

Macroeconomics Tutorial Questions

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General Guidance

Tutorials will run in Hilary Term weeks 2-8, following the departmental lecture series in weeks 1-7. There will also be a vacation assignment, with the final tutorial to be held in first week of Trinity Term. The deadline for written work will be *18:00 on the Friday of the week before the tutorial*.

Please see the departmental Weblearn page for details about departmental lectures:

https://weblearn.ox.ac.uk/portal/hierarchy/socsci/econ/curr_student/undergrad/course

The primary course textbook will be Carlin and Soskice's "Macroeconomics: Imperfections, Institutions and Policies". It is probably worth obtaining your own copy of this. We will mainly use the departmental reading lists (which are included as part of this work pack and available on Weblearn above).

Please either email work or hand in to Richard Povey's pigeon hole in Hertford College. If work is emailed, the diagrams and mathematics may either be done by computer, scanned, or handed in separately.

For each week, I will set three small questions and one essay question. You should be aiming to write no more than 300 words for each small question and no more than 1200 words for the longer essay question.

1 HT Week 2 Tutorial - Economic Growth

1.1 Reading

See departmental reading list for lectures on Economic Growth.

1.2 Small questions

1. An economy is at steady state in the Solow-Swan model. Discuss the short and long run implications of i) a rise in population growth, and ii) a fall in depreciation.
2. Explain the Golden Rule in a Solow-Swan model with exogenous savings. Does the concept of a Golden Rule still apply if savings are endogenous? Is it more realistic to assume exogenous or endogenous savings?
3. Compare and contrast Paul Romer's and Charles Jones' R&D growth models.

1.3 Essay question

Can growth theory help us understand the dispersion of GDP per capita across countries?

2 HT Week 3 Tutorial - Inter-temporal Macroeconomics

2.1 Reading

See departmental reading list for lectures on Inter-temporal Macroeconomics.

2.2 Small questions

1. Suppose that utility (u) from consumption (c) in any period t is given by $u_t = \ln(c_t)$.
 - (i) Using the consumption Euler equation, explain why Hall's random walk result for consumption fails.
 - (ii) How can the properties of logarithmic utility be used to explain the excess smoothness of consumption documented by Deaton (1987)?
2. "The current account moved sharply into deficit during the last quarter, so the policy authorities will soon have to tighten fiscal and monetary policy in order to restore current account balance." Use the inter-temporal model of the current account to evaluate that statement.
3. Consider a model in which the Ricardian Equivalence Hypothesis holds. In period t the government announces plans for an increase in government purchases in period $t + l$, to be financed from debt.
 - (i) How will the announcement of the fiscal expansion affect aggregate real expenditure in period t and period $t + l$?
 - (ii) Suppose the planned fiscal expansion took the form of a tax cut rather than a spending increase. Would this induce a different set of responses in total real expenditure?

2.3 Essay question

Use a standard Real Business Cycle (RBC) model to analyse the macroeconomic effects of a one period reduction in the rate of income tax. Would the effect differ if the reduction in the tax rate was half as large but lasted for two periods rather than one?

3 HT Week 4 Tutorial - Overview of Flexible Price Open Economy

3.1 Reading

See departmental reading list for lecture on Small Open Economies with Flexible Prices.

3.2 Small questions

1. (a) What is the relationship between the slopes of the BT and ISXM (or AD) curve in output/competitiveness space?
(b) What determines the slope of the aggregate supply curve (ERU curve) in output/competitiveness space?
2. Use the Swan diagram to analyse the impact of a country specific expansionary fiscal policy on the real exchange rate.
3. If the ERU curve is vertical, use equations for the ISXM and BT curves to examine the impact of higher world demand on the trade balance.

3.3 Essay question

Does macroeconomic theory suggest that there will be a stable relationship between the government's budget deficit and the current account deficit?

