

X104-DEC-2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (IT)/BCA/ B.Sc.(Graphics & Web Designing) (Sem.-1)

MATHEMATICS

Subject Code : UGCA1901

M.Code : 76961

Date of Examination: 18-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly:

- a. Roaster method
- b. Singleton set
- c. Prove that $A \setminus B$ and $B \setminus A$ are disjoint.
- d. Conjunction
- e. Tautology
- f. Scalar matrix
- g. Arithmetic mean
- h. Geometric progression

i. If $A = \begin{bmatrix} 2 & 5 \\ 1 & 3 \end{bmatrix}$, $B = \begin{bmatrix} 1 & -1 \\ -3 & 0 \end{bmatrix}$, find $3A - 2B$

- j. Prove by an example that AB can be zero matrix when either of A and B is zero matrix.

SECTION-B

2. a) Let $A = \{0, 2, 3\}$, $B = \{2, 3\}$ and $C = \{1, 5, 9\}$ and let the universal set $U = \{0, 1, 2, 3, \dots, 9\}$. Determine

i) $A \cup B$,

ii) $A \cap C$,

iii) $A - B$,

iv) A^c ,

v) $(B \cap C)^c$.

- b) List all the members of the power set of the set $A = \{a, b, 2, 3\}$

3. a) Define logical and compound statements with examples of each.

- b) Prove that $(p \wedge q) \rightarrow (p \vee q)$ is tautology.

4. For what values of x, y, z, w

$$3 \begin{bmatrix} x & y \\ z & w \end{bmatrix} = \begin{bmatrix} x & i \\ -1 & 2w \end{bmatrix} + \begin{bmatrix} 4 & x+y \\ z+w & 3 \end{bmatrix}$$

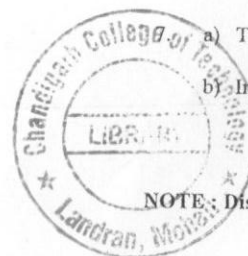
5. Verify that $(AB)^t = B^t A^t$, if $A = \begin{bmatrix} 2 & 1 & 3 \\ 4 & 1 & 0 \end{bmatrix}$, $B = \begin{bmatrix} 1 & -1 \\ 0 & 2 \\ 5 & 0 \end{bmatrix}$

6. a) Prove that if a, b, c are in AP, then $b^2 + c + bc, c^2 + a^2 + ca, a^2 + b^2 + ab$ are AP.

- b) Insert 5 AMs between 9 and 27.

- a) The fifth term of a GP is 81 and the second term is 24, find the series.

- b) Insert 5 GMs between 3 and 192.



NOTE: Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

BCA/ B.Sc.(IT)/(Graphics & Web Designing) (Sem.-1)

MATHEMATICS

Subject Code : UGCA1901

M.Code : S76961

Date of Examination: 18-01-2025

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Solve the following :

a) Define Singleton Set.

b) If $A = \{4, 7\}$ & $B = \{2, 5\}$, find $A \cup B$.

c) Write the Power set of $A = \{a, b\}$.

d) Write the negative statement of "Earth revolves around the Sun."

e) Write the truth table for Disjunction.

f) Define identity Matrix.

g) If $X = \begin{bmatrix} 2 & 3 \\ -1 & 4 \end{bmatrix}$ & $Y = \begin{bmatrix} 1 & 0 \\ -2 & 3 \end{bmatrix}$, then find $X - Y$.

h) If $A = \begin{bmatrix} 0 & 6 \\ 3 & -4 \end{bmatrix}$, Find the transpose of A.

i) Find the 9th term in the sequence 5, 10, 20, ... of G.P.

j) Define Arithmetic mean.

SECTION-B

2. If $U = \{1, 2, 3, 4, 5, 6, 7, 8, 9\}$, $X = \{1, 2, 7, 8\}$ & $Y = \{2, 5, 8, 9\}$. Find $X \cup Y$, $X \cap Y$, $Y - X$, Y' .

3. Prove that: $p \vee (q \wedge r) = (p \vee q) \wedge (p \vee r)$.

4. If $X = \begin{bmatrix} 5 & 2 & -3 \\ 1 & 0 & 6 \\ -5 & 1 & 7 \end{bmatrix}$, $Y = \begin{bmatrix} 3 & -2 & 6 \\ 2 & 7 & -1 \\ 5 & 4 & 0 \end{bmatrix}$, then find YX .

5. If $A = \begin{bmatrix} 4 & 2 & -3 \\ 1 & 3 & -6 \\ -5 & 0 & -7 \end{bmatrix}$, $B = \begin{bmatrix} 0 & -2 & -1 \\ 1 & 3 & 0 \\ -5 & 0 & -7 \end{bmatrix}$, then find $2A + 3B$.

6. How many natural numbers are there between 200 and 500 which are divisible by 7.

7. The 3rd and 8th term of a G.P. are 4 and 128 resp. Find the G.P.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Questions : 07

Subject Code : UGWD-1901

Date of Examination : 02-01-2025

Max. Marks : 60

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- a) Define World Wide Web.
- b) What is an HTML tag?
- c) Write the HTML boilerplate.
- d) What purpose does "action" attribute serve in a HTML form?
- e) Discuss various navigational aids available in HTML.
- f) Which element is used to create a form to receive user input?
- g) Differentiate between vertical and horizontal layout in HTML.
- h) Write a short note on cascading style sheets (CSS).
- i) What is the difference between 'inline' and 'block' elements?
- j) Write a CSS property to change the background color of the text.



SECTION-B

2. Describe the significance of navigation and page layout in web design. Discuss various navigational aids and layouts available in HTML.
3. **Explain the following:**
 - a) Frame set documents
 - b) Non-frame elements
 - c) Inline frames
 - d) Targeted links
4. Discuss about multimedia aspects in web design, such as sound and video. Give examples of multimedia formats that may be utilized in web design and describe how multimedia components can be included in the HTML pages.
5. What are CSS selectors? Discuss different types of CSS selectors giving example of each. Also discuss the best practices for naming and organizing the selectors.
6. Describe the significance of the box model in CSS and how it influences the web page layout. Explain with the help of an example how to set margin, border and padding of HTML elements.
7. Explain various ways to incorporate images into a web page. Also discuss various image formats along with their advantages and disadvantages.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Total No. of Pages : 01

Total No. of Questions : 05

**B.Com. Hons./B.Sc.(Hons.)N&D/B.Sc.(AI&ML)/
BT/FD/G&WD/IT/MLS/B.Voc. (Beauty Therapy and
Asthetics)/BTMM/BBA(SIM)/BBA
BAJMC/BHMCT/BCA (Sem.-1)**

ENGLISH

Subject Code : BTHU103-18

M.Code : 75085

Date of Examination : 04-01-2025

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. All questions are **COMPULSORY**.
2. Q1, Q2 and Q3 carry **TEN** marks each.
3. Q4 and Q5 carry **FIFTEEN** marks each



1. What is Communication? Explain in detail the types and modes of Communication.
2. How is Verbal Communication different from Non- verbal Communication? How important is the non-verbal communication in conveying the ideas and instructions?
3. Big cities in the States are the worst choice for living. The funny thing is that you have to pay dearly for the advantage of living in a city where it can be very difficult to buy your own house. Large cities are too large to control; they impose their living conditions on the people who inhabit them. City-dwellers are obliged to adopt an unusual way of life. Furthermore, it seems impossible to avoid the rush hour; wherever you go roads are blocked with cars and streets are filled with people. In addition, crimes are more in cities which are full of places you would be afraid to visit. Can anyone doubt that the country is where a man truly belongs?

In FOUR sentences, summarise and paraphrase the following passage in an answer to the following question:

Why do some people refuse to live in big cities?

4. Write a letter to an applicant for the post of Chief Accountant to present himself for a personal interview.
5. You, as a marketing manager have been given the responsibility of conducting and preparing a market research to know the market potential of a new product which your company is intending to launch in the market in near future. Prepare a draft report.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

BCA/B.Sc.(Graphics & Web Designing/ IT) (Sem.-1)

FUNDAMENTALS OF COMPUTER AND IT

Subject Code : UGCA1902

M.Code : 76962

Date of Examination : 23-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

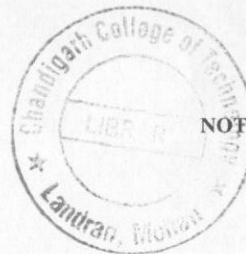
1. Write briefly:

- a. What are the major functional units of a computer system?
- b. What is a number system, and why are they used in computer systems?
- c. What is the difference between a compiled language and an interpreted language?
- d. Differentiate between a single-user and a multi-user operating system.
- e. How do backup and recovery programs work, and why are they important?
- f. What is the purpose of speaker notes in Microsoft PowerPoint?
- g. How do you insert images, charts, and other objects into a Microsoft Word document?
- h. How can you sort the data in Microsoft Excel?
- i. What is UPI (Unified Payments Interface), and how does it facilitate electronic fund transfer between bank accounts?
- j. How do digital signatures and certification authorities work?

SECTION-B

2. How do digital signatures and certification authorities help to ensure the integrity of online transactions, and how can they be used to improve security in e-commerce and other digital transactions? What is the process to register a digital signature?
3. What are some common features of Microsoft PowerPoint, such as slide layout, animations, and transitions? What is the difference between a slide master and a slide layout in Microsoft PowerPoint?
4. What is conditional formatting, and how is it used to highlight data in Microsoft Excel? How do you create and format charts in Microsoft Excel?
5. How can you use macros to automate tasks in Microsoft Word? What are templates, and how are they used in Microsoft Word?
6. How do operating systems manage computer resources such as memory, CPU, and storage? What is disk management software, and how is it used to manage computer storage?
7. How do the different functional units of a computer system interact with each other? Explain with diagram. What are the different types of memory used in a computer system?

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.



Roll No.
Total No. of Questions : 11

Total No. of Pages : 04

B.A.(JAMC) / BBA / B.Com (Hons) / BCA / BHMCT / B.Sc. Hons.
(Nutrition and Dietetics / Fashion Design / Graphics & Web Designing /
Information Technology / Medical Lab Sciences / Operation Theatre
Technology) / BTM / M.Com (Sem.-1, 2)

HUMAN VALUES, DE-ADDICTION & TRAFFIC RULES

Subject Code : HVPE101-18

M.Code : 75087

Date of Examination : 16-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is compulsory.
2. SECTION-B contains FIVE questions. Each question carry FOUR marks. Attempt All.
3. SECTION-C contains FIVE questions with internal choice. Each question carry SIX marks. Attempt All.

SECTION-A

(10 × 1 = 10)

1. Write briefly :

- a) How the value "Guidance" is related with self.
ਮੂਲ "ਸਾਗਦਰਸ਼ਨ" ਸਵਯੰ ਦੇ ਸਾਥ ਕੌਸੇ ਸੰਬੰਧਿਤ ਹੈ?
ਮੂਲ ਅਗਵਾਈ ਸਵੈ ਦੇ ਨਾਲ ਕਿਵੇਂ ਸੰਬੰਧਿਤ ਹੈ?
- b) What do you mean by respect?
ਆਪਕਾ ਸਮਮਾਨ ਸੇ ਕਯਾ ਸਰਲਕ ਹੈ?
ਤੁਹਾਡਾ ਆਦਰ ਤੋਂ ਕੀ ਮਤਲਬ ਹੈ?
- c) What is animal order?
ਜੀਵ ਆਦੇਸ਼ ਕਯਾ ਹੈ?
ਜੀਵ ਆਦੇਸ਼ ਕੀ ਹੈ?
- d) What is innateness?
ਸੁਆਭਾਵਿਕਤਾ ਕਯਾ ਹੈ?
ਸਵਾਭਾਵਿਕਤਾ ਕੀ ਹੈ?



e) What is Utility-Value?

ਤਪਯੋਗਿਤਾ-ਮੂਲ ਕਯਾ ਹੈ?

ਉਪਯੋਗਿਤਾ-ਮੂਲ ਕੀ ਹੈ?

f) What is value of any unit in the larger order?

ਕੜੇ ਆਦੇਸ਼ ਸੇਂ ਕਿਸੀ ਭੀ ਇਕਾਈ ਕਾ ਕਯਾ ਮੂਲ ਹੈ?

ਵੱਡੇ ਆਦੇਸ਼ ਵਿੱਚ ਕਿਸੇ ਵੀ ਇਕਾਈ ਦਾ ਕੀ ਮੂਲ ਹੈ?

g) What is Holistic System?

ਸਮਗਰ ਪ੍ਰਣਾਲੀ ਕਯਾ ਹੈ?

ਸਰਬਭੌਮਿਕ ਪ੍ਰਣਾਲੀ ਕੀ ਹੈ?

h) What is Perseverance?

ਅਟਲਤਾ ਕਯਾ ਹੈ?

ਧੀਰਜ ਕੀ ਹੈ?

i) Explain Natural Acceptance.

ਸਹਜ ਸਵੀਕ੍ਰਿਤਿ ਸਮਝਾਓ।

ਕੁਦਰਤੀ ਮੰਜੂਰੀ ਸਮਝਾਓ।

j) What is Mutual Fulfilment?

ਪਾਰਸਪਰਿਕ ਪੂਰਤਿ ਕਯਾ ਹੈ?

ਆਪਸ ਦੀ ਪੂਰਤੀ ਕੀ ਹੈ?

SECTION-B

(5 × 4 = 20)

2. What is the need for value education in technical and other professional Institutions?
ਤਕਨੀਕੀ ਏਂ ਅਨਯ ਲਾਕਸਾਧਿਕ ਸੰਸਥਾਨਾਂ ਸੇਂ ਮੂਲਯਪਰਕ ਸਿਕਸ਼ਾ ਕੀ ਕਯਾ ਆਵਸ਼ਯਕਤਾ ਹੈ?
ਤਕਨੀਕੀ ਅਤੇ ਹੋਰ ਪੇਸ਼ੇਵਰ ਸੰਸਥਾਵਾਂ ਵਿੱਚ ਮੂਲ ਦੀ ਸਿੱਖਿਆ ਦੀ ਕੀ ਲੋੜ ਹੈ?
3. What do you mean by SVDD, SSDD and SSSS? How is the transformation possible from SSDD to SSSS?
ਆਪਕਾ SVDD, SSDD ਔਰ SSSS ਸੇ ਕਯਾ ਸਰਲਕ ਹੈ? SSDD ਸੇ SSSS ਤਕ ਕੇ ਲਿਏ ਪਰਿਵਰਤਨ ਕੌਸੇ ਸੰਭਵ ਹੈ?
ਤੁਹਾਡਾ SVDD, SSDD ਅਤੇ SSSS ਤੋਂ ਕੀ ਮਤਲਬ ਹੈ? SSDD ਤੋਂ SSSS ਤੱਕ ਦੀ ਤਬਦੀਲੀ ਕਿਸ ਤਰ੍ਹਾਂ ਸੰਭਵ ਹੈ?

