



# Facilitating Student Connections and Study Partners During Periods of Remote and Online Learning

We outline an early-semester social activity designed to engage students with course material at an early point in the semester, but also to foster social and academic connections. Social engagement among students has been shown to have a positive impact on learning and the move to remote and online teaching has placed students in an environment lacking social opportunities. We provide formal and informal feedback of the events as well as extensions for additional social events that could be completed throughout the semester.

**Jadrian Wooten<sup>†</sup> Wayne Geerling<sup>‡</sup> Nicola Thomas<sup>‡</sup>**

<sup>†</sup>The Pennsylvania State University <sup>‡</sup>Monash University

## 1. Introduction

During COVID-19, classes around the world and across levels have moved from resident to either online or a hybrid model. With a significant increase in the number of students learning remotely, a growing challenge facing educators is student engagement. Even though a lot of classes are transitioning to online platforms, they may not actually be classified as a traditional online course. Some classes have transitioned to a remote learning environment where students attend class as though it were in person, but they do so through a video conferencing program. Online classes are often structured asynchronously and require students to be self-motivated. Remote classes often require synchronous participation on the part of the student. Engaging students who are taking classes remotely or online had previously been a serious concern typically reserved for online educators (Meyer 2014) and online students (Martin and Bollinger 2018), but major changes in the delivery of classes have drawn the attention of educators tasked with teaching in this new environment.

We outline an early-semester social event conducted for online and remote students in the Fall 2020 semester at Monash University and Penn State University. This event was facilitated by teaching assistants assigned to the courses and was conducted during the first two weeks of the semester in an effort to connect students with one another for social and academic purposes. Modeled after news stories of people participating in online speed dating during the lockdown period, students were randomly assigned to a series of different breakout rooms in small groups and provided icebreaker activities to complete.<sup>1</sup>

Below, we first connect the idea of a welcome event with the literature on the importance of establishing a community and forming social networks on engagement and learning. We then provide resources for setting up the event and an overall summary of the events conducted through Zoom. We also provide a summary of student evaluations from a post-event survey, discuss the limitations of the programs we encountered, and provide possible extensions of the event. We believe this paper provides a manual for instructors in search of innovative ways to increase student engagement at the start of a term, whether taught in the interim online or for the foreseeable future.

## 2. Literature Review

Students taking courses online or remotely may be isolated from other students. Unless the course is taught synchronously, the course may be completed entirely without real-time exchange or collaboration with peers. The videos, text, and assignments in an online course are not enough to help students learn; they need the presence of peers (Darby and Lang 2019).

Whether the social event in question focuses on only connecting individuals in the class or facilitates the formation of study groups, the deliberate act of bringing students together can improve the learning of course material. In their seminal work on looking at the effectiveness of online learning, Garrison, Anderson, and Archer (1999) based the effectiveness of a student's educational experience on the presence of three core areas: cognitive presence, social presence, and teaching presence. We believe an early-semester social event helps facilitate the social presence element critical to the learning process, but which can be the most difficult to implement (Darby and Lang 2019). Improving the social cohesion of a classroom may also help improve active learning assignments that are completed in a synchronous classroom environment.

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<sup>1</sup>Articles appeared in popular magazines like Essence (<https://www.essence.com/love/relationships/meet-your-match-online-speed-dating-stacie-jae/>) and Texas Monthly (<https://www.texasmonthly.com/the-culture/single-people-zoom-speed-dating-pandemic/>)

Social events, as we have described henceforth, go beyond simply satisfying a need for social interaction. They can also be used to encourage learning that would not happen in isolation. If instructors frame the event as an opportunity to connect with other students and form study groups, educators may find these efforts result in increased learning. While students are able to learn things on their own, they are able to learn more deeply because of our human need to communicate with others (Eyler 2018). The importance of social interaction extends beyond the potential for deeper learning and also allows students to be more actively engaged with the material and the learning process. There does not appear to be one particular social activity that increases engagement more than another, but Dixson (2010) found in a survey of online learners that the ability to participate in a variety of opportunities were associated with a higher level of engagement. In addition to instructor-student interaction throughout the course, multiple communication options related to student-student interaction were strongly correlated with higher levels of student engagement.

