QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

MID-SEMESTER EXAMINATION OF SECOND SEMESTER – FIRST YEAR (2nd) 2023, 22 BATCH, B E (SW)

SUBJECT: OBJECT ORIENTED PROGRAMMING

Dated: 08.09.2023 Maximum Marks: 20 Time Allowed: 01 Hour.

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No.		Question	CLOs	Taxonomy Level	PLOs	Marks
Q. 01	(a)	Explain the basic principles, advantages, and key features of Object-Oriented Programming (OOP) in software development. Provide examples where applicable to support your explanations.	1	C2	1	04
	(b)	Briefly describe the following key concepts of object oriented programming: 1. Methods and their significance in Java 2. Differentiate between default and parameterized constructors 3. Static, final and extends keywords	1	C1	1	06
Q. 02		**Solve the BMI calculator case-study:** The body mass index (BMI) is used to estimate the risk of weight-related problems based on a subject's height and mass, which is calculated as BMI=mass/height^2 Note: In this formula, mass is in kilograms and height is in meters. The health risk associated with a BMI value is • Underweight < 18.5 • Normal weight ≥ 18.5 and < 25 • Overweight ≥ 25 and < 30 • Obese ≥ 30 **Hint:** In this case study three classes are required 1. **Person class:** represents an individual with attributes such as name, weight (in pound), and height (in feet and inches). **Note:** a. Convert weight from pounds to kilograms (One kilogram is 2.2 pounds) b. Convert height to inches, and then multiply by 0.0254 to convert inches into meters). 2. **BMICalculator class:** Contains methods for calculating BMI and interpreting BMI values. 3. **Main class** demonstrates how to use the Person and BMICalculator classes. It creates a Person object with specific weight and height values, calculates the BMI, and interprets it.	1	C3	1	10

The End

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

MID-SEMESTER EXAMINATION OF SECOND SEMESTER – FIRST YEAR (2ND) 2023, 22 BATCH

B.E (BAE / CS / SW) / B.S (CHM)

SUBJECT: ISLAMIC STUDIES / ETHICS

Dated: 07.09.2023 Maximum Marks: 10 Time Allowed: 45 Minutes

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No.	Question	CLO	Taxonomy Level	PLO	Marks
	ISLAMIC STUDIES (FOR MUSLIMS)				
Q. 01	Describe the all qualities of believers in the light of Surah Furqan.	1	C1	6	05
Q. 02	Attempt any TWO of the following Surah: 1. Write down the commandments of Surah Al-Ana'am. 2. Describe the qualities of believers in the light of Surah Al-Momnoon. 3. Write the Surah Hujrat related to the manners in the respect of Holy Prophet (S.A.W) and mention the actions which indicate the betterment for society.	1	C2	6	05
	ETHICS (FOR NON-MUSLIMS)				
Q. 01	Write down about the religion Hinduism and mention religious festivals of Hinduism.	1	C1	6	05
Q. 02	Attempt any ONE of the following: 1. Write down the life history of Gotham Buddha. 2. Describe the value of Ethics in all religions.	1	C2	6	05

Best Wishes

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

MID-SEMESTER EXAMINATION OF SECOND SEMESTER – FIRST YEAR (2ND) 2023, 22 BATCH.

B.E (CS / SW / TC) / B.S (MS / ENG / DS / AI)

SUBJECT: PAKISTAN STUDIES

Dated: 07.09.2023 Maximum Marks: 10 Time Allowed: 45 Minutes.

