

Experiment 1 Instructions and Protocol

Person A's and Person B's were in the same room and roles were assigned based on seat numbers and subjects were seated randomly. Each subject's role was constant through the session. There was no communication between subjects and each subject was paid in private at the end of the study. Each session was conducted by two experimenters. Instructions were read aloud by one of the experimenters, while participants followed the instructions on their screens. The other experimenter controlled the Z-Tree console and made payments.

General Instructions Welcome! Please wait for the experimenter to proceed. The study will take 60 minutes in total. You will be paid \$5 for participating. You can earn up to \$24.50 in addition as a result of your accuracy, your choices and the choices of others participating in this session. The study has 4 parts. Each part is independent of one another; your decisions in one part will have no bearing on your decisions or earnings in other parts. You may get additional earnings from each part. At the end of the study, all earnings across the parts will be added to the \$5 participation fee. All your choices and answers will remain anonymous and confidential during and after the study. I will present instructions at the beginning of each part. Please pay close attention to these instructions. Your earnings will depend on your understanding. I will move from one part to the next when everyone is done working on a given part. So please be patient and wait for instructions when you are done with answering questions in a given part. This also means that there is no reason to rush, since you cannot finish the study earlier even if you rushed. This is a silent study, which means you are not allowed to make noises or remarks. Only raise your hand if you encounter a technical difficulty. At this point, please enter your seat number. [This number ranges from 1-20 and is used by the program to assign Person A and Person B roles to subjects, and to create random pairings between Person A and Person B's in the room.] This number is displayed in front of you on a white sticker at the left top corner of the divider. When you are done, please click OK to proceed. [page break]

Part 1 Instructions In Part 1 of the study, you will participate in six two-person decision problems. You will either participate as Person A or Person B, based on your seat number. Your role will be displayed on a page after the instructions. Each two-person decision problem will ask Person A's to determine a payment for themselves and a payment for a Person B in this room, who will be randomly and anonymously paired with Person A for that question. For these questions, Person B has no choice to make.

A question of this type looks like this:

Person A, please choose between the following two options:

Option 1: \$5 for me, \$2 for Person B Option 2: \$4 for me, \$4 for Person B.

Your choice will determine your earnings, as well as those of Person B's from Part 1.

As you can see from comparison between Options 1 and 2 in the example above, Person A can increase the earnings of a fellow participant by a larger amount than he/she gives up to do so. In other words, the total earnings to both parties is larger in Option 2, but the payment to the Person A is larger in Option 1 than in Option 2. Person A's choice determines his/her own earnings as well as that of another participant in the role of Person B. [page break]

Person A's will make decisions in the following 6 questions.

Part 1, Q1. Option 1. \$4.50 for Person A, \$1.50 for Person B. Option 2. \$4.00 for Person A, \$4.00 for Person B

Part 1, Q2. Option 1. \$2.50 for Person A, \$0 for Person B. Option 2. \$2.00 for Person A, \$1.50 for Person B

Part 1, Q3. Option 1. \$4.00 for Person A, \$1.00 for Person B Option 2. \$3.00 for Person A, \$2.00 for Person B

Part 1, Q4. Option 1. \$5.00 for Person A, \$2.00 for Person B Option 2. \$4.00 for Person A, \$4.00 for Person B

Part 1, Q5. Option 1. \$1.00 for Person A, \$4.00 for Person B Option 2. \$0.50 for Person A, \$6.50 for Person B

Part 1, Q6. Option 1. \$2.00 for Person A, \$3.00 for Person B Option 2. \$1.50 for Person A, \$5.50 for Person B

Note that the questions differ in the payments across Option 1 and Option 2 for Person A and Person B. Therefore, each question presents a different tradeoff. Each Person A may have different preferences regarding the options in each question. Everyone's choices and identities will remain anonymous and confidential during and after the study.

At the end of the study, only one question will be selected from Part 1. This selection is done randomly by the program and each question has the same chance of being selected. Therefore, you can treat each question as if it were the only question being asked in Part 1. The program will pair each Person A randomly with one Person B for the selected question. Person A's will get what they chose for themselves. Person B will get what Person A chose to give to Person B. Payments from Part 1 will be distributed confidentially at the end of the study. Person A's will not know which Person B they were matched with, and vice versa. You will be informed whether you are Person A or Person B in the next page. Person A's will make decisions while Person B's wait. Person A's, please do not rush in your decisions and consider each question carefully. I will wait for everyone to complete this part before I proceed to Part 2.

[In the following page, Person A's are presented Part 1 Q1-Q6 as shown above and asked to make choices. Person B's wait. When Person A's are done making choices, the program advances to Part 2. Neither Person A's nor Person B's see the question chosen from Part 1, or their earnings, until the end of the study.]

