Agricultural Statistics and its Role in Next-Generation Research

NACTA Conference, Purdue University
June 28-July 1, 2017
To respond to the challenges of the modern day, agricultural research requires both knowledge of the hard sciences as well as a strong background in data analysis.

Motivation
• Design of Experiments
  • Cost-effectiveness
  • Maximum information

• Data Analysis
  • Can incorporate more complex techniques
  • Research questions vs. content questions

• Implementation and Application

The Role of the Statistician
Agricultural Statistics at UIW
• USDA/NIFA Grant
  • *Strengthening the Agricultural Statistics Pipeline at Hispanic-Serving Institutions*
• Concentration in Agricultural Statistics
• Speaker Series
• E-cube Laboratory

Agricultural Statistics at UIW
• Fusion courses
  • Hurricane climatology
  • Community ecology
  • Sampling techniques in forestry
  • Water conservation/ ecology

• Team-taught across disciplines
  • Biology
  • Meteorology
  • Nutrition

Concentration in Agricultural Statistics
Research-based presentations from professionals
• Brings conference-level presentations to students
• Exposes students to current real-world research in the field
• Networking opportunity
• E³ (E-cube) Lab
  • Education
  • Engagement
  • Employability
• Incorporates professional statisticians to work with students
• Real-world experience working in a professional group
• Hands-on experience with real data

E³ Statistical Consulting Lab
• Agricultural and natural resources for climate variability
• Food and feed safety
• Water for agriculture

USDA/NIFA Priority Needs
Thank You

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