## Final Exam Student Name:

Microeconomics, several versions
Early May, 2011
Instructions:
I) On your Scantron card you must print three things:

1) Full name clearly;
2) Day and time of your section (for example MW 9:10);
3) Notice the number I have written in ink in the upper right corner of your test? Write that number on the Scantron card. (This number tells me which version of the test you have.
Without it your test cannot be graded properly and you get no credit for your answers.)
II) Answer on your Scantron card, using a \#2 pencil.
III) Warning: SOME QUESTIONS MUST BE ANSWERED SEVERAL

TIMES! Such questions will begin with a phrase such as this:
Repeat this answer on lines 37, 38 and 39.
Remember to do it!
IV) You must turn in this written exam along with your Scantron card to avoid zero credit.

## Questions:

1. Assume that the income elasticity of demand for a good is greater than one. Then evaluate each of the following statements and choose the best answer from among the lettered choices below.
1) The good is a luxury good.
2) The good is a necessity.
3) The good is a normal good.
4) The good is an inferior good.
A) Only Statements 1 and 3 are correct.
B) Only Statement 1 is correct.
C) Only Statement 3 is correct.
D) Only Statement 2 is correct.
E) Only Statement 4 is correct.

Ans: A
2. If when the incomes of potential customers rise the quantity demand for the good declines:
A) this is impossible.
B) economists would call the good a "normal good".
C) economists would call the good a "luxury good".
D) the good is of low quality.
E) economists would call the good an "inferior good".

Ans: E
3. (Repeat your answer on Scantron line 32.) Evaluate the following statements and then choose from A) through E)

1) The Wealth of Nations was written by Milton Freidman.
2) The Wealth of Nations was written by John Maynard Keynes.
3) The Wealth of Nations was published just after the Great Depression.
4) Adam Smith is a famous economist who wrote in the mid 1800's.
A) None of statements 1, 2, 3 or 4 are true.
B) Statements 2 and 3 are true.
C) Statement 4 is the only statement which is true.
D) Only statement 1 is true.
E) Only statement 3 is true.

Ans: A
4. (Repeat your answer on Scantron line 33.) A firm has average variable costs of $\$ 60$ per unit, average fixed costs of $\$ 40$ per unit and can sell its output at $\$ 50$ per unit.
A) the firm should keep operating in the short run.
B) the firm should shut down in the short run.
C) the firm needs to increase output in the short run.
D) the firm needs to keep operating in the long run, since average revenue is more than average fixed costs.
E) no other answer is correct.

## Ans: B

5. (Repeat your answer on Scantron line 34.) Consider the following statements and then choose the best answer.
1) If the price elasticity of demand equals 2 , a reduction in price will increase total revenue from sales.
2) If the price elasticity of demand equals $1 / 2$, a reduction in price will reduce total revenue from sales.
3) If the price elasticity of demand equals 1 , a reduction in price will leave total revenue from sales unchanged.
4) Total revenue from sales depends on the elasticity of supply, not the elasticity of demand.
A) None of statements 1,2 or 3 are correct.
B) Only statement 3 is correct.
C) Only statements 1 and 2 are correct.
D) Only statements 1, 2 and 3 are correct.
E) Only statement 4 is correct.

Ans: D

Reference: Figure 12-2

6. (Repeat your answer on Scantron line 35.) Refer to the graph above. If this monopolist seeks to maximize profit, its economic profit will be:
A) some other amount.
B) $\$ 4,200$ per time period.
C) $\$ 2,400$ per time period.
D) $\$ 600$.
E) $\$ 850$.

Ans: C
Refer To: Figure 12-2
Difficulty: Easy
LO: 12-3
Page: 265
Skill: Application
Source: Old
Type: Graph
Feedback: At this price, marginal revenue equals marginal cost so profits are maximized.

Reference: Figure 12-9

7. Refer to the graph above. If this monopolist charges a single price to all its customers, the areas which represent the net welfare loss of this monopoly are:
A) A and B.
B) A and C.
C) B and C .
D) C and D .
E) At least B and C.

Ans: C
Refer To: Figure 12-9
Difficulty: Medium
LO: 12-5
Page: 270
Skill: Application
Source: Old
Type: Graph
Feedback: These areas are the lost consumer surplus and the lost producer surplus caused by monopoly.
8. (Repeat your answer on Scantron line 36.) Decide which of the following would cause the current period's supply of fax machines to increase, and then select the best answer from A) through E) below.

1) An increase in the demand for fax machines.
2) A decrease in the demand for fax machines.
3) A decline in the price of labor used to produce fax machines.
4) An new expectation that the market price of fax machines will fall a month from now.
A) Only statements 1 and 3 are correct.
B) Only statements 1, 3 and 4 are correct.
C) Only statements 3 and 4 are correct.
D) None of the other answers are correct.
E) Only statement 3 is correct.

