Aggregate D & C - R & U - Very Short (Info & Con)

Q.1. What is aggregate demand?

Ans. Aggregate demand refers to planned expenditure on the domestically produced goods and services during the period of an accounting year.

AD = C + I + G + X – M

Q.2. How is AD estimated in an economy?

Ans. AD is estimated as the sum total of consumption expenditure and investment expenditure that the people wish to make (during the period of an accounting year) corresponding to different levels of income in the economy.

Q.3. What are the components of AD in an open economy?

Ans. AD = C + I + G + (X – M)(Here, C = Household consumption expenditure; I = Private investment expenditure;G = Government expenditure; X – M = Net exports.)

Q.4. Define AD schedule.

Ans. AD schedule is a table showing AD corresponding to different levels of income in the economy.

Q.5. What is AD curve?

Ans. AD curve is diagrammatic presentation of AD schedule, showing AD corresponding to different levels of Y (income) in the economy.

ED, DD & Corr. - Reason-Based (Comp. of Sub)

Q.1. In the situation of underemployment equilibrium, there is no unutilised capacity in the economy.

Ans. False. Underemployment equilibrium refers to that situation in the economy when AS = AD but without fuller utilisation of resources. Accordingly, there is unutilised capacity or excess capacity in the economy.

Q.2. Full employment implies there is zero unemployment in the economy.

Ans. False. Full employment does not imply that there is zero unemployment in the economy. Some people may not be willing to work at all, or not willing to work at the existing wage rate. Also, some natural rate of unemployment always exists in the economy.

Q.3. The economy fails to create enough jobs under involuntary unemployment.

Ans. True. Involuntary unemployment occurs when some people are not getting work, even when they are willing to work at the existing wage rate. In such a situation, the economy fails to create enough jobs because planned output is lower than the full employment level of output. This may be owing to the lack of aggregate demand.

Q.4. The problem of unemployment means the problem of voluntary unemployment.

Ans. False. The problem of unemployment means the problem of involuntary unemployment. It refers to those people who are able to work and are willing to work at the existing wage rate, but are not getting work.

Q.5. In a situation of deficient demand, there is underemployment equilibrium in the economy.

Ans. True. Because owing to deficient AD, equilibrium between desired AD and desired AS is struck at a lower level of GDP, lower than full employment in the economy. This is a situation of underemployment equilibrium.

Q.6. Under deflationary gap, voluntary unemployment occurs in the economy.

Ans. False. Under deflationary gap, involuntary unemployment occurs in the economy.

Q.7. Excess demand refers to the situation when AD > AS, corresponding to underemployment in the economy.

Ans. False. Excess demand refers to the situation when aggregate demand (AD) is in excess of aggregate supply (AS) corresponding to full employment in the economy.

Q.8. Excess demand raises the market value of the output.

Ans. True. Excess demand raises the market value of the output. Because in a situation of excess demand, output level remaining constant, higher demand (higher than the supply) leads to a rise in the general price level. Implying a situation when market value of the output increases in the economy.

Q.9. Price and output increase in a situation of inflationary gap.

Ans. False. Inflationary gap is the excess of AD over and above its level required to maintain full employment equilibrium in the economy. Inflationary gap generates extra pressure on the existing flow of goods and services at the level of full employment. Accordingly, prices tend to rise but output will not increase. Output remains constant corresponding to full employment level in the economy.

Q.10. Fiscal policy focuses on economic stability and economic growth.

Ans. True. Fiscal policy focuses on economic stability and economic growth. Stability is achieved by correcting the situations of excess demand (inflationary gap) and deficient demand (deflationary gap). Growth is achieved by way of lower taxation and higher subsidies to the producers.

Q.11. Excess demand can be corrected by increasing the government expenditure.

Ans. False. Excess demand can be corrected by reducing the government expenditure. A reduction in government expenditure (particularly) non-development expenditure like on defence, law & order and subsides will cause an overcall cut in aggregate demand. So that excess aggregate demand is corrected.

Q.12. Central bank buys government securities in the open market to correct the situation of inflationary gap.

Ans. False. Central bank sells government securities in the open market to correct the situation of inflationary gap. It is by selling the securities that the bank soaks liquidity from the market which is expected to correct the inflationary gap.

Q.13. Repo rate is reduced to correct the situation of deficient demand.

Ans. True. To correct the situation of deficient demand, repo rate is reduced. As a follow-up action, the commercial banks lower the market rate of interest (the rate at which the commercial banks lend money to the consumers and the investors). This increases demand for credit. Consequently, consumption expenditure and investment expenditure are increased. Implying a expansion in aggregate demand, as required to correct deficient demand.

Q.14. SLR is increased to correct the situation of deflationary gap.

Ans. False. SLR is decreased to correct the situation of deflationary gap. Lower SLR increases credit creation capacity of the commercial banks. Because a cut in the SLR raises cash balances with the commercial banks. Accordingly, availability of credit increases in the capital market. This increases aggregate demand and deflationary gap is corrected.

ED, DD & Corr. - HOTS & Applications

Q.1. What does MPC refer to in a diagram showing consumption function or consumption line?

Ans. In a diagram showing consumption function or consumption line, MPC refers to the slope of consumption line.