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No.	QUESTION	CLOs	Taxonomy Level	PLOs	Marks
Q. 01	Discuss why "Khilafat Movement was an emotional movement".	1	C1	8	05
Q. 02	Write the short note on the following: a) Simla Deputation b) Lucknow Pact 1916	1	C1	8	05

Good Luck

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

MID-SEMESTER EXAMINATION OF SECOND SEMESTER – FIRST YEAR (2nd) 2023, 22-BATCH, B.E (ES/SW)

SUBJECT: COMMUNICATION SKILLS

Date: 05.09.2023 Maximum Marks: 10 Time Allowed: 45 Minutes

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q No		CLO	Taxonomy Level	PLO	Marks
01	Explain any four levels of Communication.	1	C1	1	05
02	What is the importance of communication in academic life? Discuss in detail.	2	C1	1	05

The End

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

FINAL SEMESTER REGULAR EXAM OF SECOND SEMESTER – FIRST YEAR (2K SEM.) DEGREE IN BE (SW / ES)

SUBJECT: COMMUNICATION SKILLS

Dated: 10.11.2023 Maximum Marks: 30 Time Allowed: 02 Hours

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q No	Question	CLO	Taxonomy Level	PLO	Marks
Q. 01	What is nonverbal communication? Discuss in detail various types of nonverbal communication.	1	A3	10	10
Q. 02	Suggest some methods to overcome barriers to communication.	1	A4	10	10
Q. 03	Write short note on the following: 1. Encoding Message 2. Decoding Message 3. Communication Channels 4. Feedback	2	A4	10	10

Good Luck

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

MID-SEMESTER EXAMINATION OF SECOND SEMESTER – FIRST YEAR (2ND) 2023, 22-BATCH, B.E (SW)

SUBJECT: LINEAR ALGEBRA AND ANALYTICAL GEOMETRY

Dated: 06.09.2023 Maximum Marks: 20 Time Allowed: 01 Hour.

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No		CLO	Taxonomy Level	PLO	Marks
01(a)	A matrix has 10 elements. How many matrices of different order can be formed from these elements also write them	1	C1	3	04
01(b)	Why we use identity matrix? also find the rank of the matrix by using elementary row operations. $A=\begin{bmatrix}1 & 2 & 3\\ 2 & 4 & 7\\ 3 & 6 & 10\end{bmatrix}$	1	C2	3	06
02(a)	Formulate the system of linear equations from chemical equation. $C_3H_8+O_2\rightarrow CO_2+H_2O$	1	C3	3	08
02(b)	Is it possible to find the multiplication of any two matrices? If yes give one example.	1	C2	3	02

---Good Luck---

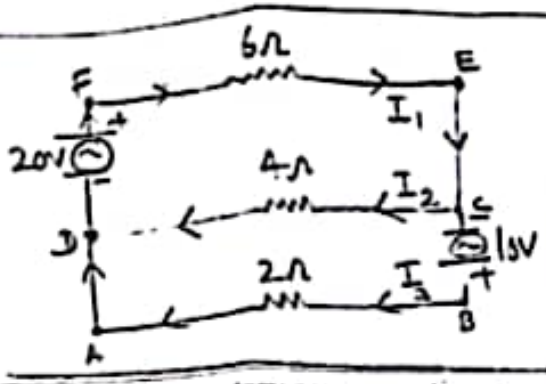
QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

FINAL SEMESTER REGULAR EXAM OF SECOND SEMESTER – FIRST YEAR (2nd SEM.) 2023 OF 22-BATCH B.E (SW)