OR

What are the programmes to ensure Helath?

स्वास्थ्य को सुनिश्चित करने के लिए क्या-क्या कार्यक्रम हैं?

सिहत नुं ठीक रੱਖਣ ਲੀ ਕਿਹੜੇ-ਕਿਹੜੇ ਤਰੀਕੇ ਹਨ?

10. Critically examine our state today in terms of fulfillment of relationships and physical facilities. What has gone wrong according to you? What is the solution? रिश्तों की पूर्ति और भौतिक सुविधाओं की दृष्टि से आज हमारी स्थिति का आलोचनात्मक परीक्षण करें। आपके अनुसार क्या गलत हुआ है? क्या निदान हैं? रिश्तियाँ अਤੇ भौतिक सुलुलता ਦੀ ਪੂਰਤੀ ਦੇ मामले ਵਿੱਚ ਅੱਜ ਸਾਡੇ ਰਾਜ ਦੀ ਗੰਭੀਰਤਾ ਨਾਲ ਜਾਂਚ ਕਰੋ। ਤੁਹਾਡੇ ਅਨੁਸਾਰ ਕੀ ਗਲਤ ਹੋਇਆ ਹੈ? ਹੱਲ ਕੀ ਹੈ?

OR

What are the five dimensions of Human Endeavour in society?

समाज में मानव प्रयास के पांच आयाम क्या हैं?

ਸਮਾਜ ਵਿੱਚ ਮਨੁੱਖ ਕੋਸ਼ਿਸ਼ ਦੇ ਪੰਜ ਪਹਿਲੂ ਕੀ ਹਨ?

11. Explain self-organisation and health.

आत्म संगठन और स्वास्थ्य के बारे में बताएं।

ਆਤਮ ਸੰਗਠਨ ਅਤੇ ਸਿਹਤ ਦੇ ਬਾਰੇ ਵਿੱਚ ਦੱਸੋ।

OR

Suggest ways to enhance the fulfillment of human order with the other three orders. Mention any two programs you can undertake in light of the above.

अन्य तीन आदेशों के साथ मानव आदेश की पूर्ति को बढ़ाने के तरीके सुझाएं। उपरोक्त के आलोक में कितनी दो कार्यक्रमों का उल्लेख करें जिनमें आप अपना सकते हैं।

ਹੋਰ ਤਿੰਨ ਆਦੇਸ਼ਾਂ ਦੇ ਨਾਲ ਮਨੁੱਖੀ ਆਦੇਸ਼ ਦੀ ਪੂਰਤੀ ਨੂੰ ਵਧਾਉਣ ਦੇ ਤਰੀਕਿਆਂ ਦਾ ਸੁਝਾਅ ਦਿਓ। ਕਿਸੇ ਵੀ ਦੋ ਪ੍ਰੋਗਰਾਮਾਂ ਦਾ ਜ਼ਿਕਰ ਕਰੋ ਜੋ ਤੁਸੀਂ ਉਪਰੋਕਤ ਦੀ ਰੋਸ਼ਨੀ ਵਿੱਚ ਸ਼ੁਰੂ ਕਰ ਸਕਦੇ ਹੋ।

Note : Disclosure of Identity by writing Mobile No. or Making of Passing request on any page of Answer Sheet will lead to UMC against the Student.

4. What do you mean by Animal Consciousness and Human Consciousness? How is the transformation possible from Animal Consciousness to Human Consciousness?

आपका पशु चेतना और मानव चेतना से क्या मतलब है? पशु चेतना से मानव चेतना परिवर्तन कैसे संभव है?

ਤੁਹਾਡਾ ਪਸ਼ੂ ਚੇਤਨਾ ਅਤੇ ਮਨੁੱਖੀ ਚੇਤਨਾ ਤੋਂ ਕੀ ਮਤਲਬ ਹੈ? ਪਸ਼ੂ ਚੇਤਨਾ ਤੋਂ ਮਨੁੱਖੀ ਚੇਤਨਾ ਤੱਕ ਦੀ ਤਬਦੀਲੀ ਕਿਸ ਤਰ੍ਹਾਂ ਸੰਭਵ ਹੈ?

5. Explain competence in Professional-Ethics.

पेशेवर नैतिकता में क्षमता समझाओ।

ਪੇਸ਼ੇਵਰ ਨੈਤਿਕਤਾ ਵਿੱਚ ਸਮਰੱਥਾ ਸਮਝਾਓ।

6. What are the implications of value based living?

मूल्य आधारित जीवन यापन के अच्छे परिणाम क्या हैं?

ਕਦਰਾਂ ਕੀਮਤਾਂ ਆਧਾਰਿਤ ਜੀਵਨ ਜੀਉਣ ਦੇ ਚੰਗੇ ਨਤੀਜੇ ਕੀ ਹਨ?

SECTION-C

(6 × 5 = 30)

7. Compare the Four Orders in nature on the basis of their salient aspects.

मुख्य पहलुओं के आधार पर प्रकृति में चार आदेशों की तुलना करें।

ਮੁੱਖ ਪਹਿਲੂਆਂ ਦੇ ਆਧਾਰ ਉੱਤੇ ਕੁਦਰਤ ਵਿੱਚ ਚਾਰ ਆਦੇਸ਼ਾਂ ਦੀ ਤੁਲਨਾ ਕਰੋ।

OR

What is the meaning and purpose of Self-Exploration?

स्वयं-अन्वेषण के अर्थ और उद्देश्य क्या है?

ਆਤਮ - ਅਧਿਐਨ ਦੇ ਮਤਲਬ ਅਤੇ ਉਦੇਸ਼ ਕੀ ਹਨ?

8. Describe basic human aspirations. What are the requirements to fulfill basic human aspirations?

बुनियादी मानवीय आकांक्षाएं क्या हैं? बुनियादी मानवीय आकांक्षाओं को पूरा करने के लिए आवश्यकताओं का वर्णन करें?

ਬੁਨਿਆਦੀ ਮਨੁੱਖੀ ਇੱਛਾਵਾਂ ਕੀ ਹਨ? ਬੁਨਿਆਦੀ ਮਨੁੱਖੀ ਇੱਛਾਵਾਂ ਨੂੰ ਪੂਰਾ ਕਰਨ ਲਈ ਜ਼ਰੂਰਤਾਂ ਦਾ ਵਰਣਨ ਕਰੋ?

OR

What are the different patterns of differentiation?

भेदभाव के विभिन्न पैटर्न क्या हैं?

ਫਰਕ ਦੇ ਵੱਖ-ਵੱਖ ਪੈਟਰਨ ਕੀ ਹਨ?

9. What is the difference between belief and understanding?

विश्वास और समझ में क्या अंतर है?

ਵਿਸ਼ਵਾਸ ਅਤੇ ਸਮਝ ਵਿੱਚ ਕੀ ਅੰਤਰ ਹੈ?

00 MAY 2024

[illegible]

Total No. of Questions : 07

Total No. of Pages : 02

FUNDAMENTALS OF COMPUTER AND IT
Subject Code : UCCA103

FUNDAMENTALS OF COMPUTER AND IT
Subject Code : HCC101

Subject Code : UGCA1902

M.Code : 76962

Date of Examination : 20-06-2024

Time : 3 Hrs.

Max. Marks : 60

SECTION-B

2. **Explain the concept of :**
 - a) Hardware and Software in a Computer System
 - b) Binary Arithmetic.
3. Explain various types of devices available under Category of Input and Output Devices.
4. How Mail merge works in word processing? Explain in detail by taking suitable example.
5. Explain in detail features and various functions performed in Presentation Graphics Software.
6. **Explain the Importance of :**
 - a) Security in Electronic transactions
 - b) Digital Signature and Certification Authority.
7. Write a note on Big data and Internet of things.

SECTION-A

1. Write briefly :
 - a) Information
 - b) SMPS
 - c) RAM
 - d) Bit
 - e) Utility programs
 - f) Machine Language
 - g) Digital Cash
 - h) Applications of IT
 - i) Purpose of Registers
 - j) Cache memory.



1 | M-76962

(S3)-2415

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on page of Answer Sheet will lead to UMC against the Student.

2 | M-76962

B.Sc.

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (IT)/ BCA/ B.Sc.(Graphics & Web Designing) (Sem.-1)

MATHEMATICS

Subject Code : UGCA1901

M.Code : 76961

Date of Examination : 18-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- Define negation and Tautology with example.
- Find $(A \cap B)$ where $A = \{1, 2, 3, 4\}$, $B = \{2, 4, 6, 8\}$
- How many terms of a sequence 18, 16, 14, should be taken so that their sum is zero.
- Write the following statements in Symbolic form

It is raining but not pleasant.
- Construct 2×3 matrix whose elements are given by $a_{ij} = 2i - j$.
- Define conjunction with example.
- Determine k so that $k + 2$, $4k - 6$, $3k - 2$ are the three consecutive of an A.P.
- Define Bi-conditional statement with truth table.
- Write down the truth table for $(\sim p \vee q)$
- Define null matrix.

1 | M-76961

(53)-2271



SECTION-B

00 MAY 2024

2. If $A = \begin{bmatrix} -2 & 1 & 1 \\ 3 & 1 & 0 \\ 2 & 0 & -3 \end{bmatrix}$. Evaluate $A^3 - 6A^2 + 7A - 5I$.
3. If p th term of an AP is a and q th term is b then show that the sum of $(p + q)$ terms is $\frac{p+q}{2} \left[a + b + \frac{a-b}{p-q} \right]$.
4. Suppose 20 students studies Hindi, English and Punjabi. It is given that 60 students study Hindi, 45 studies English, 42 study Punjabi, 20 study Hindi and English, 25 study Hindi and Punjabi and 15 study English and Punjabi. Find the number of students who studies all the three languages.
5. Test the Validity of statement :

If he works hard then he will be successful. If he is successful then he will be happy. Therefore, hard work lead to happiness.
6. (a) If $A = \{a, b, c, d, g\}$ and $B = \{a, e, i, o, u\}$, $C = \{e, g\}$ then determine
(i) $B - \phi$.
(ii) $A \cup (B \cap C)$
(b) Prove that if $A \subseteq B$, then $A \cup B = B$.
7. The sum of first n terms of two arithmetic series are in the ratio of $7n + 1 : 4n + 27$. Find the ratio of their 11^{th} terms.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

2 | M-76961

(S3)-2271

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (IT)/ BCA/ B.Sc.(Graphics & Web Designing) (Sem.-1)

MATHEMATICS

Subject Code : UGCA1901

M.Code : 76961

Date of Examination : 18-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- Define negation and Tautology with example.
- Find $(A \cap B)$ where $A = \{1, 2, 3, 4\}$, $B = \{2, 4, 6, 8\}$
- How many terms of a sequence 18, 16, 14,..... should be taken so that their sum is zero.
- Write the following statements in Symbolic form
It is raining but not pleasant.
- Construct 2×3 matrix whose elements are given by $a_{ij} = 2i - j$.
- Define conjunction with example.
- Determine k so that $k + 2$, $4k - 6$, $3k - 2$ are the three consecutive of an A.P.
- Define Bi-conditional statement with truth table.
- Write down the truth table for $(\sim p \vee q)$
- Define null matrix.

00 MAY 2024

SECTION-B

2. If $A = \begin{bmatrix} -2 & 1 & 1 \\ 3 & 1 & 0 \\ 2 & 0 & -3 \end{bmatrix}$, Evaluate $A^3 - 6A^2 + 7A - 5I$.
3. If p th term of an AP is a and q th term is b then show that the sum of $(p + q)$ terms is $\frac{p+q}{2} \left[a+b + \frac{a-b}{p-q} \right]$.
4. Suppose 120 students studies Hindi, English and Punjabi. It is given that 60 students study Hindi, 45 studies English, 42 study Punjabi, 20 study Hindi and English, 25 study Hindi and Punjabi and 15 study English and Punjabi. Find the number of students who studies all the three languages.
5. Test the Validity of statement :
If he works hard then he will be successful. If he is successful then he will be happy.
Therefore, hard work lead to happiness.
6. (a) If $A = \{a, b, c, d, g\}$ and $B = \{a, e, i, o, u\}$, $C = \{e, g\}$ then determine
(i) $B - \phi$
(ii) $A \cup (B \cap C)$
(b) Prove that if $A \subseteq B$, then $A \cup B = B$.
7. The sum of first n terms of two arithmetic series are in the ratio of $7n + 1 : 4n + 27$. Find the ratio of their 11^{th} terms.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Total No. of Questions : 11

Total No. of Pages : 04

May - June - 2024

00 JUN 2021

B.Voc. (Child Caregiver)/B.A. (JAMC)/BBA/BBA (SIM)/B.Com (Honours)/
BCA/BHMCT (UGC)/B.Sc. - Honours (Nutrition and Dietetics)/B.Sc.
(AI&ML)/B.Sc. (Bio Technology)/B.Sc. (Fashion Design)/B.Sc. (Graphics
& Web Designing)/B.Sc. (IT)/B.Sc. (Medical Lab Sciences)/B.Sc.
(Operation Theatre Technology)/B.Sc. (Radiotherapy Technology)/
BTMM (Sem-1)

HUMAN VALUES, DE-ADDICTION AND TRAFFIC RULES

Subject Code : HVPE-101-18

M.Code : 93322

Date of Examination : 24-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. Section-A is compulsory.
3. Section-B contains five questions of four marks each. Attempt all.
4. Section-C contains five questions of six marks each. Attempt all.

SECTION-A

(10 × 1 = 10)

1. Write briefly :

- i) What is Utility-Value?

उपयोगिता-मूल्य क्या हैं?

ਉਪਯੋਗਿਤਾ-ਮੁੱਲ ਕੀ ਹੈ?

- ii) Explain Natural Acceptance.

सहज स्वीकृति समझाओ।

ਕੁਦਰਤੀ ਮੰਜੂਰੀ ਸਮਝਾਓ।

- iii) How the value "care" is related with body?

