CBSE
Class XII Economics
All India Board Paper Set 1 – 2017 Solution

SECTION A

Answer 1

The correct answer is option (d). Demand is the quantity which a consumer is willing and able to purchase at each possible price during a given period of time. So, the demand for a good is considered correct with four essential items i.e. quantity of the commodity, willingness to purchase, price of the commodity and period of time.

Answer 2

The correct answer is option (b). Demand for demand is inelastic through the expenditure approach when price of the good falls and expenditure also falls.

Answer 3

An indifference curve is the curve which represents all those ***combinations of two commodities*** which give the same level of satisfaction to a consumer. It slopes downward because an increase in the amount of Good X along the indifference curve is associated with a decrease in the amount of Good Y as the preferences are monotonic.

Answer 4

The correct answer is option (a). A seller cannot influence the market price under perfect competition because in a perfectly competitive market, the buyers will treat the products of all the firms in the market as homogeneous. There is zero degree of product differentiation and the firm cannot take any control of the price. Here, the firm does not involve in advertisement and sales promotion activities. Hence, ***uniform price prevails in a perfectly competitive market*** for homogeneous products.

Answer 5

Under monopolistic competition, there are large numbers of sellers but not homogeneous product. Each firm acts independently and limited share of the market.

Answer 6

Meaning: Production possibility frontier (PPF) means the geographical representation of possible combinations of two goods which can be produced with given resources and technology.

Feature: It slopes downwards because if more of one good can be produced only by taking resources away from the production of another good. Hence, there exists inverse relationship between change in quantity in one commodity and change in another commodity. It shifts from left to right.

Answer 7

Once the decision regarding the goods to be produced is taken, the next problem as to what techniques should be adopted to produce the commodity arises. This function is related to the allocation of resources to production techniques which have to be employed during the production of goods and services. The production of goods and services can take place in two ways –labour-intensive technique and capital intensive technique. The labour-intensive technique involves more of labour and less of capital in the output, while it is reverse for the capital intensive technique.

Therefore, it is upon the economy to decide on a specific method of production for particular goods. The economy has to decide between the automatic machines and handicrafts. Every method has its own advantages and disadvantages. Mechanization increases the quantity and quality of the goods. But as it requires fewer workers, it results in unemployment. Handicrafts reduce unemployment and the quantity of production is lesser. The economy has to decide about the techniques of production on the basis of the cost of labour and capital.

Answer 8

Increase in demand and increase in quantity demanded of a good

Increase in quantity demanded	**Increase in demand**
It refers to quantity demanded changes due to change in the price remaining other factors constant.	It refers to a rise in demand for a commodity because of factors other than the price.
Factors which cause increase in quantity demanded • An increase or a decrease in the price of the given commodity	Factors which cause increase in demand: • Increase in income of the consumer • Rise in price of substitute good • Fall in price of complementary good • Change in taste and preferences in favour of the good
It leads to a movement along the same demand curve either upwards or downwards.	It leads to shift in the demand curve either rightwards or leftwards.

OR

A budget set refers to attainable bundles of a set of two goods, given the prices of goods and the income of the consumer.

Equation of the budget set is $P_1X_1 + P_2X_2 < M$.

where
X_1 = Quantity of Good-1
X_2 = Quantity of Good-2
P_1 = Price of Good-1
P_2 = Price of Good-2
A **budget line** shows various combinations of two goods which a consumer can purchase with the given income and the prices of the two goods, when the consumer spends the entire income.

Answer 9
Diminishing marginal rate of substitution
Marginal rate of substitution means the rate at which the consumer is willing to substitute one commodity for the other commodity. MRS falls because of the law of diminishing marginal utility.

Law of diminishing marginal utility means that as more units of a good are consumed, the marginal utility received from the consumption of every additional unit of the good declines.

Units of Commodity X	Total Utility (TU) (utils)	Marginal Utility (MU) $MU_n = TU_n - TU_{n-1}$ (utils)
1	50	50 – 0 = 50
2	80	80 – 50 = 30
3	100	100 – 80 = 20
4	110	110 – 100 = 10
5	110	110 – 110 = 0
6	105	105 – 110 = –5

In the given schedule, marginal utility of the second unit is 30 utils and it decreases to 20 and 10 for the consumption of the 3rd and 4th unit of the marginal utility, respectively. It becomes zero for the consumption of the 5th unit, and it becomes negative for the 6th unit. Hence, the marginal utility will decrease with additional units of consumption.