The most common way faculty attempt to improve the social cohesion of a classroom is through the use of online discussion boards, but they too may suffer from the asynchronicity problem. Discussion boards often allow students to participate during such a wide range of time that students may log on to post questions in a discussion forum, but they may not receive responses for multiple hours or even days. If students are setting aside blocks of time to work on the course, their blocks may not line up with others in the class. This can make assignments, especially ones that require class interactions, less cohesive. Darby and Lang (2019) suggest that a small change to the way discussion boards are structured can improve the social cohesion of the class. Their recommendation includes having students record a video introduction rather than a traditional text-based post. The social event we have outlined below can be thought of as a modification of this approach by making the interactions video-based and synchronous. Even if a course is being taught asynchronously, this event could provide a “real-time” student-student interaction element that is missing in other classes.

### **3. Event Set-up**

One of the goals of the welcome event was to increase student connections and encourage the formation of study groups or study buddies at the start of the semester so that students would have additional resources over the entire semester. In order to achieve that goal, both events were conducted during the second week of the semester, after the regular enrollment period. All contact with students was done using the course management system, with a short email sent to students explaining the purpose of the event along with a registration form via a Google Survey. Copies of the email and registration form are included in the Appendix.

Because this was a social event, rather than an academic event, we felt that it needed to be held at a time that minimized potential conflicts with other classes. For this reason, we selected an evening time that would allow students to relax after a full day before joining another online event. Depending on the intended goal of the program (general connections or study groups), an instructor may want to consult students to find a time that does not interfere with other popular activities or holidays. For example, some universities provide “welcome week” entertainment during the first couple of weeks, even when classes are conducted online. In semester-based courses, the end of the second week of Fall classes may coincide with Labor Day weekend, which often involves travel home.

Google Surveys can be configured to automatically record email addresses of students who register online, which provides a spreadsheet of email addresses that can be used to send links to the Zoom meeting location. Given the increased incidence of Zoom bombings, particularly with public events, instructors should share the link with students shortly before

the event, set a meeting passcode, turn off the annotation feature, and adjust other key settings to prevent potential disruptions.<sup>2</sup>

The event facilitator should likely be comfortable with Google Surveys and needs to be savvy enough to handle Zoom and breakout rooms. If an instructor is not comfortable hosting a social event or does not feel confident in facilitating Zoom breakout sessions, a teaching assistant may be a capable replacement. Even if the teaching assistant hosts the entire event, we recommend that the instructor appear at the start of the event, even if for only a few minutes, to formally welcome and thank the students for participating.

#### 4. Social Event Summary

The social event was open to students enrolled in our introductory microeconomics courses during the Fall 2020 semester. Across the two universities, 297 students registered for the event and 170 students attended the event. In total, 1,850 students received the initial email inviting them to participate in the event.<sup>3</sup> For instructors teaching smaller classes, it is important to ensure that a minimum of 10-15 students participate in the event in order to ensure that the use of multiple shuffled breakout rooms is warranted; otherwise, the instructor may prefer to just connect the small subset of students in a single meeting.

After a formal introduction, students were told the evening would proceed similar to a speed dating event, where they would be participating in a series of breakout sessions with different icebreaker questions for each iteration. A list of the ice breaker questions is included in the Appendix.<sup>4</sup> In one event, students participated in two 15-minute breakout sessions, while in the other they participated in three 10-minute sessions. Before sending students to breakout rooms, students were provided the following message in the chat section of Zoom:

*“Enjoy meeting new friends in the breakout room. Please remember to turn your cameras and microphones on, and share your student email address in the breakout room chat area (NOT the main zoom chat zone!!) Your breakout room group might like to organise a regular chat time or study session together online using Zoom / social media.*

Using the breakout room feature in Zoom, students are randomly assigned different rooms with 5-6 students in each room. Using the broadcast feature to send messages to all rooms, the facilitator provided three of the icebreaker questions listed in the Appendix for the first round of introductions. The facilitator used the broadcast feature to remind students that time was winding down before recalling students to the main Zoom room. Students were encouraged to exchange contact details with other students while in the breakout rooms. The facilitator remains in the main Zoom channel while breakout rooms are in progress. Some students were unable to join a group or requested a different group and were reassigned by the facilitator to a different room.

