

DAWOOD UNIVERSITY OF ENGINEERING & TECHNOLOGY

KARACHI

MID-TERM EXAMINATION OF BS CYBER SECURITY OF 1ST SEMESTER, 1ST YEAR, 2024 BATCH.

FUNCTIONAL ENGLISH

MAX. Marks 15

DATED: 14-11-2024

TIME ALLOWED: 45 Minutes

Student Name: _____

Student ID Number : _____

Instructions:

1. This paper contains 03 questions.
2. Use of Calculator is _____ (allowed / not allowed)
3. Cheating of any type will disqualify the candidate.
4. Do not detach the sheets. (Paper will be cancelled, if the sheets are detached).
5. Write your answers in ink. For drawing pencils may be used.
6. The work must be neat & clean.
7. Exchange / Borrow of Calculator or Stationary is not allowed.
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9. The Answer Script must be returned back to invigilator before leaving exam hall.

NOTE; - ATTEMPT ALL THE FOLLOWING QUESTIONS.

Q.1 Write the form of the verb specified in parentheses.

(05 Marks, CLO-2, PLO 10)

1. Before Mr. Kaufman's fourth child was born he (buy / past perfect) a heavy-duty clothes washer.
2. Unfortunately, Adam (forget/ past perfect) to attend his memory skills seminar.
3. By this time tomorrow, Tim (drive / future perfect) across four states.
4. Ira showed me the rubber snake he (win / past perfect) at the state fair.
5. Scientists (measure / present perfect) winds of more than 150 miles an hour during severe thunderstorms.
6. He (offer/ past indefinite) his friend to stay in his apartment during summer vacations.
7. By Tuesday I (spend / future perfect) my whole paycheck.
8. Arthur (take / present perfect) four days off this week in order to participate in a croquet tournament.
9. By next year Eloise and Isaac (build / future perfect) their own log cabin.
10. Carmel's mathematics professor (inspire / present perfect) her to become a math major.

Q2. Change the following from active to passive (if possible)

(05 Marks, CLO-2, PLO 10)

- (1) They had delivered the mail in the morning.
- (2) Sana bought this camera from Japan.
- (3) Workers are painting my office today.
- (4) The cat died yesterday.
- (5) The police were investigating the cause of the accident.
- (6) He will write a report.
- (7) Ann kicked the ball.
- (8) He sent a letter to the customers.
- (9) Open the window.
- (10) Who has broken this.

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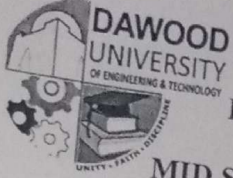
Q.3 (a) Analyze the following sentences by using or identifying parts of speech:
(05 Marks, CLO-1, PLO 10)

- 1) I want to work on a national newspaper or edit a magazine.
- 2) You were the first teacher who seriously engaged my attention.
- 3) How do you deal with stress on the job?
- 4) I have been thinking about you a lot recently.
- 5) However, I'm glad to see there are so many good people teaching too!
- 6) Remember– the job interview is a two-way discovery process

(b) Fill in the correct prepositions.

- 1) My brother's birthday is ----- the 5th of November.
- 2) We are going to see my parents ----- the weekend.
- 3) I don't like walking alone in the streets ----- night.
- 4) What are you doing -----the afternoon?
- 5) My friend has been living in Canada----- two years.
- 6) I have been waiting for you ----- seven o'clock.

The End



DAWOOD UNIVERSITY OF ENGINEERING & TECHNOLOGY, KARACHI

MID SEMESTER EXAMINATION 2024 OF 1st SEMESTER, 1st YEAR (2024F BATCH)
OF B.S. (CYBER SECURITY)

PROGRAMMING FUNDAMENTALS (THEORY)

DATED 15-11-2024

TIME ALLOWED 90 MINUTES

MAX. MARKS 30

Student Name : _____

Student Id Number : _____

Instructions:

1. This paper contains **04** questions.
2. Use of Calculator is _____ (allowed / not allowed)
3. Cheating of any type will disqualify the candidate.
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NOTE; - ATTEMPT ALL THE FOLLOWING QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

Q. No.		CLO Assessed	Marks
01	Define the main purpose of the Von Neumann architecture.	CLO-1	[5]
02	Describe the importance of a bus in the Von Neumann architecture.	CLO-1	[5]
03	Distinguish between a compiler and an interpreter.(each 5 points)	CLO-2	[5]
04	<p>Write the Flowchart and Pseudocode</p> <pre>def linear_search(arr, target): for i in range(len(arr)): if arr[i] == target: return i # Return the index if found return -1 # Return -1 if the target is not in the list # Example usage arr = [3, 5, 2, 9, 1] target = 9 result = linear_search(arr, target) if result != -1: print(f"Element found at index {result}") else: print("Element not found in the list")</pre>	CLO-1	[15]

THE END

DAWOOD UNIVERSITY OF ENGINEERING & TECHNOLOGY, KARACHI
MIDTERM EXAMINATION OF 1st SEMESTER, FINAL YEAR OF 2024-F BATCH OF
BSc, DEPARTMENT OF CYBER SECURITY, 2024.

INTRODUCTION TO INFORMATION AND COMMUNICATION
TECHNOLOGIES (THEORY)

DATED 13-11-2024

TIME ALLOWED 45 MINUTES

MAX. MARKS 15

Student Name: _____

Student Id Number: _____

Instructions:

1. This paper contains 02 questions.
2. Use of Calculator is allowed.
3. Cheating of any type will disqualify the candidate.
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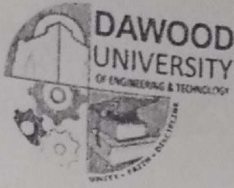
NOTE: - ATTEMPT ALL THE FOLLOWING QUESTIONS.

