

Past-paper walk-through

The Phillips Curve ■ 5.2

eXercise

Questions in this set

- 2026 Q2
- 2025 Set 1 Q1
- 2025 Set 2 Q1
- 2023 Set 1 Q2
- 2023 Set 2 Q1
- 2021 Set 2 Q2
- 2019 Set 1 Q2
- 2017 Q1
- 2016 Q1

Reading the mark scheme

- **B1** a mark that stands on its own – the point is either made or not.
- **M1** a *method* mark: the right approach, even if the number is wrong.
- **A1** an *answer* mark, and it usually needs its M mark first.
- **C1** a working mark on the way to the answer.
- **//** separates answers the examiner accepts equally.
- **ecf** = error carried forward: a later part is marked on your own earlier answer.
- **owtte** = “or words to that effect” – the wording need not match.

Question 2

2026 ■ Q2

The economy of Foxhound is in short-run equilibrium with the macroeconomic data shown in the table.

Labor force	15,000,000
Number of people not working but looking for work	900,000
Number of people who are retired	200,000
Number of people not working and not looking for work	100,000
Natural rate of unemployment	3%
Actual inflation rate	2%

Question 2

- (a)** How many people are employed in Foxhound?
- (b)** Calculate the actual unemployment rate in Foxhound. Show your work.
- (c)** Draw a correctly labeled graph of the short-run and long-run Phillips curves for the economy of Foxhound, and label the short-run equilibrium point as X. Plot the relevant numerical values on your graph.
- (d)** If some individuals who are counted as employed in Foxhound retire, will the unemployment rate increase, decrease, or remain the same? Explain.

Question 2

Labor force	15,000,000
Number of people not working but looking for work	900,000
Number of people who are retired	200,000
Number of people not working and not looking for work	100,000
Natural rate of unemployment	3%
Actual inflation rate	2%

Question 1

2025 Set 1 ■ Q1

Assume that the economy of Vortania is in long-run equilibrium.

(a) Draw a correctly labeled graph of the short-run and long-run Phillips curves for the economy of Vortania, and label the long-run equilibrium point as P.

Question 1

2025 Set 1 ■ Q1

Assume that the economy of Vortania is in long-run equilibrium.

(b) Assume that new residential construction projects are being implemented in Vortania.

(b)(i) Will real output in Vortania increase, decrease, or remain the same in the short run? Explain.

(b)(ii) Assuming no change in inflationary expectations, on your graph in part A, show the short-run effect of the new residential construction projects on Vortania's economy, labeling the new short-run equilibrium point as S.

Question 1

2025 Set 1 ■ Q1

Assume that the economy of Vortania is in long-run equilibrium.

(c) Vortania and Rhodara are trading partners with flexible exchange rates. The currency of Vortania is the Vortanian crown (VTC), and the currency of Rhodara is the Rhodaran mark (RHM). Assume that Vortania's capital and financial account (CFA) balance is zero. Now assume that Vortania imposes new tariffs on imports from Rhodara. Draw a correctly labeled graph of the foreign exchange market for the Vortanian crown, and show the effect of the tariffs on the SUPPLY of the Vortanian crown and the international value of the Vortanian crown.

Question 1

2025 Set 1 ■ Q1

Assume that the economy of Vortania is in long-run equilibrium.

(d) Based solely on the change in the international value of the Vortanian crown shown in part C, will Vortania's net exports increase, decrease, or remain the same in the short run?

Question 1

2025 Set 1 ■ Q1

Assume that the economy of Vortania is in long-run equilibrium.

(e) Based on the change in net exports identified in part D, what will happen to each of the following in the short run?

(e)(i) The capital and financial account (CFA) balance in Vortania. Explain.

(e)(ii) Employment in Vortania

Question 1

2025 Set 1 ■ Q1

Assume that the economy of Vortania is in long-run equilibrium.

(f) Assume the central bank of Vortania wants to return the Vortanian crown to its international value before the imposition of the tariffs. Would the central bank buy or sell Vortanian crowns in the foreign exchange market? Explain.

