15. Price Discrimination

Q:1 What is Price discrimination? what are the different degrees of Price Discrimination?

(A) Price Discrimination :- Main feature of Monopoly Market is to Practice Price Discrimination. As a Single Seller monopoly charge different Prices from different Customers.

(B) Meaning :- "The act of selling same Commodity at different Prices to different buyers is called Price-Discrimination."

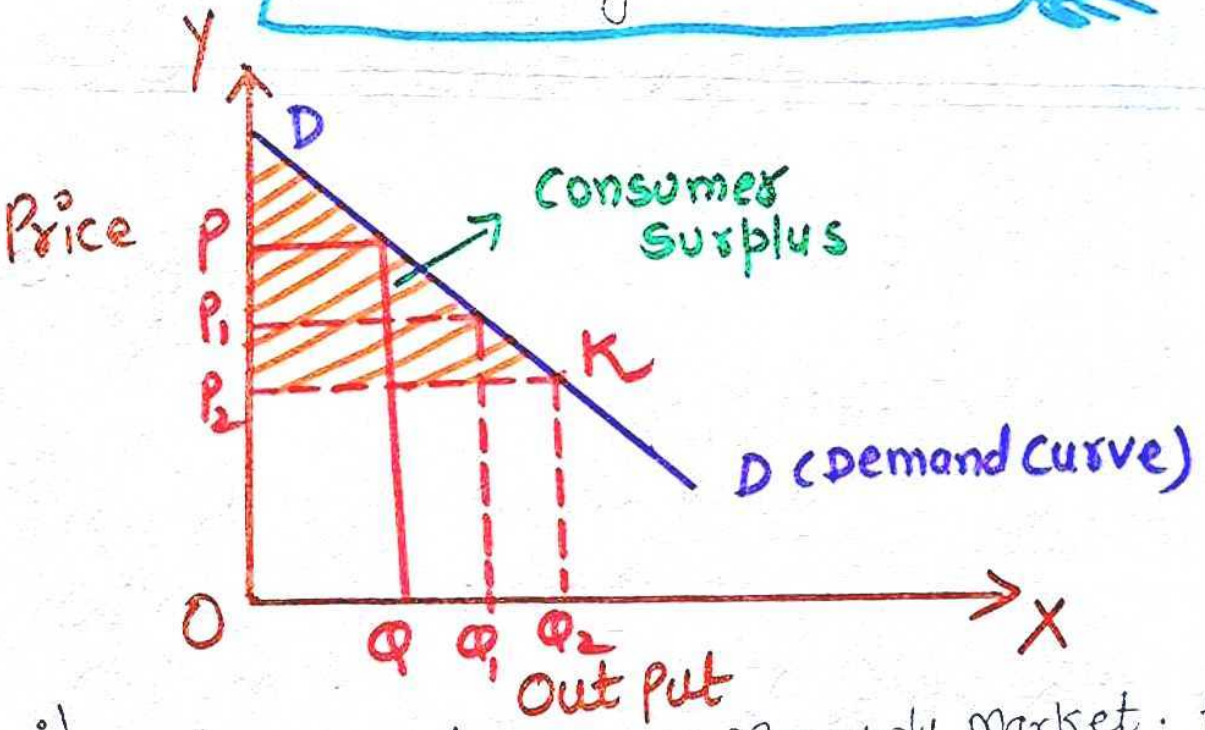
(C) Degrees of Price Discrimination :- Prof. A.C Pigou, an English Economist had explained degrees of Price-Discrimination in his book- 'Economics of welfare'. There are Three degrees of Price-Discrimination.

1) First Degree of Price-Discrimination (Unit Wise):-

According to Prof. Pigou, First Degree of Price-Discrimination is Practically not found in market. Here monopolist charge different Prices From different buyers.

Thus monopoly try to get entire Consumer Surplus It is Shown in the following diagram :—

economicsguidance.com



i) DD is Demand Curve of Monopoly Market. Here monopoly Charge different Prices to different buyers.

