Instructions (Translated from Spanish)²⁴

Welcome

Dear participant, thank you for taking part in this experiment. It will last at most 90 minutes. If you read the following instructions carefully, you can – depending on your decisions – earn some more money in addition to the 3 Euro show-up fee, which you can keep in any case. In order to ensure that the experiment takes place in an optimal setting, we would like to ask you to abide to the following rules during the whole experiment:

- do not communicate with your fellow students!
- do not forget to switch off your mobile phone!
- read the instructions carefully. If something is not well explained or you have any question now or at any time during the experiment, then ask one of the experimenters. Do, however, not ask out loud, raise your hand instead. We will clarify questions privately.
- you may take notes on this instruction sheet if you wish.
- after the experiment, remain seated till we paid you off.

If you do not obey the rules, the data becomes useless for us. In that case, we will have to exclude you from this experiment and you will not receive any compensation. Also, note that all participants receive the same instructions.

The Experiment

This experiment consists of two phases. Now, we will only introduce the first phase. Once it has finished, we are going to explain the second phase. However, always remember the following very important points:

- 1. The two phases take place in a completely anonymous setting. So, you will neither know nor learn whom you are playing with.
- 2. You will only be paid for phase 1 or phase 2, but not for the combined results. At the end of the whole experiment, the participant playing at terminal 9 will determine which phase is payoff relevant by throwing a coin.
- 3. You will not receive any feedback about your decision or the decision of your coplayers until the very end of the experiment.
- 4. We will not speak of Euro during the experiment, but rather of ECU (experimental currency units). Your whole income will first be calculated in ECU. At the end of the experiment, the total amount you have earned will be converted to Euro. We will always indicate the exchange rate between ECU and Euro.

²⁴We first provide the full instructions for GS_u . After that, we only provide the instructions for the "Second Phase" of other three treatments, since the rest of the instructions are exactly as in GS_u .

The First Phase

First we introduce you to the basic decision situation. Then, you will learn how the experiment is conducted. Note that if phase 1 is randomly selected for payment, then you will receive **4 Euro** for every **ECU** earned during this phase.

The First Decision Environment

In the first phase of the experiment, your basic task is to choose several times between two lottery tickets that are denoted *Option A* and *Option B*, respectively. In particular, lottery ticket *A* gives you a monetary payoff of x_A ECU with probability $p_x(A)$ and a monetary payoff of y_A ECU with the remaining probability $p_y(A) = 1 - p_x(A)$. Similarly, lottery ticket *B* gives a you a monetary payoff of x_B ECU with probability $p_x(B)$ and a monetary payoff of y_B ECU with probability $p_y(B) = 1 - p_y(B)$. As a simple example consider the lottery ticket *A* which is such that you get 5 ECU in 3 out of 10 cases and 10 ECU in 7 out of ten cases. Then, $x_A = 5.00$ ECU, $p_x(A) = 0.3$, $y_A = 10.00$ ECU and $p_y(A) = 0.7$.

The First Experiment

The first phase includes the basic decision environment just described to you. In total, there are ten pairs of lottery tickets; so, you have to make ten choices. In all ten situations, monetary payoffs are such that $x_A = 2.00$ ECU, $x_B = 3.85$ ECU, $y_A = 1.60$ ECU, and $y_B = 0.10$ ECU. However, the probabilities with which you are going to get each prize change across situations. The following figure shows the computer screen you are going to encounter during the experiment.

