


Name:		
Enrolment No:		
<b>UNIVERSITY OF PETROLEUM AND ENERGY STUDIES</b> <b>Online End Semester Examination, June 2021</b>		
Course: <b>Microeconomics Analysis-II</b>		Semester: <b>II</b>
Program: <b>MA Economics</b>		Time: <b>03 Hours.</b>
Course Code: <b>ECON7015</b>		Max. Marks: <b>100</b>
<b>SECTION A</b> <b>Each question carries 5 marks. Instruction: Answer should be short and precise.</b>		
S. No.	Question	CO
Q1	Is Cournot solution stable? How much each firm will supply to the market if there are only two firms? What will the price as compared to the price in monopoly and perfectly competitive market?	CO1
Q2	What is an isoprofit curve? What does the reaction curve show?	CO1
Q3	How Bertrand duopoly model is different from that of Cournot's model? Does Bertrand's model lead to a stable equilibrium? Does Bertrand's model lead to the maximisation of the industry profit?	CO1
Q4	What is the Pareto-optimality criterion of social welfare? What are the limitations of this criterion?	CO1
Q5	What is Stackelberg's disequilibrium? What is its effect? In which situation the result is a determinate equilibrium.	CO1
Q6	Define general equilibrium. When general equilibrium exists?	CO1
<b>SECTION B</b> <b>Each question carries 10 marks.</b>		
Q 7	Explain the Chamberlin's oligopoly model.	CO2
Q 8	Assume that the market demand is $P = 100 - 0.5Q$ , where $Q = q_1 + q_2$ ( $q_1$ is output of Firm 1 and $q_2$ denotes output of Firm 2. The two firms are colluding. The cost functions of both the firms are given as: $C_1 = 5q_1$ and $C_2 = 5q_2$ . The cartel aims at maximisation of joint profit. Find the equilibrium output of the respective firms, the market price and the joint profit.	CO3
Q 9	State the reasons why industry profits may not be maximised even with direct collusion.	CO3
Q 10	Examine the marginal conditions that must be satisfied in order to attain a Pareto-efficient situation in an economy.	CO3

Q 11	What are the problems that arise in connection with a general equilibrium? Under what conditions the equilibrium exists and it is stable and unique.	CO2
<b>Section C</b> <b>This question carries 20 Marks.</b>		
Q12	<p>Assume that the demand function in a duopoly market is <math>P = 150 - Q</math>, where <math>Q = q_1 + q_2</math> (<math>q_1</math> is output of Firm 1 and <math>q_2</math> denotes output of Firm 2. Both firms have same cost of production: <math>C = 30q_i</math> .</p> <p>(a) Find the equilibrium output of each firm when Firm 1 chooses output first and Firm 2 is the follower. Calculate the profits of Firm 1 and Firm 2.</p> <p>(b) Find the Cournot's solution (output, price and profits of each firm).</p>	CO4