Answer 10
Market supply of a commodity refers to the various quantities of the commodity which the producers are willing to offer for sale at different prices.
Factor the input price which affects supply:
Price of raw material and other factors of production: If the price of raw material or other factors of production increases, then this implies an increase in the cost of production. Accordingly, the firms would be willing to supply more quantity of the commodity at the existing price.

OR

The behaviour of marginal product and total product as more and more units of only one input are employed and remains other inputs constant can be explained through an illustration

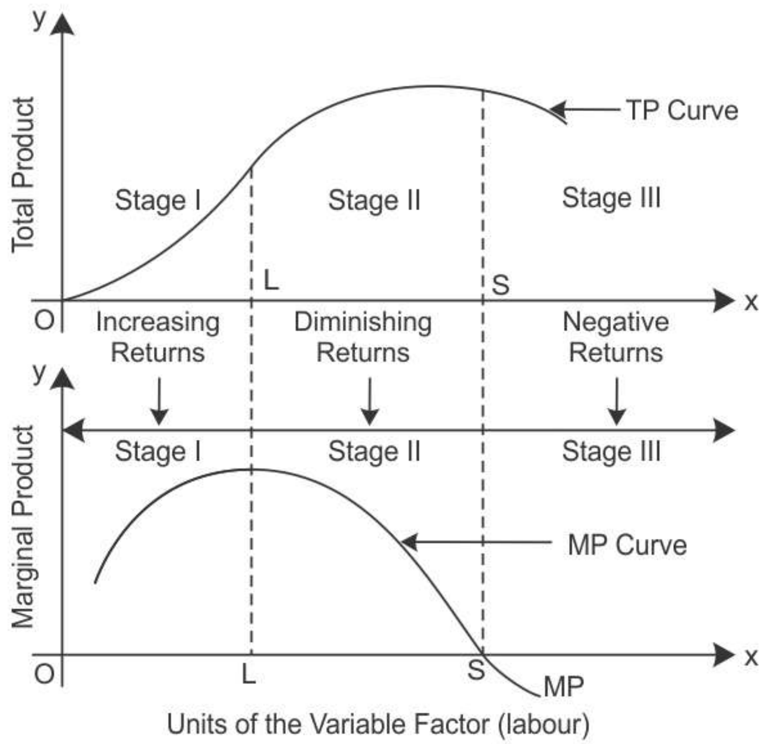
Units of Fixed Factor	Units of Variable Factor	TP	MP	Stages
1	1	4	4	Increasing MP
1	2	12	8	(Increasing returns to a factor)
1	3	24	12	
1	4	32	8	
1	5	34	2	Diminishing MP
1	6	34	0	(Diminishing returns to a factor)
1	7	30	−4	Negative MP
1	8	21	−9	(Negative returns to a factor)
1	9	10	−11	

In the above table,

Stage I: As more units of factor input are used, MP tends to rise till 3 units of factor input are used. Here, the total product increases at an increasing rate which is called ***increasing returns*** to the factor input.

Stage II: However, when the 4th unit of factor input is used, the ***diminishing returns*** set in, where MP starts decreasing and TP increases at a decreasing rate. Diminishing MP reduces to zero. The total output is the maximum when the marginal output is zero.

Stage III: When MP is ***negative***, TP starts declining from 34 to 10 when the 9th unit is employed.



Answer 11

Perfect competition- perfect knowledge about the market

Perfect knowledge means that both the buyers and sellers are fully informed about the market price. Its implication is that no firm is in a position to charge a different price and no buyer will pay a higher price. As a result a uniform price prevails in the market. Both buyers and sellers have perfect knowledge about the input markets. This means that each firm has an equal access to the technology and the inputs used in the production. Hence all the firms have uniform cost structure. Since, there is uniform price and uniform costs in case of all firms earn uniform profits.

