

## **Abstract**

In many settings the input arrives over time and an algorithm must make its current decisions without a precise knowledge of the future. Traditionally, these problems have been studied using mostly disjoint approaches such as competitive analysis, regret minimization and under stochastic assumptions. But in recent years, several interesting connections have emerged, often based on methods from optimization and duality. In this talk, we will outline some of these developments as well as some future research directions.