

Theory of Supply

- What is Stock
- What is Supply
- Determinants of Supply
- Supply Function
- Law of Supply (Assumptions, Intuition, Exceptions)
- Shift in Supply Curve
- Price elasticity of Supply (Types, Measurement, Determinants)

What is Stock

- Stock is the total quantity of a commodity available with the producers which is ready for sale.
- Stock depends on the production; It is a static concept and is not expressed in relation to price and time.
- It is not directly related to the demand and has no direct impact on the market equilibrium.
- It has a limited impact on the price.

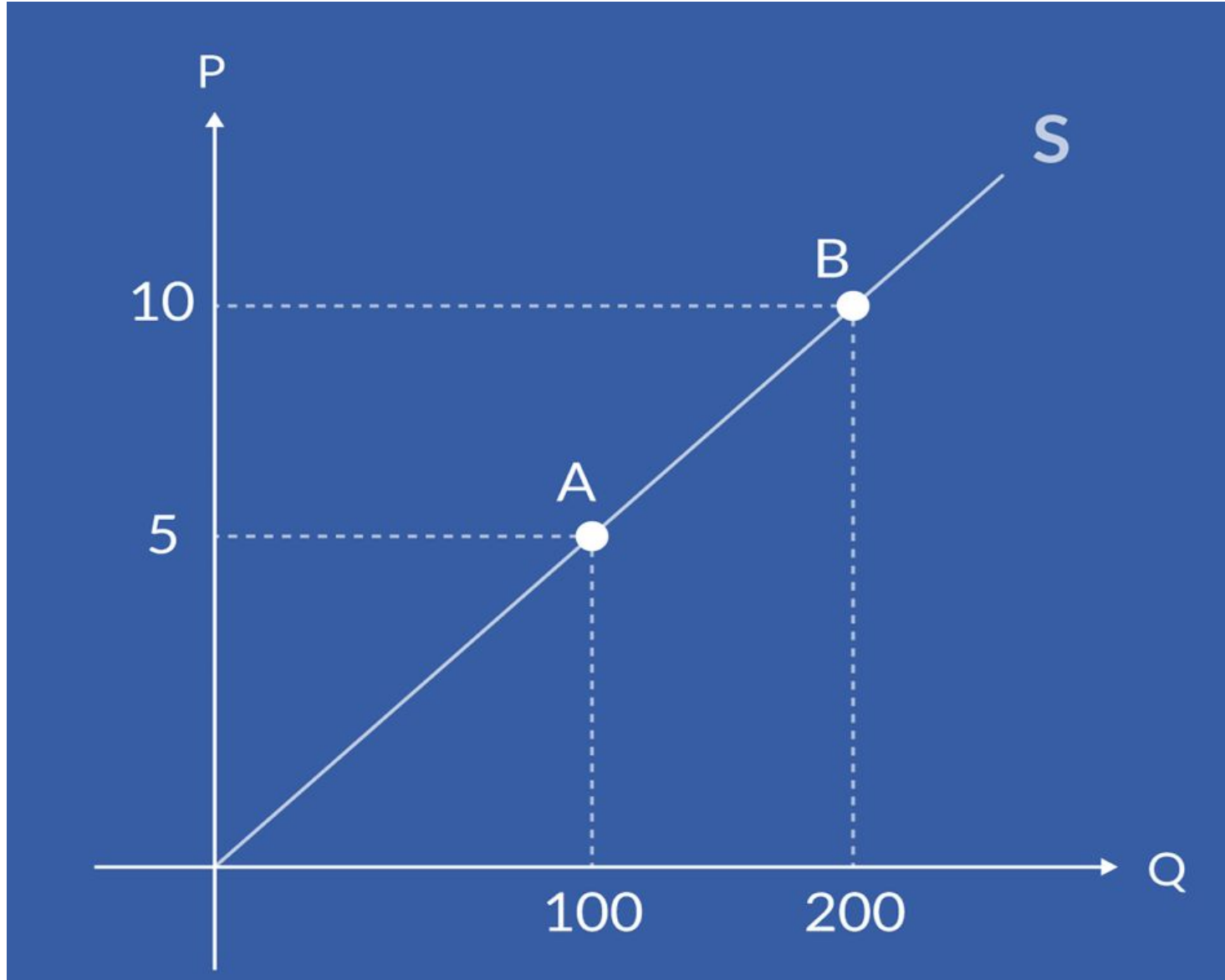
Supply

- Quantity of goods or resources that producers are willing and able to sell at a given price
- It is a dynamic concept which is being measured for a given period of time
- It is directly related to demand and affects the market equilibrium
- It directly affects the price; Supply is generally less than or equal to the stock

Law of Supply

- It is an economic concept which gives an idea of quantity of goods businesses will provide.
- The law states that, other things remaining the same, the quantity of any commodity that the firm will produce and offer for sale rises with the price and falls with the fall in the prices.
- Entrepreneurs wish to maximize to the profits, so they are willing to supply more goods and services to the consumers at the highest available price.

Law of Supply



As per the law of supply, the supply of the product will increase with the increase in price and vice-versa.

Why Supply Curve is Upward Sloping?

1. Profit Consideration

The main aim of the producers is to secure maximum profits.

2. Law of Diminishing Returns

The cost of production increases as the level of production rises due to declining factor productivity.

