Synthesis of Biphenylenes and Their $\pi$-Extended Derivatives

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Synthesis of Biphenylenes and Their $\pi$-Extended Derivatives

[Diagram showing the synthesis of biphenylenes and their $\pi$-extended derivatives.]

Modifying Positional Selectivity in C–H Functionalization Reactions with Nitrogen-Centered Radicals: Generalizable Approaches to 1,6-Hydrogen-Atom Transfer Processes

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[Diagram showing the modification of positional selectivity in C–H functionalization reactions with nitrogen-centered radicals.]

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Lewis Base Catalysis Based on Homoconjugate Addition: Rearrangement of Electron-Deficient Cyclopropanes and Their Derivatives

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Lewis base catalysis
Homoconjugate Addition

Pursuit of C–H Borylation Reactions with Non-Precious Heterobimetallic Catalysts: Hypothesis-Driven Variations on a Design Theme

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Consecutive Ring-Expansion Reactions for the Iterative Assembly of Medium-Sized Rings and Macrocycles

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Iterative Preparation of Platinum Nanoparticles in an Amphiphilic Polymer Matrix: Regulation of Catalytic Activity in Hydrogenation

Regulation of Catalytic Activity of Platinum Nanoparticles by Iterative Preparation

Olefin Hydrogenation

Aromatic Hydrogenation

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Sulfoxide-Directed Iterative Assembly into Oligoarenes

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A New Approach Using Aromatic-Solvent-Induced Shifts in NMR Spectroscopy to Analyze β-Lactams with Various Substitution Patterns

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Synthesis and Biological Activity of 4-(Pyridin-3-yl)-2-hydroxy-4-oxobut-2-enolic Acid Derivatives

A Convenient One-Pot Synthesis of Both Enantiomers of 1,3,5-Trisubstituted Hydantoins

One-Pot, Metal- and Azide-Free Synthesis of 1,2,3-Triazoles from α-Ketoacetics and Amines
Unexpected Aldehyde-Catalyzed Reaction of Imidazole N-Oxides with Ethyl Cyanoacetate

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Efficient Conversion of Epoxides into Carbonates with CO₂ and a Single Organocatalyst: Laboratory and Kilogram-Scale Experiments

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One-Pot Deprotonative Synthesis of Biarylazacyclooctynones

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Transition-Metal-Free Aerobic Oxidative Cross-Coupling of Indoles with Arylidenemalononitriles

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KOH, air
1,4-dioxane, 60 °C, 2 h

- No transition-metal catalyst
- Air as an oxidant
- Mild condition
- High atom economy
- 22 examples
- Up to 82% yield

Up to 82% yield
22 examples
Mild condition
High atom economy
Air as an oxidant
No transition-metal catalyst