

# Aggregate demand and its components

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## Definition of aggregate demand

- Aggregate demand refers to the demand for all the final goods and services produced by

all the sectors functioning in the economy in a financial year

## Components of Aggregate demands

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

- C = House Hold or personal final Expenditure
- I = Private final investment Expenditure
- G = Government Expenditure
- (X-M) = Total exports – Total Import

House Hold or personal final

# Expenditure

(C)

- Total demand for all the finished goods by all the consumers and their expenditure on it .
- It also means the planned expenditure on final consumer goods and services by households during a financial year

Private final investment

Expenditure (I)

- Overall demand for capital goods like land, building, plant, machinery, residential, construction, etc. by all the private sector firms for an addition to the already existing stock of capital goods.

## Government Expenditure

(G)

- It is summation of consumption expenditure and investment expenditure by government and its agencies on all economic as well as non economic activities for the collective

welfare of the general masses. It is also known as autonomous investment

## Net Exports (X-M)

- This is the net demand by the rest of the world for our nation's output

## Consumption function

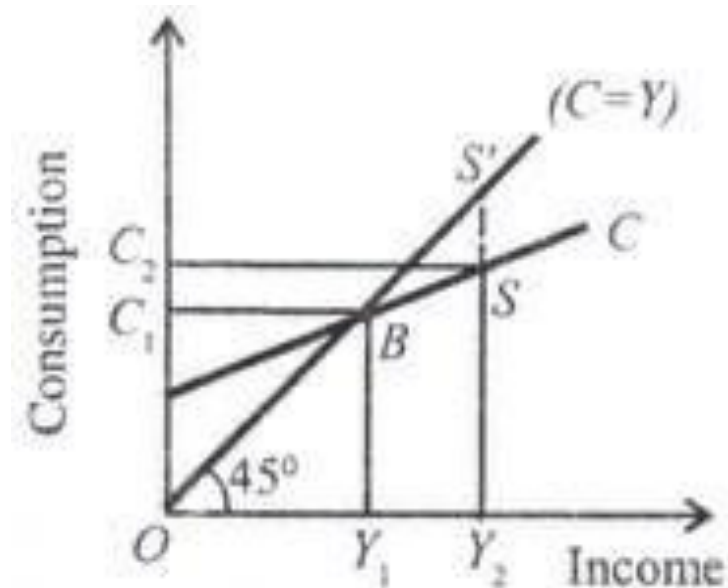
- Consumption function is the functional relationship between consumption and income in the economy.
- $C = f(Y)$

# Tabular and graphical presentation

Table I : Consumption Schedule

(Rs Crores)

Income (Y)	Consumption $C = f(Y)$
0	20
60	70
120	120
180	170
240	220
300	270
360	320



## Propensity to consume

- Average propensity to consume (APC)

- Marginal propensity to consume (MPC)

## Average Propensity to Consume

(APC):

Average propensity to consume refers to the ratio of consumption expenditure to the corresponding level of income.