3. Shift of Resources

The rise in the price of a product gives incentive to the producers to increase the production of that commodity at the expense of other lower priced commodity.

4. Change in the Number of Firms

A rise in price induces prospective producers to enter into the market to produce the given commodity so as to earn higher profits.

Assumption of the Law of Supply

1. No change in the income
2. No change in technology
3. There should be no change in the transport cost
4. Cost of production remains unchanged
5. There should be fixed scale of production
6. There should not be any speculations
7. The prices of other goods should remain constant
8. There should be no change in the government policies

No change in:
income, technology, transport cost, production cost, prices of other goods, govt.
policies.

PPITTG

No speculation

Supply Function

Supply function is a numerical portrayal of the association between the amount expected (quantity demand) of a product or service, its value, and other related factors.

The supply function is expressed as, **$S_x = f(P_x, P_r, P_f, S_t, T, O, E, N)$**

Where:

S_x = Supply of the given commodity x.

P_x = Price of the given commodity x.

P_r = Price of other goods.

P_f = Prices of factors of production.

S_t = State of technology.

T = Taxation policy.

O = Objective of the firm.

E = Expectation

N = natural factors

F_n = Number of firms

Determinants of Supply

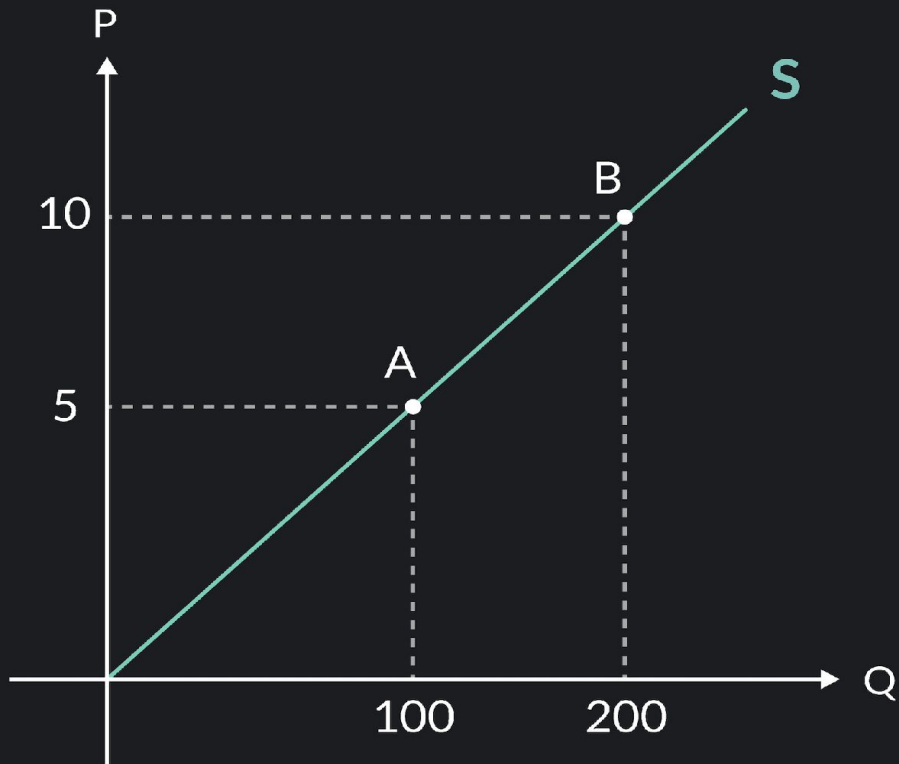
- Price of the Commodity
- Firm Goals
- Price of Input material
- Technology
- Government Policy
- Supplier's Expectation
- Prices of Related Products
- Number of Sellers
- Natural Factors

Exceptions to Law of Supply

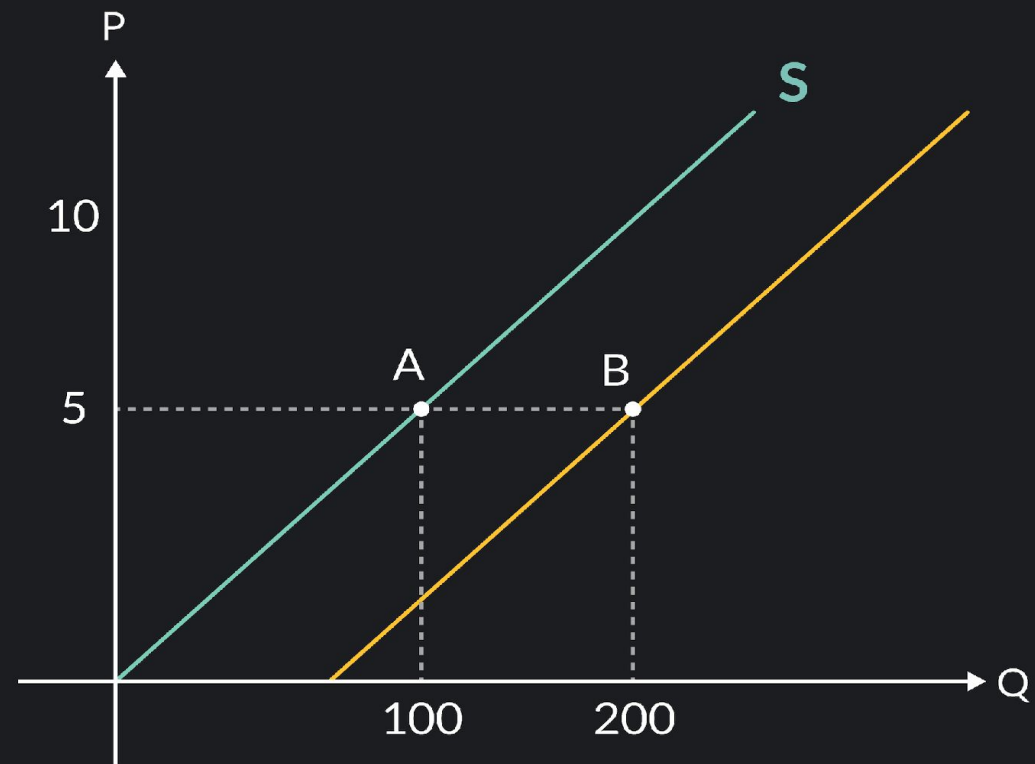
- Change in business
- Monopoly
- Quality of the Good (Perishable Goods)
- Legislation Restricting Quantity
- Agricultural Products
- Artistic and Auction Goods
- Out of Fashion Goods
- Economic Slowdown
- Immediate Requirement of Fund
- Future Expectations

