

Abstract

A novel methodology of construction of 6,7-disubstituted 7-deazapurines by serial of orthogonal cross-coupling reactions was developed. The Liebeskind-Srogl reaction was optimized and the reactivity of a few boronic acids was explored. Library of 3×3 disubstituted analogues of deazapurines was synthesized utilizing this method.

In the second part of this work, the scope of direct alkylation of purine derivatives was verified.

Keywords

purine, 7-deazapurine, orthogonal cross-coupling reactions, C-H activations