Situations	Option A	Option B	Your Choi
Situation 1	in 1 out of 10 cases you get 2.00 ECU and in 9 out of 10 cases you get 1.60 ECU	in 1 out of 10 cases you get 3.85 ECU and in 9 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 2	in 2 out of 10 cases you get 2.00 ECU and in 8 out of 10 cases you get 1.60 ECU	in 2 out of 10 cases you get 3.85 ECU and in 8 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 3	in 3 out of 10 cases you get 2.00 ECU and in 7 out of 10 cases you get 1.60 ECU	in 3 out of 10 cases you get 3.85 ECU and in 7 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 4	in 4 out of 10 cases you get 2.00 ECU and in 6 out of 10 cases you get 1.60 ECU	in 4 out of 10 cases you get 3.85 ECU and in 6 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 5	in 5 out of 10 cases you get 2.00 ECU and in 5 out of 10 cases you get 1.60 ECU	in 5 out of 10 cases you get 3 85 ECU and in 5 out of 10 cases you get 0.10 ECU	 Option A Option B
Situation 6	in 6 out of 10 cases you get 2.00 ECU and in 4 out of 10 cases you get 1.60 ECU	in 6 out of 10 cases you get 3 85 ECU and in 4 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 7	in 7 out of 10 cases you get 2.00 ECU and in 3 out of 10 cases you get 1.60 ECU	in 7 out of 10 cases you get 3.85 ECU and in 3 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 8	in 8 out of 10 cases you get 2.00 ECU and in 2 out of 10 cases you get 1.60 ECU	in 8 out of 10 cases you get 3.85 ECU and in 2 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 9	in 9 out of 10 cases you get 2.00 ECU and in 1 out of 10 cases you get 1.60 ECU	in 9 out of 10 cases you get 3.85 ECU and in 1 out of 10 cases you get 0.10 ECU	C Option A C Option B
Situation 10	in 10 out of 10 cases you get 2.00 ECU and in 0 out of 10 cases you get 1.60 ECU	in 10 out of 10 cases you get 3.85 ECU and in 0 out of 10 cases you get 0.10 ECU	C Option A C Option B

The computer screen presents all ten situations simultaneously with the lottery ticket A to the left of lottery ticket B. For example, in situation number 4 lottery ticket A gives you 2.00 ECU in 4 out of 10 cases and 1.60 ECU in 6 out of 10 cases. You choose between the lottery tickets by clicking the desired option on the right hand side of the screen. Once you have made all ten choices, click on the button "Continue".

If it happens that phase 1 is randomly selected for payment, one of the ten pairs of lotteries is randomly selected by the computer (each pair is selected with the same probability). Given this random draw, your payoff is then determined by using the lottery you have chosen in that particular situation. For example, if situation 9 is randomly selected and you have chosen option A in that case, then you get 2 ECU with probability 0.9 and 1.6 ECU with probability 0.1. Finally, please answer the question below. Once ready, please raise your hand.

QUESTION: Suppose lottery ticket A is such that it gives you 3 ECU with probability 0.7 and 1 ECU with probability 0.3. Similarly, lottery ticket B gives you 3 ECU with probability 0.7 and 2 ECU with probability 0.3. Which option do you choose?

The Second Phase (GS_u)

First we introduce you to the basic decision situation. Next, you will find control questions that help you to understand the situation better. Finally, you will learn how the experiment is conducted. Note that if phase 2 is randomly selected for payment, then you will receive **40 Eurocents** for every **ECU** earned during this phase.

The Second Decision Environment

The basic decision environment in the second phase of the experiment is as follows: There are three teachers —let us call them teacher 1, teacher 2, and teacher 3— who are looking for a new job. There are three schools in town (denoted X, Y, and Z) and every school happens to have one open teaching slot. Since the schools turn out to differ in their location and quality, teachers have different opinions of where they want to teach. The desirability of schools in terms of location and quality is expressed in the following table:

	Teacher 1	Teacher 2	Teacher 3
Most preferred school	X	Y	Z
Second most preferred school	Y	Z	X
Least preferred school	Z	X	Y

For example, teacher 1 prefers school X to school Y and school Y to school Z. Schools when offering positions consider the quality of each applicant and the experience they have. On this basis, they build a priority ordering where all teachers are ranked. The following table summarizes the priority ordering of each school.

	School X	School Y	School Z
Best candidate	2	3	1
Second best candidate	3	1	2
Worst candidate	1	2	3

For example, in school Z, teacher 1 is ranked first, teacher 2 is ranked second, and teacher 3 is ranked third. To decide which teacher gets offered a position at which school, teachers are first asked to submit their ranking of schools; that is, they have to indicate at which school they would like to work most, at which school they would like to work second most, and at which school they would like to work least. Observe that teachers can indicate whatever ranking they like, it does not have to coincide with the actual preferences. Given the submitted rankings, the following procedure is used to assign teachers to schools:

- 1. Every teacher applies to the school she/he listed first.
- 2. Each school temporarily accepts the applicant with the highest priority and rejects all other applicants (if any).

- 3. Whenever a teacher is rejected at a school, she/he applies to the next highest listed school.
- 4. Whenever a school receives new applications (from teachers that have been rejected in a previous round by other schools), these applications are considered together with the previously retained application (if any). Among the previously retained application and new applications, the applicant with the highest priority is temporarily accepted, all others are rejected.
- 5. This process is repeated until no more applications can be rejected and the allocation is finalized. Each teacher is assigned the position at the school that holds her/his application at the end of the process.