Once time had expired, the facilitator recalled students from the breakout room to the main Zoom channel. Students returned to the main room excited to share their icebreaker activity responses. The process was repeated a second and third time using new questions from

<sup>2</sup>Taylor Lorenz provides some examples in this New York Times article: <https://www.nytimes.com/2020/04/07/style/zoom-security-tips.html>.

<sup>3</sup>226 students registered for the event at Monash and 71 students registered at Penn State. 147 students attended the event at Monash and 23 students attended the event at Penn State. There were 1,050 students enrolled in principles courses at Monash and 800 students enrolled at Penn State. We discuss below why participation at Penn State was likely lower relative to the Monash event.

<sup>4</sup>As part of the registration process, students could be asked to submit an icebreaker question to be used at the event.

the icebreaker questions listed in the Appendix. During subsequent sessions, the facilitator reassigned the breakout rooms, so students could meet new people. This is part of the reason for the necessity of a minimum number of students.

At the conclusion of the event, students used the private chat feature to exchange social media contacts with each other. Students quickly requested other participants add them on popular social media platforms like Facebook, Snapchat, and GroupMe. Based on student feedback, students demonstrated greater engagement and participated more freely in the ad hoc group discussion after the second breakout room session. Students also reached out to the faculty members directly and requested additional social events to be held later in the semester.

It is important to ensure a sufficient size for each breakout room in case an assigned participant does not join the room or needs to step away. Some breakout rooms had only two students join, but were then reassigned to other rooms by the facilitator. Groups of four to six participants are more likely to be successful than smaller groups of only two or three. Students strongly preferred engaging using social media, particularly Facebook and Snapchat. A large contingent requested a course Facebook group but was instead encouraged to set it up themselves. The facilitator reminded students of the importance of respect and not to misuse the space for other purposes.

All students who had signed up for the event, not just those who attended, were sent a post-event survey to solicit feedback to use for future events. The questions associated with that survey have been included in the Appendix. It is important to remind students at the end of the event that a survey would be sent out the following day. The results of this follow-up survey are discussed below.

## **5. Study Buddies Program Summary**

The original intention of the social event was to facilitate a study buddies program that would connect students with other students interested in forming study groups. If students were not able to find a study buddy during the event, they could request to be assigned to a study group after the event through a Google Survey. During the event we discovered that students preferred study groups with four to six people instead of in pairs, thus transforming the study buddy program into a study buddies program.

In order to mitigate the risk of students potentially profiling others in the acceptance of a random partnership, the study buddies program relied on a Google Survey that collected student email addresses, which used a combination of the first few letters of both the students' first and last name as well as four digits. This allowed students to appear semi-anonymous and accept or reject any potential study buddy they were allocated. While this method doesn't eliminate the ability for some students to look up their classmates online, it does marginally increase the cost of doing so. Because the program is voluntary, there is no requirement that students must study with other students and some students may still take the time to only select study partners based on their identities.

Post-event survey results were entered into a spreadsheet and sorted by the students' email addresses. Based on the number of respondents, and with the understanding that students preferred groups of four, students were assigned to groups in alternating order until the group size was met. Students were sorted into groups only if they responded that they were definitely (or maybe) interested in participating in the study buddies program. Any student who was not interested in forming a study group was not assigned to a group.

