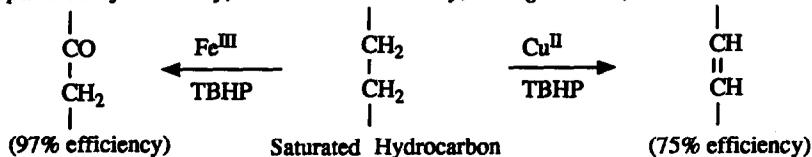


GRAPHICAL ABSTRACTS

Tetrahedron Lett. 1993, 34, 567

**Metal Dependence in Gif-type Reactions.
The Cu(II)-catalyzed Olefination of Saturated
Hydrocarbons by *tert*-Butyl Hydroperoxide.**

Derek H. R. Barton,* Stéphane D. Bévière, Warinthorn Chavasiri, Darfo Doller* and Bin Hu.
Department of Chemistry; Texas A&M University; College Station, TX 77843-3255.

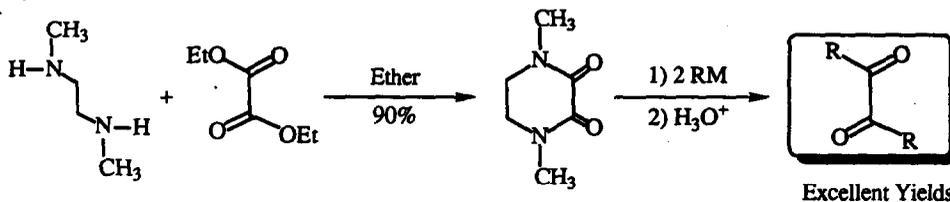


Tetrahedron Lett. 1993, 34, 571

**A SIMPLE SYNTHESIS OF SYMMETRICAL α -DIONES
FROM ORGANOMETALLIC REAGENTS AND 1,4-DIMETHYL-PIPERAZINE-2,3-DIONE**

ULRICH T. MUELLER-WESTERHOFF,* MING ZHOU

Department of Chemistry, University of Connecticut, Storrs, CT 06269-3060, USA



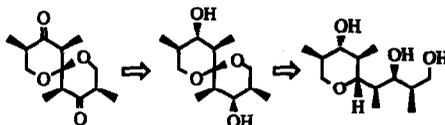
Tetrahedron Lett. 1993, 34, 575

**STEREOCONTROLLED SYNTHESIS OF TETRAHYDROPYRANS VIA REDUCTIVE
MANIPULATION OF 4,10-DIOXO-3,5,9,11-TETRAMETHYL-1,7-DIOXASPIRO[5.5] UNDECANES**

Yun-bo Zhao, Kim F. Albizzati*

Department of Chemistry, Wayne State University, Detroit, MI 48202

Stereocontrolled carbonyl reduction of 4,10-dioxo-3,5,9,11-tetramethyl-1,7-dioxaspiro[5.5]undecanes followed by reductive cleavage leads to tetrahydropyrans with 7 stereogenic centers.



Tetrahedron Lett. 1993, 34, 579

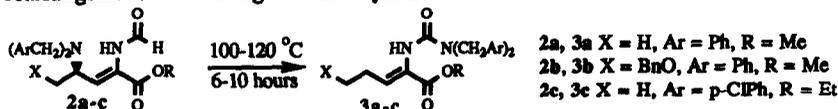
A Novel Dyatropic Rearrangement of γ -N,N-Dibenzylamino

α,β -Dehydro N-Formylamino Acid Esters

Andrew S. Kende*, K. M. J. Brands, and Benjamin Blass

Department of Chemistry, University of Rochester, Rochester, New York 14627, USA

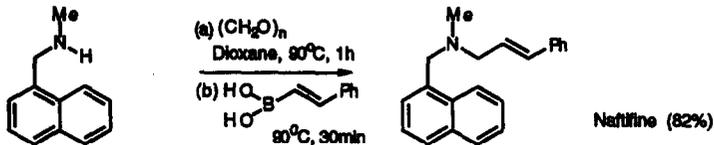
γ -N,N-Dibenzylamino α,β -dehydro N-formylamino acid esters of type 2 undergo a dyatropic thermal rearrangement in refluxing toluene to yield the isomeric urea derivatives 3.



**THE BORONIC ACID MANNICH REACTION:
A NEW METHOD FOR THE SYNTHESIS OF GEOMETRICALLY PURE ALLYLAMINES**

Nicos A. Petasis and Irini Akritopoulou

Department of Chemistry, University of Southern California, Los Angeles, California 90089-0744

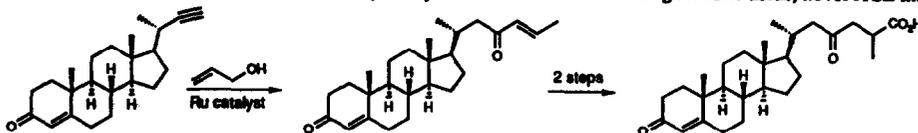


**Ruthenium Catalyzed Reconstitutive Condensation.
Applications to Functionalized Steroid Side Chains.**

Barry M. Trost, Robert J. Kulawiec and (in part) Alf Hammes

Department of Chemistry, Stanford University, Stanford, California 94305-5080

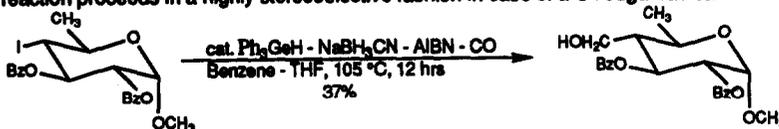
Ruthenium catalyzed addition of allyl alcohols and acetylenes attached to functional steroid nuclei provide access to highly functionalized side chains as illustrated by the synthesis of the side chain of ganoderic acids, novel ACE inhibitors.



**DIRECT INTRODUCTION OF CH₂OH BY INTERMOLECULAR
TRAPPING OF CO.** Varsha Gupta and Daniel Kahne*

Department of Chemistry, Princeton University, Princeton, NJ 08544 USA

An intermolecular trapping of CO by an alkyl radical followed by *in situ* reduction introduces a hydroxymethyl group. The reaction proceeds in a highly stereoselective fashion in case of a C4 sugar radical.



NOVEL SYNTHESIS OF N-UNSUBSTITUTED IMIDAZOLES USING N-TRIMETHYLSILYLIMINES

Neng-Yang Shih

Schering-Plough Research Institute, 80 Orange Street, Bloomfield, N.J. 07003

4-Substituted and 4,5-disubstituted imidazoles were synthesized from the easily accessible aldehydes or organolithium reagents, under mild conditions in a one-pot operation.

