AP MICROECONOMICS • HOLIDAY HOMEWORK 假期作业

3 A firm's costs – Part 1

Name: ____________ Class: ________ Date: __________

Vocabulary 词汇

Write each word three times. 把每个单词抄写三遍。

English	中文	Write it 3 times (English)		
Fixed cost	固定成本			
Variable cost	可变成本			
Economies of scale	规模经济			

Recall

Businesses have to think about costs:

- Some costs stay the same however much you make (rent).
- Other costs rise as you produce more (materials).
- Making things in bulk can lower the cost per item.

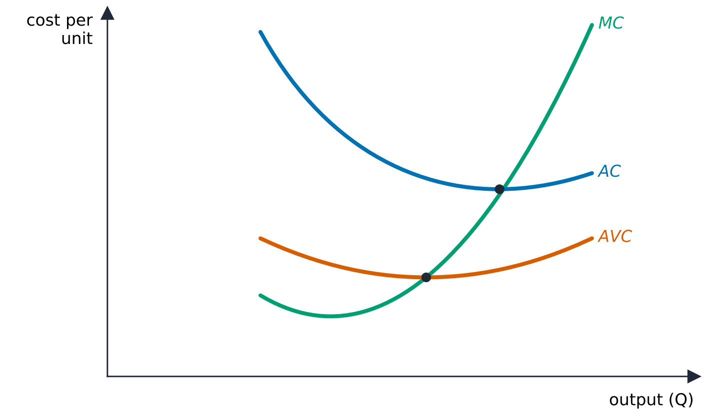
This sheet lines up a firm's costs. Each idea has a worked example.

New ideas

1 Fixed and variable costs

- **Fixed cost** 固定成本 does not change with output (rent on the factory).
- **Variable cost** 可变成本 rises with output (materials, labour).
- Total cost = fixed + variable.

2 Per-unit costs

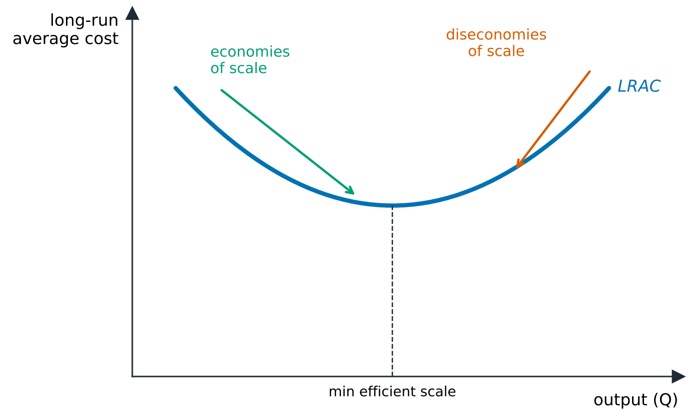


- **Average total cost (ATC)** = total cost ÷ quantity.
- **Marginal cost (MC)** = the cost of making one **more** unit.

Worked example. If total cost is \$300 for 10 units, $ATC = \frac{300}{10} = \$30$. If making an 11th unit raises total cost to \$325, the marginal cost of that unit is \$25.

3 Economies of scale

Economies of scale 规模经济 mean the average cost **falls** as the firm grows – through bulk buying and specialization.



■ **4 Diseconomies of scale**

If a firm grows too big to manage well, average cost can start to **rise** again – diseconomies of scale.

Watch out: marginal cost is the cost of the **next** unit, not the average cost. A firm decides whether to make one more unit by looking at its marginal cost, not the average.

Practice

Try these in order. The methods are all above.

2.1 State the difference between a fixed cost and a variable cost, with an example of each. [2]

2.2 A firm's total cost for 5 units is \$200. Find the average total cost. [2]

2.3 Making a 6th unit raises total cost from \$200 to \$236. Find the marginal cost of that unit. [2]

2.4 Explain what economies of scale are. [2]

2.5 State one reason a very large firm might face rising average costs. [1]