

Theme: alternative ways to manage a macroeconomy

Note 1: for use with webnotes: 221, 222, 223, 224, 225 + 226

Syllabus Items: 34-41
See Webnote 507 for reading schedule

Items: HL only 39-41

2.2 **10** Big Ideas



section 2.2 The BIG ideas!

Webnote 220

I.b Syllabus 2.2: Aggregate Demand and Aggregate Supply

221 Macro model No 1: Introduction to the AS / AD Model (p)

222 Inflationary Gap and recessionary gap

223 Keynesianism vs Monetarism

224 Keynesian Multiplier (HL)

225 Keynesian Multiplier (HL)

226 Multiplier (HL)

227 AS + AD

Big Ideas 2.2...

Search

229 - IB Q's + Big Ideas for 99

99 - Notetaker

Syllabus 2.2 AS + AD

221 - AS + AD (Short)

227 AS + AD (Long)

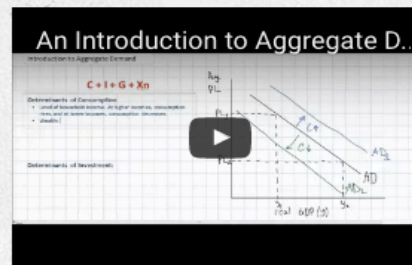
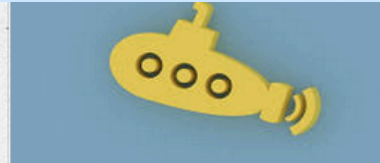
222 In(de)flationary Gap

223 Keynes versus Monetarists

224 What is the Keynesian Multiplier?

225 Keynesian Multiplier Example

226 Keynesian Multiplier for Math by Knoll



You Tube 2.2

Dictionary:

2.2 - Aggregate Demand and Supply

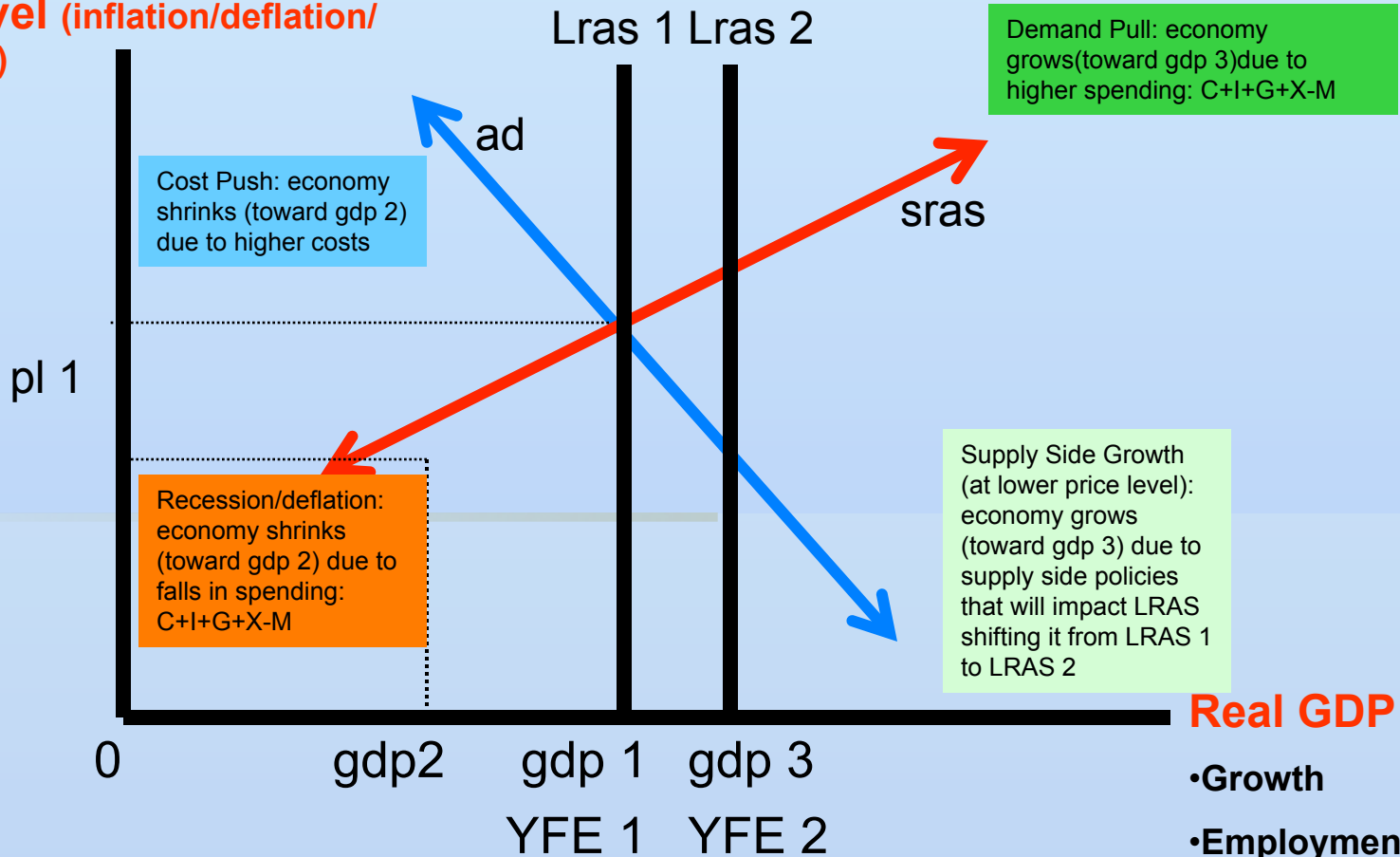
1. aggregate demand
2. aggregate supply
3. deflationary gap
4. equilibrium national income
5. full employment national income
6. inflationary gap
7. Keynesian economics
8. Keynesian LRAS
9. LRAS
10. Milton Friedman school
11. Monetarism
12. Monetarist LRAS
13. SRAS
14. supply shock

What can happen in the macro economy? 4 alternatives.

see webnote 328 (recessionary gap)

Read Blink
pp 193-194

Price Level (inflation/deflation/
disinflation)



Real GDP

- Growth
- Employment
- National Income

What cause a shift in AS?

What can happen in the macro economy? 4 alternatives.

see webnote 328 (recessionary gap)

Read Blink
pp 193-194



SRAS

LRAS

1. **WAGE RATES:** rise or fall
2. **RAW MATERIALS:** costs of inputs rise or fall (e.g. oil)
3. **IMPORTS-** rising import prices cause sras to shift from sras 1 to sras 2.
4. **TAXES+SUBSIDIES:** both affect ability of firms to produce