मूल्य "ध्यान" शरीर के साथ कैसे संबंधित है?

ਮੁੱਲ ਧਿਆਨ ਸਰੀਰ ਦੇ ਨਾਲ ਕਿਵੇਂ ਸਬੰਧਤ ਹੈ?

- iv) What do you mean by Respect?

आपका सम्मान से क्या मतलब है?

ਤੁਹਾਡਾ ਆਦਰ ਤੋਂ ਕੀ ਮਤਲਬ ਹੈ?

[M-93322]



- v) What is Perseverance?
ਅਟਲਗਾ ਕਯਾ ਹੈ?
ਧੀਰਜ ਕੀ ਹੈ?
- vi) What is the difference between prosperity and wealth?
ਸਮ੍ਰਿਧਿ ਅਤੇ ਧਨ ਦੇ ਭੇਦ ਕੀ ਕੀਤੀ ਹੈ?
ਖੁਸ਼ਹਾਲੀ ਅਤੇ ਅਮੀਰੀ ਦੇ ਵਿੱਚ ਕੀ ਅੰਤਰ ਹੈ?
- vii) What is Holistic System?
ਸਮੱਗਰ ਪ੍ਰਣਾਲੀ ਕੀ ਹੈ?
ਸਰਵਭੌਮਿਕ ਪ੍ਰਣਾਲੀ ਕੀ ਹੈ?
- viii) What is Cyclic Production?
ਚੱਕਰੀ ਉਤਪਾਦਨ ਕੀ ਹੈ?
ਚਕਰੀ ਉਤਪਾਦਨ ਕੀ ਹੈ?
- ix) What is Existence?
ਅਸਤਿਤਵ ਕੀ ਹੈ?
ਅਸਤੀਤਵ ਕੀ ਹੈ?
- x) What is value of any Unit in the larger order?
ਕਿਸੇ ਯੂਨਿਟ ਦਾ ਮੁੱਲ ਕੀ ਹੈ?
ਵੱਡੇ ਆਦੇਸ਼ ਵਿੱਚ ਕਿਸੇ ਵੀ ਇਕਾਈ ਦਾ ਕੀ ਮੁੱਲ ਹੈ?

SECTION-B

$$(5 \times 4 = 20)$$

2. What is the need for value education in technical and other professional Institutions?
 तकनीकी एवं अन्य व्यावसायिक संस्थानों में मूल्यपरक शिक्षा की क्या आवश्यकता है?
 ਤਕਨੀਕੀ ਅਤੇ ਹੋਰ ਪੇਸ਼ੇਵਰ ਸੰਸਥਾਵਾਂ ਵਿੱਚ ਮੁੱਲ ਦੀ ਸਿੱਖਿਆ ਦੀ ਕੀ ਲੋੜ ਹੈ?
3. Self-exploration is a process of dialogue between 'What you are' and 'What you really want to be'. Explain and illustrate.
 आत्म-अन्वेषण 'आप क्या हैं' आप वास्तव में क्या बनना चाहते हैं' में आपस संवाद की एक प्रक्रिया है। समझाओ और व्याख्या करो।
 ਸਵੈ-ਖੋਜ 'ਤੁਸੀਂ ਕੀ ਹੋ' ਅਤੇ 'ਤੁਸੀਂ ਅਸਲ ਵਿੱਚ ਕੀ ਬਣਨਾ ਚਾਹੁੰਦੇ ਹੋ' ਵਿੱਚ ਆਪਸ ਸੰਵਾਦ ਦੀ ਇੱਕ ਪ੍ਰਕਿਰਿਆ ਹੈ। ਸਮਝਾਓ ਅਤੇ ਵਿਆਖਿਆ ਕਰੋ।

[M-93322]

(S-17) 2499

4. What are the problems we are facing today because of operating on the basis of pre-conditioned desires?

ਪ੍ਰਵ-ਮਾਨਤਾ ਚੁਣਨਾ ਆਧਾਰ ਪਰ ਚਰਿਚਾਲਨ ਕਰਨੇ ਸੇ ਹਮ ਆਜ ਕਯਾ-ਕਯਾ ਸਮਸਯਾਓਂ ਕਾ ਸਾਸਨਾ ਕਰ ਰਹੇ ਹਾਂ?

ਪ੍ਰਵ-ਮਾਨਤਾ ਚੁਣਨਾ ਆਧਾਰ ਉੱਤੇ ਚੱਲਣ ਕਰਕੇ ਅੱਜ ਅਸੀਂ ਕਿਹੜੀਆਂ ਸਮੱਸਿਆਵਾਂ ਦਾ ਸਾਮਣਾ ਕਰ ਰਹੇ ਹਾਂ?

5. Explain competence in Professional-Ethics.

ਪੇਸ਼ਾਵਰ ਨੈਤਿਕਤਾ ਮੇਂ ਕਸਤਾ ਸਮਝਾਓ।

ਪੇਸ਼ਾਵਰ ਨੈਤਿਕਤਾ ਵਿੱਚ ਸਮਝਥਾ ਸਮਝਾਓ।

6. What do you understand by the terms Sweta, Swatantrate and Swarajya?

ਸਵੇਤਾ, ਸਵਤੰਤਰਤਾ ਆਰ ਸਵਰਾਜਯ ਸ਼ਬਦੋਂ ਸੇ ਆਪ ਕਯਾ ਸਮਝਦੇ ਹੋ? ਕਯਾ ਆਪਕੋ ਲਗਤਾ ਹੈ ਕਿ ਆਪਕੇ ਪਾਸ ਕੁਝ ਪ੍ਰਵ ਮਾਨਤਾ ਹੈ? ਆਪ ਤਨਕਾ ਸੂਲਯਾਂਕਨ ਕੈਸੇ ਕਰਦੇ ਹੋ?

ਤੁਸੀਂ ਸਵੇਤਾ, ਸਵਤੰਤਰਤਾ ਅਤੇ ਸਵਰਾਜਯ ਸ਼ਬਦਾਂ ਤੋਂ ਕੀ ਸਮਝਦੇ ਹੋ? ਕੀ ਤੁਹਾਨੂੰ ਲੱਗਦਾ ਹੈ ਕਿ ਤੁਹਾਡੇ ਕੋਲ ਕੁੱਝ ਪ੍ਰਵ ਮਾਨਤਾ ਹੈ? ਤੁਸੀਂ ਉਸਦਾ ਮੂਲਾਂਕਨ ਕਿਵੇਂ ਕਰਦੇ ਹੋ?

SECTION-C

(5 × 6 = 30)

7. "I will learn and improve only if I am unhappy. If I become happy, my learning will stop". Explore the validity of this viewpoint.

"ਮੈਂ ਰਭੀ ਸੀਕ੍ਹਾਂਗਾ ਆਰ ਸੁਧਾਰ ਕਰਾਂਗਾ ਜਕ ਮੈਂ ਨਾਖੁਸ਼ ਹੂੰ। ਅਗਰ ਮੈਂ ਖੁਸ਼ ਹੋ ਜਾਓਂ ਤੋ ਮੇਰੀ ਸਿਖਲਾਈ ਬੰਦ ਹੋ ਜਾਏਗੀ।" ਇਸ ਦ੍ਰਿਸ਼ਟੀਕੋਣ ਦੀ ਵੈਧਤਾ ਕਾ ਅਨਵੇਸ਼ਣ ਕਰੋ।

"ਮੈਂ ਤਾਂ ਹੀ ਸਿੱਖਾਂਗਾ ਅਤੇ ਸੁਧਾਰਾਂਗਾ ਜੇ ਮੈਂ ਨਾਖੁਸ਼ ਹਾਂ। ਜੇਕਰ ਮੈਂ ਖੁਸ਼ ਹੋ ਗਿਆ ਤਾਂ ਮੇਰੀ ਸਿਖਲਾਈ ਬੰਦ ਹੋ ਜਾਵੇਗੀ।" ਇਸ ਦ੍ਰਿਸ਼ਟੀਕੋਣ ਦੀ ਵੈਧਤਾ ਦੀ ਪੜਚੋਲ ਕਰੋ।

8. Why are physical facilities required? What do you mean by the right utilization of the Body?

ਭੌਤਿਕ ਸੁਵਿਧਾਓਂ ਦੀ ਆਵਸ਼ਯਕਤਾ ਕਯੋਂ ਹੈ? ਸਰੀਰ ਦੇ ਸਹੀ ਤਪਯੋਗ ਸੇ ਆਪ ਕਯਾ ਸਮਝਦੇ ਹੋ?

ਭੌਤਿਕ ਸਹੂਲਤਾਂ ਦੀ ਲੋੜ ਕਿਉਂ ਹੈ? ਸਰੀਰ ਦੀ ਸਹੀ ਵਰਤੋਂ ਤੋਂ ਤੁਹਾਡਾ ਕੀ ਮਤਲਬ ਹੈ?

9. What do you mean by coexistence? How are units in coexistence being in space?

ਸਹ-ਅਸ਼ਿਤਵ ਸੇ ਆਪ ਕਯਾ ਸਮਝਦੇ ਹੋ? ਅੰਤਰਿਕਸ਼ ਮੇਂ ਇਕਾਈਯਾਂ ਸਹ-ਅਸ਼ਿਤਵ ਮੇਂ ਕੈਸੇ ਹੋਂ?

ਸਹਿਰੋਂਦ ਤੋਂ ਤੁਹਾਡਾ ਕੀ ਮਤਲਬ ਹੈ? ਪੁਲਾੜ ਵਿੱਚ ਇਕਾਈਆਂ ਸਹਿ-ਰੋਂਦ ਕਿਵੇਂ ਹੁੰਦੀਆਂ ਹਨ?

10. Critically examine the issues in professional ethics in the current scenario. List any five unethical practices in profession today and the methods being tried to curb them. Comment on the long-term effectiveness of these methods.

ਵਰਤਮਾਨ ਪਰਿਦ੍ਰਿਸ਼ਯ ਮੇਂ ਕ੍ਰਿਯਾਕਸ਼ਾਤ੍ਰਿਕ ਨੈਤਿਕਤਾ ਦੇ ਸੁਦ੍ਰਵੇਂ ਕਾ ਆਲੋਚਨਾਤਮਕ ਪਰੀਕਸ਼ਣ ਕਰੋ। ਆਜ ਪੇਸ਼ੇ ਮੇਂ ਕਿਨ੍ਹੀਂ ਪਾਂਚ ਅਨੈਤਿਕ ਪ੍ਰਥਾਓਂ ਆਰ ਤਨ ਪਰ ਅੰਕੁਸ਼ ਲਗਾਨੇ ਕੇ ਲਿਓਂ ਅਪਨਾਓਂ ਜਾ ਰਹੇ ਰੀਕੀਓਂ ਦੀ ਸੂਚੀ ਬਨਾਓ। ਇਨ ਵਿਧਿਯੋਂ ਦੀ ਦੀਰਘਕਾਲਿਕ ਪ੍ਰਭਾਵਸ਼ੀਲਤਾ ਪਰ ਟਿੱਪਣੀ ਕਰੋ।

ਮੌਜੂਦਾ ਸਥਿਤੀ ਵਿੱਚ ਪੇਸ਼ੇਵਰ ਨੈਤਿਕਤਾ ਦੇ ਮੁੱਦਿਆਂ ਦੀ ਗੰਭੀਰਤਾ ਨਾਲ ਜਾਂਚ ਕਰੋ। ਅੱਜ ਪੇਸ਼ੇ ਵਿੱਚ ਕਿਸੇ ਵੀ ਪੰਜ ਅਨੈਤਿਕ ਅਭਿਆਸਾਂ ਅਤੇ ਉਹਨਾਂ ਨੂੰ ਰੋਕਣ ਦੇ ਤਰੀਕਿਆਂ ਦੀ ਸੂਚੀ ਬਣਾਓ। ਇਹਨਾਂ ਤਰੀਕਿਆਂ ਦੀ ਲੰਬੇ ਸਮੇਂ ਦੀ ਪ੍ਰਭਾਵਸ਼ੀਲਤਾ 'ਤੇ ਟਿੱਪਣੀ ਕਰੋ।

11. What do the abbreviations given as SVDD, SSDD and SSSS signify? Explain the reason for the state SSDD.

SVDD, SSDD ਆਰ SSSS ਦੇ ਰੂਪ ਮੇਂ ਦਿਓਂ ਗਏ ਸੰਖਿਪਤਾਕਸ਼ਰ ਕਯਾ ਦਸ਼ਾਨਿ ਹੈ? SSDD ਦੀ ਸ਼ਿਥਿਤੀ ਕਾ ਕਾਰਣ ਬਤਾਓਂ।

ਤੁਹਾਨੂੰ SVDD, SSDD ਅਤੇ SSSS ਦੇ ਰੂਪ ਵਿੱਚ ਦਿੱਤੇ ਗਏ ਸੰਖੇਪ ਰੂਪ ਕੀ ਦਰਸਾਉਂਦੇ ਹਨ। SSDD ਸਥਿਤੀ ਦਾ ਕਾਰਨ ਦੱਸੋ।

Note : Any student found attempting answer sheet from any other person(s), using incriminating material or involved in any wrong activity reported by evaluator shall be treated under UMC provisions.

Student found sharing the question paper(s)/answer sheet on digital media or with any other person or any organization/institution shall also be treated under UMC.

Any student found making any change/addition/modification in contents of scanned copy of answer sheet and original answer sheet, shall be covered under UMC provisions.

00 MAY 2024

4. What are the problems we are facing today because of operating on the basis of pre-conditioned desires?

पूर्व-मानता इच्छाओं के आधार पर परिचालन करने से हम आज क्या-क्या समस्याओं का सामना कर रहे हैं?

ਪੂਰਵ-ਮਾਨਤਾ ਇੱਛਾਵਾਂ ਦੇ ਆਧਾਰ ਉੱਤੇ ਚੱਲਣ ਕਰਕੇ ਅੱਜ ਅਸੀਂ ਕਿਹੜੀਆਂ ਸਮੱਸਿਆਵਾਂ ਦਾ ਸਾਮਣਾ ਕਰ ਰਹੇ ਹਾਂ?

