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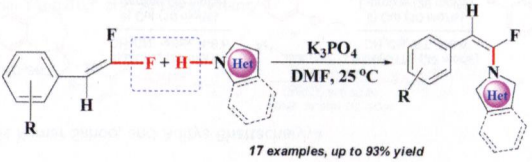
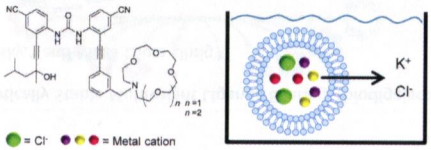
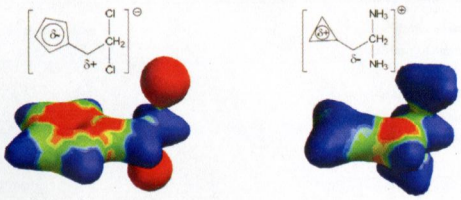
ON THE COVER: Amination of (2,2-difluorovinyl)arenes with different N–H-containing heterocycles provides a wide variety of α-hetaryl-substituted monofluoroalkenes and *N*,*N*′-α,α′-dihetaryl-substituted alkenes in the absence of metal catalyst under very mild reaction conditions. See Cao and Xiong, p 6395.

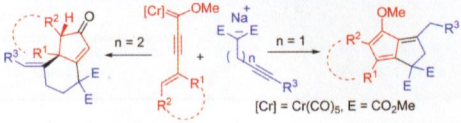
Featured Articles

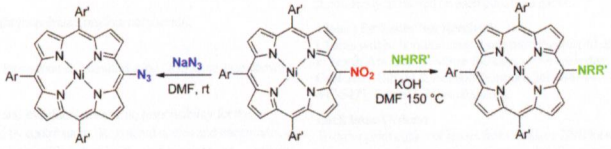


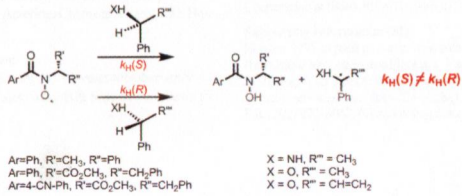




Articles



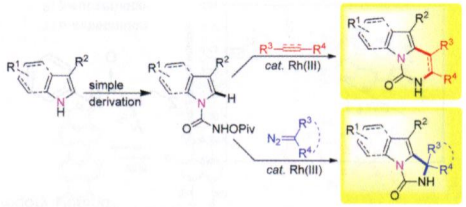




6490 dx.doi.org/10.1021/jo500902n

Rh(III)-Catalyzed C−H Activation/Cyclization of Indoles and Pyrroles: Divergent Synthesis of Heterocycles

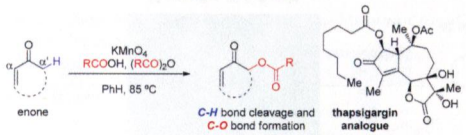
Yan Zhang, Jing Zheng, and Sunliang Cui*



6501 dx.doi.org/10.1021/jo500915r

Acyloxylation of Cyclic Enones: Synthesis of Densely Oxygenated Guaianolides

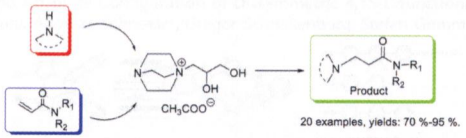
Rubén Marín-Barrios, Ana Leticia García-Cabeza, F. Javier Moreno-Dorado,* Francisco M. Guerra,* and Guillermo M. Massanet



6510 dx.doi.org/10.1021/jo500937a

DABCO-Based Ionic Liquids: Recyclable Catalysts for Aza-Michael Addition of α,β-Unsaturated Amides under Solvent-Free Conditions

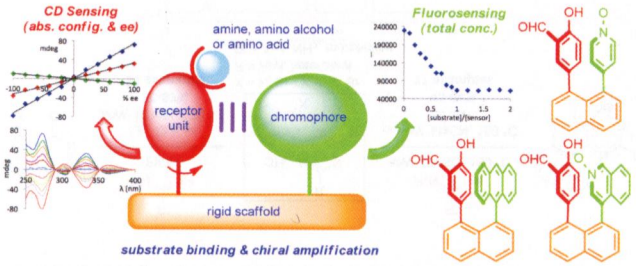
Anguo Ying,* Zhifeng Li, Jianguo Yang, Shuo Liu, Songlin Xu,* Hua Yan, and Chenglin Wu



