

Unit 2: Markets - why they fail

- **Allocative efficiency** occurs when resources are distributed in such a way that no consumers could be made better off without other consumers becoming worse off.
- **Dynamic efficiency** occurs when resources are allocated efficiently over time.
- **Productive efficiency** is achieved when production is achieved at lowest cost.
- **Technical efficiency** is achieved when a given quantity of output is produced with a minimum number of inputs.

Consumer and Producer Surplus

A perfectly competitive market consists of:

- Many firms in the industry- therefore firms cannot manipulate the prices.
- Low barriers to entry and exit- if profits are achievable new firms can enter the market at little cost.
- Homogenous products- no branding allows new entrants to win customers fairly.
- Perfect knowledge- consumers and producers know everything about market's prices and products.

In a perfectly competitive market:

- There is productive efficiency- because costs must be kept at a minimum to break even.
- There is allocative efficiency- producers will produce no more or less than consumers demand at a given price.
- There is NOT dynamic efficiency- as there is perfect knowledge, there is no incentive for R&D.

Types of Market Failure

1. Monopoly Power

- A monopoly exists if there is only one firm or supplier in the economy
- A firm holds a monopoly share if it holds a market share that exceeds 25%.

Why monopoly power market failure exists

Firms gain monopoly powers in the long run because of barriers to entry to the industry, preventing other firms entering the industry;

1. **Legal Barriers** – government can make competition illegal e.g. only pharmacies can sell prescription drugs by law.
2. **Resource Barriers** – a monopolist may be able to buy or acquire the key resources needed to produce a good. E.g. supermarket may buy the only plot of land available for development of a large supermarket in a small town.
3. **Unfair competition** – once created a monopolist may use unfair competitive practices, such as cutting prices temporarily until the competitor is forced out of business
4. **Natural cost advantages** – some firms are natural monopolies because not a single firm in the industry can reduce their average cost to their minimum. This is usually because that firm is experiencing economies of scale:
 - Purchasing Economies** - bulk buying often results in a cheaper cost per unit input
 - Marketing Economies** – The cost of advertising can be spread over more units of output
 - Technical Economies** – A large supermarket costs less to build than a small one
 - Managerial Economies** – large firms employ workers who specialize in specific tasks, who are therefore more qualified and efficient.

Financial Economies – large firms are more credit worthy than small firms.

5. **Product Differentiation** – by making their product seem very different from the competition through marketing and branding a monopoly can be established.
6. **Control over outlets** – so competitors cannot get their products to the market

Government may allow a monopoly to exist because:
Alone they are productively efficient because of economies of scale
Industry is dangerous and can only allow for one firm e.g.

Preventing monopoly power market failure

Government intervention on monopolies occurs because monopolies are:
Price makers- set the market price above equilibrium so their profits are high
Allocatively inefficient

1. **Taxes** – government uses tax to remove abnormal profit.
(**evaluative**): but firm still Allocatively inefficient /removal of incentive to cut costs results in productive inefficiency.
2. **Subsidies** – government could encourage the producer to make more and at a lower price through the use of subsidies.
(**evaluative**): the public is unlikely to support this, as subsidy provided by taxpayers money/ difficult to know amount of subsidy requires to achieve allocative efficiency in real terms
3. **Price Controls** – the government could limit the price the firm may charge, thus encouraging the firm to cut costs to sustain profits, which is efficient.
(**evaluative**): difficult to decide how much prices should be controlled by, as investment may be reduced if too low. E.g Railtrack and Water Utilities.
4. **Nationalisation** – the government could take over the company, thus removing the profit motive that managers previously had to cut costs.
(**evaluative**): no incentive for firm to reduce cost so becomes productively and dynamically inefficient.
5. **Privatisation and Deregulation** – the government could transfer ownership to the private sector and allow other firms to compete. It could also split up the monopoly into a number of competing companies allowing them to compete.
(**evaluative**): breaking up the monopolist will reduce the economies of scale that allowed productive efficiency.
6. **Reducing Entry Barriers** – the government could easily remove legal barrier preventing full competition with the royal mail.
(**evaluative**): however, this will not guarantee that competition will develop, as there are other barriers to entry.

4. Factor Immobility

- Factors of production (land, labour, capital) may be immobile e.g. once a train is built, it is used as a train, it cannot be made into a car or plane.
- The higher the factor immobility, the more difficult it is for the market to clear after an economic shock.

Preventing factor immobility market failure

- Training and improved information flows

5. Inequality

- Free market distributes resources to those with a higher income than a lower income.

Preventing the inequality market failure

- Tax those on higher incomes more than those on lower income, so wealth can be redistributed evenly in the economy.

6. Public Goods and Merit Goods

Public Goods – are goods which possess two characteristics; non rivalry (the consumption of the good by one person does not reduce the amount available for consumption by another person) and non excludability (once provided no person can be prevented from benefiting) e.g. defense, street lighting, police

Market failure of public goods

Free rider problem – It is impossible to prevent people from receiving the benefits of a public good once it has been provided. Some citizens seek to enjoy the benefits of a public good and make others pay for it in order to increase their **economic welfare**.

Preventing the free rider problem

The government pays for and provides all public goods.

Merit good – are goods which are considered to be socially desirable. E.g health, education and insurance.

Market failure of merit goods

Underprovided – merit goods are under provided by the market mechanism because it is not profitable enough to provide them in the amounts they are required.

Consumer stupidity – the cost of health care and pensions etc.. is so great that young people can only afford them if they save for the future, If they don't, they find when they are older that they do not have sufficient resources to pay for medical services, or the insurance to cover them against loss of earnings due to illness or retirement.

