

2021

AP®

 CollegeBoard

AP® Macroeconomics

Sample Student Responses and Scoring Commentary

Set 1

Inside:

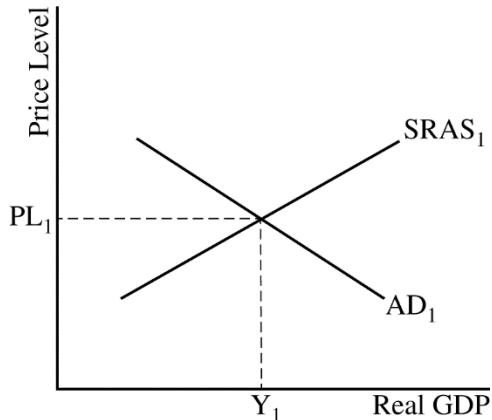
Free Response Question 1

- Scoring Guideline**
- Student Samples**
- Scoring Commentary**

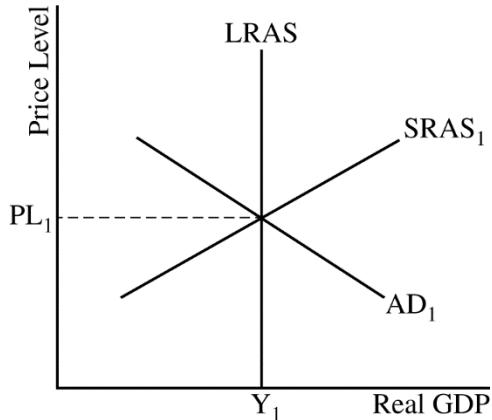
Question 1: Long**10 points**

- (a) State that the Swedish capital and financial account is in deficit and explain that the current account is in surplus and the sum of the current account and the capital and financial account must equal zero ($CA + CFA = 0$). **1 point**

- (b) Draw a correctly labeled aggregate demand–aggregate supply graph that shows PL_1 and Y_1 at the intersection of AD and SRAS. **1 point**

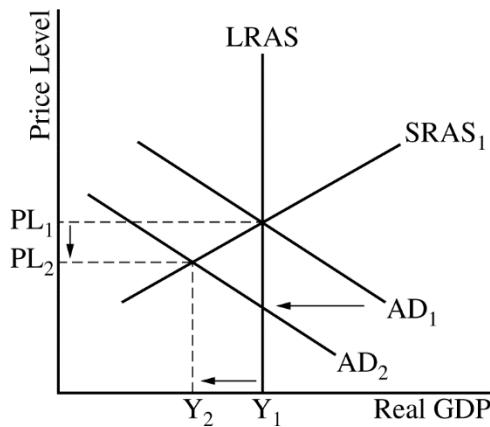


For the second point, the graph must show a vertical LRAS curve at equilibrium real output Y_1 . **1 point**



Total for part (b) **2 points**

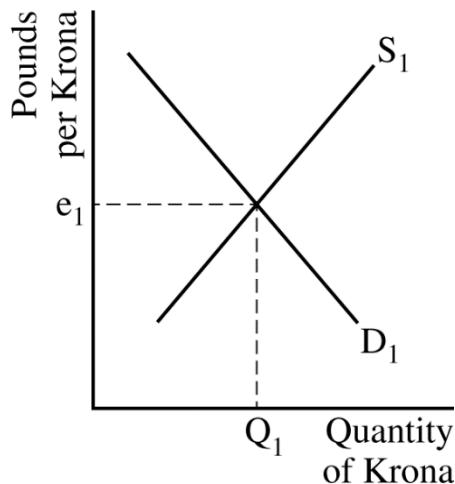
- (c) On the graph from part (b), show the impact of the decrease in imports with a leftward shift of the AD curve, a decrease in real output to Y_2 , and a decrease in the price level to PL_2 . **1 point**



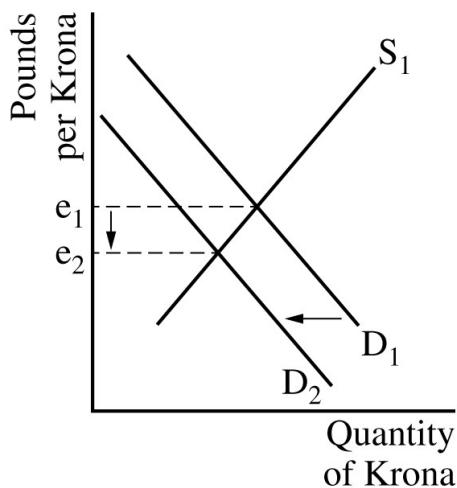
- (d) State that policymakers would be more concerned about cyclical unemployment than inflationary pressures and explain that the decline in exports to the United Kingdom lowered real output below full employment, resulting in unemployment above the natural rate of unemployment. **1 point**