Q.2. Does an excess of AD over AS always imply a situation of inflationary gap?

Ans. No, excess of AD over AS does not always imply a situation of inflationary gap. Inflationary gap occurs only when AD is more than AS corresponding to the full employment level of output.

Q.3. Find saving function when consumption function is gives as: C = 1,000 + 0.6Y.

Ans. We know, saving function is

$$S = -\overline{C} + (1 - MPC)Y$$

So that,

$$S = -1{,}000 + (1 - 0.6)Y$$
$$= -1{,}000 + 0.4Y$$

Q.4. What happens if AD > AS prior to the full employment level of output?

Ans. Excess of AD over AS prior to the full employment level of output refers to the state of disequilibrium in the economy. AD being greater than AS, producers have to cater to demand out of their existing stock of goods. Implying that the desired level of stocks will decrease, inducing greater production and therefore, increase in AS. Increase in AS will continue till the equilibrium is struck between AD and AS.

Q.5. Write an equation of equilibrium level of income. Spell out C-function in this equation.

Ans.

Equation showing equilibrium level of income:

$Y = C + I$

When C-function is described, the equilibrium equation becomes as under:

$Y = \bar{C} + bY + I$

Here, Y= Equilibrium level of income.

$\bar{C}$ = Constant consumption or consumption level when Y = 0.

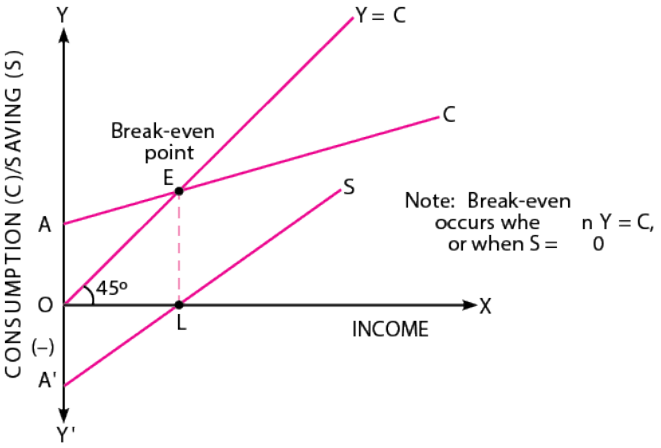
b = Marginal propensity to consume.

Y= Level of income.

I = Level of investment.

Q.6. Draw consumption curve and saving curve in a single diagram and mark the 'break-even point'.

Ans.



In **Fig. 1**, C is the consumption curve and S is the saving curve. OA is the minimum consumption when income level is zero and OA' is negative saving when income is zero. At point E, consumption is equal to income and saving is equal to zero. This is called the break-even point.

Q.7. In an economy, an increase in investment leads to 3-time increase in national income. Calculate marginal propensity to consume.

Ans. Increase in income = 3-time the increase in investment

Or, $\Delta Y = 3\Delta I$

Or, $\frac{\Delta Y}{\Delta I} = 3$

Thus, Multiplier (K) = 3 $\left(K = \frac{\Delta Y}{\Delta I}\right)$

We know,

$$K = \frac{1}{1 - MPC}$$

$\Rightarrow$ $$3 = \frac{1}{1 - MPC}$$

$\Rightarrow$ $3(1 - MPC) = 1$

$\Rightarrow$ $$1 - MPC = \frac{1}{3}$$

$\Rightarrow$ 1 – MPC = 0.33$\Rightarrow$ MPC = 1 – 0.33 = 0.6 7Marginal propensity to consume = 0.67.

Q.8. In an economy, an increase in investment leads to increase in national income which is three times more than the increase in investment. Calculate marginal propensity to consume.

Ans. Increase in income = 3 times more than the increase in investment + Increase in investment

Or, $\Delta Y = 3\Delta I + \Delta I$

Or, $\Delta Y = 4\Delta I$

Or, $4 = \frac{\Delta Y}{\Delta I}$

Thus, Multiplier (K) = 4 $\left(K = \frac{\Delta Y}{\Delta I}\right)$

We know,

$$K = \frac{1}{1 - MPC}$$

$\Rightarrow$ $$4 = \frac{1}{1 - MPC}$$

$\Rightarrow$ $4(1 - MPC) = 1$

$\Rightarrow$ $$1 - MPC = \frac{1}{4}$$

$\Rightarrow$ $1 - MPC = 0.25$

$\Rightarrow$ $MPC = 1 - 0.25 = 0.75$

Marginal propensity to consume = 0.75.[**Note:** In Q. 8, income (Y) increases 3 times MORE than the increase in investment (I). This implies that increase in Y = ΔI + 3ΔI.In Q. 7, income (Y) increases 3-time the increase in investment (I). This means that Y increases by a factor of 3. So that ΔY = 3ΔI.]

Q.9. In an economy the autonomous investment is 360 and the marginal propensity to save is 0.3. If the equilibrium level of income is 1,400, then the autonomous consumption is 40. True or False? Justify your answer.

Ans. No, it is not true.

