

# Scalable Targeting

Sanjog Misra

Chicago Booth

## **Abstract**

The targeting of messages, products and prices to individual consumers has been a longstanding goal of marketing. With the advances in computation, the increased availability of data and the willingness of firms to adopt an experimental paradigm this goal has come closer to being realized. In this talk I examine the interplay between marketing, economics, machine learning and causal inference in the context of the targeting of marketing activity. In particular, I will focus on one ongoing project that seeks to optimize the real-time targeting of prices at a large online firm. The project involves the construction of experiments to collect appropriate data, the use of economic models coupled with machine learning to estimate demand with high dimensional data and the computation and implementation of targeted prices. In addition, I will also discuss some work on conducting inference on such high dimensional objects and some other related projects.