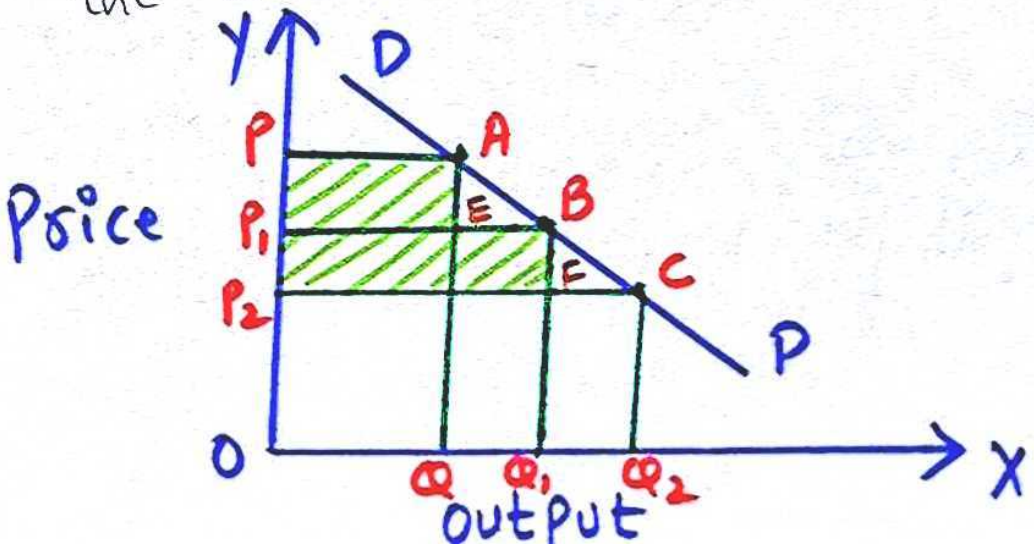
ii) The shaded area - DP_2K shows Consumer Surplus which is enjoyed by Monopoly as Excess Profit.

(2) Second degree of Price-Discrimination (Quantitywise)

Under second degree of Price-discrimination, monopoly charge different Prices for different Quantities.

It means high Price for small Quantity and Low Price for bulk Quantity.

Here monopolist takes away only small part but not the whole Consumer Surplus shown in diagram :—



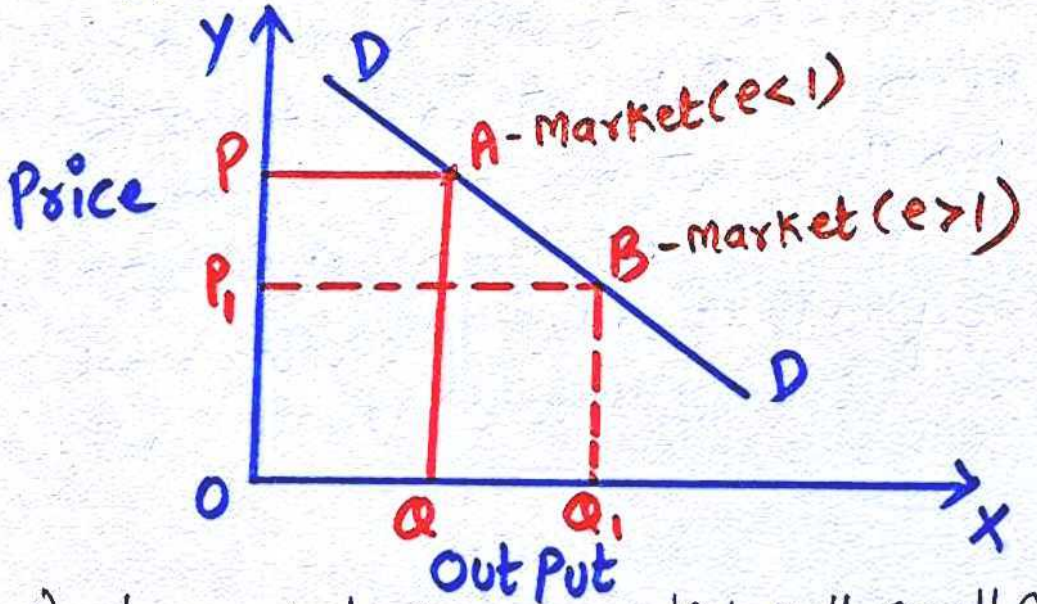
i) DD is Demand Curve in monopoly market. Here monopoly Sell Less Quantity OQ at High Price - OP, and bulk Quantity OQ_2 and Low Price - P_2.

ii) Here monopoly Charge different Prices for the different Quantity sold to different group of People.

(3) Third Degree of Price-Discrimination (Marketwise)

It is most Popular and Common type of Price-discrimination in monopoly market.
Under this market, monopoly divide its Total Output in many Sub-markets and fix the Price according to its Demand Elasticity of market.

Example :- High Price will be Charged in Relatively inelastic market and Low Price is fixed for Relatively Elastic market shown in diagram —



economicsguidance.com

1) In market-A, monopolist sell small Quantity - OQ at High Price - OP because demand for Commodity is Relatively inelastic.