6517 dx.doi.org/10.1021/jo500959y

Comprehensive Chirality Sensing: Development of Stereodynamic Probes with a Dual (Chir)optical Response

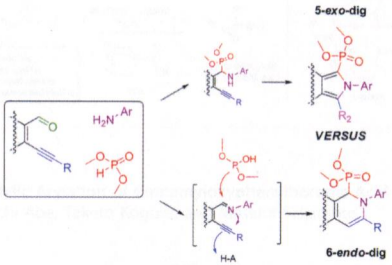
Keith W. Bentley and Christian Wolf*



6532 S dx.doi.org/10.1021/jo501011u

Formation of Condensed 1*H*-Pyrrol-2-ylphosphonates and 1,2-Dihydropyridin-2-ylphosphonates via Kabachnik–Fields Reaction of Acetylenic Aldehydes and Subsequent 5-*exo*-*dig* or 6-*endo*-*dig* Cyclizations

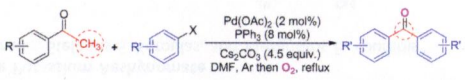
Rita Bukšnaitienė, Aurelija Urbanaitė, and Inga Čikotienė*



6554 S dx.doi.org/10.1021/jo5010185

One-Pot Synthesis of Diarylmethanones through Palladium-Catalyzed Sequential Coupling and Aerobic Oxidation of Aryl Bromides with Acetophenone as a Latent Carbonyl Donor

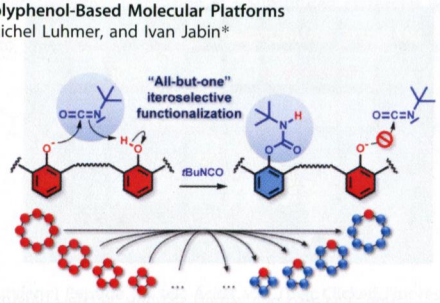
Xing Wang, Fu-Di Liu, Hai-Yang Tu,* and Ai-Dong Zhang*



6563 S dx.doi.org/10.1021/jo501021c

Tailored Functionalization of Polyphenol-Based Molecular Platforms

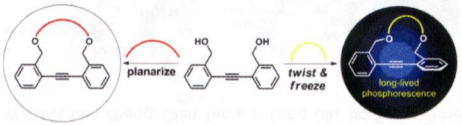
Roy Lavendomme, Axel Leroy, Michel Luhmer, and Ivan Jabin*



6571 S dx.doi.org/10.1021/jo5010235

Bridged Tolanes: A Twisted Tale

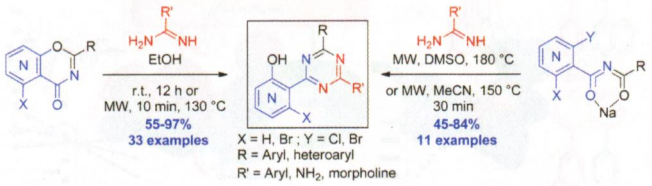
Sebastian Menning, Maximilian Krämer, Andrew Duckworth, Frank Rominger, Andrew Beeby,* Andreas Dreuw,* and Uwe H. F. Bunz*



6579 dx.doi.org/10.1021/jo5010668

Access to Pyridyl-Substituted 1,3,5-Triazines from 4*H*-Pyrido[1,3]oxazin-4-ones via a Cyclocondensation Process

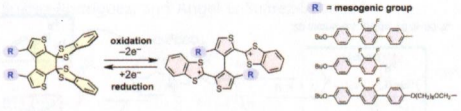
Laetitia Le Falher, Omar Ben Ayad, Ozge Ziyaret, Alexander Mamontov, Candice Botuha,* Serge Thorimbert,* and Franck Slowinski*



6590 dx.doi.org/10.1021/jo501072u

Redox-Driven Molecular Switches Consisting of Bis(benzodithiolyl)bithienyl Scaffold and Mesogenic Moieties: Synthesis and Complexes with Liquid Crystalline Polymer