Solution 1

(a)

Mark scheme

- Draw a downward-sloping short-run Phillips curve (SRPC) with Inflation Rate (%) on the vertical axis and Unemployment Rate (%) on the horizontal axis (1 point). Then add a vertical long-run Phillips curve (LRPC) at the natural rate of unemployment U_N , and label the point where the SRPC crosses the LRPC as P (1 point). 2 points total.

Solution 1

(b)

Mark scheme

- This line is only the stem introducing part B ('Assume that new residential construction projects are being implemented in Vortania'); it states an assumption and has no separately scorable content of its own. Both points for part B are earned under B(i) and B(ii).

Solution 1

(b)(i)

Mark scheme

- Real output will INCREASE in the short run. New residential construction projects raise investment spending (a component of aggregate demand), which increases aggregate demand and moves the economy along the SRPC to higher output. 1 point for stating 'increase' with this investment-spending explanation.

Solution 1

(b)(ii)

Mark scheme

- On the graph from part A, plot a new point S on the (unchanged) SRPC to the LEFT of point P — i.e., at lower unemployment and higher inflation than P. Because inflationary expectations are unchanged, the SRPC itself does not shift; the economy simply moves along the existing SRPC as aggregate demand rises. 1 point.

Solution 1

(c) Mark scheme

- Draw the foreign exchange market for the Vortanian crown (VTC): vertical axis = price of VTC in RHM/VTC, horizontal axis = Quantity of VTC, with a downward-sloping demand curve D_{VTC_1} and an upward-sloping supply curve S_{VTC_1} intersecting at exchange rate e_1 and quantity Q_1 (1 point). Then show that the tariffs on Rhodaran imports cause Vortanians to buy fewer Rhodaran goods, so they supply fewer crowns in the foreign exchange market: the supply curve shifts LEFT to S_{VTC_2} , raising the equilibrium exchange rate to $e_2 > e_1$ (an appreciation of the crown) and lowering the quantity traded to $Q_2 < Q_1$ (1 point). 2 points total.

Solution 1

(d)

Mark scheme

- Vortania's net exports will DECREASE. The crown appreciated (part C), making Vortanian exports more expensive to foreigners and Rhodaran imports cheaper to Vortanians, so exports fall and imports rise, decreasing net exports. 1 point.

Solution 1

(e)

Mark scheme

- This line is only the stem introducing part E ('Based on the change in net exports identified in part D, what will happen to each of the following in the short run?'); it has no separately scorable content of its own. Both points for part E are earned under E(i) and E(ii).

Solution 1

(e)(i)

Mark scheme

- The capital and financial account (CFA) balance in Vortania will move into SURPLUS. Because the current account (CA) moved into deficit (net exports fell, part D) and the balance of payments must balance ($CA + CFA = 0$), the CFA balance must move into surplus to offset the CA deficit. 1 point.

Solution 1

(e)(ii)

Mark scheme

- Employment in Vortania will DECREASE. The fall in net exports (part D) is a fall in a component of aggregate demand, so AD decreases, decreasing short-run real output and therefore employment. 1 point.

Solution 1

(f)

Mark scheme

- The central bank of Vortania would SELL Vortanian crowns in the foreign exchange market. Selling crowns increases the supply of VTC, which depreciates the crown back toward its pre-tariff international value, reversing the appreciation from part C. 1 point.

Question 1

2025 Set 2 ■ Q1

Assume that the economy of Barrikos is in short-run equilibrium, with its economic data summarized in the table provided. The government budget is balanced, and the capital and financial account (CFA) balance is zero.

Cyclical unemployment rate	6%
Natural unemployment rate	4%
Structural unemployment rate	1%
Actual inflation rate	3%
Expected inflation rate	5%

Question 1

(a) What is the numerical value of the actual unemployment rate in Barrikos?

Question 1

Cyclical unemployment rate	6%
Natural unemployment rate	4%
Structural unemployment rate	1%
Actual inflation rate	3%
Expected inflation rate	5%