



Applications of Hydrolases in Medicinal Chemistry

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Message from the Guest Editors

The prestigious status of hydrolases mainly stems from their irreplaceable role in chirality inducement, operational stability under non-physiological conditions, and commercial availability. Hydrolase-based biotransformations have shown to be superior in C–O functional group chemistry of chiral secondary alcohols and respective esters. Enzymes of this type are also prone to catalyze both the transformation of a wide spectrum of unnatural substrates as well as reactions. The so-called “enzyme promiscuity” of hydrolases experimentally proven in various types of condensations, multicomponent reactions, and many other processes showed that these enzymes are also valuable biocatalysts in C–C/C–heteroatom bond formations. All the unique features make it so that these biocatalysts are applied in the synthesis of high-added-value compounds with controlled stereochemical properties.

We highly encourage authors to submit manuscripts reporting on chemoenzymatic methods for the synthesis of novel compounds of defined biological activities, pharmacologically important chiral building blocks, generic active pharmaceutical ingredients of known drugs.