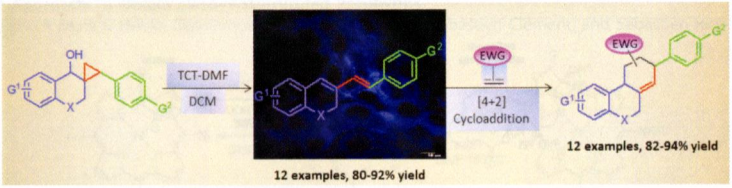
Toshihiro Ohtake,* Hideki Tanaka, Tetsuro Matsumoto, Mutsumi Kimura, and Akira Ohta*



6603 dx.doi.org/10.1021/jo5011125

Substituted 3-*E*-Styryl-2*H*-chromenes and 3-*E*-Styryl-2*H*-thiochromenes: Synthesis, Photophysical Studies, Anticancer Activity, and Exploration to Tricyclic Benzopyran Skeleton

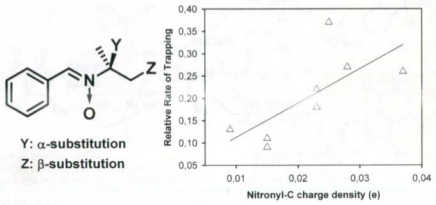
Rimi Roy, Soumyadipta Rakshit, Tanmoy Bhowmik, Sagar Khan, Avishek Ghatak, and Sanjay Bhar*



6615 dx.doi.org/10.1021/jo501121g

Reactivities of Substituted α-Phenyl-*N*-*tert*-butyl Nitrones

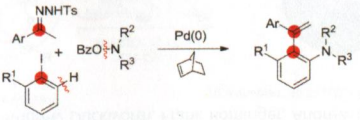
Marie Rosselin, Fanny Choteau, Kamal Zéamari, Kevin M. Nash, Amlan Das, Robert Lauricella, Elisabeth Lojou, Béatrice Tuccio, Frederick A. Villamena,* and Grégory Durand*



6627 dx.doi.org/10.1021/jo501125b

Palladium-Catalyzed/Norbornene-Mediated *ortho*-Amination/*N*-Tosylhydrazone Insertion Reaction: An Approach to the Synthesis of *ortho*-Aminated Vinylarenes

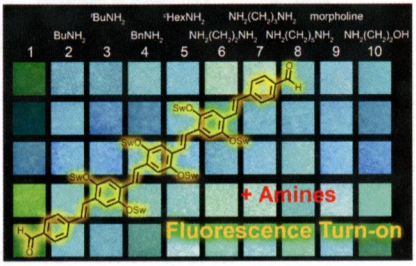
Ping-Xin Zhou, Yu-Ying Ye, Jun-Wei Ma, Lan Zheng, Qian Tang, Yi-Feng Qiu, Bo Song, Zi-Hang Qiu, Peng-Fei Xu,* and Yong-Min Liang*



6634 dx.doi.org/10.1021/jo501129d

Detection of Amines with Extended Distyrylbenzenes by Strip Assays

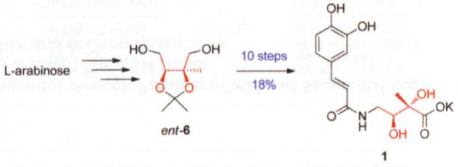
Jan Kumpf, Jan Freudenberg, Katharyn Fletcher, Andreas Dreuw, and Uwe H. F. Bunz*



6646 dx.doi.org/10.1021/jo5011735

Total Synthesis of Enantiopure Potassium Aeshynomate

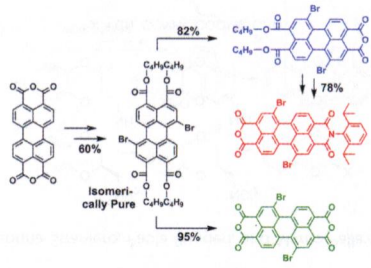
Stergios R. Rizos, John G. Stefanakis, Stefanos S. Kotoulas, and Alexandros E. Koumbis*



6655 dx.doi.org/10.1021/jo501180a

Synthesis of Regioisomerically Pure 1,7-Dibromoperylene-3,4,9,10-tetracarboxylic Acid Derivatives

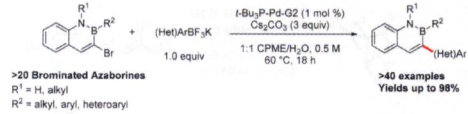
Sanchita Sengupta, Rajeev K. Dubey, Rob W. M. Hoek, Sjoerd P. P. van Eeden, D. Deniz Gunbaş, Ferdinand C. Grozema, Ernst J. R. Sudhölter, and Wolter F. Jager*