Supply Curve: Movement vs. Shift

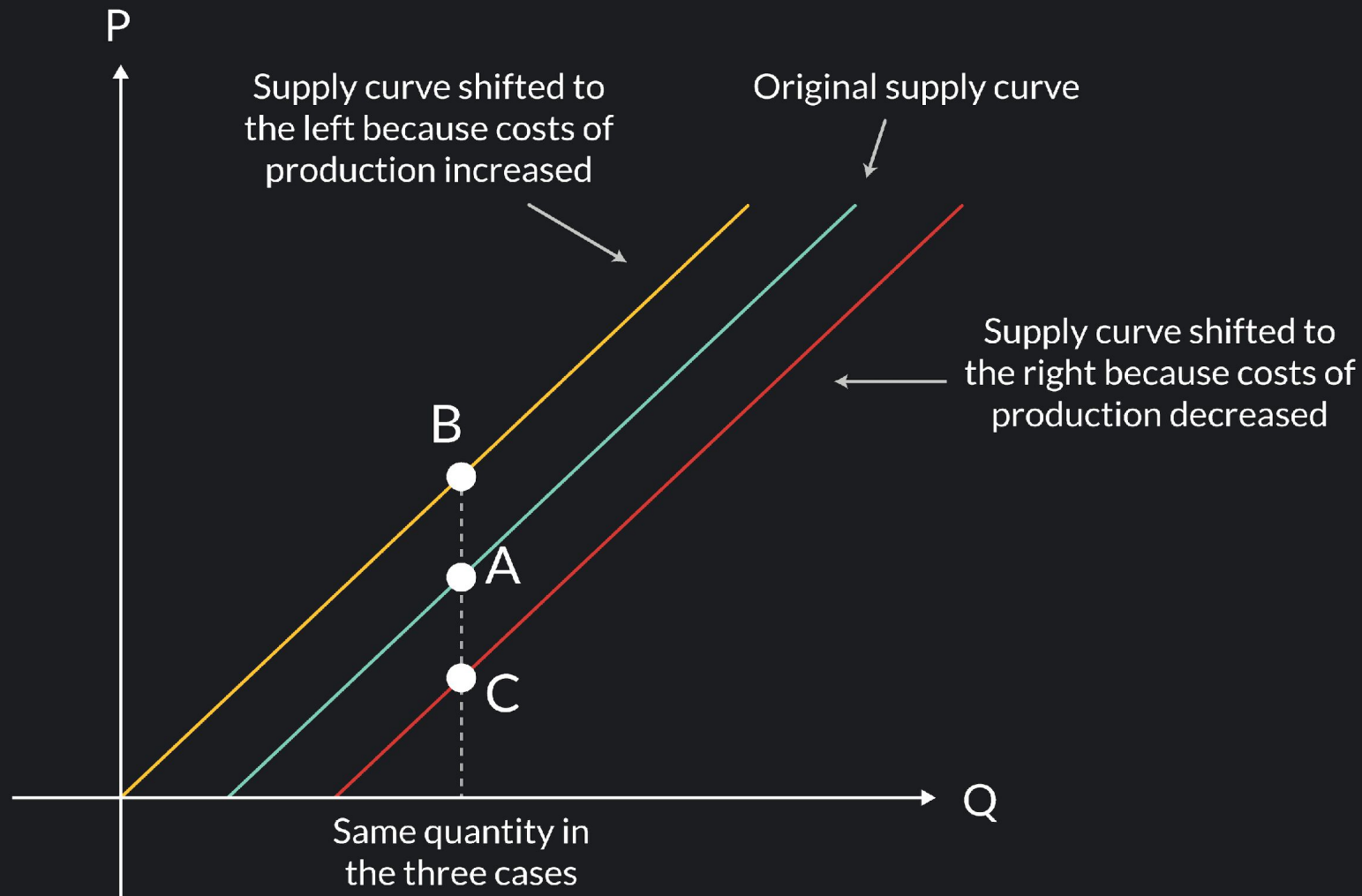
Movement Along The Curve



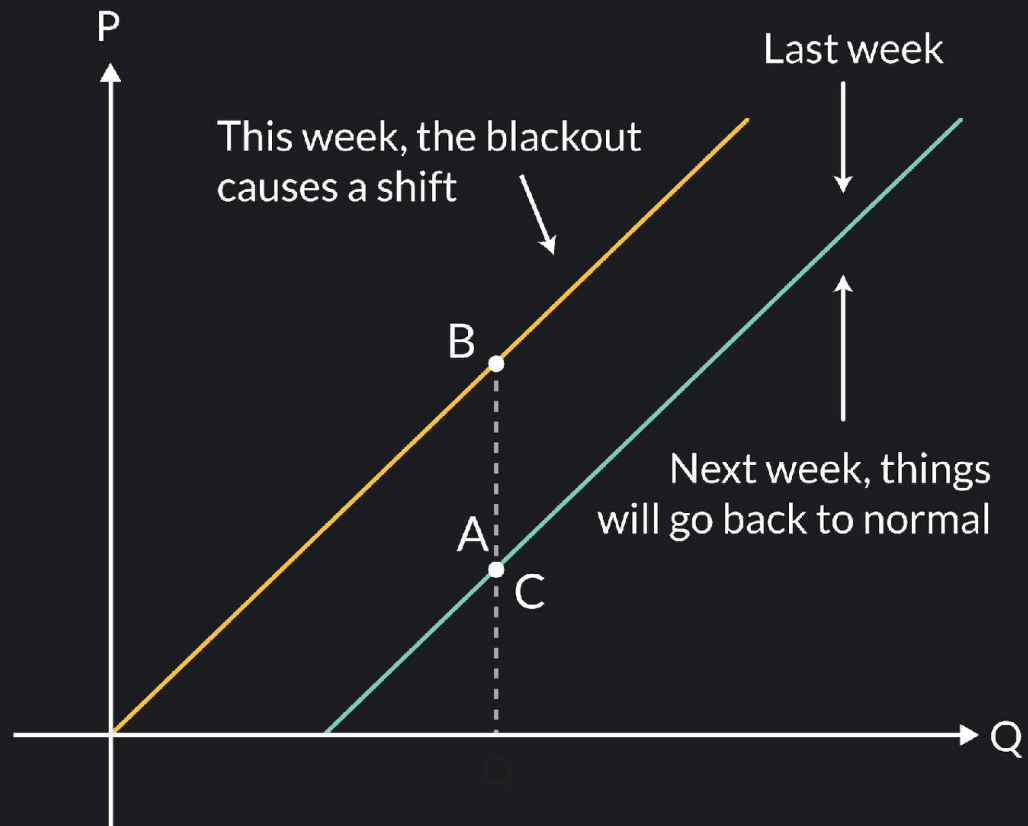
