GENERAL INFORMATION

Thank you for being part of our research. You will be taking part in a study of labor markets. If you read these instructions carefully, you may earn a significant sum of money.

Each of you will be randomly assigned to one of two groups: "managers" and "employees." These groups will be physically separate at the start of the session. Whether you are a manager or an employee is noted at the top right hand corner of this page. Employees work in teams. Each employee is assigned to three different teams in each market period.

Each market period will have three stages as follows:

<u>Stage 1</u>: Each manager assigns a wage to an employee. The manager records the wage assigned to his or her employee on the record sheet provided. A monitor will record the wage chosen by each manager and will write all wages on the board for the employees to see.

<u>Stage 2</u>: The monitor will record (on the employee's record sheet) the wages received by the employee. The employee then chooses the quantity of work to provide.

<u>Stage 3</u>: The monitor informs each manager about the amount of work provided by his or her employee.

As a worker your income depends on the wage received less the cost of the quantity of work provided. As a manager, your income depends on the wages paid and the quantity of work provided. Details for computing employee and mangers earnings will be provided below.

Please record (on your record sheet) the wage you receive in each period and the quantity of work you choose. After this you will calculate the income you have earned. At this point the first period of the labor market will be over. Over the course of the session, you will not be matched twice with the same manager. Further, you will not know with whom you have been matched in any of the periods. Your total income for the participation in this market will be the sum of the earnings in each of the ten periods.

Details on How the Labor Market Works

- 1. At the beginning of each period we will open the labor market. In Stage 1 each manager chooses a wage for his or her employee. The wage chosen by each manager will be written on the board. Employees must accept the wage assigned, forming a labor contract with the employer.
- Employees must immediately record the wage on the decision sheet for that period.
 Managers must do this as well.
- 3. No manager will know with which employees s/he has concluded a contract, and no employee will know the identity of the manager.
- 4. After all wages have been communicated to each employee, Stage 2 begins with workers choosing a quantity of work to provide in each team he/she is assigned to. You will record the quantity of work on the record sheets provided.
- 5. In Stage 3 the quantity of work provided is sent to the manager who can then compute his or her earnings. Employees should not tell anyone what quantity of work they have chosen and managers should not tell anyone about the work level of their employees.

How do Employees Calculate Their Income in Each Period?

- 1. From the wage received you must subtract out the costs of the amount of work you provide.
- 2. You determine your quantity of work by choosing a number between 0.1 and 1.0 from the schedule below. The lowest amount of work you can choose is 0.1, 0.2 is a slightly higher amount, and so on up to 1.0, the highest amount.
- 3. The higher the quantity of work you choose, the better it is for the manager. That is, the higher the number you choose the higher the manager's income.
- 4. The higher the amount of work you choose, the higher your work-related costs. You can find out how these costs are related to quantity of work by looking in the schedule below.
- 5. Your income in Guilders will be determined by the following formula:

Income = Wage - Cost of Quantity of Work provided

Schedule of feasible amounts of work (AW) and corresponding work-related costs to employees (COST)

| AW | 0.1 | 0.2 | 0.3 | 0.4 | 0.5 | 0.6 | 0.7 | 0.8 | 0.9 | 1.0 |
|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| COST | 0 | 1 | 2 | 4 | 6 | 8 | 10 | 12 | 15 | 18 |

How do Managers Calculate their Income in Each Period?

1. Each manager receives from the experimenter 100 coupons from which to pay wages to an employee. If s/he assigns a wage of 100 Guilders, then s/he will have no income coupons left. If s/he assigns a wage of 70 Guilders then s/he will have 30 income coupons left. In general, each manager will have

100 coupons – wage paid

income coupons remaining after paying the wage.

2. How are the remaining coupons converted into Guilders? The number of coupons retained by the manager is multiplied by the quantity of work chosen by your employee. This is the manager's income in Guilders. Thus:

Manager's Income = Coupons Retained x Quantity of Work

Let's Have an Exercise

1. Let's assume that a manager, who has 100 Coupons, assigns a wage of 80 Guilders to the employee. At the second stage of this period, the employee chooses a quantity of work of 0.5.

What is the income for the employee and what is the manager's income?

Employee's Income = Guilders

Manager' s Income = Guilders

2. Let's assume that a manager, who has 100 Coupons, assigns a wage of 20 Guilders to the employee. At the second stage of this period, the employee chooses a quantity of work of 0.8.

What is the income for the employee and what is the manager's income?

Employee's Income = Guilders

Manager' s Income = Guilders

3. Now let's assume again that the manager assigns a wage of 20 Guilders. At the second stage of this period, the employee chooses a quantity of work of 0.1.

What is the income for the employee and what is the manager's income?

Employee's Income = Guilders

Manager' s Income = Guilders

Schedule of feasible amounts of work (AW) and corresponding work-related costs to employees (COST)

| AW | 0.1 | 0.2 | 0.3 | 0.4 | 0.5 | 0.6 | 0.7 | 0.8 | 0.9 | 1.0 |
|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| COST | 0 | 1 | 2 | 4 | 6 | 8 | 10 | 12 | 15 | 18 |

During the experiment your income will be calculated in "Guilders," which will be converted into dollars at the rate of:

20 Guilders = \$1

In addition, you will receive a \$5 payment for showing up for the experiment on time.

There will be a total of 10 market periods. Your total earnings for participating in the experiment will be the sum of your earnings in each of the ten market periods plus the \$5 participation fee. You will be paid privately.

Are there any questions?

EMPLOYEE RECORD SHEET

| Period 1 | |
|----------------------------|--------------------|
| Your Wage | Your Work Quantity |
| Your earnings for Period 1 | |
| Period 2 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 2 | |
| Period 3 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 3 | |
| Period 4 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 4 | |
| Period 5 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 5 | |
| Period 6 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 6 | |

| Period 7 | |
|-------------------------------|--------------------|
| Your Wage | Your Work Quantity |
| Your earnings for Period 7 | |
| Period 8 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 8 | |
| Period 9 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 9 | |
| Period 10 | |
| Your Wage | Your Work Quantity |
| Your earnings for Period 10 _ | |

MANAGER RECORD SHEET

| Period 1 | |
|----------------------------|------------------|
| Wage paid | Quantity of Work |
| Your earnings for Period 1 | |
| Period 2 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 2 | |
| Period 3 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 3 | |
| Period 4 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 4 | |
| Period 5 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 5 | |
| Period 6 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 6 | |

| Period 7 | |
|-------------------------------|------------------|
| Wage paid | Quantity of Work |
| Your earnings for Period 7 | |
| Period 8 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 8 | |
| Period 9 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 9 | |
| Period 10 | |
| Wage paid | Quantity of Work |
| Your earnings for Period 10 _ | |