1. Changes in Q + Q of capital investment
2. Changes in Q + Q of labour

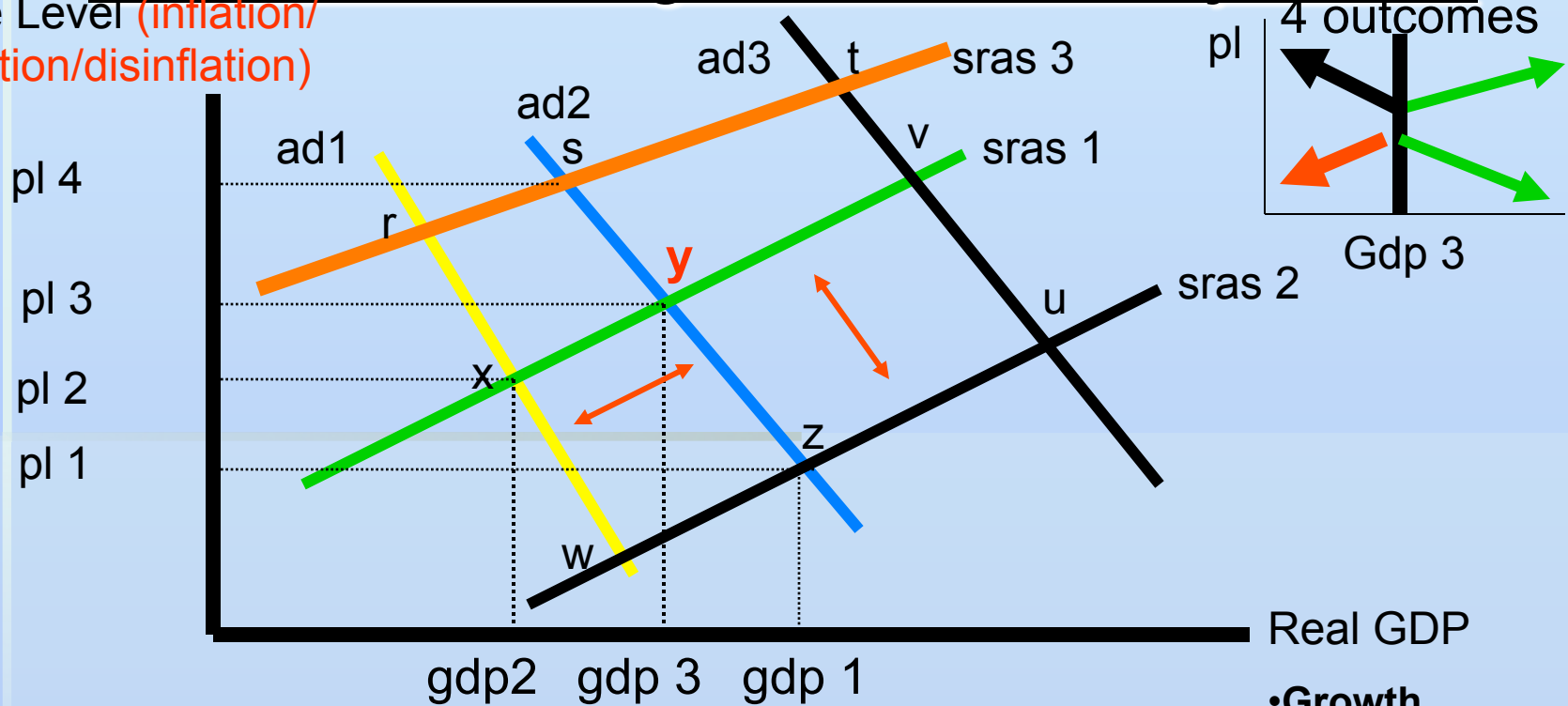
Supply side policies - see webnote 261 to understand how to shift LRAS

Aggregate Demand / Aggregate Supply

Model shifts and moves to determine inflation and growth

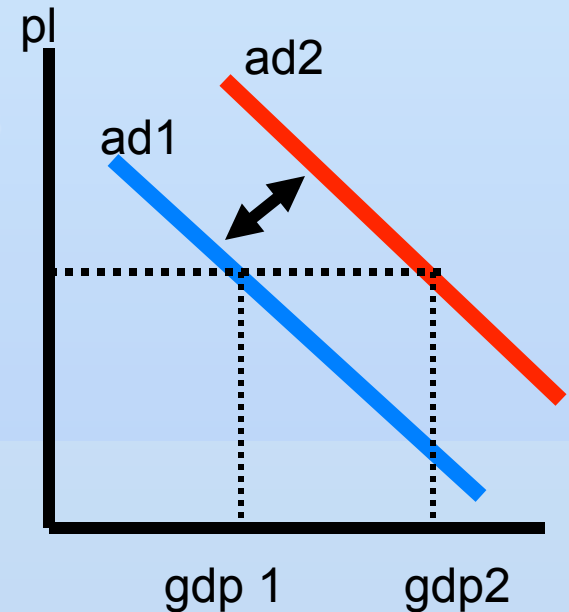
■ AS-AD to Manage economic objectives

Price Level (inflation/
deflation/disinflation)



5 factors cause a Shift in AD? $AD = C + I + G + (X - M)$

1. Fiscal policy- e.g. + or – in direct taxes change Consumption
2. Monetary policy- +or- in interest rates
3. Foreign income changes
4. Expectations www.ifo.de
5. External (outside economy) shocks - oil

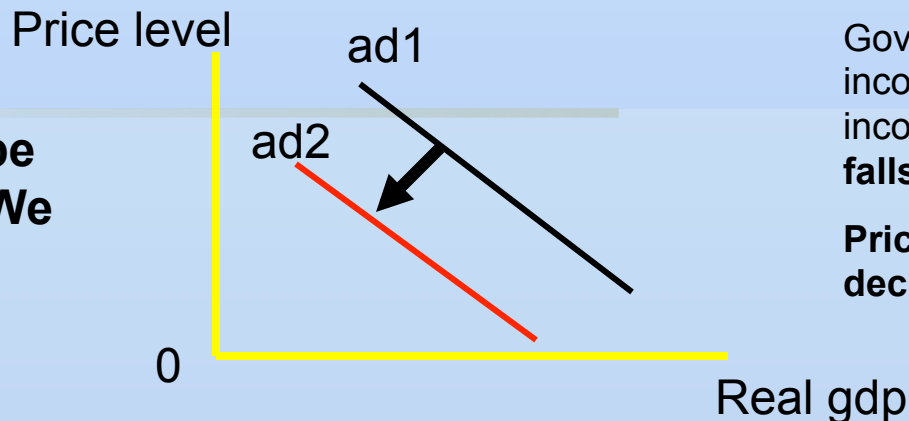


What causes a Shift in AD? **example**

- Fiscal policy: example of how it affects AD
- Government intends to leak the economy because of a fear of inflationary pressure

How will economy be affected? We can only fully see when we insert AS.