Shift of the Curve



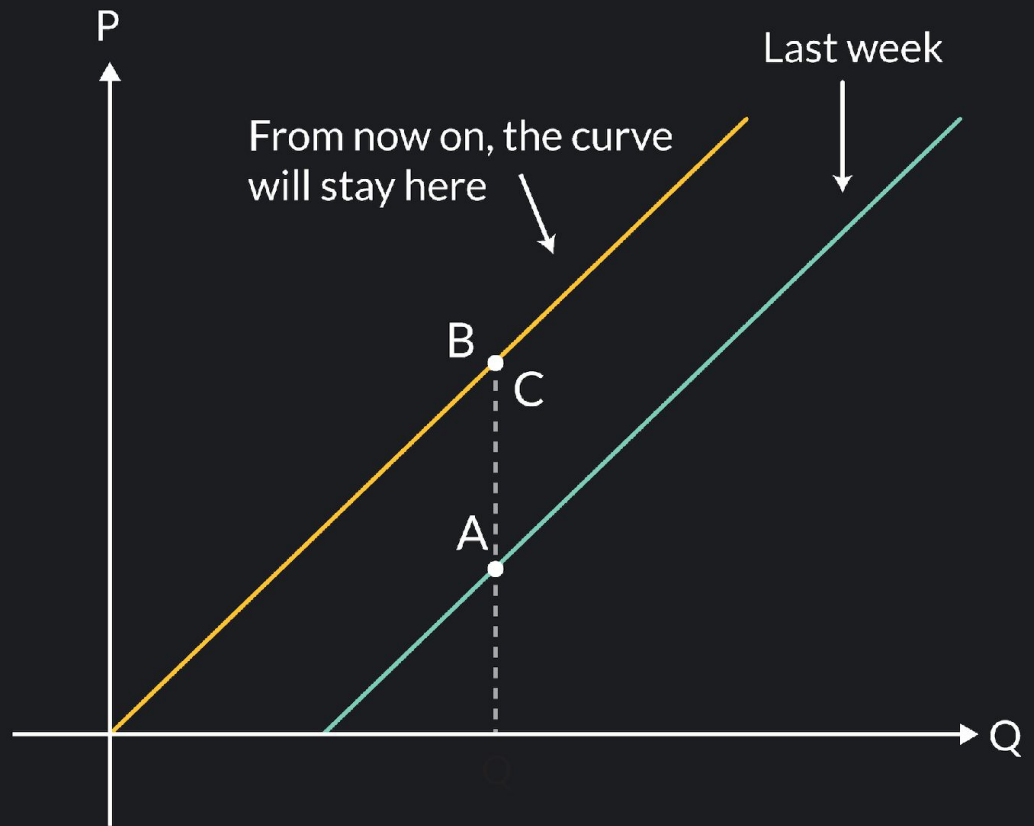
Factors that Affect The Supply Curve



A Temporary Shift



A Permanent Shift

