Group D:
Measuring Involvement at CMU

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Agenda

- Purpose of Study
- Questionnaire
- Sample method
- Sample selection
- Future advice
- Current work
  - Glitches and successes
- Future work

Purpose

- CMU is not known for its school spirit
- Understand how groups form on campus:
  - Unify the student body
  - Improve attendance at school events
    - CMU sports teams, clubs, and the Tartan Rewards Program are potential clients
  - Benefit incoming classes of students and attract more students to Carnegie Mellon

Questionnaire

- Paper and Pencil survey
- Anonymous
- Question Topics:
  - Demographics
  - Involvement Score Variable
  - Predictor Variables

Question Topic Examples

- Demographics
  - Age, Gender, Home School
- Involvement score variable questions
  - Number of Organizations, Level of Involvement within Organizations
- Predictor variables
  - Amount of time spent on work outside classes, specific activities they're participants of

Sample Method

- Carnegie Mellon undergraduate students are the target population
- Sampling frame is all undergraduate classes at Carnegie Mellon currently taught in Spring 2011
- Random clustered sample
- Random number generator to select undergraduate classes to sample
- Sampled all students in each selected class

Sample Selection

We approximated an 85% response rate.

N (Population)= 5,705 (figure provided in lecture)
Standard Deviation (SD)= .5 (worst case)
Margin of Error (ME)= .05

Sample size for SRS with replacement :
n_0= 384.2= 385

But since we're conducting SRS without replacement:
n≥ 360.6= 361

We inflated the sample size by 20% because we are doing clustered sampling:
n= 361*1.2= 433.2

Given our 85% response rate, our sample n is:
n= 433.2/0.85= 509.6= 510

Future Advice

- Consider the Pros and Cons of clustered vs. stratified sampling
- When randomly selecting classes from the Carnegie Mellon Schedule of Classes be sure to omit Graduate level classes
- Determine the average class size
- Remind Professors you are coming beforehand
- Bring enough surveys

Current Work

- Selected classes to sample
- Emailed Professors
- Visited seven of the eighteen to twenty classes
- Have classes set up to survey next week
- Set up method for coding the data into a spreadsheet

Glitches

- Getting Professors' permission
- Interpretation of questions
- Non-response rate is based on:
  - Professors' refusal to let us survey
  - Student refusal to take or complete survey
- Sending follow up emails to reduce non-response rate

Successes

- Already surveyed over 100 students
- Low non-response rate within classes
- Minimum misunderstanding of survey

Future Work

- Continue surveying
- End date: April 1st or when we reach number of respondents needed for our sample
- Data input
- Analyze data and interpret results
  - Model “involvement score” based on variables
  - Identify trends within the data

Questions