Answer 12

Initial Price (P_0) = Rs 10

Final Price (P_1) = Rs 12

Percentage change in quantity demanded = -20

$$Ed = -\frac{\text{Percentage Change in Quantity Demanded}}{\text{Percentage Change in Price}}$$

$$Ed = -\frac{-20}{\frac{P_1 - P_0}{P_0}\times 100}$$

$$Ed = \frac{+20}{\frac{12-10}{10}\times 100}$$

$$\therefore Ed = 1$$

Now, $P_0 = \text{Rs}\,10$ & $P_1 = \text{Rs}\,13$

$$1 = -\frac{\text{Percentage Change in Demand}}{\frac{13-10}{10}\times 100}$$

$$\therefore \text{Percentage Change in Demand} = -30$$

Hence, demand falls by 30% when price rises from Rs 10 to Rs 13 per unit.

Answer 13

Output (Units)	AFC(₹) $AFC = \frac{TFC}{Q}$	MC(₹) $MC = TVC_n - TVC_{n-1}$	AVC (₹) $AVC = \frac{TVC}{Q}$	AC (₹) $AC = AFC + AVC$	TFC	TVC
1	60	20	**20**	**80**	**60**	**20**
2	**30**	**18**	19	**49**	**60**	**38**
3	20	**16**	18	**38**	**60**	**54**
4	**15**	18	**18**	**33**	**60**	**72**
5	12	**23**	**19**	31	**60**	**95**

Answer 14

Output (Units)	Total Revenue (₹)	Total Cost (₹)	$MR = TR_n - TR_{n-1}$	$MC = TC_n - TC_{n-1}$
1	10	8	**10**	**8**
2	18	15	**8**	**7**
3	24	21	**6**	**6**
4	28	25	**4**	**4**
5	30	33	**2**	**8**

The firm would be in equilibrium when following two conditions are satisfied:

i. MR = MC
ii. MC is rising or the MC curve cuts the MR curve from below.

Thus, at 4 units of output, the firm is in equilibrium as both the conditions are getting satisfied at this level.

Answer 15

Perfect oligopoly	**Imperfect oligopoly**
If the firms produce homogeneous product then it is called perfect oligopoly.	If the firm produce differentiated products then it is called imperfect oligopoly.
It is rare to find this type of situation. Examples: cement, steel, aluminium and chemical producing industries	Examples: Passenger cars, cigarettes and soft drinks.

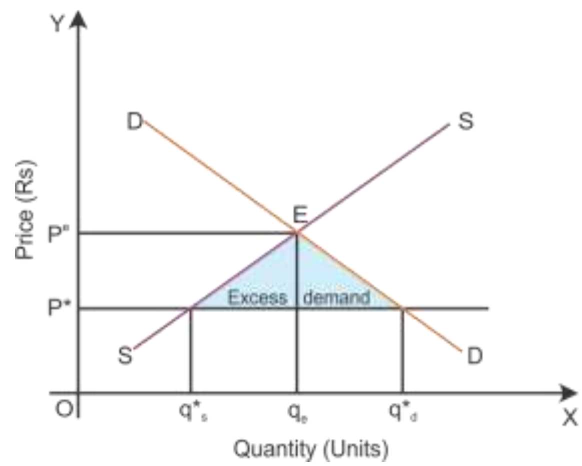
Feature 'interdependence of firms' in an oligopoly market: In a market, the price and level of output of one firm impact the price and level of output of rival firms. Keeping this impact in mind, a firm decides the price and output in accordance with prevailing market conditions. Hence, a high degree of interdependence exists among competing firms, especially with regard to price and quantity of output.

Or

Excess demand refers to a situation when quantity demanded is more than quantity supplied at the prevailing market price.

