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केन्द्रीय माध्यमिक शिक्षा बोर्ड, दिल्ली
नियर स्कूल सर्टिफिकेट परीक्षा (कक्षा बारहवीं)
परीक्षार्थी प्रवेश–पत्र के अनुसार भरें

ject : ECONOMICS

Subject Code : 030

दिन एवं तिथि
ate of the Examination : Thursday, 31/3/2016

ा: माध्यम
of answering the paper : English

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No. as written on
the question paper :

Code Number	Set Number
58/1	● ② ③ ④

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ारिक अक्षमता से प्रभावित हो तो संबंधित वर्ग में ✓ का निशान लगाएँ।
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☐ B ☐ D ☐ H ☐ S ☐ C ☐ A

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े एक अक्षर लिखें। नाम के प्रत्येक भाग के बीच एक खाली डिब्बा छोड़ें। यदि परीक्षार्थी का
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Section A:

1. The difference between Average Variable Cost (AVC) and Average Total Cost (ATC) is the Average Fixed Cost (AFC)

[redacted]

Since Total fixed Cost (TFC) = 0

$\Rightarrow$ $AFC = \frac{TFC}{Q} = 0$

Since AFC is 0, the AVC = ATC

Hence, the Average Variable cost is equal to Average Total Co

2. [redacted] Equal to Average Revenue

3. [redacted] 'Change in demand' takes place when some determinant of dema of a commodity, other than its own price changes.

For example, income of the consumers, price of related good etc.

It results in shift of the demand curve.

4. (c) Both monopolistic competition and oligopoly

[redacted]

5. (a) Perfect competition

[redacted]

6. The consumer is in equilibrium when:-

[redacted]

(i) ~~MUx~~ ~~MUy~~ $\frac{MU_x}{P_x} = \frac{MU_y}{P_y} = MU_m$ of last rupee spent on both commodities

(ii) Law of Diminishing Marginal Utility is operational.

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In the given case,

$\frac{MU_x}{P_x} = \frac{3}{4}$

whereas $\frac{MU_y}{P_y} = \frac{4}{4} = 1.$

$\therefore \frac{MU_x}{P_x} < \frac{MU_y}{P_y}$

- The consumer is not in equilibrium as the Marginal utility of the last rupee spent on good Y is more than Marginal Utility of last rupee spent on good X.

- Therefore, the consumer will transfer funds from good X to good Y and increase the consumption of good Y.

- As consumption of good Y increases, MUy falls (due to law of diminishing marginal utilit

- This continues till $\frac{MU_x}{P_x} = \frac{MU_y}{P_y}$

Conclusion :- The consumer will increase the consumption of good Y till the utility derived from the last rupee spent on both commodities is the same and he attains equilibrium.

7. $$\text{Price Elasticity of demand } (E_p) = \frac{\text{\% change in Quantity Demanded}}{\text{\% change in Price}}$$

(a) $$E_p = \frac{\%\Delta \text{ in QD}}{10}$$

$$0 = \frac{\%\Delta \text{ in QD}}{10}$$

$$\Rightarrow \%\Delta \text{ in QD} = 0\%$$

01

Hence, the demand for the commodity will not change at all.