5. Explain competence in Professional-Ethics.

ਪੇਸ਼ੇਵਰ ਨੈਤਿਕਤਾ में क्षमता समझाओ।

ਪੇਸ਼ੇਵਰ ਨੈਤਿਕਤਾ ਵਿੱਚ ਸਮਰੱਥਾ ਸਮਝਾਓ।

6. What do you understand by the terms Sweta, Swatantrate and Swarajya?

स्वेता, स्वतंत्रता और स्वराज्य शब्दों से आप क्या समझते हैं? क्या आपको लगता है कि आपके पास कुछ पूर्ण मानता है? आप उनका मूल्यांकन कैसे करते हैं?

ਤੁਸੀਂ ਸ਼ਵੇਤਾ, ਸਵਤੰਤਰਤਾ ਅਤੇ ਸਵਰਾਜ ਸ਼ਬਦਾਂ ਤੋਂ ਕੀ ਸਮਝਦੇ ਹੋ? ਕੀ ਤੁਹਾਨੂੰ ਲੱਗਦਾ ਹੈ ਕਿ ਤੁਹਾਡੇ ਕੋਲ ਕੁੱਝ ਪੂਰਵ ਮਾਨਤਾ ਹੈ? ਤੁਸੀਂ ਉਸਦਾ ਮੁਲਾਂਕਨ ਕਿਵੇਂ ਕਰਦੇ ਹੋ?

SECTION-C

(5 × 6 = 30)

7. "I will learn and improve only if I am unhappy. If I become happy, my learning will stop". Explore the validity of this viewpoint.

"ਮੈਂ ਸਿੱਖਣਾ ਅਤੇ ਸੁਧਰ ਕਰਾਂਗਾ ਜਦੋਂ ਮੈਂ ਨਾਖੁਸ਼ ਹੁੰ। ਅਗਰ ਮੈਂ ਖੁਸ਼ ਹੋ ਜਾਵਾਂਗਾ ਤਾਂ ਮੇਰੀ ਸਿੱਖਣਾ ਬੰਦ ਹੋ ਜਾਵੇਗੀ।" ਇਸ ਦ੍ਰਿਸ਼ਟੀਕੋਣ ਦੀ ਵੈਧਤਾ ਦਾ ਅਨੁਵੇਸ਼ਣ ਕਰੋ।

"ਮੈਂ ਤਾਂ ਹੀ ਸਿੱਖਾਂਗਾ ਅਤੇ ਸੁਧਰਾਂਗਾ ਜੇ ਮੈਂ ਨਾਖੁਸ਼ ਹਾਂ। ਜੇਕਰ ਮੈਂ ਖੁਸ਼ ਹੋ ਗਿਆ ਤਾਂ ਮੇਰੀ ਸਿੱਖਣਾ ਬੰਦ ਹੋ ਜਾਵੇਗੀ।" ਇਸ ਦ੍ਰਿਸ਼ਟੀਕੋਣ ਦੀ ਵੈਧਤਾ ਦੀ ਪੜਚੋਲ ਕਰੋ।

8. Why are physical facilities required? What do you mean by the right utilization of the Body?

ਮੌਤਿਕ ਸੁਵਿਧਾओं की आवश्यकता क्यों है? शरीर के सही उपयोग से आप क्या समझते हैं?

ਭੌਤਿਕ ਸਹੂਲਤਾਂ ਦੀ ਲੋੜ ਕਿਉਂ ਹੈ? ਸਰੀਰ ਦੀ ਸਹੀ ਵਰਤੋਂ ਤੋਂ ਤੁਹਾਡਾ ਕੀ ਮਤਲਬ ਹੈ?

9. What do you mean by coexistence? How are units in coexistence being in space?

सह-अस्तित्व से आप क्या समझते हैं? अंतरिक्ष में इकाइयाँ सह-अस्तित्व में कैसे हैं?

ਸਹਿ-ਹੋਂਦ ਤੋਂ ਤੁਹਾਡਾ ਕੀ ਮਤਲਬ ਹੈ? ਪੁਲਾੜ ਵਿੱਚ ਇਕਾਈਆਂ ਸਹਿ-ਹੋਂਦ ਕਿਵੇਂ ਹੁੰਦੀਆਂ ਹਨ?

[M-93322]

(S-17) 2499

10. Critically examine the issues in professional ethics in the current scenario. List any five unethical practices in profession today and the methods being tried to curb them. Comment on the long-term effectiveness of these methods.

वर्तमान परिदृश्य में व्यावसायिक नैतिकता के मुद्दों का आलोचनात्मक परीक्षण करें। आज पेशे में किन्हीं पांच अनैतिक प्रथाओं और उन पर अंकुश लगाने के लिए अपनाए जा रहे तरीकों की सूची बनाएं। इन विधियों की दीर्घकालिक प्रभावशीलता पर टिप्पणी करें।

ਮੌਜੂਦਾ ਸਥਿਤੀ ਵਿੱਚ ਪੇਸ਼ੇਵਰ ਨੈਤਿਕਤਾ ਦੇ ਮੁੱਦਿਆਂ ਦੀ ਗੰਭੀਰਤਾ ਨਾਲ ਜਾਂਚ ਕਰੋ। ਅੱਜ ਪੇਸ਼ੇ ਵਿੱਚ ਕਿਸੇ ਵੀ ਪੰਜ ਅਨੈਤਿਕ ਅਭਿਆਸਾਂ ਅਤੇ ਉਹਨਾਂ ਨੂੰ ਰੋਕਣ ਦੇ ਤਰੀਕਿਆਂ ਦੀ ਸੂਚੀ ਬਣਾਓ। ਇਹਨਾਂ ਤਰੀਕਿਆਂ ਦੀ ਲੰਬੇ ਸਮੇਂ ਦੀ ਪ੍ਰਭਾਵਸ਼ੀਲਤਾ 'ਤੇ ਟਿੱਪਣੀ ਕਰੋ।

11. What do the abbreviations given as SVDD, SSDD and SSSS signify? Explain the reason for the state SSDD.

SVDD, SSDD और SSSS के रूप में दिए गए संक्षिप्ताक्षर क्या दर्शाते हैं? SSDD की स्थिति का कारण बताएं।

ਤੁਹਾਨੂੰ SVDD, SSDD ਅਤੇ SSSS ਦੇ ਰੂਪ ਵਿੱਚ ਦਿੱਤੇ ਗਏ ਸੰਖੇਪ ਰੂਪ ਕੀ ਦਰਸਾਉਂਦੇ ਹਨ। SSDD ਸਥਿਤੀ ਦਾ ਕਾਰਨ ਦੱਸੋ।

Note : Any student found attempting answer sheet from any other person(s), using incriminating material or involved in any wrong activity reported by evaluator shall be treated under UMC provisions.

Student found sharing the question paper(s)/answer sheet on digital media or with any other person or any organization/institution shall also be treated under UMC.

Any student found making any change/addition/modification in contents of scanned copy of answer sheet and original answer sheet, shall be covered under UMC provisions.

[M-93322]

(S-17) 2499

Roll No.

Total No. of Pages : 04

Total No. of Questions : 11

B.Voc. (Child Caregiver)/B.A. (JAMC)/BBA/BBA (SIM)/B.Com (Honours)/
BCA/BHMCT (UGC)/B.Sc. - Honours (Nutrition and Dietetics)/B.Sc.
(AI&ML)/B.Sc. (Bio Technology)/B.Sc. (Fashion Design)/B.Sc. (Graphics
& Web Designing)/B.Sc. (IT)/B.Sc. (Medical Lab Sciences)/B.Sc.
(Operation Theatre Technology)/B.Sc. (Radiotherapy Technology)/
BTM (Sem-1)

HUMAN VALUES, DE-ADDICTION AND TRAFFIC RULES

Subject Code : HVPE-101-18

M.Code : 93322

Date of Examination : 24-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. Section-A is compulsory.
3. Section-B contains five questions of four marks each. Attempt all.
4. Section-C contains five questions of six marks each. Attempt all.

SECTION-A

(10 × 1 = 10)

1. Write briefly :

i) What is Utility-Value?

उपयोगिता-मूल्य क्या है?

उपयोगिता-मूल्य की है?

ii) Explain Natural Acceptance.

सहज स्वीकृति समझाओ।

कुरबती मंजुरी समझाओ।

iii) How the value "care" is related with body?

मूल्य "ध्यान" शरीर के साथ कैसे संबंधित है?

मूल्य ध्यान शरीर के साथ कैसे संबंधित है?

iv) What do you mean by Respect?

आपका सम्मान से क्या मतलब है?

तुम्हारा आदर से क्या मतलब है?

[M-93322]

(S-17) 2499

v) What is Perseverance?

अटलता क्या है?

धीरज की है?

vi) What is the difference between prosperity and wealth?

समृद्धि और धन के बीच क्या अंतर है?

खुशहाली और अमीरी के बीच की अंतर है?

vii) What is Holistic System?

समग्र प्रणाली क्या है?

समग्रतापूर्ण प्रणाली की है?

viii) What is Cyclic Production?

चक्रीय उत्पादन क्या है?

चक्रीय उत्पादन की है?

ix) What is Existence?

अस्तित्व क्या है?

अस्तित्व की है?

x) What is value of any Unit in the larger order?

बड़े आदेश में किसी भी इकाई का क्या मूल्य है?

बड़े आदेश में किसी भी इकाई का क्या मूल्य है?

SECTION-B

(5 × 4 = 20)

2. What is the need for value education in technical and other professional Institutions?

तकनीकी एवं अन्य व्यावसायिक संस्थानों में मूल्यपरक शिक्षा की क्या आवश्यकता है?

तकनीकी और अन्य पेशेवर संस्थानों में मूल्य शिक्षा की आवश्यकता है?

3. Self-exploration is a process of dialogue between 'What you are' and 'What you really want to be'. Explain and illustrate.

आत्म-अन्वेषण 'आप क्या हैं' आप वास्तव में क्या बनना चाहते हैं' में आपस में संवाद की एक प्रक्रिया है। समझाओ और व्याख्या करो।

सह-अन्वेषण 'तुम्हारी क्या है' और 'तुम्हारी असल जिंदगी में क्या बनना चाहते हो' में आपस में संवाद की प्रक्रिया है। समझाओ और व्याख्या करो।

[M-93322]

(S-17) 2499

00 MAY 2024

06 MAY 2024



[illegible]

Total No. of Pages : 02

Total No. of Questions : 05

B.Com.(Hons.)/BA(JAMC)/ BHMCT/B.Sc.(Hons.)(Nutrition and Dietetics)/(AI & ML)(BT)/(FD)(G&WD)(IT)/(MLS)/ B.Voc. (Beauty Therapy and Aesthetics)/BTTM/BBA(SIM)/BCA(Sem.-1)

ENGLISH

Subject Code : BTHU103-18

M.Code : 75085

Date of Examination : 15-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTION TO CANDIDATES :

1. All questions are **COMPULSORY**.
2. Q1, Q2 and Q3 carry **TEN** marks each.
3. Q4 and Q5 carry **FIFTEEN** marks each.

1. What do you mean by Communication? Discuss in detail, the types of Communication.
2. Explain in detail the barriers to communication. Also, suggest the ways to overcome these barriers.
3. **Paraphrase the following:**

The proliferation of smartphones have revolutionized the way people communicate and access information. With the advent of mobile technology, individuals can now connect with others instantly, regardless of their location. Smartphones serve as multifunctional devices, providing access to social media platforms, email, web browsing, and countless apps for entertainment and productivity. As a result, people have become increasingly reliant on their smartphones for daily tasks and communication, blurring the lines between work and leisure.

4. On the basis of your reading of the following paragraph, answer the questions:

The melting of polar ice caps due to global warming poses significant threats to both wildlife and human populations inhabiting coastal regions. As polar ice melts, sea levels rise, increasing the risk of flooding in low-lying areas and displacing communities. Furthermore, the loss of sea ice deprives species such as polar bears and seals of crucial habitat, leading to declines in their populations and disrupting entire marine ecosystems. Additionally, the influx of freshwater from melting ice alters ocean currents and salinity levels, affecting global climate patterns and exacerbating extreme weather events. Addressing the melting polar ice caps requires urgent action to mitigate greenhouse gas emissions, promote sustainable energy sources, and implement adaptation strategies for vulnerable communities.

1 | M-75085

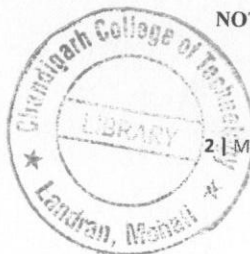
(S17)-2162

Answer the questions:

00 MAY 2024

- i) What are the primary threats posed by the melting of polar ice caps to both wildlife and human populations?
 - ii) How does the loss of sea ice impact marine ecosystems?
 - iii) What are some of the broader consequences of melting polar ice caps on global climate patterns and weather?
 - iv) What actions are suggested to address the issue of melting polar ice caps and its associated impacts?
 - v) **Write the meaning of the words:** deprives and exacerbating.
5. Write a report on the impact of urbanization on local ecosystems.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.



21-M-75085

(S17)-2162

00 MAY 2024

Roll No.

Total No. of Pages : 04

Total No. of Questions : 11

B.A.(JAMC) / BBA / B.Com (Hons) / BCA / BHMCT / B.Sc. Hons.
(Nutrition and Dietetics / Fashion Design / Graphics & Web Designing /
Information Technology / Medical Lab Sciences / Operation Theatre
Technology) / BTM / M.Com (Sem.-1, 2)

HUMAN VALUES, DE-ADDICTION & TRAFFIC RULES

Subject Code : HVPE101-18

M.Code : 75087

Date of Examination : 08-05-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

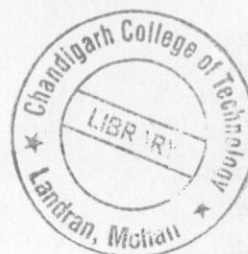
1. SECTION-A is compulsory.
2. SECTION-B contains FIVE questions. Each question carry FOUR marks. Attempt All.
3. SECTION-C contains FIVE questions with internal choice. Each question carry SIX marks. Attempt All.

SECTION-A

(10 × 1 = 10)

1. Write briefly :

- a) How the value "Guidance" is related with self.
मूल्य "सागंदशन" स्वयं के साथ कैसे संबंधित है?
मूल अगवादी सवे दे नाल किवें संबंधित है?
- b) What do you mean by respect?
आपका सम्मान से क्या मतलब है?
उहाडा आदर तें की मतलब है?
- c) What is animal order?
जीव आदेश क्या है?
जीव आदेश की है?
- d) What is innateness?
स्वाभाविकता क्या है?
सवाभाविकता की है?



