

PASS MOCK EXAM – FOR PRACTICE ONLY

Course: ECON 1000C Facilitator: Colton Brydges
Dates and locations of mock exam take-up: December 8th 5:30 – 8:30pm
Paterson Hall 133

IMPORTANT:

It is **most beneficial** to you to write this mock midterm **UNDER EXAM CONDITIONS**. This means:

- Complete the midterm in 2.5 hour(s).
- Work on your own.
- Keep your notes and textbook closed.
- Attempt every question.

After the time limit, go back over your work with a different colour or on a separate piece of paper and try to do the questions you are unsure of. Record your ideas in the margins to remind yourself of what you were thinking when you take it up at PASS.

The purpose of this mock exam is to give you practice answering questions in a timed setting and to help you to gauge which aspects of the course content you know well and which are in need of further development and review. Use this mock exam as a *learning tool* in preparing for the actual exam.

Please note:

- Come to the PASS session with your mock exam complete. There, you can work with other students to review your work.
- Often, there is not enough time to review the entire exam in the PASS session. Decide which questions you most want to review – the facilitator may ask students to vote on which questions they want to discuss.
- Facilitators do not bring copies of the mock exam to the session. Please print out and complete the exam before you attend.
- Facilitators do not produce or distribute an answer key for mock exams. Facilitators help students to work together to compare and assess the answers they have. If you are not able to attend the PASS session, you can work alone or with others in the class.

DISCLAIMER: PASS handouts are designed as a study aid only for use in PASS workshops. Handouts may contain errors, intentional or otherwise. It is up to the student to verify the information contained within. PLEASE NOTE: THIS HANDOUT IS NOT TO BE POSTED ON THE INTERNET

PART A: Multiple Choice – *Identify the choice that best completes the statement or answers the question*

1. Suppose a nation is currently producing at a point inside its production possibilities frontier.
 - a. The nation is producing beyond its capacity, and inflation will occur.
 - b. The nation is not using all available resources or has inefficiencies.
 - c. The nation is producing an efficient combination of goods.
 - d. There will be a large opportunity cost if the nation tries to increase production.

2. Other things equal, what happens when the price of a good rises?
 - a. The quantity demanded of the good increases.
 - b. The supply increases.
 - c. The quantity supplied of the good rises.
 - d. The demand curve shifts to the left.

3. In which of the following cases is the Coase theorem most likely to work to solve the externality?
 - a. Richard is annoyed because his roommate smokes.
 - b. Chemicals from farms in the Mississippi Valley are polluting the Gulf of Mexico.
 - c. Car exhaust in a small town is making one of its residents ill.
 - d. Industrialization around the world is causing acid rain.

4. Which tax system requires higher income taxpayers to pay a higher percentage of their income in taxes?
 - a. progressive
 - b. proportional
 - c. regressive
 - d. percentage

5. What is the cost of producing an additional unit of output?
 - a. the firm's marginal cost
 - b. the firm's productivity offset
 - c. the firm's variable cost
 - d. the firm's average variable cost

6. Oligopolies can end up looking like competitive markets if the number and behaviour of firms is which of the following?
 - a. large and cooperative
 - b. large and noncooperative
 - c. small and cooperative
 - d. small and noncooperative

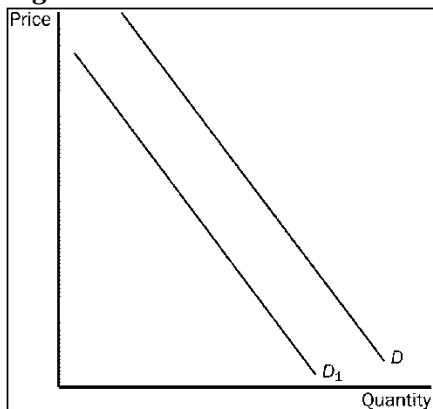
7. In the long run, what do we know about the scale at which a perfectly competitive firm operates, compared to a monopolistically competitive firm?
- A perfectly competitive firm and a monopolistically competitive firm both operate at efficient scale.
 - A perfectly competitive firm operates at an efficient scale and a monopolistically competitive firm operates with excess capacity.
 - A perfectly competitive firm and a monopolistically competitive firm both operate with excess capacity.
 - A perfectly competitive firm operates with excess capacity and a monopolistically competitive firm operates at efficient scale.

