Demand for Money (M_d)

Demand for real balances $\frac{M}{P}$

- want money because of its purchasing power.
- why people choose to hold money rather than some other type of asset.

1. **Transactions Motive** — need to hold some quantity of money balances to carry on day to day economic dealings

$$\uparrow Y \Rightarrow \uparrow C \Rightarrow \uparrow M_d$$

income elasticity of M_d

2. Precautionary Motive – desire to hold some quantity of money balances to meet unforeseen emergencies or contingencies.

3. Speculative Motive – desire to hold a part of one's assets in the form of cash in order to take advantage of future market movements

↑ r ⇒ more costly to hold money rather than bond
⇒ ↓ Md

Expectation of ↑ future interest rates
(e.g. due to expected ↑ government budget deficit
⇒ Md shifts right
As people shift from holding bonds to holding cash, price of bonds ↓ ⇒ current r ↑

Liquidity trap – M_d tends to become perfectly elastic at very low r.

Expectations about the future price of all income-earning assets have become so pessimistic that no one would hold such an asset because of the risk of a severe capital loss

⇒ Central Bank have lost all practical control over interest rate

Bonds pay a fixed coupon rate

↑ Price of bonds ⇒ ↓ r

↓ Price of bonds ⇒ ↑ r

eg. US quantitative easing to stimulate economy

Japan's low interest rate and BOJ expanding their Asset Purchase Program

Standard monetary policy of buying short term government bonds is no longer effective

⇒ Buying financial assets of longer maturity from commercial banks (QE1, QE2, QE3)

IS curve goods market equilibrium

↓ r ⇒ ↑ I ⇒ ↑ Y

Slope of IS curve depends on :

1. interest elasticity of investment
2. value of multiplier (depends on MPC)

↓ r ⇒ larger ↑ I

⇒ larger multiplied ↑ Y

⇒ flatter IS curve

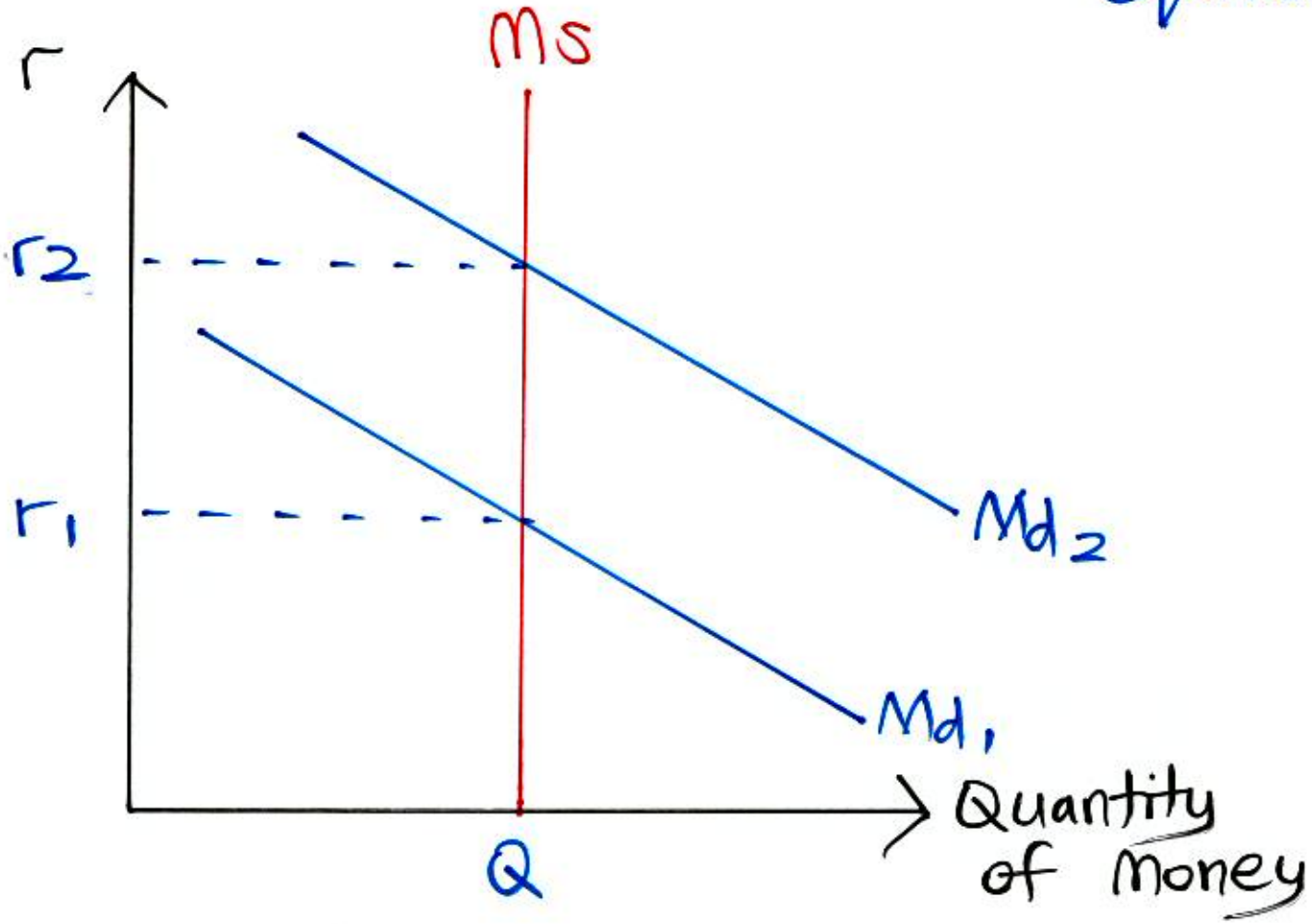
↑ G , ↓ taxation , ↑ business confidence