(b) $$E_p = \frac{\%\Delta \text{ in Q.D.}}{10}$$

$$(-)1 = \frac{\%\Delta \text{ in QD}}{10}$$

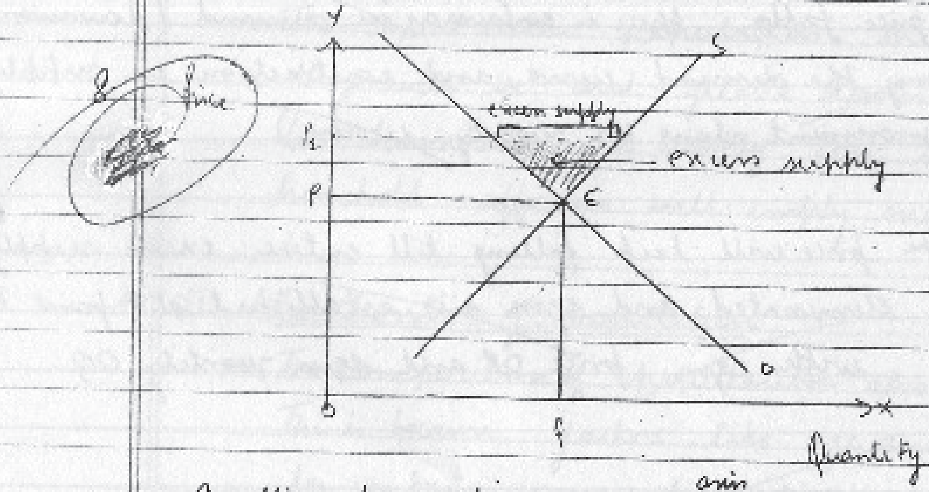
$$(-)10\% = \%\Delta \text{ in QD.}$$

The quantity demanded of the commodity will fall by 10% if the price rises by 10%.
(unitary elastic demand)

(c) $(-)2 = \frac{\% \Delta \text{ in } QD}{10}$

$(-)20 = \% \Delta \text{ in } QD$

The quantity demanded will fall by 20% if the price rises by 10%.


Q
price
Y
S
excess supply
P1
P
E
— excess supply
O
D
Q
X
Quantity

In the above diagram, X axis denotes quantity demanded/supplied and Y axis denotes the price.

The equilibrium point is E, with eqm. price OP and equilibrium quantity O

Suppose the prevailing market price is OP_1, above the eqm p

At this price, the quantity supplied is more than the quantity demanded. This will create a situation of excess supply.

This will result in competition among sellers, leading to a fall in price.

As price falls, there is expansion in demand (downward mov along the demand curve, and contraction in supply (down movement along the supply curve)

The price will keep falling till entire excess supply is eliminated and eqm. is established at point E, with eqm. price OP and eqm. quantity OQ.

9. Demand is the desire to buy a commodity, backed by ability and willingness to pay, at a particular price, during a given period of time. It is a flow variable.

Apart from factors affecting individual demand, there are factors that additionally affect market demand :-

(i) Number of households in the market.

The more is the population, the greater number of households there will be and greater demand for goods and services. Less households will imply less market demand and more households ~~affordable~~ will imply more market demand.

(ii) Composition of population

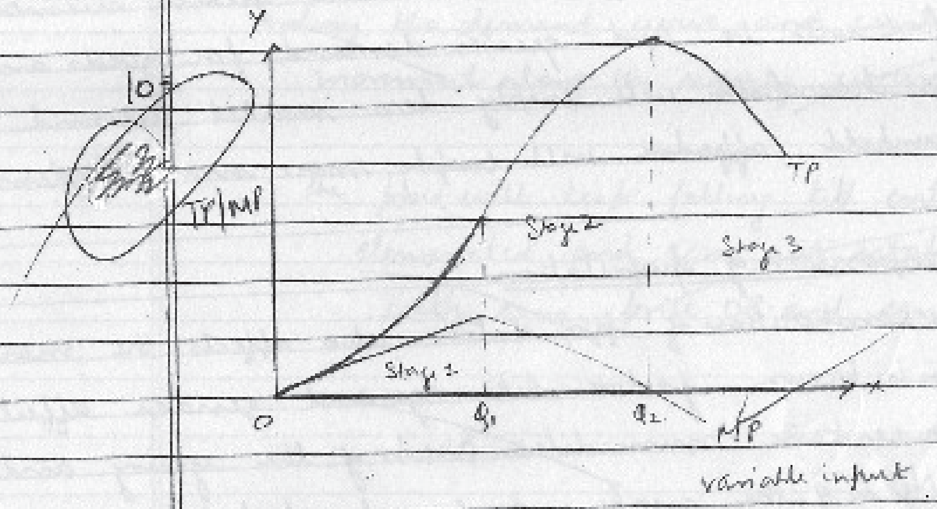
The composition of population also affects the market demand. This is because factors like age and gender affect demand for certain commodities. Needs of the young and old differ. Needs of the male and female population differs too.