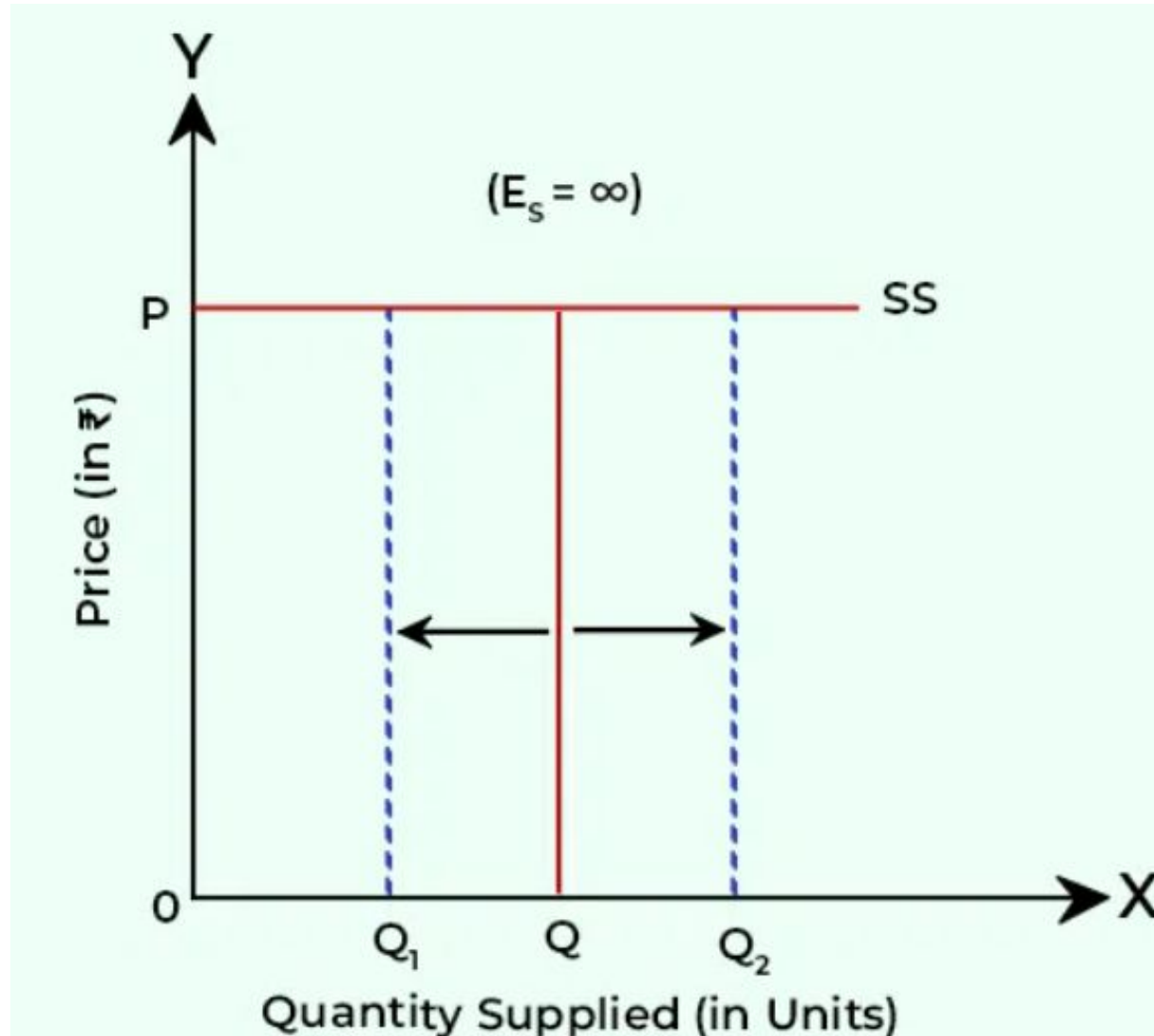


Price Elasticity of Supply

- Price elasticity of supply measures the responsiveness of quantity supplied to a change in price.

