decision science
SDS CMU
What is Decision Science?

• Behavioral and analytical approaches to understanding decision making
• Understand and improve human decision making
• Based in Psychology + integrates Economics, Philosophy, Statistics, & Management Science
Decision Science Overview

• Unique major – no other university has it.
• Housed within the Dept. of Social & Decision Sciences
• Curriculum includes:
  • Psychology (3), economics (1), quantitative methods (4)
  • Behavioral econ & policy/management electives
  • Opportunities for research engagement
DS Approach

Understand and improve decision making of individuals, groups, and organizations

**a) normative analysis:** creating formal models of choice;

**b) descriptive research:** studying how cognitive, emotional, social, and institutional factors affect judgment and choice, and

**c) prescriptive interventions:** seeking to improve judgment and decision making.
Application Areas

• Medical Decision Making
  • non-compliance with medication; vaccine hesitancy

• Legal Decision Making
  • reducing the effects of hindsight bias on attributions of responsibility for accidents

• Risk Management
  • communicating the risks of climate change so people actually understand them

• Marketing
  • why consumers buy what isn’t good for them

• Business
  • conflicts of interest and what not to do about them
Faculty Research

Stephen Broomell
Mathematical models of information use; expertise, risk communication, climate change

Julie Downs
Social influence, teenage girls’ decision about sex & contraception, subtle factors in food choice

Danny Oppenheimer
Use of conflicting or irrelevant information; charitable giving, chocolate
Training for careers in

• Consulting
  • Booz Allen Hamilton, Accenture, LG Telecom, Thorogood

• Business
  • BNY Mellon, IBM, Fiat Chrysler, Haystagg, IBM, Pitney Bowes, J.P. Morgan Chase, Altus Group

• Healthcare sector
  • UPMC, Capital Blue Cross

• Government
  • US Dept. of Defense

• Non-profit
  • AmeriCorps, Change Corps, Teach for America, Camp Kesem
Preparation for graduate programs in

- Law
- Security Risk Management
- Health Care Policy & Management
- Survey Methodology
- Psychology
- Behavioral Decision Research
- Business
- Public Policy
Come talk to us

• Faculty Director
  • Professor Gretchen Chapman
  • Porter Hall 219F
  • ds-advisor@andrew.cmu.edu

• Academic Advisors
  • Connie Angermeier (Last names G-Z)
  • Lizzy Stoyle (Last names A-F)
  • Office: Porter Hall 208A and 208G
  • cla2@andrew.cmu.edu
  • estoyle@andrew.cmu.edu