

Causal Inference, Uncertainty, and Health Policy Decision Making

Sharon-Lise Normand, Harvard Medical School

Hospital quality assessments are ubiquitous in the U.S. Such assessments are used for licensure, maintenance, and some for modification of hospital payments. For instance, in 2017 the U.S. federal government withheld \$528 million from 2597 hospitals as part of the hospital readmissions reduction program. This talk will describe the key statistical challenges in determining whether a hospital has higher than “expected outcomes” including defining the “treatment”, determining the counterfactual outcome, characterizing the role of unmeasured confounders, and accounting for sparsity and uncertainty.