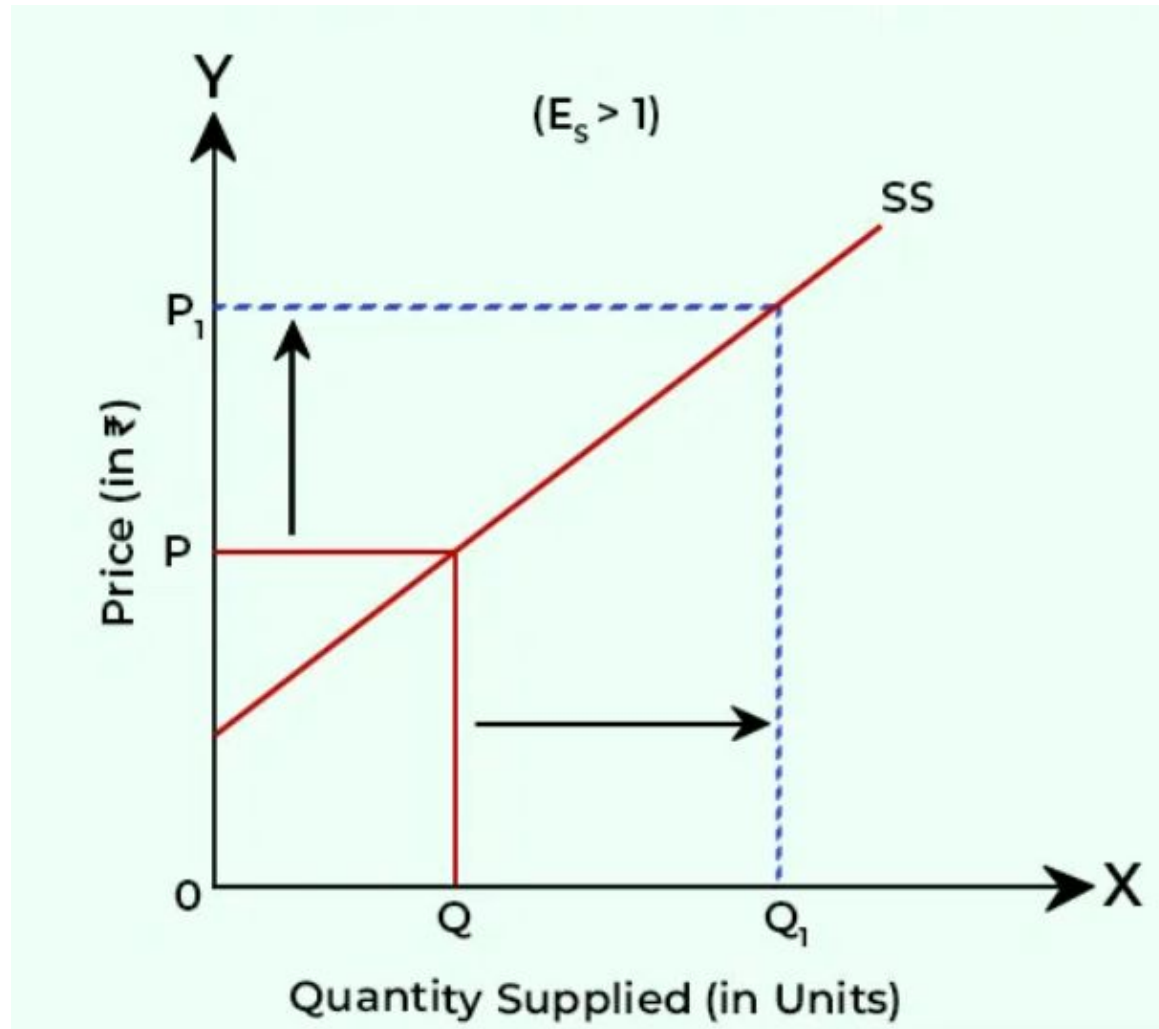
$$\text{PES} = \frac{\% \text{ Change in quantity supplied}}{\% \text{ Change in price}}$$

Perfectly Elastic Supply



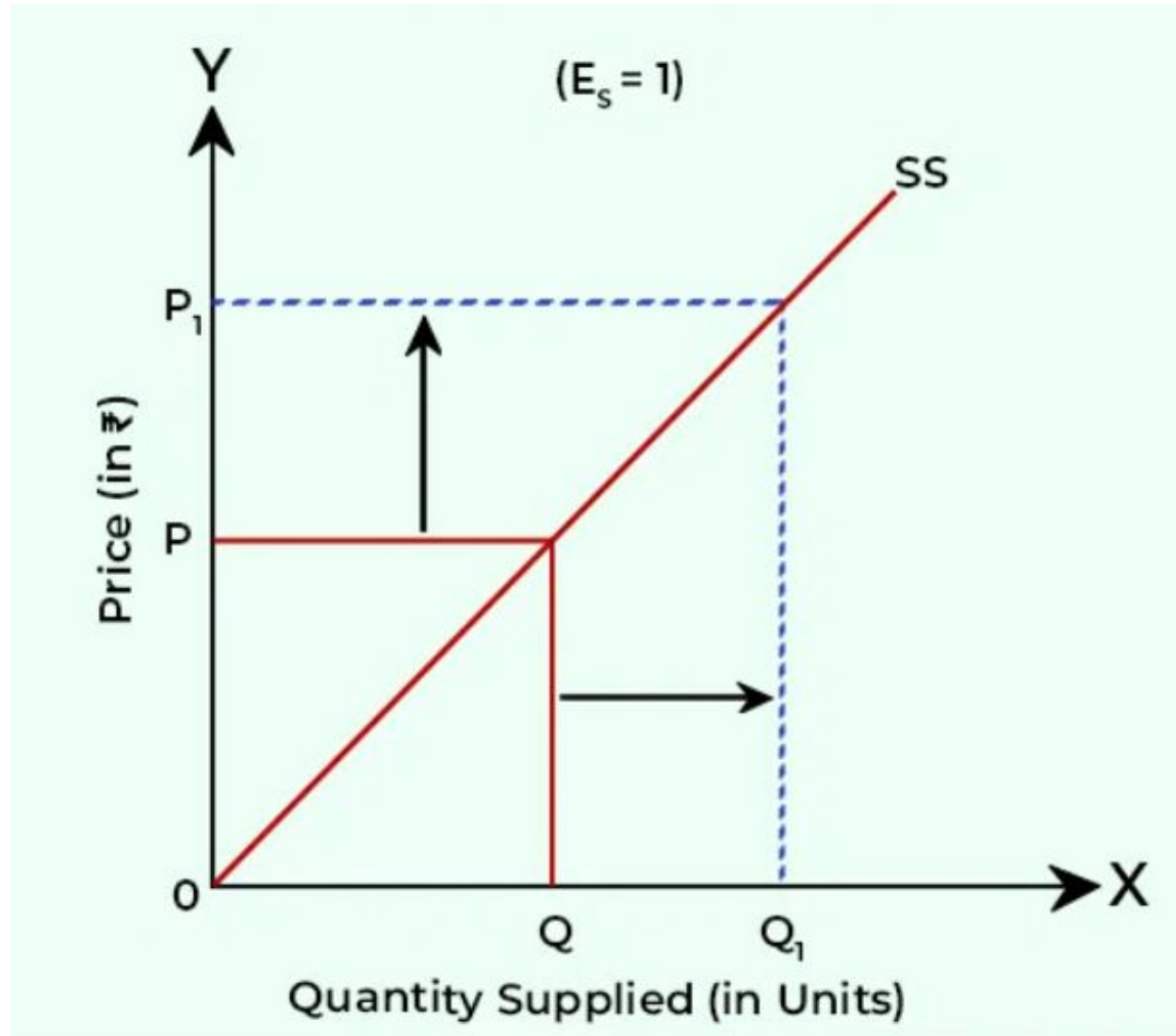
Quantity supplied can be OQ , OQ_1 , or OQ_2 at the same price as OP .