Given, autonomous investment = 360

Marginal propensity to save (MPS) = 0.3

Equilibrium level of income (Y) = 1,400

Marginal propensity to consume (MPC) = 1 – MPS

$= 1 - 0.3 = 0.7$

At the equilibrium level,

$$Y = C + I$$

Or, $$Y = \overline{C} + MPC\,(Y) + \overline{I}$$

$\Rightarrow$ $$1{,}400 = \overline{C} + 0.7\,(1{,}400) + 360$$

$\Rightarrow$ $$1{,}400 = \overline{C} + 980 + 360$$

$\Rightarrow$ $$1{,}400 = \overline{C} + 1{,}340$$

$\Rightarrow$ $$\overline{C} = 1{,}400 - 1{,}340$$

$\Rightarrow$ $$\overline{C} = 60$$

Thus, it is proved that the given statement is false. The autonomous consumption = 60.

Q.10. If in an economy saving function is given by S = (–) 50 + 0.2Y and Y = ₹ 2,000 crore; consumption expenditure for the economy would be ₹ 1,650 crore and the autonomous investment is ₹ 50 crore and the marginal propensity to consume is 0.8. True or False? Justify your answer with proper calculations.

[*CBSE Sample Paper 2016*]

Ans. No, it is not true for all the values.

Given, saving function, S = (–) 50 + 0.2Y

Equilibrium level of income (Y) = 2,000

Marginal propensity to save (MPS) = 0.2

When Y = 2,000, S = (–) 50 + 0.2 (2,000)

S = (–) 50 + 400

S = 350

At the equilibrium level, S = I

$\therefore$ I= 350 ($\because$ S = 350)

We know that, Y = C + S

Or, C = Y – S

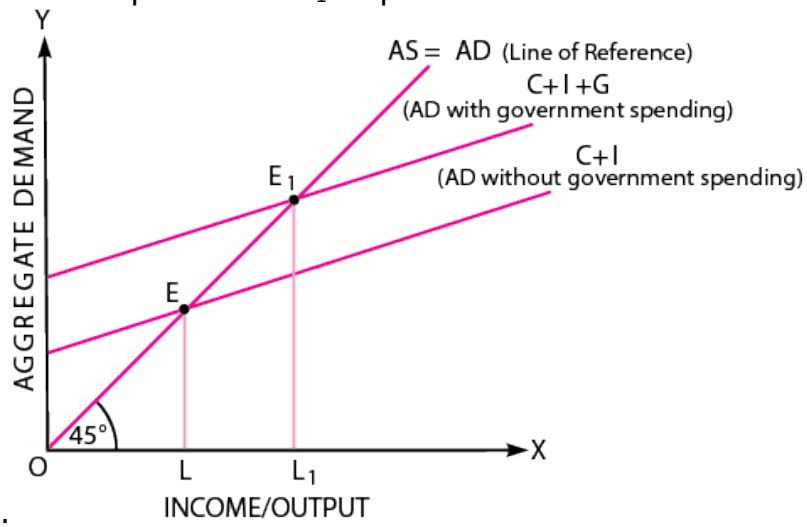
= 2,000 – 350

= 1,650

Marginal propensity to consume (MPC) = 1 – MPS
= 1 – 0.2
= 0.8
Consumption expenditure = ₹ 1,650 crore.
Autonomous investment = ₹ 350 crore.
Marginal propensity to consume = 0.8.

Q.11. Show diagrammatically, the effect on equilibrium level of income/output, of government spending.

Ans. Fig. 2 illustrates how government spending affects equilibrium level of income. It is assumed that like investment expenditure, government spending is also autonomous of the level of income. So that, government spending is indicated by a straight line above and parallel to the existing AD function.Thus, C + I + G is above and parallel to the C + I line because G is assumed to be autonomous of income. Owing to upward shift in AD, equilibrium shifts from point E to E_1. Equilibrium level of income increases from OL to OL_1.



Government Spending Multiplier

It is the ratio between increase in income (ΔY) and increase in government spending (ΔG).

$$K_g = \frac{\Delta Y}{\Delta G} = \frac{1}{1-b} = \frac{1}{1-MPC}$$, where K_g = Government spending multiplier.

Q.12. If MPC = 0.5, and increase in investment is ™ 1,000, how much is the total increase in income. Explain the process how income changes as a consequence of change in investment.

Ans.

We know,

$$K\ (\text{Multiplier}) = \frac{1}{1-\text{MPC}}$$

$$= \frac{1}{1-0.5} = \frac{1}{0.5} = 2$$

Increase in income (ΔY) is K times the increase in investment (ΔI).

So that, $\Delta Y = K \cdot \Delta I$

Or, $\Delta Y = 2 \times 1{,}000 = ₹\ 2{,}000$

Process of Change in Income (also called Multiplier Process)As a consequence of ΔI = ₹ 1,000, increase in income occurs in various rounds as under:

Round 1	$\Delta Y = 1(1{,}000) = 1{,}000$	Because expenditure of ₹ 1,000 becomes income of the households.
Round 2	$\Delta Y = 0.5(1{,}000) = 500$	Because out of ₹ 1,000, households spend 0.5 (1,000) = 500
Round 3	$DY = 0.5^2\ (1{,}000) = 250$	Because out of 500,households spend 0.5 (500) = $(0.5)^2$1,000 = 250
Round 4	$DY = 0.5^3\ (1{,}000) = 125$	Because out of 250,households spend 0.5 (250) = $(0.5)^3$1,000 = 125.

