

INTERNATIONAL TRADE

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WHY DO COUNTRIES TRADE WITH EACH OTHER?

- To obtain goods that they cannot produce themselves
- To increase choice for their consumers
- To obtain goods at a cheaper price than what they can produce themselves
- To make more revenues and profits. It is an extra place in which to sell their goods
- Countries specialize in the production of goods and services at which they are better.
- To exploit a comparative or absolute advantage.

COMPARATIVE ADVANTAGE

Where one country can produce a good at a relatively cheaper cost in terms of other goods than another producer.

ABSOLUTE ADVANTAGE

Where one producer is better at producing a product than another producer.

UK AND COMPARATIVE ADVANTAGE

In recent years the UK had a comparative advantage in a number of manufacturing industries such as textiles or motorcycles.

This was because the UK had lots of natural resources and raw materials, trained workers and lots of relevant machinery.

However, now this advantage has been lost to other areas of the world particularly Asia. They have extremely cheap labour, new technology and low transport costs.

UK's comparative advantage now may well be in

- financial services (insurance / banking)
- tourism
- music

COMPARATIVE ADVANTAGE AND INTERNATIONAL TRADE

Comparative advantage exists when a country has a margin of superiority in the production of a good or service i.e. where the opportunity cost of production is lower.

The basic theory of comparative advantage was developed by David Ricardo.

Ricardo's theory of comparative advantage was further developed by Heckscher, Ohlin and Samuelson who argued that countries have different factor endowments of labour, land and capital inputs. Countries will specialise in and export those products which use intensively the factors of production which they are most endowed.

If each country specialises in those goods and services where they have an advantage, then total output and economic welfare can be increased (under certain assumptions). This is true even if one nation has an absolute advantage over another country.

Worked example of comparative advantage

Consider the data in the following table:

Pre-Specialisation	CD Players	Personal Computers
UK	2,000	500
Japan	4,000	2,000
Total Output	6,000	2,500

To identify which country should specialise in a particular product we need to analyse the internal opportunity cost for each country. For example, were the UK to shift more resources into higher output of personal computers, the opportunity cost of each extra PC is four CD players. For Japan the same decision has an opportunity cost of two CD players. Therefore, Japan has a comparative advantage in PCs.

Were Japan to reallocate resources to CD players, the opportunity cost of one extra CD player is 1/2 of a PC. For the UK the opportunity cost is 1/4 of the PC. Thus the UK has the comparative advantage in CD players.

Specialisation and potential gains from trade

After Specialisation	CD Players	Personal Computers
UK	4,000	0
Japan	2,400	2,800
Total Output	6,400	2,800

Output of both products has increased - representing a gain in economic welfare. Total output of CD players has increased by 2000 units and total output of personal computers has expanded by 500 units.

Allocating the gains from trade

For mutually beneficial trade to take place, the two nations have to agree an acceptable rate of exchange of one product for another. To work this out, consider the internal opportunity cost ratios for each country.

Without trade, the UK has to give up four CD players for each PC produced.

A terms of trade (or rate of exchange) of 3 CD players for each PC produced would be an improvement for the UK. In the case of Japan (specialising in producing personal computers) for each

After trade (3 CD's for 1 PC)	CD Players	Personal Computers
UK	2,200	600
Japan	4,200	2,200
Total Output	6,400	2,800

Comparing with the original production matrix

Pre-Specialisation	CD Players	Personal Computers
UK	2,000	500
Japan	4,000	2,000
Total Output	6,000	2,500

After trade has taken place, total output of goods available to consumers in both countries has grown. UK's consumption of CD players has increased by 200 and they have an extra 100 PCs. For Japan, they have an extra 200 CD players and 200 PCs.

Assumptions underlying the concept of comparative advantage

- **Perfect occupational mobility** of factors of production - resources used in one industry can be switched into another without any loss of efficiency
- **Constant returns to scale** (i.e. doubling the inputs in each country leads to a doubling of total output)
 - **No externalities** arising from production and/or consumption
 - **Transportation costs are ignored**

If businesses exploit increasing returns to scale (i.e. economies of scale) when they specialise, the potential gains from trade are much greater. The idea that specialisation should lead to increasing returns is associated with economists such as Paul Romer and Paul Ormerod

What determines comparative advantage?