SUBJECT: LINEAR ALGEBRA AND ANALYTICAL GEOMETRY

Dated: 10.11.2023 Maximum Marks: 60 Time Allowed: 3 Hours

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No		CLO	Taxonomy Level	PLOs	Marks
01(a)	Apply Kirchhoff's laws to find the current in each branch of the circuit shown in the following figure: 	3	C3	2	08
01(b)	Find the inverse of the matrix by elementary row operations $A=\begin{bmatrix}1 & 0 & 3\\ 2 & 4 & 1\\ 1 & 3 & 0\end{bmatrix}$	2	C2	2	04
02(a)	Define linearly dependent and independent vectors, prove that the following system of vectors in $V_3(R)$ are linearly independent $v_1=(1,2,-3), v_2(1,-3,2), v_3=(2,-1,5)$	2	C2	2	06
02(b)	Without expanding prove that $A=\begin{vmatrix}x & a & a & a\\ a & x & a & a\\ a & a & x & a\\ a & a & a & x\end{vmatrix}=(x-a)^3(x+3a)$	2	C2	2	06
03(a)	Find the ratio in which the yz-plane divides the segment joining the points A(-2,4,7) and B(3,-5,8).	2	C2	2	02
03(b)	Find the point of intersection of pair of lines L and M given by: L: through A (2, -1, 0) and parallel to b= [4, 3, -2] M: through B (-1, 3, 5) and parallel to c= [1,7,3]	2	C2	2	05
03(c)	Find the direction cosines of a line passing through the points $(-1,1,\sqrt{2})$ and $(1,2,\sqrt{2})$	2	C2	2	05
04(a)	Convert the equation of plane $2x-3y-z+7=0$ (i) intercept form (ii) normal form.	2	C2	2	05
04(b)	Differentiate between rectangular & Polar coordinates	2	C2	2	02
04(c)	Find the cylindrical coordinate of the point whose rectangular coordinates are $\left(\frac{16}{5},\frac{12}{5},1\right)$	2	C2	3	05
05	Define Eigen values and Eigen vectors, Find the eigen vector corresponding to each eigen value of the following matrix $A=\begin{bmatrix}1 & 4\\ 2 & 3\end{bmatrix}$	2	C2	2	12

The End

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

FINAL SEMESTER REGULAR EXAM OF SECOND SEMESTER – FIRST YEAR (2nd SEM.) 2023 OF 22 BATCH B.E (SW)

SUBJECT: INTRODUCTION TO SOFTWARE ENGINEERING

Dated: 16.11.2023 Maximum Marks: 60 Time Allowed: 03 Hour

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

	Question	CLO	PLO	Level	Marks
Q. 01	Define the following: 1. Principles of Agile Software Development 2. UML & its features for Software Modeling	CLO1	1	C1	12
Q. 02	Discuss all steps involved in XP (eXtream Programming) release cycle diagram by highlighting the four key practices.	CLO2	1	C2	12
Q.03	Demonstrate how three types of 'Non-Functional Requirements' can be produced for a MentCare System. Also, enlist six metrics for defining 'Non-Functional Requirements' of a project.	CLO3	1.5	C3	12
Q.04	Differentiate between RISC & CISC. Also, draw the five basic type of UML diagrams with a suitable example of each.	CLO3	1.5	C3	12
Q.05	Draw & explain the following: I. 'Activity Model' of an Insulin Pump Operation II. State Diagram of a Microwave Oven	CLO3	1.5	C3	12

— The End —

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

FINAL SEMESTER REGULAR EXAMINATION OF SECOND SEMESTER – FIRST YEAR, 2023 OF 22 BATCH, B.E (SW)