and so on ..... .The process of income generation continues in an infinite geometric progression, which can be expressed as under:

$$\begin{aligned}
\Delta Y &= 1 \times 1{,}000 && \text{round 1}\\
&+ (0.5) \times 1{,}000 && \text{round 2}\\
&+ (0.5)^2 \times 1{,}000 && \text{round 3}\\
&+ (0.5)^3 \times 1{,}000 && \text{round 4}\\
&+ (0.5)^4 \times 1{,}000 && \text{round 5}\\
&+ \ldots\ldots\ldots\ldots\\
&= \frac{1}{1-\text{MPC}} \times 1{,}000\\
&= \frac{1}{1-0.5} \times 1{,}000\\
&= \frac{1}{0.5} \times 1{,}000\\
&= 2 \times 1{,}000\\
&= ₹\ 2{,}000
\end{aligned}$$

Aggregate D & C - Reason-Based (Comp. of Sub)

Q.1. In macroeconomics, aggregate demand refers to planned purchase of goods and services during a year.

Ans. True. AD is the sum total of expenditure that the people plan or desire to incur on the purchase of goods and services produced in the economy during an accounting year.

Q.2. AD is measured not as the sum total of goods but as the sum total of planned expenditure on the goods during an accounting year.

Ans. True. Because, it is not possible to add up physical quantities of the goods and services planned to be purchased by the people. Accordingly, AD is measured in terms of planned expenditure on the goods and services during an accounting year.

Q.3. The government makes collective consumption expenditure in a three sector economy.

Ans. True. Collective consumption expenditure refers to public consumption expenditure or consumption expenditure on behalf of the society as a whole.

Q.4. Minimum level of expenditure is dependent of the level of income in the economy.

Ans. False. Minimum level of expenditure is independent of the level of income in the economy.

Q.5. AD curve (indicating aggregate expenditure at different levels of income) slopes downward from left to right.

Ans. False. AD curve (indicating aggregate expenditure at different levels of income) slopes upward from left to right. This is because expenditure is positively related to income.

Q.6. Exports in an open economy indicate demand for foreign goods.

Ans. False. Exports in an open economy indicate demand for goods produced in the domestic economy.

Q.7. When exports = ₹ 40,000 and imports = ₹ 50,000, value of net exports will be equal to ₹ 10,000.

Ans. False. We know that,

Net exports = Exports – Imports

When exports = ₹ 40,000 and imports = ₹ 50,000

Net exports = ₹ 40,000 – ₹ 50,000

= (–) ₹ 10,000

Con Func & Sav - R & U - Very Short (Info & Con)

Q.1. What is the consumption function?

Ans. Consumption function refers to the functional relationship between consumption (C) and income (Y).

$$C = \bar{C} + bY$$

Q.2. Define autonomous consumption.

Ans. Autonomous consumption refers to minimum level of consumption, even when income is zero. It is indicated by C in the consumption function:

$$C = \bar{C} + bY$$

Q.3. What is a linear consumption function?

Ans. Linear consumption function is a straight line consumption function in which MPC remains constant.

Q.4. What is meant by propensity to consume?

Ans. Propensity to consume refers to the proportion of income used as consumption expenditure. It is measured as the ratio between consumption and income.

Q.5. What is meant by average propensity to consume?

Ans. Average propensity to consume is the ratio of aggregate consumption expenditure to aggregate income.

$$APC = \frac{C}{Y}$$

Q.6. Define marginal propensity to consume.

Ans. Marginal propensity to consume is the ratio of change in consumption to change in income.

$$MPC = \frac{\Delta C}{\Delta Y}$$

Q.7. What determines the level of household consumption demand in an economy?

Ans. The level of household consumption demand is determined by the income level of the household.

Q.8. What is the saving function?

Ans. Saving function refers to the functional relationship between saving (S) and income (Y).

$$S = -\bar{C} + (1 - b)Y$$

Note:

$-\bar{C}$ refers to negative saving corresponding to $\bar{C}$ (consumption when $Y = 0$). It indicates the value of S when $Y = 0$. It is '–' because C is positive when $Y = 0$.

$(1 - b)$ refers to MPS (marginal propensity to save).

Q.9. What is meant by propensity to save?

Ans. Propensity to save refers to the proportion of income which is kept as saving. It is expressed as the ratio between saving and income.

Q.10. What is meant by average propensity to save?

Ans. Average propensity to save is the ratio of aggregate saving to aggregate income.

$$APS = \frac{S}{Y}$$

Q.11. Define marginal propensity to save.

Ans. Marginal propensity to save is the ratio of change in saving to change in income.

$$MPS = \frac{\Delta S}{\Delta Y}$$

Q.12. What is the relationship between average propensity to consume and average propensity to save?

Ans. Aggregate of average propensity to consume and average propensity to save is equal to one or APC + APS = 1.

Q.13. What is the relationship between marginal propensity to consume and marginal propensity to save?

Ans. Aggregate of marginal propensity to consume and marginal propensity to save is equal to one or MPC + MPS = 1.

Q.14. What is the value of marginal propensity to consume when marginal propensity to save is zero?

Ans. The value of marginal propensity to consume will be 1 (one).

