p121.
Think About It 5.1

There are many property programmes on television in which people redevelop and sell houses. Imagine a couple who give up their jobs and spend a year working very hard, six days a week, developing a house for an accounting profit of £30,000.

Why might an economist argue that this is a loss?

This amount may not cover the investment in time and the opportunity costs. They could have earned more doing something else.

p123.
Think About It 5.2

How long do you think it is likely to take to introduce a new production line in a car factory? What about the length of time to open a new hotel?

Answers might include:
Depends on the scale of these investments but could be years; main point is that changing capacity can be slow in some industries and quicker in others.

p124.
Think About It 5.3

Would it be better to employ all staff on short-term contracts? Would it be better to link all staff pay directly to sales and abandon salaries?

Answers might include:
- Depends on impact on:
  - Motivation
  - Ease of recruitment
  - Costs
  - Quality of work
  - Productivity

p125
Data Analysis 5.1

Complete the missing figures for total cost and marginal cost in the table.

<table>
<thead>
<tr>
<th></th>
<th>Total cost</th>
<th>Marginal cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>20</td>
<td>-</td>
</tr>
<tr>
<td>2</td>
<td>50</td>
<td>30</td>
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<tr>
<td>3</td>
<td>90</td>
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<td>80</td>
</tr>
<tr>
<td>7</td>
<td>400</td>
<td>120</td>
</tr>
</tbody>
</table>

The marginal cost shows the change in the total costs.
Think About It 5.4

1. Can you think of two types of business likely to have high fixed costs?

*Answers might include:*  
Car industry, oil, gas, telecommunications.

2. If you were cutting price to increase sales significantly, would you want demand to be price elastic or inelastic? Explain your answer.

Price elastic i.e. sensitive to price.

Data Analysis 5.2

The fixed costs of a business are £80,000 a week. The variable costs are £20 a unit.

1. What is the average fixed cost and the average cost if:  
A: output is 200 units? B: output is 1,000 units? C: output is 5,000 units?

\[
\begin{align*}
A & : \text{AFC} = \frac{£80000}{200} = £400 \quad \text{AC} = £420 \\
B & : \text{AFC} = \frac{£80000}{1000} = £80 \quad \text{AC} = £100 \\
C & : \text{AFC} = \frac{80,000}{5000} = £16 \quad \text{AC} = £36 \\
\end{align*}
\]

2. Would the business make a profit if the price per unit were £50? Explain your findings.

It would when 500 units were being made but not at the lower outputs given; as output increases fixed costs are spread over more units reducing the AFC and the AC; if output gets high enough a profit can be made at £50.

Think About It 5.5

Why do you think internal economies of scale are becoming more significant as markets become more global?

*Answers might include:*  
With greater access to markets there is more possibility of economies of scale; there is a drive to dominate markets to benefit from the cost advantages.

Business Analysis 5.1

Why do you think there is so much pressure on businesses to reduce their transportation costs?

*Answers might include:*  
To be efficient and enable better value for money for customers. As markets increase in competitiveness there is pressure in all areas to be efficient.
Think About It 5.6

Unilever is a major manufacturer of food, homecare, healthcare, and personal care products. It has 400 brands spanning fourteen categories of home, personal care, and food products. Its brand portfolio ranges from global brands, such as Lipton, Knorr, Dove, and Omo, to trusted local brands, such as Blue Band and Suave.

1. To what extent do you think Unilever can develop a common set of values among all its employees and brands?

Unilever can try to do this via mission statements, vision statements, statements of values and codes of conduct, and can reinforce this with training, rewards, communications, etc.

2. What problems might it face in achieving this?

Different departments and regions will face their own challenges and issues; they will have their own cultures and priorities. Coordinating messages over many countries to thousands of people will face many communications issues.

Business Analysis 5.2

1. Why do you think Silicon Valley became such a hub for innovation?

Answers might include:
- Education facilities
- Grew from the early success of businesses there
- Infrastructure

2. What would be the advantage for a high tech business of locating there?

Answer might include:
Access to suppliers, expertise, employees, investors, general know-how.

Data Analysis 5.4

You run a car dealership in Scotland. Assume that you can sell twenty cars this week at £20,000 each. To sell twenty-one cars and hit your sales target, you estimate that you will need to drop the price to £19,000.

1. What is the marginal revenue of the twenty-first car? What is the total revenue?

Total revenue for 20 cars = 20 * £20,000 = £400,000
For 21st car: 21 * £19,000 = £399,000
Marginal revenue is the difference

2. You calculate that, to sell twenty-two cars, you would need to drop the price as low as £16,000. What is the total revenue of twenty-two cars?
Total revenue = 22 * £6000 = £132,000

2. What is the marginal revenue of the twenty-second car?
   Marginal revenue = £399,000 - £132,000 = £267,000

Think About It 5.7

If all products were sold at the same price (for example, £10), what would the marginal revenue be? What is the average revenue? What is the total revenue if sales are 60 units?

The price (average revenue) is £10; Marginal revenue would be £10 because you get £10 for every unit sold. The total revenue for 60 units is 60 * £10 = £600.

p145.
Think About It 5.8

Would you be prepared to pay different prices for different units? Imagine your first drink in the pub was one price but the price changed for each extra drink. Well would you go for this?

Would depend on the price presumably and pubs would be trying to charge more for the first pint to remove consumer surplus.

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Business Analysis 5.3

To what extent should Disney be worried about its fall in profits?

Answers might include:
- Depends on factors such as:
- Whether it is expected
- How much the fall is
- Whether it has plans to turn the situation around
- Whether it is seen as short term or long term

Suggested Answers to Short Answer Questions

1. The quantity producers are willing and able to supply in a given time period at each and every price, all other factors unchanged.
2. Technology, number of producers, costs.
3. A movement along a supply curve occurs when there is change in price, all other factors constant; a shift in supply occurs when there is a change in quantity supplied at each and every price.
4. With higher costs then businesses will need a higher price to supply any given quantity; the supply curve shifts.
5. It measures how sensitive quantity supplied is given a change in price, all other factors constant.
6. Influenced by the ease of shifting resources into the production of the product, the time period, the nature of the production process, the number of firms producing.
7. This means a 1% increase in the price increases the quantity supplied by 0.5%.

8. Technology change will shift the supply curve; e.g. more can be supplied at each price.

9. The difference between the price producers are willing and able to produce a unit for and the price they actually receive.

10. The industry supply curve is the horizontal summation of the firms' supply curves.