4 HT Week 5 Tutorial - Perfect and Imperfect Competition Models of Labour and Goods Markets

4.1 Reading

See departmental reading list of lectures on Wage and Price Setting; Demand, Supply and Flexible Prices in Closed and Open Economies ; Price Rigidity and Imperfect Competition, Keynesian Microfoundations.

4.2 Small questions

1. Workers/consumers maximize $\sum \beta^t \left(\ln(C_t) - \left(\frac{\kappa}{\psi} \right) L_t^\psi \right)$ where C and L are consumption and labour supply, subject to a budget constraint $w_t L_t + (1 + r_t) A_t = C_t + A_{t+1}$ where w is the wage rate, r the interest rate, and A are beginning of period assets. Derive an expression for labour supply in terms of consumption and wages, and interpret this as a labour supply curve.
2. “The existence of involuntary unemployment depends on the presence of imperfect competition in the labour market, but its level may also depend on imperfect competition in the goods market.” Explain this statement.
3. In imperfectly competitive goods and labour markets, what is the impact of a productivity increase on employment and real wages?

4.3 Essay question

How much of the disagreement between Keynesian and Real Business Cycle theory has to do with differing views about what shocks hit the economy rather than how the economy reacts?

5 HT Week 6 Tutorial - Wage and Price Setting

5.1 Reading

Please see reading list for departmental lectures on Wage and Price Setting; Cost of Inflation, Monetary Policy Basics; Supply Shocks, Cost-push Shocks; The Rational Expectations Revolution, The New Keynesian Phillips Curve.

5.2 Small questions

1. Using diagrams in inflation and output space, analyse the impact of a permanent rise in oil prices on the world economy, making clear your assumptions about the objectives of monetary policy makers.
2. If the expectations of wage setters are static, use the Phillips curve to analyse the impact on output and inflation of a negative demand shock. What assumptions you are making about monetary policy.
3. Is falling inflation likely to be associated with a positive or negative output gap?

5.3 Essay question

“Immigration either leads to falls in real wages or unemployment.” “Immigration helps the economy grow.” Use macroeconomic theory to evaluate these two statements.

6 HT Week 7 Tutorial - Exchange Rate Regimes

6.1 Reading

Please see reading list for departmental lectures on UIP, Dornbusch Overshooting; Fixed Exchange Rates.

6.2 Small questions

1. Explain the economics behind Uncovered Interest Parity (UIP). Suppose UK interest rates increased, but sterling depreciated in response. Could you explain this using UIP?
2. Under a fixed exchange rate regime, what would be the impact on output and inflation of an increase in government spending? How would your analysis differ if the Ricardian Equivalence proposition held?
3. When does UIP imply that domestic interest rates must equal overseas interest rates?

6.3 Essay question

How could we use the current account and the exchange rate to tell whether an open economy had been hit by a supply shock or a demand shock?

7 HT Week 8 Tutorial - Monetary Policy

7.1 Reading

Please see reading list for departmental lectures on Active Monetary Policy; Examples of Time Inconsistency.

7.2 Small questions

1. If the monetary authorities use interest rates to target the money supply, how does this compare with a monetary policy based on a Taylor rule?
2. What factors might influence the choice of an inflation target?
3. What is money neutrality and superneutrality? Why might the latter not hold?

7.3 Essay question

“The time inconsistency problem in macroeconomics only arises if the monetary authority has an unrealistic output target”. Discuss.

8 Vacation Work - TT Week 1 Tutorial - Fiscal Policy

8.1 Reading

Please see reading list for departmental lectures on Fiscal Policy and Debt; Counter-cyclical Fiscal Policy.

8.2 Small questions

1. “If a country has positive government debt, it must run a primary budget surplus.” Is this always true?
2. What is deficit bias, and why is it a problem?
3. What are automatic stabilizers, and why might they be preferable to discretionary action?

8.3 Essay question

When, if at all, should fiscal policy be used alongside monetary policy in the short term stabilisation of the economy? What role does the exchange rate regime play in your answer? How would your analysis be affected if an economy were to join a currency union?