- (e) State that the Swedish central bank should buy bonds. **1 point**

- (f) Draw a correctly labeled graph of the foreign exchange market for the krona. **1 point**



For the second point, the graph must show a leftward shift of the demand curve for the krona, resulting in a decrease in the value of the krona. **1 point**



Total for part (f) **2 points**

- (g) State that Sweden's central bank should sell bonds. **1 point**
- (h) Explain that selling bonds would decrease the money supply and increase interest rates in Sweden, which would increase financial capital inflows into Sweden and increase the demand for the krona, thereby leading to an appreciation of the krona. **1 point**

Total for question 1 **10 points**

Q1 Sample A Page 1 of 2

Question 1 Question 2 Question 3

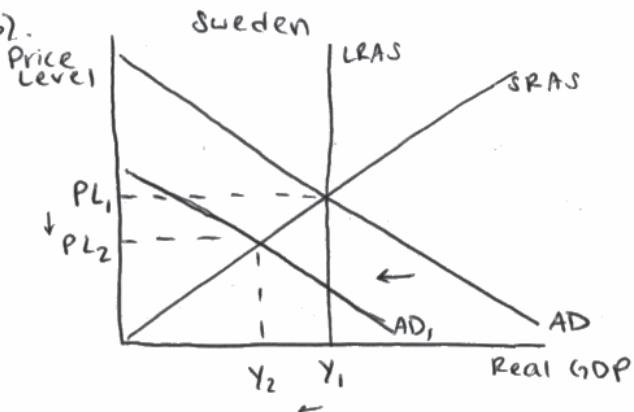


Begin your response to each question at the top of a new page.

(CFA)

- a). The capital and financial account is in deficit because the current account ((A)) is in surplus and $CA + CFA = 0$.

b).

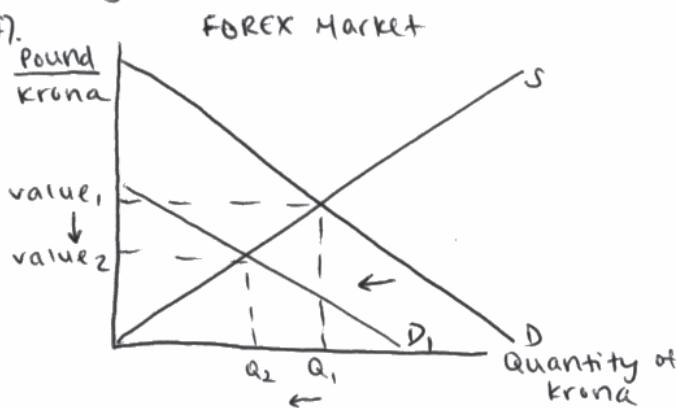


c). see graph

- d). cyclical unemployment; a decrease in imports from Sweden would decrease aggregate demand because net export decreased, meaning that real GDP ~~and~~ (real output) decreases, and Sweden's economy could face a recession that would cause cyclical unemployment.

- e). Buy government securities (bonds)

f).



Q1 Sample A Page 2 of 2

Question 1 Question 2 Question 3



Begin your response to each question at the top of a new page.

- g). sell government securities (bonds)
- h). selling bonds would decrease the money supply for the Swedish Economy, which would cause an increase in the interest rate. Higher interest rates cause foreign investors to invest more money in Sweden, which would result in a currency appreciation, thus reversing the decrease in value resulting from the decrease in the UK's imports from Sweden.

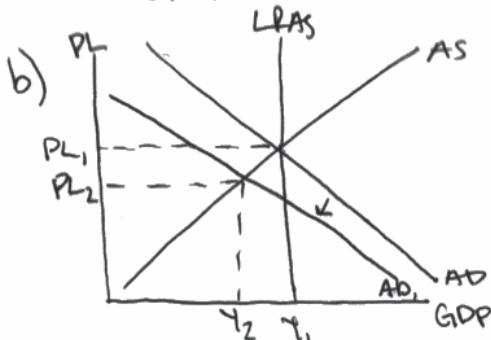
Q1 Sample B Page 1 of 2

Question 1 Question 2 Question 3



Begin your response to each question at the top of a new page.

