

Keynote Talk

Games, Algorithms, and the Internet

Prof Christos H. Papadimitriou

Abstract

The advent of the Internet brought parallel paradigm shifts to both Economics and Computer Science. Computer scientists realized that large-scale performing systems can emerge from the interaction of selfish agents and that incentives are a quintessential part of a good system design. And economists saw that the default platforms of economic transactions are computational and interconnected. Algorithmic Game Theory is a subdiscipline that emerged from this turmoil, revisiting some of the most important problems in Economics and Game Theory from a computational and network perspective. This talk will survey some of the major themes, results and challenges in this field.

Bio

Christos H. Papadimitriou is C. Lester Hogan Professor of Computer Science at UC Berkeley. Before joining Berkeley in 1996 he taught at Harvard, MIT, Athens Polytechnic, Stanford, and UCSD. He has written five textbooks and many articles on algorithms and complexity, and their applications to optimization, databases, AI, economics, evolution, and the Internet. He holds a PhD from Princeton, and honorary doctorates from ETH (Zurich), the Universities of Macedonia (Thessaloniki), Athens, Cyprus, and Patras. He is a member of the National Academy of Sciences, the American Academy of Arts and Sciences and of the National Academy of Engineering, and a fellow of the ACM. His second novel "Logicomix" has been translated in over 20 languages.