Table 1

| | Labor Hours needed to make one unit of: | | Amount produced in 160 hours: | |
|---------|---|---------|-------------------------------|---------|
| | Quilts | Dresses | Quilts | Dresses |
| Helen | 40 | 10 | 4 | 16 |
| Carolyn | 80 | 16 | 2 | 10 |

8. **Refer to Table 1.** The opportunity cost of 1 quilt for Helen is
- 2 dresses
 - 3 dresses
 - 4 dresses
 - 5 dresses

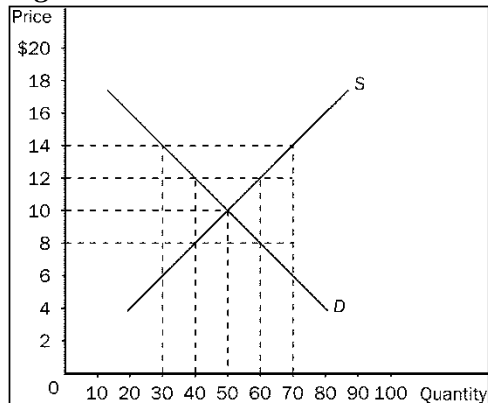
Figure 1



9. **Refer to Figure 1.** The movement from *D* to *D*₁ could be caused by
- an increase in price
 - a decrease in the price of a complement
 - an increase in technology
 - a decrease in the price of a substitute

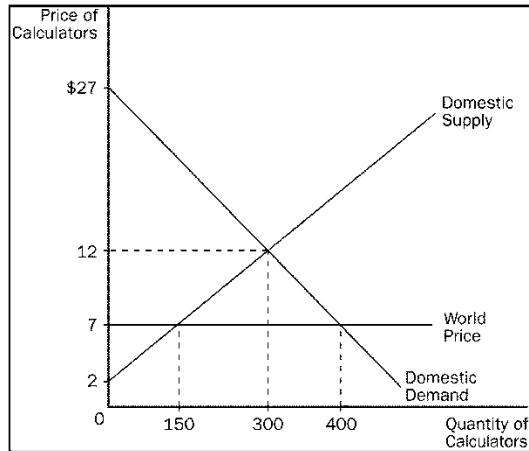
10. There are very few, if any, good substitutes for motor oil. Therefore,
- the supply of motor oil would tend to be price elastic.
 - the demand for motor oil would tend to be price elastic.
 - the demand for motor oil would tend to be price inelastic.
 - the demand for motor oil would tend to be income elastic.

Figure 2



11. **Refer to Figure 2.** A binding price ceiling would exist at a price of
- \$14.00
 - \$12.00
 - \$10.00
 - \$8.00
12. Public goods are
- excludable but not rival
 - rival but not excludable
 - both excludable and rival
 - neither excludable nor rival

Figure 3

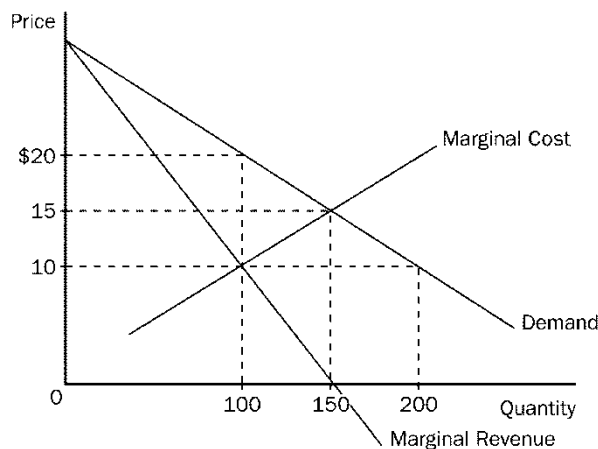


13. **Refer to Figure 3.** Jamaica would
- import 150 calculators
 - import 250 calculators
 - export 100 calculators
 - export 250 calculators
14. Producer surplus is the
- area under the supply curve to the left of the amount sold.
 - amount a seller is paid less the cost of production.
 - amount represented by the area under the supply curve.
 - cost to sellers of participating in a market.
15. Which of the following is the most correct statement about tax burdens?
- A tax burden falls most heavily on the side of the market that is elastic.
 - A tax burden falls most heavily on the side of the market that is inelastic.
 - A tax burden falls most heavily on the side of the market that is closer to unit elastic.
 - A tax burden is distributed independently of relative elasticities of supply and demand.
16. A tariff and an import quota will both
- increase the quantity of imports and raise domestic price.
 - increase the quantity of imports and lower domestic price.
 - reduce the quantity of imports and raise domestic price.
 - reduce the quantity of imports and lower domestic price.

