

2025



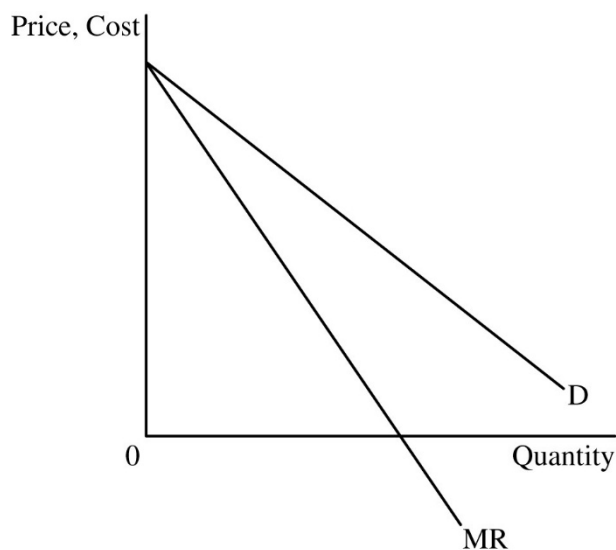
AP[®] Microeconomics

Scoring Guidelines

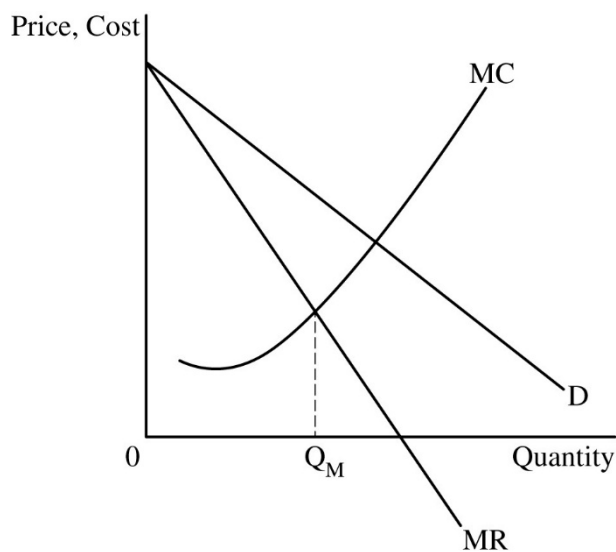
Set 1

Question 1: Long**10 points**

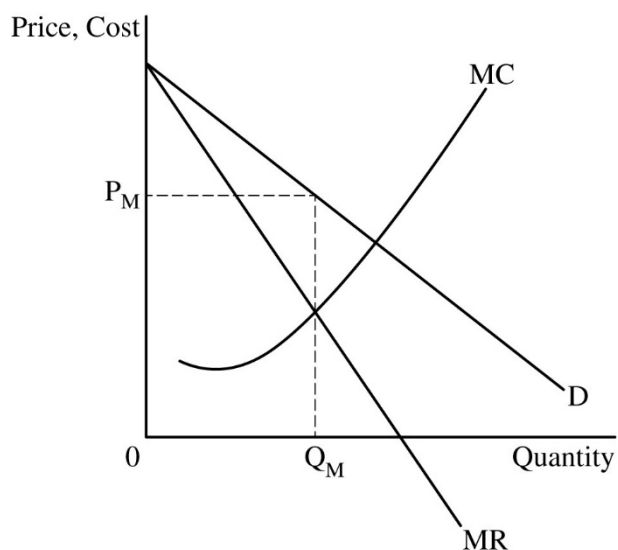
- A** Draw a correctly labeled graph for Voda Reservoir with a downward-sloping demand (D) curve and a downward-sloping marginal revenue (MR) curve with the MR curve below the D curve. **1 point**
- Point 1



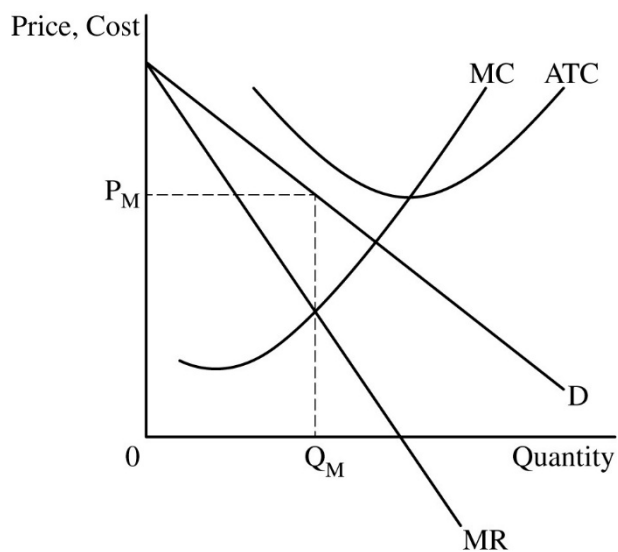
- Point 2 The graph must show a rising marginal cost (MC) curve and the profit-maximizing quantity, labeled Q_M , where $MR = MC$. **1 point**



- Point 3 The graph must show the profit-maximizing price, labeled P_M , from the D curve at Q_M . **1 point**

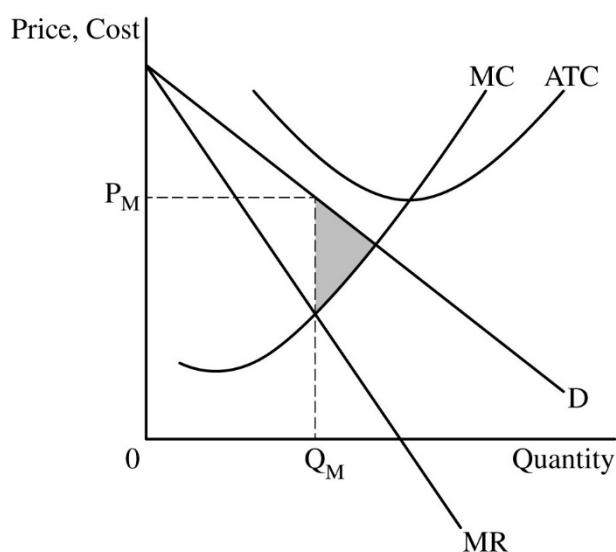


- Point 4 The graph must show the average total cost (ATC) curve above the D curve and show the MC curve passing through the minimum point of the ATC curve. **1 point**



