# Exercise walk-through

## Comparative Advantage and Gains from Trade ▪ 1.3

eXercise

# You must be able to

- calculate **opportunity costs 机会成本** of production from output data
- distinguish **absolute advantage 绝对优势** from **comparative advantage 比较优势**
- determine which producer has the comparative advantage in each good
- explain how **specialization 专业化** and trade create gains

# Method — Opportunity cost from output

If a country can make $10$ wheat **or** $5$ cloth with the same resources, then $1$ wheat costs $\frac{5}{10} = 0.5$ cloth.

# Method — Absolute vs comparative advantage

**Absolute** advantage = producing **more** of a good. **Comparative** advantage = producing at a **lower opportunity cost**. Gains from trade come from **comparative** advantage.

# Method — Specialize and trade

Each producer specializes in the good for which its opportunity cost is **lowest**, then trades — and both can end up with more than in isolation.

# Practice 2.1 ▪ 2 marks

State the difference between absolute and comparative advantage.

# Solution 2.1

Method: Absolute vs comparative advantage

**Worked steps**

absolute advantage is producing more of a good with the same resources; comparative advantage is producing it at a lower opportunity cost **B1** **B1**.

# Practice 2.2 ▪ 2 marks

Country X can make $20$ wheat **or** $10$ cloth. Find the opportunity cost of $1$ wheat.

# Solution 2.2

Method: Opportunity cost from output

**Worked steps**

1 wheat costs $\frac{10}{20} = 0.5$ cloth **M1** **A1**.

# Practice 2.3 ▪ 1 mark

State the basis on which a country should choose which good to specialize in.

# Solution 2.3

Method: Specialize and trade

**Worked steps**

the good in which it has the **lower opportunity cost** (comparative advantage) B1.

# Exam-style 3.1 ▪ 1 mark

A producer has a comparative advantage when it has a lower

- **A** total output
- **B** opportunity cost
- **C** selling price
- **D** population

# Solution 3.1

Method: Absolute vs comparative advantage

**A** total output

**B** opportunity cost ✓

**C** selling price

**D** population

**Worked steps**

**B**.

# Exam-style 3.2 ▪ 1 mark

Mutual gains from trade come from

**A** absolute advantage

**B** specialization by comparative advantage

**C** raising tariffs

**D** self-sufficiency

# Solution 3.2

Method: Absolute vs comparative advantage

**A** absolute advantage

**B** specialization by comparative advantage ✓

**C** raising tariffs

**D** self-sufficiency

**Worked steps**

**B**.

# Exam-style 3.3 ▪ 1 mark

In one hour, Ann makes $4$ cakes **or** $8$ breads; Ben makes $2$ cakes **or** $2$ breads.
(a) Find Ann's opportunity cost of $1$ cake.
(b) Find Ben's opportunity cost of $1$ cake.
(c) State who should specialize in cakes, and why.

# Solution 3.3

Method: Specialize and trade

**Worked steps**

(a) $1$ cake costs $2$ breads **B1**. (b) $1$ cake costs $1$ bread **B1**. (c) Ben — his opportunity cost of a cake ($1$ bread) is lower than Ann's ($2$ breads) **B1**.