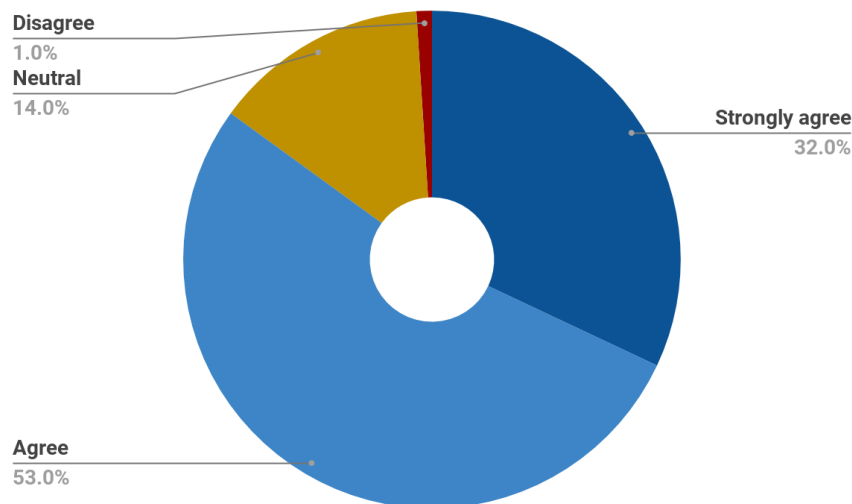
After students were assigned to a group, student emails were copied into an email template for each group. Emails were sent to each group introducing them to one another and noting that they were included because they had responded that they wanted to be part of the group. If there are a small number of groups, this could be done manually, but could also be done through the mail merge feature of Microsoft Word.

## 6. Student Feedback

Below, we include a variety of formal and informal feedback following the conclusion of the events. Formal feedback is solicited in the form of a brief follow-up survey sent the day after the events' conclusion. Surveys were sent to all students who registered for the event (and not just those who attended) because we wanted to provide the opportunity to connect students who wanted to connect and participate in the study buddies program but could not attend the live event. In total, there was a 48.5% response rate across the two universities.<sup>5</sup>

The main purpose of these events was to increase engagement with the course by facilitating social connections. We do not measure whether students who attended are actually more engaged, but instead, measure their perceived engagement in the course. Future work in this area could formalize the impact of these events. Respondents were asked whether they agreed that they were more engaged with the course material using a Likert scale. Of the students who said that they had attended the social event, 85% of participants (strongly) agreed that they perceived themselves more engaged with the course after the event. Figure 1 shows a breakdown of responses from participants who indicated they had attended the event.

**Figure 1: Responses from students on whether they felt more engaged with the subject (n=100)**

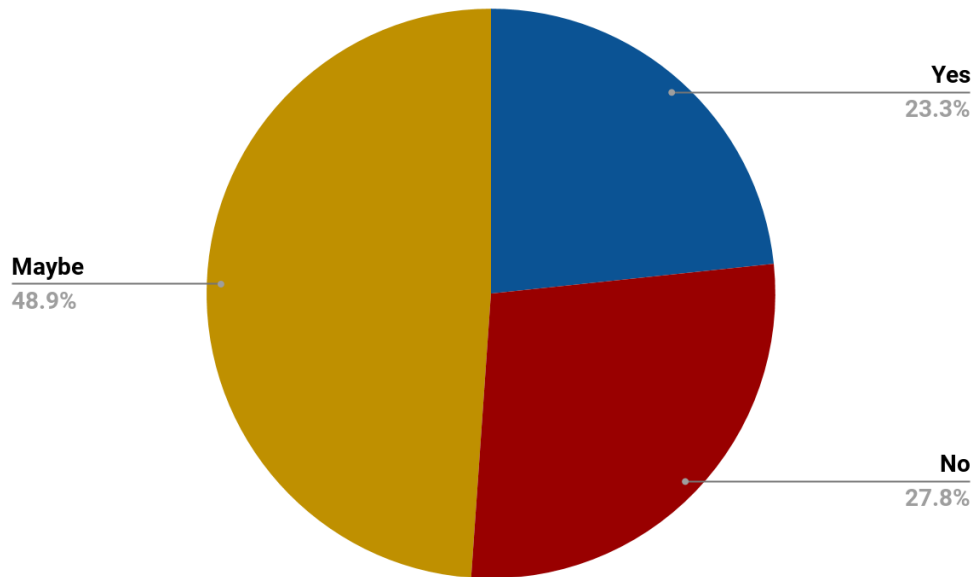


In the Monash University program, participants were able to request a randomly

<sup>5</sup>For Monash University, 135 students responded out of the 226 students who registered (59.7% response rate). For Penn State University, 9 students responded out of the 71 students who registered for the event (12.6% response rate).

assigned study partner if they were unable to connect with a study partner during the social event. Monash survey respondents were asked if they found a study buddy during the event, but only a small set of students felt they had connected with someone well enough to consider them a study partner. Given the large fraction of participants who responded “maybe,” we are inclined to believe that students were not sure if they would be study buddies since the survey was sent so soon after the event and they likely had not started thinking about studying for the exam. Figure 2 shows the breakdown of Monash respondents who indicated they had attended the event and were asked whether they had connected with another student and found a study buddy during the event.