2) In Market-B, monopolist sell Large Quantity - OQ_1 at Low Price - OP_1 because demand for Commodity is Relatively Elastic.

Q:2 Explain the Various Conditions of Price-discrimination?

(A) Conditions of Price-Discrimination :-

(1) Non-Transferability of Goods :- A monopolist Can Charge different Prices from different Consumers when Consumers are not in a position to transfer the goods From One market to Other. Here Consumer donot meet each other.

(2) Geographical Distance :- When Produces sell its Output in many Sub-markets which are situated at Long-distances then transfer of goods may not be economical.

Example :- Monopolist Follows Price-discrimination of ₹10 between Maharashtra and Gujrat, then transfer of goods between two markets is not economical.

(3) Different Elasticity of Demand :- Price-discrimination is Possible due to difference in Elasticity of Demand.

Example :- Monopolist can easily charge high Price in case of Relatively inelastic Demand and Low Price in case of Relatively elastic Demand.

economicsguidance.com

(4) Political Barriers :- Political boundaries Prevent the movement of People from one market to the other. Here monopolist can easily follows Price-discrimination.

Example :- Trading of Electronics between India and China.

(5) Tariff Barriers :- When Government impose tariffs to Protect domestic market then a monopolist may Charge High Price in Home market and Lower Price in Foreign market.

6. **Buyers Ignorance :-** When the Consumers are ignorant about the Price-difference available in the market then they will not mind Paying a high Price than Other Customers.

7. **Illusion :-** Some Consumers have illusion that high Price Commodity means better quality. Here monopolist Follows Price-discrimination to these illuted buyers.

8. **Legal Sanction :-** The Government due to welfare, Social or Political reasons may follows Price-Discrimination. Example :- Government Charge different Prices for Electricity Supplied to- Commercial areas, Residential areas, Slum area and to Farmers
Government Charge Low fees or No fees from girls in Schools and Colleges.

9. **Non-Transferable Features of Goods :-** Monopoly Follows Price-discrimination in Case of goods and Services which Cannot be transferable.
Example- Doctor Services, Teacher services, Hair Cuts, Lawyers, Singers, Musician etc. Here they can Charge different Prices from different Customers.

10. **Location :-** Monopolist Charge high Price for the goods which are Sold in Rich Localities, Malls or department Stores. Rich Customers always Prefer to Pay high Prices for goods and services available in Posh areas and fancy Stores.

economicsguidance.com

Q:3 When is Price discrimination Possible and Profitable?
OR How does a Price discriminating monopolist distribute the total output between the two markets?

(A) Conditions For Profitable Price-Discrimination:

Price-discrimination does not guarantee to bring Profitability. Following Conditions must be Followed for Profitable Price-discrimination.

1. Difference in Elasticity :- A monopolist Can sell his Product in many Sub-markets which are at geographical distance. When Elasticity of Demand is Same in different market then Marginal Revenue in Two markets will also be same.

$$MR = AR\left(\frac{e-1}{e}\right)$$

Here Producer will not increase Profit by transferring goods from one market to other because every additional Unit Sold will bring the Same MR.

But when Elasticity of Demand is different, then Producer Can easily increase Profitability by following Price-discrimination.

A monopolist Can Charge High Price in the market where elasticity of Demand is Relatively inelastic.

A monopolist can charge Low Price in the market where elasticity of Demand is Relatively Elastic.

2] Distribution of the Total Out Put :-

In Order to maximise Profit the discriminating monopolist Should distribute the Output in such a way that it should bring maximum profit to monopolist. Such Situation can be reached when MR in both markets should be same.

$$MR_A = MR_B = \text{Same}$$

To achieve this condition, the monopolist has to sell Less Quantity in inelastic market by charging High Price. And the monopolist has to sell more quantity in Elastic market by charging Low Price.

Q:4 Explain the Equilibrium of a Price-discriminating monopolist ? OR

" A discriminating monopolist would maximise his Profits when the Combined Marginal Revenue is equal to Marginal Cost of entire Output " Explain.

(A) Equilibrium of Price-Discriminating Monopolist

The main aim of every producer is to earn maximum Profit. To earn maximum Profit, Producer will →

- Increase Production Capacity
- Optimum Utilisation of Resources
- Minimum Cost of Production
- Maximum Sale at Low Price etc.

Every monopolist distribute its Output in different Sub-markets. Producer supply Smaller Quantity at

at High Price in the market where demand is Relatively inelastic. But Producer supply Large quantity at Low Price in the market where demand is Relatively Elastic.