Example

Before we explain how the experiment is conducted, we would like to ask you to go over the following example. It helps illustrating how the allocation mechanism works. Once ready, please raise your hand, and one of the experimenters will check your answers. In case of questions, please contact any experimenter as well.

In the example, there are three teachers (1, 2, and 3) and three schools (A, B, and C) who have one teaching position each. Suppose that the *submitted* school rankings are as follows:

	Teacher 1	Teacher 2	Teacher 3
1st ranked school	В	C	В
2nd ranked school	C	A	C
3rd ranked school	A	B	A

Also, suppose that the priority orderings of the schools are given by the following table:

	School A	School B	School C
1st ranked teacher	2	2	1
2nd ranked teacher	3	1	3
3rd ranked teacher	1	3	2

Please, answer the following questions:

In the first round of the procedure, every teacher applies to the school she/he ranked first; that is, teacher 1 applies to school ______, teacher 2 applies to school ______, and teacher 3 applies to school ______. Given these applications, every school temporarily accepts the applicant with the highest priority and rejects all other teachers. Hence, school B retains teacher ______ and rejects teacher ______, while school C retains teacher ______.

- In the second round, all teachers rejected in the first round apply to the school they ranked second; that is, teacher 3 applies to school ______. Now, schools compare the new applicants with the previously retained teachers. As a consequence, school C retains teacher ______ and rejects teacher ______.
- 3. In the third round, the teacher that got rejected in the second round applies to the next highest ranked school. Hence, teacher _____ applies to school _____. Since this school has still a free place all teachers are assigned to a school and the mechanism stops.
- 4. The final allocation of teachers to school is therefore as follows:
 - Teacher _____ gets a job at A.
 - Teacher _____ gets a job at *B*.
 - Teacher _____

ound	1						remaining time [sec]: 293
		Payoffs				Priorities	
	Teacher 1	Teacher 2	Teacher 3		School X	School Y	School Z
	School X (30 ECU)	School Y (30 ECU)	School Z (30 ECU)		Teacher 2	Teacher 3	Teacher 1
	School Y (20 ECU)	School Z (20 ECU)	School X (20 ECU)		Teacher 3	Teacher 1	Teacher 2
	School Z (10 ECU)	School X (10 ECU)	School Y (10 ECU)		Teacher 1	Teacher 2	Teacher 3
				You are teacher: 1			
				Please submit your ranking:			
	Highest ra	anked school		Second highest ranked school		Last rank	ed school
	C School			C School X C School Y		C School) C School)	
	C School			C School Z		C School Z	
				CONTINUE			

Finally, observe that if the second phase is randomly chosen to be payoff relevant, then the computer is going to determine randomly one of the three situations for payment (every situation is randomly selected with the same probability). Also, note that you will never receive any feedback about decisions until the very end of the experiment. Please answer the following final question. Once ready, please raise your hand.

QUESTION: Suppose that you prefer school X over school Z over school Y. Assume also that you submit the following ranking of schools: X is listed higher than Y, which, in turn, is listed higher than Z. Using the same payoffs in ECU as in the example on the computer screen above, what will be your final payoff if you finally end up working at school Y?

The Second Phase (GS_c)

First we introduce you to the basic decision situation. Next, you will find control questions that help you to understand the situation better. Finally, you will learn how the experiment is conducted. Note that if phase 2 is randomly selected for payment, then you will receive **40 Eurocents** for every **ECU** earned during this phase.

The Second Decision Environment

The basic decision environment in the second phase of the experiment is as follows: There are three teachers —let us call them teacher 1, teacher 2, and teacher 3— who are looking for a new job. There are three schools in town (denoted X, Y, and Z) and every school happens to have one open teaching slot. Since the schools turn out to differ in their location and quality, teachers have different opinions of where they want to teach. The desirability of schools in terms of location and quality is expressed in the following table:

	Teacher 1	Teacher 2	Teacher 3
Most preferred school	X	Y	Z
Second most preferred school	Y	Z	X
Least preferred school	Z	X	Y

For example, teacher 1 prefers school X to school Y and school Y to school Z. Schools when offering positions consider the quality of each applicant and the experience they have. On this basis, they build a priority ordering where all teachers are ranked. The following table summarizes the priority ordering of each school.