(iii) Distribution of Income

If the income is distributed in the favour of rich, comforts and luxuries will be more in demand. Whereas, if the income is distributed in the favour of the poor, necessities will have higher market demand.

Generally, market demand is higher if the income distribution is even, rather than when it is uneven.

b)



Behaviour of MP in the short run production function.

Marginal product (MP) is the additional output produced when an additional unit of variable input is employed.

Behaviour of MP:-

Stage1. (i) Initially, MP rises. (TP increases at an increasing rate)
In the above diagram, this lasts till OQ_1 level of input.

Stage 2 (ii) MP starts falling, but is still positive (TP increases at a decreas rate).

this happens between OQ_1 and OQ_2 level of input.

When MP becomes zero, TP is maximum.

Stage3 (iii) MP becomes negative (TP starts falling)
This happens after OQ_2 level of input.

Note: MP is Marginal Product
TP is Total Product.

This is because of Law of variable proportions. As output increases, the productivity of variable input will fall, and the pressure on fixed

6 Price elasticity of supply = $\frac{\text{\% change in Quantity supplied}}{\text{\% change in Price}}$

$$E_s = \frac{75}{\frac{31 \times 100}{124}}$$

$$E_s = \frac{75}{25}$$

$$E_s = 3$$

$$\boxed{E_s > 1}$$

Hence price elasticity of supply is $E_s = 3$. Therefore, supply is elastic

12. The Economic Problem is essentially the problem of making a choice.

We have limited Resources, having alternative uses. However we have unlimited wants, differing in urgency

How to employ these limited resources, having alternative uses to satisfy our wants is the central problem of economics.

It arises due to scarcity of resources.

Scarcity is a relative term. It means limited supply of a commodity in relation to its demand. It is a situation where the demand of a commodity exceeds its supply even at zero price

To summarise the economic problem is due to:

(i) Limited Resources (Scarcity of resources)

(ii) Resources have alternative uses

(iii) Unlimited Wants.

→ We need to economise the resources, that is, make the best possible use of the resources, and use them judiciously.

The central problems are:

(i) What to produce and in what quantities?

(ii) How to produce?

(iii) For whom to produce?

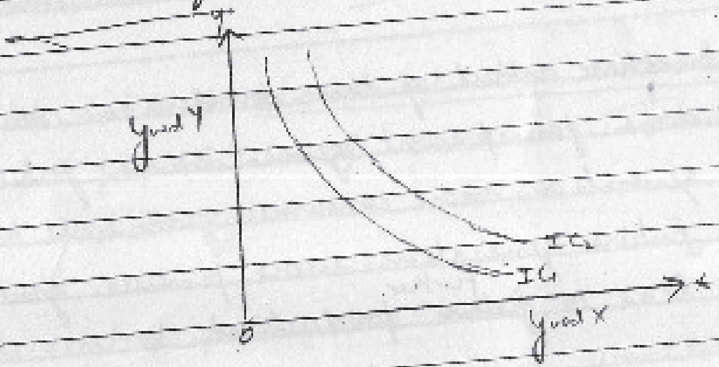
The problem of 'for whom to produce' is the problem of distribu of income among various factors of production. The factors act as customers and their share in goods a services produced will depend on their purchasing po which will depend on the income they get.

Hence, who will consume what goods and services will depen on how the National Income is distributed in the economy.

The distribution should be such that the most urgent needs of people should be met to the maximum extent possible

Another aspect of this problem is whether production should be done for present generation or future generation. For present generation, more consumer goods will be produced, whereas for future generation, more producer goods will be produced, as they lead to ~~future~~ further production.

13. [redacted] Indifference curve is the graphical representation of different combinations of two goods that give the consumer same level of satisfaction.



Properties I.C (Indifference curve)

(1) Indifference curve is downward sloping from left to right. This is because some units of one good will have to be sacrificed to consume an additional unit of another good ~~to~~ in order to keep the level of satisfaction same.

(2) Indifference curve is convex to the origin.