⇒ IS shifts right

↑ Y ⇒ ↑ Md

⇒ Md shifts right

⇒ ↑ r to maintain money market equilibrium



Limiting cases

(i) Classical range

M_d is perfectly interest inelastic

$\Rightarrow$ LM curve is vertical

(ii) Liquidity trap

M_d is perfectly interest elastic

$\Rightarrow$ LM curve is horizontal

Keynesian Neoclassical Synthesis (KNS)

Y below Y_F ⇒ underemployment
⇒ excess supply of labour
⇒ persistent unemployment if W rigid

Keynes effect

W↓ ⇒ ↓ costs
⇒ ↓ P
⇒ ↑ real Ms = $\frac{M}{P\downarrow}$
⇒ Ms shifts right
⇒ LM shifts right
⇒ ↓ r
⇒ ↑ I ⇒ ↑ AD
⇒ ↑ Y, ↑ P

$w\downarrow = \frac{W\downarrow}{P\downarrow}$

Liquidity trap

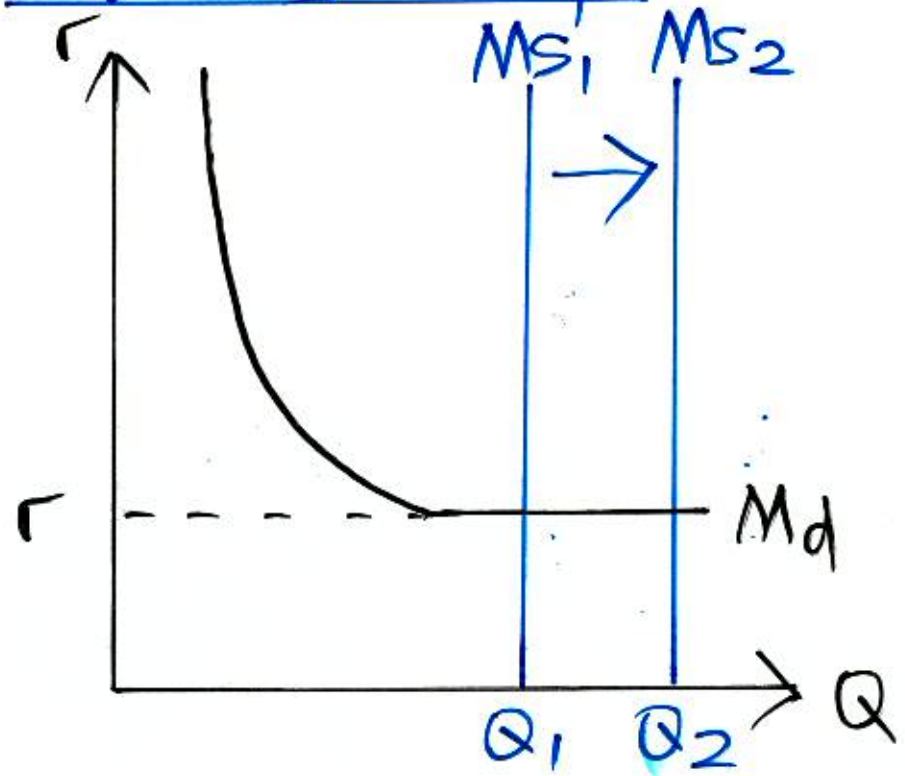
W↓ ⇒ ↓ costs
⇒ ↓ P
⇒ ↑ real Ms = $\frac{M}{P\downarrow}$
⇒ Ms shifts right
Md horizontal
⇒ no change in r
no change in