	School X	School Y	School Z
Best candidate	2	3	1
Second best candidate	3	1	2
Worst candidate	1	2	3

For example, in school Z, teacher 1 is ranked first, teacher 2 is ranked second, and teacher 3 is ranked third. To decide which teacher gets offered a position at which school, teachers are first asked to submit their ranking of schools; that is, they have to indicate at which school they would like to work most and at which school they would like to work second most. Observe that teachers can indicate whatever ranking they like, it does not have to coincide with the actual preferences. Given the submitted rankings, the following procedure is used to assign teachers to schools:

- 1. Every teacher applies to the school she/he listed first.
- 2. Each school temporarily accepts the applicant with the highest priority and rejects all other applicants (if any).

- 3. Whenever a teacher is rejected at a school, she/he applies to the next highest listed school.
- 4. Whenever a school receives new applications (from teachers that have been rejected in a previous round by other schools), these applications are considered together with the previously retained application (if any). Among the previously retained application and new applications, the applicant with the highest priority is accepted, all others are rejected.
- 5. This process finishes when no more applications can be rejected or no teacher can send more applications. Each teacher is assigned the position at the school that holds her/his application at the end of the process. If a teacher's application was rejected by every school in her/his ranking, she/he will be unemployed.

Example

Before we explain how the experiment is conducted, we would like to ask you to go over the following example. It helps illustrating how the allocation mechanism works. Once ready, please raise your hand, and one of the experimenters will check your answers. In case of questions, please contact any experimenter as well.

In the example, there are three teachers (1, 2, and 3) and three schools (A, B, and C) who have one teaching position each. Suppose that the *submitted* school rankings are as follows:

	Teacher 1	Teacher 2	Teacher 3
1st ranked school	В	C	В
2nd ranked school	C	A	C

Also, suppose that the priority orderings of the schools are given by the following table:

	School A	School B	School C
1st ranked teacher	2	2	1
2nd ranked teacher	3	1	3
3rd ranked teacher	1	3	2

Please, answer the following questions:

In the first round of the procedure, every teacher applies to the school she/he ranked first; that is, teacher 1 applies to school ______, teacher 2 applies to school ______, and teacher 3 applies to school ______. Given these applications, every school temporarily accepts the applicant with the highest priority and rejects all other teachers. Hence, school B retains teacher ______ and rejects teacher ______, while school C retains teacher ______.

- 2. In the second round, all teachers rejected in the first round apply to the school they ranked second; that is, teacher 3 applies to school ______. Now, schools compare the new applicants with the previously retained teachers. As a consequence, school *C* retains teacher ______ and rejects teacher ______.
- 3. In the third round, the teacher that got rejected in the second round applies to the next highest ranked school. Hence, teacher _____ applies to school _____. Since this school has still a free place all teachers are assigned to a school and the mechanism stops.
- 4. The final allocation of teachers to school is therefore as follows:
 - Teacher <u>gets</u> a job at A.
 - Teacher _____ gets a job at B.
 - Teacher $_$ gets a job at C.

The Second Experiment

In the beginning of the second phase, the computer randomly divides the participants into groups of 3. The assignment process is random and anonymous, so no participant will know who is in which group. Participants within the same group will only play among themselves. Then, each participant in a group gets randomly assigned the role of a teacher in such a way that one group member will be in the role of teacher 1, another group member will be in the role of teacher 2, and the final group member will be in the role of teacher 3. Neither the division of participants into groups nor the assignment of roles within groups is going to change during the second phase.

The basic decision situation explained above will be played three times with varying payoffs. In what follows, we will only explain the first payoff constellation in detail, the remaining two situations have a similar structure. In particular, the first payoff constellation is such that you receive 30 ECU if you end up at the **school you prefer most**, 20 ECU if you are assigned to your **second most preferred school**, and 10 ECU if you get a job at the **school you prefer least**. If you end up **unassigned** because all of your applications have been rejected, you receive 0 ECU. To clarify how the experiment proceeds, we will present next the computer screen you are going to encounter during the experiment.

On the top of the screen, we remind you of the preferences of the teachers over schools together with the material consequences and the priorities of schools over teachers. Below you see that you are assigned the role of teacher 1. Consequently, your payoff is highest if you end up working at school X, it second highest if you work at school Y, and it is lowest if you finally get a job at school Z. Remember that you will receive 0 ECU in case all of your applications are rejected.