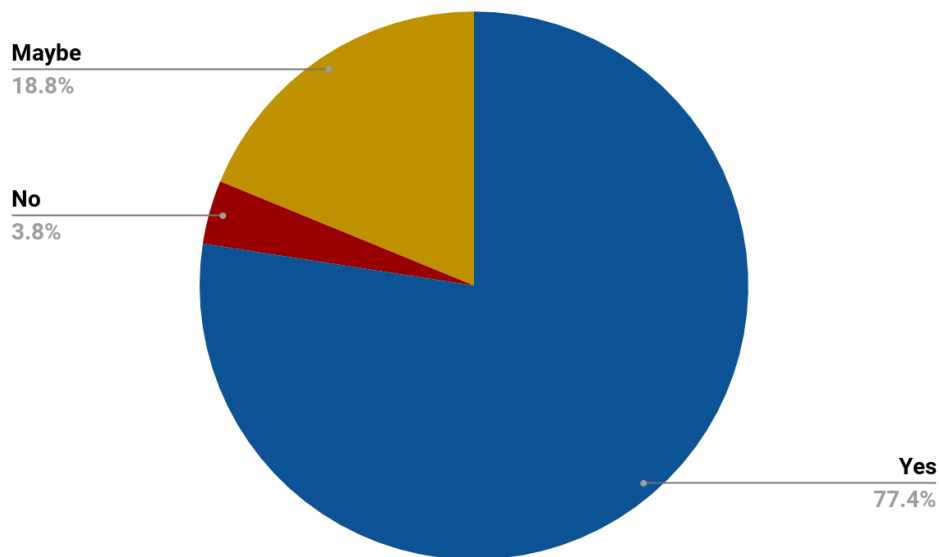
**Figure 2: Responses from students on whether they believed they had found a study buddy during the live event (n=90)**



Since these students indicated an early interest in potentially forming study buddies, the follow-up survey asked students whether they would like to be randomly assigned a study buddy. This option was available to all students who signed up for the first session, regardless of whether they actually attended the session or not. Figure 3 shows the responses from all Monash students who originally signed up for the event on whether they had continued interest in forming study partnerships, even if they may have found a study partner during the social event.



**Figure 3: Responses from students on whether they would be interested in being randomly assigned a study buddy (n=133)**



#### A. Informal Feedback

Students reached out to the instructors personally after the event with unsolicited feedback regarding the program. Additionally, the events were facilitated by teaching assistants, who provided their feedback after the conclusion of the program. Some of the early feedback from the Monash University event influenced the design of the program at Penn State University. For example, the Penn State program had one additional breakout session, and each break out session was shorter than the Monash program. This was done because Monash students had mentioned wanting to connect with more people.

While the Penn State program was not designed as a study buddies program, there were some minor issues identified in the follow-up survey at Monash. The original Google survey sent to participants asked only for their email addresses, and not their preferred names. This made the random connection process more difficult because students were hesitant to reach out to other students if they didn't know their name.

Students also contacted the facilitators and faculty members to request additional social events later in the semester. We provide some alternative activities that could be done later in the semester and that could potentially be more directly related to course content rather than focused on forming study groups or meeting other classmates. Some students in the Penn State group specifically requested to be matched with other students for studying purposes even though the formation of study groups was not the intention of that social event and was not mentioned in the survey.

Facilitators of the events reported students were generally enthusiastic about the event and seemed thankful the event was being conducted. In a debriefing session after the Penn State event, facilitators asked to host additional events later in the semester and volunteered to arrange them again. The facilitators, which were graduate and undergraduate students, also seemed in need of social interaction and support beyond their classroom environments. The



social event outlined above was also conducted as part of an undergraduate assistant training meeting and was met with positive feedback among the students.