$\bar{w} = \frac{W\downarrow}{P\downarrow}$ balanced deflation

Interest inelastic I

W↓ ⇒ ↓ costs
⇒ ↓ P
⇒ ↑ real Ms = $\frac{M}{P\downarrow}$
⇒ LM shifts right
⇒ steep IS
⇒ ↓ r
⇒ small ↑ I
⇒ Y still below Y_F

Liquidity Trap



All ↑ M_S absorbed by ↑ M_d

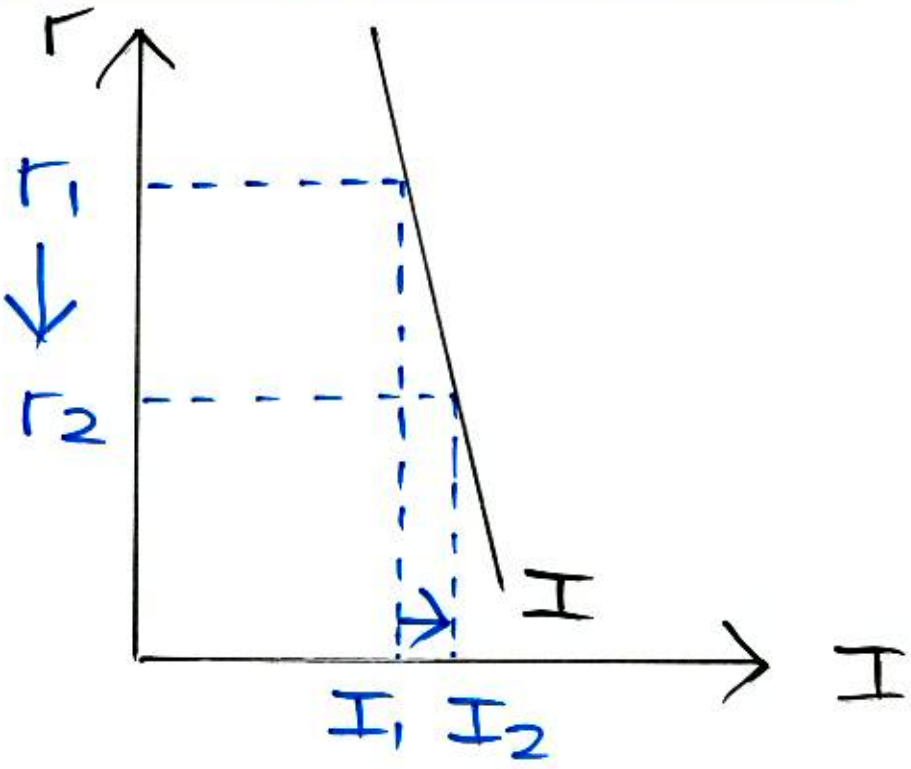
⇒ no ↑ in asset holdings

⇒ no ↑ in price of bonds

⇒ no ↓ r

No confidence in asset market

Interest inelastic I



↓ r ⇒ small ↑ or no ↑ in I

No confidence in goods and services market

1. Economy is inherently unstable and subject to erratic shocks
   Change in business confidence / investors' 'animal spirits'
2. Economy is not rapidly self-equilibrating
3. Authorities can intervene to influence the level of aggregate 'effective' demand to ensure a more rapid return to full employment
4. Fiscal as opposed to monetary policy as effects of fiscal policy are more direct, predictable and faster acting on AD

Criticisms of Keynesian Neoclassical Synthesis

1. Model fails to provide a robust 'general theory' of underemployment equilibrium and that the possibility of underemployment equilibrium rests on two highly limiting / special cases.

2. ISLM is a aggregate demand model. There is no mention of aggregate supply and no explanation / determination of changes in price level and inflation.

3. Assumes a constant trade off between inflation and unemployment ie. stable Phillips curve.

Model uses the Phillips curve to predict the rate of inflation which would result from different target levels of unemployment being attained by activist AD policies

It allows the theory of output and employment determination to be linked to theory of wage and price inflation (see textbook Page 142)

4. The 1970s brought about stagflation (high unemployment and high inflation) and the breakdown of the stable Phillips curve.

This set the stage for the monetarist school of thought.