UNIVERSITY OF PETROLEUM AND ENERGY STUDIES
Online End Semester Examination, May 2021

Course: Computer Applications in Pharmacy   **Semester: 2nd**
Program: BPharma   **Time 2 hrs.**
Course Code: BP205T   **Max. Marks: 50**

SECTION A

S. No.	CO	Long Answers (Answer 2 out of 3)	Marks (20)
1	CO5	Mr. Joseph is handling the position of System Administrator of a Hospital. He has a responsibility to manage the following: 1. Patient Registration 2. Payroll and HR Management 3. Appointment Management 4. Telemedicine Management 5. Pharmacy Management In your opinion, Mr. Joseph should follow which architecture/processes so that each of the responsibility can be effectively and efficiently managed. Justify your answer by providing suitable illustrations.	**10** **(2+2+2+2+2)**
2	CO2	A teacher Mr. ABC is required to maintain the record of marks of the students studying in the Bioinformatics subject. As a database administer, Mr. ABC has decided that • Name of the database – Bioinformatics • Name of the table – GRADES • The attributes of GRADES are as follows: RNo - numeric Name – character of size 20 Marks – numeric **Table: GRADES** <table><tr><td>RNo</td><td>Name</td><td>Marks</td></tr><tr><td>15</td><td>Pankaj</td><td>85</td></tr><tr><td>14</td><td>Shekhar</td><td>85</td></tr><tr><td>11</td><td>Manjeet</td><td>84</td></tr><tr><td>12</td><td>Gagan</td><td>97</td></tr><tr><td>10</td><td>Hargun</td><td>90</td></tr></table> (1) Identify the attribute which defines the table uniquely. (2) Write the query in SQL to delete the following data from the given table GRADES.	**10** **(2+3+2+3)**

		RNo = 12, Name = "Gagan" and Marks = 97 (3) Mr. ABC want to insert another table GRADES2 in the database Bioinformatics. Which command will he use? (4) Mr. ABC wants to display the list of all the tables that exists in the database Bioinformatics. Write the query in SQL to display the same.	
3	CO3	Differentiate between central patient monitoring system and constant patient monitoring system on the basis of roles, processes and architecture.	**10**
		SECTION B	
		Short Answers (Answer 6 out of 8)	**Marks (30)**
4	CO3	Describe the role of computer in automated dispensing of drugs.	**5**
5	CO4	The storage and retrieval of biological data plays a vital role in the management of biological information. Explain various ways how the biological data can be effectively organized and managed.	**5**
6	CO4	Discuss impact of bioinformatics as data analysis in Vaccine Discovery.	**5**
7	CO1	Explain decimal number system and binary number system and their interconversions steps in detail with the help of an example.	**5**
8	CO5	Explain how intelligent patient information monitoring system uses Artificial Intelligence to simulate the way medical professionals analyze and draw decisions in patient care?	**5**

9	CO1	Perform:
		    a) $(101101)_2 + (1001)_2$
		    b) $(10001)_2 * (101)_2$
			5

10	CO2	If you want to display some data in list, which HTML tags will be used? Explain the tags with example.	**5**

11	CO4	Explain how the application of bioinformatics will help in:
		        a) Analysis of Microbes
		        b) Antibiotic Resistance
		        c) Gene Therapy
		        d) Microbial Genome Applications
		        e) Preventive Medicine
			5