webnote 220 Big Ideas



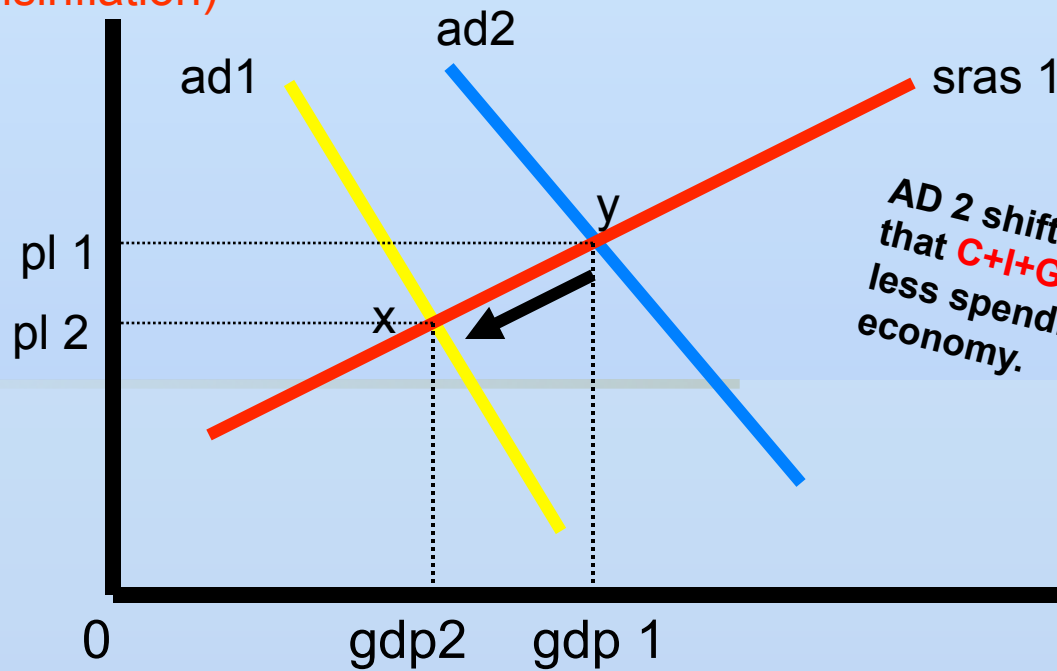
Government raises direct taxes on income to reduce disposable income. Spending by consumers © falls: AD 1 → AD2

Price level falls and gdp declines!

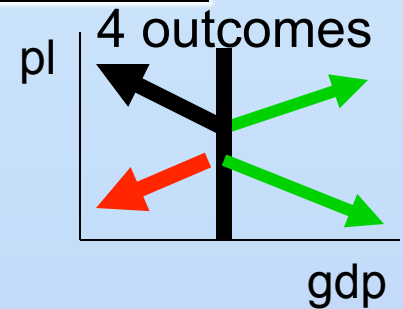
What causes a Shift in AD? **Recession** (2 consecutive quarters of declining growth)

■ AS-AD to Manage economic objectives

Price Level (inflation/
deflation/disinflation)

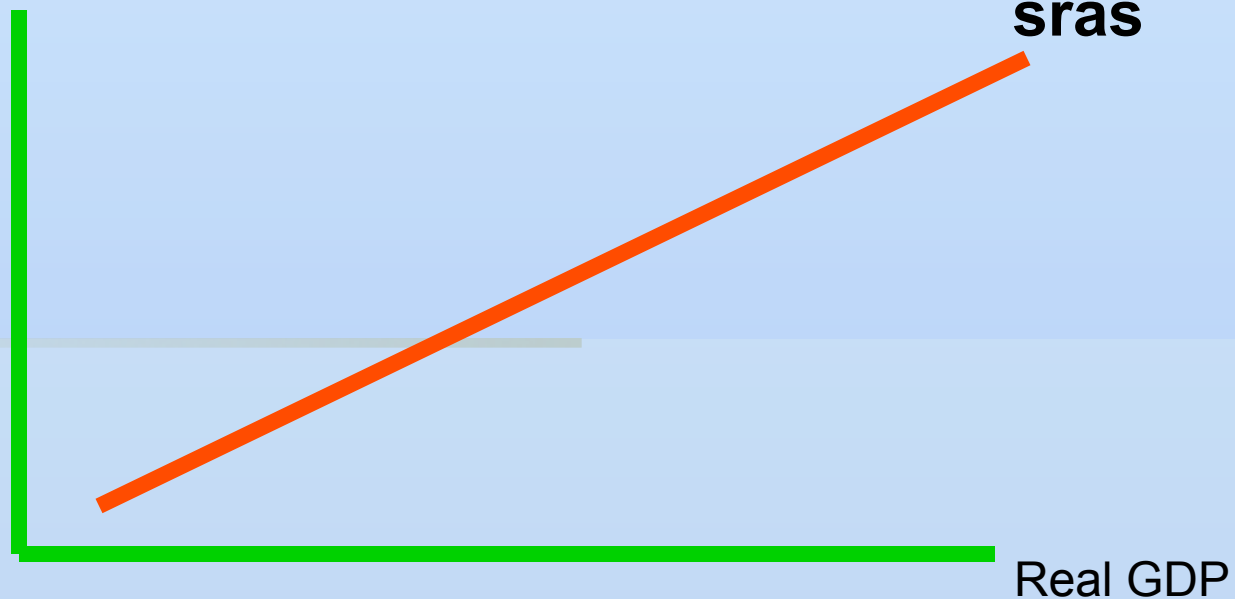


AD 2 shifts to AD 1 showing that **C+I+G+X-M** is causing less spending in the economy.



AS (aggregate supply)

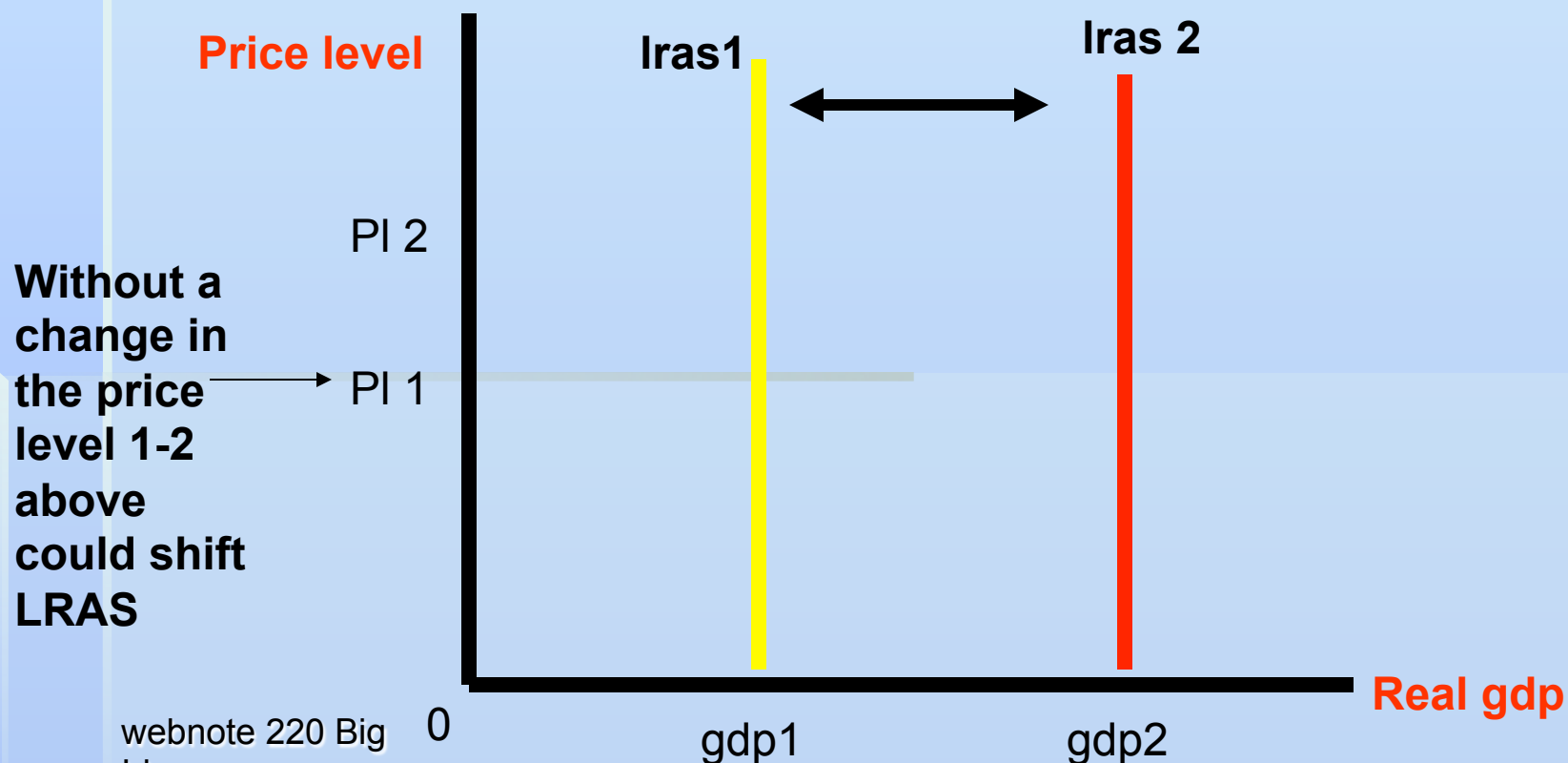
Price Level (inflation/
deflation/disinflation)