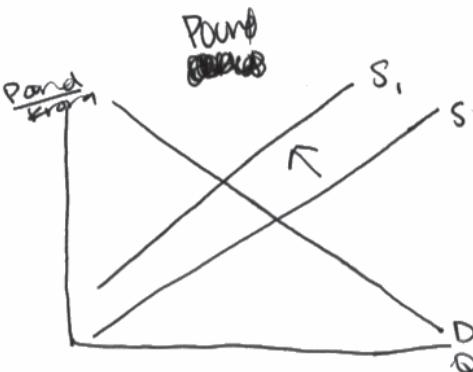
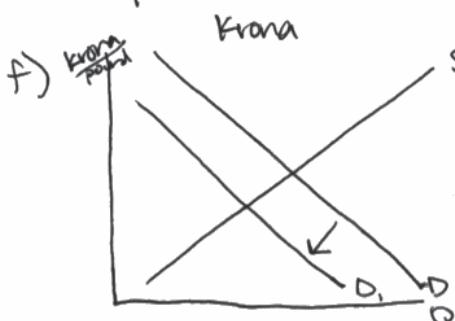
- a) The Swedish capital and financial account is in deficit because the money spent is more than money made in the current accounts.



c) On graph

- d) Policy makers should be more concerned with unemployment because since aggregate demand decreased, that caused inflation to decrease and unemployment to increase because of the lack of demand of exports from Sweden.

e) Buy bonds



Q1 Sample B Page 2 of 2

Question 1 Question 2 Question 3



Begin your response to each question at the top of a new page.

- g) increase reserve requirement
- h) By increasing the reserve requirement, it ~~will~~ will appreciate the currency because interest rates will be higher and AD will also increase.

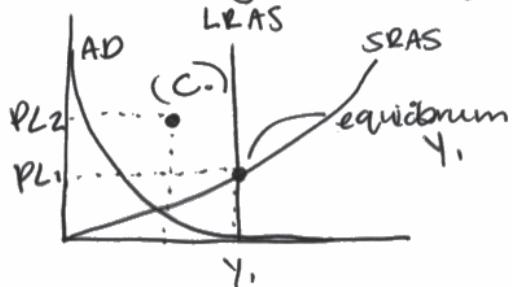
Q1 Sample C Page 1 of 2

Question 1 Question 2 Question 3

Begin your response to each question at the top of a new page.

1. (a) The Swedish capital and Financial account is in surplus because they have a surplus amount of money and are in long run equilibrium.

(b)



- (c.) Sweden should be more concerned about cyclical unemployment because the United Kingdom is decreasing its exports from Sweden, therefore needing less Swedish workers to produce these exports.

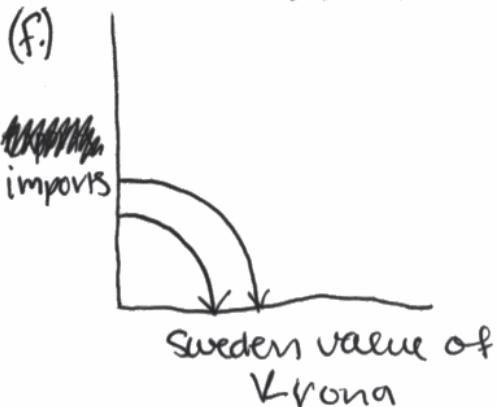
- (d.) The Swedish central bank should decrease its amount of reserves so there is more money in circulation and Swedish citizens buy the excess of what used to be exports to the United Kingdom.

Q1 Sample C Page 2 of 2

Question 1 Question 2 Question 3



Begin your response to each question at the top of a new page.



- (g.) For Sweden to reverse the exchange rate, the should increase the interest rate.
- (h.) Increasing the interest rate will put more money in circulation in the long run.

Question 1

Note: Student samples are quoted verbatim and may contain spelling and grammatical errors.

Overview

The several parts of the question examined students' understanding of the aggregate demand/aggregate supply (AD/AS) model, how changes in demand affect output and employment and the foreign exchange market, and how the central bank can intervene in the foreign exchange market. Students were asked to assume that the economy of Sweden is in long run equilibrium and has a surplus in its current account.