Comparative advantage is a dynamic concept. It can and does change over time. Some businesses find they have enjoyed a comparative advantage in one product for several years

only to face increasing competition as rival producers from other countries enter their markets.

For a country, the following factors are important in determining the relative costs of production:

- The **quantity and quality of factors of production available** (e.g. the size and efficiency of the available labour force and the productivity of the existing stock of capital inputs). If an economy can improve the quality of its labour force and increase the stock of capital available it can expand the productive potential in industries in which it has an advantage.
- **Investment in research & development** (important in industries where patents give some firms significant market advantage) - for more information on this have a look at **this page**
- **Movements in the exchange rate**. An appreciation of the exchange rate can cause exports from a country to increase in price. This makes them less competitive in international markets.
- **Long-term rates of inflation** compared to other countries. For example if average inflation in Country X is 4% whilst in Country B it is 8% over a number of years, the goods and services produced by Country X will become **relatively more expensive** over time. This worsens their competitiveness and causes a switch in comparative advantage.
- **Import controls such as tariffs and quotas** that can be used to create an artificial comparative advantage for a country's domestic producers- although most countries agree to abide by international trade agreements.
- **Non-price competitiveness of producers** (e.g. product design, reliability, quality of after-sales support)

EXPORTS AND IMPORTS

EXPORTS

Goods and services sold to foreigners by UK firms. The money received will enter into the UK.

VISIBLE EXPORTS

Actual goods which are sold to foreigners by UK firms e.g. tables, TV's, vehicles.

INVISIBLE EXPORTS

Services which are sold to foreigners by UK firms e.g. banking, insurance, tourism

IMPORTS

Goods and services bought by UK residents and firms from foreigners. The money paid will leave the UK and go into the foreign country.

VISIBLE IMPORTS

Actual goods and services bought by UK residents or firms e.g. tables, vehicles etc

INVISIBLE IMPORTS

Services bought by UK residents and firms e.g. banking and tourism.

BE CAREFUL

If a UK individual goes to Spain on holiday this is classed as an invisible IMPORT. This is because the money is actually paid into Spain.

BALANCE OF PAYMENTS

The purpose of the balance of payments is to record of all financial dealings with foreigners

CURRENT ACCOUNT

The part of the balance of payments accounts where the value of exports and imports is recorded.