Part 2 Instructions I now proceed to Part 2. In this part, all participants will be asked to predict Person A's choices in Part 1. Your earnings will depend on the accuracy of your predictions. At the end of Part 1, the program calculated and stored the percentage of Person A's in this session who chose Option 1 and Option 2 for each question. I will present you four of these questions. For each question presented, your task is to guess the percentage of Person A's in this session who chose Option 1 and Option 2 in that question (these percentages must add up to 100%). Only one prediction question from this part will be chosen at the end of the study to determine your earnings from Part 2. You will be compensated up to an additional \$4.00 for your accuracy. Each question has the same chance of being chosen, so please pay attention to all questions and treat each question as if it were the only one being asked. [page break]

The accuracy earnings will be calculated as: $\max(0, \$4.00 - 0.005 * [\text{Your estimate of \% of Person A's who chose Option 1} - \% \text{ Person A's who actually chose Option 1}]^2)$. Clearly, this is the same as $\max(0, \$4 - 0.005 * [\text{Your estimate of \% of Person A's who chose Option 2} - \% \text{ Person A's who actually chose Option 2}]^2)$ since Option 1 and Option 2 percentages must add up to 100%. This means that if you guess the proportion of Person A's who chose each option exactly right, you will get an additional \$4. If you are off by 10% in either direction, you will get \$3.50. If you are off by 15% in either direction, you will get \$3. If you are off by 20% in either direction, you will get \$2.00. If you are off by 25% in either direction, you will get \$1.00. If you are off by more than 28% in either direction, you will not get any additional payment. Notice that the farther away from the reality your guess is, the faster your accuracy earnings drop. In sum, the more accurate you are, the more money you make. Notice that the reality may be 0% (none of the people who fit the description chose a particular option), 100% (all of the people who fit the description chose a particular option) or any % in between. To maximize your payoffs, it is important that you treat each prediction question carefully. Do not rush, I will wait for everyone to proceed to the next part. [page break]

Part 2, Q1. What percentage of Person A's in this session do you think chose each of the following options? (Percentages must sum to 100. You can only enter integer values.)

____ % of Person A's who chose Option 1. \$4 for Person A, \$1 for Person B

____ % of Person A's who chose Option 2. \$3 for Person A, \$2 for Person B

Part 2, Q2. What percentage of Person A's in this session do you think chose each of the following options? (Percentages must sum to 100. You can only enter integer values.)

____ % of Person A's who chose Option 1. \$2.50 for Person A, \$0 for Person B

____ % of Person A's who chose Option 2. \$2 for Person A, \$1.50 for Person B

Part 2, Q3. What percentage of Person A's in this session do you think chose each of the following options? (Percentages must sum to 100. You can only enter integer values.)

____ % of Person A's who chose Option 1. \$1 for Person A, \$4 for Person B

____ % of Person A's who chose Option 2. \$0.50 for Person A, \$6.50 for Person B

Part 2, Q4. What percentage of Person A's in this session do you think chose each of the following options? (Percentages must sum to 100. You can only enter integer values.)

- ____ % of Person A's who chose Option 1. \$2 for Person A, \$3 for Person B
- ____ % of Person A's who chose Option 2. \$1.50 for Person A, \$5.50 for Person B

Part 3 Person A's and Person B's will participate in a joint decision task in Part 3. Your roles are determined by your seat number as before, so you already know whether you are Person A or Person B. The program will pair one Person A and one Person B anonymously and randomly for Part 3. This random pairing is independent of the random pairing in Part 1. First Person A's will make a choice in Part 3. When this choice is communicated to Person B's, then Person B's will make a choice, which will be communicated back to Person A. All communication will be done confidentially. Note that in Part 3, Person A's decision influences Person B's earnings and Person B's decision influences Person A's earnings. I will carry out the decisions of both parties to determine earnings.

Now, let's review the joint decision task everyone will be participating in:

Person A and Person B roles were randomly assigned based on seat numbers to all participants at the beginning of the study. In this decision task, there are two stages.

In Stage 1, Person A chooses between A1 and A2:

A1. \$4 for Person A, \$1 for Person B

A2. \$3 for Person A, \$2 for Person B (Give \$1 to increase Person B's payment by \$1)

After Person A makes a decision, a randomly matched Person B will see A's choice and get to make a response decision in Stage 2. Person B's response in Stage 2 determines the final payments from Part 3 for the matched pair.

