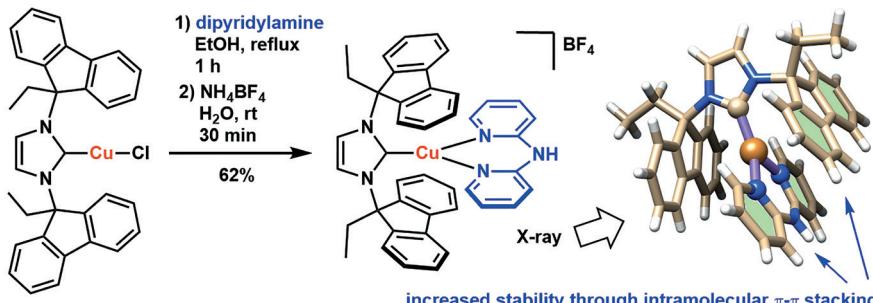


# Synthesis

Reviews and Full Papers in Chemical Synthesis

May 19, 2021 • Vol. 53, 1683–1848



Stereochemical Control of Tricoordinate Copper(I) Complexes Based on *N*-(9-Alkyl-9-fluorenyl)-Substituted Heterocyclic Carbenes

H. Almallah, E. Brenner, D. Matt, C. Gourlaouen, M. Hissler

10

 Thieme

**Synthesis**

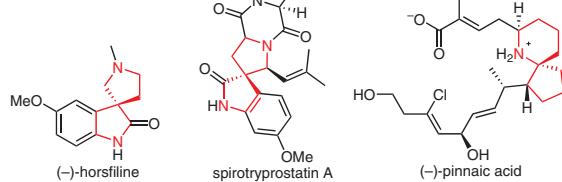
*Synthesis* 2021, 53, 1683–1705  
DOI: 10.1055/a-1379-2312

Synthetic Strategies to Access Heteroatomic Spirocentres Embedded in Natural Products

Review  
1683

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**Synthesis**

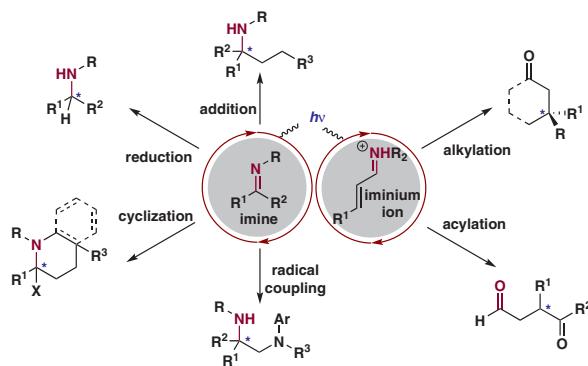
*Synthesis* 2021, 53, 1706–1718  
DOI: 10.1055/a-1343-6541

Enantioselective Radical Functionalization of Imines and Iminium Intermediates via Visible-Light Photoredox Catalysis

Short Review  
1706

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**Synthesis**

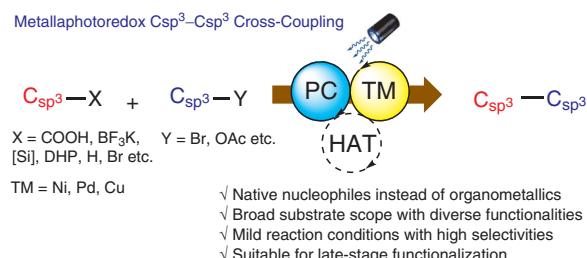
*Synthesis* 2021, 53, 1719–1733  
DOI: 10.1055/a-1344-2434

**Recent Advances in C(sp<sup>3</sup>)–C(sp<sup>3</sup>) Cross-Coupling via Metalla-photoredox Strategies****Short Review**

1719

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**Synthesis**

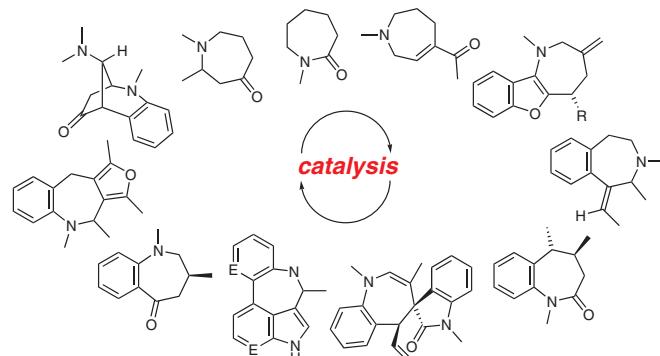
*Synthesis* 2021, 53, 1734–1748  
DOI: 10.1055/s-0040-1705995

