

INSTRUCTIONS

You are about to participate in an experiment concerning the economics of decision-making.

This is a scientific experiment. As part of the scientific method in this experiment, it is important that you remain silent and refrain from looking at other people's work. If you have questions or need assistance of any kind, please raise your hand. If you talk or take any type of noise during the experiment you will be asked to leave without receiving your earnings. I expect and appreciate your cooperation.

The procedures involved with this experiment are outlined below. If you follow them closely and make appropriate decisions, you can make an appreciable sum of money. Your earnings will be paid to you in cash at the end of the experiment.

The experiment is organized as follows:

Part 1

The experiment consists of 8 rounds. In each round, you will be randomly assigned to a group of four participants. Each of you has been allotted a budget of 20 tokens per round. All 20 tokens must be allocated to either the individual and/or the group account.

The **payoff earned from allocating tokens to the group account** to each player depends on the total number of tokens allocated by the entire group. Each token allocated to the group account, by any member of the group, gives every group member 15 Experimental Currency Units (ExCUs). ExCUs will be transformed into cash by multiplying them by .002. Therefore, for each group member:

$\text{ExCUs}(a)=15a$ where a is the total number of tokens allocated to the group account.
Enclosed is a PAYOFF SHEET that allows you to determine the potential payoffs from varying investments. Take a look at the PAYOFF SHEET, and if there are any questions at this point please raise your hand.

The **payoff earned from allocating tokens to the individual account** for each player is determined solely by their allocation to their own individual account. The payoff is determined by the following quadratic equation:

$\text{ExCUs}(b)=41b-b^2$ where b is the number of tokens you allocated to your individual account. These payoffs are also illustrated in the enclosed PAYOFF SHEET.
Simply look at the first column of payoffs (the one denoted "0 tokens"). Again, the ExCUs have been transformed into cash by multiplying them by .002.

The total payoff to each player from both activities is the sum of the payoffs from both the group and individual accounts.

Example: If you invested all 20 tokens in the individual account you would receive $(41)(20)-20^2$ or 410 ExCUs, which equals $(410)(.002)$ or .82 cents for that round. See PAYOFF SHEET.

Example: If you invested all 20 tokens in the group account you would receive $(15)(20)$ or 300 ExCUs, which equals $(300)(.002)$ or .60 cents for that round. Also, the other three members of your group would each receive .60 as well. See PAYOFF SHEET.

Example: If you invested 10 tokens in the individual account and 10 tokens in the group account then you would receive $(41)(10)-10^2$ or 310 ExCUs, which equals $(310)(.002)$ or .62 cents from the individual account. Also you and every other member of your group would receive $(15)(10)$ or 150 ExCUs, which equals $(150)(.002)$ or .30 cents from the group account. Hence, your total payoff would be .92 cents. See PAYOFF SHEET.

Example: Aside from your allocation of tokens, if the other three members of the group invested a total of 60 tokens (3 people x 20 tokens each) in the group account then your earnings would increase by $(15)(60)$ or 900 ExCUs, which equals $(900)(.002)$ or \$1.80. The other three members of the group also receive \$1.80 from the group account. See PAYOFF SHEET.

Example: Aside from your allocation of tokens, if the other three members of the group invested a total of 30 tokens (3 people x 10 tokens each) in the group account then your earnings would increase by $(15)(30)$ or 450 ExCUs, which equals $(450)(.002)$ or .90 cents. The other three members of the group also receive .90 cents from the group account. See PAYOFF SHEET.

Example: Aside from your allocation of tokens, if the other three members of the group invested a total of 0 tokens in the group account, then your earnings would increase by .00 cents. See PAYOFF SHEET.

If there are any questions at this point please raise your hand. Do not start reading **Part 2** until the experimenter tells you to move on to **Part 2**.

Part 2

There is a large envelope on each participant's desk. Please verify that it contains a smaller envelope, eight decision sheets (one sheet for each round), and a RECORDING SHEET. Do not remove anything from the envelope until the experimenter tells you to do so.