WHAT THE CURRENT ACCOUNT MIGHT LOOK LIKE

UK's CURRENT ACCOUNT 2002 in £billion

VISIBLE EXPORTS 700

VISIBLE IMPORTS 800

BALANCE OF TRADE - 100

INVISIBLE EXPORTS 300

INVISIBLE IMPORTS 100

INVISIBLE BALANCE + 200

TOTAL EXPORTS 1000

TOTAL IMPORTS 900

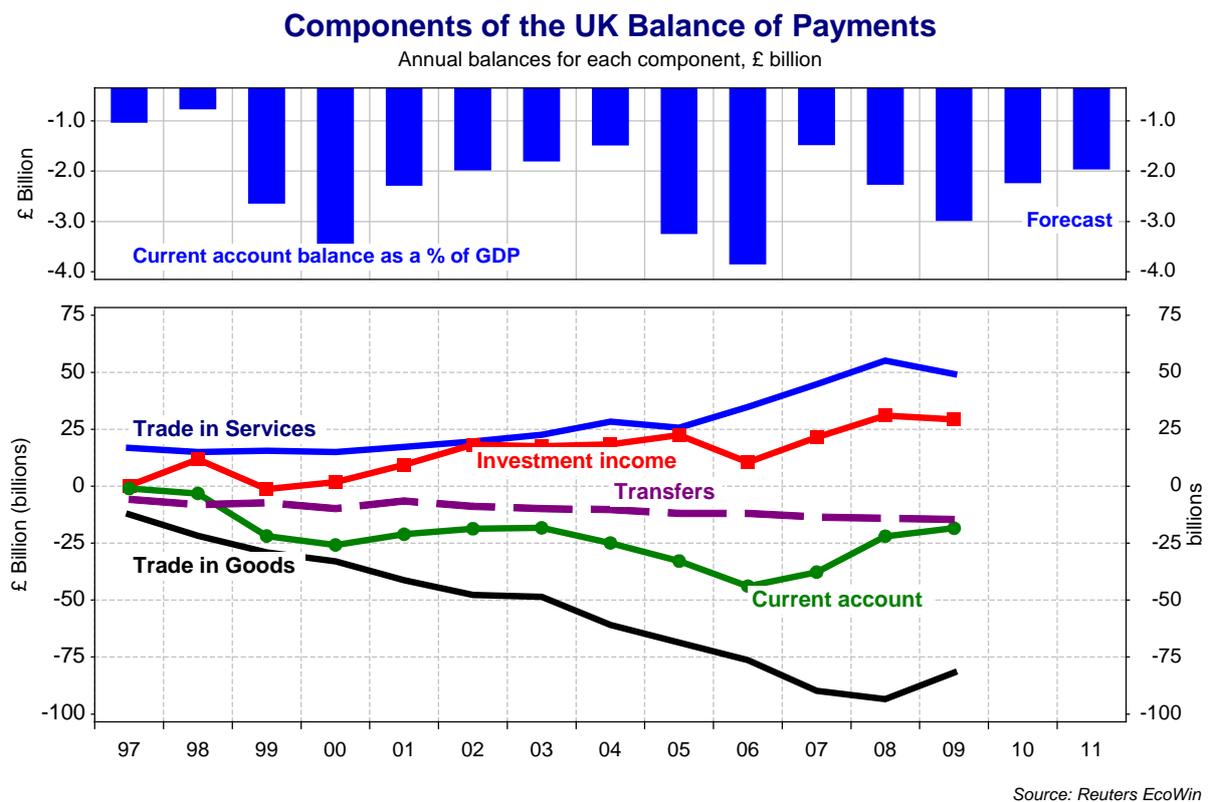
CURRENT BALANCE +100

In this case the UK is importing more goods (visibles) than it is exporting. However, it is exporting more services (invisibles) than it is importing. Overall, the positive invisible balance outweighs the negative balance of trade and the UK has a healthy, positive current balance.

WHY COULD THE UK HAVE A DEFICIT (-) ON ITS GOODS BALANCE?

- Decline in manufacturing therefore fewer goods to export
- Lots of imports of goods from abroad
- Cheaper to import
- High exchange rate £. This makes it more difficult to export but easier to import
- Loss of comparative advantage in many goods
- A boom in the UK means that consumers and businesses have more money to spend on imports.

Balance of Payments



The **current account** of the balance of payments comprises the **balance of trade in goods and services** plus **net investment incomes** from overseas assets and **net transfers**.

1. The UK runs a large trade deficit in goods partly compensated for by a surplus in services
2. There is a surplus of investment income (interest, profits, dividends) from overseas assets
3. Net transfers are negative reflecting the UK's position as a net contributor to the EU and also our commitment to foreign aid and other international payments
4. Overall the UK has run current account deficits in recent years which is best measured as a percentage of GDP (it was -3% of GDP in 2009)
5. The forecast is that the UK BoP deficit will improve over the next two years towards 2% of national income
6. There are hopes that British exports will rebound because of the weaker exchange rate and a period of faster growth in our main export markets

Analysis points

- A trade / current account deficit means that there is a net leakage of demand from the country's circular flow. Exports are an injection of demand, imports a withdrawal
- Put another way, net trade has the effect of dampening overall economic growth

- But the BoP deficit is small – for example five times bigger than the UK government’s budget deficit
- Improving the balance of payments requires higher levels of competitiveness
- Both demand and supply-side policies can help to improve trade performance

Competitiveness

There are two main types of competitiveness

1. **Price and cost competitiveness:** i.e. the cost of supplying a good or a service to the market is affected by factors such as wages, raw materials prices, productivity levels and also the impact of changes in the exchange rate. Economies of scale are important in the long run.
2. **Non-price competitiveness:** i.e. the reliability and performance of a product, the strength of design, innovation, after-sales service and speed in getting the product to the customer