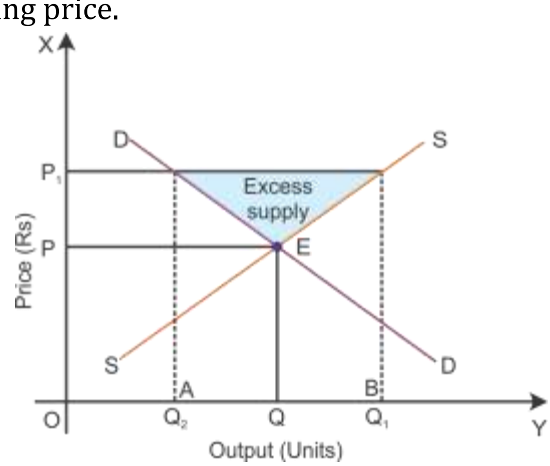
Price of Toy (Rs)	**Market Demand (Units)**	**Market Supply (Units)**	**Shortage (-) or Surplus (+)**	
2	100	20	(-) 80	Excess demand Market demand < Market supply
4	80	40	(-) 40	
6	60	60	0	Equilibrium Market demand = Market supply
8	40	80	(+) 40	Excess supply Market demand > Market supply
10	20	100	(+) 80	

Here both buyers and sellers are negotiating to buy and sell toys. Both have different prices to offer. Buyers will like to pay as low as possible and sellers will like to charge as high as possible. But market equilibrium will be determined only when both agree to a common price and a common quantity at that price. When increase in price from Rs 2 to Rs 4, market demand falls from 100 to 80 toys and market supply rises from 20 to 40 toys.



When the price is lower than the equilibrium market price of a good (OP^e), the price ceiling leads to ***<u>excess of demand</u>***. Now, the excess demand will increase the competition among consumers in the market. Thereby they consume the good at a higher price which leads to an increase in the price level, i.e. OP^e.

Excess supply refers to a situation when the quantity supplied is more than teh quantity demanded at the prevailing price.



When the price is above the equilibrium market price of a good (OP), the price ceiling leads to ***<u>excess of supply.</u>*** In the diagram, the equilibrium price and quantity are OP and OQ. As the equilibrium price is low for farmers, the government fixes the price floor, i.e. the price level increased from OP to OP_1 which leads to a decline in the quantity demand, and therefore, there is ***<u>excess supply</u>*** in the market. Here, the competition will increase among the sellers, and hence, the price will come down to the equilibrium point where market demand is equal to market supply.

SECTION B

Answer 16

The correct answer is option (b). Demand deposits include savings and current account deposits because demand deposits are not for any specific period of time. They can be withdrawn as and when required. These deposits are chequable deposits.

Answer 17

Marginal propensity to consume means the ratio of change in consumption expenditure to change in total income.

$$\text{MPC} = \frac{\text{Change in consumption}(\Delta C)}{\text{Change in income}(\Delta Y)}$$

Answer 18

The correct answer is option (a). When MPC >MPS, then the value of multiplier will be greater than 2 because the value of multiplier is directly related to the value of marginal propensity to consume. They both are directly related. In other words when MPC is more, k the multiplier is more and vice versa.

Answer 19

Government budget means an ***annual statement*** which shows the item wise estimates of receipts and expenditure during a fiscal year. Generally the fiscal is considered from 1^{st} April to 31^{st} March.

Answer 20

Depreciation of domestic currency refers to ***decrease in the value of domestic currency in terms of foreign currency***. For example, if the price of $1 increases from Rs 55 to Rs 59. It means fall in the price of domestic currency.

Answer 21

Classification of goods into final and intermediate goods:

Final goods are those goods which will not pass any more stages of production process and are ready for use by their final users. Consumers and producers are the final users. On the other hand, goods which are within the boundary line of production, still the value is yet to add to these goods and are not available for use by their final users are called **intermediate goods.** These goods are consumed by another firm and are used as intermediate goods in the production process or for further sale. For example, papers purchased by Newspaper agency for printing news are intermediate goods. Value of intermediate goods is merged with the value of final goods. Here the value of intermediate good is not included in the estimation of national income.

Answer 22

Difficulty in storing wealth:

People keep their wealth in the form of money because money is the most liquid form of wealth. Savings in the form of money is maintained for purchasing commodities in the future. In this case, the values of commodities are being stored. Hence, money acts as a store of value. However, the store of value is completely absent under the barter system.

