

Name:	
Enrolment No:	

**UNIVERSITY OF PETROLEUM AND ENERGY STUDIES**  
**End Semester Examination, December 2018**

**Course: Managerial Economics**  
**Programme: MBA-International Business**  
**Time: 03 hrs.**  
**Instructions:**

**Semester: I**  
**Course Code: ECON 7006**  
**Max. Marks: 100**

**SECTION A**

S. No.		Marks	CO
Q 1	Statement of question		CO1
A	As per Baumol's theory of the firm, the firms are 1. solely motivated to increase sales revenue 2. solely motivated to increase market share 3. aiming at maximizing sales subject to minimum acceptable profit	<b>01</b>	
B	We can say with certainty that when the demand for TVs increases in the long run, Prices 1. Will go down 2. Will go up, 3. Change proportionately 4. Cannot be predicted without knowledge of elasticity of demand.	<b>01</b>	
C	If demand is inelastic and price increases 1. total revenue will fall 2. total revenue will rise 3. total revenue will unchanged	<b>01</b>	
D	A Production function is used by management to know: 1. the amount of input to buy 2. the amount of input to use 3. the amount of output per unit of each input 4. the amount of output using all inputs efficiently	<b>01</b>	
E	Give the cost function $TC = 12000 + 20X - 15X^2 + 0.2X^3$ find out average fixed cost when $X = 800$ is given by 1. Rs. 15 2. Rs. 16 3. Rs. 17 4. Rs. 18	<b>01</b>	
F	Which of the following assumption is not necessary for the existence of perfect competition 1. product is homogenous 2. Buyers have no preference as between different sellers 3. Each producer is aware of the profits made by others. 4. Buyers have knowledge of prices in every part of the market	<b>01</b>	
G	Margin of Safety can be defined as	<b>01</b>	

	<ol style="list-style-type: none"> <li>1. Excess over Break Even sales</li> <li>2. Excess over sales</li> <li>3. Excess over Fixed Cost</li> <li>4. Excess over contribution</li> </ol>		
H	<p>Transfer Earnings are those incomes which</p> <ol style="list-style-type: none"> <li>1. are in the hands of individuals</li> <li>2. are not factor income</li> <li>3. are not generated by any production process</li> <li>4. All of them</li> </ol>	<b>01</b>	
I	<p>WPI was first developed in India in</p> <ol style="list-style-type: none"> <li>1. 1930</li> <li>2. 1931</li> <li>3. 1932</li> <li>4. 1933</li> </ol>	<b>01</b>	
J	<p>From the following, identify which one is not, Trade Cycle characteristics</p> <ol style="list-style-type: none"> <li>1. Time frame of several years</li> <li>2. Recurring Nature</li> <li>3. The uptrend is fast and acute but the down trend is slow and gradual</li> <li>4. Business cycle starts at a place and time.</li> </ol>	<b>01</b>	

State whether True or False:

1	Cross demand tells the relationship between the price and demand for commodity.		
2	Demand is likely to be more sensitive to price over a short period than a long period.	<b>01</b>	
3	For an inferior good, an increase in income shifts the budget line leftward.	<b>01</b>	
4	A good with a high relative price must have a low opportunity cost.	<b>01</b>	
5	The expansion path of production theory is similar to the income consumption curve in the theory of consumption.	<b>01</b>	
6	The Break Even Point simply indicates the point where a firm will be getting neither profit nor loss, such that if the firm was to expand its output beyond this level, it will earn profit and vice versa.	<b>01</b>	
7	If the firm's price is below a firm's minimum ATC, it immediately shut down.	<b>01</b>	
8	National Income at current prices reflects inflated income.	<b>01</b>	
9	For the player in the perfect competition market can earn abnormal profit in the long run.	<b>01</b>	
10	Inflation makes losses to the businessman and profits to the salaried class.	<b>01</b>	