## 7. Limitations

One of the potential factors that limited the impact of the event on students at Penn State was that while they were enrolled in a remote synchronous course, a large portion of the students were still living in residence halls on campus. Because a significant number of students were living on campus, it is possible many of them felt they did not need a social event in order to meet other students in the class or to find study partners for the upcoming term. In an informal survey during class, approximately 80% of all students enrolled in the Penn State principles course indicated they were living in university dorms or off-campus in the surrounding area.

This was not a limitation in the Monash event because all students were taking the course online and were not located on campus. This program is likely to work well in situations where students are physically disconnected from others and are not able to easily communicate with each other in traditional means. It is unlikely that a social event like we have conducted would be as successful in a course that is taught entirely face-to-face for example.

The randomization of Zoom breakout rooms results in groupings of students that did not take into account particular student characteristics such as gender, race, socioeconomic status, or family background. It is possible that students were placed in groups where they felt uncomfortable communicating with the other students and were thus unlikely to exchange contact information or take up an offer of forming a study group. This situation is difficult to overcome because of the design of Zoom breakout rooms. Instructors can pre-assign breakout rooms if an instructor wants to collect demographic information on students before the event, but an instructor can only predefine one set of groups before the event. The first iteration could include the pre-assigned groups so that students possibly feel more comfortable with similar people in the first round, and then randomly assigned groups can be used for second and third rounds. Pre-assigned breakout rooms cannot be shuffled once the event starts.

## 8. Extensions

Building on Dixson's (2010) findings that a mix of social events leads to higher engagement with the course, we provide suggestions for extensions of social events that can be facilitated by a faculty member or teaching assistant in the course. Some of the extensions below build on classroom activities that we have completed in class but could be adapted to an online synchronous session, or they are activities that have emerged since the wide-scale switch to remote learning in March 2020. The events below could be conducted throughout the semester or strategically placed when stress and social isolation may be especially troubling. The Texas Computer Education Association also provides suggestions for educators wanting to transition popular games like Pictionary or Scattergories online.<sup>6</sup> The extent to which the events could incorporate economic material is limited only by the ability of the instructor to include material from their courses.

### A. Online Trivia Contest

Kahoot! is a game-based learning platform that is similar to trivia competitions held in pubs around the world, but was designed for use in an educational setting. Participants earn points by answering questions correctly using their mobile devices while the game is facilitated by an individual. The score earned in each round depends on the speed with which

<sup>6</sup>Descriptions of the adjustments for each game can be found online at <https://blog.tcea.org/zoom-games/>.

a respondent correctly answers the questions, but depending on the settings, participants can also earn points for answering multiple questions correctly in a row. Facilitators can design their own Kahoot! game with questions related to current events or class topics, or they could make use of publicly available Kahoot! games on the platform such as those created by other educators (Wooten et al. 2020).

#### B. Netflix/Hulu party

If a particular documentary or television show is available on a streaming platform like Netflix or Hulu, new features allow viewers to watch the same show simultaneously.<sup>7</sup> In order to conduct a watch party, all participants must have paid access to the streaming service and, if a Netflix Party is being conducted, must have the plug-in installed beforehand. Once set up, all participants have access to a chat box that allows them to interact with each other during the showing.

The facilitator controls the playback feature and has the ability to stop and start the show at their discretion. Strategic pauses could be placed in the show so that students can answer questions in a Google survey or through a quiz placed on the learning management system. This method would be an online replication of the work by Wooten (2020). While the content of Netflix and Hulu changes periodically, instructors may be able to access films directly related to economics or endorsed by economic educators (Mateer, O’Roark, and Holder 2016).

#### C. Zoom Poll Questions

While the icebreaker questions listed below are intended to be open-ended questions that students discuss, many video conferencing programs allow facilitators to ask poll questions of the participants. These questions could be changed to multiple-choice questions and presented to the entire class as a way of bringing the social event back to the class session. If the facilitator solicits popular answers from the social event, they could be the basis of the answer choices in the polls. To help increase engagement, consider adding an “other” option in the answers and encourage students to share their answers in the chat room if you have that feature enabled.