If Person A chose A1, then Person B is given the choice between B1 and B2 to determine final total payments from Part 3:

B1. Stay (Final earnings: \$4 for Person A, \$1 for Person B)

B2. Give \$0.50 to increase Person A's payment by \$2.50 (Final earnings: \$6.50 for Person A, \$0.50 for Person B)

If Person A chose A2, then Person B is given the choice between B3 and B4 to determine final total payments from Part 3:

B3. Stay (Final earnings: \$3 for Person A, \$2 for Person B)

B4. Give \$0.50 to increase Person A's payment by \$2.50 (Final earnings: \$5.50 for Person A, \$1.50 for Person B)

Please review this decision task carefully and prepare to make your decisions. Think carefully about each Person's options before you make your choice. [page break]

- Person A's choice question

[The game is repeated on Person A's screens]

Think about this joint decision task carefully. Which option do you choose?

A1. \$4 for me, \$1 for Person B

A2. \$3 for me, \$2 for Person B

- Person B's choice question

Person A matched with you for Part 3 chose (A1/A2, communicated) among

A1. \$4 for Person A, \$1 for Person B

A2. \$3 for Person A, \$2 for Person B (Give \$1 to increase Person B's payment by \$1)

Now you get to make a response decision in Stage 2. Your response in Stage 2 determines the final payments from Part 3 for you and for Person A.

Remember that Person A knew the following when he/she made a choice:

[The game is repeated on Person B's screens]

As Person B, what do you choose in response to person A's choice?

[If Person A chose A1, then Person B is given the choice between B1. Stay (Final earnings: \$4 for Person A, \$1 for Person B) and B2. Give \$0.50 to increase Person A's payment by \$2.50 (Final

earnings: \$6.50 for Person A, \$0.50 for Person B. If Person A chose A2, then Person B is given the choice between B3. Stay (Final earnings: \$3 for Person A, \$2 for Person B) and B4. Give \$0.50 to increase Person A's payment by \$2.50 (Final earnings: \$5.50 for Person A, \$1.50 for Person B.) This choice is communicated back to Person A's.

Part 4 Now, I move onto Part 4. This part of the study requires a lot of attention. I will ask you to answer seven prediction questions about other participants' choices. You will be compensated for your accuracy in one of these prediction questions randomly selected at the end of the study. Each question has the same chance of being selected. The accuracy payment in the selected question will be calculated as before: $\max(0, \$4.00 - 0.005 * [\text{Your \% estimate} - \text{actual \%}]^2)$. This means that if you guess the percentage exactly right, you will get an additional \$4. If you are off by 10% in either direction, you will get \$3.50. If you are off by 20% in either direction, you will get \$2.00, and so on. If you are off by more than 28% in either direction, you will not get any additional payment. Notice that the farther away from the reality your guess is, the faster your accuracy earnings drop. Next, the program will present the first 3 of these questions. I will give more detailed explanations of the remaining ones afterwards. [page break]

Part 4, Q1. In order to help you answer the prediction question below, I remind you of the decision task in Part 3. [The game in Part 3 repeated on the screen]

What percentage of Person A's chose each option (A1 or A2) in Part 3? Please think carefully and make your best prediction. Make sure that your answers add up to 100%.

___ % of Person A's who chose A1

___ % of Person A's who chose A2

Part 4, Q2. What percentage of Person B's chose each option (B1 or B2) in response to A1? Please think carefully and make your best prediction. Make sure that your answers add up to 100%.

___ % of Person B's chose B1 in response to A1

___ % of Person B's chose B2 in response to A1

Part 4, Q3. What percentage of Person B's chose each option (B3 or B4) in response to A2? Please think carefully and make your best prediction. Make sure that your answers add up to 100%.

___ % of Person B's chose B3 in response to A2

___ % of Person B's chose B4 in response to A2

Part 4 -continued- Thank you, everyone answered the first three prediction questions in Part 4. Now, I want to explain the next two prediction questions in Part 4, since they will ask you to think about a subgroup of Person A's. In other words, these questions will ask you to report a conditional probability. In both questions, I ask that you only consider the subgroup of Person A's who picked A2 in Part 3. I repeat the decision task here to refresh your memory [The game in Part 3 repeated on the screen].

Now, considering only the Person A's who chose A2 in the decision task of Part 3, think about how these Person A's chose in the following question from Part 1 when Person B's did not have any choice to make:

Part 1 question:

Option 1. \$2.50 for me, \$0 for Person B

Option 2. \$2 for me, \$1.50 for Person B

I ask you to predict the percentage of choices in the Part 1 question among the Person A's who chose A2 in the Part 3 decision task. Remember that while Person B's could choose to respond to Person A's in Part 3, they did not have a choice in Part 1. Therefore Person A's who chose A2 in Part 3 may or may not have chosen similarly in Part 1. This question basically asks you what % of the Person A's who have been helpful in Part 3 would be helpful in a given question in Part 1. Note that the question from Part 1 also differs in the options that Person A faced. So, please pay close attention to all the details of the questions.

So first, you have to focus on a particular subgroup of Person A's: only those who chose A2 in Part 3. Then, you need to think about how those Person A's have chosen among two options in Part 1. I will also provide, for your reference, your best guess about the % of ALL Person A's who you thought picked Option 1 and Option 2. You reported this guess in Part 2. Note, however, this guess was about ALL the Person

A's. Now, I am asking you about a subgroup of them, who chose A2 in Part 3. So please think carefully about if and how much this subgroup of Person A's differs from the general population of Person A's, and how likely they are to have chosen in a given Part 1 question. [page break]

Part 4, Q4. [The game in Part 3 repeated on the screen] Considering only the Person A's who chose A2 in Part 3, think about how they chose in the following question from Part 1 when Person B's did not have any choice to make:

Part 1 question: Option 1. \$2.50 for me, \$0 for Person B Option 2. \$2 for me, \$1.50 for Person B

You guessed, in Part 2, that <Part 2 estimate> % of all Person A's would pick Option 1 and <Part 2 estimate>% of all Person A's would pick Option 2 in this question. I provide this for your reference, you may decide not to use this information.

Now, I ask you to predict the choices of only the Person A's who chose A2 in Part 3. Please be careful which option (Option 1 or 2) you think they are more/less likely to choose than the general population of Person A's. Please indicate your best predictions for: ___ % choosing Option 1 in this Part1 question among Person A's who chose A2 in Part 3 ___ % choosing Option 2 in this Part1 question among Person A's who chose A2 in Part 3

Part 4, Q5. [The game in Part 3 repeated on the screen] Considering only the Person A's who chose A2 in Part 3, think about how they chose in the following question from Part 1 when Person B's did not have any choice to make:

Part 1 question: Option 1. \$4 for me, \$1 for Person B Option 2. \$3 for me, \$2 for Person B

You guessed, in Part 2, that <Part 2 estimate> % of all Person A's would pick Option 1 and <Part 2 estimate>% of all Person A's would pick Option 2 in this question. I provide this for your reference, you may decide not to use this information.

Now, I ask you to predict the choices of only the Person A's who chose A2 in Part 3. Please be careful which option (Option 1 or 2) you think they are more/less likely to choose than the general population of Person A's. Please indicate your best predictions for: ___ % choosing Option 1 in this Part1 question among Person A's who chose A2 in Part 3 ___ % choosing Option 2 in this Part1 question among Person A's who chose A2 in Part 3

Part 4 -continued- Thank you. Now I have reached the final two questions of Part 4. These questions will ask you to predict what expectations Person A's held regarding how Person B's would respond to their choices in Part 3. Remember that in Q2 of this part, I showed you the decision task from Part 3 and asked you what % of Person B's chose each option (B1 or B2) in response to A1? Similarly, Q3 asked you what % of Person B's chose each option (B3 or B4) in response to A2? Now, I will ask you how you think Person A's answered these questions. The question will look like:

When I asked Person A's "What percentage of Person B's chose each option (B1 or B2) in response to A1?," what do you think was the average of their predictions?

On average, Person A's expected ___% of Person B's to choose B1 in response to A1

On average, Person A's expected ___% of Person B's to choose B2 in response to A1

Please think carefully about what this question is asking before answering. Basically, I am asking you to predict Person A's expectations of Person B responses in the task from Part 3. [page break]

Part 4, Q6. [The game in Part 3 repeated on the screen] When I asked Person A's "What percentage of Person B's chose each option (B1 or B2) in response to A1?, what do you think was the average of their predictions in this question?

___ Average expectation of Person A's regarding % of Person B's who chose B1 in response to A1

___ Average expectation of Person A's regarding % of Person B's who chose B2 in response to A1

Part 4, Q7. [The game in Part 3 repeated on the screen] When I asked Person A's "What percentage of Person B's chose each option (B3 or B4) in response to A2?, what do you think was the average of their predictions in this question?

___ Average expectation of Person A's regarding % of Person B's who chose B3 in response to A2

___ Average expectation of Person A's regarding % of Person B's who chose B4 in response to A2

Final Questions and Payment Did you find any of the parts of this study confusing to the point that it interfered with the quality of your decision making? (Yes/No) [page break]

If any of the instructions were confusing, please comment below.[page break]

Thank you for your participation! Everyone is done with the study at this point. Please click OK to proceed. You will see the random question selections and your earnings from each part in the next few pages. You do not need to write down the earnings from each part. Your TOTAL payment (including the participation fee) will be displayed on the last page. '

Experiment 2 Instructions and Protocol

Person A's and Person B's were in the same room and roles were assigned randomly and anonymously. There was no communication between subjects and each subject was paid in private.

General Instructions Please do not start until instructed to do so. In the meantime, please read these instructions carefully. This study will take 45 minutes and will require you to make choices and estimations regarding other participants. You will earn \$5 for your attentive participation and up to an additional \$5.50 as a result of your choices and those of others. The study has 4 parts with different instructions. In all questions, 200 tokens correspond to a \$1. Your additional payment may depend on your choices and those of others in these questions. Please do not rush. Take your time and answer each question mindfully. If you finish early, you will be asked to wait while others finish the survey. You will not be permitted to use phones, laptops, etc. while you wait. If you have any questions, please note them at the end of the survey. Please do not raise your hand or talk, this is a silent study. Each question is independent of the others. Only one will be picked at the end of the study for determining payments.

You have a randomly assigned ID number at the top of this page. I will use this ID number to record your answers and will not keep any other identifying information. Your choices in this study will be carried out without compromising your identity in any way. To determine the payments, your choice in the selected question may be paired with the choice of another participant in a corresponding question, but this matching will be done randomly and anonymously. Therefore, none of the participants will be able to link your identity to your choices.

Please read instructions carefully and pay close attention to each question. Your payment may depend on your attentiveness.

Part 1 In the first part of the study, you will choose between two options that may determine the additional payment of you and another participant in this room. All questions involve different tradeoffs. In most cases, you can increase the payment of a fellow participant by a larger amount than what you give up. However, the tradeoff between what you give up and what the other person gets varies across questions. For example, you may face a choice between getting 900 versus giving 100 to increase the payment of the other participant from 200 to 500.

Option 1: 900 for me, 200 for the other participant

Option 2: 800 for me, 500 for the other participant

At the end of the survey, if a question is randomly chosen from this part, the I will also randomly determine your role for the chosen question. If you are picked as the recipient, your payment will be determined by another participant's choice. If you are picked as the decision maker, then your choice in the question will determine your payment as well as that of another participant in the room. For example, let's say that the question above gets selected, and you are randomly chosen to be the decision maker. Since 200 tokens correspond to \$1, if you picked Option 2, you would receive \$4.00 in addition to the \$5.00 for your participation (\$9 total), and another participant would receive \$2.50 in addition to the \$5.00 for her participation (\$7.50 total). If you picked Option 1, you would receive \$4.50 in addition to the \$5.00 for your participation (\$9.50 total), and another participant would receive \$1.00 in addition to the \$5.00 for her participation (\$6 total).

Only one question among the following can be selected to determine payments, so treat each question as if it was the only question you face. Please pay close attention to each question. They may involve increases or decreases in one or both payments. Units are in tokens. 200 tokens = \$1. [page break]

Please pick one of the two options in each question.

Part 1, Q1. Option 1. 800 tokens for me, 800 tokens for the other participant Option 2. 700 tokens for me, 1100 tokens for the other participant

Part 1, Q2. Option 1. 900 tokens for me, 500 tokens for the other participant Option 2. 800 tokens for me, 800 tokens for the other participant

Part 1, Q3. Option 1. 800 tokens for me, 200 tokens for the other participant Option 2. 600 tokens for me, 400 tokens for the other participant

Part 1, Q4. Option 1. 500 tokens for me, 900 tokens for the other participant Option 2. 400 tokens for me, 1200 tokens for the other participant

Part 1, Q5. Option 1. 500 tokens for me, 0 tokens for the other participant Option 2. 400 tokens for me, 300 tokens for the other participant

Part 1, Q6. Option 1. 900 tokens for me, 0 tokens for the other participant Option 2. 800 tokens for me, 200 tokens for the other participant

Part 1, Q7. Option 1. 400 tokens for me, 600 tokens for the other participant Option 2. 300 tokens for me, 1100 tokens for the other participant

Part 1, Q8. Option 1. 500 tokens for me, 900 tokens for the other participant Option 2. 400 tokens for me, 600 tokens for the other participant

Part 2 In the next part, you will be asked to estimate others' choices across different scenarios. If the question picked at the end of the study is one that required you to make such an estimate, you will be compensated up to an additional \$3.00 for your accuracy. The accuracy payment for all such questions will be calculated as: $\max(0, \$3.00 - 0.05 \cdot |\text{Your \% estimate} - \% \text{ reality}|)$. This means that if you guess right, you will get an additional \$3.00. If you are off by 5% in either direction, you will get \$2.75. If you are off by 20% in either direction, you will get \$2.00 and so on. If you are off by 60% or more, you will not get any additional payment. Your payment will be rounded up to the nearest 25 cents. In sum, the more accurate you are, the more money you make. Notice that the reality may be 0% (none of the people who fit the description chose a particular option), 100% (all of the people who fit the description chose a particular option) or any % in between. Please proceed now to the estimation exercises. To maximize your payoffs, it is important that you treat each one carefully and independently. [page break]

Part 2, Q1. What percentage of the participants chose each of the following options?

900 tokens for him/herself, 500 tokens for the other participant _____% 800 tokens for him/herself, 800 tokens for the other participant _____%

Part 2, Q2. What percentage of the participants chose each of the following options?

800 tokens for him/herself, 200 tokens for the other participant _____% 600 tokens for him/herself, 400 tokens for the other participant _____%

Part 2, Q3. What percentage of the participants chose each of the following options?

500 tokens for him/herself, 0 tokens for the other participant _____% 400 tokens for him/herself, 300 tokens for the other participant _____%

Part 2, Q4. What percentage of the participants chose each of the following options?

800 tokens for him/herself, 800 tokens for the other participant _____% 700 tokens for him/herself, 1100 tokens for the other participant _____%

Part 3 Thank you for your answers! Part 3 transitions to a very different setup. Please pay close attention to the instructions and question details. All of the questions in this part depend on your understanding of this setup. You will be making three joint decisions with another fellow participant. You will take decisions either as Person A or as Person B in three decision tasks that share a similar format. All decision tasks will present a choice situation where two people's decisions as well as chance play a role in determining the outcomes. Only one decision task can be selected at the end of the study, so your decisions in each task should be completely independent of one another.

At the beginning of the decision task, Person A is given 900 tokens and Person B is given 500 tokens. There are two stages that take place sequentially.

Stage 1. Person A makes a decision between keeping all 800 tokens and passing no additional tokens to Person B, or giving up 100 tokens in order to increase Person B's earnings by 300 tokens. These choices are presented below:

Keep. 900 for Person A, 500 for Person B

Give. 800 for Person A, 800 for Person B

Stage 2. Person B indicates his/her choice among the options presented in "Person B's choice set" conditional on the choice of Person A. In other words, Person B is asked to indicate his/her choice in the case that Person A chose "Keep" in Stage 1, and also in the case that Person A chose "Give" in Stage 1. At the end of the study, if a question from this part is selected, Person B's choice will be carried out conditional on the choice of the Person A s/he is randomly and anonymously matched with for that task.

Therefore, in Part 3 both Person A's and Person B's can make decisions that affect each other's earnings.
[page break]

Let us now review the options Person B can choose from in Stage 2 in response to Person A's choice in Stage 1. In Stage 2, Person B will access to the following three choice sets:

- The "Basic Set"

Person B has no actual choice. Regardless of what Person A chooses, Person B will go with: Stay. Not change the allocation Person A chose. As a result, Person A's choice in Stage 1 will determine earnings of Person A and Person B.

- The "Add or Stay Set"

If Person A chooses "Give" in Stage 1, Person B chooses between Stay. Not change the allocation Person A chose.

Add. Give 100 to increase Person A's payment by 300. (100 tokens are deducted from Person B's earnings and 300 tokens are added to Person A's earnings.)

Having the Add option available to Person B does not necessarily mean that Person B is going to choose it over the Stay option. It only means that Person B can decide whether to give 100 tokens to increase Person A's earnings by 300 in response to Person A's choice of "Give" in Stage 1.

If Person A chooses "Keep" in Stage 1, Person B will not have a further choice to make and will go with the Stay Option.

- The "Erase or Stay Set"

If Person A chooses "Give" in Stage 1, Person B will not have a further choice to make and will go with the Stay Option.

If Person A chooses "Keep" in Stage 1, Person B chooses between Stay. Not change the allocation Person A chose.

Erase. Give 100 to decrease Person A's payment by 300. (This option is only available to Person B if Person A chooses Give. 100 tokens are deducted from Person B's earnings and 300 tokens are deducted from Person A's earnings.)

Having the Erase option available does not necessarily mean that Person B is going to choose it over the Stay option. It only means that Person B can decide whether to give 100 tokens to decrease Person A's earnings by 300 in response to Person A's choice of "Keep" in Stage 1.

[page break]

So which choice set will Person B choose from? Neither Person A nor Person B will know for sure, but before they make their choices in each decision task, they will learn the probability with which each choice set is going to be available. The decision tasks in Part 3 will differ in the probability of Person B having access to each of these Stage 2 choice sets. In particular, in each of the three decision tasks, Person B has

access to ONE of these subsets with 98% probability, while having access to each of the other two with 1% probability each.

The Stage 2 choice set that Person B has access to 98% of the time is called the dominant set. In one decision task, the dominant set will be the “Basic Set”, in another decision task, the dominant set will be the “Add or Stay Set” and in yet another decision task, the dominant set will be the “Erase or Stay Set.” If The “Basic Set” is the dominant set, then 98% of the time Person B does not have a choice to make. If the “Add or Stay Set” is the dominant set, then Person B can choose between the Stay and Add options 98% of the time when Person A chooses Give. If the “Erase or Stay Set” is the dominant set, then Person B can choose between the Stay and Erase options 98% of the time when Person A chooses Default.

If a decision task from Part 3 is chosen at the end of the experiment, the experimenter will throw a pair of 10-sided dice to pick a number between 1 and 100 and carry out these probabilities. For example, if “Add or Stay Set” is the dominant set, Person B’s choice between the options in the “Add or Stay Set” will be implemented if the die roll outcome is between 1 and 98, his/her choice in the “Erase or Stay Set” will be implemented if the die roll is 99 and s/he will not have a choice to make if the die roll is 100 and the “Basic Set” is implemented. The experimenter will announce each contingency before s/he rolls the die. Note that each number between 1-100 has an equal chance of coming up.

Please consider each situation carefully. Note that only one task can be chosen at the end of the experiment. So, Person B’s are not repeatedly responding to Person A’s. They are making independent decisions in each task. And Person A’s can only face one of these situations, so they are making independent decisions in task as well.

Therefore, please treat each decision as if you are making it in isolation.

[page break]

Comprehension Questions:

If the dominant set is “Erase or Stay Set,” what is the probability with which Person B will get to choose between Erase and Stay options if Person A chose Keep in Stage 1?

If the dominant set is “Erase or Stay Set,” what is the probability with which Person B will get to choose between Add and Stay options if Person A chose Give in Stage 1?

If Person A picks Keep and Person B has access to the “Erase or Stay Set” and chooses Erase, how many tokens do each get?

Please explain if you have any confusions about the setup. Otherwise, please write ‘none’ and proceed.

[page break]

[Treatments NP, N and NR are presented in one of the following orders to participants: N-NP-NR, NP-N-NR, NR-N-NP]

Treatment NP Dominant Set: The “Erase or Stay Set”

In Stage 1, Person A first chooses between Keep and Give:

Keep. 900 for Person A, 500 for Person B

Give. 800 for Person A, 800 for Person B

In Stage 2, Person B faces the “Erase or Stay Set” with 98% probability. So, if Person A chose Keep, Person B chooses between

Stay. Not change the allocation Person A chose.

Erase. Give 100 to decrease Person A’s payment by 300.

If Person A chose Give, Person B has no choice and goes with the Stay option.

With 1% probability, Person B has no choice to make in Stage 2 as s/he faces the “Basic Set”. With 1% probability, Person B faces the “Add or Stay Set” and can choose between Stay - Not change the allocation Person A chose and Add -Give 100 to increase Person A’s payment by 300, if Person A chose Give in Stage 1.

I will now ask you about your choices in all potential cases where you have a choice to make. Please remember:

1. You are Person B.

2. Person A made his/her choice after learning that dominant set in Stage 2 is the “Erase or Stay Set”.

Consider that you are paired with a Person A who chose “Give” in this scenario. What do you choose if you have access to the following options?

Stay: Do not change person A's allocation
Add: Give 100 to increase Person A's payment by 300

Consider that you are paired with a Person A who chose "Keep" in this scenario. What do you choose if you have access to the following options?

Stay: Do not change person A's allocation
Erase: Give 100 to decrease Person A's payment by 300

Treatment N Dominant Set: The Basic Set

In Stage 1, Person A first chooses between Keep and Give:

Keep. 900 for Person A, 500 for Person B

Give. 800 for Person A, 800 for Person B

In Stage 2, Person B faces the "Basic Set" with 98% probability and goes with

Stay. Not change the allocation Person A chose.

With 1% probability, Person B faces the "Erase or Stay Set" and can choose between Stay - Not change the allocation Person A chose and Erase - Give 100 to decrease Person A's payment by 300, if Person A chose Keep in Stage 1. With 1% probability, Person B faces the "Add or Stay Set" and can choose between Stay - Not change the allocation Person A chose and Add - Give 100 to increase Person A's payment by 300, if Person A chose Give in Stage 1.

I will now ask you about your choices in all potential cases where you have a choice to make. Please remember:

1. You are Person B.
2. Person A made his/her choice after learning that dominant set in Stage 2 is the "Basic Set".

Consider that you are paired with a Person A who chose "Give" in this scenario. What do you choose if you have access to the following options?

Stay: Do not change person A's allocation
Add: Give 100 to increase Person A's payment by 300

Consider that you are paired with a Person A who chose "Keep" in this scenario. What do you choose if you have access to the following options?

Stay: Do not change person A's allocation
Erase: Give 100 to decrease Person A's payment by 300

Treatment NR Dominant Set: The "Add or Stay" Set

In Stage 1, Person A first chooses between Keep and Give:

Keep. 900 for Person A, 500 for Person B

Give. 800 for Person A, 800 for Person B

In Stage 2, Person B faces the "Add or Stay Set" with 98% probability. So, if Person A chose Keep, Person B has no choice and goes with the Stay option. If Person A chose Give, Person B chooses between Stay. Not change the allocation Person A chose.