Highly Elastic Supply



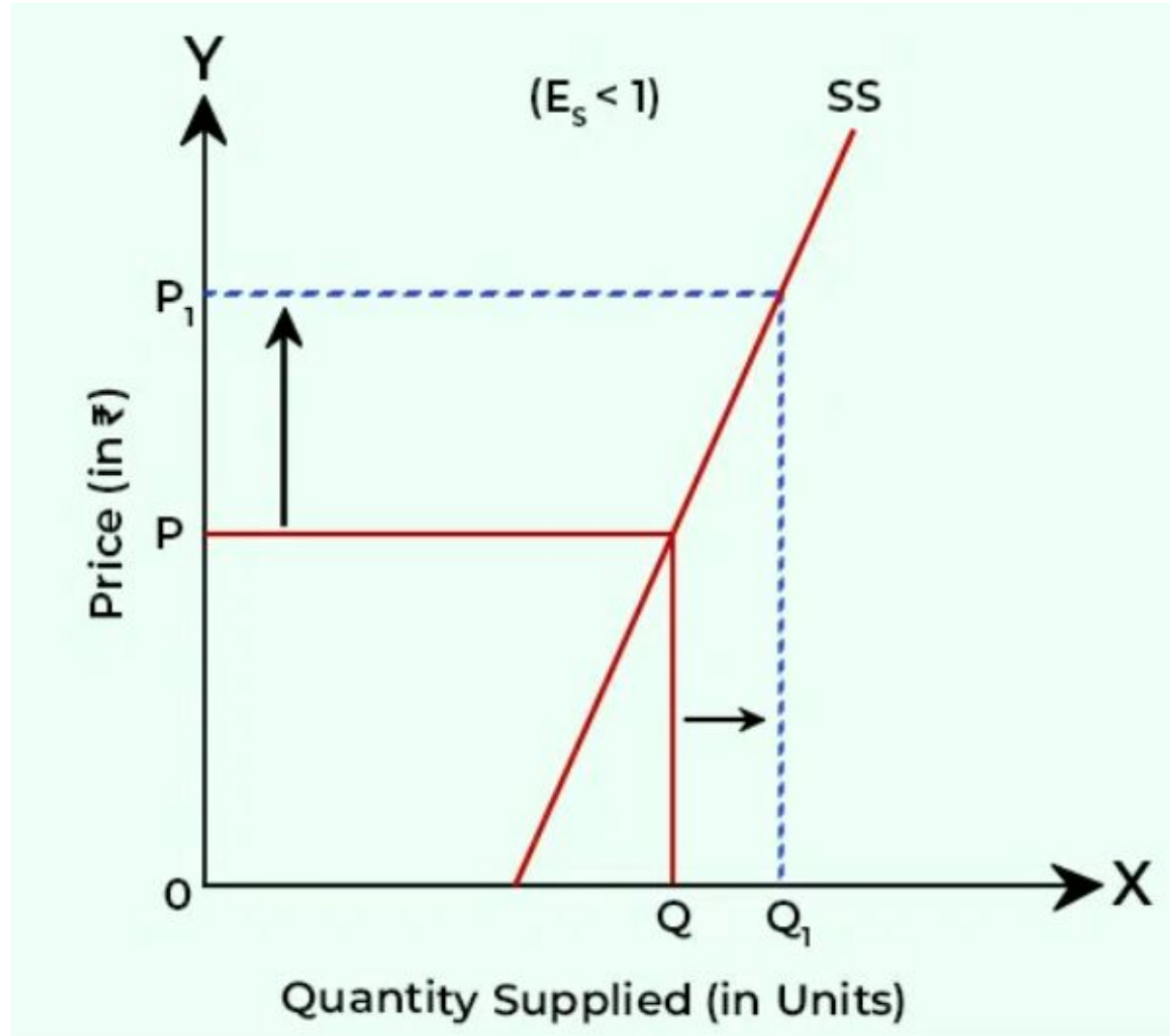
The quantity supplied rises from OQ to OQ_1 with a rise in price from OP to OP_1 . As QQ_1 is proportionately more than PP_1 , the elasticity of supply is more than 1.