### SECTION B

Q.2	SHORT ANSWER QUESTIONS: Attempt any Four questions.		<b>CO2</b>
A	The demand function of potatoes is $Q = 20 - 2P$ . The initial price of potatoes was Rs. 4 per Kg. if the price increases by 20%. Find elasticity of demand?	<b>05</b>	
B	How do changes in income affect the slope of the budget constraint? Explain with the help of a diagram?	<b>05</b>	
C	Give diagrammatic presentation of 'Expansion Path'?	<b>05</b>	
D	The Average Cost of producing 10 units is Rs. 30, while the Average Cost of producing 20 units is Rs. 20. Find the Average Cost of producing 30 units.	<b>05</b>	

E	Is Inflation a process or effect?	05	
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**SECTION-C**

Q.3	<b>LONG ANSWER QUESTIONS: Attempt any three questions</b>		<b>CO3</b>
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A)	<p>The cost and profit details of XYZ Company Limited for the year 2000 are as follows:</p> <table style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 60%;">Net Sales (30,000 units)</td> <td style="text-align: right;">Rs. 1,20,000</td> </tr> <tr> <td colspan="2"><b>Cost of Goods Sold</b></td> </tr> <tr> <td>Variable</td> <td style="text-align: right;">Rs. 50,000</td> </tr> <tr> <td>Fixed</td> <td style="text-align: right;">Rs. 20,000</td> </tr> <tr> <td>Gross Profit</td> <td style="text-align: right;">Rs. 50,000</td> </tr> <tr> <td colspan="2"><b>Selling Cost:</b></td> </tr> <tr> <td>Variable</td> <td style="text-align: right;">Rs. 10,000</td> </tr> <tr> <td>Fixed</td> <td style="text-align: right;">Rs. 5,000</td> </tr> <tr> <td>Net Profit</td> <td style="text-align: right;">Rs. 35,000</td> </tr> </table> <p>From the above particulars, calculate:</p> <ol style="list-style-type: none"> <li>a) Break Even Point</li> <li>b) The profit for the sales of Rs. 1,50,000 and Rs. 1,00,000</li> <li>c) What would be the sales volume to earn a net profit of Rs. 40,000</li> </ol>	Net Sales (30,000 units)	Rs. 1,20,000	<b>Cost of Goods Sold</b>		Variable	Rs. 50,000	Fixed	Rs. 20,000	Gross Profit	Rs. 50,000	<b>Selling Cost:</b>		Variable	Rs. 10,000	Fixed	Rs. 5,000	Net Profit	Rs. 35,000	<b>10</b>	
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B)	If Demand is elastic, comparatively lower price will benefit the businessman, if the demand is inelastic, higher Prices would be better for him.” Elucidate this statement and examine the role of price elasticity in business decision.	<b>10</b>	
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C)	What is the use of mathematics in economic analysis? Explain with the help of maxima and minima and explain different conditions in which shape of curves varies?	<b>10</b>	
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D)	<p>The following table presenting short run production function. You are required to :</p> <table border="1" style="margin-left: auto; margin-right: auto;"> <tr> <td rowspan="8" style="text-align: center; vertical-align: middle;"><b>CAPI TAL</b></td> <td style="text-align: center;">6</td> <td style="text-align: center;">122</td> <td style="text-align: center;">173</td> <td style="text-align: center;">212</td> <td style="text-align: center;">245</td> <td style="text-align: center;">274</td> <td style="text-align: center;">300</td> </tr> <tr> <td style="text-align: center;">5</td> <td style="text-align: center;">112</td> <td style="text-align: center;">158</td> <td style="text-align: center;">194</td> <td style="text-align: center;">224</td> <td style="text-align: center;">250</td> <td style="text-align: center;">274</td> </tr> <tr> <td style="text-align: center;">4</td> <td style="text-align: center;">100</td> <td style="text-align: center;">141</td> <td style="text-align: center;">173</td> <td style="text-align: center;">200</td> <td style="text-align: center;">224</td> <td style="text-align: center;">245</td> </tr> <tr> <td style="text-align: center;">3</td> <td style="text-align: center;">87</td> <td style="text-align: center;">122</td> <td style="text-align: center;">150</td> <td style="text-align: center;">173</td> <td style="text-align: center;">194</td> <td style="text-align: center;">212</td> </tr> <tr> <td style="text-align: center;">2</td> <td style="text-align: center;">71</td> <td style="text-align: center;">100</td> <td style="text-align: center;">122</td> <td style="text-align: center;">141</td> <td style="text-align: center;">158</td> <td style="text-align: center;">173</td> </tr> <tr> <td style="text-align: center;">1</td> <td style="text-align: center;">50</td> <td style="text-align: center;">71</td> <td style="text-align: center;">87</td> <td style="text-align: center;">100</td> <td style="text-align: center;">112</td> <td style="text-align: center;">122</td> </tr> <tr> <td style="text-align: center;">0</td> <td style="text-align: center;">1</td> <td style="text-align: center;">2</td> <td style="text-align: center;">3</td> <td style="text-align: center;">4</td> <td style="text-align: center;">5</td> <td style="text-align: center;">6</td> </tr> <tr> <td colspan="8" style="text-align: center;"><b>LABOUR</b></td> </tr> </table> <ol style="list-style-type: none"> <li>1. Identify Iso quants</li> <li>2. Explain Marginal rate of technical substitution of capital for labour.</li> <li>3. Explain the law of variable proportions with the help of above informations.</li> </ol>	<b>CAPI TAL</b>	6	122	173	212	245	274	300	5	112	158	194	224	250	274	4	100	141	173	200	224	245	3	87	122	150	173	194	212	2	71	100	122	141	158	173	1	50	71	87	100	112	122	0	1	2	3	4	5	6	<b>LABOUR</b>									
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**SECTION-D**

