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## **Rodent Management – Session 1**

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### **Integration of the landscape of fear of rodents in EBRM methodologies**

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Present pest management methods are mostly reactive and have huge disadvantages such as emerging genetic rodenticide resistance with serious threat for relay toxicity. Rodent control should be based on pest-species ecology and ethology to facilitate development of ecologically-based rodent management (EBRM). A main aspect of EBRM is the advanced knowledge of both the ecology and behaviour of the targeted rodent pest species. A tool to assist knowledge on the spatiotemporal behaviour of rodents, is the landscape of fear. The landscape of fear (LOF) indicates levels of anxiety that a prey species perceives at several sites within its territory and embodies the areal variation in scavenging cost as result of predation risk. In practice, the LOF enables to predict where traps or bait are most expected to come across and used by rodents by mapping habitat use as a result of perceived fear. A major opportunity for rodent control strategies would be to incorporate the LOF of pest species in EBRM methodologies. By focussing on those areas where rodents regard the smallest amount of predation risk, rodent pest management could become more effective.

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# Julius-Kühn-Archiv

Jens Jacob, Jana Eccard (Editors)

6<sup>th</sup> International Conference of Rodent  
Biology and Management  
and  
16<sup>th</sup> Rodens et Spatium

Potsdam, Germany, 3-7 September 2018

Book of Abstracts



Julius Kühn-Institut  
Bundesforschungsinstitut für Kulturpflanzen

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