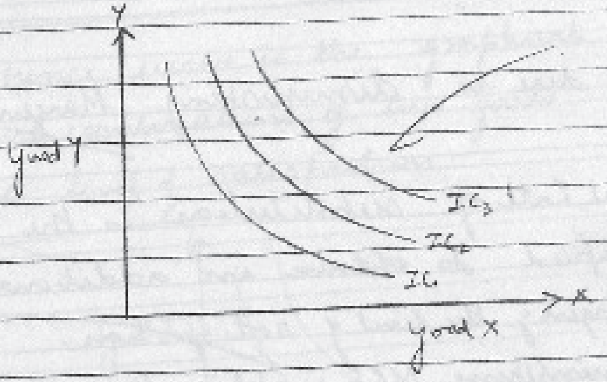
This is due to diminishing Marginal Rate of Substitution (MRS

Marginal Rate of substitution is the amount of one good sacrificed to obtain an additional unit of other good, witho changing the level of satisfaction.

Diminishing MRS implies that the consumer is willing to sacrifice less and less of one good, for every successive increase in consumption of other good.

This is because the consumer's capacity to sacrifice a good is more when it is plentiful and less when it is scarce.

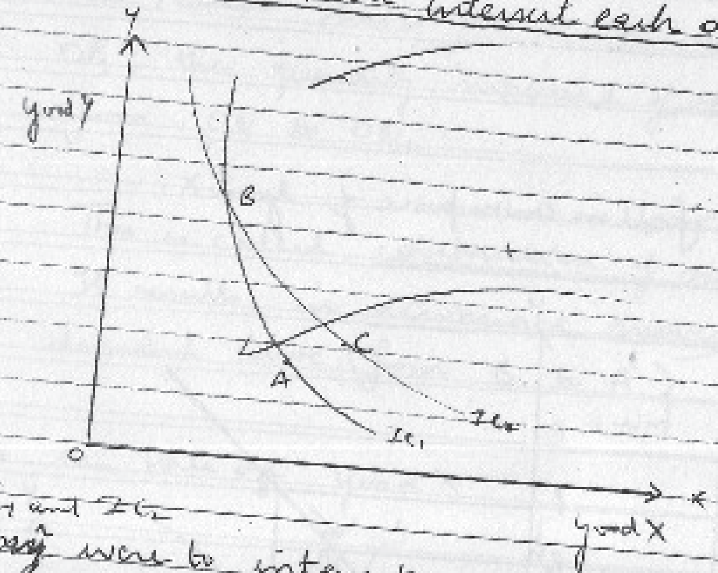
(3) Higher IC implies higher level of satisfaction.



IC3 represents a higher level of satisfaction than IC2 and IC2 represents a higher level of satisfaction than IC1

This is because a higher IC would show combinations which will have either more of both goods or more of one good and same of other good. Since preferences are monotonic, more goods will always be preferred. Hence, higher IC would imply higher level of satisfaction.

(4) Indifference Curves never intersect each other.



(hypothetical diagram

If ~~they~~ IC1 and IC2 were to intersect, as shown in the diagrams

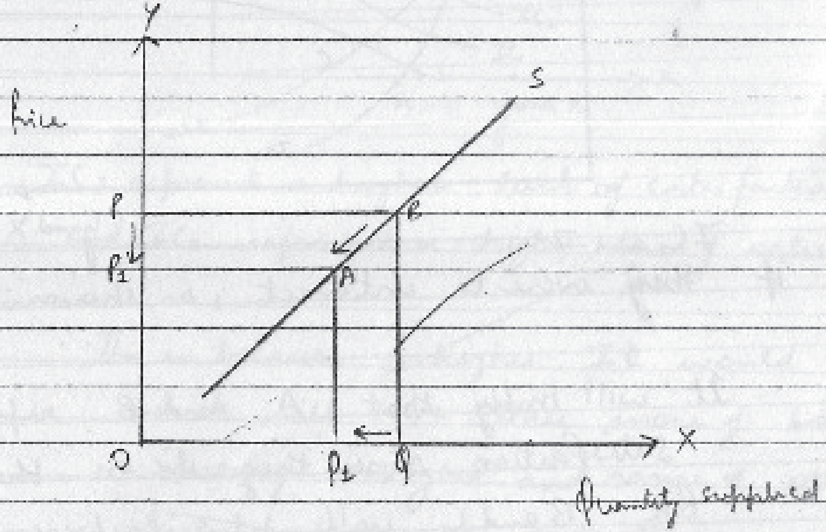
It will imply that A and B represent same level of satisfaction, since they lie on the same IC1

