

The Evolution of Linguistic Structure: where learning, culture and biology meet

Simon Kirby
(University of Edinburgh)

Tuesday 5th April 2016, 11 - 12.30
Room 1.001 Roscoe Building, University of Manchester

ALL WELCOME

Abstract

Language is striking in its systematic structure at all levels of description. By exhibiting combinatoriality and compositionality, each utterance in a language does not stand alone, but rather exhibits a network of dependencies on the other utterances in that language. Where does this structure come from? Why is language systematic, and where else might we expect to find this kind of systematicity in nature?

In this talk, I will propose a simple hypothesis that systematic structure is the inevitable result of a suite of behaviours being transmitted by iterated learning. Iterated learning is a mechanism of cultural evolution in which behaviours persist by being learned through observation of that behaviour in another individual who acquired it in the same way. I will survey a wide range of lab studies of iterated learning, in which the cultural evolution of sets of behaviours is experimentally recreated. These studies include everything from artificial language learning tasks and sign language experiments, to more abstract behaviours like sequence learning, and have recently even been extended to other species. I will conclude by suggesting that these cultural evolution experiments provide clear predictions about where we should expect to see structure in behaviour, and what form that structure might take.

Directions

Roscoe building is on Brunswick Street, building 53 on the [Campus Map](#).

Further information

For further information about this seminar, please contact michaeline.k.glover@manchester.ac.uk
or about LuCiD, please contact helen.allwood@manchester.ac.uk