6663 dx.doi.org/10.1021/jo5011894

Accessing Molecularly Complex Azaborines: Palladium-Catalyzed Suzuki–Miyaura Cross-Couplings of Brominated 2,1-Borazaronaphthalenes and Potassium Organotrifluoroborates

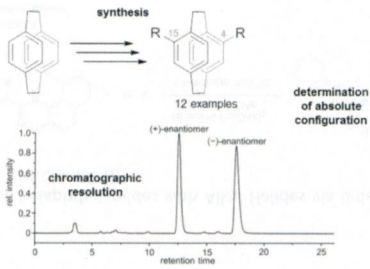
Gary A. Molander* and Steven R. Wisniewski



6679 dx.doi.org/10.1021/jo501212t

Synthesis, Chiral Resolution, and Absolute Configuration of Dissymmetric 4,15-Difunctionalized [2.2]Paracyclophanes

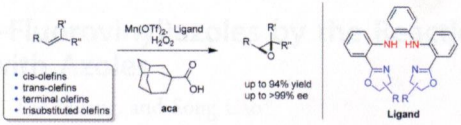
Georg Meyer-Eppler, Rebecca Sure, Andreas Schneider, Gregor Schnakenburg, Stefan Grimme, and Arne Lützen*



6688 dx.doi.org/10.1021/jo501178k

Asymmetric Epoxidation of Olefins with Hydrogen Peroxide by an in Situ-Formed Manganese Complex

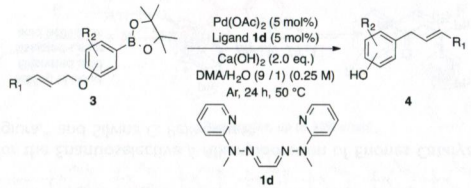
Wen Dai, Sensen Shang, Bo Chen, Guosong Li, Lianyue Wang, Lanhui Ren, and Shuang Gao*



6695 dx.doi.org/10.1021/jo501235w

Hydrazone–Palladium-Catalyzed Allylic Arylation of Cinnamyloxyphenylboronic Acid Pinacol Esters

Kohei Watanabe, Takashi Mino,* Taichi Abe, Taketo Kogure, and Masami Sakamoto

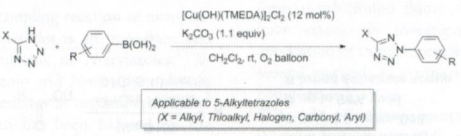


Notes

6703 dx.doi.org/10.1021/jo500862t

[Cu(OH)(TMEDA)]$_2$Cl$_2$-Catalyzed Regioselective 2-Arylation of 5-Substituted Tetrazoles with Boronic Acids under Mild Conditions

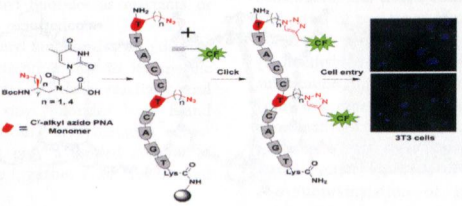
Takuya Onaka,* Hideaki Umemoto, Yasuyoshi Miki, Akira Nakamura, and Tomohiro Maegawa*



6708 dx.doi.org/10.1021/jo500834u

Clickable *C*^{7}-Azido(methylene/butylene) Peptide Nucleic Acids and Their Clicked Fluorescent Derivatives: Synthesis, DNA Hybridization Properties, and Cell Penetration Studies

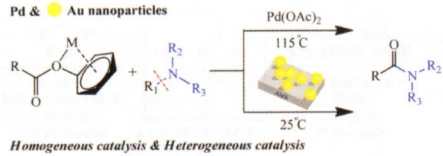
Deepak R. Jain and Krishna N. Ganesh*



6715 dx.doi.org/10.1021/jo500877m

Energy-Efficient Green Catalysis: Supported Gold Nanoparticle-Catalyzed Aminolysis of Esters with Inert Tertiary Amines by C–O and C–N Bond Activations

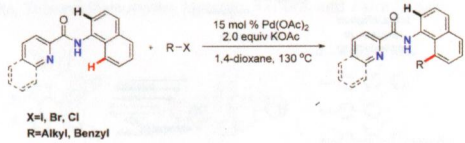
Yong-Sheng Bao,* Menghe Baiyin, Bao Agula, Meilin Jia, and Bao Zhaorigetu*