(B) Conditions of Equilibrium :-

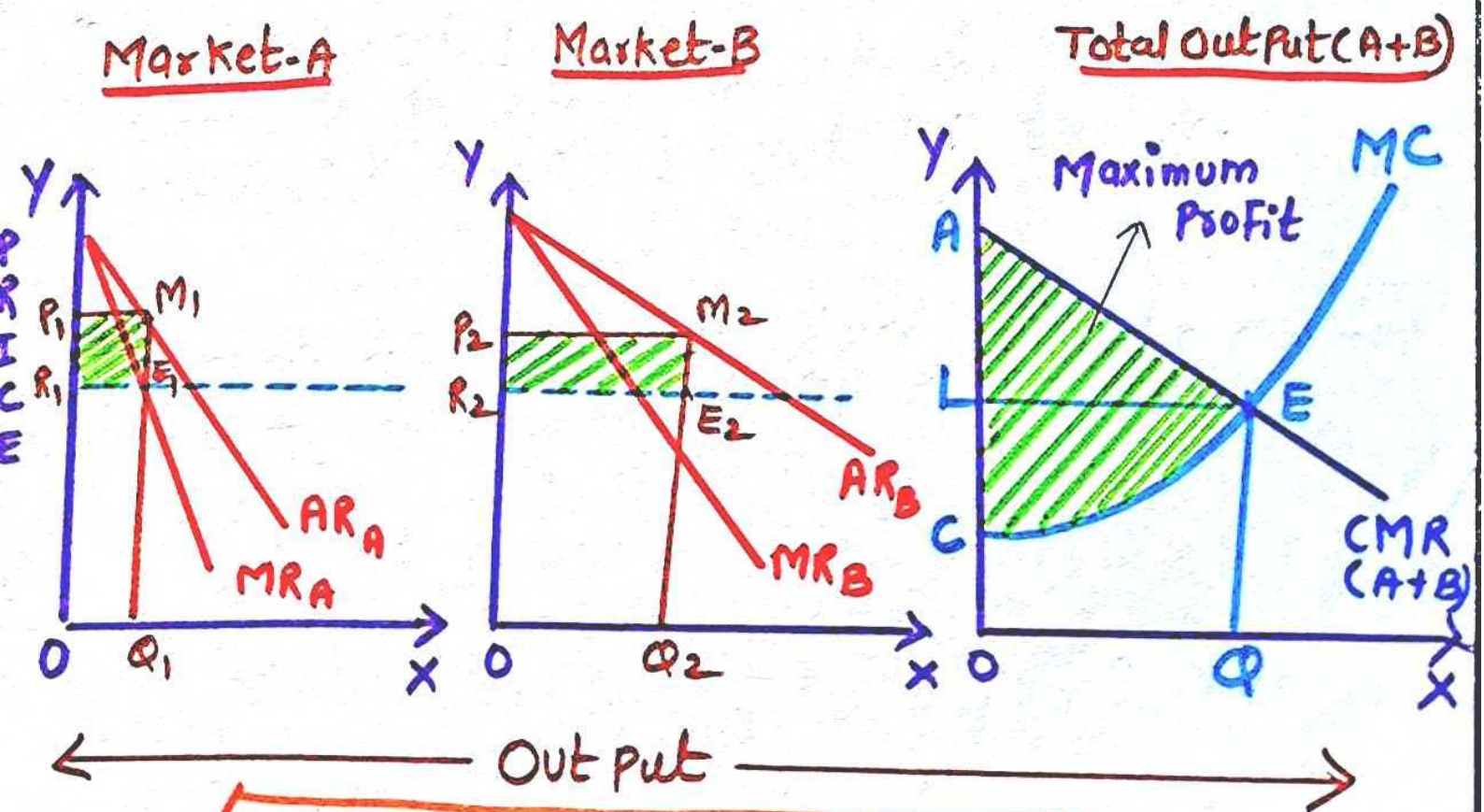
(1) Monopoly distribute its output in Two markets A and B.

