

## SUPPLY

I. Definition - a relation showing the various amounts of a good or service that producers are willing and able to produce and sell at alternative prices during a given time period (all else remaining the same).

II. Law of Supply - the quantity of goods and services for sale varies directly with price (assuming all other things remain the same).

higher price -producers willing to supply more  
lower price - producers willing to supply less

III. Change in Quantity Supplied ( $\Delta QS$ )

This is a movement along the supply curve which results from changes in quantities supplied by producers in response to changes in the price of that good or service (all other factors remaining the same).

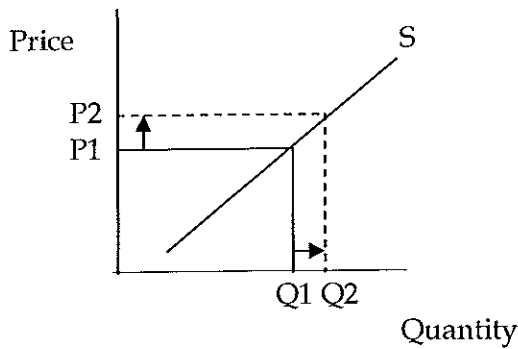


Fig. 1

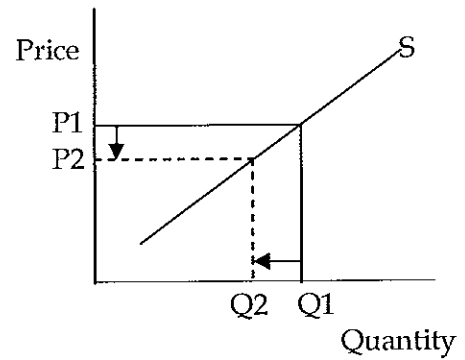


Fig. 2

IV. Change in Supply ( $\Delta S$ )

This is a **shift in the supply curve** caused by factors other than a change in the price of that good or service. It reflects a change in the supply schedule itself, showing either an increase or decrease in the amount producers are willing and able to supply at each price.

Factors that will shift supply:

1. Change in input costs
2. Government's influence—taxes, subsidies, regulations
3. Expectations of lower or higher prices in the future
4. Change in the number of sellers
5. Changes that affect imports, like trade barriers (tariffs, quotas)
6. Physical changes, like droughts, hurricanes

When the supply curve shifts, the new supply curve shows that producers are willing to supply more (Fig. 1) or less (Fig. 2) than before at each price. Remember:

- Any factor that decreases the cost of production increases supply.
- Any factor that increases the cost of production decreases supply.

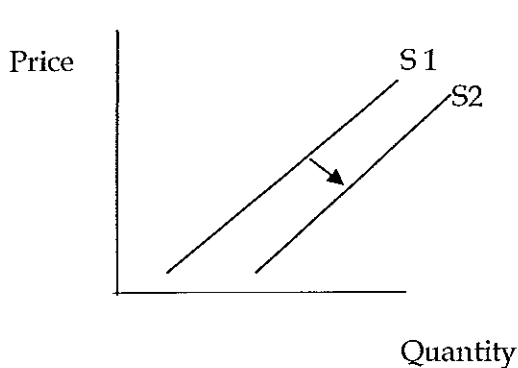


Fig. 1

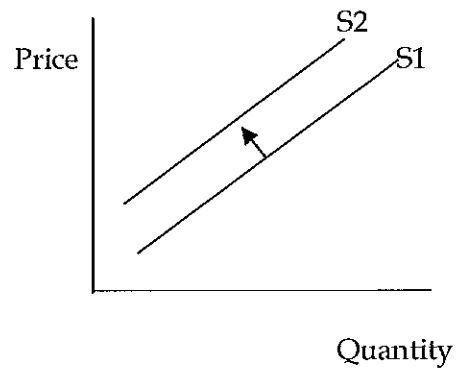


Fig. 2

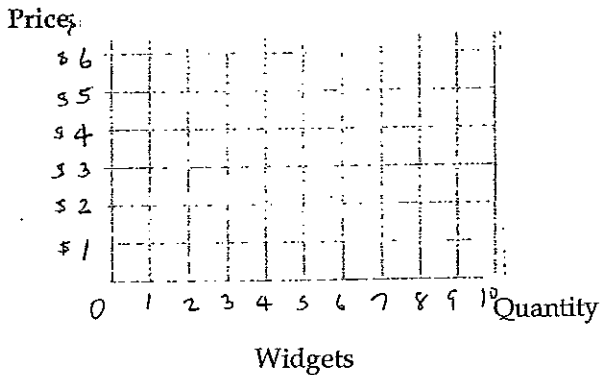
## SUPPLY WORKSHEET

I. Supply schedules and graphs:

A. Use the following schedule to graph Acme Company's willingness and ability to supply widgets at various prices (label the curve S1).