- $APC = \text{Consumption (C)} / \text{Income (Y)}$

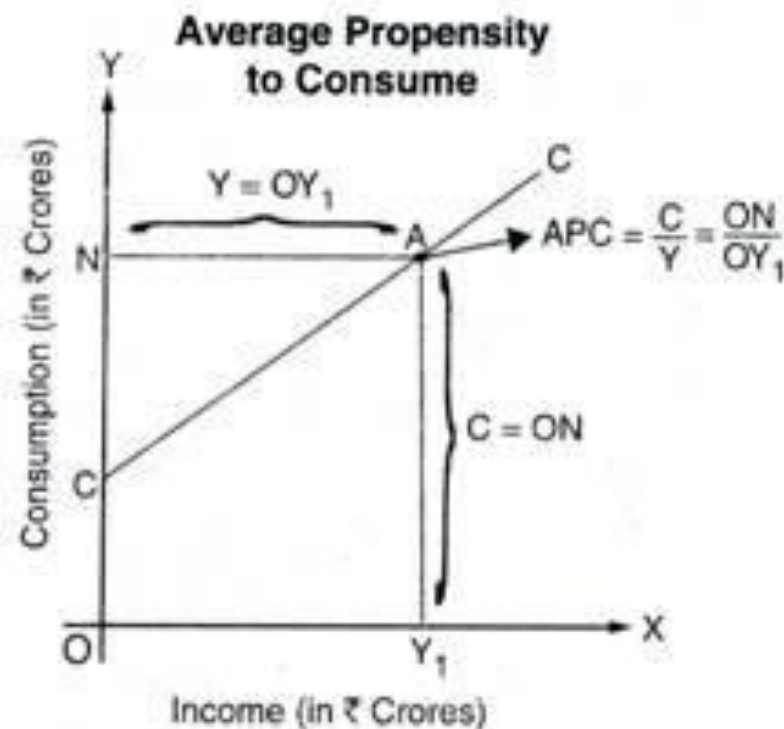
Example-

- If consumption expenditure is Rs 70 crores at national income of Rs 100 crores,
- Rs 70
- Then:  $APC \ C/Y = 70/100 = 0.70$ , i.e. 70% of the income is spent on consumption.

# APC with the help of following schedule and diagram

Table 7.4 Average Propensity to Consume

Income (Y) (₹ Crores)	Consumption (C) (₹ Crores)	$APC = \frac{C}{Y}$
0	40	—
100	120	1.20 $\left( = \frac{120}{100} \right)$
200	200	1 $\left( = \frac{200}{200} \right)$
300	280	0.933 $\left( = \frac{280}{300} \right)$
400	360	0.90 $\left( = \frac{360}{400} \right)$



## Important Points about APC

- (i) APC is more than 1:



- As long as consumption is more than national income, i.e. before the breakeven point,  $APC > 1$ .
- (ii)  $APC = 1$ :
- At the Break-even point, consumption is equal to national income. So,  $APC = 1$  at the income level of Rs 200 crores.
- (iii)  $APC$  is less than 1:
- Beyond the break-even point, consumption is less than national income. As a result,  $APC < 1$ .
- (iv)  $APC$  falls with increase in income:
- $APC$  falls continuously with increase in income because the proportion of income spent on consumption keeps on decreasing.
- (v)  $APC$  can never be zero:
- $APC$  can be zero only when consumption becomes zero. However, consumption is never zero at any level of income. Even at zero level of national income, there is autonomous consumption (c).

# Marginal Propensity to Consume (MPC)

- Marginal propensity to consume refers to the ratio of change in consumption expenditure to change in total income. MPC explains what proportion of change in income is spent on consumption.
- $MPC = \text{Change in Consumption } (\Delta C) / \text{Change in Income } (\Delta Y)$