Q1. Briefly describe computer generations, provide a real-world example of how computers were used during that period.

(Level-I, CLO-1), (7.5)

Q2. Explain the types of software also write the suitable examples of each and describe how they support daily operations or improve productivity.

(Level-II, CLO-2), (7.5)



DAWOOD UNIVERSITY OF ENGINEERING & TECHNOLOGY, KARACHI
MIDTERM EXAMINATION OF 1st SEMESTER 1st YEAR OF 24th BATCH
DEPARTMENT OF CYBER SECURITY
APPLIED PHYSICS (THEORY)

DATED: 11-11-2024 TIME ALLOWED: 90 MINUTES MAX. MARKS 30

Student Signature: _____

Student Id Number _____

Instructions:

1. This paper contains four questions.
2. Use of the Calculator is allowed.
3. Cheating of any type will disqualify the candidate.
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6. The work must be neat & clean.
7. Exchange / Borrowing of Calculator or Stationery is not allowed.
8. Mobile Phones must be powered off and submitted at the given counters during the exam.
9. The Answer Script must be returned to the invigilator before leaving the exam hall.

NOTE: - ATTEMPT ALL THE FOLLOWING QUESTIONS

- Q # 01 (a) What is momentum? State and explain law of conservation of momentum. (CLO 2, PLO2) L2(5marks)
(b) A driver drives the 1500 kg car towards west at 25 m/s for 120 minutes. What is the car's momentum? (CLO 3, PLO3) L3(3marks)
- Q # 02 (a) What is projectile motion? Drive the expression for the height of the projectile. (CLO 2, PLO2) L2(5marks)
(b) An object is launched at an angle of 35° with a velocity of 20 m/s. Calculate the range of the object. (CLO 3, PLO3) L3(3marks)
- Q # 03 (a) What is flux? State and explain Gauss's law. (CLO 2, PLO2) L2(5marks)
(b) A point charge of $2 \mu C$ is at the center of the cubical Gaussian surface of 5cm edge. Find flux through the surface. (CLO 3, PLO3) L3(3marks)
- Q # 04 Define the following terms: (CLO 1, PLO1) L1(6marks)
➤ Faraday's law
➤ Len's law
➤ Electric current

THE END



DAWOOD UNIVERSITY OF ENGINEERING & TECHNOLOGY, KARACHI

MID SEMESTER EXAMINATION 2024 OF FIRST SEMESTER FIRST YEAR (1st SEMESTER) (2024F BATCH) OF B.S. (CYBER SECURITY)

COMPUTER & INFORMATION SECURITY (THEORY)

DATED 12-11-2024

TIME ALLOWED 90 MINUTES

MAX. MARKS 30

Student Name : _____

Student Id Number : _____

Instructions:

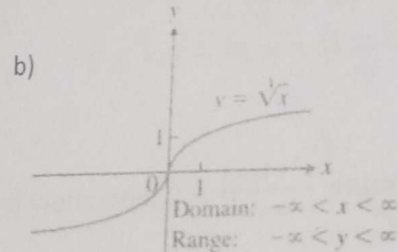
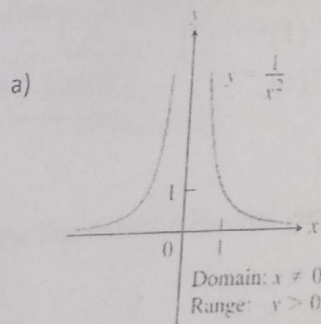
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NOTE: - ATTEMPT ALL THE FOLLOWING QUESTIONS. ALL QUESTIONS CARRY EQUAL MARKS.

1. Consider the given graphs and discuss:

CLO-1, C-2, PLO-1, 8 marks

- i. Symmetry of the graph
- ii. Is it increasing function or decreasing function?
- iii. Is it even function or odd function?



OR

I. Discuss at what value of "x"

$$f(x) = \frac{6x+9}{x^2+4x-5} \text{ is not a function?}$$

II. A function "f" is defined by

$$f: x \rightarrow 2x^2 + x - 3 \text{ with domain } x = \{0, 1, -2, -3, 4\}.$$

Find the image of set of "f" ?

2. **Locate** the following I & II Piece-wise functions on graph:

CLO-1, C-2, PLO-1, 7 marks

OR

Show that the following "I" function is continuous and differentiable at $x = 1$

$$I. \quad f(x) = \begin{cases} x^2 + 1, & x \leq 1 \\ 2x, & x > 1 \end{cases}$$

$$II. \quad f(x) = \begin{cases} x, & 0 \leq x < 1 \\ 3 - x, & 1 < x \leq 2 \end{cases}$$

- 3 **Apply** limits to the following functions:

CLO-2, C-3, PLO-2 8 marks

i. $\lim_{x \rightarrow 5} \frac{x-5}{x^2-25}$

ii. $\lim_{x \rightarrow 1} \frac{x^2+x-2}{x^2-2}$

iii. $\lim_{x \rightarrow 9} \frac{\sqrt{x}-3}{x-9}$

iv. $\lim_{x \rightarrow 0} \sqrt{8 + \sec^2 x}$

- 4 **Determine** the derivatives of the following, then evaluate the values as specified:

i. $f(t) = \frac{1-t}{2t}$ $f'(-1)$ and $f'(1)$

ii. $\frac{dr}{ds}$ if $r = s^3 - 2s^2 + 3$ $f'(-2)$ and $f'(4)$

CLO-2, C-3, PLO-2, 7 marks

OR

Determine $\frac{x^2+4x+3}{x-1} > 0$, also show it in number line, interval notation and set builder form.