



ECO.MAC15 Supply-Side Policies: Market-Based Approaches

AQA 7136 · Calculators not allowed · about 60 minutes

Total Marks

Name: _____ Date: ____ / ____ / ____

Answer all questions in full sentences where required. The final 25-mark question requires a developed evaluative response. Total time guidance 60 minutes.

- 1** Define the aim of supply-side policy in the context of raising an economy's long-run productive potential and LRAS, as used in UK macroeconomic debate.

(Total for Question 1 is 2 marks)

- 2** Define what is meant by a market-based supply-side policy in the UK context, distinguishing it from an interventionist supply-side approach.

(Total for Question 2 is 2 marks)

- 3** Explain how a cut in marginal income tax rates is intended to increase labour supply and thereby shift LRAS to the right in the UK economy.

(Total for Question 3 is 3 marks)

- 4** Explain how a reduction in corporation tax is argued to increase business investment and thereby raise LRAS in the UK.

(Total for Question 4 is 3 marks)

- 5** Explain how deregulation of product markets is expected to improve efficiency and increase LRAS in a UK market-based supply-side framework.

(Total for Question 5 is 3 marks)

- 6** Explain how measures to reduce trade union power or increase labour market flexibility are intended to affect wages, employment and LRAS in the UK.

(Total for Question 6 is 3 marks)

- 7** Explain how reducing the generosity of out-of-work benefits is intended to affect labour market participation and LRAS in a market-based policy package for the UK.

(Total for Question 7 is 3 marks)

- 8** Explain how privatisation of a state-owned industry might increase efficiency and thereby raise LRAS in the UK market-based approach.

(Total for Question 8 is 3 marks)

- 9** Diagram task: In the context of UK market-based supply-side policy, draw an AD/AS diagram showing the effect of product market deregulation on long-run aggregate supply. Label axes, show LRAS before and after the reform, and briefly indicate any likely short-run effect on price level and output.

(Total for Question 9 is 4 marks)

- 10** Data extract: UK multifactor productivity (MFP) index (2010 = 100) for a simplified recent five-year period: 2016: 102.0, 2017: 103.5, 2018: 103.0, 2019: 104.2, 2020: 103.8. The government enacted a package of market-based reforms focused on deregulation and corporation tax reduction in 2017. Explain how the data show a short-term change in productivity growth after the 2017 reforms, using the figures above.

(Total for Question 10 is 9 marks)

- 11** Using the same MFP index from Question 10, calculate the percentage change in MFP between 2016 and 2019. Show your working and give your answer to 2 decimal places.

(Total for Question 11 is 4 marks)

- 12** Evaluate the view that cutting corporation tax is the most effective market-based measure to improve UK productivity. In your answer consider mechanism, timescales, distributional effects, possible unintended consequences and alternative market-based measures. Use diagrams where helpful and reach a supported judgement.

(Total for Question 12 is 25 marks)

Mark scheme · ECO.MAC15 Supply-Side Policies: Market-Based Approaches

Question 1

- **B1** statement that supply-side policy aims to increase the economy's productive capacity or potential output
- **B1** links this to a rightward shift in long-run aggregate supply (LRAS), increasing potential real GDP
- **Answer: Supply-side policy aims to raise the economy's productive capacity, increasing potential output and shifting LRAS to the right.**

Question 2

- **B1** market-based policy is defined as measures that rely on market incentives and reduced government intervention to improve supply-side performance
- **B1** contrast such as less regulation, lower taxes, privatisation, or weaker trade union influence, not direct government provision or state investment
- **Answer: A market-based supply-side policy uses market incentives and reduced state intervention, for example lower taxes, deregulation and privatisation, rather than direct state provision.**

Question 3

- **M1** cutting marginal income tax raises the after-tax reward to work
- **A1** this increases the incentive to work more hours, enter employment or seek higher-paid jobs, increasing labour supply and productive input
- **A1** therefore potential output rises and LRAS shifts rightwards, other things equal
- **Answer: Lower marginal income tax increases the after-tax reward to work, encouraging higher participation and hours worked, raising labour inputs and shifting LRAS right.**

Question 4

- **M1** lower corporation tax increases retained profits and the after-tax return to investment
- **A1** firms are more likely to undertake capital investment, increasing the stock of capital
- **A1** higher capital per worker raises productivity and potential output, shifting LRAS to the right
- **Answer: Reduced corporation tax increases firms' retained earnings and after-tax returns, encouraging capital investment which raises capital stock and productivity, shifting LRAS right.**

Question 5

- **M1** deregulation reduces barriers to entry and removal of restrictive rules for firms
- **A1** this increases competition, forces firms to cut costs and innovate, and allocates resources more efficiently
- **A1** improved efficiency and innovation raise productive capacity and shift LRAS to the right
- **Answer: Deregulation lowers entry barriers and increases competition, encouraging cost reduction and innovation, improving efficiency and shifting LRAS right.**

Question 6

- **M1** reducing union power can reduce wage rigidity and allow wages to adjust to market conditions
- **A1** this can lower unemployment or reduce structural mismatches by encouraging firms to hire and adjust hours, increasing employment and effective labour supply
- **A1** a more flexible labour market raises productive capacity and shifts LRAS to the right
- **Answer: Weaker union power can reduce wage rigidity, allowing wages and employment to adjust; greater hiring and labour reallocation raises effective labour supply and shifts LRAS right.**

Question 7

- **M1** less generous benefits lower the reservation wage and the incentive to remain out of work
- **A1** this encourages job search and higher labour force participation, increasing the supply of labour available to firms
- **A1** higher participation increases potential output and shifts LRAS to the right
- **Answer: Cutting benefit generosity lowers the reservation wage and incentivises job search, increasing labour participation and potential output, shifting LRAS right.**