6720 dx.doi.org/10.1021/jo500932x

Palladium-Catalyzed C8 Alkylation of 1-Naphthylamides with Alkyl Halides via Bidentate-Chelation Assistance

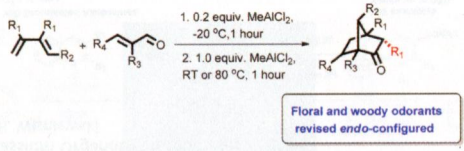
Lehao Huang,* Xudong Sun, Qian Li, and Chenze Qi*



6726 dx.doi.org/10.1021/jo500942a

Sequential Diels–Alder Reaction/Rearrangement Sequence: Synthesis of Functionalized Bicyclo[2.2.1]heptane Derivatives and Revision of Their Relative Configuration

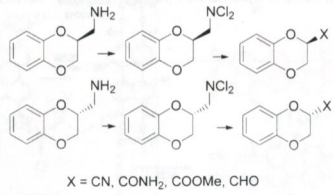
Demin Liang, Yue Zou, Quanrui Wang,* and Andreas Goeke*



6732 dx.doi.org/10.1021/jo500964y

From 2-Aminomethyl-1,4-benzodioxane Enantiomers to Unichiral 2-Cyano- and 2-Carbonyl-Substituted Benzodioxanes via Dichloroamine

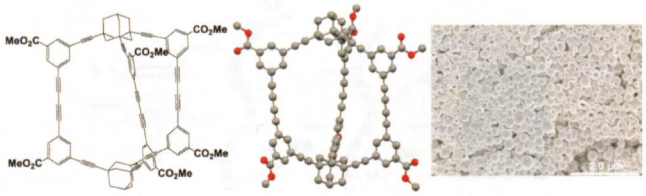
Cristiano Bolchi, Ermanno Valoti, Valentina Straniero, Paola Ruggeri, and Marco Pallavicini*



6738 dx.doi.org/10.1021/jo500989c

Hollow Sphere Formation from a Three-Dimensional Structure Composed of an Adamantane-Based Cage

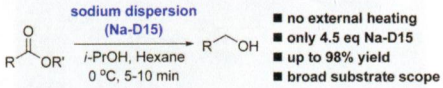
Masahide Tominaga,* Kazuaki Ohara, Kentaro Yamaguchi, and Isao Azumaya*



6743 dx.doi.org/10.1021/jo501093g

Evaluating a Sodium Dispersion Reagent for the Bouveault–Blanc Reduction of Esters

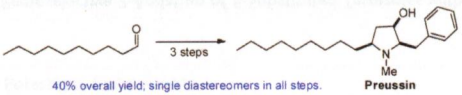
Jie An, D. Neil Work, Craig Kenyon, and David J. Procter*



6748 dx.doi.org/10.1021/jo5011558

Three-Step Synthesis of (±)-Preussin from Decanal

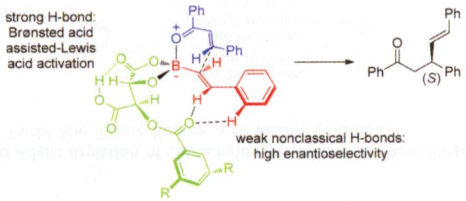
Isac G. Rosset, Rafael M. P. Dias, Vagner D. Pinho, and Antonio C. B. Burtoloso*



6754 dx.doi.org/10.1021/jo5012398

A Hydrogen Bond Rationale for the Enantioselective *β*-Alkenylboration of Enones Catalyzed by *O*-Monoacyltartaric Acids

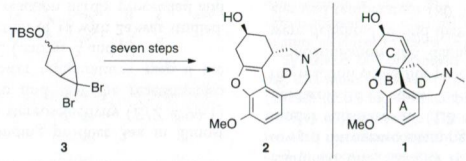
Nicolás Grimblat, Masaharu Sugiura,* and Silvina C. Pellegrinet*



6759 S dx.doi.org/10.1021/jo501255c

Synthesis of a D-Ring Isomer of Galanthamine via a Radical-Based Smiles Rearrangement Reaction

Ping Lan, Colin J. Jackson, Martin G. Banwell,* and Anthony C. Willis



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