

Meaning in Communication Games

Andreas Blume

Abstract :

This paper addresses two related questions: How can we model the strategic use of a pre-existing language? And, how should we capture different degrees of sharing that language? The paper proposes an iterative procedure, interpreted as a mental process on part of the sender, that associates a set of equilibria, which we dub language equilibria, with every combination of a sender-receiver game and a pre-existing language. Every sender-receiver game has a language equilibrium. Language equilibrium makes sharp predictions about equilibrium outcomes (taken to be joint distributions over types and actions) in common-interest games, in games with sender-ideal equilibria, and in games with partial incentive alignment. Predictions are sensitive to the degree to which language is shared. Importantly, language equilibrium makes predictions about language use, i.e., joint distributions over types, actions, and messages.