- e) What is Utility-Value?
उपयोगिता-मूल्य क्या है?
उपयोगिता-मूल की है?
- f) What is value of any unit in the larger order?
बड़े आदेश में किसी भी इकाई का क्या मूल्य है?
बड़े आदेश विच किसे वी इकाई का की मूल है?
- g) What is Holistic System?
समग्र प्रणाली क्या है?
समग्रभौतिक प्रणाली की है?
- h) What is Perseverance?
अटलता क्या है?
धीरज की है?
- i) Explain Natural Acceptance.
सहज स्वीकृति समझाओ।
कुदरती मंजुरी समझाओ।
- j) What is Mutual Fulfilment?
पारस्परिक पूर्ति क्या है?
आपस की पूर्ति की है?

SECTION-B

(5 × 4 = 20)

2. What is the need for value education in technical and other professional Institutions?
तकनीकी एवं अन्य व्यावसायिक संस्थानों में मूल्यपरक शिक्षा की क्या आवश्यकता है?
तकनीकी अते हेंर पेशेवर संस्थावां विच मूल की सिंखिआ की की लेंड है?
3. What do you mean by SVDD, SSDD and SSSS? How is the transformation possible from SSDD to SSSS?
आपका SVDD, SSDD और SSSS से क्या मतलब है? SSDD से SSSS तक के लिए परिवर्तन कैसे संभव है?
उहाडा SVDD, SSDD अते SSSS तें की मतलब है? SSDD तें SSSS तें की उबदीली किस उतां संभव है?

4. What do you mean by Animal Consciousness and Human Consciousness? How is the transformation possible from Animal Consciousness to Human Consciousness?

आपका पशु चेतना और मानव चेतना से क्या मतलब है? पशु चेतना से मानव चेतना परिवर्तन कैसे संभव है?

उदाहरण पशु चेतना अਤੇ मनुषी चेतना तों की मज़लब है? पशु चेतना तों मनुषी चेतना तों की तबदीली किस तरुा संभव है?

5. Explain competence in Professional-Ethics.

पेशेवर नैतिकता में क्षमता समझाओ।

पेशेवर नैतिकता विंच समरंभा समझाओ।

6. What are the implications of value based living?

मूल्य आधारित जीवन यापन के अच्छे परिणाम क्या हैं?

कदरों कीमतों आधारित जीवन जीने के चंगे नतीजे की हन?

SECTION-C

(6 × 5 = 30)

7. Compare the Four Orders in nature on the basis of their salient aspects.

मुख्य पहलुओं के आधार पर प्रकृति में चार आदेशों की तुलना करें।

मुख्य पहलुओं के आधार पर चार आदेशों की तुलना करें।

OR

What is the meaning and purpose of Self-Exploration?

स्वयं-अन्वेषण के अर्थ और उद्देश्य क्या हैं?

आत्म - अधिगम के मतलब अਤੇ उद्देश्य की हन?

8. Describe basic human aspirations. What are the requirements to fulfill basic human aspirations?

बुनियादी मानवीय आकांक्षाएं क्या हैं? बुनियादी मानवीय आकांक्षाओं को पूरा करने के लिए आवश्यकताओं का वर्णन करें?

बुनियादी मनुषी इच्छाओं की हन? बुनियादी मनुषी इच्छाओं को पूरा करने के लिए आवश्यकताओं का वर्णन करें?

OR

What are the different patterns of differentiation?

भेदभाव के विभिन्न पैटर्न क्या हैं?

भेद के विभिन्न पैटर्न की हन?

9. What is the difference between belief and understanding?

विश्वास और समझ में क्या अंतर है?

विश्वास अਤੇ समझ विंच की अंतर है?

OR

What are the programmes to ensure Helath?

स्वास्थ्य को सुनिश्चित करने के लिए क्या-क्या कार्यक्रम हैं?

सिहत को ठीक रखने की विधियाँ-विधियाँ तरीके हन?

10. Critically examine our state today in terms of fulfillment of relationships and physical facilities. What has gone wrong according to you? What is the solution? रिश्तों की पूर्ति और भौतिक सुविधाओं की दृष्टि से आज हमारी स्थिति का आलोचनात्मक परीक्षण करें। आपके अनुसार क्या गलत हुआ है? क्या निदान है? रिश्तियों अਤੇ भौतिक सुविधाओं की पूर्ति के मामले विंच अंस सादे रास की गंभीरता नाल जांच करें। उदाहरण अनुसार की गलत होईया है? रोल की है?

OR

What are the five dimensions of Human Endeavour in society?

समाज में मानव प्रयास के पांच आयाम क्या हैं?

समाज विंच मनुष्य केंद्रित के पंस पहलू की हन?

11. Explain self-organisation and health.

आत्म संगठन और स्वास्थ्य के बारे में बताएं।

आत्म संगठन अਤੇ सिहत के बारे में विंच दसो।

OR

Suggest ways to enhance the fulfillment of human order with the other three orders. Mention any two programs you can undertake in light of the above.

अन्य तीन आदेशों के साथ मानव आदेश की पूर्ति को बढ़ाने के तरीके सुझाएं। उपरोक्त के आलोक में किन्हीं दो कार्यक्रमों का उल्लेख करें जिनमें आप अपना सकते हैं।

होर् तिन आदेशों के नाल मनुषी आदेश की पूर्ति को बढ़ाने के तरीके सुझाएं। उपरोक्त के आलोक में किन्हीं दो कार्यक्रमों का उल्लेख करें जिनमें आप अपना सकते हैं।

Note : Disclosure of Identity by writing Mobile No. or Making of Passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics and Web Designing) (Sem.-2)

FUNDAMENTALS OF STATISTICS

Subject Code : UGCA-1907

M.Code : 77728

Date of Examination: 13-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Answer briefly:

- a. Functions of statistics.
- b. Interview Schedule
- c. Rounding off data
- d. Ways to classify data.
- e. Histogram
- f. Relation between mean, median and mode.
- g. Measure of dispersion.
- h. Limitations of harmonic mean.
- i. Properties of a good measure of dispersion.
- j. Coefficient of variation.

SECTION-B

2. Elaborate statistics in singular and plural senses. What is its importance? Explain the usage of statistics in various disciplines.
3. What do you mean by collection of data? Explain various methods of collection of data with their merits and demerits.
4. Tables have the potential to present the information in a systematic way. Do you agree? What are the important constituents of a good table?

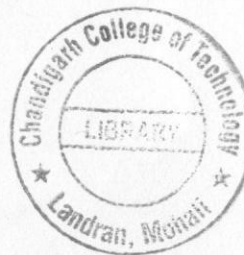
5. Calculate Mode:

x:	10-20	20-30	30-40	40-50	50-60	60-70
f:	8	10	17	10	8	5

6. Calculate Mean deviation from mean, median and mode :

x.	10-20	20-30	30-40	40-50	50-60	60-70
f:	10	7	17	25	16	8

7. Define various measures of dispersion with their merits and demerits. Also give relevant examples.



NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

DEC 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 08

B.Sc. (Graphics & Web Designing) (Sem.-2)
OBJECT ORIENTED PROGRAMMING USING C++

Subject Code : UGCA-1909

M.Code : 77730

Date of Examination : 12-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly:-

- (a) What is Object - Oriented Programming (OOP)?
- (b) What is an object in C++?
- (c) Describe the concept of inheritance in OOP?
- (d) What is a derived class in C++ inheritance?
- (e) What is a pure virtual function in C++?
- (f) Describe the concept of abstract classes in C++.
- (g) What is a friend function, and when is it used in C++?
- (h) What is a purpose of the "this" pointer in C++?
- (i) How is object different from a class?
- (j) What is meant by initialization of a variable?

SECTION-B

2. How does C++ handle multiple inheritances, and what are its challenges? Explain with example.
3. What is a constructor, and why is it used in C++ classes? Explain with example.

4. Write short notes on the following:

- (a) Break and continue
 - (b) Passing value between functions
5. Explain the meaning and purpose of the following with appropriate example.
 - (a) Template
 - (b) Tag
 - (c) Sizeof
 - (d) Struct
 6. Write a Recursive and non - recursive program in C++ using function for finding the factorial of a given number.
 7. Write a program to copy the content of a data file to another file. Make your own assumptions about the files.



NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (GWD) (Sem.-2)

CONCEPTS OF WEBSITE DESIGNING & DEVELOPMENT

Subject Code : UGWD-1903

M.Code : 77729

Date of Examination : 11-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

- SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
- SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

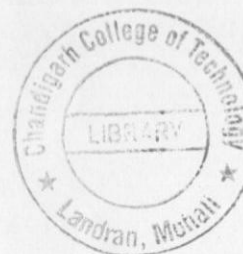
1. Write short note on the following:

- What are the fundamental elements that make up a URL (Uniform Resource Locator) in web addresses?
- How does an IP address function in internet communication, and what are the different types of IP addresses?
- What is the significance of display resolution in web design, and how does it affect the user's experience?
- What is the concept of bandwidth and its role in determining the speed and performance of a website?
- What is the look and feel of a website and how it influences user engagement and retention?
- How is the "sitemap" feature beneficial in planning and designing a website for improved navigation?
- Provide an overview of MySQL and its role in creating dynamic websites.
- State the significance of caching in web technology and its impact on website speed and responsiveness

- State the key considerations when planning and publishing a website, from domain registration to hosting selection.
- What is XML and how is it used in web development for data exchange and structure definition?

SECTION-B

- Compare and contrast different types of web servers based on classifications and their suitability for specific purposes.
- Explore the various creative commons licenses and their role in allowing content sharing and reuse on the internet.
- Discuss the role of scripting languages such as JavaScript and DHTML in enhancing the interactivity of websites.
- Explain the user-centric design approach in Web development and its impact on user experience and satisfaction.
- Provide an overview of web design parameters related to page layout, linking, and content organization.
- How do SEO practices influence the visibility and ranking of websites on search engines? Discuss the importance of ethical SEO strategies.



NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (G&WD) (Sem.-2)
ENVIRONMENTAL STUDIES

Subject Code : EVS-102-18

M.Code : 77734

Date of Examination : 09-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly:

- a) What is biosphere?
- b) Define the 10% rule in ecological pyramids.
- c) What is meant by ecological succession?
- d) What are the major components of the lithosphere?
- e) What do you understand by ecological niche?
- f) List any four biotic factors which influence the ecosystem.
- g) Why is meant by natural capital?
- h) List any four air pollutants which cause acid rain.
- i) List any four measures of water conservation.
- j) What is meant by 'red data book'?

SECTION-B

2. Discuss the urban problems associated with energy use. Suggest strategies to curb the same.
3. Draw and explain the trophic levels of a grazing food chain. Why is this understanding important?
4. Discuss the adverse effects of Modern Agriculture on soil and water resources. Use a case of Punjab.
5. Consider India as a mega biodiversity nation. Explain the biogeographical regions of India and the biodiversity hot spots.
6. Discuss the major effects of global climate change. Discuss also the national and international efforts to curb the same.
7. Explain the disaster mitigation strategies for :
 - a) Cyclone
 - b) Floods



NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

00 MAY 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics and Web Designing) (Sem.-2)

FUNDAMENTALS OF STATISTICS

Subject Code : UGCA/1907

M.Code : 77728

Date of Examination : 08-05-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

- SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
- SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Answer briefly :

- Features of Statistics.
- Methods of data collection.
- "Statistics can prove anything". Discuss this statement.
- Give formula to calculate mean median and mode in individual discrete and continuous series.
- Which method of Central tendency out of mean, median and mode do you considered to be the best and why?
- Objectives of Classification.
- Coefficient of Variation.
- Components of a Statistical Table.
- Graphic presentation of data.
- Harmonic Mean.



SECTION-B

- Write the definition of Statistics in singular and plural sense? Write also its importance, scope and limitations.
- 100 surnames were randomly picked up from a local telephone directory and frequency distributions of the number of letters in the English alphabets in the surname were obtained as follows :

No. of letter	1-4	4-7	7-10	10-13	13-16	16-19
No. of surnames	6	30	40	16	4	4

Determine the MEDIAN no. of letters in the surname. Find the MEAN no. of letters in the surname. Also find the MODAL size of the surname.

- The MEDIAN of the following data is 525. Find the values of x and y if the total frequency is 100.

Class Interval	0-100	100-200	200-300	300-400	400-500	500-600	600-700	700-800	800-900	900-1000
Frequency	2	5	X	12	17	20	y	9	7	4

- Explain the various methods for collecting primary data and secondary data.
- Calculate the MODE of the following series :

Marks:	5	10	15	20	25	30	35	40	45	50
No. of the students:	20	43	75	67	72	45	39	9	8	6

- List down the advantages and disadvantages of the Graphic presentation of the data.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

**B.Sc. (G&WD) (Sem.-2)
ENVIRONMENTAL STUDIES**

Subject Code : EVS-102-18

M.Code : 77734

Date of Examination : 19-05-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. **SECTION-A** is **COMPULSORY** consisting of **TEN** questions carrying **TWO** marks each.
2. **SECTION-B** contains **SIX** questions carrying **TEN** marks each and students have to attempt any **FOUR** questions.

SECTION-A

1. Write briefly:

- a) What do you understand by environmental science?
- b) What are the major objectives of environmental education?
- c) Why are decomposers called micro consumers?
- d) What is a food chain and food web?
- e) How will you classify natural resources?
- f) Distinguish between afforestation and agroforestry.
- g) What is Red data book?
- h) What are endangered and endemic species? Give examples for each.
- i) What do you understand by the term pollution and pollutants?
- j) What do you understand by the term epicenter?

SECTION-B

2. Explain the need of public awareness about the environment and its degradation.
3. What is an ecosystem? Describe briefly the forest and aquatic ecosystem.
4. What do you mean by deforestation? Explain its causes and ill effects.
5. What do you understand by soil erosion? What are the different factors responsible for increasing the rate of erosion?
6. What is meant by biodiversity? What is its concept; describe the uses and importance of biodiversity.
7. What is ozone hole? What are the causes of ozone hole formation? Discuss the effects of ozone hole layer depletion and its remedial measures.



NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

00 MAY 2024

Roll No.

--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (G&WD) (Sem.-2)

OBJECT ORIENTED PROGRAMMING USING C++

Subject Code : UGCA/1909

M.Code : 77730

Date of Examination : 15-05-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- a) What is the use of constructors?
- b) What is the use of copy constructors?
- c) What is a virtual class?
- d) How a file is opened in C++?
- e) What is a friend functions?
- f) How is object different from a class?
- g) What is meant by initialization of a variable?
- h) What is polymorphism?
- i) What is the advantage of scope resolution operator?
- j) What is a destructor?



