 27100 Pavia, Italy

Enantiomerically enriched lactones **1**–**4** were obtained by two different asymmetric 6-*exo*-trigonal cyclizations of 6-heptenyl radicals and subsequent chemical reactions. A formal synthesis of isoprostanes 15-F_{2c}-IsoP and *ent*-15-F_{2c}-IsoP was accomplished.

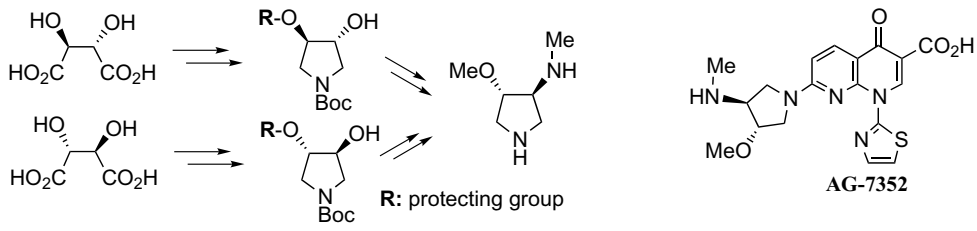


Efficient stereospecific synthesis of (*S*,*S*)-3-methoxy-4-methylaminopyrrolidine

Tetrahedron: Asymmetry *12 (2001) 1793*

Yasunori Tsuzuki,* Katsumi Chiba and Katsuhiko Hino

Discovery Research Laboratories, Dainippon Pharmaceutical Co. Ltd., Enoki 33-94, Suita, Osaka 564-0053, Japan



Rhodium versus ruthenium: contrasting behaviour in the asymmetric transfer hydrogenation of α-substituted acetophenones

Tetrahedron: Asymmetry *12 (2001) 1801*

David J. Cross,[a] Jennifer A. Kenny,[a] Ian Houson,[b] Lynne Campbell,[b] Tim Walsgrove[c] and Martin Wills[a,*]

[a]*Department of Chemistry, The University of Warwick, Coventry CV4 7AL, UK*

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