17. A certain competitive firm sells its output for \$20 per unit. The 50th unit of output that the firm produces has marginal cost of \$22. It follows that the production of the 50th unit of output
- increases the firm's total revenue by \$20.
 - increases the firm's total cost by \$22.
 - decreases the firm's profit by \$2.
 - All of the above are correct.
18. The prisoners' dilemma provides insights into the
- difficulty of maintaining cooperation.
 - benefits of avoiding cooperation.
 - benefits of government ownership of monopoly~
 - ease with which oligopoly firms maintain high prices.
19. For a firm in a perfectly competitive market, the price of the good is always
- equal to marginal revenue.
 - equal to total revenue.
 - greater than average revenue.
 - equal to average revenue.
 - Both a and d are correct.
20. A decrease in resource costs to firms in a market will result in
- a decrease in equilibrium price and an increase in equilibrium quantity.
 - a decrease in equilibrium price and a decrease in equilibrium quantity.
 - an increase in equilibrium price and no change in equilibrium quantity.
 - an increase in equilibrium price and an increase in equilibrium quantity.

PART B: Short Answer – Answer 5 of the 8 questions (8 marks each)

1.
 - a) Describe what is meant by an “externality”.
 - b) In the case of a negative externality, use a diagram to illustrate how this externality affects the market equilibrium.
 - c) Based on your answer to (b), illustrate how the equilibrium with the negative externality compares with the social optimum. How might the government help to eliminate this inefficiency?
2.
 - a) Some goods are non-excludable. Why does this create a problem for markets?
 - b) Some goods are non-rival. Why does this create a problem for markets?
3. Refer to the diagram below to answer the following questions.



- a) To maximize total surplus, a benevolent social planner would choose what price and how many units? Explain your answer.
 - b) To maximize its profit, a monopolist would choose what price and how many units? Explain your answer.
 - c) What is the deadweight loss caused by the profit-maximizing monopoly? Graphically depict the deadweight loss. How is this similar to deadweight loss from taxation?
4. Use a graph to demonstrate why a profit maximizing monopolistically competitive firm must operate at excess capacity (below the level of output at which average total cost is at a minimum). Explain why a perfectly competitive firm is not subject to the same constraint.
5. Think about the market for gasoline. Use demand and supply analysis to answer the following:
 - a) Explain what will happen to the market for gasoline if there is an increase in demand.
 - b) Suppose that the government responds to the increase in demand by fixing the gas price at its original level, what happens?
 - c) If the market price cannot adjust to ration the increase in demand, how might the extra demand get rationed?

6. Explain what is meant by "opportunity cost". Explain the difference between "economic profits" and "accounting profits". If firms in a competitive industry are earning zero economic profits, explain whether this can be a long-run equilibrium.
7. Explain what is meant by a "cartel". Explain why firms would want to create a cartel. Explain the problems that firms face when they try to create a cartel.
8. Using a diagram, explain how the elasticity of demand affects the deadweight loss of the tax, and affects the distribution of the burden of tax between buyers and sellers.

PART C: Long Answer Questions – *Answer one of the following*

1. Assume the world price of eggs is below what the Canadian price would be if Canadians were not allowed to import or export eggs.
 - a) Draw a diagram showing the equilibrium if Canada allows free trade in eggs.
 - b) Now Canada decides to impose a tariff on imported eggs. Using a diagram, explain what happens to: the Canadian price of eggs; Canadian egg production; Canadian egg consumption; consumer surplus; producer surplus; and tariff revenue.
 - c) Are Canadians better off or worse off as a result of the tariff? Explain.

2. This question on unit commodity taxes is divided into three parts.
 - (i) Using separate demand and supply diagrams, show the difference in deadweight loss due to a unit tax between a market with inelastic demand and supply curves and a market with elastic demand and supply curves. Explain the difference in deadweight loss.

 - (ii) How does elasticity affect the burden of a tax? What is the incidence of the tax on consumers and producers? Justify your answer using supply and demand diagrams.

 - (iii) Illustrate on three demand and supply graphs how the size of a tax (small, medium and large) can alter total government revenue and deadweight loss. Explain what happens to total government revenue as the tax is increased.

3. There are many hairdressing salons in Ottawa. Because each salon is different, a salon that raises its price above other salons will lose some customers but not all. There is free entry and exit of salons. Use a diagram to show the initial long run equilibrium price and quantity of a typical salon. Now suppose there is an increased demand for haircuts. Explain how this will affect the typical salon, first in the short run, then in the long run.