NEW!

QUIZ -2
PYQ

MAR-2022

- CT - 1
- Statistics
- English -1
- Maths -1

Sem1 CT

Number of Questions : 11

Section Marks : 50

Question Number : 1 Question Type : MCQ

Correct Marks : 0

Question Label : Multiple Choice Question

THIS IS QUESTION PAPER FOR THE SUBJECT "FOUNDATION LEVEL: SEMESTER 1: COMPUTATIONAL THINKING"

ARE YOU SURE YOU HAVE TO WRITE EXAM FOR THIS SUBJECT?
CROSS CHECK YOUR HALL TICKET TO CONFIRM THE SUBJECTS TO BE WRITTEN.

(IF IT IS NOT THE CORRECT SUBJECT, PLS CHECK THE SECTION AT THE TOP FOR THE SUBJECTS REGISTERED BY YOU)

Options :

A. ✔ YES

B. ✖ NO

Question Number : 2 Question Type : MCQ

Correct Marks : 0

Question Label : Multiple Choice Question

Scores

RowNo	Name	Gender	DateOfBirth	CityTown	Mathematics	Physics	Chemistry	Total
0	Bhuvanesh	M	7 Nov	Erode	68	64	78	210
■ ■ ■								
29	Naveen	M	13 Oct	Vellore	72	66	81	219

Words

RowNo	Word	PartOfSpeech	LetterCount
0	It	Pronoun	2
■ ■ ■			
64	cane.	Noun	4

Library

RowNo	Name	Author	Genre	Language	Pages	Publisher	Year
0	Igniting Minds	Kalam	Nonfiction	English	178	Penguin	2002
■ ■ ■							
29	Malgudi Days	Narayan	Fiction	English	150	Indian Thought	1943

Olympics

Seq. No.	Name	Gender	Nationality	Host country	Year	Sport	Medal
0	Karnam Malleswari	F	Indian	Australia	2000	Weightlifting	Bronze
			- - -				
49	Michael Phelps	M	American	China	2008	Swimming	Gold

Three sample cards out of 30 for Shopping Bills dataset

Options :

A. ