MOUSEBETTING – INSTRUCTIONS

Thank you for agreeing to participate in this research experiment on group decision making. During the experiment we would like to have your undistracted attention. Do not open other applications on your computer, chat with other students, use your phone or headphones, read, etc.

For your participation, you will be paid in cash from a research grant, at the end of the experiment. Different participants may earn different amounts. What you earn depends partly on your decisions, partly on the decisions of others, and partly on chance. It is very important that you listen carefully, and fully understand the instructions. You will be asked some review questions after the instructions, which have to be answered correctly before we can begin the experiment.

If you have questions, don't be shy about asking them. If you have a question, but you don't ask it, you might make a mistake which could cost you money. Your question might also be a question that would help other people because they are wondering about the same thing that you are.

The entire experiment will take place through computer terminals. All interaction between you and other people will take place through the computer interface. It is important that you not talk out loud (except when you are asking us a question) or in any way try to communicate with other participants during the experiment, except according to the rules described in the instructions.

We will start with a brief instruction period (which is happening now). During this instruction period, you will be given a complete description of the experiment and will be shown how to use the computers. If you have any questions during the instruction period, raise your hand and your question will be answered out loud so everyone can hear. If any difficulties arise after the experiment has begun, raise your hand, and an experimenter will come and assist you privately.

At the end of the session, you will be paid the sum of what you have earned in all matches, plus the show-up fee of $_____. Everyone will be paid in private and you are under no obligation to tell others how much you earned. Your earnings during the experiment are denominated in **points**. At the end of the experiment you will be paid $1.00 for every _____ **points** you have earned.

The experiment will consist of ____ matches. In each match, you will be paired with one of the other participants in the experiment. Since there are ____ participants in today's session, there will be ____ pairs in each match. You are not told the identity of the participant you are matched with. Your payoff depends only on your decision and the decision of the one participant you are matched with. What happens in the other pairs has no effect on your payoff and vice versa. Your decisions are not revealed to participants in the other pairs.

In each match, there are three possible states labeled A, B and C. In each possible state, you earn a payoff which can be seen on the "**game table**" of your computer screen. One of the states will be selected at random by the computer. Before the selected state is revealed to you, you will have to decide whether to "**play the game**" or not. If you choose to **not** play the game you earn a "**sure payoff**" which can be seen on your screen. If you choose to play the game, your payoff will depend on the decision of the participant you are matched with as well as which state realizes. If the participant you are paired with chooses not to play the game then you earn the "**sure payoff**", even if you chose to play the game. You will earn the payoff in the "**game table**" only if both you *and* the participant you are matched with play the game.

All matches have three states (A, B and C) but they have different payoffs in the game table and also different sure payoffs for not playing the game. In each match, you will be either *player 1* or *player 2*. Which player (1 or 2) you are is random in each match and is clearly displayed on the screen. If you are player 1, your own possible payoffs for playing the game are displayed in the *top row* of the game table. If you are player 2, your own possible payoffs for playing the game are displayed in the *bottom row* of the game table. ***The sure payoff is always the same for both players*** and is displayed in a separated box *in the upper right side* of the screen.

There will be one practice match. The points accumulated in this match do not count towards your final dollar earnings. The practice match is similar to the matches in the experiment. In each match of the experiment, the payoffs are hidden in boxes. You can see the payoffs by moving your computer mouse into the boxes, ***left- or right-clicking***, and ***holding down*** the mouse button. If you do not hold down the mouse button the payoff will disappear. When you move the mouse away from the box, the payoff will also disappear. If you move your mouse back into the same box, click and hold, the payoff will appear again. In the experiment, clicking does not affect your earnings and you can click as few or as many times as you wish.

Before the practice match, we will present the game using screenshots. It is important that you understand this information. If you have a question during this presentation, raise your hand and we will answer you.

Display 1. Sample screenshot with displayed payoffs

This instruction package includes two separate pages, which are sample screenshots of computer screens you will see in the experiment. Look at the first page now; it is labeled "**Display 1**". Do you have the Display 1 page in front of you? Raise your hand high if you do. If you don't raise your hand we will come around and guide your attention to the separate Display 1 page.

[PAUSE to be sure everyone is looking at the "Display 1" page]

The Display 1 screenshot shows the following game.

States

The three states (A, B and C) are always equally likely. That is, the computer chooses one of the states at random. If you are player 1, you will know either that the state is A or B or you will know that the state is C for sure. If you are player 2, you will know either that the state is A for sure or you will know that the state is either B or C. This information partition will be the same for all matches. However, the payoffs inside the boxes will change from match to match.

In this example, you are player 2 so it says "You are player 2" at the top part of the screen. A blue square highlights the set of possible states. (If you were player 1, however, the possible states would be highlighted in red).

In this example, you know that the state is either B or C because only the B and C state payoffs are highlighted in blue. (Since the only possible states are B and C, you also know for sure that the state cannot be A.) The middle part of the screen reminds you of what the possible states are. In this example, the screen says "You are in State B or C". As far as you know, both are equally likely. The dark vertical lines divide the sets of states that you will know about. Since you are player

2, there is no dark vertical line separating state B from state C because you do not know which of those states is more likely.

You can also see in this example that player 1 has different information from you. Player 1 will know that the state is A or B (because there is no dark vertical line separating states A and B in the top row) or player 1 will know that the state is C for sure. Note also that you know which information the other player might have, but you do not know which states are highlighted in his own screen.

Payoffs

Your payoff if *one or both* players choose not to play the game is the number inside the box in the upper right corner of the screen, called the "**sure payoff**." In this example, it is 26. Remember that this payoff is the same for the other player.

The payoffs if **both** players choose to play the game are the numbers inside the boxes of the game table. Each player's box might have a different payoff. In the Display 1 example, if you are player 2 and the state is B, if both players choose to play the game then you (player 2) would earn 32 and the other participant (player 1) would also earn 32.

In Display 1 since you are player 2 and you know the state is B or C, the only possible payoffs you could earn are:

(1) the player 2 – state B payoff if the state happened to be B, and if both players chose to play the game (then you earn 32 and player 1 earns 32);

or

(2) the player 2 – state C payoff if the state happened to be C, and if both players chose to play the game (then you earn 12 and player 1 earns 10);

or

(3) the "sure payoff" in the box in the upper right (which is 26), if you chose ***not*** to play the game ***or*** if you chose to play the game ***and*** player 1 chose ***not*** to play the game.

Keep in mind that, in this example, it is not possible for you to earn the payoff from state A. The reason is that the actual state must be one of those shown in the colored boxes. If you know that B or C are possible then you also know that A is not possible. However, the payoffs from states which you are sure could not occur –state A, in this example– might be of some use to you in figuring out whether the other player will play the game or not. Keep also in mind that the other player will see the vertical lines dividing sets of possible states ***but will not see the highlighted states that you see***.

The Display 1 screen asks "Do you want to play the game?". You must respond by clicking on the "Yes" or "No" button. After you click Yes or No, the computer system will wait for everyone to make their choices. After all the choices are made you will find out whether the person you were paired with chose to play the game or not, the actual state, and your payoff. A history screen at the bottom will show a rolling history of your choices, the actual states, the choices of the person you

were paired with in each period (but not the identity of this person), and your payoff that resulted from the state and those choices.

Display 2. Sample screenshot with hidden payoffs

Now turn to the separate page marked Display 2. Do you have the Display 2 page in front of you? Raise your hand high if you do. If you don't raise your hand we will come around and guide your attention to the separate Display 2 page.

[PAUSE to be sure everyone is looking at the "Display 2" page]

The Display 2 shows a new match. In this example, you are Player 1. You know that the state is C because only the C state payoff is highlighted in red (remember that red highlights player 1 possible states, and blue highlights player 2 possible states). Player 2 does not know which of your payoffs are highlighted. However, player 2 can observe that there is no dark line separating states A and B, and that there is a dark line separating states B and C on player 1's row.

As in the previous example, player 2 will know that the state is A for sure or player 2 will know that the state is B or C. Note also that you know which information the other player might have, but you do not know which states are highlighted in his own screen. However, since you know that the state is C for sure, you also know that player 2 cannot have state A for sure highlighted, since that would be inconsistent with your information.