But B and C will also represent same level of satisf as they lie on IC2. This will mean A and C show same of sa However, C lies on higher IC, therefore it will show higher level of satisfaction. This is a contr

Hence two ICs can never intersect each other.

14.

(a) fall in own price of good X.



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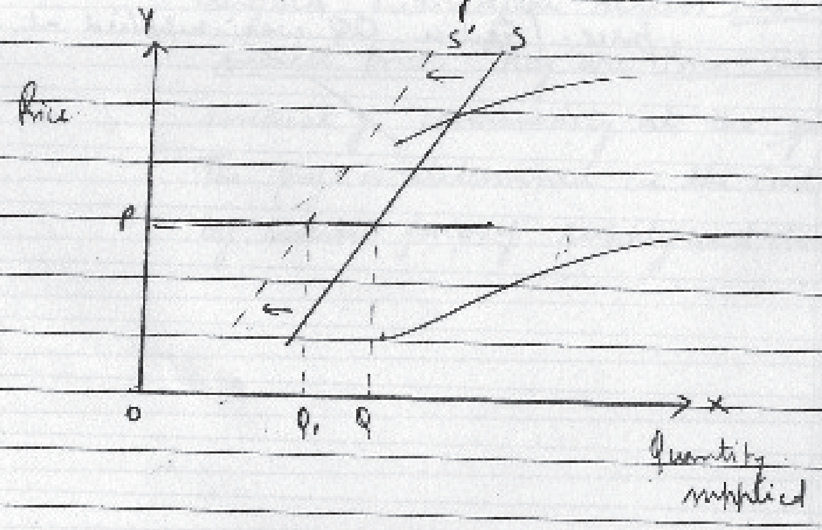
Law of supply states that, all other things constant, the quantity supplied of a commodity varies directly with its price.

Hence, when there is fall in its own price say from OP to OP_1, the quantity supplied of a commodity will fall from, OQ to OQ_1.

This is called contraction of supply.
It results in downward movement along the same demand curve. (from B to A)

(b) Rise in tax rate on good X.


Y
S'
S
Price
P
O
Q_1
Q
X
Quantity supplied

When there is rise in taxes, the cost of production of the commodity rises. This reduces the profits of the producer. Hence it will result in 'decrease in supply'

The supply curve will shift leftward from S to S'

Less of the commodity will be supplied at the same price. (Earlier OQ was supplied at OP Price, now OQ_1 is s

15 (a) Large number of sellers

There are large number of sellers in perfectly competitive market. This means that the output produced by a single firm is an insignificant part of market supply (total output).
Therefore, a single firm by varying its supply can
influence the market price.
Therefore, individual sellers have no influence over the market price. They are Price-Takers. They can sell any amount of commodity at the given price.
The price is determined in the industry, which is the price-
by market forces of supply and demand.

(b) Homogeneous product

- The product sold in perfectly competitive market are perfect substitutes of each other. They are identical in terms of their quality and the services related to their sale and delivery are identical.

- Therefore, the consumer has no preferences of firm. He is indifferent to firms. Therefore, the firm cannot increase the price, as the consumer will buy from another firm.

- Hence, homogeneous product implies uniformity in prices.

Section B

14. Flows are variables that are measured over a period of time
[redacted] They have a time dimension. for eg. National Income is mea
over a year.

[redacted] (c) Residents

18. Revenue receipts in the govt. Budget are those which neither
[redacted] create a liability, nor reduce an asset. ex- Taxes.

19. [redacted] (c) Borrowings less interest payment.