3 factors that causes **LRAS** to shift ?

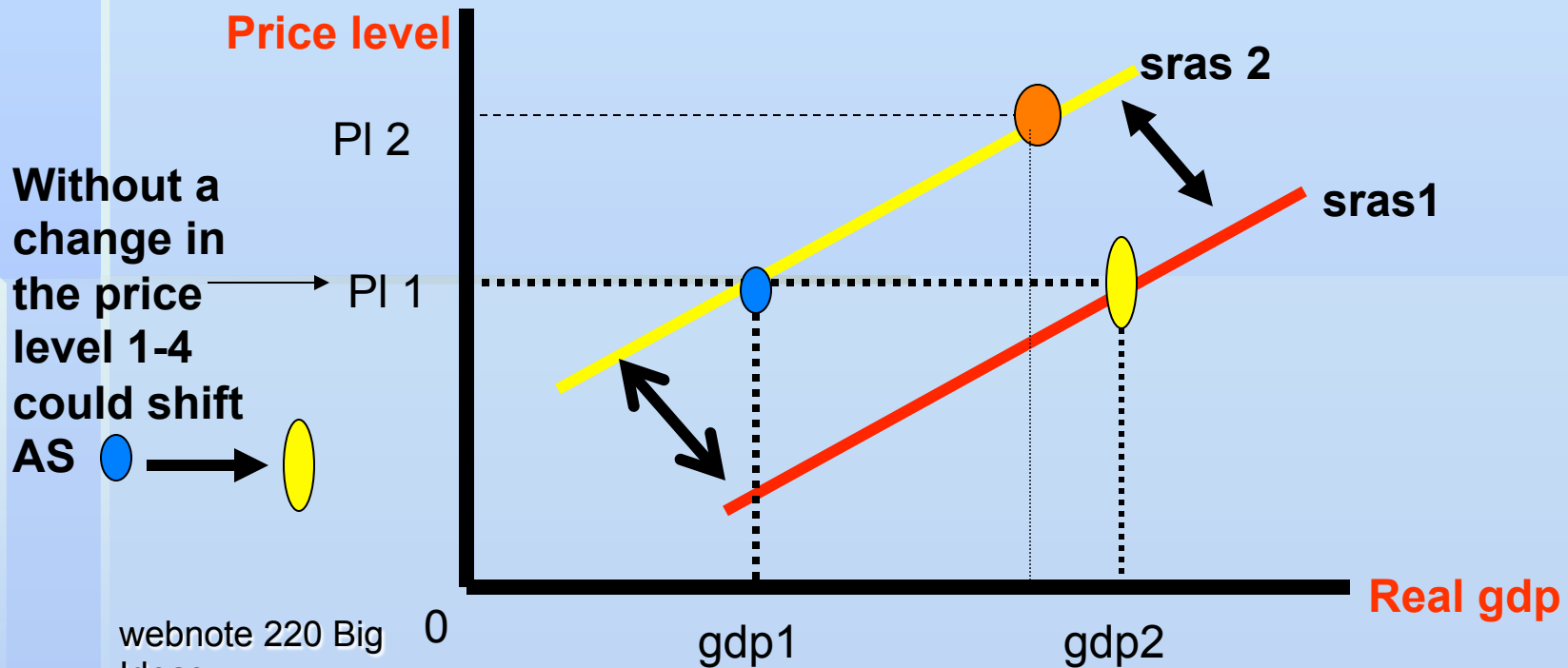
1. Changes in Q + Q of capital investment
2. Changes in Q + Q of labour

Supply side policies - see webnote [261](#) to understand how to shift LRAS



4 factors that causes **SRAS** to shift ?

1. **WAGE RATES:** rise or fall
2. **RAW MATERIALS:** costs of inputs rise or fall (e.g. oil)
3. **IMPORTS-** rising import prices cause sras to shift from sras 1 to sras 2.
4. **TAXES+SUBSIDIES:** both affect ability of firms to produce



Aggregate supply (**AS**) of final goods or labour in a whole economy

- Represents total output in an economy
- **OR**
- Total supply of labour in the macroeconomy.
- Therefore it can be used to show a ‘**final goods**’ view or a ‘**labour**’ view of the economy

2 versions of LRAS

Features:

- Shape of **LRAS** curve is **disputed** see Keynes vs Monetarists
- The key issue amongst economists is the shape of the **LRAS**. To what extent does it take a vertical shape? It is this vertical trend which leads to inflationary pressure
- Alternative interpretations exist as to the shape: **you must know these!**
- The key issue is at which point the economy is currently operating. See gdp Y on slide 3

utube

see UTUBE 2.2 Episode 25 "Macroeconomic Viewpoints" . Rating: 8/10

Price level

Lras 1

capacity

capacity

Lras 2

LRAS 1 shows the **Keynesian** model
While LRAS 2 represents the **neo classical** model of LRAS

'slack'

'scarcity'