Now remove the smaller envelope. Lift the lid to reveal your personal identification code. **Do not remove the slip of paper on which your identification code is written, but make sure you remember what your identification code is for use later in die experiment.**

The experimenter will now come around and collect the smaller envelope from each participant. They will be put aside until later in the experiment when they will be used to return your earnings to you.

Do not start reading **Part 3** until the experimenter tells you to move on to **Part 3**.

Part 3

The following procedure is identical for all eight rounds:

It is important that you do exactly what the experimenter tells you, when s/he tells you. Do not move ahead on your own.

- 1) Remove one of the decision sheets from your envelope.
- 2) Write your identification code at the top of this sheet.
- 3) Write down the number of tokens you would like to allocate to the individual account next to "Allocation to individual account" on your decision sheet. Then write down the number of remaining tokens that you would like to allocate to the group account next to "Allocation to group account" on the decision sheet. **All** of the tokens must be used in your allocation. **Do not discuss your decision with any other participant.**
- 4) Remove your RECORDING SHEET and write down how many tokens you allocated to each account in the appropriate spaces. This way you can keep track of your decisions and check the experimenter's calculations. Always keep your RECORDING SHEET out of the other participants' view. Whenever you are not using it please keep it face down.
- 5) When you have finished, fold the decision sheet twice.
- 6) At the front of the room is a box with a removable cover. Take your decision sheet to the box and place it in the slit. Then return to your seat.

Now that everyone has placed their decision sheet in the box and returned to their seats, the experimenter will take the box. The box is shaken to mix up the decision sheets and then the cover is removed. **The first 4 decision sheets removed will be group 1; the remaining 4 decision sheets will be group 2.**

The experimenter will now calculate each player's earnings and write the earnings on the blackboard next to the appropriate identification code. At this point you may record your total payoff in the right most column of your RECORDING SHEET to keep track of your earnings. **Do not discuss your earnings with any other participant.**

For rounds 2-8 we will return to the **top of this page and repeatedly follow the exact same procedure.** Do not start the next round until the experimenter tells you to do so.

Part 4

Now that the eighth round has been completed, the experimenter will calculate the total earnings for each identification code.

While these calculations are being made the experimenter will pass out a blank receipt to each participant. Fill the receipt out as instructed by the experimenter, and then return the white copy and keep the yellow copy for yourself.

Now, these earnings will be placed in the small envelope containing the appropriate identification code. When the envelopes are complete, the experimenter will return them to the appropriate participants. **Do not open your envelope until the experimenter tells you to do so.**

Part 5

Now that everyone has their envelope, you may **privately** open yours to verify your earnings. **Do not discuss your earnings with anyone.** You may leave after everyone has verified their earnings. Please leave these instructions and the envelope that contained your decision sheets, personal identification code, and RECORDING SHEET on your desk.

Thank you for your time and cooperation!