Add. Give 100 to increase Person A's payment by 300.

With 1% probability, Person B has no choice to make in Stage 2 as s/he faces the "Basic Set". With 1% probability, Person B faces the "Erase or Stay Set" and can choose between Stay - Not change the allocation Person A chose and Erase - Give 100 to decrease Person A's payment by 300, if Person A chose Keep in Stage 1.

[Person A version]

1. You are Person A.
2. Person B will make his/her choice in Stage 2 conditional on your choice in Stage 1. Both Person A and Person B are informed of the dominant set.

What do you choose?

Keep. 900 for Person A, 500 for Person B

Give. 800 for Person A, 800 for Person B

[Person B version]

I will now ask you about your choices in all potential cases where you have a choice to make. Please remember:

1. You are Person B.
2. Person A made his/her choice after learning that dominant set in Stage 2 is the “Add or Stay Set”.

Consider that you are paired with a Person A who chose “Give” in this scenario. What do you choose if you have access to the following options?

- Stay: Do not change person A’s allocation
Add: Give 100 to increase Person A’s payment by 300

Consider that you are paired with a Person A who chose “Keep” in this scenario. What do you choose if you have access to the following options?

- Stay: Do not change person A’s allocation
Erase: Give 100 to decrease Person A’s payment by 300

Part 4 You are now moving onto a new set of questions (Part 4). Please pay close attention to the instructions and question details. If a question is selected from this part, you will be compensated for your accuracy as described before. You will be asked to make estimates about the choices of different groups of Person A’s. Please pay close attention to the particular group of Person As you are asked about. Also, pay close attention to the decision task being described.

As before, you will be compensated up to an additional \$3.00 for your accuracy in these questions, should a question from this part be chosen at the end of the study. The accuracy payment is calculated as: $\max(0, \$3.00 - 0.05 * |\text{Your \% estimate} - \text{\% reality}|)$. This means that if you guess right, you will get an additional \$3.00. If you are off by 5% in either direction, you will get \$2.75. If you are off by 20% in either direction, you will get \$2.00 and so on. If you are off by 60% or more, you will not get any additional payment. Your payment will be rounded up to the nearest 25 cents. In sum, the more accurate you are, the more money you make. Notice that the reality may be 0% (none of the people who fit the description chose a particular option), 100% (all of the people who fit the description chose a particular option) or any % in between. Please proceed now to the estimation exercises. To maximize your payoffs, it is important that you treat each one carefully and independently. [page break]

Consider the following situation you faced in Part 3.

[The game in Treatment N / NP / NR is repeated. The questions below repeat for each treatment in the same sequence that the subject saw the treatments in Part 3.]

[Person B question] What percentage of Person A’s would you estimate chose each option in this scenario?
Keep. 900 for Person A, 500 for Person B _____ %
Give. 800 for Person A, 800 for Person B _____ %

[Person B question] Only consider the group of Person A’s who chose Give in this scenario. Among these Person A’s, what percentage chose each of the following options presented to them in Part 1 of the study?

500 tokens for him/herself, 0 for the other participant _____ %
400 tokens for him/herself, 300 for the other participant _____ %

Consider the following situation you faced in Part 3.

[The game in Treatment NP is repeated.]

[Person A question] If Person B’s have the choice, what percentage of them do you think would choose each of the following options in this scenario in response to a Person A who chose Keep in Stage 1?

Stay. Do not change person A’s allocation _____ %
Erase. Give 100 to decrease Person A’s payment by 300 _____ %

Consider the following situation you faced in Part 3.

[The game in Treatment NR is repeated.]

[Person A question] If Person B’s have the choice, what percentage of them do you think would choose each of the following options in this scenario in response to a Person A who chose Give in Stage 1?

Stay. Do not change person A’s allocation _____ %
Add. Give 100 to increase Person A’s payment by 300 _____ %

Payment Protocol At the end of the experiment, each subject was paid privately. If a question from Part 1 was chosen, subjects were paired randomly and for each pair, one subject was assigned randomly to be a recipient. The choice of the decision maker was used to determine additional earnings. If a question from Part 3 was chosen, first, experimenters matched the Person A's and Person B's in the room randomly and anonymously. Then, one experimenter rolled a pair of 10 sided die to determine the Stage 2 choice set to be implemented. Person A's choices and Person B's contingent strategies were carried out. The die roll was public and subjects could inspect any element of this procedure, but they could not see the other participant's ID number. If a question from Part 2 or Part 4 was chosen, the experimenters figured out the real percentages of choices in the session by counting answers, wrote these percentages on the board and then determined each person's accuracy payments using an excel sheet.