

Consumer and Producer Surplus

What surplus means

Consumer surplus (CS) is the gap between what consumers are willing to pay and what they actually pay (the market price).

Producer surplus (PS) is the gap between the price firms are willing to sell for and what they actually receive (the market price).

A simple way to remember it:

- CS = the value buyers feel they gained
- PS = the extra return sellers gain above their minimum acceptable price

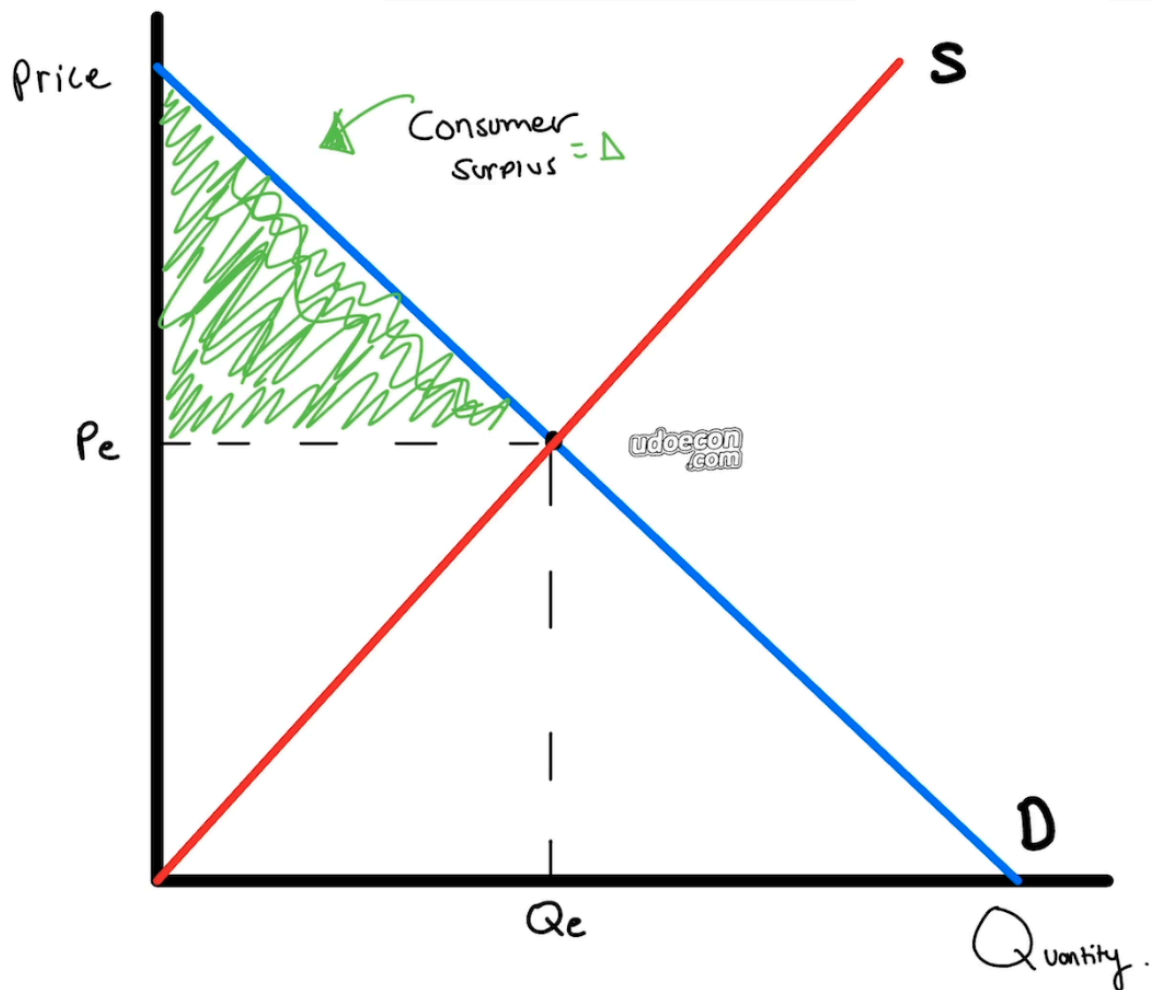
Showing CS and PS on a diagram

Consumer surplus (CS)

On a standard supply and demand diagram at equilibrium, draw the equilibrium price as a horizontal line.