Unitary Elastic Supply



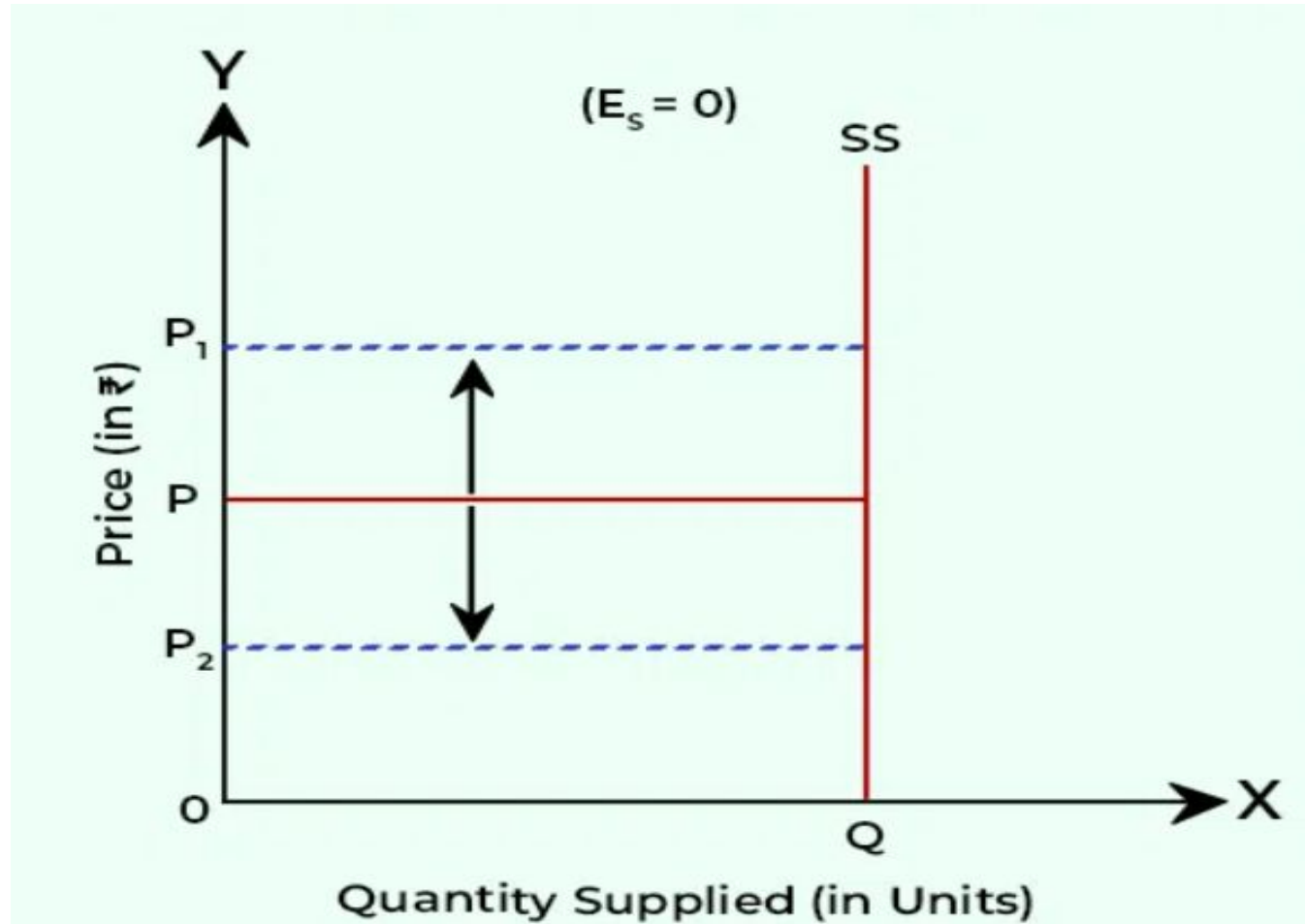
The quantity supplied rises from OQ to OQ_1 with a rise in price from OP to OP_1 . As QQ_1 is proportionately equal to PP_1 , the elasticity of supply is equal to 1.

Less Elastic Supply



The quantity supplied rises from OQ to OQ_1 with a rise in prices from OP to OP_1 . As QQ_1 is proportionately less than PP_1 , the elasticity of supply is less than 1.

Perfectly Inelastic Supply



Quantity supplied remains the same at OQ , with the change in price from OP to OP_1 to OP_2 .

Determinants of Price Elasticity of Supply

1. Flexibility in Production
2. Adjustment Time Period
3. Availability of Input Resources
4. Government Intervention
5. Type of the Product
6. Natural Constraints
7. Technique of Production