Question 8

- **M1** privatisation exposes formerly state-owned firms to competitive pressure and profit incentives
- **A1** this encourages cost reduction, better management and investment, and reduces X-inefficiency
- **A1** greater efficiency and productive investment raise capacity and shift LRAS to the right
- **Answer: Privatisation increases competitive and profit incentives, reducing X-inefficiency and encouraging investment, which raises efficiency and shifts LRAS right.**

Question 9

- **B1** correctly labelled axes: Price level (vertical) and Real GDP/Output (horizontal)
- **B1** initial LRAS drawn vertical at potential output
- **B1** new LRAS drawn vertical to the right of the original LRAS, indicating increased productive capacity
- **B1** brief statement or diagrammatic indication that short-run output may rise somewhat and price level effect depends on AD position, but long-run potential output is higher (award for valid link to price/output)
- **Answer: Axes labelled Price level and Real GDP; LRAS1 vertical at potential output; LRAS2 vertical to the right; short-run output and price effects noted.**

Question 10

- **Level 1** (1-3): Basic statements about the data with minimal linkage to market-based reforms. May describe one or two index values without analysis.
- **Level 2** (4-6): Clear explanation of how productivity changed after 2017, with some use of the index figures and a plausible link to the timing of reforms, but limited analysis of magnitude or alternative causes.
- **Level 3** (7-9): Detailed analysis using the data, quantifying changes in growth rates, explaining how the 2017 reforms could plausibly have affected MFP, and considering short-term variability and other possible influences.
- **Indicative content:**
 - 2016 to 2017 MFP rises from 102.0 to 103.5, an increase of 1.47%, coinciding with the 2017 reforms.
 - 2017 to 2018 MFP falls slightly from 103.5 to 103.0, a fall of 0.48%, suggesting the initial boost was not sustained immediately.
 - 2018 to 2019 MFP then rises to 104.2, an increase of 1.17%, possibly reflecting delayed effects of reforms on investment and efficiency.
 - 2019 to 2020 small fall to 103.8, showing volatility and that other factors (global conditions, demand shocks) can influence productivity.
 - A reasoned argument that reforms may have an immediate signalling effect increasing confidence and investment (explaining the 2017 rise), but capital accumulation and managerial improvements often take time, producing mixed short-term data.
 - Consideration that correlation in timing does not prove causation, and other factors such as global trade conditions or measurement noise could explain year-to-year changes.

Question 11

- **M1** method: $(104.2 - 102.0) / 102.0 \times 100$
- **A1** = 2.16%, to 2 d.p.
- **B1** clear working shown
- **B1** final answer given as 2.16%
- **Answer: Percentage change = $(104.2 - 102.0) / 102.0 \times 100 = 2.16\%$.**

Question 12

- **Level 1** (1-5): Basic statements about corporation tax cuts and a small number of simplistic links to productivity. Little or no development or evaluation, and limited use of economic reasoning.
- **Level 2** (6-10): Developed explanation of how corporation tax cuts could raise investment and productivity, with some consideration of timescale and one or two limitations or alternative measures, but analysis is uneven and judgement is limited.
- **Level 3** (11-15): Clear analysis of mechanisms and timescales, with balanced discussion of strengths and weaknesses, including potential unintended consequences and reference to alternative market-based measures. A partial judgement is offered with some evidence.
- **Level 4** (16-20): Comprehensive analysis covering channels from tax cuts to investment, productivity and LRAS, detailed evaluation of empirical and theoretical limitations, distributional effects and countervailing factors, and comparison with other measures such as deregulation and benefit reform. Well developed judgement.
- **Level 5** (21-25): Thorough, well-structured evaluation with sophisticated analysis of mechanisms, magnitude and timing, critical assessment of evidence and likely real-world outcomes, clear comparison with alternative market-based policies, and a well-supported, balanced conclusion about the relative effectiveness of corporation tax cuts.
- **Indicative content:**
 - Mechanism: lower corporation tax raises after-tax returns and retained earnings, encouraging capital investment, R&D and adoption of productivity-enhancing technologies, shifting LRAS right.
 - Timescale: investment and productivity gains from capital accumulation and organisational change take time, so short-run effects may be limited; initial incentive effects may be faster for FDI.
 - Magnitude: the size of the tax cut matters; small cuts may have negligible effect if other constraints exist, such as demand weakness or skills shortages.
 - Deadweight and distribution: corporation tax cuts primarily benefit shareholders and capital owners; limited direct benefit to workers unless investment leads to higher wages or employment.
 - Crowding out and fiscal offset: tax cuts reduce government revenue unless offset, potentially reducing public investment in infrastructure or education that also raises productivity; financing by borrowing may raise interest rates, crowding out private investment.
 - Firm heterogeneity: many firms are not investment-constrained; for smaller or credit-constrained firms tax cuts that increase cash flow may more directly boost investment than for large firms with ample retained earnings.
 - Alternative market-based measures: deregulation can boost competition and efficiency quickly; reducing benefit generosity can increase labour supply; privatisation may reduce X-inefficiency; sometimes combinations work best.
 - Measurement and uncertainty: productivity responds to many factors; correlation between tax changes and productivity growth is not proof of causation.
 - Comparative judgement: corporation tax cuts can be effective when targeted and accompanied by measures to improve skills and competition, but alone they are unlikely to be the most effective single measure across the whole economy.
 - Conclusion: a balanced view that corporation tax cuts have a role, especially to attract investment, but their effectiveness depends on context and they are unlikely to outperform a package including deregulation, targeted incentives for R&D and labour market reforms in improving UK productivity sustainably.