SUBJECT: OBJECT ORIENTED PROGRAMMING

Dated: 23.11.2023 | Maximum Marks: 60 | Time Allowed: 3 Hours

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No.		Question	CLOs	Taxonomy Level	PLOs	Marks
Q. 01		Explain how the principles of encapsulation, polymorphism, abstraction, and inheritance contribute to the effectiveness and flexibility of object-oriented programming. Provide examples to illustrate how each of these pillars enhances code organization, reusability, and overall system design.	CLO1	C2	1	12
Q. 02	(a)	Explain the difference between constructors and methods in object-oriented programming. Why is it important to understand when and why to use each of them in your code?	CLO2	C2	2	4
	(b)	Write a Java program that illustrates the application of the student class constructor, utilizing it to initialize variables (id, name, age, marks), and the display method to showcase the student information. Note: Create an instance of the class, set its attributes using the constructor, and then utilize the display method to showcase the student's details, including whether the student has passed.	CLO2	C2	2	8
Q.3	(a)	Explain the concept of method overloading in object-oriented programming (OOP). Provide a detailed example in Java, demonstrating how method overloading allows you to define multiple methods with the same name but different parameters.	CLO2	C2	1	6
	(b)	Compare and contrast the concepts of **method overloading** and **method overriding** in object-oriented programming. Explain the key differences between the two, highlighting scenarios where each is most appropriately used.	CLO2	C2	1	4
Q.4	(a)	Discuss the concept of inheritance in object-oriented programming (OOP) and explain its importance in software design.	CLO3	C2	1	6
	(b)	Explain the any three of the following 1. Interface 2. Abstract class 3. Except Handling 4. Enum 5. JavaFX	CLO3	C2	1	6
Q.5		Examine the implementation details of the MAZDOOR case study, an app designed for registering labor on daily wages. Explore the key features of the app, such as the registration process, nature of employment, working day and non-working day calculations, and the amount calculation for each labor.	CLO3	C2	3	12

Good Luck

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

FINAL SEMESTER REGULAR EXAM OF SECOND SEMESTER – FIRST YEAR (2nd SEM.) 2022 OF 22 BATCH

BE (CS / SW) / BS (Chem)

SUBJECT: ISLAMIC STUDIES / ETHICS

Dated: 20.11.2023 Maximum Marks: 30 Time Allowed: 02 Hours

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS

Q No	QUESTION	CLO	Taxonomy Level	PLO	Marks
	ISLAMIC STUDIES (FOR MUSLIMS)				
Q. 01	Describe the importance of Tauheed and write all its types in detail.	2	A3	8	10
Q. 02	Describe the Honour of Holy Prophet (Namoos-e-Risalat) in the light of Quran in detail.	2	A3	8	10
Q. 03	Describe the meaning of Zakat and importance of Zakat in Quran and Hadith and write its ratio (Nisab) and deserving people of Zakat.	3	A2	12	10
	ETHICS (FOR NON-MUSLIMS)				
Q. 01	Describe the history of Hinduism and its religious festivals.	2	A3	8	10
Q. 02	Describe the life history of Jesus Christ and write the main teachings of Christianity.	2	A3	8	10
Q. 03	Write short notes on the following: 1. Ethical teachings of Islam 2. Ten commandments of Prophet Moses 3. Caste System in Hinduism	3	A2	12	10

Good Luck

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, NAWABSHAH

FINAL -SEMESTER EXAMINATION OF SECOND SEMESTER – FIRST YEAR (2nd) 2021-22 BATCH.

B.E (CS / SW / TC) / B.S (MS / ENG / DS / AI)

SUBJECT: PAKISTAN STUDIES

Dated: 20.11.2023 Maximum Marks:30 Time Allowed: 2Hours

NOTE: ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No.	QUESTION	CLOs	Taxonomy Level	PLOs	Marks
Q. 01	Write the silent features of 1973 constitution and discus the 18th amendment.	3	C1	8	10
Q. 02	What are the main cause of separation of east Pakistan?	2	C1	8	10
Q.03	Highlight one important historical event in Pak-Afghan relations and briefly mention the current challenge they face .	3	C2	8	10

Good Luck

QUAID-E-AWAM UNIVERSITY OF ENGINEERING, SCIENCE & TECHNOLOGY, N

SECOND SEMESTER-FIRST YEAR M.D-SEMESTER EXAMINATION 2023 OF 22-BATCH B.E

SUBJECT: INTRODUCTION TO SOFTWARE ENGINEERING

04.09.2023 Maximum Marks: 20 Time All

ATTEMPT ALL QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

	Question	CLO	PLO
(a)	Describe the two basic reasons behind failure of a software project	1	1
(b)	Define the following terms: 1. Fundamental Activities of Software Engineering 2. Key challenges of Software Engineering	1	1
a)	Discuss the ethical issues faced by Software Engineers	2	1
b)	Draw the diagram of Increment Development Model and discuss steps involved	2	1

--- The End ---