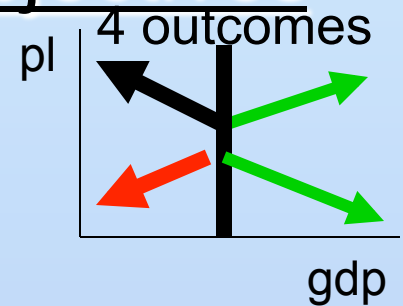
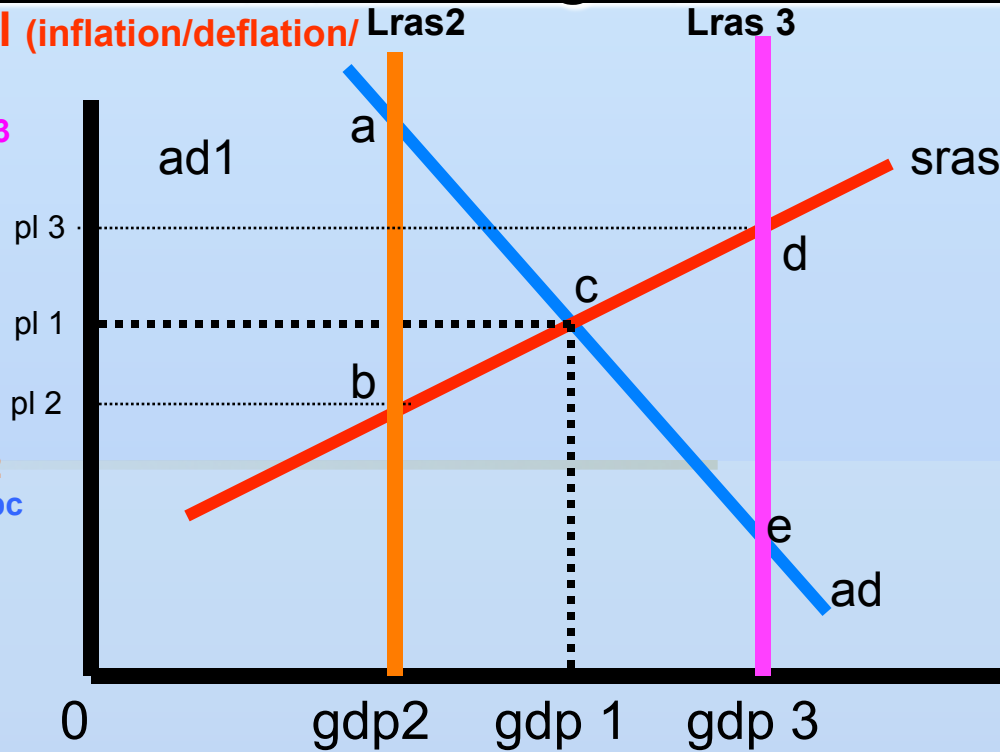
Economy often does not operate at full employment (yfe) level of national income = In (de) flationary Gap
 see webnote 328 (recessionary gap)

■ AS-AD to Manage economic objectives

Price Level (inflation/deflation/disinflation)

Using yfe 3 / **LRAS 3**
 recessionary gap is **cde** as in short run economy is operating below capacity at gdp 1-pl 1

Using yfe 2/ **LRAS 2**
 inflationary gap is **abc** as in short run the economy is operating above capacity at gdp 1-pl 1



Read Blink
 pp 193-194

Real GDP

- Growth
- Employment
- National Income

In (de) flationary Gap

see webnote 328 (recessionary gap)

Monetarist – (neo)classical view

Price Level

(inflation/deflation/disinflation)

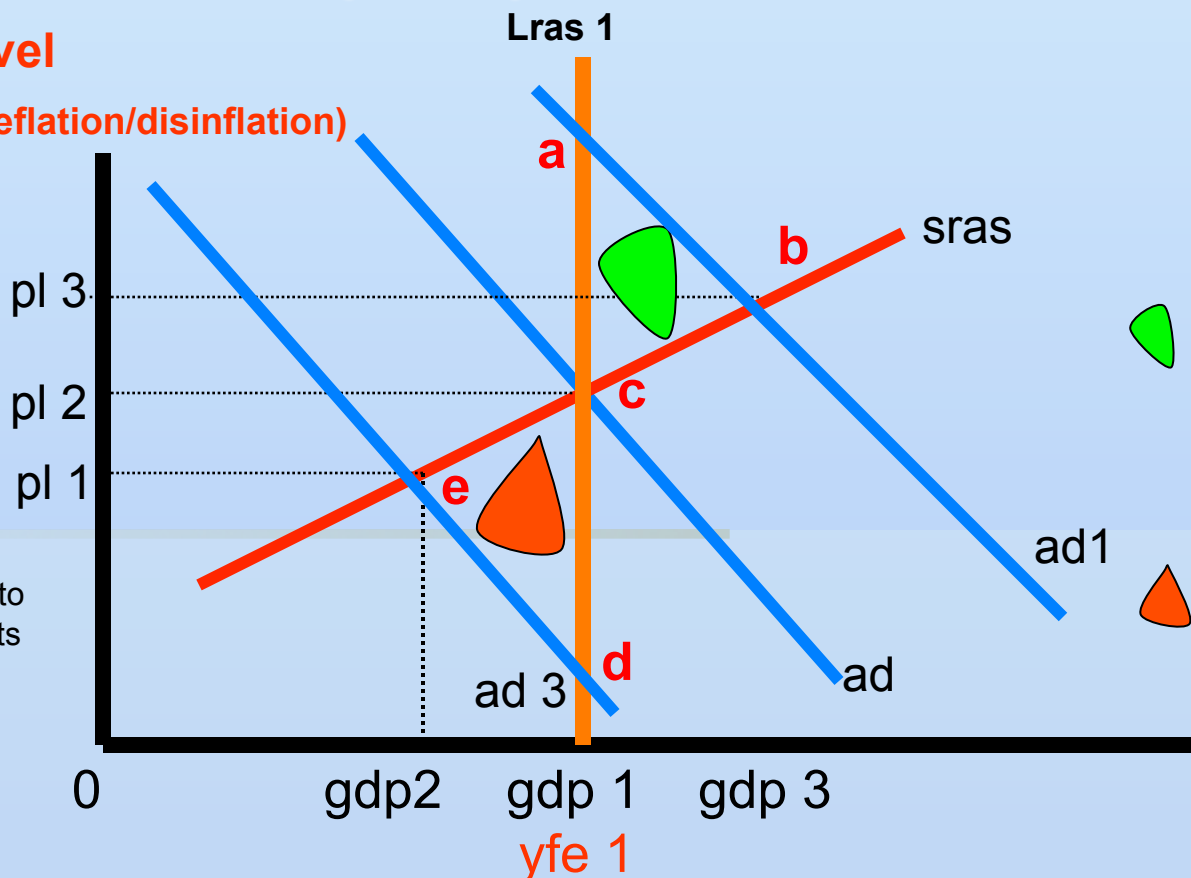
Note: **yfe** changes according to the shifts in the LRAS

Starting analysis at LRAS 2 point 'C':
What allows **gdp 3** to occur when AD shifts to AD1?

Answer:

Natural rate of unemployment falls and output can increase temporarily to gdp 3.

webnote 220 Big Ideas



Note: Lras 1/gdp 1 represents economic 'utopia' as the long run and short run equilibrium is the same at gdp 1. The same situation exists for Lras 3/gdp 3.

At Lras 1/yfe 1 an inflationary gap occurs as the short run equilibrium exceeds capacity (at point 'b') where ad1 cuts sras. Inflationary gap = abc or gdp1-gdp3

At Lras 1/yfe 1 a deflationary gap occurs as the short run equilibrium (occurs at 'e') is less than capacity (gdp 3) where ad 3 cuts sras. Deflationary gap = dec or gdp 2-gdp1.