(2) The Marginal Revenue in different market should be Same i.e $MR_A = MR_B = CMR$ (Combined MR)

(3) $MR = MC$

$\therefore MR_A = MR_B = MC$

(C) Diagram :-



1. In above diagram, Producer supply goods in market A and B and Third diagram shows Total Production OF A+B.
2. In market-A, monopolist supply OQ_1 output at High Price - OP_1 because demand in market-A is Relatively inelastic.
   ∴ Profit OF Market A = $P_1R_1E_1M_1$ at Equilibrium E_1.
3. In market-B, Monopolist supply OQ_2 output at Low Price OP_2 because demand in market-B is Relatively Elastic.
   ∴ Profit OF Market B = $P_2R_2E_2M_2$ at Equilibrium E_2.
4. Third diagram shows Equilibrium of Monopolist where — $MR_A = MR_B$ = Total MR = CMR

$$MR = MC$$

$$\text{Total output } OQ = OQ_1 + OQ_2$$

$$TR = AOQE \text{ and } TC = COQE$$

$$\therefore \text{Excess Profit} = TR - TC$$

$$= AOQE - COQE$$

$$\text{Maximum Profit} = ACE \text{ Shaded area}$$

It shows that Monopolist earn maximum Profit at Equilibrium due to Price discrimination.

Q:5 Define Dumping. Explain Price-Discrimination Under dumping? OR Define Dumping and equilibrium of a Firm resorting to dumping in the world market?

(A) **Dumping :-** Dumping is special kind of Price-Discrimination in monopoly market. Here monopolist Charge High Price for his Product in Domestic market and Low Price for his Product in Foreign market. At home, the monopolist is a Price-maker and in the world market a Price-taker.

Dumping is called Predatory when there is temporary Sale of a Commodity at Lower Price in abroad.

Dumping is called Sporadic when there is occasional Sale of commodity to reduce excess stock in abroad.

(B) **Meaning :-** " Price Distribution in Domestic and Foreign market is known as Dumping. "

(C) **Conditions for the Success of Dumping :-**

1) Producer must have Monopoly Power in Home market.
2) Markets are divided into Home market and Foreign market.
3) It should not be possible for buyers to Resell the goods from Cheaper market to Costly market. It can be Prevented by transport Cost and tariff (duties)

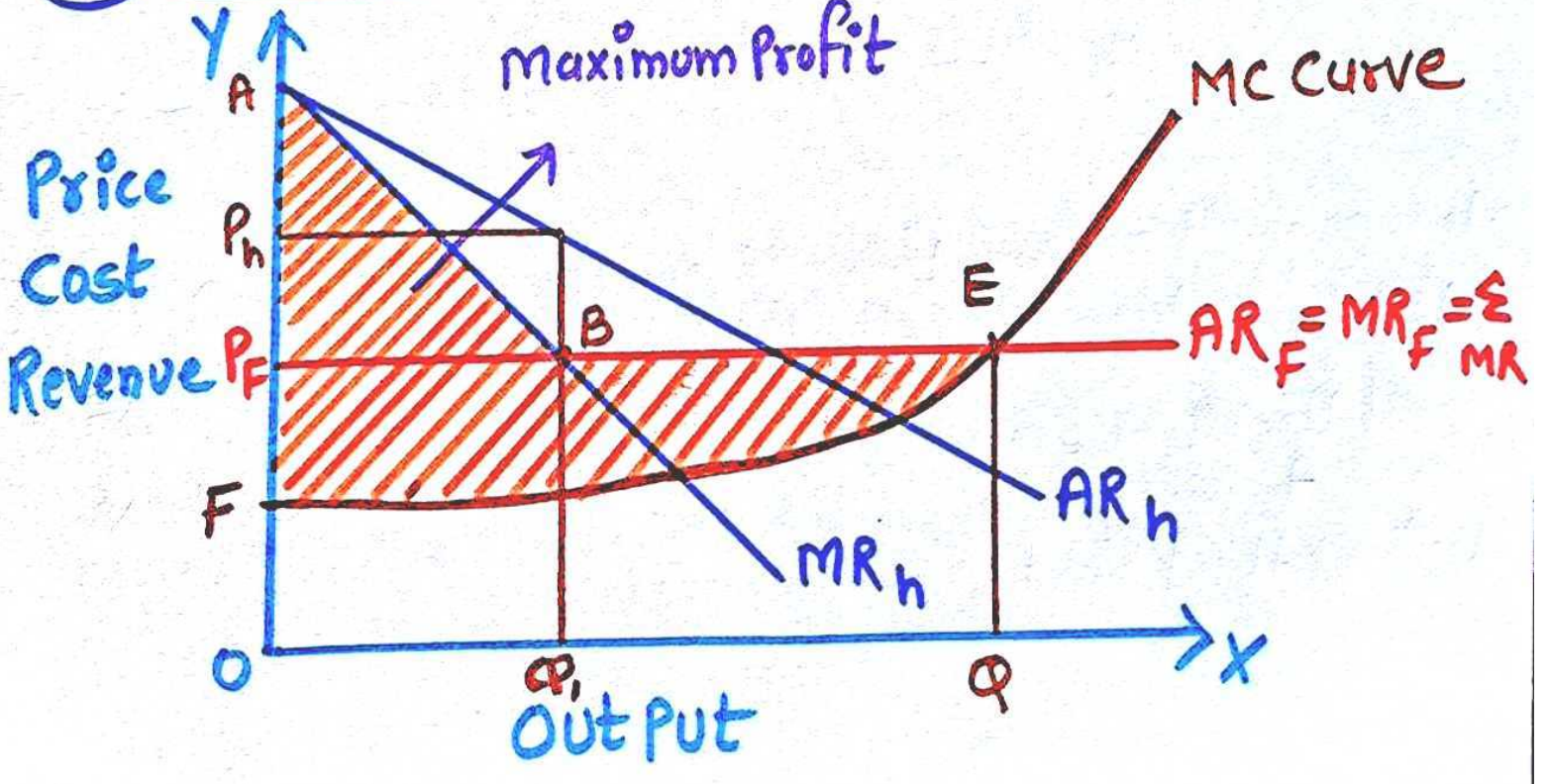
4) The different markets have different Elasticity of Demand.
Example – Home Market → Relatively inelastic Demand
Foreign market → Relatively Elastic Demand.