PAYOFF SHEET: Your Potential Earnings Per Round

Individual Account	Group Account	Total investment to the public account by the other three members of your group												
		0tokens	5tokens	10tokens	15tokens	20tokens	25tokens	30tokens	35tokens	40tokens	45tokens	50tokens	55tokens	60tokens
20 tokens	0 tokens	\$0.82	\$0.97	\$1.12	\$1.27	\$1.42	\$1.57	\$1.72	\$1.87	\$2.02	\$2.17	\$2.32	\$2.47	\$2.62
19 tokens	1 token	\$0.87	\$1.02	\$1.17	\$1.32	\$1.47	\$1.62	\$1.77	\$1.92	\$2.07	\$2.22	\$2.37	\$2.52	\$2.67
18 tokens	2 tokens	\$0.89	\$1.04	\$1.19	\$1.34	\$1.49	\$1.64	\$1.79	\$1.94	\$2.09	\$2.24	\$2.39	\$2.54	\$2.69
17 tokens	3 tokens	\$0.91	\$1.06	\$1.21	\$1.36	\$1.51	\$1.66	\$1.81	\$1.96	\$2.11	\$2.26	\$2.41	\$2.56	\$2.71
16 tokens	4 tokens	\$0.92	\$1.07	\$1.22	\$1.37	\$1.52	\$1.67	\$1.82	\$1.97	\$2.12	\$2.27	\$2.42	\$2.57	\$2.72
15 tokens	5 tokens	\$0.93	\$1.08	\$1.23	\$1.38	\$1.53	\$1.68	\$1.83	\$1.98	\$2.13	\$2.28	\$2.43	\$2.58	\$2.73
14 tokens	6 tokens	\$0.94	\$1.09	\$1.24	\$1.39	\$1.54	\$1.69	\$1.84	\$1.99	\$2.14	\$2.29	\$2.44	\$2.59	\$2.74
13 tokens	7 tokens	\$0.94	\$1.09	\$1.24	\$1.39	\$1.54	\$1.69	\$1.84	\$1.99	\$2.14	\$2.29	\$2.44	\$2.59	\$2.74
12 tokens	8 tokens	\$0.94	\$1.09	\$1.24	\$1.39	\$1.54	\$1.69	\$1.84	\$1.99	\$2.14	\$2.29	\$2.44	\$2.59	\$2.74
11 tokens	9 tokens	\$0.93	\$1.08	\$1.23	\$1.38	\$1.53	\$1.68	\$1.83	\$1.98	\$2.13	\$2.28	\$2.43	\$2.58	\$2.73
10 tokens	10 tokens	\$0.92	\$1.07	\$1.22	\$1.37	\$1.52	\$1.67	\$1.82	\$1.97	\$2.12	\$2.27	\$2.42	\$2.57	\$2.72
9 tokens	11 tokens	\$0.91	\$1.06	\$1.21	\$1.36	\$1.51	\$1.66	\$1.81	\$1.96	\$2.11	\$2.26	\$2.41	\$2.56	\$2.71
8 tokens	12 tokens	\$0.89	\$1.04	\$1.19	\$1.34	\$1.49	\$1.64	\$1.79	\$1.94	\$2.09	\$2.24	\$2.39	\$2.54	\$2.69
7 tokens	13 tokens	\$0.87	\$1.02	\$1.17	\$1.32	\$1.47	\$1.62	\$1.77	\$1.92	\$2.07	\$2.22	\$2.37	\$2.52	\$2.67
6 tokens	14 tokens	\$0.84	\$0.99	\$1.14	\$1.29	\$1.44	\$1.59	\$1.74	\$1.89	\$2.04	\$2.19	\$2.34	\$2.49	\$2.64
5 tokens	15 tokens	\$0.81	\$0.96	\$1.11	\$1.26	\$1.41	\$1.56	\$1.71	\$1.86	\$2.01	\$2.16	\$2.31	\$2.46	\$2.61
4 tokens	16 tokens	\$0.78	\$0.93	\$1.08	\$1.23	\$1.38	\$1.53	\$1.68	\$1.83	\$1.98	\$2.13	\$2.28	\$2.43	\$2.58
3 tokens	17 tokens	\$0.74	\$0.89	\$1.04	\$1.19	\$1.34	\$1.49	\$1.64	\$1.79	\$1.94	\$2.09	\$2.24	\$2.39	\$2.54
2 tokens	18 tokens	\$0.70	\$0.85	\$1.00	\$1.15	\$1.30	\$1.45	\$1.60	\$1.75	\$1.90	\$2.05	\$2.20	\$2.35	\$2.50
1 token	19 tokens	\$0.65	\$0.80	\$0.95	\$1.10	\$1.25	\$1.40	\$1.55	\$1.70	\$1.85	\$2.00	\$2.15	\$2.30	\$2.45
0 tokens	20 tokens	\$0.60	\$0.75	\$0.90	\$1.05	\$1.20	\$1.35	\$1.50	\$1.65	\$1.80	\$1.95	\$2.10	\$2.25	\$2.40