At the bottom of the screen, you are asked to submit a ranking of schools. Remember that you are allowed to submit any ranking you want. On the left hand side you indicate the school that you rank first and on the right hand side you indicate the school you rank second. The submitted rankings are then used by the computer to determine (by

round	1						remaining time [sec]: 291
		Payoffs				Priorities	
	Teacher 1	Teacher 2	Teacher 3		School X	School Y	School Z
	School X (30 ECU)	School Y (30 ECU)	School Z (30 ECU)		Teacher 2	Teacher 3	Teacher 1
	School Y (20 ECU)	School Z (20 ECU)	School X (20 ECU)		Teacher 3	Teacher 1	Teacher 2
	School Z (10 ECU)	School X (10 ECU)	School Y (10 ECU)		Teacher 1	Teacher 2	Teacher 3
				You are teacher 1			
				Please, submit your ranking			
	Highostra	inked school		i anting		Second hig	hestranked
	C School					school C School)	c
	C School C School					C School 2 C School 2	
				CONTINUE			

means of the procedure presented before) the final assignment of teachers to schools. Also, note that you will never receive any feedback about decisions until the very end of the experiment.

Finally, observe that if the second phase is randomly chosen to be payoff relevant, then the computer is going to determine randomly one of the three situations for payment (every situation is randomly selected with the same probability). Please answer the following final question. Once ready, please raise your hand.

QUESTION: Suppose that you prefer school X over school Z over school Y. Assume also that you submit the following ranking of schools: X is ranked first and school Y is ranked second. Using the same payoffs in ECU as in the example on the computer screen above, what will be your final payoff if you finally end up working at school Y?

The Second Phase (BOS_u)

First we introduce you to the basic decision situation. Next, you will find control questions that help you to understand the situation better. Finally, you will learn how the experiment is conducted. Note that if phase 2 is randomly selected for payment, then you will receive **40 Eurocents** for every **ECU** earned during this phase.

The Second Decision Environment

The basic decision environment in the second phase of the experiment is as follows: There are three teachers —let us call them teacher 1, teacher 2, and teacher 3— who are looking for a new job. There are three schools in town (denoted X, Y, and Z) and every school happens to have one open teaching slot. Since the schools turn out to differ in their location and quality, teachers have different opinions of where they want to teach. The desirability of schools in terms of location and quality is expressed in the following table:

	Teacher 1	Teacher 2	Teacher 3
Most preferred school	X	Y	Z
Second most preferred school	Y	Z	X
Least preferred school	Z	X	Y

For example, teacher 1 prefers school X to school Y and school Y to school Z. Schools when offering positions consider the quality of each applicant and the experience they have. On this basis, they build a priority ordering where all teachers are ranked. The following table summarizes the priority ordering of each school.

	School X	School Y	School Z
Best candidate	2	3	1
Second best candidate	3	1	2
Worst candidate	1	2	3

For example, in school Z, teacher 1 is ranked first, teacher 2 is ranked second, and teacher 3 is ranked third. To decide which teacher gets offered a position at which school, teachers are first asked to submit their ranking of schools; that is, they have to indicate at which school they would like to work most, at which school they would like to work second most, and at which school they would like to work least. Observe that teachers can indicate whatever ranking they like, it does not have to coincide with the actual preferences. Given the submitted rankings, the following procedure is used to assign teachers to schools: Step 1

- 1. Every teacher applies to the school she/he listed first.
- 2. Each school accepts the applicant with the highest priority and rejects all other applicants (if any).

Step 2

- 1. Whenever a teacher is rejected at a school, an application is sent to the second listed school.
- 2. A school that received one or more applications in step 1 rejects the applications received in step 2 (if any). A school that did not receive any applications in step 1 accepts the applicant with the highest priority and rejects the other application received (if any).

Step 3

- 1. If a teacher's application is rejected in step 2, she/he is assigned to the school she/he listed third. The other teachers are assigned to the schools that accepted their applications.
- 2. If no teacher's application was rejected in step 2, each teacher is assigned to the school that accepted her/his application.

Example

Before we explain how the experiment is conducted, we would like to ask you to go over the following example. It helps illustrating how the allocation mechanism works. Once ready, please raise your hand, and one of the experimenters will check your answers. In case of questions, please contact any experimenter as well.