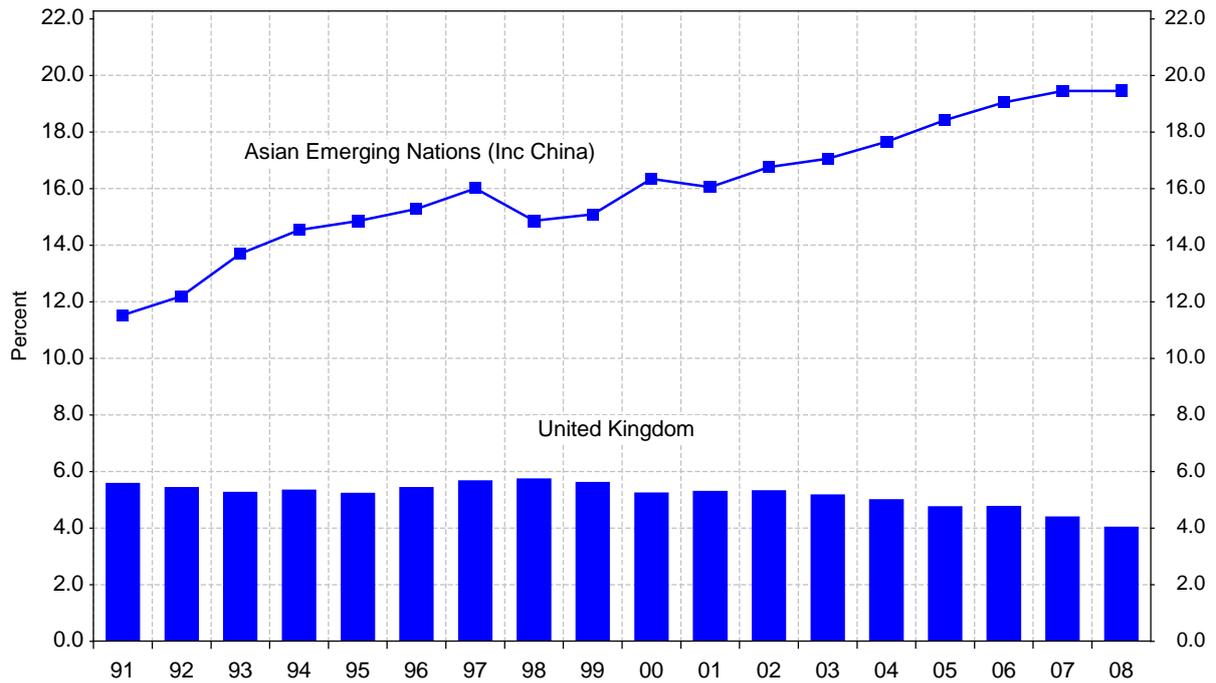
Supply-side factors are often seen as crucial in improving competitiveness. Think about some of your favourite brands, many have been imported. What makes them successful? Are you willing to pay a premium price? Or was your demand driven by low prices compared to rivals?

Key factors that affect the demand for exports

1. The unit costs of production compared to rival suppliers
2. The strength or weakness of the exchange rate – a depreciation of the currency makes imports appear more expensive and exports cheaper in foreign markets
3. The non-price competitiveness of exported goods (see above)
4. The strength of the economic cycle in export markets. Over 55% of UK trade is with fellow member nations of the European Union. 15% is with the USA, 4% with China. When incomes are rising, demand for imports will increase (bring in income elasticity of demand here!)
5. The amount of spare capacity available in export industries
6. The ability of exporters to get the finance to sell their goods in foreign markets + the cost of shipping
7. Exports may also be affected by tariffs, import quotas and other types of protectionism
8. Investment affects exports in the medium term – for example in creating the capacity needed to sell overseas and also in achieving economies of scale to compete with other countries.

Share of World Trade in Goods and Services

Percentage of world trade



Source: Reuters EcoWin

The UK runs a large trade deficit. Examples of countries that run trade surpluses include China, Japan, South Korea and Norway. Many nations have tried to achieve export-led growth – i.e. their export industries provide much of the impetus for higher demand, production and jobs.

EXCHANGE RATES

Exchange rate: - the price at which one currency is bought and sold for another
e.g.