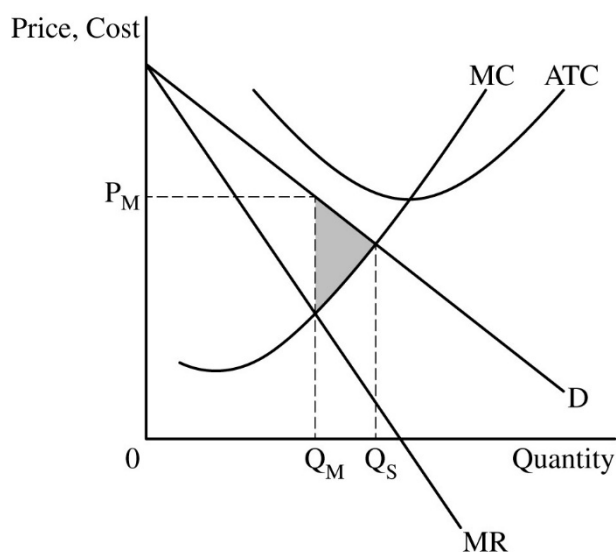
Point 5 The graph must show the area of deadweight loss, shaded completely.

1 point



B The graph from part A must show the socially optimal quantity of bottled water, labeled Q_S , from the intersection of the D and MC curves.

1 point



C State that Voda Reservoir's profit-maximizing quantity of bottled water will increase and explain with **ONE** of the following:

1 point

Point 7

- The per-unit subsidy decreases the firm's marginal cost, which shifts the MC curve to the right (down), intersecting the MR curve at a greater quantity.
- The per-unit subsidy increases the firm's marginal revenue, which shifts the MR curve to the right, intersecting the MC curve at a greater quantity.

D State that the demand for Voda Reservoir's bottled water will become more elastic.

1 point

Point 8

E	(i)	State that Voda Reservoir's demand for labor will increase and explain that the increase in demand for bottled water will increase the price and marginal revenue of bottled water, increasing the marginal revenue product of labor.	1 point
	(ii)	State that the market wage will increase in the short run and explain that the new regulation will decrease the supply of workers.	1 point

Question 2: Short**5 points**

A	Calculate the total economic surplus as \$270 and show your work.	1 point
Point 1	$\text{Total Economic Surplus} = \frac{1}{2} \times (\$10 - \$1) \times (60 - 0) = \frac{1}{2} \times \$9 \times 60 = \$270$ <p>OR</p> $\begin{aligned} \text{Total Economic Surplus} &= \text{Consumer Surplus} + \text{Producer Surplus} \\ &= \frac{1}{2} \times (\$10 - \$4) \times (60 - 0) + \frac{1}{2} \times (\$4 - \$1) \times (60 - 0) \\ &= \$180 + \$90 = \$270 \end{aligned}$	
B	State that there will be neither a surplus nor a shortage and explain that a price floor set below the equilibrium price is not binding and, therefore, will have no effect on the market price and quantity.	1 point
Point 2		
C (i)	State that Rushland will export rice and explain with ONE of the following:	1 point
Point 3	<ul style="list-style-type: none"> At the world price of \$5, the domestic quantity supplied is 80 bushels of rice, which is greater than the domestic quantity demanded, which is 50 bushels of rice. At the world price of \$5, Rushland has a domestic surplus of 30 bushels of rice that can be exported. 	
(ii)	Calculate the domestic consumer surplus in Rushland as \$125 and show your work.	1 point
Point 4	$\text{Domestic Consumer Surplus} = \frac{1}{2} \times (\$10 - \$5) \times (50 - 0) = \frac{1}{2} \times \$5 \times 50 = \$125$	
(iii)	Calculate the total revenue Rushland's farmers will earn as \$400 and show your work.	1 point
Point 5	$\text{Total Revenue} = \text{World Price} \times \text{Quantity Sold} = \$5 \times 80 = \$400$	

Question 3: Short**5 points**

A Point 1	State “No,” producing Unique jewelry is not the best choice for Tony’s Trinkets if Bitaly’s Bracelets chooses to produce Silver jewelry and explain that Tony’s Trinkets’ profit from producing Typical jewelry is \$21, which is greater than its profit when producing Unique jewelry, which is \$20.	1 point
B Point 2	State that Bitaly’s Bracelets does not have a dominant strategy and explain that when Tony’s Trinkets chooses Unique, Bitaly’s Bracelets’ profit is higher when it chooses Gold, $\$21 > \19 , and when Tony’s Trinkets chooses Typical, Bitaly’s Bracelets’ profit is higher when it chooses Silver, $\$16 > \7 .	1 point
C Point 3	Identify the TWO Nash equilibria for the game as the following: <ul style="list-style-type: none"> • Tony’s Trinkets chooses Unique, and Bitaly’s Bracelets chooses Gold. • Tony’s Trinkets chooses Typical, and Bitaly’s Bracelets chooses Silver. 	1 point
D Point 4	State that the minimum amount is \$6.	1 point
E Point 5	Calculate the new firm’s maximum combined profit as \$39 and show your work. Maximum Combined Profit = $\$20 + \$19 = \$39$	1 point