Real GDP

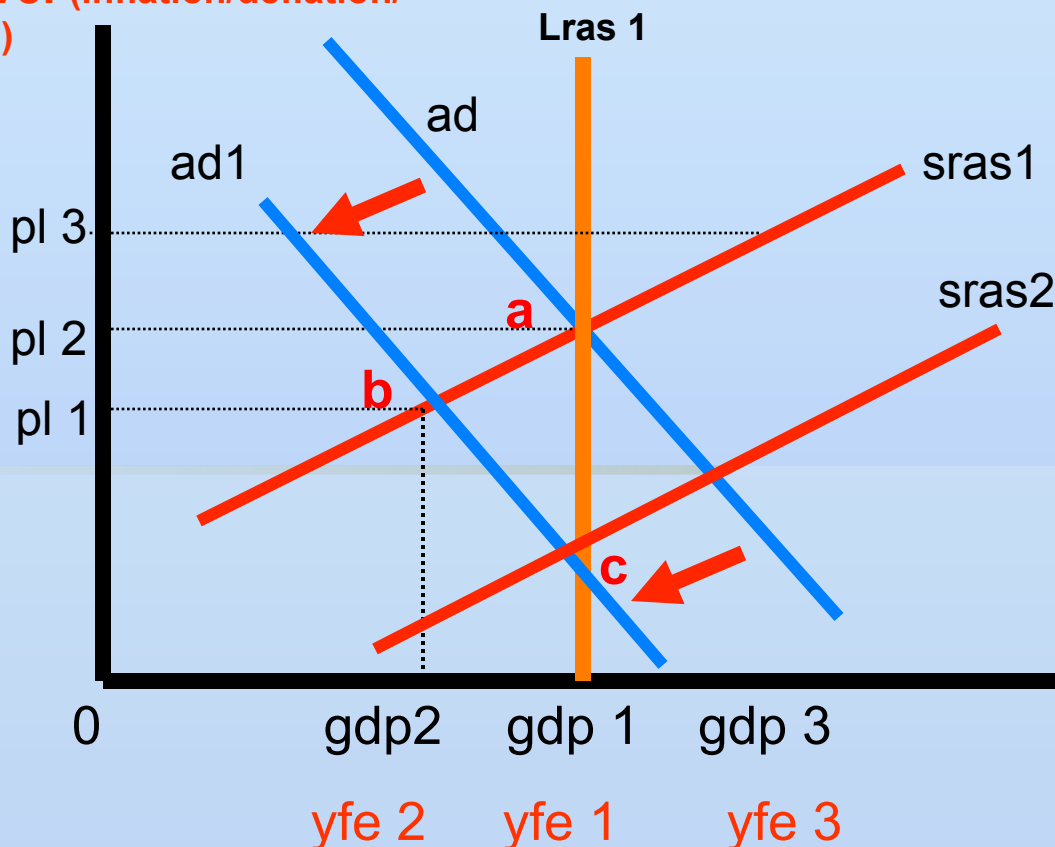
- Growth
- Employment
- National Income

In (de) flationary Gap

see webnote 328 (recessionary gap)

Monetarist – classical view is that economy will adjust prices and wages so that Y_f will be maintained.

Price Level (inflation/deflation/
disinflation)

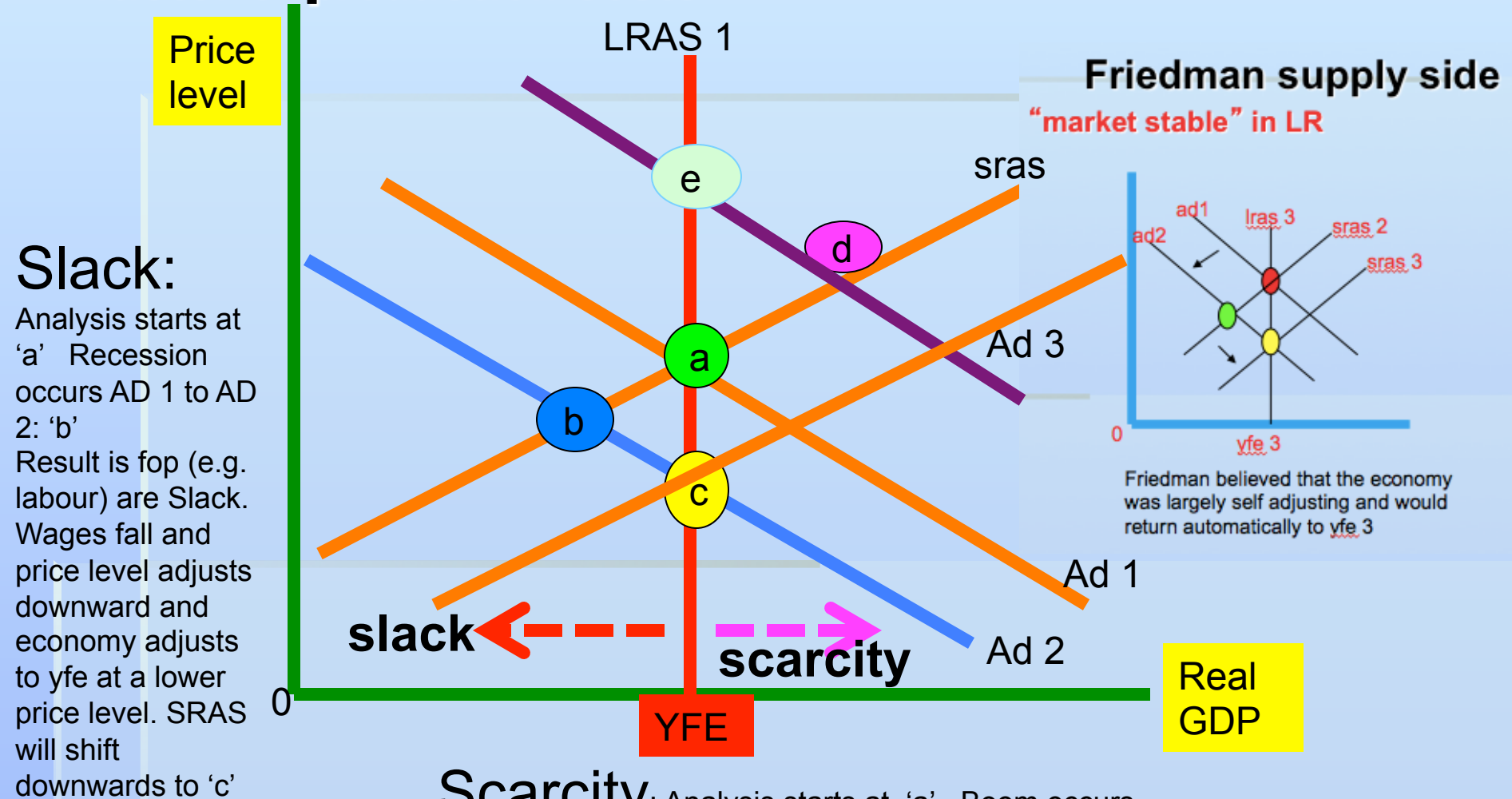


Recession occurs at point b. What happens next? Cost of business (for e.g. wages) falls and SRAS shifts causing price level to fall and a new equilibrium at c. This is a market based solution. Any intervention by neo classical economists should attack Aggregate Supply i.e. supply side policies. See section 2.6.