Q.15. What can be the maximum value of marginal propensity to save?

Ans. The maximum value of marginal propensity to save can be 1 (one).

Con Func & Sav - Reason-Based (Comp. of Sub)

Q.1. When income is zero, consumption is also zero.

Ans. False. When income is zero, consumption is not zero. Because, there is always some minimum level of consumption in the economy even when income = 0 (zero).

Q.2. Consumption depends on investment in the economy.

Ans. False. Consumption (C) depends on income (Y) in the economy. Higher level of Y often leads to higher level of C.

Q.3. When consumption function is: C = 50 +0.6Y, C-line starts from the point of origin

Ans. False. When consumption function is: C = 50 +0.6Y, C-line starts from the Y-axis because 50 in the equation points to minimum level of consumption even when income (Y) = 0.

Q.4. When consumption function is: C = 40 +0.7Y, saving will be equal to –40 when Y = 0.

Ans.

True. When Y = 0, autonomous consumption $(\bar{C})$ is 40. At zero level of Y, saving $(\bar{S})$ is equal to the negative expression of $\bar{C}$. Hence, when $\bar{C}$ = 40, $\bar{S}$ will be equal to –40.

Q.5. Saving function would be linear in case MPS is found to be constant.

Ans. True. Saving function would be linear in case MPS is constant. This is because a linear saving function is a straight line saving function. The slope of a straight line is constant. And the slope is indicated by MPS. Constant MPS implies constant slope and therefore, a straight line linear saving function.

Q.6. MPC is the ratio between total consumption (C) and total income (Y).

Ans. False. MPC is the ratio between change in total consumption (DC) and change in total income (DY).

$$MPC = \frac{\Delta C}{\Delta Y}$$

Q.7. Value of average propensity to consume can be one.

Ans.

True. Value of average propensity to consume (APC) can be one. It happens when consumption is equal to income. Thus, $\frac{C}{Y} = 1$ when C = Y.

Q.8. MPC + MPS = 1.

Ans.

True. We know that,

$$MPC = \frac{\Delta C}{\Delta Y} \text{ and } MPS = \frac{\Delta S}{\Delta Y}$$

$$MPC + MPS = \frac{\Delta C}{\Delta Y} + \frac{\Delta S}{\Delta Y}$$

$$= \frac{\Delta C + \Delta S}{\Delta Y}$$

$$= \frac{\Delta Y}{\Delta Y} \qquad (\because \Delta Y = \Delta C + \Delta S)$$

Or, $MPC + MPS = 1$

Q.9. The value of marginal propensity to consume can be greater than one.

Ans. False. The value of marginal propensity to consume cannot be greater than one. It is because change in consumption cannot be greater than change in income.

Q.10. The value of average propensity to save can be negative.

Ans. True. The value of average propensity to save (APS) can be negative. It happens when: Consumption > IncomeOr, when: APC >1.

Q.11. APS can be greater than one.

Ans. False. Because APS is the ratio between total saving and total income $(APS = \frac{S}{Y})$. And, total saving cannot be greater than total income during an accounting year. Saving is just a part of income. Putting differently, we can say that if APS > 1 then S must be greater than Y, in which case C must be negative. This can never ever happen.

Q.12. MPC or MPS can be negative.

Ans. False. Neither MPC nor MPS can ever be negative. This is because MPC is the ratio between additional consumption (DC) and additional income (DY). Likewise, MPS is the ratio between additional saving (DS) and additional income (DY).The ratio $\frac{\Delta C}{\Delta Y}$ refers to slope of C-function which is always positive (because of positive relationship between C and Y). Likewise, the ratio $\frac{\Delta S}{\Delta Y}$ refers to slope of S-function which is always positive (because of positive relationship between S and Y).

Q.13. The value of marginal propensity to save can never be negative.

Ans. True. Marginal propensity to save is the ratio between additional saving and additional income which is always positive because of positive relationship between saving and income.

Q.14. Average propensity to save is always greater than zero.

Ans. False. Average propensity to save is not always greater than zero. It can be negative in situations when saving is negative or when consumption is greater than income.

Q.15. When the value of average propensity to save is negative, the value of marginal propensity to save will also be negative.

Ans. False. The value of average propensity to save (APS) is negative when consumption is greater than income but this does not mean that marginal propensity to save (MPS) will also be negative. In fact, MPS is never negative. Because it is the ratio between ΔS and ΔY and ΔS can never be negative, as a component of ΔY.

Eq O/P/ Eq GDP - R & U - Very Short (Info & Con)

Q.1. What is aggregate supply?

Ans. Aggregate supply refers to the planned production of goods and services in an economy during an accounting year.

Q.2. What is meant by equilibrium?

Ans. Equilibrium is a situation when what the producers wish to produce (AS) is exactly equal to what the people wish to buy (AD) during an accounting year.

Q.3. What is equilibrium income?

Ans. Equilibrium income is that level of income where AS = AD or when S = I.

Q.4. Can there be excess stocks in a state of equilibrium in the economy?

Ans. No. There cannot be excess stocks in the economy in a state of equilibrium.

Q.5. Are inventory stocks zero when AS = AD?

Ans. No. Only undesired inventory stocks are zero when AS = AD. Desired inventory stocks are maintained.