**Recent Advances in the Development of Catalytic Methods that Construct Medium-Ring Lactams, Partially Saturated Benzazepines and Their Derivatives****Short Review**

1734

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**Synthesis**

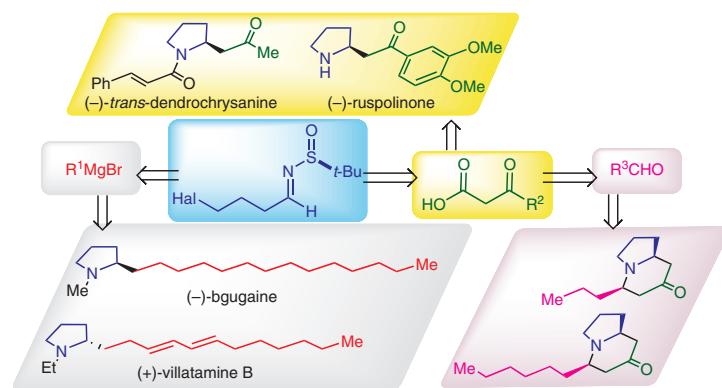
*Synthesis* 2021, 53, 1749–1759  
DOI: 10.1055/s-0037-1610763

**Pyrrolidine and Indolizidine Alkaloids from Chiral N-tert-Butanesulfinyl Imines Derived from 4-Halobutanal****Feature**

1749

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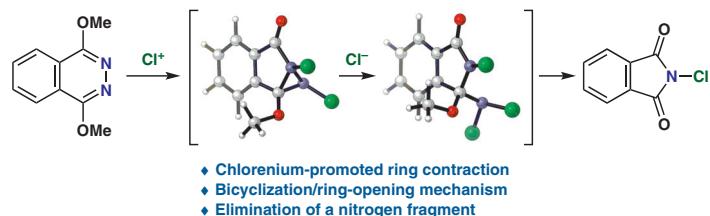
**Synthesis****N-Chlorinative Ring Contraction of 1,4-Dimethoxyphthalazines via a Bicyclization/Ring-Opening Mechanism****Paper**

1760

*Synthesis* 2021, 53, 1760–1770  
DOI: 10.1055/s-0040-1706639

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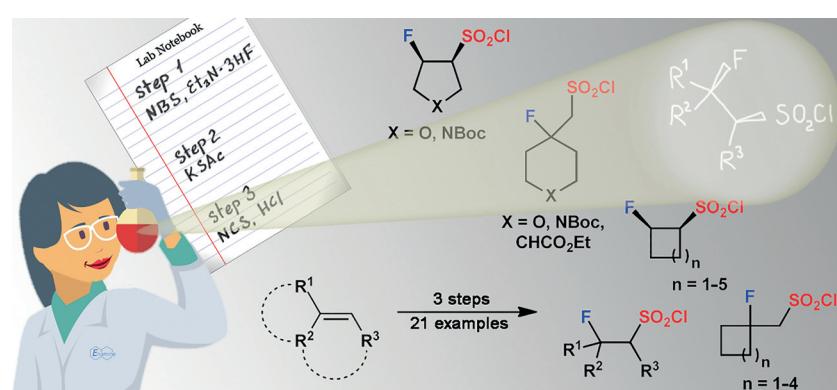
**Synthesis****Synthesis of  $sp^3$ -Enriched  $\beta$ -Fluoro Sulfonyl Chlorides****Paper**

1771

*Synthesis* 2021, 53, 1771–1784  
DOI: 10.1055/s-0040-1706101

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A. Sokolov  
S. Golovach  
K. Melnykov  
A. V. Dobrydnev  
O. O. Grygorenko\*