Real GDP

- Growth
- Employment
- National Income

How markets solve a recession: Slack vs Scarcity: the classical view of what happens to factor of production costs



In (de) flationary Gap

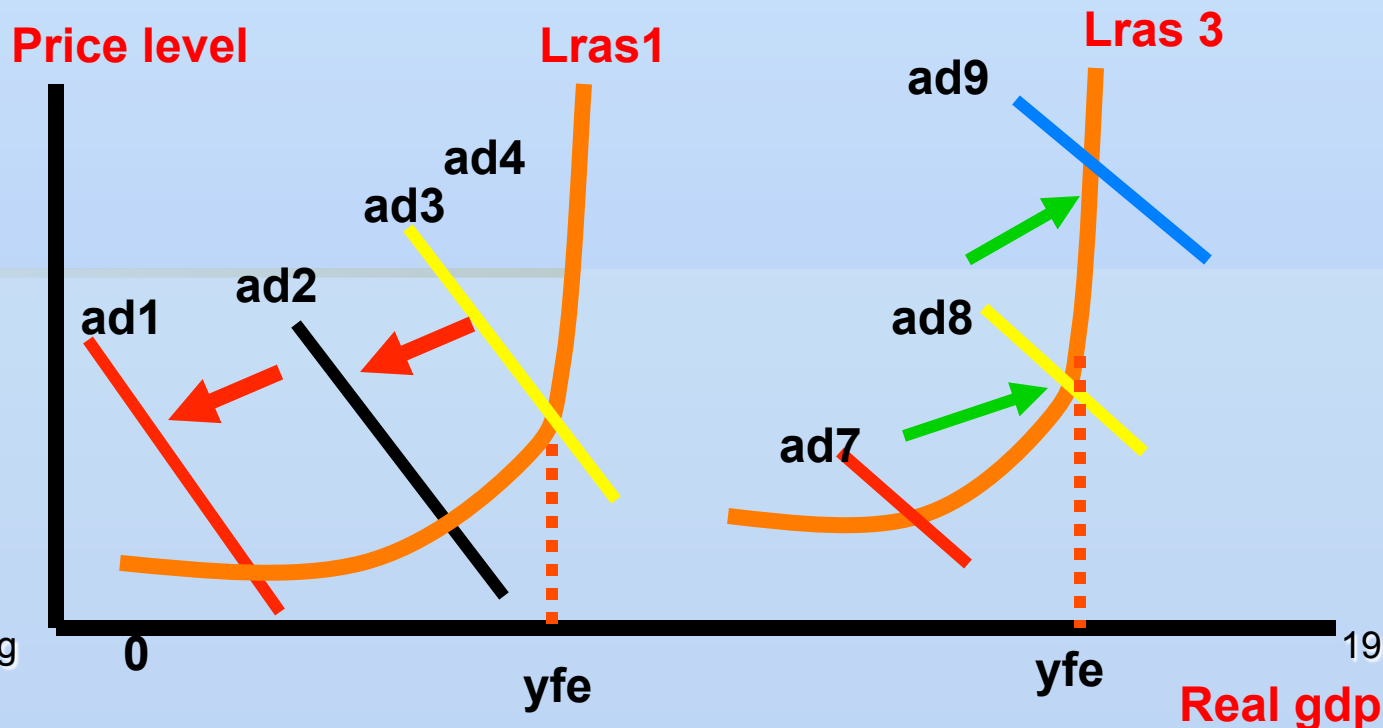
see webnote 328

- **Keynesian view** where economy is operating at AD1- Lras1(deflationary) or where economy is operating at AD9-Lras 3 (inflationary). Economy can stay in recession in long run so demand side intervention is necessary to shift economy from AD1 – AD3.

utube

deflationary pressure
"Bust"

inflationary pressure
"Boom"



Keynesian View

In (de)flationary Gap

see webnote 328

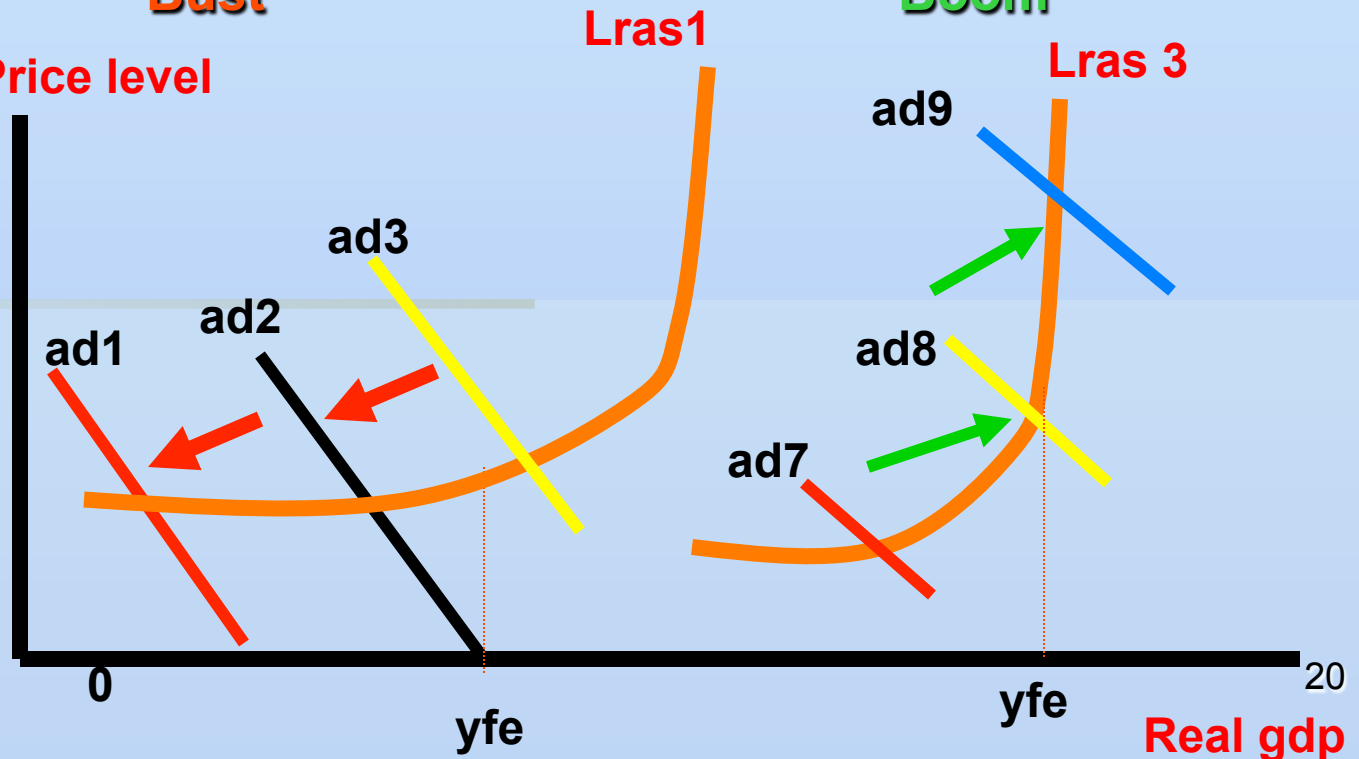
- The key issue with the Keynesian model is that the view that markets are 'inherently unstable' and intervention is necessary as the economy was seen to stay in recession in the long run. Government intervention was therefore required to cure a recession/depression.

utube

deflationary pressure
"Bust"