Ans: C
9. You are studying a "well-run firm" which produces electric motors. You know the price of rotors is $\$ 2$ per rotor, and the marginal product of rotors is 1 motor per rotor. You also know the firm uses electricians, and the salary of electricians is $\$ 40$ per hour. What is the marginal product of electricians in this firm?
A) 5
B) 10
C) 15
D) 20
E) none of the above.

Ans: D

Reference: Table X1 Well run firm?
Table XI

10. (Repeat your answer on Scantron line 37.) A firm can produce its product using the four resources listed in Table X1 above. The marginal product of each resource, and the price at which it can be purchased, are listed for each resource. Choose the best answer.
A) This firm should increase its budget for resources 1 and 2.
B) This firm MIGHT be more profitable by completely eliminating the budgets for both resources 1 and 2.
C) This firm should reduce its budget for resource 1 , since that is the resource with the lowest price.
D) This firm should increase its budget for resource 1 and reduce its budget for the more expensive resource 2 .
E) This data is consistent with the idea that this firm is a successful, cost minimizing firm.

Ans: A

Refer To: Table X1 Well run firm?
11. (Repeat your answer on Scantron line 38.) Evaluate the following statements about "economic profit" as discussed in lecture:

1. A firm which is producing at an accounting profit may be operating with a negative "economic profit".
2. If a firm's "economic profit" is zero, the firm will be satisfied to continue producing at the same rate.
3. Economists use the term "economic profit" to mean the profit of a business as calculated by accountants using "generally accepted accounting principles".
A) Only statement 3 is wrong.
B) Only statement 2 is wrong.
C) Only statement 1 is wrong.
D) All three statements are correct.
E) Only one of the three statements is correct.

Ans: A
12. (Repeat your answer on Scantron line 39.) When US claims (US stocks, bonds or real estate, for example) are sold to citizens of a foreign country, this:
A) is called a capital inflow.
B) is called a capital outflow.
C) is an export of services
D) is an import of services
E) creates a balance of payments surplus.

Ans: A
Reference: Price for Regulated Monopolist

13. (Repeat your answer on Scantron line 40.) If this monopolist charges a monopolist's price, the price will be 2.40 , and if instead the price is regulated by government to eliminate the welfare cost of the monopoly, the price will be $\qquad$ .
A) none of the other answers are correct.
B) 2.00
C) 2.21
D) 2.25
E) 2.30

Ans: B
Refer To: Price for Regulated Monopolist
14. Movie theater chains in Austin charge several different prices for movie tickets.

1) They often charge lower prices for matinee tickets than Friday night tickets.
2) They often charge students a lower price than adults.

Select the best answer as discussed in lecture.
A) Both of these pricing strategies are evidence of price discrimination and therefore are evidence of monopoly behavior by movie theaters.
B) Neither of these pricing strategies is evidence of price discrimination nor evidence of monopoly.
C) Price discrimination can be practiced by both competitive firms and monopolists.
D) Only strategy 1 is evidence of price discrimination and therefore is evidence of monopoly
E) Only strategy 2 is evidence of price discrimination and therefore is evidence of monopoly.

Ans: E
15. Evaluate the following statements.

1. The electric company charges higher prices for electricity during periods of peak demand in the summer, and lower prices at "off-peak" hours. This is evidence of price discrimination. 2. The local movie theater offers a student discount, even at peak times. This is evidence of price discrimination.
2. If a firm is practicing price discrimination, that firm has monopoly power.
A) Statements 1 and 3 are true, but not 2 .
B) Statements 2 and 3 are true, but not 1 .
C) Only statement 3 is true.
D) Only statements 1 and 2 are true, but not 3 .
E) None of the three statements are true.

Ans: B
16. (Repeat your answer on Scantron line 41.) Suppose the data shows that if the price of a product rises $5 \%$ then quantity supplied rises $10 \%$ and quantity demanded falls $30 \%$; and if income rises $5 \%$ quantity demanded rises $15 \%$. Evaluate the following, then choose your answer:

1) The own price elasticity of supply is $1 / 2$.
2) The own price elasticity of supply is 2 .
3) The own price elasticity of demand is 6 (technically -6).
4) The own price elasticity of demand is $1 / 6$ (technically $-1 / 6$ ).
5) An economist would say the good definitely is a luxury good.

Choose the best answer.
A) Only statements 1, 4 and 5 are correct.
B) Only statements 2, 3 and 5 are correct.
C) Only statements 2 and 3 are correct, and statement 5 may be either true or false
D) Only statements 1 and 4 are correct, and statement 5 may be either true or false
E) Only statement 5 is correct.