In the example, there are three teachers (1,2, and 3) and three schools (A, B, and C) who have one teaching position each. Suppose that the *submitted* school rankings are as follows:

	Teacher 1	Teacher 2	Teacher 3
1st ranked school	B	C	B
2nd ranked school	C	A	C
3rd ranked school	A	B	A

Also, suppose that the priority orderings of the schools are given by the following table:

	School A	School B	School C
1st ranked teacher	2	2	1
2nd ranked teacher	3	1	3
3rd ranked teacher	1	3	2

Please, answer the following questions: Step 1

1. In the first round of the procedure, every teacher applies to the school she/he ranked first; that is, teacher 1 applies to school ______, teacher 2 applies to school ______, and teacher 3 applies to school ______.

2. Given these applications, every school accepts the applicant with the highest priority and rejects all other teachers. Hence, school *B* accepts teacher _____ and rejects teacher _____ and rejects teacher _____ .

Step 2

- 1. In the second round, all teachers rejected in the first round apply to the school they ranked second; that is, teacher 3 applies to school _____.
- 2. Each school that received an application in step 2 rejects the applications received in step 2 (if any). As a consequence, school _____ rejects teacher _____.

Step 3

In the third round, the teacher that got rejected in the second round is assigned to his third ranked school. Hence, teacher ______ is assigned to school ______. The other teachers are assigned to the schools that accepted their applications. The final allocation of teachers to school is therefore as follows: teacher ______ gets a job at A; teacher ______ gets a job at B; and teacher ______ gets a job at C.

The Second Experiment

In the beginning of the second phase, the computer randomly divides the participants into groups of 3. The assignment process is random and anonymous, so no participant will know who is in which group. Participants within the same group will only play among themselves. Then, each participant in a group gets randomly assigned the role of a teacher in such a way that one group member will be in the role of teacher 1, another group member will be in the role of teacher 2, and the final group member will be in the role of teacher 3. Neither the division of participants into groups nor the assignment of roles within groups is going to change during the second phase.

The basic decision situation explained above will be played three times with varying payoffs. In what follows, we will only explain the first payoff constellation in detail, the remaining two situations have a similar structure. In particular, the first payoff constellation is such that you receive 30 ECU if you end up at the school you prefer most, 20 ECU if you are assigned to your second most preferred school, and 10 ECU if you get a job at the school you prefer least. To clarify how the experiment proceeds, we will present next the computer screen you are going to encounter during the experiment.

On the top of the screen, we remind you of the preferences of the teachers over schools together with the material consequences and the priorities of schools over teachers. Below you see that you are assigned the role of teacher 1. Consequently, your payoff is highest if you end up working at school X, it second highest if you work at school Y, and it is lowest if you finally get a job at school Z.

At the bottom of the screen, you are asked to submit a ranking of schools. Remember that you are allowed to submit any ranking you want. On the left hand side you indicate the school that you rank first, in the middle you indicate the school you rank second, and to the right hand side you indicate the school you rank last. The submitted rankings are

round	1						remaining time [sec]: 293
		Payoffs				Priorities	
	Teacher 1	Teacher 2	Teacher 3		School X	School Y	School Z
	School X (30 ECU)	School Y (30 ECU)	School Z (30 ECU)		Teacher 2	Teacher 3	Teacher 1
	School Y (20 ECU)	School Z (20 ECU)	School X (20 ECU)		Teacher 3	Teacher 1	Teacher 2
	School Z (10 ECU)	School X (10 ECU)	School Y (10 ECU)		Teacher 1	Teacher 2	Teacher 3
				You are teacher: 1			
				Please submit your ranking:			
	Highest ra	inked school		Second highest ranked school		Last rank	ed school
	C School			C School X		C School X	
	C School C School			C School Y C School Z		C School Y C School Z	
				CONTINUE			

then used by the computer to determine (by means of the procedure presented before) the final assignment of teachers to schools.

Finally, observe that if the second phase is randomly chosen to be payoff relevant, then the computer is going to determine randomly one of the three situations for payment (every situation is randomly selected with the same probability). Also, note that you will never receive any feedback about decisions until the very end of the experiment. Please answer the following final question. Once ready, please raise your hand.

QUESTION: Suppose that you prefer school X over school Z over school Y. Assume also that you submit the following ranking of schools: X is listed first, Y is listed second, and Z is listed third. Using the same payoffs in ECU as in the example on the computer screen above, what will be your final payoff if you finally end up working at school Y?

