Introduction to Macroeconomics
Some questions on the AS-AD model

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Tentative answers

1. Which of the following policies/events will reduce the natural unemployment rate u_n? Which of them will reduce the unemployment rate u in the short run?:

   (a) A fiscal expansion; **Answer**: Fiscal policy can be used to increase employment and thus reduce u in the short run. In the medium run, fiscal policy cannot change Y_n nor u_n. The natural unemployment rate is a medium-run concept, thus it does not make sense to consider 'reducing u_n in the short run';

   (b) A monetary expansion; **Answer**: For monetary policy, identical remarks hold as for fiscal policy in (a): can be used to reduce short-run u but has no effect on u_n;

   (c) A sudden drop in oil prices; **Answer**: There is no variable such as 'oil price' in the model *per se*. However, Blanchard suggests to see μ as representative of oil prices. A drop in μ indeed reduces u_n, this effect should already be felt partially in the short run;

   (d) Cutting unemployment benefits; **Answer**: Unemployment benefits are a typical variable that may be summarized within the catch-all z. Indeed, a cut in benefits works in the right direction. It reduces workers' bargaining power and lowers the wage-setting curve. u_n decreases, and this effect should again already be felt in the short run;

2. Assume an economy is in its medium-term equilibrium $Y = Y_n$. The government does not wish to change Y_n but it would like to achieve lower C. Which policy will meet this target (same Y_n, lower C) in the medium run: increasing taxes T or cutting government spending G? **Answer**: Fiscal policy does not affect the medium-run natural output Y_n. G does not affect disposable income $Y_D = Y - T$, while T lowers it. Thus, decreasing G does not help, it just leads to a substitution of G by some private investment I. By contrast, higher T leads to less Y_D in the medium run, as Y must be the same as before while T has changed. Thus, there will be less consumption: investment has substituted some household consumption;

3. Suppose you are watching the workings of an expansion over a longer time interval. You know an expansion is going on, but you do not know whether it is a fiscal or a monetary expansion. The expansion starts and ends in the same medium-run equilibrium Y_n.

   (a) How (if at all) could you tell apart the monetary and the fiscal expansion if you watched the AS-AD diagram only? **Answer**: You cannot tell the two apart. Both policies first move the AD curve (out), then the AS curve (in);

   (b) How (if at all) could you tell them apart if you inspected the IS-LM scheme only? **Answer**: With fiscal policy, the IS curve first moves (out), then the LM curve moves (in), at the end of the day i will have increased. With monetary policy, the LM curve moves out then in, while the IS curve does not move at all.