

SYNTHESIS

Editorial

Special Issue on Organocatalysis

Or-ga-no-ca-ta-ly-sis... a fifteen-letter, seven-syllable word that seamlessly rolls off the tip of the tongue; the euphonious term is certainly more appealing than any segmented descriptor such as the cacophonous “organic catalysis”. Not more than two decades ago, any discussion of organic molecules as catalysts would have included *N,N*-dimethylaminopyridine (DMAP), triphenylphosphine (Ph_3P), thiamine, and cyanide as prominent players in a number of transformations. Proline and a variety of alkaloids, for example cinchonine/cinchonidine derivatives, and polyoleucine would be added to any listing of asymmetric catalysis for reactions such as aldol, enolate alkylation, asymmetric protonation, and epoxidation. The closing decade of the 20th century witnessed asymmetric versions of DMAP and Ph_3P along with the rise of chiral amines. But it is the first decade of the current century that has been referred to as the Golden Age of organocatalysis.* Indeed one cannot help but marvel at the great strides that the discipline has made. Consequently, *Synthesis* has chosen to dedicate a Special Issue to the fascinating work in this area. This collection of papers highlights the expansive nature of the discipline, which continues to grow in capabilities. It is an area that can boast of its many accomplishments, and, importantly, it is an area with bountiful possibilities. We hope that the collection found in this Special Issue will serve to inspire its practitioners and propel the field forward.

* As a curious aside, this same decade could be referred to as the age of Au for altogether different reasons, and it should be noted that in Greek mythology the Golden Age is followed in sequence by silver, bronze (primarily Cu), and iron.

Erick M. Carreira
ETH Zürich, Switzerland
May 2011