The Second Phase (BOS_c)

First we introduce you to the basic decision situation. Next, you will find control questions that help you to understand the situation better. Finally, you will learn how the experiment is conducted. Note that if phase 2 is randomly selected for payment, then you will receive **40 Eurocents** for every **ECU** earned during this phase.

The Second Decision Environment

The basic decision environment in the second phase of the experiment is as follows: There are three teachers —let us call them teacher 1, teacher 2, and teacher 3— who are looking for a new job. There are three schools in town (denoted X, Y, and Z) and every school happens to have one open teaching slot. Since the schools turn out to differ in their location and quality, teachers have different opinions of where they want to teach. The desirability of schools in terms of location and quality is expressed in the following table:

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For example, teacher 1 prefers school X to school Y and school Y to school Z. Schools when offering positions consider the quality of each applicant and the experience they have. On this basis, they build a priority ordering where all teachers are ranked. The following table summarizes the priority ordering of each school.

	School X	School Y	School Z
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For example, in school Z, teacher 1 is ranked first, teacher 2 is ranked second, and teacher 3 is ranked third. To decide which teacher gets offered a position at which school, teachers are first asked to submit their ranking of schools; that is, they have to indicate at which school they would like to work most and at which school they would like to work second most. Observe that teachers can indicate whatever ranking they like, it does not have to coincide with the actual preferences. Given the submitted rankings, the following procedure is used to assign teachers to schools: Step 1

- 1. Every teacher applies to the school she/he listed first.
- 2. Each school accepts the applicant with the highest priority and rejects all other applicants (if any).

Step 2

- 1. Whenever a teacher is rejected at a school, an application is sent to the second listed school.
- 2. A school that received one or more applications in step 1 rejects the applications received in step 2 (if any). A school that did not receive any applications in step 1 accepts the applicant with the highest priority and rejects the other application received (if any).

Step 3

- 1. If a teacher's application is rejected in step 2, she/he is left unassigned. The other teachers are assigned to the schools that accepted their applications.
- 2. If no teacher's application was rejected in step 2, each teacher is assigned to the school that accepted her/his application.

Example

Before we explain how the experiment is conducted, we would like to ask you to go over the following example. It helps illustrating how the allocation mechanism works. Once ready, please raise your hand, and one of the experimenters will check your answers. In case of questions, please contact any experimenter as well.

In the example, there are three teachers (1,2, and 3) and three schools (A, B, and C) who have one teaching position each. Suppose that the *submitted* school rankings are as follows:

	Teacher 1	Teacher 2	Teacher 3
1st ranked school	В	C	В
2nd ranked school	C	A	A

	School A	School B	School C
1st ranked teacher	2	2	1
2nd ranked teacher	3	1	3
3rd ranked teacher	1	3	2

Please, answer the following questions: Step 1 $\,$

1. In the first round of the procedure, every teacher applies to the school she/he ranked first; that is, teacher 1 applies to school ______, teacher 2 applies to school ______, and teacher 3 applies to school ______.

2. Given these applications, every school accepts the applicant with the highest priority and rejects all other teachers. Hence, school *B* accepts teacher _____ and rejects teacher _____ , while school *C* accepts teacher _____ .

Step 2

- 1. In the second round, all teachers rejected in the first round apply to the school they ranked second; that is, teacher 3 applies to school _____.
- 2. Each school that received an application in step 2 rejects the applications received in step 2 (if any). School _____ did not receive any applications in step 1, but receives the application of teacher _____ in step 2. Since this is the only application it receives, it accepts the application.

Step 3

Since no teacher was rejected in step 2, each teacher is assigned to the school that accepted her/his application. The final allocation of teachers to school is therefore as follows: teacher _____ gets a job at A; teacher _____ gets a job at B; and teacher _____ gets a job at C.

The Second Experiment

In the beginning of the second phase, the computer randomly divides the participants into groups of 3. The assignment process is random and anonymous, so no participant will know who is in which group. Participants within the same group will only play among themselves. Then, each participant in a group gets randomly assigned the role of a teacher in such a way that one group member will be in the role of teacher 1, another group member will be in the role of teacher 2, and the final group member will be in the role of teacher 3. Neither the division of participants into groups nor the assignment of roles within groups is going to change during the second phase.