Q.6. What happens to undesired inventory stocks when AS > AD?

Ans. Undesired inventory stocks tend to pile up when AS > AD.

Q.7. What are ‘desired stocks’ with the producers?

Ans. Desired stocks refer to that level of stock where AS = AD and the producers are in a state of equilibrium.

Q.8. What are ‘actual stocks’ with the producers?

Ans. Actual stocks include both desired as well as undesired stock.

Q.9. When are actual stocks greater than the desired stocks?

Ans. Actual stocks are greater than the desired stocks when aggregate demand falls short of the expectations of the producers, and some output remains unsold.

Q.10. When are actual stocks less than the desired stocks?

Ans. Actual stocks are less than the desired stocks when aggregate supply falls short of aggregate demand, and the producers suffer a loss due to unfulfilled demand.

Q.11. What is meant by ex-ante aggregate demand?

Ans. Ex-ante aggregate demand refers to desired or planned expenditure of the people in the economy during an accounting year.

Q.12. What is meant by ex-ante aggregate supply?

Ans. Ex-ante aggregate supply refers to the desired level of output in the economy during an accounting year. It is the level of GDP that the producers wish to produce (or plan to produce) during an accounting year.

Q.13. What is meant by ex-ante saving?

Ans. Ex-ante saving refers to desired saving (or planned saving) at different levels of income in the economy.

Q.14. What is meant by ex-post saving?

Ans. Ex-post saving refers to actual saving in the economy during the period of one year.

Eq O/P/ Eq GDP - Reason-Based (Comp. of Sub)

Q.1. In the Keynesian theory, technology changes as the level of output changes.

Ans. False. In the Keynesian theory, technology is assumed to remain constant.

Q.2. Equilibrium GDP refers to that level of GDP where AD = AS but S > I.

Ans. False. Equilibrium GDP refers to that level of GDP where AD = AS as well as S = I.

Q.3. When AD = AS, producers suffer the burden of unwanted supplies.

Ans. False. When AD = AS, the producers do not suffer the burden of unwanted supplies or unsold stocks. Because in such a situation, actual stocks with the producers = desired stocks with the producers.

Q.4. Ex-ante saving and ex-ante investment are equal at the point of equilibrium.

Ans. True. Ex-ante investment is the investment expenditure which is intended to be made in the economy during the period of one year. Ex-ante saving is the saving which people intend to make in the economy during the period of one year. Equilibrium is struck when ex-ante saving (S) = ex-ante investment (I).

Q.5. There are no exports in a closed economy.

Ans. True. A closed economy is the one which has no economic relations with the rest of the world. Accordingly, there are no exports in this economy.

Q.6. AS is perfectly elastic owing to the excess supply in the economy.

Ans. False. AS is perfectly elastic owing to the existence of excess capacity in the economy.

Q.7. AS increases proportionate to the increase in AD so long as there is excess capacity in the economy.

Ans. True. AS increases proportionate to the increase in AD so long as there is excess capacity in the economy. Because, excess capacity arises because

of the deficiency of demand. So that, as demand increases, supply increases proportionately.

Q.8. An economy can attain the maximum equilibrium GDP level even when excess capacity is not fully exhausted.

Ans. False. An economy can attain the maximum equilibrium GDP level only when excess capacity is fully exhausted or the level when there is full employment of resources in the economy.

Q.9. When AS < AD, AS adjusts itself to AD.

Ans. True. When AS < AD, flow of goods and services in the economy tends to be less than their demand. The existing stocks of the producers would be sold out and the producers would suffer the loss of unfulfilled demand. To rebuild the desired stocks and avoid the loss of unfulfilled demand, the producers would plan greater production. AS would increase to become equal to AD. This is how AS converges with AD.

Q.10. When S > I, level of income and employment tends to shrink.

Ans. True. In case S > I, it implies a situation when a fall in expenditure through 'S' is more than the rise in expenditure through 'I'. Accordingly, aggregate expenditure in the economy would be less than what is needed to buy the planned output. Stocks of the producers would be in excess of the desired stocks. Planned output for the subsequent year will fall. Level of income and employment will tend to shrink till the point when S = I.

Q.11. In an economy, the equilibrium level of income is 800. The autonomous consumption is 70 and the investment expenditure is 250. Marginal propensity to consume in this economy will be 0.5.

Ans. False. Marginal propensity to consume in this economy will be 0.6.

Given, equilibrium level of income (Y) = 800

Autonomous consumption ($\overline{C}$) = 70

Investment expenditure (I) = 250

At the equilibrium level,

$$Y = C + I$$

Or, $$Y = \overline{C} + MPC\ (Y) + I$$

$\Rightarrow$ $$800 = 70 + MPC\ (800) + 250$$

$\Rightarrow$ $$800 = 320 + 800\ (MPC)$$

$\Rightarrow$ $$800\ (MPC) = 800 - 320$$

$\Rightarrow$ $$800\ (MPC) = 480$$

$$\Rightarrow \quad \text{MPC} = \frac{480}{800}$$

$$\Rightarrow \quad \text{MPC} = 0.6$$

Therefore, marginal propensity to consume in this economy will be 0.6.