SECTION-B

2. What are classes, and what are its various types of members? Give relevant examples to explain.
3. Write a class to represent a vector (a series of float values). Include member functions to perform the following tasks :
 - a) To create the vector
 - b) To modify the value of a given element
 - c) To multiply by a scalar value
 - d) To display the vector in the form (10,20,30,...)

Write a program to test your class.

4. Write a program to copy the contents of one file into another.
5. What do you understand by inheritance? Give its various types and access mechanisms.
6. Write a program to copy the contents of one file into another using command line arguments.
7. **Write short notes on :**
 - a. Overloading of template
 - b. Exception handling

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (G&WD) (Sem.-2)
ENVIRONMENTAL STUDIES
Subject Code : EVS/102/18
M.Code : 77734

Date of Examination : 18-05-2024

Time : 3 Hrs.

Max. Marks : 60

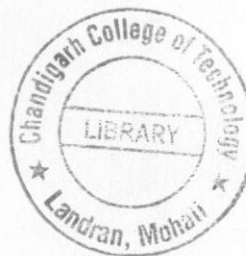
INSTRUCTIONS TO CANDIDATES :

- INSTRUCTIONS TO CANDIDATES :**
1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
 2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write Short notes on :

- i. Greenhouse gases
- ii. Flora and Fauna
- iii. Land pollution causes
- iv. Rainwater harvesting
- v. Types of biodiversity
- vi. Effects of rise in sea levels
- vii. Surface water bodies
- viii. Endemic species
- ix. Forest Conservation Act
- x. Effects of air Pollution



SECTION-B

2. Describe the different ecological pyramids and their implications.
3.
 - i) Describe the different hotspots of biodiversity in India.
 - ii) Discuss, why is it necessary to conserve biodiversity.
4.
 - i) Suggest different measures to control the pollution of water bodies.
 - ii) Describe the different ways to conserve water.
5. Describe in detail the causes of global warming. Also enlist its ill effects on planet earth.
6. Discuss the different means to conserve biodiversity.
7.
 - i) How does desertification of land happen?
 - ii) Brief about the cyclones and landslides.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Questions : 07

Total No. of Pages : 02

B.Sc. (G&WD) (Sem.-3)
DATABASE MANAGEMENT SYSTEMS

Subject Code : UGCA-1922

M.Code : 78473

Date of Examination : 02-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is **COMPULSORY** consisting of **TEN** questions carrying **TWO** marks each.
2. SECTION-B contains **SIX** questions carrying **TEN** marks each and students have to attempt any **FOUR** questions.

SECTION-A

1. Write briefly :
 - a. What are some common types of relationships that can be represented in an entity relationship model?
 - b. What is the need of database recovery modules?
 - c. How does a distributed database system differ from a centralized database system?
 - d. What is database normalization and how is it used to reduce data redundancy?
 - e. List various key components of a database schema.
 - f. How can relational algebra be used to optimize database performance?
 - g. What is database integrity and how can it be ensured?
 - h. What is the role of functional dependencies in database design?
 - i. How do data warehousing and data mining technologies complement a traditional DBMS?
 - j. What is Database Control Language (DCL), and how is it used to manage access control?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

SECTION-B

DEC 2024

2. How does Data Manipulation Language (DML) differ from DDL and what are some common DML commands used to manipulate data in a relational database system? Explain some common DML operations.
3. How can multivalued dependencies (MVDs) be used to identify and eliminate data redundancy in a database? Explain the concept of a functional dependency and how it relates to MVDs.
4. What is relational algebra, and how is it used to manipulate data in a relational database system? Explain some common operations of relational algebra, such as selection, projection, join and aggregation.
5. What is a distributed database, and how does it differ from a centralized database system? Explain some common features of distributed database systems, such as data fragmentation, replication and distributed transaction management.
6. What are database triggers, and how are they used to automate actions or perform validations in response to certain events or conditions in a database? Explain some common types of database triggers, such as BEFORE and AFTER triggers.
7. How can an entity relationship model be used to design and implement a database? Describe the steps involved in creating an entity relationship model, from identifying the entities and attributes to defining the relationships and constraints.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics & Web Designing) (Sem.-3)

IMAGE EDITING & PHOTOGRAPHY

Subject Code : UGWD1907

M.Code : 78477

Date of Examination : 10-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

I. Write briefly :

- a) Discuss different camera modes for video and image shoot.
- b) Why different angles are used in Black and White image acquisition?
- c) Why lighting is important in daylight photography?
- d) What is the difference between low resolution and low contrast image editing?
- e) Which image format is preferred to upload images on internet and how it is converted from JPEG?
- f) What is the purpose of blemishes image editing in photography?
- g) What is the purpose of 'Low ISO', 'Slow shutter speed' and 'Auto white balance' in camera settings?
- h) What is the importance of 'image size' and 'image dimensions' in image storing.
- i) How an image is represented in digital format?
- j) Differentiate between 'byte-image' and 'true-color' images.

SECTION-B

DEC 2024

2. What are major hardware components of a digital camera? Give details of each component used with cameras in daylight and night-time photography.
3. What is the purpose to use different camera modes? Enlist and explain characteristics of each camera operation modes.
4. What do you mean by 'image-sequence' and 'image-frame'? How these are used in movie editing and movie making.
5. What are lighting tools used with night-time photography? How 256-intensity level light illuminated images are acquired in night-time?
6. Discuss in detail: natural light, flat-light, backlight, soft-light, hard-light, Rim-light, Loop light, Broad light, short light, Butterfly light, split light and Rembrandt light in photography.
7. What is camera exposure? Discuss camera exposure compensation and camera aperture's role in high quality image acquisition.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

DEC 2024

Roll No.

Total No. of Pages :02

Total No. of Questions : 07

B.Sc. (Graphics & Web Designing) (Sem.-3)

ELEMENTS OF DESIGN

Subject Code : UGWD-1905

M.Code : 78472

Date of Examination : 13-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly on :

- a) Name different color schemes.
- b) Explain the term Tones.
- c) List visual elements of design.
- d) What are Textures?
- e) What is the difference between shade and tone?
- f) What is the purpose of phenomenology?
- g) Difference between 2D and 3D.
- h) What do you understand by the term Hue?
- i) How do you use triadic color scheme?
- j) What is the purpose of emphasis?

SECTION-B

2. Explain the different color schemes. Discuss in detail concept of mixing of primary, secondary and tertiary colors.
3. What is Composition? What are the principles of composition?
4. a) Explain the concept of warm color and cool color.
b) Discuss in detail about complementary colors scheme.
5. Explain in detail the elements of Design. What are different applications of design?
6. Explain the Concept of Design Space. What are the principles of visual perception?
7. a) Explain in detail how typography can be combined as text and image?
b) Discuss the concept of Harmony and Unity in detail.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (I.T) / BCA (Sem.-3)

DATA STRUCTURES

Subject Code : UGCA1915

M.Code : 78181

Date of Examination : 23-12-2024

Time : 3 Hrs.

Max. Marks : 60

SECTION-B

2. Differentiate between arrays and linked list.
3. Explain depth first search and breadth first search in graphs.
4. Perform bubble and selection sort on given array :

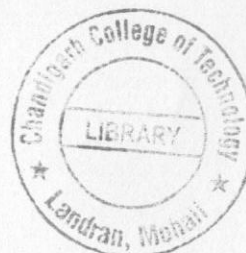
43, 57, 66, 11, 9, 96, 23, 37, 72, 88
5. How to convert in-fix notation into post-fix notation?
6. What is a Queue? Write algorithm to insert and delete a node in circular queue.
7. What is BST? Explain its traversals with an example.

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
- a) Flowchart
 - b) Array vs Pointers
 - c) * Complete binary tree
 - d) De-queue
 - e) Big 'O' Notation
 - f) Stack
 - g) Out-degree
 - h) AVL Tree
 - i) Linked List
 - j) Recursion.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics & Web Designing) (Sem.-3)

IMAGE EDITING & PHOTOGRAPHY

Subject Code : UGWD1907

M.Code : 78477

Date of Examination : 15-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
- Discuss different camera modes for video and imaging photography.
 - Why different angles are used in Black and White image acquisition.
 - What is the importance of illuminance lighting in indoor and outdoor photography?
 - What is the difference between low resolution and low contrast Image Editing?
 - Discuss various internet/web image formats along with preferred one used to publish internet images.
 - What is the purpose of blemishes image editing in photography?
 - What is the purpose of 'Low ISO', 'Slow shutter speed' and 'Auto white balance' in camera settings.
 - What do you mean by image compression. Differentiate between loss-less and lossy compression techniques.
 - How the analogue light energy is converted into digital discrete values and what name is given to this process?
 - Define 'color image', 'gray-levels image' and 'binary images'.

1 | M-78477

(S3)-2129

SECTION-B

2. Discuss different hardware components of a digital camera. Give details of indoor and outdoor videography component used with cameras in night-time and day-time photography.
3. How would you design an engaging composition?
4. What do you mean by 'image-sequence' and 'image-frame'? How these are used in movie editing and movie making.
5. What are lighting tools used with night-time photography? How, 256-intensity level light illuminated images are acquired in night-time.
6. Discuss in detail: natural light, flat-light, backlight, soft-light, hard-light, Rim-light, Loop light, broad light, short light, Butterfly light, split light and Rembrandt light in photography.
7. What is camera exposure? Discuss camera. What is shutter-speed of a digital camera? How it is used to acquire the still photographs of moving objects exposure compensation and camera aperture role in high quality image acquisition?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

2 | M- 78477

(S3)-2129

00 MAY 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (G&WD) (Sem.-3)

DATABASE MANAGEMENT SYSTEMS

Subject Code : UGCA1922

M.Code : 78473

Date of Examination : 13-06-2024

Time : 3 Hrs.

Max. Marks : 60

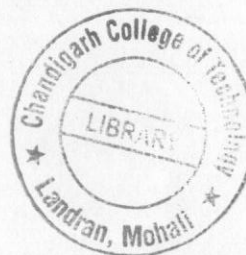
INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is **COMPULSORY** consisting of **TEN** questions carrying **TWO** marks each.
2. SECTION-B contains **SIX** questions carrying **TEN** marks each and students have to attempt any **FOUR** questions.

SECTION-A

1. Write briefly :

- a. Entity
- b. DDL
- c. Components of DBMS
- d. Database Trigger
- e. Data Redundancy
- f. DCL
- g. DKNF
- h. Symbols used in ER Modelling
- i. SQL
- j. Database Integrity.



SECTION-B

2. Compare Network, Hierarchical and Relational Models.
3. Write a note on Cursors and Stored Procedures.
4. Explain in detail First Three Normal Forms used in Normalizations with suitable examples.
5. Explain the concept of Multi-valued and Join dependencies with suitable examples.
6. What do you understand by Concurrency Management, Integrity and control used in databases?
7. Explain in detail the design of distributed databases.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics & Web Designing) (Sem.-3)

ELEMENTS OF DESIGN

Subject Code : UGWD1905

M.Code : 78472

DATE OF Examination : 11-06-2024

Time : 3 Hrs.

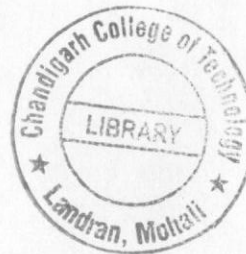
Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
 - a) List the fundamental elements of design.
 - b) What is the significance of line and shape in visual composition?
 - c) Define positive and negative space in design.
 - d) What is the importance of unity and variety in design?
 - e) What are the five elements of perception?
 - f) Define unity in the context of composition.
 - g) What are radial balance and its application in design?
 - h) What are the primary colors and how are they used in color mixing?
 - i) Explain the concept of tertiary colors and give an example.
 - j) What is the difference between Harmony and Rhythm?



SECTION-B

2. a) What are the key elements of critical thinking when analyzing 2D art?
b) What is design space, and how does it influence the arrangement of visual elements?
3. Write a detailed note on the three fundamental principles of composition in art.
4. Explain how the use of black and white in design composition creates contrast? What effect does this contrast have on the viewer's perception?
5. What is a color wheel? How do primary colors combine to create secondary colors? Explain.
6. Write the characteristics and applications of complimentary color schemes. How do these schemes create visual harmony and balance in compositions?
7. **Write notes on following topics :**
 - a) Concept of Warm color and Cool color.
 - b) Positive and Negative Composition.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

DATA STRUCTURES

M.Code : 78181

Time : 3 Hrs.

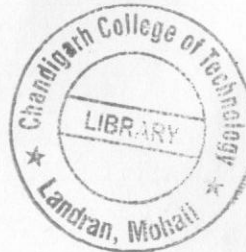
Max. Marks : 60

2. Write an operation to Delete n nodes after m nodes of a linked list.
3. Discuss various operations on queues. How it can be implemented?
4. How a two dimensional array is represented in memory?
5. Give the brief introduction to AVL trees and its applications in data structure.
6. What is Hashing? Write the types of Hash Function.
7. Discuss use and working of Shortest Path Algorithm.

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

1. Write briefly :

- a) Discuss analysis of Algorithm.
- b) What is Dynamic Memory?
- c) Discuss Double Linked List.
- d) What is a Pointer?
- e) Write a short note on Strings.
- f) Explain multiple stack.
- g) What is B Tree?
- h) Discuss Quick sort.
- i) Write concept of Graph Traversal.
- j) What is Hash Collision?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

DEC 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics and Web Designing) (Sem.-4)

VIDEO EDITING

Subject Code : UGWD1911

M.Code : 79536

Date of Examination : 11-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- a. Stereo Sound
- b. MP3
- c. Modulation
- d. XLR Connector
- e. Web formats
- f. Dynamic microphone
- g. Graphics
- h. Loops
- i. Audio Mixer
- j. Streaming

SECTION-B

2. Establish the relationship between media theory and culture.
3. Describe the workflow of dubbing process.
4. Explain frequency, amplitude, wavelength, audio sync and time code.
5. Discuss the audio compressions and formats.
6. What are the essential requirements for VO artist?
7. Discuss the benefits of using digital audio over the traditional analogue format.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

DEC 2024

Roll No. [] [] [] [] [] [] [] [] [] []

Total No. of Pages : 02

Total No. of Questions : 01

B. Sc. (Illustration and Web Designing) (Sem.-4)

ANIMATION ART

Subject Code : UGWD-1909

M Code : 79531

Date of Examination : 12-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES:

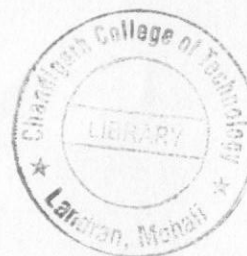
1. SECTION-A is compulsory consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

- I. Write briefly:
 - a. Sketch
 - b. Texture
 - c. Perspective
 - d. Clutch Pencil
 - e. Brass
 - f. Morphology
 - g. Charcoal Pencil
 - h. News Print
 - i. Visual Weight
 - j. Unity

SECTION-B

2. What are the different colors? Describe their usage.
3. Discuss the effects of light and shadow on objects.
4. Discuss the study of living world.
5. Explain how you would draw from a mannequin.
6. Discuss balance, rhythm and proportion with respect to human figure.
7. Describe the process of drawing moments of camera in a story board.



