

第 24 回 昆虫学格致セミナー

日時:2016 年 10 月 7 日(金) 午後 13 時 30 分～15 時 30 分

場所:京都大学農学部 4 階 W406 号室

タイトル: Cooperation and Conflict in a Tropical Insect Society

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Ropalidia marginata is a tropical primitively eusocial wasp widely distributed in peninsular India. My research group has long been studying the social biology of this fascinating species. Among the many remarkable features that we have uncovered, perhaps the most intriguing is the fine balance between cooperation and conflict that the wasps manage to achieve. They exhibit extreme conflict when they encounter wasps from other colonies. Within their own colony however they show extreme cooperation despite apparently great potential for conflict. Our expectation of the potential for conflict comes on the one hand, from high reproductive skew despite relatively low intra-colony genetic relatedness and on the other hand from our ability to uncover hidden conflict by experimental manipulation. Our inference of extreme cooperation is based on the observation of pre-designated reproductive queues which are implemented without overt conflict upon the loss of the queen. In this talk I will describe some of these experiments and discuss their implications for the evolution of social life.