Q.12. In an economy, the investment expenditure is 600 and the consumption function is: C = 90 + 0.7Y. The economy is in equilibrium at an income level 2,000.

Ans. False. The economy is in equilibrium at an income level of 2,300.

Given, $C = 90 + 0.7Y$

Investment expenditure (I) = 600

At the equilibrium level,

$$Y = C + I$$

$$\Rightarrow \quad Y = 90 + 0.7Y + 600$$

$$\Rightarrow \quad Y = 690 + 0.7Y$$

$$\Rightarrow \quad Y - 0.7Y = 690$$

$$\Rightarrow \quad 0.3Y = 690$$

$$\therefore \quad Y = \frac{690}{0.3} = 2{,}300$$

Thus, the economy is not in equilibrium. Because, the equilibrium level of income is 2,300 which is greater than the given income level of 2,000.

Con of In & Mul - R & U - Very Short (Info & Con)

Q.1. What is investment?

Ans. Investment is an addition to capital stock of the producers. It is also called capital formation.

Q.2. What is ex-ante investment?

Ans. Ex-ante investment refers to desired (or planned) investment corresponding to different income levels in the economy.

Q.3. Define ex-post investment.

Ans. Ex-post investment refers to actual investment in the economy during the period of one year.

Q.4. What is autonomous investment?

Ans. Autonomous investment refers to investment which is independent of the level of income in the economy.

Q.5. Define induced investment.

Ans. Induced investment refers to that investment which changes as the rate of interest changes or as the level of income changes in the economy.

Q.6. What is demand for private investment?

Ans. Demand for private investment refers to planned investment expenditure by the private sector in the economy.

Q.7. What are the components of demand for private investment?

Ans. Components of demand for private investment are: (i) desired or planned private fixed investment (like purchase of machinery), and (ii) desired increase in inventory stocks of the firms in private sector.

Q.8. If in an economy investment is greater than saving, what is the effect on the national income?

Ans. If investment is greater than saving, the level of income will rise so long as full employment is not reached.

Q.9. What happens to aggregate income in an economy in which intended saving exceeds intended investment?

Ans. If intended saving is greater than intended investment, aggregate income will tend to fall.

Q.10. What is investment multiplier?

Ans. Investment multiplier is the ratio of a change in income to a given change in investment.

Q.11. Give a formula of multiplier.

Ans.

$$\text{Multiplier (K)} = \frac{\Delta Y}{\Delta I} = \frac{1}{1 - MPC} = \frac{1}{MPS}.$$

(Here, DY = Change in income; DI = Change in investment; MPC = Marginal propensity to consume; MPS = Marginal propensity to save.)

Q.12. What is the minimum value of investment multiplier?

Ans. The minimum value of investment multiplier is equal to ONE.

Q.13. What is the relationship between marginal propensity to save and multiplier?

Ans. There is an inverse relation between multiplier and marginal propensity to save (MPS). Higher is the value of MPS, lower is the value of multiplier and vice versa

$$\left[\text{Multiplier} = \frac{1}{MPS}\right].$$

Con of In & Mul - Reason-Based (Comp. of Sub)

Q.1. Autonomous investment increases with increase in the level of income.

Ans. False. Because, autonomous investment does not change with any change in the level of income. It remains constant, no matter what the level of income is in the economy.

Q.2. Ex-ante investment is the desired investment.

Ans. True. Ex-ante investment is the desired investment or planned investment. This is the investment expenditure which is intended to be made in the economy during the period of an accounting year.

Q.3. Saving and investment are always equal.

Ans. False. Saving (S) and investment (I) can be realised (ex-post) or planned (ex-ante). Planned S and planned I are equal only at equilibrium level. Realised S and realised I are always equal.

Q.4. There is an inverse relationship between the value of marginal propensity to save and investment multiplier.

Ans. True. Marginal propensity to save (MPS) and multiplier are negatively related. Higher the MPS, lower the multiplier and lower the MPS, higher the multiplier, as $K = \frac{1}{MPS}$. Saving is a leakage in the circular flow of income. Greater the saving, greater the leakage and lower the value of investment multiplier.

Q.5.

$$\textbf{Value of multiplier} = \frac{1}{1 - MPS}.$$

Ans.

False. Value of multiplier (K) $= \frac{1}{1 - MPC} = \frac{1}{MPS}$. The proof is as under:

We know that, $$K = \frac{\Delta Y}{\Delta I} \quad ...(i)$$

We also know that, $$\Delta Y = \Delta C + \Delta I$$

Or, $$\Delta I = \Delta Y - \Delta C$$

Substituting the value of ΔI in equation (i), we get

$$K = \frac{\Delta Y}{\Delta Y - \Delta C}$$

Dividing right hand side of the equation by ΔY,

$$K = \frac{\frac{\Delta Y}{\Delta Y}}{\frac{\Delta Y}{\Delta Y} - \frac{\Delta C}{\Delta Y}} = \frac{1}{1 - \frac{\Delta C}{\Delta Y}}$$

$$= \frac{1}{1 - MPC} = \frac{1}{MPS} \qquad (\because MPS = 1 - MPC)$$

Hence verified.

Q.6. When MPC = 0, the value of investment multiplier is also zero.