20. (c) Autonomous transactions
[redacted]

21. [redacted]

$$\text{Real Income} = \frac{\text{Nominal Income}}{\text{Price Index}} \times 100$$

$$200 = \frac{\text{Nominal Income}}{135} \times 100$$

$$\text{Nominal Income} = \frac{2\cancel{00} \times 135}{1\cancel{00}}$$

$$= 270$$

6

Hence, Nominal Income is ₹ 270 crores.

22. [redacted] Aggregate Demand is the value of all goods and services that an economy plans to buy during a given per of time.

$$AD = C + I + G + (X - M)$$

(Aggregate Demand is equal to Aggregate Expenditure)

Where,
Points

(i) C is a Consumption Expenditure :- This is the planned expend
of all households in an econo
on final consumption goods and
services.

(ii) I is the Investment Expenditure :- It is the planned expendit
all the production units on
new capital goods.
It is of three types :-
(i) Purchase of fixed assets
(ii) Addition to inventory.
(iii) Construction of residential

(iii) G is the Government Expenditure :- It is the planned expendit
of the general govt. on providin
free goods and services to the
citizens in law and order.

(iv) (X-M) is the Net exports :- it is the net planned expend
[exports-imports]
of foreigners on the domestic p

23. When an economy is in equilibrium, [redacted]

$$Y = C + I$$

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

$$1000 = 250 + (MPC)1000 + 100$$

$$1000 - 200 - 100 = (MPC)1000$$

$$\frac{700}{1000} = MPC$$

$$MPC = \frac{7}{10} = \underline{0.7}$$

6

Where Y = National Inco

$\bar{C}$ = Autonomous c expenditure

I = Autonomous investment

b = MPC = Marg Propensity

Hence the Marginal Propensity to consume is 0.7

24. As sale of ~~new~~ petrol and diesel cars is rising, demand for domestic product is rising.

Therefore it will result in rise in Gross Domestic Produ

- With rise in cars, one can assume that people w having higher standards of living. Hence it will re in greater economic welfare.

- However, petrol cars also lead to an increase in p levels of the country. This is an externality that is no accounted for in estimating Gross Domestic Product. will harm the health of citizens and hence may act reduce social welfare in some ways.

[redacted]

25 * In the Barter system, there was problem of Lack of Double coi
of wants. An exchange could only happen if both the
buyer and the seller wanted to buy each other's goo
~~ss~~ and sell their own goods to each other. It would b
a rare ~~occasion~~ occasion where two people would
want to mutually exchange their commodities.
It would usually involve a series of unwanted int
exchanges before one got the desired commodity in
of one's own.

6

Money solved this problem.

* Money acts as a medium of exchange

(i) No one has any objection to receiving money in ex
of their goods and services. With the money received,
person can buy whatever he wants.
(ii) Hence money acts as an intermediary between the b
the seller and increases ease of trade.

(iii) With money, a person can buy whatever he wants. Hence i
acts as a store of generalised purchasing power and giv
freedom of choice to the consumer.

26. ~~Ans~~ Repo Rate is the rate at which central bank lends
commercial banks for short term.

- An increase in Repo Rate will increase the cost of borrowing from the Central Bank, for the commercial bank. This will induce the commercial banks to increase their rate of int
This will discourage borrowing, and people will borrow
less. Hence, This will lead to reduction in credit creatio
and money supply.
It is used during situation of inflation, as it reduces A

- A decrease in Repo Rate will reduce the cost of borrowing from the Central Bank. Hence the commercial banks will lo
their rates of interest, hence encouraging borrowing

016

This will lead to more credit creation and money supply

It is used in situation of deflationary pressures in the economy, as it results in increase in AD.

27.

Revenue expenditure	Capital Expenditure.
- It neither creates an asset, nor reduces a liability.	- It either creates an ass or reduces a liability
- It is incurred for normal running of govt departments and provision of various services	- It is incurre on developmental activi to reduce the liabilit the govt.
- Eg. Salaries and pensions, subsidies and grants given to state govt and UTs, interest on debt incurred by the govt etc.	- Eg. Repayment of loans, acquisition of machin building, equipment

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Fictitious Roll No.
(To be entered by Board)
122856

अपना अनुक्रमांक इस उत्तर–पुस्तिका पर न लिखें
Please do not write your Roll Number on this Answer-Book

अतिरिक्त उत्तर–पुस्तिका (ओं) की संख्या
Supplementary Answer-Book(s) No.

