ECONOMICS 101  QUIZ #4 A  2 April 2018  NAME

You MUST show your work clearly for full credit.

1. (10 pts) Let \( Y_c = 400 + 15(G-T) + 2(Ms) \), \( G = 400 \), \( T = 355 \), \( Ms = 520 \) and \( Y_f = 2000 \)

a. Is this economy in a bubble or in a recession? Explain.

b. Draw a “Phillips curve” and show CLEARLY where this economy is on that Phillips curve. Is inflation high or low? Is unemployment high or low?

2. (6 pts) Deficits and Debts -- In 2017, tax revenue is $6000, Non-interest spending is $5800, and the current interest rate on debt is 8%. At the beginning of 2016, government debt is $7000.

a. What will the debt be at the end of 2017?

b. If tax revenue increases by 4% and non-interest spending rises by 3%, what will the deficit be in 2018 (the next year) if interest rates don’t change?

3. Interest rates and Present Value (8 pts)

a. If the interest rate is 8% should you pay A. ($1000 today) for a used car or B. ($1500 in five years)? Which is better (A or B)? By how much?

b. What is the present value of a three year, $1 million bond with a coupon rate of 12% when today’s interest rate is 8%?

4. Money (4 pts) In our country, consumers carry $500 of cash in their pockets and at home and also have $150 worth of gold. They also have $750 in their chequing account, $2500 in their savings accounts and $650 in near bank deposits (credit unions, etc.) Banks have $1500 of cash in their vaults. Businesses have $350 of cash in their cash registers, $1250 in their chequing accounts and $450 in their savings accounts. Consumers have credit card balances outstanding of $2000 and bank loans outstanding of $3500. Businesses have bank loans outstanding of $5500.

a. How much M1 is in this economy?

b. What is the M1 deposit multiplier for this economy? 

5. Open market operations. (12 pts) The demand for loanable funds is 100-150r and the supply is 68+250r (Q in billions).

a. What is the current interest rate?

b. The central bank thinks the interest rate should be 10%.

What will be the “reserve bid price” of a three month $1 million T-bill?

Will the central bank be printing money or “eating” money?

How many dollars worth of T-bills will the central bank buy or sell?
6. (10 pts) Short Explanations

a. What is the difference between Keynesian economists’ views and New Classical economists’ views about whether the economy is in equilibrium and what makes it not be in equilibrium?

Keynesian: Consumers and Investors feelings of confidence can go through great fluctuations. When overconfident, they want to buy, buy, buy and the economy goes into overdrive. But when they become worried, they stop buying and the economy shrinks. Since these feelings are self-fulfilling, the economy can get stuck in overdrive or in recession. Thus sometimes the economy is stuck above equilibrium (bubble) and sometimes below equilibrium (recession) and voluntary forces are not strong enough to put the economy back to equilibrium.

New Classical: The economy is self-regulating. When the economy is below equilibrium, employers see profit opportunities in workers willing to work for lower wages. These workers will get hired and the economy will recover. When the economy heats up too much, costs will rise causing the economy to slow. In other words, the economy, by itself, heads towards equilibrium.

b. What is the difference between Keynesian economists and New Classical economists in their views about the effectiveness of counter-cyclical fiscal policy?

Keynesian: Since the economy by itself bounces back and forth between overdrive and recession, it needs the calming of countercyclical fiscal policy to keep the economy close to equilibrium and optimal growth. When the economy is in recession, the government should used expansionary fiscal policy to boost the economy back to its optimal growth path. When the economy is growing too fast, the government should apply brakes (higher taxes, lower government spending) to keep the economy from wasting resources on projects that are too ambitious to be sustainable.

New Classical: Since the economy is self-equilibrating, there is no need for the government to interfere. Government should spend for good microeconomic reasons (the particular government project is more productive than the private spending it replaces) not for macroeconomic reasons since there is no free lunch. Government spending does not cause total spending to rise about its capacity. It just replaces (and crowds out) private spending. Since government is unlikely to know the best use of resources, the usual advice is to keep to low levels of government spending and taxes. Another worry is that government spending must be paid for. If debts rise, eventually these could have negative effects on future potential growth.