Wealth is stored in terms of goods as there was no money in existence. There were many problems such as ***storage of goods cost, loss of value and movement of transfer***. For example, wheat and rice do not possess durability i.e. their quality deteriorates with passage of time. Storage of good requires time and efforts. Hence, it is not practically possible to store people's purchasing power.

OR

Medium of exchange:

The primary function of money is to act as a medium of exchange between two parties involved in a transaction. It avoids the practical problems of wastage of time and resources involved in the barter system of exchange and it improves the efficiency of the transaction. It promotes allocation efficiency in the trade and production of goods and services.
In case of the barter system, the sale and purchase of goods occurs at the same time. Their sale and purchase value also remains equal at that point. A person can purchase or sell goods with cash without selling or purchasing any good at that point, after money came into existence. Thus, the act of purchase and sale has been separated. Thereby the medium of exchange facilitated sale and purchase very easily in terms of monetary value.

Answer 23
Direct taxes and indirect taxes

Direct tax refers to those taxes which are imposed on property and income of individuals and companies and are paid directly by them to the government. For example, income tax- the tax burden cannot be shifted to any other person. The person on whom the government imposes the tax must pay a part of his/her income as tax to the government.
Indirect tax refers to those taxes which are imposed on an individual but are paid by another person either partly or wholly. Hence, the impact and incidence of taxes are on different persons. Customs and excise duties are examples of indirect taxes. Here the producer bears the impact and the incidence of tax on the consumer. Indirect taxes are those taxes in which the tax burden can be shifted to another person. The impact and incidence of tax falls on different persons. For example, the sales tax where the tax burden is shifted by the seller of the commodity to the buyer.
The impact of indirect taxation can be shifted on to others while the impact of direct taxation cannot be shifted. Example: Direct tax- income tax and indirect tax- sales tax

Answer 24
Banker's bank as function of bank:

The Central Bank is an apex bank of all banks in the country. It has almost the same relation with other banks in the country as a commercial bank has with its customers. The Central Bank keeps some cash balances of the commercial banks as compulsory deposit. This is to help them during financial crises. In this way, the central bank acts as a custodian of cash reserves of commercial banks. It assists these banks through discounting of approved securities and bills of exchange.

OR

Process of credit creation by commercial banks:

Commercial banks create money even though they cannot print money. Bank deposits form the basis for credit creation. They accept deposits from the public by opening a deposit account known as the primary deposit. Banks do not hold the money in the account itself, and the entire amount is not withdrawn from the account at the same time. So, they advance loans to business persons and retain only a small portion of the total deposits in the bank. The Central Bank decides the amount to be held in the form of cash and the remaining amount is advanced as loans to business persons only against collateral securities. The bank will not give cash but open a derivative account in the name of the individual or institution. Here, the loans create a derivative deposit which is called a secondary deposit or derivative deposit. This ***secondary deposit is called the creation of credit.*** Hence, the banks are able to provide financial assistance to traders and industrialists. Their cheques and drafts are useful for trading on a large scale. It also provides concessional loans to the priority sectors such as agriculture, small-scale industry, retail trade and export. Thus, the ***production activity increases*** the overall development of the nation.

Answer 25

$C = \overline{C} + cy$

$8{,}000 = 500 + C \times 10{,}000$

$7{,}500 = 10{,}000C$

$C = \dfrac{7{,}500}{10{,}000}$

$C = 0.75$

$MPC = 0.75$

We know,

$MPS = 1 - 0.75$

$\therefore MPS = 0.25$

Answer 26

Taxes and government expenditure can be influenced in bringing economic stabilisation in the following ways:

i. A tax is a legally compulsory payment imposed by the government on households and producers. The government imposes taxes on socially unsafe goods such as alcohol and tobacco. Thereby resources will be shifted to the production of socially essential goods.

ii. Subsidies do not reduce the liability of the government and it does not add to the assets of the government. The government also provides subsidies for necessary goods such as wheat, rice and sugar. Thereby the resources are shifted from the production of goods for the rich to the production of goods for the poor.

Thus, government budget can be helpful in bringing economic stabilisation in the economy.

