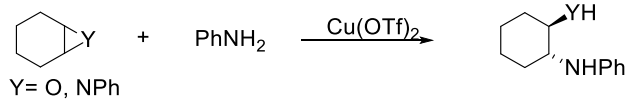
Strem Chemicals, Inc. www.strem.com

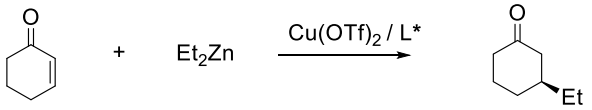
Catalog # 29-5000 Copper(II) trifluoromethanesulfonate, 98% (Copper triflate)

Technical Notes:

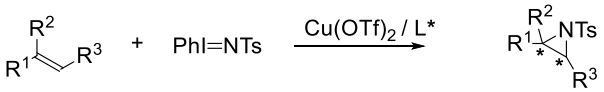
1. Ring-Opening of epoxides and aziridines.
2. Asymmetric conjugate addition of organozinc reagents to α,β-unsaturated ketones.
3. Electrophilic addition of olefins.
4. Asymmetric aziridination of olefins.
5. Asymmetric cycloadditions and aldol condensations.
6. Asymmetric Kharasch oxidation.
7. Asymmetric Michael addition of enamides.
8. Asymmetric O-H or O-R insertion reactions.
9. Enantioselective intramolecular aminooxygenation of alkenes.
10. Enantioselective addition of dialkylzinc reagents to N-acylpyridinium salts.
11. Pd-catalyzed C-H functionalizations of oximes with arylboronic acids.
12. Used as a Lewis acid in the Nazarov cyclization.
13. Catalyst in the diacetoxylation olefins
14. Catalyst in the *meta*-selective direct arylation of α-aryl carbonyl compounds
15. Catalyst in the three-component coupling of amines, aldehydes, and alkynes



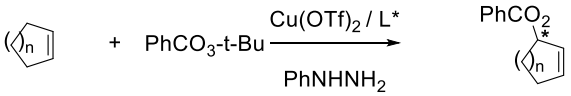
Tech. Note (1)
Ref. (1,2,3)



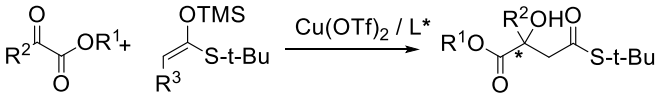
Tech. Note (2)
Ref. (4)



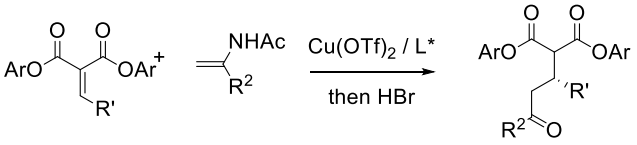
Tech. Note (4)
Ref. (6)



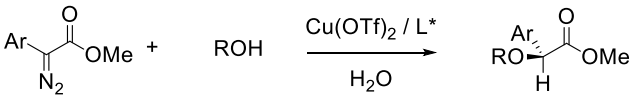
Tech. Note (6)
Ref. (9,10)



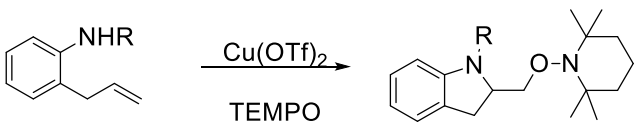
Tech. Note (5)
Ref. (7)



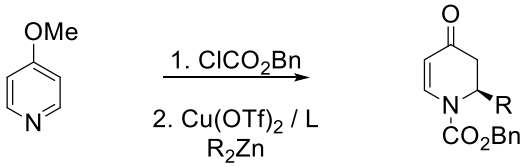
Tech. Note (7)
Ref. (11)



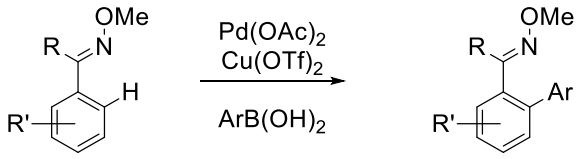
Tech. Note (8)
Ref. (12)



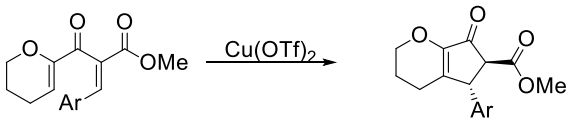
Tech. Note (9)
Ref. (13)



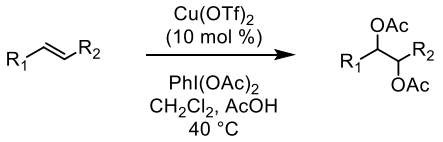
Tech. Note (10)
Ref. (14)



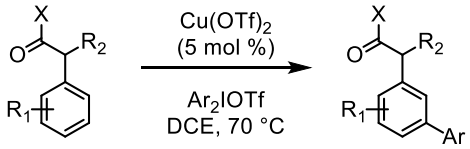
Tech. Note (11)
Ref. (15)



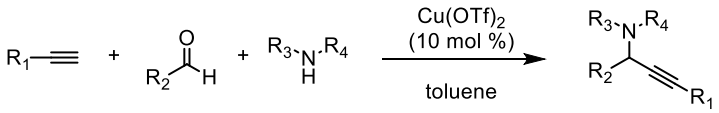
Tech. Note (12)
Ref. (16)



Tech. Note (13)
Ref. (17)



Tech. Note (14)
Ref. (18)



Tech. Note (15)
Ref. (19)

References:

1. *J. Org. Chem*., **1999**, *64*, 287.
2. *J. Org. Chem.,* **1999**, *64*, 2537.
3. *J. Org. Chem*., **1998**, *63*, 4568.
4. (a) *Eur. J. Org. Chem.,* **2002**, 3221. (b) *J. Am. Chem. Soc.,* **2006**, *128*, 8416.
5. *Heterocycles*, **1997**, *45*, 847.
6. *J. Am. Chem. Soc.,* **1993**, *115*, 5328.
7. *Acc. Chem. Res.,* **2000**, *33*, 325.
8. *J. Am. Chem. Soc*., **2001**, *123*, 3830.
9. *Angew. Chem. Int. Ed.,* **2001**, *40*, 3567.
10. *Tetrahedron*, **2002**, *58*, 845.
11. *Angew. Chem. Int. Ed.,* **2007**, *46*, 7803.
12. *J. Am. Chem. Soc.,* **2006**, *128*, 4594.
13. *J. Am. Chem. Soc.,* **2008**, *130*, 17638.
14. *Angew. Chem. Int. Ed.,* **2009**, *48*, 9339.
15. *Org. Lett.,* **2010**, *12*, 184.
16. *J. Am. Chem. Soc.,* **2008**, *130*, 1003.
17. *Org. Lett.*, **2010**, *12*, 1412.
18. *Angew. Chem. Int. Ed.*, **2011**, *50*, 463.
19. *Org. Lett.*, **2012**, *14*, 964.