NOTE: Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics and Web Designing) (Sem.-4)

COMPUTER GRAPHICS

Subject Code : UGCA-1934

M.Code : 79532

Date of Examination : 14-12-2024

Time : 3 Hrs.

Max. Marks : 60

SECTION-B

- 2) What are various applications of computer graphics? Also, discuss the functions of any five input devices used for computer graphics in detail.
- 3) Mention the technology used in CRT monitors. Describe the color generating techniques i.e., Shadow mask and Beam Penetration.
- 4) Define cartesian coordinate system and need of a homogeneous co-ordinate system. Further discuss the concept of shearing.
- 5) Why is scan conversions required in computer graphics? Explain the steps of Bresenham's algorithms for drawing circle by taking a suitable example.
- 6) Clip a line A (-1,5) and B (3,8) using Cohen Sutherland algorithm for clipping with window coordinates (-3,1) and (2,6).
- 7) Write short notes on the following w.r.t 3D graphics:
 - a) Translation and Scaling.
 - b) Color Shading.

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1) Write briefly :

- a) What are different types of graphs in computer graphics?
- b) Briefly mention the role of a digitizer and image scanner.
- c) Differentiate between RGB and CMY color models.
- d) Define scan conversion and give example.
- e) Show the matrix representation for 2D scaling.
- f) State any two graphic functions along with their syntax.
- g) Define 3D rotation and give its example.
- h) What is morphing process in computer graphics?
- i) Enlist few applications of virtual reality.
- j) What are the advantages of character generation?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

00 MAY 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics and Web Designing) (Sem.-4)

COMPUTER GRAPHICS

Subject Code : UGCA1934

M.Code : 79532

Date of Examination : 14-05-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Answer briefly :

- a. What is the relationship between the rotations R_θ , R_ϕ and R_ψ^{-1} ?
- b. What are emissive and non-emissive displays? Give examples of each.
- c. Show that the composition of two rotations is additive by concatenating the matrix representations for $R(\theta_1)$ and $R(\theta_2)$ to obtain $R(\theta_1)$. $R(\theta_2) = R(\theta_1 + \theta_2)$.
- d. What are vanishing points?
- e. What are the various anomalies associated with perspective projections?
- f. What is scan conversion? What is its need?
- g. In painterly drawings, why parallel railway tracks are shown to converge at horizon?
- h. Write a transformation matrix for reflection about xz-plane.
- i. What is lookup table? What is its use?
- j. What is window and viewport?

SECTION-B

2. a. Find the normalization transformation that maps a window whose lower left corner is at (1,1) and upper right corner is at (3,5) onto a viewport that is the entire normalized device screen.
- b. Reflect the diamond-shaped polygon whose vertices are A(-1,0), B(0,-2), C(1,0), and D(0,2) about the line $y=x+2$.
3. Given a unit cube with one corner at (0,0,0) and the opposite corner at (1,1,1), derive the transformations necessary to rotate the cube by Θ degrees about the main diagonal (from (0,0,0) to (1,1,1)) in the counterclockwise direction when looking along the diagonal towards the origin.
4. Describe in detail Sutherland-Hodgeman polygon clipping algorithm. What is the problem that this algorithm encounters when applied on concave polygons.
5. Derive the general perspective transformation onto a plane with reference point $R_0(x_0, y_0, z_0)$, normal vector $N = n_1I + n_2J + n_3K$, and using C(a, b, c) as the centre of projection.
6. Write 8-connected boundary filling algorithm. Out of 4-connected and 8-connected boundary fill algorithm, which algorithm would you use to fill a region bounded by 8-connected boundary?
7. **Write short notes on :**
 - a. Morphing techniques
 - b. Character Generation



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

00 MAY 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics and Web Designing) (Sem.-4)

ANIMATION ART

Subject Code : UGWD1909

M.Code : 79531

Date of Examination : 13-05-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Answer briefly :

- a. Surface
- b. Contrast
- c. Light & shadow
- d. 3 Dimension
- e. Impact
- f. Proportion
- g. Tilt
- h. OTS
- i. Visual Balance
- j. Curved Lines.

SECTION-B

2. Discuss the effects of light and shadow on objects.
3. Discuss the theory of view point.
4. What ways would you represent trees, plants, brushes and shrubs with attention to proportion volume and behavior?
5. Explain how would you draw from a mannequin?
6. Discuss balance rhythm and proportion with respect to human figure.
7. Describe the process of drawing moments of camera in a story board.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Questions: 07

PROGRAMMING IN PYTHON

Subject Code : UGCA-1914

M.Code : 79530

Date of Examination : 21-05-2024

Max. Marks: 60

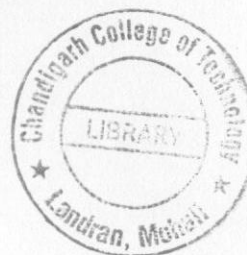
Time: 3 Hrs.

INSTRUCTIONS TO CANDIDATES :

- INSTRUCTIONS TO CANDIDATES :**
1. SECTION-A is **COMPULSORY** consisting of **TEN** questions carrying **TWO** marks each.
 2. SECTION-B contains **SIX** questions carrying **TEN** marks each and students have to attempt any **FOUR** questions.

SECTION-A

1. Answer briefly:
 - a. What are control structures in python?
 - b. What is slicing in python?
 - c. What is the difference between python arrays and lists?
 - d. What are global, protected, and private attributes in python?
 - e. What are common built-in datatypes in python?
 - f. What is an interpreted language?
 - g. What is a dynamically typed language?
 - h. Explain the `split()` and `join()` functions in python.
 - i. Name two functions to delete a file in python.
 - j. What is the difference between mutable and immutable datatype?



SECTION-B

2. What is Python? What are the benefits of using Python?
3.
 - a. What are python namespaces?
 - b. What are literals in python? Explain various of its types.
4.
 - a. What does a `[:-1]` do? Explain using an example.
 - b. Discuss the various operations on tiles in python.
5. What are lists and tuples? What is the key difference between the two?
6.
 - a. What are user defined functions in python?
 - b. Write a pseudo code in python to check if the entered number by the user is prime or not.
7. What are modules in Python? Discuss their advantages.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Questions : 07

MULTIMEDIA 2D & 3D DESIGNING

M.Code : 90377

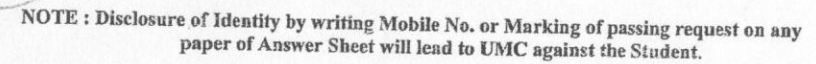
Time : 3 Hrs.

Max. Marks : 60

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

- a) Frame rate
- b) Shape tween
- c) Animations
- d) Walk cycle
- e) Sound
- f) Gestures
- g) Emotions
- h) Accents
- i) Timing and Spacing.
- j) 3D Designing

2. Differentiate between shape tween and motion tween with help of example.
3. Describe the process of importing and modifying photos.
4. How the sound files are imported? Explain.
5. Explain the use of scene layout and procedure in preparation of final production.
6. Write a note on situations and character-driven scenarios.
7. Briefly explain scents, dialects, mouth movements and facial expressions.



[illegible]

Total No. of Questions : 07

Total No. of Pages : 02

Bachelor of Science (Graphics & Web Designing) (Sem.-5)

PROGRAMMING IN PHP

Subject Code : UGCA1929

M.Code : 90376

Date of Examination : 28-11-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

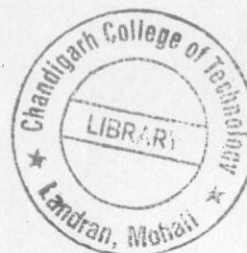
1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
 - a) Differentiate between session and cookie.
 - b) Differentiate between \$_GET and \$_POST methods in PHP.
 - c) What are interfaces in PHP?
 - d) What is client-side scripting?
 - e) What is a super global variable?
 - f) What do you mean by Dynamic Function? Explain it.
 - g) Explain Single & Multidimensional arrays.
 - h) What is escaping in PHP?
 - i) How will you generate a random number using PHP?
 - j) What is the function name in PHP to delete an element from an array?

SECTION-B

2. Write a function that interchanges and prints the value of two integers A and B without using any extra variable.
3. What are FORMS? Explain different Form fields.
4. Write a program to implement a walk cycle using PHP programming.
5. How web pages are formed in PHP using CSS? Explain it using a suitable example.
6. a) Explain Debugging process of PHP.
b) Discuss Control structures of PHP.
7. What is SQL? How to update the contents from TABLE A to TABLE B?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (Graphics & Web Designing) (Sem.-5)

ARTIFICIAL INTELLIGENCE

Subject Code : UGCA1945

M.Code : 90381

Date of Examination : 05-12-2024

Time : 3 Hrs.

Max. Marks : 60

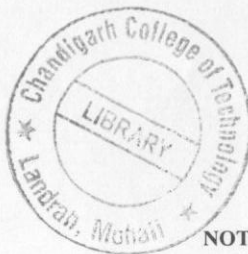
INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

I. Write briefly :

- a) What are weak methods?
- b) Identify the main difficulties that led to the disillusion with AI in the early 1970s.
- c) Define a certainty factor.
- d) Give an example of the rule representation in the expert system based on Bayesian reasoning. R.
- e) What are the main steps in the fuzzy inference process?
- f) What are the different types of artificial intelligence agents?
- g) Briefly describe the Hill Climbing algorithm.
- h) With the help of an example explain the working of backward chaining.
- i) Write a brief note on pattern recognition.
- j) State the Bayes rule and explain its application in reasoning with uncertain knowledge.



SECTION-B

2. What are a fuzzy set and a membership function? What is the difference between a crisp set and a fuzzy set? Determine possible fuzzy sets on the universe of discourse for man weights.
3. Discuss various methods of representing structured knowledge such as associative networks, frames, conceptual dependencies and scripts. Give suitable example for each.
4. Explain any two algorithms of uninformed search. Discuss their performance evaluation.
5. Explain the process resolution as an inference mechanism. Consider the following facts and use resolution to prove that "John likes peanuts."
 - a) John likes all kinds of food.
 - b) Apple and vegetable are foods.
 - c) Anything anyone eats and is not killed by is food.
 - d) Anil eats peanuts and is still alive.
 - e) Harry eats everything that Anil eats.
6. Discuss the characteristics and architecture of rule-based systems. What are the various conflict resolution techniques used by rule-based agents?
7. Discuss various notions of intelligence in machines. How is state space search used in artificial intelligence? The 8-queens problem is to place 8 queens on a chessboard such that no queen attacks another as per chess rules. Pose the problem as state space search problem.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No. _____

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (Graphics & Web Designing) (Sem.-5)

ARTIFICIAL INTELLIGENCE

Subject Code : UGCA1945

M.Code : 90381

Date of Examination : 05-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
- What are weak methods?
 - Identify the main difficulties that led to the disillusion with AI in the early 1970s.
 - Define a certainty factor.
 - Give an example of the rule representation in the expert system based on Bayesian reasoning. R.
 - What are the main steps in the fuzzy inference process?
 - What are the different types of artificial intelligence agents?
 - Briefly describe the Hill Climbing algorithm.
 - With the help of an example explain the working of backward chaining.
 - Write a brief note on pattern recognition.
 - State the Bayes rule and explain its application in reasoning with uncertain knowledge.

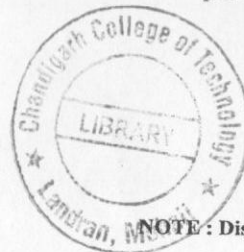
1 | M-90381

(S3)-517

SECTION-B

DEC 2024

2. What are a fuzzy set and a membership function? What is the difference between a crisp set and a fuzzy set? Determine possible fuzzy sets on the universe of discourse for man weights.
3. Discuss various methods of representing structured knowledge such as associative networks, frames, conceptual dependencies and scripts. Give suitable example for each.
4. Explain any two algorithms of uninformed search. Discuss their performance evaluation.
5. Explain the process resolution as an inference mechanism. Consider the following facts and use resolution to prove that "John likes peanuts."
 - a) John likes all kinds of food.
 - b) Apple and vegetable are foods.
 - c) Anything anyone eats and is not killed by is food.
 - d) Anil eats peanuts and is still alive.
 - e) Harry eats everything that Anil eats.
6. Discuss the characteristics and architecture of rule-based systems. What are the various conflict resolution techniques used by rule-based agents?
7. Discuss various notions of intelligence in machines. How is state space search used in artificial intelligence? The 8-queens problem is to place 8 queens on a chessboard such that no queen attacks another as per chess rules. Pose the problem as state space search problem.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

2 | M-90381

(53)-517

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Computer Applications (Sem.-5)

COMPUTER GRAPHICS

Subject Code : UGCA1934

M.Code : 90317

Date of Examination : 09-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- a. What types of input devices are commonly used in modern computing systems?
- b. What are some common applications of virtual reality environments?
- c. How do flat panel displays achieve higher resolutions and refresh rates?
- d. How do algorithms for line drawing differ between raster and vector graphics?
- e. How does the choice of algorithm affect the quality and efficiency of circle drawing?
- f. What are the common types of 2D transformations used in computer graphics?
- g. What is perspective projection and how does it differ from parallel projection in computer graphics?
- h. What are some common applications of parallel projection in computer graphics?
- i. How do algorithms for ellipse drawing differ from those for circle drawing?
- j. Why have CRT displays become less common in recent years?