5) Dumping helps to earn maximum Profit when –
i) $MR_H = MR_F =$ Total MR
ii) $MC = MR$
$\therefore MC = MR_h = MR_f$

(D) Assumptions:-

1. A monopoly firm is Selling Product into Two markets
i) Home market ii) Foreign market.
2) In Home market, Producer enjoys monopoly Power so he can sell its output at high Price.
3) But in Foreign market, there is Perfect competition so he can sell its out Put at Low Price.

(E) Diagram :-



1) AR_h and MR_h are Revenue Curves in Home market where Producer enjoys monopoly Power.
2) In Home market, demand for commodity is Relatively inelastic ($e<1$), so Producer able to sell OQ_1 output at high Price - OP_h.
3) AR_F and MR_F are Revenue Curves in Foreign/world market. Due to Perfect competition AR_F and MR_F both are equal and Same Curve.
4) In Foreign market, Demand for commodity is Relatively Elastic ($e>1$), so Producer is able to sell Q_1Q output at OP_F Price.
5) As $MR_h = MR_F$
$\therefore AR_F = MR_h = MR_F = \Sigma MR$
6) The MC Curve intersect ΣMR Curve at Point E. Here monopoly enjoy Equilibrium Position Monopolist sell OQ out put to get Maximum Profit.
7) At Equilibrium Level E -

OQ_1 + Q_1Q = OQ
(Domestic sales) (Foreign sales) (Total out Put sold)

8) In Home Market - OQ_1 out put at high Price OP_h is sold.
9) In Foreign market - Q_1Q out put is sold at Low Price OP_F.