Ans: B
17. (Repeat your answer on Scantron line 42.) If the price elasticity of demand equals 1.5 and the price elasticity of supply equals .5 then:

1) The sellers bear $25 \%$ of the burden.
2) The buyers bear $25 \%$ of the burden.
3) The sellers bear $75 \%$ of the burden.
4) The buyers bear $75 \%$ of the burden.
5) The buyers bear $1 / 3$ of the burden.
A) Only statements 2 and 3 are correct.
B) Only statements 1 and 4 are correct.
C) None of the statements are correct.
D) Only statement 5 is correct.
E) Only statements 1 and 5 are correct.

Ans: A
18. (Repeat your answer on Scantron line 43.) Evaluate the following. Which ones are correct "principles of taxation" according to lecture.

1) Taxing many goods with small taxes will create higher "tax efficiency" than taxing a few goods with large taxes.
2) Taxing many goods with small taxes will increase the collection and administrative costs of the tax compared to taxing a few goods with large taxes.
3) The burden of a tax falls relatively more heavily on that side of the market which has the less elastic curve, for example if the elasticity of demand is -.5 and the elasticity of supply is 1.5 , then the burden will tend to fall on the buyer.
A) All three statements are correct.
B) None of the statements are correct.
C) Two of the statements are correct.
D) Only statement 1 is correct.
E) Only statement 2 is correct.

Ans: A
19. Evaluate each of the following statements having to do with the international foreign exchange markets, then select the best answer from the lettered choices below.

1) Without the foreign exchange markets, by which citizens all over the world acquire foreign money needed to purchase foreign goods and services, international trade would not be possible.
2) The exchange rates in the international foreign exchange markets track the trade currency ratios of internationally traded claims more closely than the trade currency ratios of internationally traded goods.
A) Only statement 1 is true.
B) Only statement 2 is true.
C) Both statements 1 and 2 are true.
D) Neither statement 1 nor 2 is true.

Ans: C

Reference: Figure 7-17

20. (Repeat your answer on Scantron line 44.) Refer to the graph above. Choose the best answer. The welfare loss associated with a price ceiling at Pc is:
A) rectangles E and D.
B) rectangles C and F .
C) triangles A and B.
D) rectangle E and triangle A .
E) at least triangles A and B

Ans: E
Refer To: Figure 7-17
Difficulty: Medium
LO: 7-4
Page: 165
Skill: Comprehension
Source: New
Type: Graph
Feedback: These triangles are the dead weight loss from the price ceiling.
21. (Repeat your answer on Scantron line 45.) If Suzy, Joe, Mary, Jim and Jane are voting on how expensive a restaurant to go to, and Suzy wants the total bill to be $\$ 50$, Joe wants it to be $\$ 60$, Mary wants it to be $\$ 300$, Jim wants it to be $\$ 400$ and Jane wants it to be $\$ 500$. If they agree to vote to make the decision, the "median voter theorem" says they will decide the total bill should be:
A) the average of the five numbers given above.
B) about $\$ 100$, since Suzy and Joe apparently cannot afford an expensive restaurant.
C) $\$ 60$, for obvious reasons.
D) $\$ 300$, since Mary is the median voter.
E) the median voter theorem does not apply in this situation.

Ans: D
22. (Repeat your answer on Scantron line 46.) Consider the following statements about price discrimination, based on the discussion in lecture, and then choose the best answer from A) through E) below:

1) Only monopolists can engage in price discrimination.
2) If the price discriminating monopolist charges only two prices, one the regular monopoly price and the other a price below that monopoly price, the social "efficiency cost" (welfare cost) of the monopoly will actually be lower than the efficiency cost without price discrimination.
3) If the price discriminating monopolist charges only two prices, one the regular monopoly price and the other a price above that monopoly price, the social "efficiency cost" (welfare cost) of the monopoly will be higher than without price discrimination if some buyers are segmented into high priced group where they are unwilling to buy but would have been willing to buy as members of the group paying the monopoly price.
4) In order to successfully practice price discrimination, a seller must be a monopolist and also must be able to segment the market so that buyers in one segment cannot resell to buyers in other segments, and also buyers in the various segments must place different values on the good being sold.
A) All the above statements are correct.
B) All of the statements are correct except Statement 1.
C) Only statements 2 and 4 are correct.
D) Only statements 3 and 4 are correct.
E) Only statement 4 is correct.

Ans: A
23. (Repeat your answer on Scantron line 47.) How many firms will there be in this industry in the long run? Here is the information we have:
>>The typical firm right now is selling 10 units per week at a price of $\$ 7$ per unit, and at that price the total industry demand for the good is 50 units per week.
$\gg$ The lowpoint of the firm's long run average cost curve is at a price of $\$ 5$ per unit, and an output level of 4 units per week. At that price, total industry demand for the good is 100 units per week.
>>The lowpoint of the firm's long run marginal cost curve is at a price of $\$ 3$ per unit and an output level of 3 units per week. At that price, total industry demand for the good is 120 units per week. How many firms will there be in this industry in the long run?
A) 5 firms.
B) 25 firms.
C) 40 firms.
D) 12 firms.
E) The information given is not what we need to calculate the number of firms in an industry.