Q27 (continued)

The Govt uses its budget to promote economic equality. Economic inequalities are inherent in all economic syste but they need to be curbed to a socially acceptable level.

Through the budget, it can undertake redistribution of inc and wealth in the society

- Taxation : (i) It can adopt a progressive tax regime wh the rich are taxed more than the poor.
  (ii) Luxury items can be taxed more, which are only consumed by those with excess income, whereas necessities can be tax exempt as they are also consumed by the poorer sectio

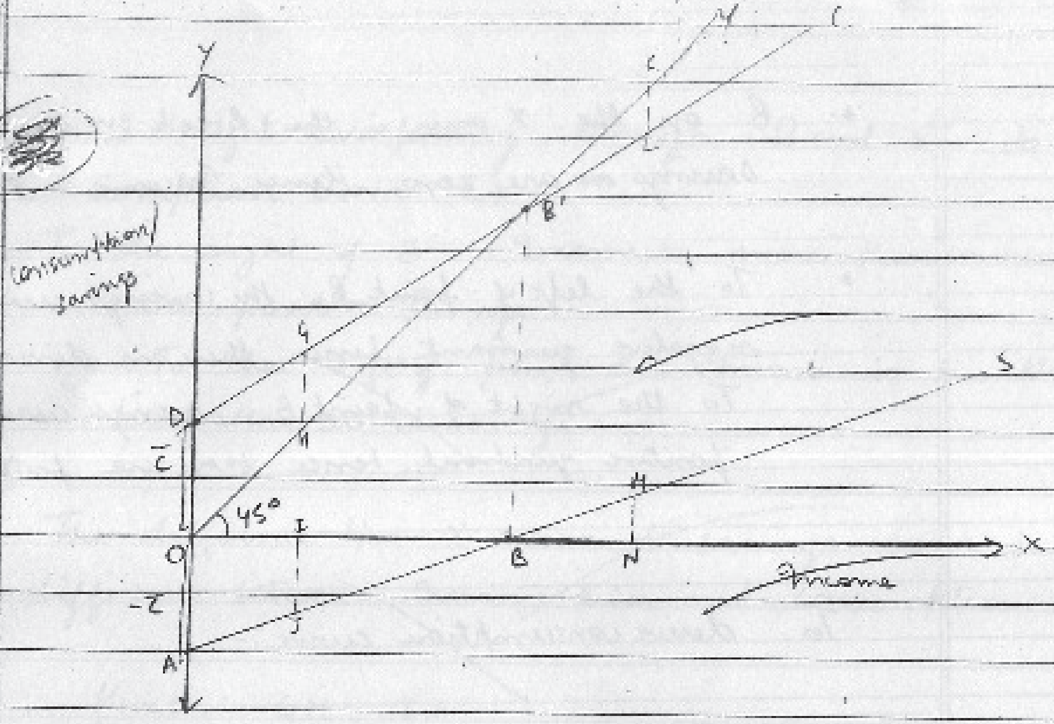
+ Government Expenditure

→ Government can spend on subsidies given to poor on necessities such as food items.

→ Govt. can spend on social welfare schemes.

Hence, in such a way, redistribution of income and wealth can be undertaken.

28.


Y
Y
C
C
B'
G
H
D
$\bar{C}$
45°
O
I
B
N
M
S
X
$-\bar{C}$
J
A
Income
consumption/savings

- In the above diagram, X axis denotes income and Y axis denotes savings and consumption.

  Y is the income line where consumption is equal to income on every point.

  S is the savings curve with OA $(-\bar{C})$ as dissavi
  at zero level of income.

- B on the X axis is the break-even point where savings are zero. Hence Income is equal to consumption.