Supply Schedule

Price	Quantity (in thousands)
\$5	5
\$4	4
\$3	3
\$2	2
\$1	1



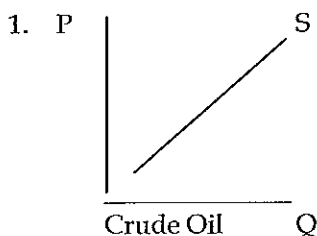
Show on this graph what happens when the market price changes from \$2 to \$3. Is this a change in supply or a change in quantity supplied?

B. Now suppose that Acme Co. has acquired a new machine which reduces their labor costs. Because their profit potential is now greater, they are now willing to provide twice as many widgets at each price. Complete this new supply schedule below and then graph this new curve with a dashed line (---) on the graph above and label it S2.

New Supply Schedule

Price	Quantity (in thousands)
\$5	
\$4	
\$3	
\$2	
\$1	

II. Read the description for each of the following graphs. Determine if a change in supply ( $\Delta S$ ) or a change in quantity supplied ( $\Delta QS$ ) is described. Remember, the only thing that can cause a change in quantity supplied ( $\Delta QS$ ) is a change in the price of that good. Give the reason for each change. Then sketch the result on the curve. Label new supply curves S2.

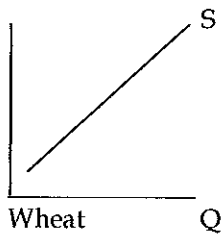


The price of crude oil increases 50%.

Will this cause  $\Delta S$  or  $\Delta QS$ ? \_\_\_\_\_

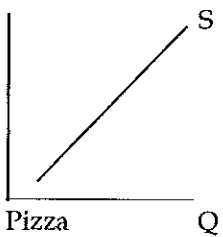
Reason? \_\_\_\_\_

2. P



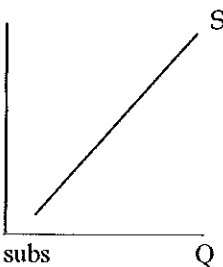
A severe drought damages over 60% of the nation's wheat. Will this cause  $\Delta S$  or  $\Delta QS$ ? \_\_\_\_\_  
Reason? \_\_\_\_\_

3. P



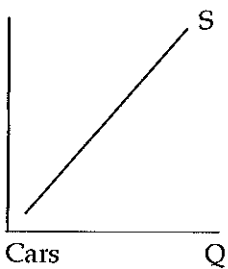
The producer of pizza is able to get cheese for half the regular price. What will be the impact on pizza?  $\Delta S$  or  $\Delta QS$ ? \_\_\_\_\_  
Reason? \_\_\_\_\_

4. P



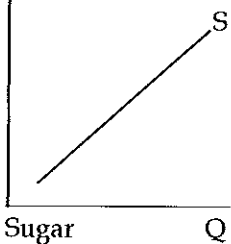
A school district has just announced that because of budget cuts they must decrease the salary of substitute teachers from \$90 per day to \$75 a day. What happens to the number of people willing to substitute teach?  $\Delta S$  or  $\Delta QS$ ? \_\_\_\_\_  
Reason? \_\_\_\_\_

5. P



If the average cost of labor increases from \$50/hr to \$60/hr in the auto industry, what will be the impact on the supply of cars?  $\Delta S$  or  $\Delta QS$ ? \_\_\_\_\_  
Reason? \_\_\_\_\_

6. P



The government bans the import of sugar from foreign countries. What will happen to the supply of sugar in the US?  $\Delta S$  or  $\Delta QS$ ? \_\_\_\_\_  
Reason? \_\_\_\_\_