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## 论文

### 官能化二硫缩烯酮的选择性 $\alpha$ -溴代反应

巴哈尔古丽·别克吐尔逊<sup>1,2</sup>, 王芒<sup>1</sup>, 韩锋<sup>1</sup>, 刘群<sup>1</sup>

1. 东北师范大学化学学院, 长春 130024;
2. 伊犁师范学院化学系, 伊犁 835000

摘要:

发展了一种适用范围广、高效且高选择性的官能化二硫缩烯酮的 $\alpha$ -溴代反应. 在少量水存在下, 在四氢呋喃溶液中, 以溴化铜为溴代试剂, 经由官能化二硫缩烯酮(1)的 $\alpha$ -溴代反应制备了结构多样的 $\alpha$ -溴代二硫缩烯酮(2).

关键词: 官能化二硫缩烯酮; 溴化铜;  $\alpha$ -溴代反应

### Selective $\alpha$ -Bromination of Functionalized Ketene Dithioacetals

BEKTURHUM Bahargul<sup>1,2</sup>, WANG Mang<sup>1\*</sup>, HAN Feng<sup>1</sup>, LIU Qun<sup>1</sup>

1. Faculty of Chemistry, Northeast Normal University, Changchun 130024, China;
2. Department of Chemistry, Yili Normal University, Yili 835000, China

Abstract:

Functionalized ketene dithioacetals are important intermediates in organic synthesis.  $\alpha$ -Functiona-lization reactions based on them provide potential precursors for the construction of usefully carbo- and heterocyclic compounds. In this paper, a versatile  $\alpha$ -bromination of functionalized ketene dithioacetals was developed. In the presence of H<sub>2</sub>O, the reactions of functionalized ketene dithioacetals(1) with CuBr<sub>2</sub> in THF at room temperature gave various  $\alpha$ -bromo ketene dithioacetals(2) in excellent yields with high regioselectivities. The mechanism of this  $\alpha$ -bromination is proposed to undergo an addition of bromine formed *in situ* to compound 1 and sequential elimination of the  $\alpha$ -proton. The simplicity of execution, mild conditions, inexpensive, easily usable brominating agent and high yields, make this synthetic method attractive for practical applications.

Keywords: Functionalized ketene dithioacetal; Cupric bromide;  $\alpha$ -Bromination

收稿日期 2009-05-12 修回日期 网络版发布日期

DOI:

基金项目:

国家自然科学基金(批准号: 20872015)和东北师范大学分析测试基金(2009)资助.

通讯作者: 王芒, 女, 博士, 副教授, 主要从事有机合成研究. E-mail: wangm452@nenu.edu.cn

作者简介:

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