SECTION-B

2. How do clipping algorithms differ between vector and raster graphics? Given the line segment with end points (3, 4) and (8, 10) and the clipping rectangle with corners (4, 5) and (10, 8), apply the Cohen-Sutherland algorithm to clip the line segment.
3. What is the difference between homogeneous coordinates and Cartesian coordinates in 2D transformations? What is the result of applying the translation matrix $\begin{bmatrix} 1 & 0 & 2 \\ 0 & 1 & 3 \\ 0 & 0 & 1 \end{bmatrix}$ to the point (4, 5) after rotating this point on 60° around origin?
4. What are the advantages and disadvantages of LCD flat panel displays compared to traditional CRT displays? What is the difference between working of an LED and OLED flat panel display?
5. What is the perspective projection matrix and how does it transform 3D coordinates to 2D coordinates on the image plane? What are the different types of parallel projections and how are they used in computer graphics applications?
6. What are some common algorithms for filling of closed region in raster graphics? Discuss their working and how do these algorithms differ in terms of efficiency and accuracy?
7. What are some common circle drawing algorithms and how do they work? Explain the concept of Mid-point.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Questions : 07

B.Sc (G&WD) (Sem.-5)
LIGHTING AND RENDERING

Subject Code : UGWD1914

M.Code : 90378

Date of Examination: 10-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly:

- What is virtual light scene rendering is created in Maya?
- Give five major applications of Computer-generated graphical rendering.
- What and how basic Computer Graphics (CG) elements are used in object rendering.
- What are primary color models and how these are used in computer graphics to generate more true colors?
- What is the purpose of mental ray in object shading?
- Differentiate between 'global illumination' and 'ray-tracing' modeling.
- What is the effect of source-light 'absorption', 'reflection' and 'refraction' in CG?
- What are the applications of body sub-divisions in CG rendering?
- Write short note on 'Azimuth'.
- Differentiate between 'aliased' and 'anti-aliased' contrast based rendering quality.

2. Define computer graphics. Give basic elements of graphics systems and how these systems are programmed for rendering.
3. What are modern day '*multimedia graphics system*' requirements? List and discuss various hardware and software components required for these types of systems.
4. Discuss various properties of Maya shader for rendering different lighting effect models to create virtual real environment.
5. What are important characteristics you keep in mind while selecting a rendering engine? Give example of one rendering engine you have used and its features.
6. What are render settings preferences modes for anti-aliasing quality? Discuss precomputed, precomputed + Reflections and precomputed + shadows illumination modes for quality rendering.
7. What is the purpose of photons tracing in interior scene and exterior scene illumination.



NOTE: Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (Graphics & Web Designing) (Sem.-5)

LINUX OPERATING SYSTEM

Subject Code : UGCA1935

M.Code : 90380

Date of Examination : 17-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

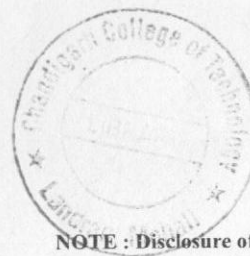
SECTION-A

1. Write briefly :

- a) What are some common vi commands for editing text?
- b) List two limitations of using Linux over other operating systems.
- c) What is the difference between grep and sed?
- d) What is shell in Linux?
- e) What are some commonly used file systems in Linux?
- f) What is the difference between open source and proprietary software in Linux?
- g) What are some common Linux administrative tasks?
- h) What is the purpose of firewall in Linux administration?
- i) What is shell scripting in Linux?
- j) How do you create and move files and directories in Linux?

SECTION-B

2. What are the different components of the Linux operating system, and how do they work together?
3. Explain the different types of loops available in shell scripting, and provide examples of how each type can be used in a script.
4. Describe the Linux file system hierarchy and the purpose of each directory. How does the file system differ from that of other operating systems?
5. What is system administration in Linux and what are the key responsibilities of a Linux system administrator?
6. What is the Linux kernel and how is it used in Linux operating systems? Describe the structure of the kernel and the different components that make up the kernel.
7. What are Linux desktop environments and how are they used by end-users? Describe the different types of desktop environments available in Linux, including GNOME, KDE.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc (GWD) (Sem.-6)
INTRODUCTION TO GAMING
 Subject Code : UGCA1918
 M.Code : 92000
 Date of Examination : 16-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- a) Game
- b) Interface
- c) 2D Game
- d) Levels
- e) Control panel
- f) Game types
- g) Game parameters
- h) UML diagram
- i) Game canvas
- j) Game obstacles



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

SECTION-B

2. Explain the different genres of gaming.
3. Differentiate between various gaming platforms.
4. Discuss the fields exit inside programming for games.
5. Write a note on different theories of fun and flow.
6. How levels are used in development of a game?
7. Discuss the game application for haunted mansion.

[illegible]

Total No. of Questions : 07

LINUX OPERATING SYSTEM

Subject Code : UGCA1935

M.Code : 90380

Date of Examination : 20-06-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
- a) What is the VI editor?
 - b) Is KDE slower than GNOME?
 - c) What is the purpose of shell and kernel?
 - d) What information is presented when these commands are entered:
 - (i) passwd
 - (ii) who?
 - e) What is grep command used for in Linux?
 - f) How to do a backup on Linux?
 - g) What is meant by path and pathname in Linux?
 - h) What is swap space?
 - i) Mention the Linux file structure components.
 - j) List some methods of virtualization available on Linux.



SECTION-B

2. Write a shell program for counting characters, words and line?
3. a) Explain the kernel support for file system.
b) Explain about symlink () function with example program.
4. Explain ftp and its importance in Linux?
5. What are the functions of the kernel? Describe the process of rebuilding and installing kernel.
6. What are the file types available in Linux? Discuss file operators with suitable examples.
7. **Explain briefly :**
 - a) Graphic Tools and Multimedia
 - b) Internet and Network Services.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (Graphics & Web Designing) (Sem.-5)

PROGRAMMING IN PHP

Subject Code : UGCA1929

M.Code : 90376

Date of Examination : 12-06-2024

Time : 3 Hrs.

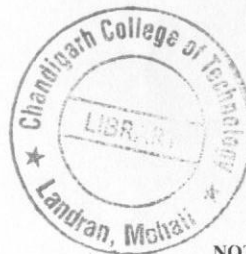
Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
- Provide an example of a basic PHP script that prints "Hello, World!" to the screen.
 - Explain the difference between local and global variables in PHP.
 - What is an armature in the context of character animation?
 - What is lip syncing, and why is it important in animation production?
 - What are forms in PHP?
 - Describe the concept of a superglobal array in PHP.
 - List the basic operations involved in working with directories in PHP.
 - What is the purpose of the DELETE statement in relation to MySQL database?
 - Name two popular RDBMS.
 - How are the comments written in PHP?



SECTION-B

2. a) What are the essential components of basic PHP development.
b) Write a note on the different types of operators in PHP.
3. Write the steps involved in creating a walk cycle animation from designing the armature to executing the animation.
4. Briefly describe a method for creating basic lip-syncing animation based on an audio track.
5. In PHP, how do you create a basic HTML form to collect user input? Explain with an example.
6. **Describe the PHP function for the following :**
 - a) Opening and closing a file.
 - b) Reading and writing a file.
7. a) Write and explain the steps used to establish a connection between PHP and a MySQL database.
b) Describe the process of deleting a record from a MySQL table with PHP.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

[illegible]

Total No. of Questions : 07

Total No. of Pages : 02

B.Sc(Graphics & Web Designing) (Sem.-6)

DIGITAL MARKETING

Subject Code : UGCA1947

M.Code : 91999

Date of Examination : 18-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

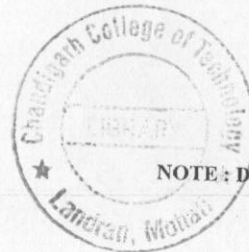
1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
 - a. Search Engine marketing
 - b. Define Social media optimization.
 - c. Referral Marketing
 - d. Website planning for SEO
 - e. Describe Blogging.
 - f. What is Viral Marketing?
 - g. Importance of Web Analytics.
 - h. Outbound marketing
 - i. Organic versus paid Ads.
 - j. Off page optimisation.

SECTION-B

2. What is content marketing strategy? Describe the role of content in marketing for different platforms.
3. Describe the business analysis and discuss the dimensions of business analysis. What is the role of key research for BA?
4. Discuss in detail how mobile is useful for advertising? Elaborate in detail the CTR, CPC, CPM and PPC.
5. Highlight the importance of digital marketing. What are the critical components of online marketing?
6. What is social media marketing and what are the strategies of marketing under each platform of social media?
7. Describe the search engine optimisation and why it is required? Highlight the strategies of SEO?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (Graphics & Web Designing) (Sem.-6)

MOTION GRAPHICS & COMPOSITION

Subject Code : UGWD-1917

M.Code : 91998

Date of Examination : 20-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :

- a) Promos
- b) GUI
- c) Presets
- d) Pre-rendering
- e) Masking
- f) Expression Animation
- g) Time remapping
- h) Pitch
- i) Pull Down
- j) NTSC

SECTION-B

2. What do you mean by nesting? How does it help manage layers?
3. What do you mean by network rendering? How does it help?
4. Explain the different methods of animating text.
5. Discuss the color correction effects giving examples.
6. Describe the process and benefits of using proxies.
7. When creating a composite in after effects, how do you decide which blend modes to use, and how do you fine-tune them for the desired effect?



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc.(G&WD) (Sem.-6)
PROGRAMMING IN JAVA
Subject Code : UGCA1932
M.Code : 92001

Date of Examination : 24-12-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

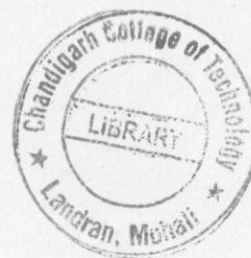
1. SECTION-A is **COMPULSORY** consisting of **TEN** questions carrying **TWO** marks each.
2. SECTION-B contains **SIX** questions carrying **TEN** marks each and students have to attempt any **FOUR** questions.

SECTION-A**1. Write briefly:**

- a) What is the use of String Buffer class?
- b) What are various ways to write comments in Java?
- c) What is thread scheduler and thread priority in Java?
- d) List various decision-making statements used in Java.
- e) What are built-in exceptions?
- f) What is the role of multilevel interface in Java?
- g) List some challenges of Java programming language.
- h) Give an example of the usage of Break statement.
- i) What are Filtered Byte Streams?
- j) What do you mean by scope of a variable?

SECTION-B

2. Compare and contrast the while, do-while and for loop statements with examples.
3. List and discuss significant features of object oriented programming paradigm.
4. Discuss the Applet life cycle with an example. What are the various ways to add graphics in an Applet?
5. How exceptions are handled in Java? What is the role of throw statement in exception handling?
6. Discuss the significance and usage of various Access Specifiers in Java.
7. **Write short notes on:**
 - a) Character Streams
 - b) Java API



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

00 MAY 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc. (Graphics & Web Designing) (Sem.-6)

DIGITAL MARKETING

Subject Code : UGCA1947

M.Code : 91999

Date of Examination : 29-04-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

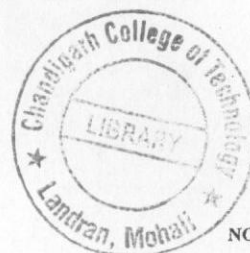
SECTION-A

1. Write briefly :

- a) Compare traditional and digital marketing.
- b) What are the different types of Social Media Marketing?
- c) What are transactional emails?
- d) What is referral marketing?
- e) What is the importance of landing page?
- f) Outline various tools for conducting keyword analysis.
- g) What is onsite optimization?
- h) What are tools which can be used for lead generation in digital marketing?
- i) What is CTR?
- j) Differentiate between onsite and offsite analytics.

SECTION-B

2. Why should you have Facebook in your social media plan? Explain the unique features of it.
3. Explain the benefits and challenges involved in SEO. Explain the working of search engines in detail.
4. Define content marketing. Discuss various tools of content marketing.
5. a) Discuss various strategies, which can be used by a marketer, to increase online presence.
b) Discuss tools for managing and writing website content.
6. Discuss various types of web analytics. How does a company decide what to measure? Give examples.
7. What are various tools available for online advertising? Discuss.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

00 MAY 2024

Roll No.

Total No. of Pages : 02

Total No. of Questions : 07

B.Sc (GWD) (Sem.-6)
INTRODUCTION TO GAMING
Subject Code : UGWD1918
M.Code : 92000
Date of Examination : 30-04-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

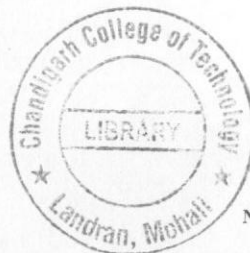
SECTION-A

1. Write briefly :

- a) How the Games on different platforms differ?
- b) Give some ways that studios make "levels".
- c) What are the concepts of a Game Design?
- d) What is the History of Gaming?
- e) Mention some popular Gaming titles of today.
- f) Which field is best for Game development?
- g) Why C++ is mostly used in game development?
- h) What is flow in level designing?
- i) Why are Games fun to play?
- j) What is the Best Programming Language for Beginners?

SECTION-B

2. Illustrate the Case Study of any popular Game showcasing all the concepts of game design and elements of a game.
3. Explain the various approaches of level designing of Game giving some real life examples of level design.
4. Explain all genres of Gaming in detail and different platforms where they exist and how they differ.
5. Give the overview on "Programming For Games".
6. Give Detail introduction to different theories of "fun and flow" in games.
7. Explain all the different roles of game development in detail.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.

[illegible]

Total No. of Pages : 02

Total No. of Questions : 07

Bachelor of Science (Graphics & Web Designing) (Sem.-6)

MOTION GRAPHICS & COMPOSITION

Subject Code : UGWD1917

M.Code : 91998

Date of Examination : 25-04-2024

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.

SECTION-A

1. Write briefly :
 - a) Pixel-aspect Ratio
 - b) Trimming
 - c) Solid Layer
 - d) Key Frames
 - e) Bezier
 - f) Equalizing
 - g) Sample rate
 - h) Loops
 - i) Echo Reverb
 - j) Compression

SECTION-B

2. Describe the concept of in and out points.
3. How would you utilize the 3D layer & co-ordinate system?
4. Write notes on light layer, null object & adjustment layer.
5. Discuss the animation process using expressions.
6. Discuss the color management, color profiles & broadcast safe colors.
7. Explain the rendering process.



NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.