Finally, notice that all the payoffs are now **hidden in boxes**. This is the type of screen you will observe in each match of the experiment. In order to find out what the possible payoffs are, you must move your mouse into the box that shows your payoff from a particular state of the game table, or the sure payoff, or the other player's payoffs, and click-and-hold one of the mouse buttons. You can look at as many of the possible payoffs as you care too, or as few, for as long or as briefly as you like. If you have trouble figuring out how to use the mouse to temporarily reveal the hidden payoffs during the experiment, raise your hand right away and we will come around and help you.

Recap

Here is a brief recap of the important things you will see, and can see, and how they affect your payoffs:

1. The payoff matrix for each match consists of three states (A, B and C) and two players (1 and 2). Each of the states is always equally likely at the start. In each match you are randomly paired with one of the participants and your role (player 1 or player 2) is randomly chosen.

2. In each match you are either player 1 or player 2. You can see a reminder of which player you are at the top of the screen. If you are player 1, either boxes A and B will be highlighted in red or box C will be highlighted in red. If you are player 2, either box A will be highlighted in blue or boxes B and C will be highlighted in blue. You will not observe which boxes are highlighted for the other player.

3. All payoffs are hidden in boxes. You can find out what the payoffs are by moving your mouse into the boxes and clicking.

4. Your choice in each match is simple: Do you want to play the game? You must click on the "Yes" or the "No" button in the middle of the screen.

5. Your payoff will depend on the state, on your choice and the choice of the other player you are paired with. If you both choose "Yes" to the question "Do you want to play the game?" then the payoffs are determined by the column of the game table corresponding to the actual state. If you choose "Yes" and the other person chooses "No", or if you choose "No", then you earn the sure payoff.

6. In each match you will be randomly paired with a new subject, randomly assigned a new role as player 1 or player 2, and the computer will randomly choose one of the states (A, B or C) with equal probability. The payoffs in the boxes change every match.

The experiment has _____ matches. You can go very quickly if you like to, or take your time if you like to. When the experiment is over, you will have to answer some survey questions. We will then call you one at a time to be paid in the order you showed up for the experiment.

Are there any questions?

[PAUSE to answer questions]

We will now begin the Practice session and go through 1 practice match to familiarize you with the computer interface and the procedures. During the practice match, **please do not hit any keys until you are asked to**, and when you enter information, please do exactly as asked. Remember, you are not paid for the practice match. At the end of the practice match you will have to answer some review questions. Everyone must answer all the questions correctly before the experiment can begin.

[AUTHENTICATE clients]

Please double click on the icon on your desktop that says _____. When the computer prompts you for your name, type your First and Last name. Then click SUBMIT and wait for further instructions.

[START game]

You now see the first screen of the experiment on your computer. Raise your hand high if you do. It looks similar to the screenshot in display 2, with the payoffs hidden in boxes. Please do not hit any key.

[PAUSE TO BE SURE EVERYONE HAS THE CORRECT SCREEN]

At the top left of the screen you see your **subject ID**. Please record that on your record sheet now. Some of you are in the role of player 1 and some are in the role of player 2. If you are player 1, you will see either states A and B highlighted in red or state C highlighted in red. If you are player 2, you will see either state A highlighted in blue or states B and C highlighted in blue. Now, use your mouse button to reveal the payoffs in the different boxes. Familiarize yourself with the click-and-hold method. For the time being do not click on the "yes" or "no" buttons. If you have problems revealing the payoffs raise your hand and we will come and assist you.

[PAUSE TO BE SURE EVERYONE UNDERSTANDS THE METHOD]

At this time, if your subject ID is even click on the "Yes" button. If your subject ID is odd click on the "No" button. Note that it does not matter which one you choose since you will not be paid for this match. At the bottom of the screen you can see a history panel with all the information relevant for each match.

Now click "Continue". The practice match is over. Please complete the review questions before we begin the paid session. Once you answer all the questions correctly, click submit. After both participants in your pair have answered the first round of questions, the next round of questions will appear. Please answer all questions correctly and click submit and the quiz will disappear from your screen. Raise your hand if you have any question.

[WAIT FOR EVERYONE TO FINISH THE QUIZ]

Are there any questions before we begin with the paid session?

We will now begin with the ____ paid matches. Please pull out your dividers for the paid session of the experiment. If there are any problems or questions from this point on, raise your hand and an experimenter will come and assist you.