Ans: B
24. When Turner Network, producer and owner of movies, bought a local cable company, it was an example of a:
A. horizontal merger.
B. vertical merger.
C. conglomerate merger.
D. diagonal merger.

Ans: B
18-76: A vertical merger is a merger between two firms, one of which supplies goods to the other. In this case, the movie producer provides films to the cable company.

AACSB: Analytic
BLOOM'S TAXONOMY: Application
Difficulty: Medium
Learning Objective: 18-4
Topic: Mergers, Acquisitions, and Takeovers
25. Most U.S. antitrust policies have been primarily concerned with:
A. vertical mergers.
B. hostile takeovers.
C. horizontal mergers.
D. conglomerate mergers.

Ans: C
18-81: Since horizontal mergers increase the probability of controlling a greater market share, these are the mergers with which U.S. antitrust policy has been most concerned.

AACSB: Analytic
BLOOM'S TAXONOMY: Comprehension
Difficulty: Easy
Learning Objective: 18-4
Topic: Mergers, Acquisitions, and Takeovers
26. An example of an agency engaged in price regulation is the:
A. Equal Employment Opportunity Commission, which is concerned with discrimination.
B. Food and Drug Administration, which is concerned with product safety.
C. Federal Reserve Board, which regulates the supply of money in the economy.
D. Federal Trade Commission, which regulates cable television and telephones.

Ans: D
18-103: The EEOC and the FDA are examples of agencies engaged in social regulation. The Fed regulates the economy's price level, but not the prices individual firms (with natural monopolies) are allowed to charge.

AACSB: Analytic
BLOOM'S TAXONOMY: Comprehension
Difficulty: Medium
Learning Objective: 18-7
Topic: Price Regulation
27. The reason X -inefficiency is likely to occur when government regulates the price charged by firms is that:
A. regulatory boards have refused to allow firms to raise price even when costs have increased, so the regulated firms go out of business.
B. regulated firms have little incentive to control costs since they are often able to pass cost increases on to consumers in the form of higher prices approved by regulatory boards.
C. government regulators force firms to set price equal to average total cost, but an efficient outcome occurs only if the firm sets price equal to marginal cost.
D. when costs of production increase, a regulated firm is allowed to raise its price by only 50 percent of the cost increase.
Ans: B
18-108: X-inefficiency occurs when a firm has no incentive to keep costs as low as possible. Since regulated prices are usually determined using a cost-plus pricing formula, the regulated firm's profit does not suffer when costs rise because the regulated price rises proportionally.

AACSB: Analytic
AACSB: Reflective Thinking
BLOOM'S TAXONOMY: Comprehension
Difficulty: Hard
Learning Objective: 18-7
Topic: Price Regulation
Chapter 16
28. In monopolistic competition there:
A. are only a few sellers.
B. is only one seller.
C. are many sellers.
D. is only one buyer.

Ans: C
16-16: A monopolistically competitive industry is competitive because there are a large number of firms producing similar but not identical products.

AACSB: Analytic
BLOOM'S TAXONOMY: Comprehension
Difficulty: Easy
Learning Objective: 16-1
Topic: Conditions of Monopolistic Competition
29. When a monopolistically competitive industry is in long-run equilibrium:
A. firms earn economic profits.
B. firms earn zero economic profits.
C. price equals minimum average total cost.
D. price equals marginal cost.

Ans: B
16-34: Since there are no barriers to entry or exit, firms enter or exit monopolistically competitive industries until zero economic profits exist.

AACSB: Analytic
BLOOM'S TAXONOMY: Comprehension
Difficulty: Medium
Learning Objective: 16-2
Topic: Conditions of Monopolistic Competition
30. Suppose there are only four airlines that service the air route between two cities. If there is a barrier to entering the market (such as a limited number of gates), then the market is best characterized as:
A. a pure monopoly.
B. monopolistically competitive.
C. oligopolistic.
D. perfectly competitive.

Ans: C
16-79: Since there are few sellers and barriers to entry, the market structure is oligopolistic.
AACSB: Analytic
BLOOM'S TAXONOMY: Comprehension
Difficulty: Easy
Learning Objective: 16-3
Topic: Conditions of Oligopoly
31. The central characteristic of oligopolistic industries is:
A. interdependent pricing decisions.
B. flexible prices.
C. price competition.
D. few or no economies of scale.

Ans: A
16-81: Oligopolistic industries contain a small number of firms whose actions affect one another in obvious ways.
AACSB: Analytic
BLOOM'S TAXONOMY: Comprehension
Difficulty: Medium
Learning Objective: 16-3
Topic: Conditions of Oligopoly