Consumer surplus is the area between the demand curve and the equilibrium price, up to the equilibrium quantity.

This works because the demand curve shows willingness to pay for each unit, but consumers only pay the market price, so the vertical gap represents extra benefit.

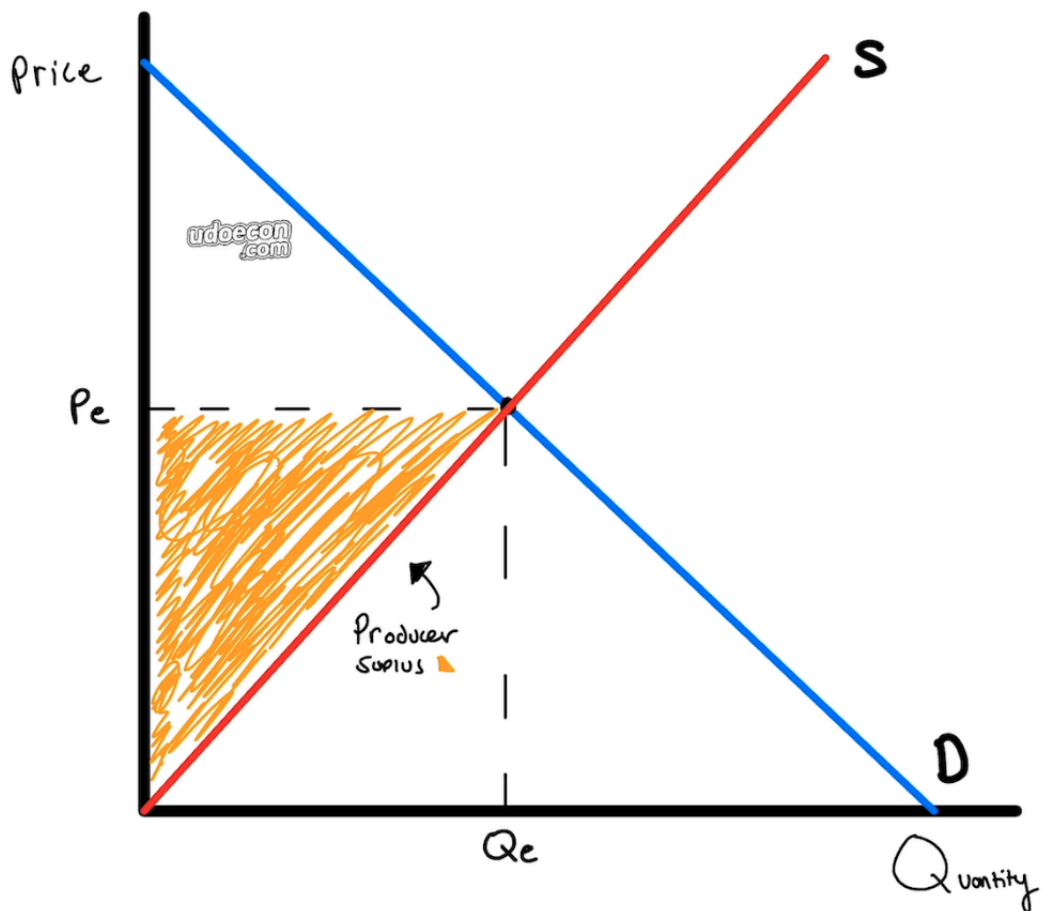


Producer surplus (PS)

Producer surplus is the area between the equilibrium price and the supply curve, up to the equilibrium quantity.

This works because the supply curve shows the minimum price firms need to supply each unit, but they receive the market price, so the vertical gap represents extra benefit to

producers.



Social surplus

Social surplus is the total benefit created in the market, so it equals $CS + PS$.

A useful exam point is that at market equilibrium, CS and PS are maximised, meaning total surplus is at its highest in that market.

A great link to taxes as due to them reducing quantity and raising price reduce both consumer and producer surplus thus causing deadweight losses in markets

How does a Shift out of demand affect Consumer and Producer Surplus

- Original Consumer surplus is the green triangle (A,PE,B). After is the purple triangle (P1,C,D)
- Original Producer surplus is PE,B,E . After shift P1,D,E