£1 = \$1.5 UK and USA

£1 = 200 yen UK and Japan

A £1 coin can be sold to buy \$1.5 or 200 yen

In order to obtain a £1 coin an American would have to offer \$1.5 and a Japanese person 200 yen.

CHANGES IN THE VALUE OF THE £

The value of the £ changes daily against other currencies. It could become stronger or it could become weaker

VALUE YESTERDAY	VALUE TODAY	EFFECT
£1 = \$1.5	£1 = \$1.6	£ stronger or increased in value
£1 = \$1.5	£1 = \$1.4	£ weaker or fallen in value
£1 = 200 yen	£1 = 220 yen	£ stronger or increased in value
£1 = 200 yen	£1 = 180 yen	£ weaker or fallen in value

WHY DO EXCHANGE RATES MATTER?

1. They influence the price of imports
2. They influence the price of exports
3. They effect tourism. Changes in exchange rates influence how much money you receive when you change your currency
4. They can effect firms profits
5. They can have an effect upon unemployment, inflation, economic growth and the balance of payments.

EXCHANGE RATE SYSTEMS

FIXED EXCHANGE RATE SYSTEM

An exchange rate that is kept within a certain value. It is prevented from changing too much

e.g. the £ may have to stay within a certain value against the \$

£1 = no less than \$1.4 but no more than \$1.6

WHY?

1. Avoid wide ranging changes in the value of the £
2. Firms can plan ahead with confidence
3. Exporters shouldn't suffer too much
4. Should encourage trade

HOW DOES IT WORK?

If the £ is falling in value then the Government will intervene and buy £ from foreign countries this will increase the value of the £

If the £ is increasing in value then the Government will intervene and sell £ at a lower price to foreign countries the £ will fall in value

FLOATING EXCHANGE RATE

The £ can change in value freely against the \$. It could end up at any exchange rate. the government will not intervene to influence its rate.

A FALL IN THE VALUE OF THE £

This could happen in 2 ways

a) DEVALUATION

This is when the government deliberately engineers a fall in the £. It may do this by selling £ at lower prices in order to reduce their value. It might do this to make UK firms more competitive.

b) DEPRECIATION

This is when the £ falls naturally to a lower level. There is no influence from the government.

EXCHANGE RATE MOVEMENTS

WHAT HAPPENS WHEN THE £ CHANGES IN VALUE?

EXAMPLE 1: EXPORTING (SELLING ABROAD)

SELLING A TABLE TO AMERICA. THE TABLE COSTS £100

YESTERDAY: £1 = \$1.5

Cost to American £100 * 1.5 = \$150

TODAY: £1 = \$ 2 £ has got stronger

Cost to American £100 * 2 = \$200

The strong £ has increased the price to foreigners. The UK business may struggle to sell the table

TOMORROW: £1 = \$1 £ has got weaker

Cost to American £100 * 1 = \$100

The weak £ has reduced the cost to foreigners. The UK business should find it easier to sell the table

In each of the above examples the UK firm still receives £100

CONCLUSION

A strong £ or an increase in the value of the £ makes it more difficult for exporters to sell their goods abroad. This is because foreigners have to pay more in order to buy our goods.

The UK exporter could lower the price but then will lose some profit and may make a loss.

Therefore a strong £ can cause problems for businesses which export in foreign markets. It could cause

- unemployment
- slower economic growth
- a deficit on the balance of payments

EXAMPLE 2: IMPORTING (BUYING FROM ABROAD)

BUYING A TABLE FROM AMERICA. THE TABLE COSTS \$100

YESTERDAY: £1 = \$1.5

Cost to Britain $\$100 / 1.5 = \text{£}67$

TODAY: $\text{£}1 = \$ 2$ £ has got stronger

Cost to Britain $\$100 / 2 = \text{£}50$

The strong £ has reduced the cost to UK importers. The UK people may be more likely to import the table.

TOMORROW: $\text{£}1 = \$1$ £ has got weaker

Cost to Britain $\$100 / 1 = \text{£}100$

The weak £ has increased the cost to UK importers. The UK people are less likely to import the table.