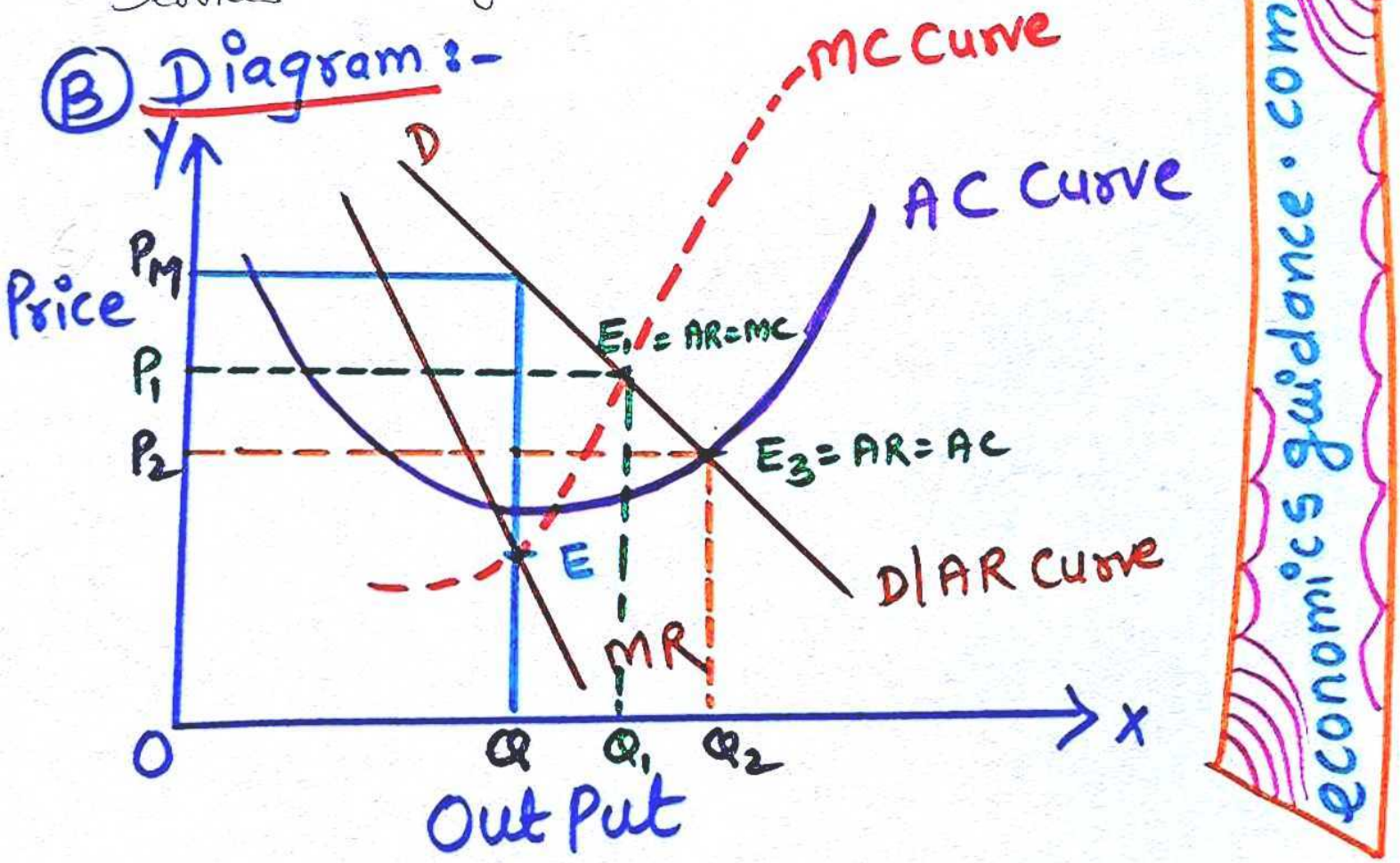
10) Thus due to dumping monopolist enjoys Maximum Profit of shaded area = AFEB.

Q:6 Explain Price discrimination by government regulated Monopoly ?

(A) Price Discrimination & Government Regulated Monopoly :-

When there is only one firm operating Lessthan optimal size due to small size of market, then it is known as Natural Monopoly. Under these Conditions, Government may try to provide goods and Services or try to control the price charged by monopolist.

(B) Diagram :-



economicsguidance.com

In the above diagram we observe —

1) A monopolist / Government can enjoy Excess Profit

at the Equilibrium - E where MR = MC. Here OQ output can be sold at High Price - OP_M.

2) Government may fix the Price OP_1 at the Equilibrium Level - E_1 where Price = AR = MC

3) In Very essential Services, Government may set the Price OP_2 at Equilibrium Level - E_2 where - Price = AR = AC. Here government may enjoy Normal Profit only.

4) Thus Government as a monopolist can also apply Policy of Price discrimination. It may Charge High Price to rich Consumers and Low Prices from Poor Consumers.

5) Generally government Succeeds in increasing their Production Capacity to satisfy growing demands of Population.

6) This types of Price discrimination is followed for Public Utility Services like - Electricity, Communication, Railways, Education, Health services and other government related goods and Services.

economicsguidance.com

Q:7 Select the Correct answer from the given alternatives.

1) Price Discrimination Refers to **Charging different Prices For Same Commodity to different buyers.**

a) Charging different Prices for different Commodities
b) Charging different Prices From Same buyers at different times
c) Charging different Prices for Same Commodity to different buyers.

2) First degree Price discrimination refers to **each Customer is charged different Price for the Same Commodity.**

a) each Customer is Charged different Price For the Same Commodity.
b) each market segment is Charged different Price
c) different Prices are Charged for Same Commodity in different market.

3) Price Discrimination is Possible when **all the above**

a) a Commodity is not-transferable
b) when Customers do not meet each other.
c) when Customers are ignorant about Price differentials.
d) all the above

4) Price Discrimination is Profitable when. **Elasticity differs in different market.**

a) Elasticity of Demand is the Same in different markets
b) Elasticity differs in different market
c) When demand in different markets is Perfectly elastic

5) A Price discriminating monopolist distributes Total output between the markets till the Point **Where MR in all the markets is Same.**

a) where MR in all the markets is Same.
b) where MR differs in different markets.
c) where AR in different markets is Same.