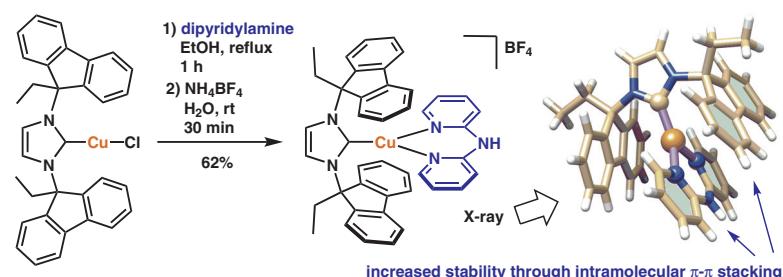
Enamine Ltd., Ukraine  
Taras Shevchenko National University of Kyiv, Ukraine

**Synthesis****Stereochemical Control of Tricoordinate Copper(I) Complexes Based on *N*-(9-Alkyl-9-fluorenyl)-Substituted Heterocyclic Carbenes****Paper**

1785

*Synthesis* 2021, 53, 1785–1794  
DOI: 10.1055/s-0040-1706194

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Synthesis 2021, 53, 1795–1804  
DOI: 10.1055/a-1343-9451

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V. Sokolov

Saint Petersburg State University, Russian Federation

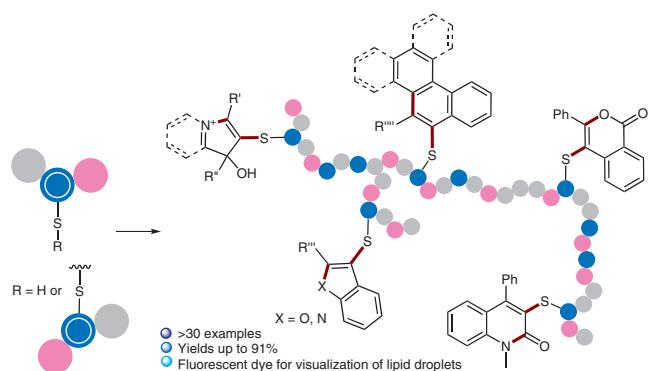


- 31 examples
- up to 98% yield
- diastereoselective
- one-pot
- transition-metal-free
- $S_N$ /Michael addition

Synthesis 2021, 53, 1805–1820  
DOI: 10.1055/a-1343-5607

S. Lapcinska  
P. Arsenyan\*

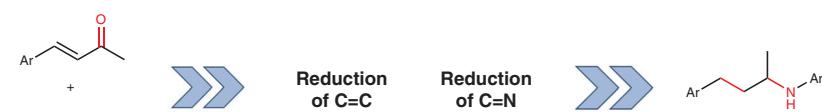
Latvian Institute of Organic Synthesis, Latvia



Synthesis 2021, 53, 1821–1827  
DOI: 10.1055/a-1344-2126

Y. Xia  
L. Ouyang  
J. Liao  
X. Yang  
R. Luo\*

Gannan Medical University,  
P. R. of China



- Reductive C=C and C=N bond in one-step
- Highly chemo-selectivity
- Scal-up to grams
- Wide substrate scope

Synthesis 2021, 53, 1828–1832  
DOI: 10.1055/a-1441-3236

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**M. Seki\***

MA Group, Tokuyama Corporation, Japan

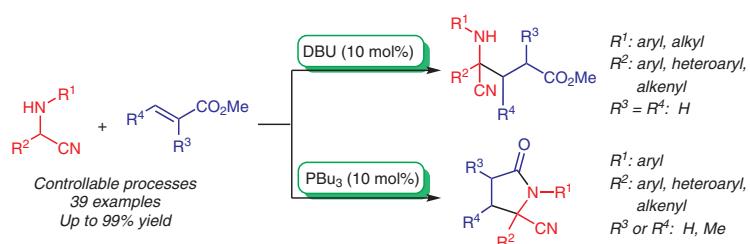


- Regioselective
- Mild conditions
- Ease of operation
- Wide substrate scope
- Use of cheap reagents
- Ecofriendly
- Robust and scalable

Synthesis 2021, 53, 1833–1841  
DOI: 10.1055/a-1337-4684

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**H.-C. Jang**  
**L.-S. Teng**  
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Synthesis 2021, 53, 1842–1848  
DOI: 10.1055/s-0040-1706662

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