Price Controls

Assessment Objectives

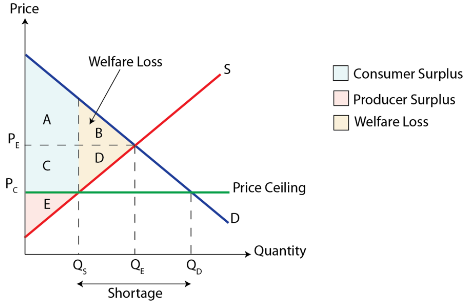
Specific Expectations	
AO1	Explain the consequences of price ceilings and price floors on markets and stakeholders
AO4	Draw diagrams to illustrate the effects of price ceilings and price floors on markets and stakeholders
AO3	Evaluate the effects of price ceilings and price floors on markets and stakeholders
AO4	Calculate the effects of price ceilings and price floors on markets and stakeholders

Price Controls

- **Price controls** refer to the setting of a minimum or maximum prices by the government (or private organizations) so that the prices are unable to adjust to their equilibrium level determined by demand and supply.
  - Price controls result in market disequilibrium, and therefore in shortages (excess demand) or surpluses (excess supply).
  - There are two primary forms of price controls,
    - **Price ceiling –** is a **maximum price** set below the market equilibrium price, in order to make goods more affordable to people on low incomes.
    - **Price floor –** is a **minimum price** set above the equilibrium price, in order to provide income support to farmers or to increase the wages of low-skilled workers.

Price Ceiling

- A government may set a legal **maximum price** for a particular good; this is called a **price ceiling**.
  - It means that the price that can be legally charged by sellers of the good must not be higher than the legal maximum price.
  - Price ceilings are usually set in order to make certain goods more affordable to people on low incomes.



Consequences of price ceilings: Markets

- A price ceiling does not allow the market to clear; it creates a situation of disequilibrium where there is a shortage (excess demand).

1. **Shortages** – A price ceiling, P_C, set below the equilibrium price of a good creates a shortage.
   - At P_C, not all interested buyers who are wiling and able to buy the goods are able to do so because there is not enough of the good being supplied.
   - The shortage is $Q_D - Q_S$.
2. **Non-price rationing** – once a shortage arises due to a price ceiling, the price mechanism no longer achieves its rationing function.
   - The quantity, Q_S can only be distributed through non-price rationing methods.
   - **Queuing** – waiting in line and the first-come-first served principle

Consequences of price ceilings: Markets

- **Rationing** – the distribution of coupons to all interested buyers, so that they can purchase a fixed amount of the good in a given time period.
- **Favouritism** – the sellers can sell the good to their preferred customers.

3. **Underground (or parallel) markets** – involve buying or selling transactions that are unrecorded, and are usually illegal.

   - For price ceilings, this involves buying a good at the maximum legal price, then illegally reselling it at a price above the legal maximum.
   - Underground markets can arise when there are dissatisfied people who have not succeeded in buying the good because there was not enough of it, and they are willing to pay more than the ceiling price to get it.
   - Underground markets are inequitable, and frustrate the objective sought by the price ceiling, which is to set a maximum price.

Consequences of price ceilings: Markets

4. **Underallocation of resources and allocative inefficiency** – the price ceiling, being lower than the equilibrium price, results in a smaller quantity supplied.
    - Not enough of resources are allocated to the production of the good, resulting in underproduction relative to the social optimum.
    - Society is worse off due to underallocation of resources and allocative inefficiency.
5. **Negative welfare impacts** – a price ceiling creates a welfare loss, indicating that the price ceiling introduces allocative inefficiency due to underallocation of resources to the production of the good.
    - This is shown by $Q_S < Q_E$. Also $MB > MC$, indicating that society is not getting enough of the good.
    - **Welfare loss** (also known as deadweight loss) represents social surplus or welfare benefits that are lost to society because resources are not allocated efficiently.

Price ceilings: Examples

- Price ceilings are for the most part set in order to make certain goods considered to be necessities more affordable to low-income earners.

  1. **Rent controls** – consist of a maximum legal rent on housing, which is below the market-determined level of rent (the price of rental housing)

     - Housing becomes more affordable to low-income earners.
     - A shortage of housing, as the quantity of housing demanded at the legally maximum rent is greater than the quantity available.
     - Long wait lists of interested tenants waiting their turn to secure an apartment/flat.
     - A market for rented units where tenants sublet their apartments at rents above the legal maximum (an underground market).
     - Run-down and poorly maintained rental housing because it is unprofitable for landlords to maintain or renovate their rental units since low rents result in low revenues.

Price ceilings: Examples

2. **Food price controls** – some governments use food price controls as a method to make food more affordable to low-income earners, especially during times when food prices are rising rapidly.

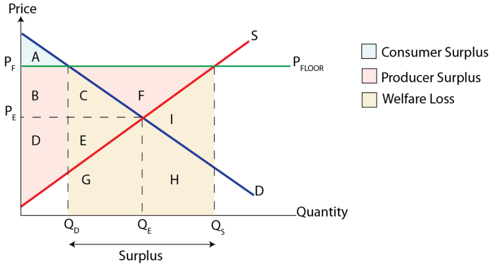
    - Lower food prices and greater affordability
    - Food shortages as quantity demanded is greater than quantity supplied
    - Non-price rationing method (such as queues) to deal with shortages
    - Development of underground markets
    - Falling farmer incomes dues to lower revenues
    - More unemployment in the agricultural sector
    - Misallocation of resources and welfare loss.
    - Possible greater popularity for the government among consumers who benefit.