In part (a), students were asked to indicate what will happen to the capital account and financial account of Sweden, and to explain.

In part (b), students were asked to draw a correctly labeled graph of the short-run aggregate supply curve, long-run aggregate supply curve, and aggregate demand curve for Sweden and show the current equilibrium real output Y_1 , and the current equilibrium price level, and label it PL_1 .

In part (c), students were asked to assume that the United Kingdom reduces its imports from Sweden and show what happens on the graph in part (b), labelling the new equilibrium real output, Y_2 , and the new equilibrium price level, PL_2 .

In part (d), students were asked to indicate whether Swedish policy makers would be more concerned about cyclical unemployment or inflationary pressures as a result of the decrease in United Kingdom imports from Sweden.

In part (e), students were asked to indicate what open-market operation the Swedish central bank should use if its goal is to return the economy to long-run equilibrium.

In part (f), students were asked to assume that the United Kingdom's currency is the pound, and the currency of Sweden is the krona. Students were then asked to draw a correctly labelled graph of the foreign exchange market for the krona and show the impact of the decrease in the United Kingdom's imports from Sweden on the value of the krona in the foreign exchange market.

In part (g), students were asked to assume that the Swedish central bank's goal is to reverse the exchange rate change shown in part (f) by changing the interest rate, and to indicate which open market-operation the bank should use.

Finally, in part (h), students were asked to explain how the open market-operation identified in part (g) would reverse the change in exchange rate.

Sample: 1A

Score: 9

- The response earned 1 point in part (a) for stating that the capital and financial account is in deficit and explaining that $CA+CFA=0$.
- The response earned 1 point in part (b) for drawing a correctly labeled aggregate demand-aggregate supply graph showing Y_1 and PL_1 and earned 1 point for correctly showing a vertical LRAS curve at Y_1 .
- The response earned 1 point in part (c) for correctly shifting AD to the left and showing a decrease in real output and price level.

Question 1 (continued)

- The response earned 1 point in part (d) for stating that cyclical unemployment is the concern because of a decrease in AD and real output.
- The response earned 1 point in part (e) for stating that the central bank should buy bonds.
- The response earned 1 point in part (f) for drawing a correctly labeled graph of the foreign exchange market of the krona and earned 1 point for correctly shifting the demand curve to the left and showing a decrease in the exchange rate.
- The response earned 1 point in part (g) for correctly stating that the central bank should sell bonds.
- The response did not earn the point in part (h) because the explanation is not tied to the demand for the currency and capital flows.

Sample: 1B

Score: 5

- The response did not earn the point in part (a) because the explanation does not refer to the fact that the two accounts sum to zero.
- The response earned 1 point in part (b) for drawing a correctly labeled aggregate demand-aggregate supply graph showing Y_1 and PL_1 and earned 1 point for correctly showing a vertical LRAS curve at Y_1 .
- The response earned 1 point in part (c) for correctly shifting AD to the left and showing a decrease in real output and price level.
- The response earned 1 point in part (d) for stating that cyclical unemployment is the concern because of a decrease in AD. The explanations of a decrease in AD and a lack of demand for exports are sufficient.
- The response earned 1 point in part (e) for stating that the central bank should buy bonds.
- The response did not earn the 2 graphing points in part (f) for not drawing a correctly labeled graph of the foreign exchange market for the krona; the vertical axis is incorrectly labeled.
- The response did not earn the point in part (g) because an open-market operation is not identified.
- The response did not earn the point in part (h) because it does not explain how the open-market operation will reverse the change to the value of the currency.

Sample: 1C

Score: 1

- The response did not earn the point in part (a) because the explanation does not refer to the fact that the two accounts sum to zero.
- The response did not earn the 2 graphing points in part (b) for drawing an incorrectly labeled aggregate demand-aggregate supply graph.
- The response did not earn the point for part (c) because AD is not shifted.
- The response earned 1 point in part (d) because it states that cyclical unemployment is the concern and for explaining that fewer workers are needed in export industries.
- The response did not earn the point in part (e) because an open-market operation is not identified.
- The response did not earn the 2 graphing points in part (f) for not drawing a correctly labeled graph of the foreign exchange market for the krona.
- The response did not earn the point in part (g) because an open-market operation is not identified.
- The response did not earn the point in part (h) because it does not explain how the open-market operation will reverse the change to the value of the currency.