

TITLE: Full beliefs, partial beliefs and mistakes in games

Abstract: Both quantitative and qualitative notions of belief play an important role in epistemic game theory. This is most evident when one looks at the various epistemic characterizations of backward and forward induction. In the first part of my talk, I will discuss these results highlighting the relationship with work in formal epistemology on bridge principles relating an agent's full and partial beliefs. In the second part of my talk, I will report on ongoing work with Aleks Knoks. Forward and backward induction can be understood as two different styles of reasoning that guide a player's choices in a game situation. This raises an interesting question about what drives a player to adopt a particular style of reasoning in a game situation. Building on an epistemic model of game proposed by Robert Stalnaker, I will sketch an answer to this question.