- To the left of point B, the savings curve lies in the negative quadrant, hence there are dissavings.
  To the right of point B, savings curve lies in the positive quadrant, hence there are positive savings.

To derive consumption curve :-

(i) Take OD on the upper part of Y axis equal to OA on the lower part of Y axis.
This is because autonomous consumption is equal to dissavings at zero level of income.

(ii) Draw a perpendicular from point B on X axis to the income line, at B'. This is the break-even point, where consumption is equal to income.

(iii) Draw a straight line passing through D and B' to derive the consumption curve (C).

To the right of B', income is more than consumption, hence are positive savings.

To the left of point B', income is less than consump hence there are dissavings.

(iv) The difference b/w X axis and savings curve is equal to difference between income line and consumption curve.

Hence, GH = IJ
and KL = MN.

Hence, consumption curve is derived from savings curve.

29. (a) When Investors lend abroad, it will recorded in the Capital Account of BOP. This is because it affect the asset and liability status of the country. It ~~reduces~~ leads to creation of an asset for the invest

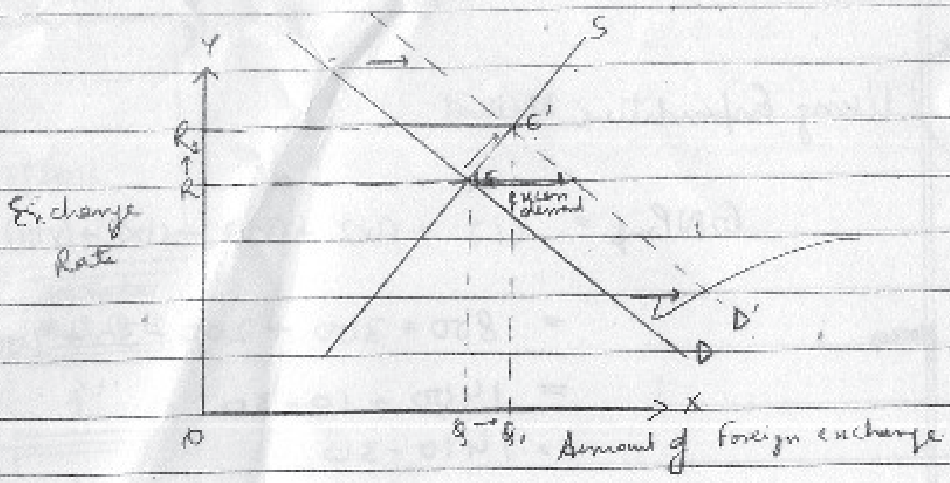
It will be recorded in the debit side as it leads outflow of foreign exchange.

(b) ~~Lending will lead to outflow of foreign exchange.~~ ~~It will increase the supply of foreign exchange.~~ ~~Hence,~~

To lend abroad, the investor will need foreign

Hence, it will result in increase in demand for foreign exchange.

As the demand for foreign exchange increases, it resu in rightward shift of the foreign exchange demand c D to D'.



In this diagram, S is
supply curve, D is the
curve, originally
at E with OQ eqm
and OR eqm exchan

This will create a situation of excess demand at original price O
Hence the exchange rate will rise. As exchange rate rises
its demand contracts (upward movt on the demand curve) and
supply ~~contr~~ expands (upward movt on the supply curve).
This will continue till entire excess ~~exp~~ demand is elimin
and Equilibrium is attained at E', with higher eqm. exchange ra
and higher eqm quantity OQ_1

Therefore, lending would result in rise in market exchange

30. Using Expenditure Method.

$GNP_{mp} = (i) + (iv) + (vi) - (ix) + (viii) - (iii)$

$= 800 + 300 + 200 - 30 + 100 + 10$

$= 1400 + 10 - 30$

$= 1410 - 30$

$= \underline{1380 \text{ crores}}$

Private Income = $GNP_{mp} - (viii) - (v) - (x) + [(xi) + (vii) - (ii)]$

$= 1380 - 100 - 150 - 90 + [50 + 40 - 20]$

$= 1280 - 150 - 90 + [70]$

$= \underline{1110 \text{ crores}}$

Kapoor
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