Aggregate Supply/Demand

Macroeconomic Equilibrium
• Macroeconomic equilibrium occurs when aggregate demand (AD) = aggregate supply (AS)
• Changes in the Macroeconomic equilibrium can be caused by changes in AD or AS

Aggregate Demand/Supply Definitions
• Aggregate Demand (Supply) – the inverse relationship between total real demand (supply) for goods and services and the aggregate price level
• There are two aggregate supply situations
  – Long-run AS (LAS) – assumes that all factor markets are in equilibrium (full employment). LAS thus occurs at the “potential” level of real output (Potential real GDP)
  – Short run AS (SAS) – assumes that all factor prices are constant
AD determinants

- AD is a function of several variables
  - Policy Variables (M, g, t)
  - International Variables (E, y*, P*)
  - Expectational Variables (Π)
- Thus, we can write that

\[ AD = f(M, g, t, E, y*, P*, Π) \]

AS Determinants

- AS is a function of several variables
  - Factor availability (L, K)
  - Technology and incentives (tech)
  - Short run: factor prices (W)
- Thus, we can write that

\[ LAS = f(L, K, tech) \]
\[ SAS = f(L, K, tech, W) \]

Secular Trends

- Output grows because of:
  - Labor force growth
  - More skilled labor force
  - Investment
  - Improved technology
- These factors increase potential output and shift LAS
- Note that prices rise if aggregate demand increases more than the secular rise in potential output
Cyclical Fluctuation Example

- Suppose that a rise in AD causes output to rise above potential.
  1) Output increase raises factor demand. This causes factor prices to rise.
  2) Factor prices affect SAS.
  3) This wage/price adjustment continues until output falls back to potential.
  4) This causes no change in potential GDP but leads to inflation.

Recessionary/Inflationary Gaps

- Recessionary (Inflationary) Gap – the difference between the equilibrium level of GDP and the potential level of GDP when the economy is at less than (greater than) full potential
- Inflation
  - Demand-Pull – inflation caused by increases in AD
  - Cost-push – inflation caused by continuous AS decreases