

科目：個體經濟學

適用：經濟系三

考生注意：

1. 依次序作答，只要標明題號，不必抄題。
2. 答案必須寫在答案卷上，否則不予計分。
3. 限用藍、黑色筆作答；試題須隨卷繳回。

本 試 題  
共 / 頁  
第 / 頁

編號：621

1. Suppose that a consumer always consumes 2 spoons of sugar with each cup of coffee. If the price of sugar is  $p_1$  per spoonful and the price of coffee is  $p_2$  per cup and the consumer has  $m$  dollars to spend on coffee and sugar, how much will he or she want to purchase? (10 points)
2. If the consumer is consuming exactly two goods, and she is always spending all of her money, can both of them be inferior goods? (10 points)
3. When prices are  $(p_1, p_2) = (1, 2)$  a consumer demands  $(x_1, x_2) = (1, 2)$ , and when prices are  $(q_1, q_2) = (2, 1)$  the consumer demands  $(y_1, y_2) = (2, 1)$ . Is this behavior consistent with the model of maximizing behavior? (10 points)
4. What is the "the Law of Demand"? Please use substitution and income effect to interpret it. (10 points)
5. Suppose that the demand curve is given by  $D(p) = 10 - p$ . If the price changes from 4 to 6, what is the change in consumer's surplus? (10 points)
6. Suppose that the demand for a good is given by  $D(p) = 100/p$ . When the price is 20, what is the elasticity of demand? (10 points)
7. What is the effect of a subsidy in a market with horizontal supply curve? With a vertical supply curve? (10 points)
8. Suppose a firm is maximizing profits in the short run with variable factor  $x_1$  and fixed factor  $x_2$ . If the price of  $x_2$  goes down, what happen to firm's use of  $x_1$ ? What happens to the firm's level of profits? (10 points)
9. A firm has a cost function given by  $C(y) = 10y^2 + 1000$ . What is the supply curve? (10 points)
10. Will a monopoly ever provide a Pareto efficient level of output on its own? Explain your answer. (10 points)