

W241 Final Project Check In

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Treatment Design

Outcome Measures

- Primary outcome measure: survey response rate = # of completed surveys / # of surveys sent out to each treatment group
 - Binary outcome measured for each person: 1 = completed survey, 0 = did not complete survey
 - Our measured treatment effect is ITT: Intended-to-Treat treatment effect because some emails may go unseen, resulting in non-compliance.
- Additional outcome measures
 - Survey completion time
 - Free form response length

Treatment Description

- Control group: Sent an email with a link to a MIDS opinion survey. For this group there will be no incentive guarantee or lottery mentioned in the email.
- Treatment 1 group: Sent an email with a \$5 incentive guarantee to complete the same MIDS opinion survey
- Treatment 2 group: Sent an email with a \$100 lottery incentive to complete the same MIDS opinion survey
 - Will not disclose odds in the email, but will need to mention in results analysis.

Email

- We will create 3 email lists using the 'contacts' functionality in gmail (Control, Treatment 1 & Treatment 2). This allows us to systematically add a group of emails to one email message without members knowing they're part of the group. We will send the emails with the contacts list in the BCC section so that recipients of the email are unaware of who else is receiving the email.
- Reminder emails - will be sent X weeks/days after the original email was sent. This reminder will go to both treatment and control participants which have not yet filled out the survey.

Outline for Treatment 1 group

Outline for Treatment 2 group

Treatment Group 1

Response Requested: \$5 Guaranteed to Complete Course Time Requirement Survey



Hi fellow MIDS student,

To help better inform MIDS students on which classes they should take, we're launching a survey for you to provide perspective on the time requirement that certain program classes take. Individual feedback will remain anonymous. However, aggregated data will be made available to current students looking for class selection guidance. To show our gratitude, upon completion of the survey, a \$5 Amazon gift card will be sent to your Berkeley email address provided on the survey. Please follow this link [here](#) to complete. Thanks!

Best,

Outline for Control group

Control Group

Response Requested: Complete MIDS Course Time Requirement Survey



Hi fellow MIDS student,

To help better inform MIDS students on which classes they should take, we're launching a survey for you to provide perspective on the time requirement that certain program classes take. Individual feedback will remain anonymous. However, aggregated data will be made available to current students looking for class selection guidance. Please follow this link [here](#) to complete. Thanks!

Best,

Treatment Group 2

Response Requested: \$100 Lottery Chance to Complete Course Time Survey



Hi fellow MIDS student,

To help better inform MIDS students on which classes they should take, we're launching a survey for you to provide perspective on the time requirement that certain program classes take. Individual feedback will remain anonymous. However, aggregated data will be made available to current students looking for class selection guidance. To show our gratitude, upon completion of the survey, you will be entered into a lottery with the chance to win a \$100 Amazon gift card. Please follow this link [here](#) to complete. Thanks!

Best,

Survey

- We will use Google forms as the survey mechanism and require that respondents use their email address to (1) identify who the participant is that is responding and (2) ensure that we don't have one participant take the survey many times.
- We're planning to record the length of time from when the survey was sent out to when it was completed.
- For the content of the survey, we wanted to try to ask something MIDS-related that students would feel compelled to comment on. We landed on asking for information on the time requirement for different courses. With this topic, we're able to keep the survey short enough to allow for completion. The outline of the survey will be as follows:
 - (Short answer) Please enter your Berkeley student email address
 - Required for completion
 - (Multiple choice) Select which MIDS classes you have completed or are in the process of completing:
 - (Ordering) Of these classes, order them from least to most time required per week:
 - (Long Answer) For the classes that took the most time, what requirement was the most time consuming (i.e. homework, asynchronous material, etc.)?

Experiment Design

Sample Description

- Size: Number of individuals in each group (n) is being determined based on power calculation using a simulation. Assuming a response rate of 5% for participants not being

offered a monetary incentive, and at least a ~16% response rate for participants being offered a guaranteed \$5 incentive for answering the survey, our power calculation indicates that groups of 100 will provide ~75% power, and groups of 120 will provide ~80% power. Thus, our proposal is to have groups of 120 (N = 120: 24 people from each channel per experiment group randomly selected - channels listed below), with a total experiment size of 320 participants. Each MIDS slack channel will have 72 members emailed.

- Make-Up: Students from the following Berkeley MIDS slack channels...

# mids-summer-2020	79
# mids-fall-2020	124
# mids-spring-2021-cohort	152
# mids-summer-2021-cohort	129
# mids-fall-2021-cohort	93

- Recruiting from different cohorts let's us distinguish between students based on how new they are to MIDs. Newer students may have less workload and more open-mindedness when it comes to answering MIDS surveys.
- Collect the following from slack for each person:

Full Name	Email Address	In PST Timezone ? (1/0)	In Summer_2020 ? (1/0)	In Fall_2020? (1/0)	In Spring_2021? (1/0)	In Summer_2021? (1/0)	In Fall_2021 ? (1/0)
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- Do not collect for team members.
- Get rid of possible duplicates
- Randomized blocking on each cohort channel used:
 - An idea for block RI: decide how many people in C, T1, T2. Let's say 120 people each. Draw from all 5 channels above. Randomize the list of emails from above per channel once. Across all emails from each of 5 channels: 1st obs goes to C, 2nds goes to T1, 3rd goes to T2. This is 1 observation in control, treatment 1, treatment 2. Keep doing 1,2,3 until you get 120 observations in control, treatment 1, treatment 2. This means 24 people from each channel are in a group (120 people per group/5 groups). Since 3 groups $23 \times 3 = 72$ observations needed per channel (randomized).

Measurement Design

- In using additional outcome measures, survey completion time and free form response length, we may encounter an attrition problem. Both of these variables would be measured for the subset of control, treatment 1, and treatment 2 participants who answered the survey. If we are intending to extend our study to one of these outcomes, we must read more into attrition here:
https://alexandercoppock.com/coppock_2019b.html

- Due to possible non-compliance, individuals not seeing our email, we will have to report our ATEs as ITTs. We will not be able to distinguish if someone saw the email but did not open it or if they did not see it at all.
- We will block students based on their progress through the MIDS program (identified by which cohort they belong to). This is described in the sample section showing the various Slack channels.
- Open questions for Micah on how to report the reminder emails :
 - If we give all groups the same chance for a reminder email, can we keep the analysis as control vs treat 1 vs treat 2? All participants across the study will receive a reminder at the same time, if they have not submitted a survey.
 - If the analysis is not the same, then it is not preferable to have reminders from an analysis and power perspective?
 - Having to analyze the participants who answered surveys before a reminder separately could reduce the number of observations in groups by adding an extra group for pre-reminder. Could this impact power?