Intermediate macroeconomics

Literature, Russian Literature

Intermediate macroeconomics Business cycle refers to the fluctuations in the economic activities taking place in the economy over a period of time. Business cycle undergoes four basic stages namely recession, trough, recovery and peak or boom. Recession refers to periods of contracting economic activities characterized by low production and unemployment level. Trough is a period of stagnant economic growth. Recovery is the above-average economic growth period while the peak marks the highest level of economic growth in which the economy is at full employment. NBER defines recession as a significant decline in economic activities over a given period of less than few months expressed in real GDP or income level. The cycle can be illustrated graphically as shown below.

Potential output is the total production of output that is possible when all the factors of production are fully and efficiently employed. For example when the unemployment rate is about 5% since a 0% unemployment rate cannot be achieved in real economic conditions. Actual output is the real physical output that has actually been produced in the economy. Output gap is therefore expressed as the difference between the potential output and the real output. Large output gap is an indication of increased unemployment rate. The neo-classical theory uses output gap to explain business cycle.

The IS is a curve that traces the interest rate (r) and the output level (y) that keeps the product market in equilibrium. It can be derived using the following equation.

Y= c[y-t(y)]+i(r)+g dy= c’(dy-I’dy)+I’dr = c’dy-c’I’dy+I’dr dy-c’(1-i’)dy= I’dr dy(1-c’(1-i’)d= I’dr dy= I’dr/1-c’(1-i’) dy/dr= I’/1-c’(1-i’)

The expenditure multiplier explains the amount o change in output due to a

unit change in government expenditure while tax multiplier explains the amount of change in output due to a unit change in tax rate.

The LM is a curve that traces the output(y) and the interest rate (i) that keeps money market in equilibrium. It can be derived by the following equation

m/p= l(r)+k(y) i’dr = -k’dy dr/dy= k’/l’

If the sensitivity of money demand to the interest rate increases, the LM curve shifts to the left indicating an increase in interest rate as well as a decrease in output level.