[THE NEXT PAGE ONLY FOR THE EXPERIMENTER]

[at the end of GAME ____]

This was the last match of the experiment. You will be paid the payoff you have accumulated in the ____ paid matches. Before we proceed to the payment, you will be asked two sets of survey questions. Please submit your answers. The answers to those questions do not affect your payoff in any way: your payoff is the show-up fee plus the dollar conversion of the points accumulated during the paid matches.

[Wait for them to complete the survey]

Once you have completed the survey, the payoff appears on your screen. Please write this payoff in your record sheet and remember to CLICK OK after you are done.

[CLICK ON WRITE OUTPUT]

Your Total Earnings are the payoff plus the show-up fee of $____. We will pay each of you in private in the next room in the order of your Subject ID number. Remember you are under no obligation to reveal your earnings to the other participants.

Please put the mouse behind the computer and do not use either the mouse or the keyboard. Please remain seated and keep the dividers pulled out until we call you to be paid. Do not converse with the other participants or use your cell phone. Thank you for your cooperation.

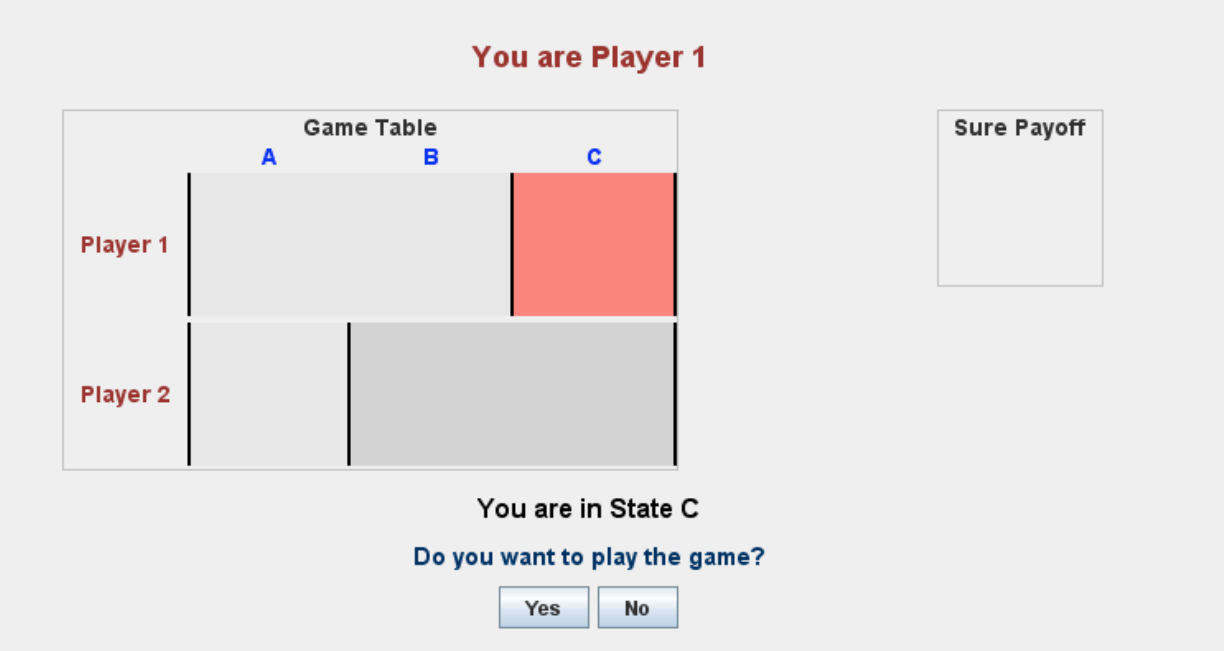
[CALL all the participants in sequence by their ID #]

[Note to experimenter: use the "pay" file to call and pay subjects and remember to **call them by ID +1**, that is, ID 0 in the pay file corresponds to subject ID 1]

Could the person with ID number 1 go to the next room to be paid?

Display 1: Sample screenshot with displayed payoffs

Display 2: Sample screenshot with hidden payoffs



RECORD SHEET

Subject ID: _____

Show-up fee: $_____

Match earnings: $_____

TOTAL EARNINGS: $_____

Name:_____ Date:_____

Amount received:_____

School ID #:_____ Signature:_____