The basic decision situation explained above will be played three times with varying payoffs. In what follows, we will only explain the first payoff constellation in detail, the remaining two situations have a similar structure. In particular, the first payoff constellation is such that you receive 30 ECU if you end up at the school you prefer most, 20 ECU if you are assigned to your second most preferred school, and 10 ECU if you get a job at the school you prefer least. If you are unassigned because all of your applications got rejected, you receive 0 ECU. To clarify how the experiment proceeds, we will present next the computer screen you are going to encounter during the experiment.

On the top of the screen, we remind you of the preferences of the teachers over schools together with the material consequences and the priorities of schools over teachers. Below you see that you are assigned the role of teacher 1. Consequently, your payoff is highest if you end up working at school X, it second highest if you work at school Y, and it is lowest if you finally get a job at school Z. Remember that you get 0 ECU in case all of your applications get rejected.

At the bottom of the screen, you are asked to submit a ranking of schools. Remember that you are allowed to submit any ranking you want. On the left hand side you indicate

1						remaining time [sec]: 291	
	Payoffs				Priorities		
Teacher 1	Teacher 2	Teacher 3		School X	School Y	School Z	
School X (30 ECU)	School Y (30 ECU)	School Z (30 ECU)		Teacher 2	Teacher 3	Teacher 1	
School Y (20 ECU)	School Z (20 ECU)	School X (20 ECU)		Teacher 3	Teacher 1	Teacher 2	
School Z (10 ECU)	School X (10 ECU)	School Y (10 ECU)		Teacher 1	Teacher 2	Teacher 3	
			You are teacher 1				
			Please, submit your ranking				
Highest ra	inked school				Second hig school	hestranked	
C School	Y			C School X C School Y C School Z			
			CONTINUE				
	Teacher 1 School X (30 ECU) School Y (20 ECU) School Z (10 ECU) Highest ra C School C School	Payoffs Teacher 1 Teacher 2 School X (30 ECU) School Y (30 ECU) School Y (20 ECU) School Z (20 ECU)	Payoffs Teacher 1 Teacher 2 Teacher 3 School X (30 ECU) School X (30 ECU) School Z (30 ECU) School Y (20 ECU) School Z (20 ECU) School X (20 ECU) School Z (10 ECU) School X (10 ECU) School Y (10 ECU) School Z (10 ECU) School X (10 ECU) School Y (10 ECU)	Payoffs Teacher 1 Teacher 2 Teacher 3 School X (30 ECU) School Z (30 ECU) School Z (20 ECU) School Z (10 ECU) School X (10 ECU) School X (10 ECU) School Z (10 ECU) School X (10 ECU) School Y (10 ECU) You are teacher 1 Highest ranked school C School X C School X C School X C School X C School X	Payoffs Teacher 1 Teacher 2 Teacher 3 School X School X (30 ECU) School Z (30 ECU) Teacher 2 School X (30 ECU) School Z (20 ECU) School X (20 ECU) Teacher 3 School Z (10 ECU) School X (20 ECU) School X (20 ECU) Teacher 3 School Z (10 ECU) School X (10 ECU) School Y (10 ECU) Teacher 1 You are teacher 1 Please, submit your ranking Highest ranked school C School X C School X C School X C School X C School X C School X C School X C School X	Payoffs Priorities Teacher 1 Teacher 2 Teacher 3 School X School Y School X (30 ECU) School Z (30 ECU) School Z (30 ECU) Teacher 3 Teacher 3 School X (30 ECU) School Z (20 ECU) School X (20 ECU) Teacher 3 Teacher 1 School Z (10 ECU) School X (10 ECU) School X (10 ECU) Teacher 1 Teacher 2 You are teacher 1 Teacher 2 Teacher 3 Please, submit your ranking Second hig school School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X C School X	

the school that you rank first and to the right hand side you indicate the school you rank second. The submitted rankings are then used by the computer to determine (by means of the procedure presented before) the final assignment of teachers to schools.

Finally, observe that if the second phase is randomly chosen to be payoff relevant, then the computer is going to determine randomly one of the three situations for payment (every situation is randomly selected with the same probability). Also, note that you will never receive any feedback about decisions until the very end of the experiment. Please answer the following final question. Once ready, please raise your hand.

QUESTION: Suppose that you prefer school X over school Z over school Y. Assume also that you submit the following ranking of schools: X is listed first and Y is listed second. Using the same payoffs in ECU as in the example on the computer screen above, what will be your final payoff if you finally end up working at school Y?