6) Dumping takes place when a monopolist **has monopoly in the home market and Competitive in World market.**

a) has monopoly in the world as well as Home market
b) has monopoly in the world market
c) has monopoly in the home market and Competitive world market.

7) Under dumping a monopolist's Demand Curve in the world market is **Perfectly Elastic**

a) Downward sloping and Less elastic
b) Perfectly elastic c) a Kinky demand Curve.

Q-8 State With reasons whether the Following Statements are True or False :—

1. For Price discrimination Product must differ in its Cost of Production

Ans:- **False. Reasons :- Q:1- A and B Part**

2. In First degree of Price discrimination each Customer is charged different Price For Same good or Service

Ans:- **True. Reasons : Q:1- C Part 1st Point**

3. Price discrimination is possible when Customers know each other and commodity is transferable.

Ans:- False. Reasons :- Q:2 - A Part 1st Point

4. Price discrimination is not possible if elasticity of demand is the same in different market

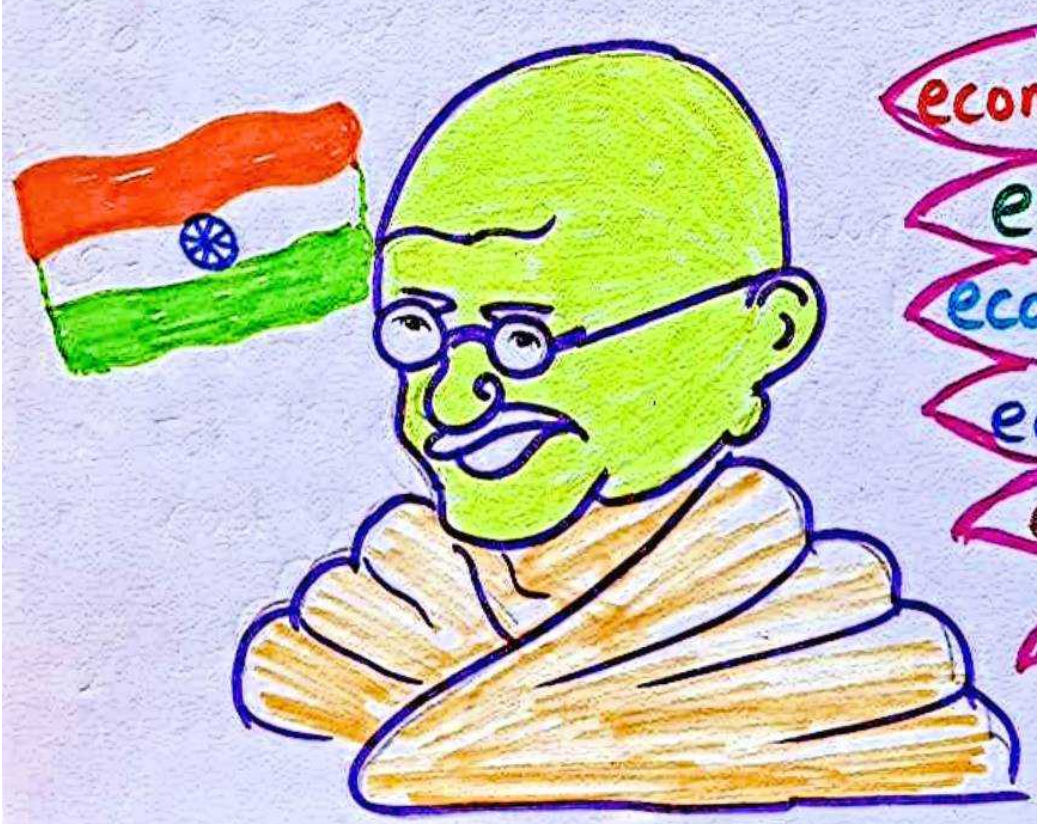
Ans:- True. Reasons :- Q:3 - 1st Point

5) Price discriminating Monopolist distributes his Output between the Two markets till AR is equal in both markets.

Ans:- False. Reasons:- Q:3 - 2nd Point

6) In dumping, a monopolist is a price taker in the world market.

Ans:- True. Reasons:- Q:5 - A Part



economicsguidance.com
economicsguidance.com
economicsguidance.com
economicsguidance.com
economicsguidance.com
economicsguidance.com