In each of the above examples the US firm still receives $\$100$

CONCLUSION

A strong £ or an increase in the value of the £ makes it cheaper to import raw materials or goods from abroad.

- Good for businesses who need raw materials
- Bad for UK businesses who compete against foreign imports
- May reduce cost push inflation

A weak £ or a fall in the value of the £ makes it more expensive to import raw materials or other goods from abroad.

- Bad for businesses who import raw materials
- Good for UK businesses who compete against foreign imports
- May cause cost push inflation



London is the major centre for foreign exchange trading in the world economy – the market is nearly wholly screen based and billions of dollars worth of currencies is traded every hour

DEVALUATION

Devaluation is a reduction in the value of a currency with respect to those goods, services or other monetary units with which that currency can be exchanged.

In common modern usage, it specifically implies an official lowering of the value of a country's currency within a fixed exchange rate system, by which the monetary authority formally sets a new fixed rate with respect to a foreign reference currency. In contrast, **depreciation** is used for the unofficial decrease in the exchange rate in a floating exchange rate system. The opposite of devaluation is called **revaluation**.

Depreciation and *devaluation* are sometimes incorrectly used interchangeably, but they always refer to values in terms of other currencies. Inflation, on the other hand, refers to the value of the currency in goods and services (related to its purchasing power). Altering the face value of a currency without reducing its exchange rate is a redenomination, not a devaluation or revaluation.

1. Historical usage
2. Devaluation in modern economies
3. See also
4. References

Historical usage

Devaluation is most often used in situations where a currency has a defined value relative to the baseline. Historically, early currencies were typically coins struck from gold or silver by an issuing authority which certified the weight and purity of the precious metal. A government in need of money and short on precious metal might abruptly lower the weight or purity of the coins without announcing this, or else decree that the new coins had equal value to the old, thus devaluing the currency.

Later, paper currencies were issued, and governments decreed them to be redeemable for gold or silver (a gold standard). Again, a government short on gold or silver might devalue by abruptly decreeing a reduction in the currency's redemption value, reducing the value of everyone's holdings.

Devaluation in modern economies

Present day currencies are usually fiat currencies with insignificant inherent value. When the U.S. dollar was fully disassociated from the gold standard in 1971, the value of any fiat currency became solely determined by the willingness of its issuing State to accept it as payment for taxes. Some countries hold floating exchange rates while others maintain fixed exchange rate policies against the United States dollar or other major currencies. These fixed rates are usually maintained by a combination of legally enforced capital controls or through government trading of foreign currency reserves to manipulate the money supply. Under fixed exchange rates, persistent capital outflows or trade deficits may lead countries

to lower or abandon their fixed rate policy, resulting in a devaluation (as persistent surpluses and capital inflows may lead them towards revaluation).

In an open market, the perception that a devaluation is imminent may lead speculators to sell the currency in exchange for the country's foreign reserves, increasing pressure on the issuing country to make an actual devaluation. When speculators buy out all of the foreign reserves, a balance of payments crisis occurs. Economists Paul Krugman and Maurice Obstfeld present a theoretical model in which they state that the balance of payments crisis occurs when the real exchange rate (exchange rate adjusted for relative price differences between countries) is equal to the nominal exchange rate (the stated rate). In practice, the onset of crisis has typically occurred after the real exchange rate has depreciated below the nominal rate. The reason for this is that speculators do not have perfect information; they sometimes find out that a country is low on foreign reserves well after the real exchange rate has fallen. In these circumstances, the currency value will fall very far very rapidly. This is what occurred during the 1994 economic crisis in Mexico.

Generally, a steady process of inflation is not considered a devaluation, although if a currency has a high level of inflation, its value will naturally fall against gold or foreign currencies. Especially where a country deliberately prints money (a usual cause of hyperinflation) to cover a persistent budget deficit without borrowing, this may be considered a devaluation.

In some cases, a country may revalue its currency higher (the opposite of devaluation) in response to positive economic conditions, to lower inflation, or to please investors and trading partners. This would imply that existing currency increased in value, as opposed to the case with denomination where a country issues a new currency to replace an old currency that had declined excessively in value (such as Turkey and Romania in 2005, Argentina in 2002, Russia in 1998, or Germany in 1923).