Q.4	<b>Read and analyze the following the market problem carefully:</b>		<b>CO4</b>
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**Continental Airlines**

When considering adding a new flight (or dropping an existing one that appears to be doing poorly). Continental engages in a very thorough incremental analysis along the lines given in the table.

**Incremental Analysis as Employed by Continental Airlines**

Problem	Shall Continental run an extra daily flight from City X to City Y?	
The Facts	Fully allocated costs of this flight	\$ 4,500
	Out-of-pocket costs of this flight	\$ 2,000
	Flight should gross	\$ 3,100
Decision	Run the flight. It will add \$ 1,100 to net profit by adding \$3,100 to revenues and only \$ 2,000 to costs. Overheads and other costs totaling \$2,500 (\$ 4,500 minus \$ 2,000) would be incurred whether the flight is running or not. Therefore, fully allocated or “average” costs of \$ 4,500 are not relevant to this business decision. The out-of-pocket or incremental costs count.	

The corporate philosophy is clear: “If revenues exceed out-of-pocket costs, put the flight on.” In other words, Continental compares the out-of-pocket”, or incremental, costs associated with each proposed flight to the total revenues generated by that flight. An excess of revenues over incremental costs leads to a decision to add the flight to Continental’s Schedule.

The “out-of-pocket costs” figures that Continental uses is obtained by circulating a proposed schedule for the new flight to every operating department concerned and finding out what added expenses will be incurred by each of them. Here an alternative cost concept is used. If a ground crew is on duty and between work on other flights, the proposed flight is not charges a penny of their salary. Some costs may even be reduced by the additional flight. For example, on a late night round trip flight between Colorado Springs and Denver, Continental often flies without any passengers and with only a small amount of freight. Even without passenger revenues, these flights are profitable because their net costs are less than the rent for overnight space at Colorado Springs.

On the revenue side, Continental considers not only the projected revenues for the flights but also the effect on revenues of competing and connecting flights on the Continental Schedule. Several Continental flights that fail to cover even their out-of-pocket costs directly bring in passengers for connecting long-haul service. When the excess of additional revenue over cost on the long-haul flight is considered, Continental earns a positive net profit on the feeder service.

Continental’s use of incremental analysis extends to its scheduling of airport, arrival and departure times. A proposed schedule for the Kansas City at that time was not sufficient to service two plans simultaneously. Continental would have been forced to lease an extra fuel truck and to hire three new employees at an additional monthly cost of \$ 1,800. However, when Continental began shifting around proposed departure times in other cities to avoid the congestion at Kansas City, it appeared that the company might lose as much as \$ 10,000 in monthly revenues if passengers switched to competing flights leaving at hours that are more convenient. The two flights were scheduled to be on the ground at the same time in Kansas City.

Discuss how Continental Airlines used incremental analysis in its flight service decisions and demonstrate the usefulness of the technique.