Answer 27

Current account and capital account

Current account	**Capital account**
Current account transactions bring a change in the current level of economy's income.	Capital transactions bring a change in the capital stock of an economy
It is a flow of concept as it includes all items of flow nature.	It is a stock concept as it includes all items expressing changes in stock
Current account = visible trade + invisible trade + unilateral transfers + income receipts and payments	Capital account = Borrowings and lendings to and from abroad + investments to and from abroad + change in foreign exchange reserves.

Autonomous transactions and Accommodating transactions

Autonomous transactions	**Accommodating transactions**
An autonomous transactions are independent of the state of balance of payments account (BOP A/c)	An accommodating transactions are undertaken to maintain the balance in BOP account
These transactions take place on both current and capital accounts.	These transactions take place only on capital account
These items in BOP refer to foreign exchange transactions which are made independently of the state of the balance of payment, such as profit motive.	These items in BOP refer to the transactions which are undertaken to cover deficit or surplus in autonomous transactions.

Answer 28

Precautions taken while estimating national by expenditure method

i. Expenditure on intermediate goods will not be included in the national income as it already included in the value of final expenditure. It if it is included again by mistake, it will lead to double counting of expenditures.

ii. Transfer payments are not included because such payments are not related with any productive activity and there is no value addition.

iii. Purchase of second-hand goods will not be included because such expenditures has already been included when they were originally purchased. Those goods do not affect the current flow of goods and services. Hence any commission on those goods is included as it is a payment made for productive service.

iv. Purchase and financial assets will not be included because those transactions do not contribute to the current flow of goods and services.

v. Expenditure on own account production such self consumption and imputed value of owner occupied houses will be included in the estimation of national income since these are productive services.

OR

i. Profit earned by foreign companies is included in the estimation of domestic income as they are within the domestic territory of the country.

ii. Salaries of Indian working in Russian embassy in India are not included in the estimation of domestic income because the Russian embassy is not part of the domestic territory of India.

iii. Profit earned by a branch of State Bank of India is not included in the estimation of domestic income because it is located in Japan and is not part of the domestic territory of India.

Answer 29

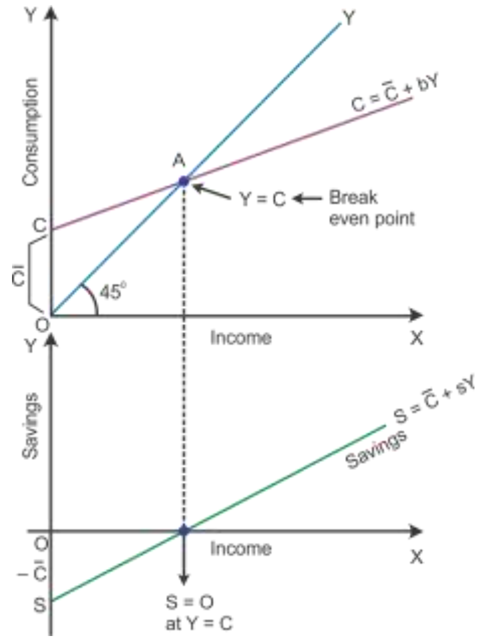
National Income = Compensation of employees + Rent + Interest + Profit + Mixed income of self employed - Net factor income to abroad
National Income = 2,000 + 400 + 500 + 900 +7,000 – 50
∴ National Income = ₹10,750

Net National Disposable Income = National income + Net indirect taxes – Net current transfers to abroad
Net National Disposable Income = 10,750 + 300 – 30
∴ Net National Disposable Income = ₹11,020

Answer 30

Deriving saving curve form consumption curve:

In the diagram, the consumption curve is given as $\overline{C}+bY$, where $\overline{C}$ represents the autonomous consumption, Y is income and b is the rate at which C increases corresponding to an increase in Y. The aggregate supply curve is the 45° line. Consumption is equal to income at Point E.



Derivation of saving function from consumption function:

—$\overline{C}$ is the saving function where negative savings are equal to autonomous consumption at Y = 0. This is shown on the negative axis in the lower panel at Point S. Here, all the income is spent on consumption expenditure. Hence, there is no saving which is shown as the breakeven point. After this point, S and Y are joined to have a straight line sloping curve.