Price Floor

- A government may set a legal **minimum price** for a particular good; this is called a **price floor**.
  - Price floors are commonly used for three reasons:
    1. **Support firms** – to provide income to farmers by offering them prices for their products that are above market-determined prices.
    2. **Reduce overconsumption of demerit goods** – to provide a price disincentive and reduce negative externalities of consumption.
    3. **Protect low-skilled, low-wage workers** – by offering them a wage (the minimum wage) that is above the level determined by the market.
  - **Note:** to avoid getting confused, the position of a price floor and a price ceiling in relation to the equilibrium price is always the opposite of the floor and ceiling of a room.
    - The price floor is above and the price ceiling is below.

Price Floor: Support firms

- Farmers' incomes in many countries, resulting from the sale of their products in free markets, are often unstable or too low.
  - Unstable incomes arise from unstable agricultural product prices, which are due to low price elasticities of demand and supply.
  - One method government use to support farmers' incomes is to set price floors for certain agricultural products, the objective is to raise prices above their equilibrium market price.



Price Floor: Support firms – Consequences for markets

- A price floor does not allow the market to clear; it creates situation of disequilibrium where there is a surplus (excess supply).

  1. **Surplus** – A price floor, P_F, set above the equilibrium price of a good creates a surplus.

     - At P_F the price floor results in a larger quantity supplied, Q_S, and a lower quantity demanded Q_D relative to the original equilibrium.
     - The surplus is $Q_S - Q_D$
     - A common practice is for the government to buy this excess supply, thereby shifting the demand curve so the market clears at P_F.
     - By buying up the excess supply the government is able to maintain the price floor at P_F.
     - If the government did not buy the surplus, the price would fall back to its equilibrium level.

Price Floor: Support firms – Consequences for markets

2. **Government measures to dispose of surpluses** – the government must make a decision about what to do with the surplus (excess supply) it purchases.

    - **Store** – where governments store it, giving rise to additional costs for storage above the costs of the purchase.
    - **Export the surplus** – selling the product abroad. This often requires granting a subsidy to lower the price of the good since foreign countries would not want to but it at the high price.

3. **Firm inefficiency** – higher than equilibrium product prices can lead to inefficient production.

    - Inefficient firms with high costs of production do not face incentives to cut costs by using more efficient production methods because the high price offers them protection against low-cost competitors.

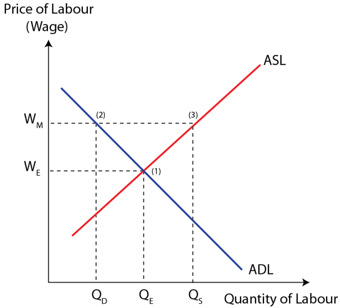
Price Floor: Support firms – Consequences for markets

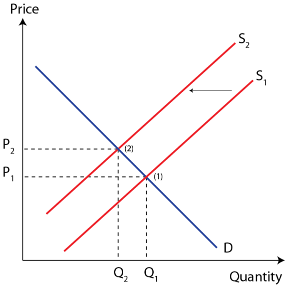
4. **Overallocation of resources and allocative inefficiency** – too many resources are allocated to the production of the good, resulting in a larger than optimum quantity produced.

5. **Negative welfare impacts** – a price floor creates a welfare loss, indicating that the price floor introduces alllocative inefficiency due to overallocation of resources to the production of the good, shown by $Q_S > Q_E$.

   - Also MB $<$ MC, indicating that society is getting too much of the good.

- **Minimum wage** a minimum price of labour set by the government in the labour market, in order to ensure that low-skilled workers can earn a wage high enough to secure them with access to basic goods and services.
  - The objective is to guarantee an adequate income to low-income workers, who tend to be mostly unskilled.





Price Floor: Minimum wage – Consequences

- Minimum is a **labour market rigidity** which is a factor preventing the forces of supply and demand from operating in the labour market.

  1. **Labour surplus (excess supply) and unemployment** – the imposition of a minimum wage in the labour market creates a surplus of labour equal to $Q_S - Q_D$, which is unemployment, as it corresponds to people who would like to work but are not employed.

  2. **Illegal workers at wages below the minimum wage** – illegal employment of some workers at wages below the legal minimum wage; this often involves illegal immigrants who may be willing to supply their labour at very low wages.

  3. **Misallocation of labour resources** – the minimu wahe affects the allocation of labour resources, as it prevents the market from establishing a market-clearing price of labour.

     - The imposition of a minimum wage changes these signals and incentives for unskilled labour, whose wage is affected by the price floor.

Slide Title

- Industries that rely heavily on unskilled workers are more likely to be affected, and will hire less unskilled labour.

4. **Misallocation in product markets** – firms relying heavily on unskilled workers experience an increase in their costs of production, leading to a leftward shift of their product supply curve, resulting in smaller quantities of output produced.

    - The misallocation of labour resources leads also to misallocation in product markets.