Example-

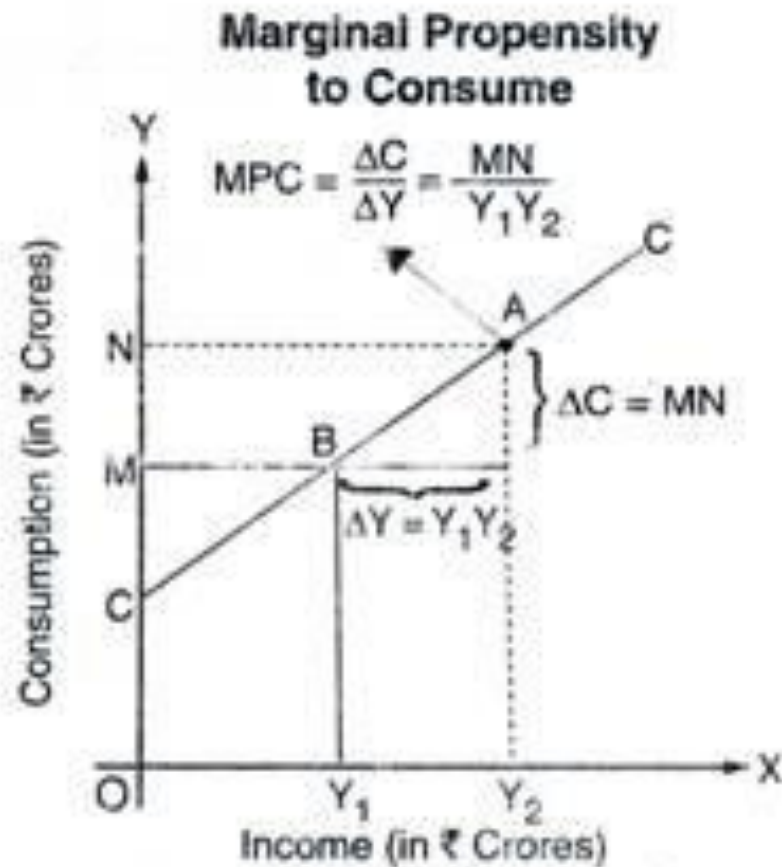
- If consumption expenditure increases from Rs 70 crores to Rs 110 crores with an increase in income from Rs 100 crores to Rs 200 crores, then:

- $MPC = \Delta C / \Delta Y = 110 - 70 / 200 - 100 = 40 / 100 = 0.40$  i.e., 40% of the incremental income is spent on consumption.

Let us understand MPC with the help of following schedule and diagram

Income (Y)	Consumption (C) (Rs Crores)	Change in Consumption ( $\Delta C$ ) (Rs Crores)	Change in Income ( $\Delta Y$ ) (Rs Crores)	$MPC = \Delta C / \Delta Y$
0	40	-	-	-
100	120	80	100	0.80
200	200	80	100	0.80
300	280	80	100	0.80
400	360	80	100	0.80

# Marginal Propensity to Consume



## Important Points about MPC

- 1. Value of MPC varies between 0 and 1:
- We know, incremental income is either spent on consumption or saved for future use.
- i. If the entire additional income is consumed, i.e.  $AS = 0$ , then  $MPC = 1$ .
- ii. However, if entire additional income is saved, i.e.  $AC = 0$ , then  $MPC = 0$  In normal situations, value of MPC varies between 0 and 1.
- 2. MPC of poor is more than that of rich:
- It happens because poor people spend a greater percentage of their increased income on consumption as most of their basic needs remain unsatisfied.
- On the other hand, rich people spend a smaller proportion as they already enjoy a high standard of living. Similarly, MPC of developing countries like India, Bangladesh, etc. is more than MPC of developed countries like America or England.
- 3. MPC falls with successive increase in income:
- It happens because as an economy becomes richer, it has the tendency to consume smaller percentage of each increment to its income.

# Comparison between APC and MPC

Basis	APC	MPC
Meaning	It is the ratio of consumption expenditure (C) to the corresponding level of income (Y) at a point of time.	It is the ratio of change in consumption expenditure ( $\Delta C$ ) to change in income ( $\Delta Y$ ) over a period of time.
Value more than one	APC can be more than one as long as consumption is more than national income, i.e. till the break-even point.	MPC cannot be more than one as change in consumption cannot be more than change in income.
Response to change in income	When income increases, APC falls but at a rate less than that of MPC.	When income increases, MPC also falls but at a rate more than that of APC.

Formula

$APC = C/Y$

$MPC = \Delta C / \Delta Y$

# Questions

- What is aggregate demand?
- What are the components of aggregate demand?
- Define NET Exports.
- What will be the consumption in the economy if income of the economy is zero and why?
- What is consumption function?
- What is APC?
- What is MPC? • **HOTS**
- Is APC always positive?
- What will be the maximum value of the MPC?
- Does MPC fall with is increase in income?

Thank you