Ans. False. The value of investment multiplier (K) is 1, when MPC = 0.

We know, $$K = \frac{1}{1 - MPC}$$

When MPC = 0,

$$K = \frac{1}{1 - 0} = 1$$

Q.7. Value of multiplier will be infinity if entire additional income is converted into additional consumption.

Ans. True. Because, in such a situation, DC = DY (or change in consumption = change in income) or that

$$MPC = \frac{\Delta C}{\Delta Y} = 1$$

Accordingly, K (or multiplier) would be:

$$K = \frac{1}{1 - MPC} = \frac{1}{1 - 1} = \frac{1}{0} = \infty$$

The multiplier value would tend towards infinity.

Q.8. When marginal propensity to save is less than marginal propensity to consume, the value of investment multiplier will be greater than 5.

Ans. False. We know, MPC + MPS = 1. When MPS < MPC, the value of MPS can be anything less than 0.5 and greater than 0. Let us assume MPS = 0.4. The value of investment multiplier (K) in this case will be,

$$K = \frac{1}{1 - MPC} = \frac{1}{MPS}$$

$$= \frac{1}{0.4} = 2.5$$

Which is less than 5.

Similarly, when the value of MPS = 0.3, the value of K will be 3.33 which is less than 5 and when MPS = 0.2, K will be 5 which is also not greater than 5 but equal to 5.Hence, only when the value of MPS is less than 0.2 that the value of investment multiplier will be greater than 5.

Q.9. Value of investment multiplier varies between one and infinity.

Ans. True. Value of investment multiplier varies between one and infinity. The minimum value of investment multiplier is = 1, when MPC = 0. The maximum value of investment multiplier is = ∞, when MPC = 1.

In case MPC = 0,

$$K = \frac{1}{1-MPC}$$

$$= \frac{1}{1-0} = \frac{1}{1} = 1$$

In case MPC = 1,

$$K = \frac{1}{1-MPC}$$

$$= \frac{1}{1-1} = \frac{1}{0} = \infty$$

So that value of K (multiplier) always varies between 1 and ∞.

Q.10. When as a result of increase in income from 1,600 to 2,600, investment increases by 400. The value of MPC will be equal to 0.4.

Ans.

False. The value of MPC will be equal to 0.6.

Here, $\Delta Y = 2{,}600 - 1{,}600 = 1{,}000$ and $\Delta I = 400$

We know that,

$$K = \frac{\Delta Y}{\Delta I}$$

$\Rightarrow$

$$K = \frac{1{,}000}{400} = 2.5$$

We also know that,

$$K = \frac{1}{1-MPC}$$

Or,

$$1 - MPC = \frac{1}{K}$$

Or,

$$1 - MPC = \frac{1}{2.5}$$

Or,

$$1 - MPC = 0.4$$

Or,

$$MPC = 1 - 0.4 = 0.6$$

ED, DD & Corr. - R & U - Very Short (Info & Con)

Q.1. What is full employment equilibrium?

Ans. Full employment equilibrium refers to that situation in the economy when AS = AD along with fuller utilisation of resources.

Q.2. What is underemployment equilibrium?

Ans. Underemployment equilibrium refers to that situation in the economy when AS = AD but full employment is not achieved.

Q.3. Define full employment.

Ans. Full employment refers to a situation in which all those who are able to work and are willing to work at the existing wage rate get work.

Q.4. What is voluntary unemployment?

Ans. Voluntary unemployment is a situation in which a worker is not willing to work at the existing rate of wage.

Q.5. What is involuntary unemployment?

Ans. Involuntary unemployment is a situation in which a worker is willing to work at the existing rate of wage but does not get work.

Q.6. What is the natural rate of unemployment?

Ans. Natural rate of unemployment refers to the minimum rate of unemployment which always exists in the economy even when labour market is in a state of equilibrium.

Q.7. Define frictional unemployment.

Ans. Frictional unemployment is that unemployment which is associated with changing the jobs in a dynamic economy.

Q.8. Define structural unemployment.

Ans. Structural unemployment is that unemployment which is associated with structural changes in the economy, like change in technology.

Q.9. Does full employment mean zero unemployment?

Ans. Full employment does not mean a situation of zero unemployment. Natural rate of unemployment (minimum rate of unemployment) always exists in the economy.

Q.10. When does a situation of excess demand arise in an economy?

Ans. Excess demand arises when AD is in excess of AS corresponding to full employment in an economy.

Q.11. When does a situation of deficient demand arise in an economy?

Ans. Deficient demand arises when AD is short of AS corresponding to full employment in an economy.

Q.12. What is meant by inflationary gap?

Ans. Inflationary gap is the excess of aggregate demand over and above its level required to maintain full employment equilibrium in the economy.

Q.13. What is meant by deflationary gap?

Ans. Deflationary gap refers to a situation of deficiency of demand when aggregate demand is short of aggregate supply corresponding to full employment level.

Q.14. What do you mean by fiscal policy?

Ans. Fiscal policy is the revenue and expenditure policy of the government with a view to combat the situation of inflationary or deflationary gap in the economy.

Q.15. What do you mean by monetary policy?

Ans. Monetary policy refers to that policy which corrects the situations of excess and deficient demand by regulating interest rate and availability of credit in the economy.