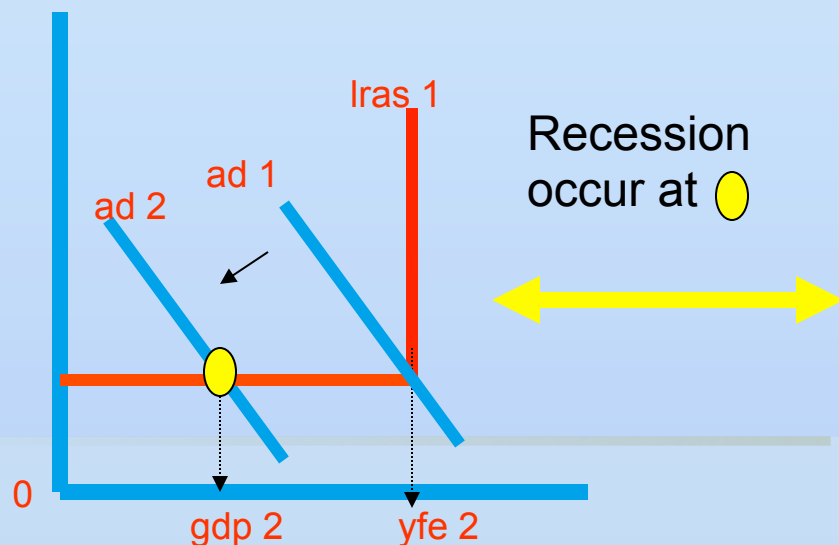
inflationary pressure
"Boom"

Price level

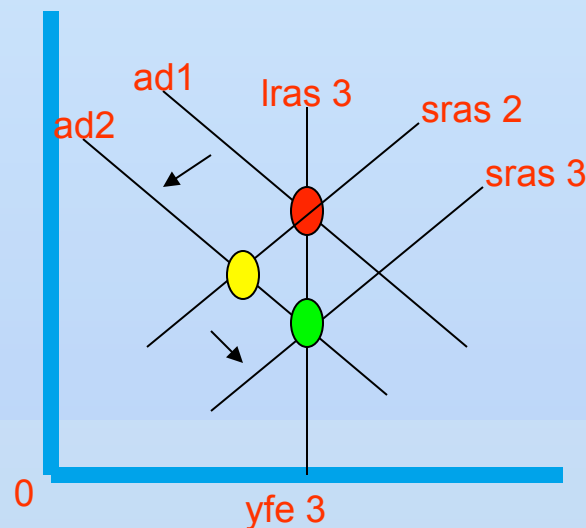


In (de) flationary Gap

- Keynes demand side — Friedman supply side
- “market unstable in LR” “market stable” in LR



Keynes believed the economy could be at a **non yfe** equilibrium for long periods of time i.e. $gdp2$ and would not adjust to $yfe\ 2$ without government intervention



Friedman believed that the economy was largely self adjusting and would return automatically to $yfe\ 3$ ●

keynes vs neo classical

Keynes

- Demand side school of economics
- Markets unstable and may not reach long run equilibrium
- Role for government intervention in stimulating demand to grow the economy

neo classical/Austrian/Friedman

- Supply side school of economics
- Markets stable and would reach full employment equilibrium at Y_f
- Reduced role for government except to stimulate aggregate supply with supply side policies in an effort to shift LRAS

Short run vs long run shows important differences in relation to factor costs

1. Macroeconomic **Short Run**: prices of final goods change but not factor prices. There is a time lag. (time lag is a delay period of time between an action and a response)
2. Macroeconomic **Long Run**: prices of goods include the changes to factor prices i.e. costs of factors of production increase

Do firms want ZERO inflation? No, not really! Firms like stable (1-2%) inflation as they see total revenues rising but workers are not asking for higher wages in the short run i.e. factor costs not rising in short run. This gives firms the opportunity to raise prices (sometimes above the cost increases and therefore raise revenues in turn raising profits)

5 key factors that influence Investment + have a strong impact on spending in a macroeconomy

- What influences investment in an economy:
 1. Interest rates
 2. Business confidence
 3. Technology
 4. Business taxes
 5. Corporate debt

5 key factors that influence Investment + have a strong impact on spending in a macroeconomy

- What influences consumption in an economy:
 1. Interest rates
 2. consumer confidence
 3. wealth
 4. income taxes / disposable income
 5. household debt

Bib to read:

- Blink chapters 14 +15
- Triple A + Tutor2U+ BIZED
- A.G.Anderton 108-115
- Economic Review: Akos Valentinyi, "Monetary policy and interest rates", 20(4), April 2003
- Economic Review: Peter Smith, "Growth and the government", Question and Answer 19(3), February 2002

HL

Keynesian multiplier measures the impact on national income of an injection of money into an economy

HL Keynesian Multiplier-
 see syllabus item **91**
 see webnotes **314** and **323**
 see webnote **703** for examples

$$\frac{1}{1 - \text{MPC}} = \frac{1}{\text{MPS} + \text{MPT} + \text{MPM}}$$

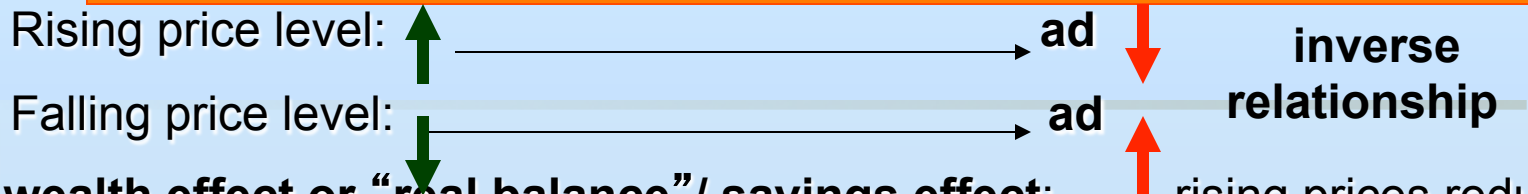
1. Keynesian multiplier justified G spending
2. $\text{mpc} > 1$
3. 100 m injection (J) would result in a > 100 m increase in N.I.

3 reasons that explain why is AD negatively sloped.

(movement along ad see syllabus item 82)

note: 1 to 3 below are for a rising price level i.e. inflation.

What is movement effect of a changing price level. This movement is explained by 1-3 below.



1. **wealth effect or “real balance”/ savings effect:** rising prices reduces the real value of bank deposits. When people feel poorer then they tend to spend less i.e. AD falls as PL rises. Rising prices tends to make people feel poorer. Then AD falls.

Note: when prices rise the value of bank balances fall

2. **“net export” effect (X-M):**
rising price level in the domestic economy makes exports more expensive and imports more attractive i.e. AD falls as PL rises because of foreign trade sector: X-M

3. **“interest rate” effect:**
if price level rises interest rates for borrowing from banks may be likely to rise over time as government intervene to reduce spending. Interest rates rise and therefore money will become more expensive causing spending (C+I) to fall over time i.e. AD falls as PL rises.

Note: Business and Consumer Confidence is also a factor to consider. Confidence rises then spending rises. Confidence falls then spending falls.

Big Questions for 99...

Big Questions:

1. What can the AS/AD model show in the macro economy?
2. Draw + explain the 2 schools of economics in relation to the AD/AS model?
3. What is the multiplier? (HL only)

section 2.2 The BIG ideas!

Webnote 220

**Using AS + AD to understand the
management of a macroeconomy**

exam focus

- **SL paper 1 2010-May**
- **2a Aggregate demand consists of consumption, investment, government spending and net exports (exports – imports). Explain two factors that may influence investment and two factors that may influence net exports.**
- **2b Evaluate the effectiveness of and increase in investment expenditure on the performance of an economy.**
- **15/25**