Conflict of interests – In the case of education the main beneficiary of the consumption of the good (child or student) is unlikely to be the one paying for the good. It could be in the parents interests to pay as little as possible for the child's education but in the child's interest to receive as high a quality of education as possible.

Prevention of merit good market failure

- Government pays and provides for them
- Gives subsidies to encourage production of merit goods by firms
- Creates legislature making it compulsory to consume merit goods.

Demerit Good – is a good considered socially undesirable and is overprovided by the market mechanism because it is profitable to do so. Consumption of these goods creates a large negative externality. E.g. illegal drugs and legal drugs

Prevention of consumption of demerit goods

Ban consumption - law states not allow to take hard drugs

Price system – tax producers of tobacco and alcohol thus increasing the price of these goods and reducing demand

Advertising – persuade consumers to stop using drugs through advertising campaigns (SMOKING KILLS)

7. Information Problem

2. Externalities

Externality – is the knock on effect upon third parties of engaging in an economic activity and occurs when there is a divergence between social and private costs and benefits.

Negative Externalities

- The social cost is greater than the private cost e.g. pollution

- Free market firms base their decisions on private costs and benefits only and do not take into account the social costs and benefits.
- As a result the firm does not take into account the negative external effect of their actions and will overproduce (q_0) compared to the socially optimal level (q_1).

Prevention of negative externalities

- 1) **Regulation** – Government may lay down maximum pollution levels e.g. MOT if a car fails an emissions test from its exhaust, it fails its MOT and can therefore not be driven, thus reducing the externality.

<u>Advantages</u>	<u>Disadvantages</u>
Cheap and easy to understand.	It is difficult to fix the right level of regulation to ensure efficiency
	Regulation may be too lax or too tight
	Regulation discriminates between different costs or reducing externalities (cost firms diff amounts to reduce same amount of pollution)

- 2) **Extended Property Rights** – examples; give water companies the right to charge companies that dump waste in the river, give workers the right to sue a company if they have suffered injury as a result of working for them. This is a way of **internalising the externality** – eliminating the externality by bringing it back into the framework of the market mechanism.

<u>Advantages</u>	<u>Disadvantages</u>
Government does not have to assess cost of pollution; property owners have a better knowledge of the value of their property than the government	The government may not have the ability to extend property rights (can't prevent global warming if trees being chopped in brazil)
	Extending rights can be difficult because big companies can fight compensation claims.
	Owners of property rights may not be able to assess value of those rights.

- 3) **Taxes** – the government assess the cost to society of a particular externality and then sets the tax rate on those externalities equal to the externality. The increased price of the good reduces demand and output of it, therefore fewer externalities are created.

<u>Advantages</u>	<u>Disadvantages</u>
Allows the market mechanism to decide how resources should be allocated	difficult to place a monetary value on negative externalities and therefore decide optimal tax rate

- 4) **Permits** – firms may buy permits to pollute, the money the government receives from the permit can be used to reduce the externality.

Positive Externalities

- The social benefit is greater than the private benefit .

- In a free market only private benefits are considered

- As a result the firm does not take into account the positive external effect of their actions so undervalues the output and produces too little (q_0) compared to the socially optimal level (q_1).

The government can legislate to increase demand for the good, thus increasing the amount supplied or it can subsidize to reduce the cost and encourage more production.

3. Instability

Price fluctuations – unpredictable changes in the level of supply due to weather in agriculture mean that the prices are always fluctuating.

Too high a price – merit goods and goods with a positive externality may have too high a price leading to under consumption.

Too low a price – demerit goods and goods with a negative externality may have too low a price and lead to over consumption.

Government Intervention

Maximum Prices

Setting a max price will mean:

- Producers will leave the market.
- Demand will be in excess of supply.
- Create a black market for the good where P_1 is the price.

It will benefit

Those who could not previously afford the good and are able to obtain it

Not benefit

Those who are prepared to pay higher price but unable to obtain it due to a shortage of supply

Minimum Prices

- Setting a minimum price will mean supply will exceed demand, producers will leave the market or sell below the minimum price unless excess supply can be sold.

Solution1: the government buys the excess supply and attempts to sell it to third world countries, or back to farmers as feedstock to other EU countries. (never gets a price $\min P$ for it)

Solution2: Restrict the level of production so only the amount demanded is supplied, government will subsidise farmers to do this.

EVALUATION: ELASTICITY OF CURVES

Buffer Stock Schemes

When markets overproduce government buys excess thus reducing supply and keeping price at equilibrium, and sells what it has accumulated when market under produces.

Problems with buffer scheme

- Administration costs high.
- Hard to correctly guess market price.
- Scheme may run out of money and be forced to sell excess stock, thus crashing prices in market.

Government Failure

Inadequate information – bureaucracy

Conflicting objectives – every decision made by the government has an opportunity cost e.g. may want to lower taxes but increase public spending.

Administrative costs – when the administrative cost is greater than the welfare benefit gained from the correction of the market failure.

Market distortions – Intervention to correct one market failure leads to far more serious market failures. E.g Common Agricultural Policy dumping excess supply of food caused by minimum pricing on world market, thus crashing world prices. Therefore farmers outside EU experience lower incomes.

Public choice theory – The government may not make decisions to maximise economic welfare but will instead make decisions on spending and taxation that will favour consumers, who are voters.

Local interests (Textile plant in constituency, tax on imports)

Favouring minorities (middle class voters more likely to vote than working class)

Conflicting Personal Interests (corruption)

Short-termism (do what is best on the short term but ignore the long term consequences because there is re-election every 5 years)

Regulatory Capture – Groups such as monopolies can strongly influence the way they are being regulated to their own advantage