#### D. Formal Study Buddy Program

The study buddy event conducted at Monash University was intended to be a one-time opportunity to connect students at an early juncture in the term in the hope of improving their exam performance. Because the event was not intended as a research project, no approval was sought beforehand through the institutional review board. In line with Dixson (2010), a formal study buddies program could be administered at the start of a semester to test the impact on learning outcomes following the formation of such a program.

## 9. Conclusion

The social event, by most measures, was successful at two different universities experiencing different realities of remote teaching. At Monash, students were not living in close proximity to others and thus had limited access to forming study groups with other students. At Penn State, a larger proportion of students were actually living on campus in university dorms at the start of the semester and had opportunities to meet other students, which likely caused the low participation rate among Penn State students. Despite the different intentions of each social event, both resulted in relatively positive feelings about the event from faculty,

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<sup>7</sup>Netflix Party is available as a third-party Google Chrome Plugin (<https://www.netflixparty.com/>) and Hulu Watch Party is available in the Hulu online player (<https://help.hulu.com/s/article/watch-party>).

facilitators, and students across the two universities.

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## Appendix

The material presented below was adapted to suit the design of the social event at each school. The Monash event was focused on developing study buddies for students to use throughout the semester while the Penn State event was geared towards a general social event to connect students.

### A. Initial email to students

We would like to run a social event via Zoom on DATE AND TIME HERE to give students an opportunity to meet and connect with each other. No coursework material will be covered during this session. This is purely a social event to help students connect, given we are learning online and you cannot connect on campus.<sup>8</sup> We will form breakout rooms where you will have icebreaker activities and the opportunity to meet other students in the class.

For the event to run, we will need a minimum of 10 participants to sign up by completing this form [link to Google Survey]. If fewer than 10 participants register, we will still connect those students who wish to connect by sharing their email address with other students who signed up, but the social event won't run.

### B. Questions included in the registration form

The following questions were added to a Google form so that follow-up emails would be sent only to participating students instead of the entire class. For the Penn State version, we omitted the reference to study buddies and focused only on whether students were interested in meeting other students.

1. What is your student email address?
2. Do you want to connect with fellow microeconomics students (find a study buddy)?
3. Are you happy for us to share your student email address with other students also interested in finding study buddies?
4. Would you like to participate in a Zoom Meet & Greet event on **DATE & TIME HERE**.

### C. Icebreaker questions

The following questions were used in our events, however, there are numerous examples available online. Be cautious when considering questions posed to students so that they do not evolve into situations that could make others feel uncomfortable. For example, "Two truths and a lie" is a popular icebreaker among students, however, it has the potential to lead to awkward and uncomfortable situations where students lie about sexual encounters.

1. In what town or city were you born?
2. What is your favorite food?
3. Share a lockdown sanity saver or study tip.
4. If you were a Harry Potter character which one would you be and why?

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<sup>8</sup>Because the Penn State program did have students on campus during the remote period, this line was modified to note that some students may not be able to connect as easily as others.

5. What other subjects are you taking this semester?
6. When we are not in lockdown, what do you like to do on weekends?
7. What is your favorite late-night snack to eat?
8. What would you consider your guilty pleasure television show or movie?
9. What city would you travel to if money and time were no object?

#### D. Post Event Survey

The following questions were added to a Google form and sent to all students who had originally signed up for the event. Google surveys allow creators to create section breaks such that if a respondent answered a question in a particular way, they would be redirected in the survey. In the survey below, if students marked that they did not attend the event (question 1), they were not shown questions 2, 3, or 4 and instead were redirected to question 5.

1. Did you attend the Zoom Meet and Greet last night?
2. After attending the Zoom Meet and Greet, I feel more engaged with the subject.  
Options: strongly agree, agree, neutral, disagree, strongly disagree
3. Did you find a study buddy during the session?  
Options: Yes, no, and maybe
4. If you did find a study buddy, what mediums have you used to connect?  
Options: Facebook, student email address, private email address, Instagram, Snapchat, cell phone, other
5. If you have not yet found a study buddy, are you interested in being randomly assigned a study buddy?  
Options: Yes, no, and maybe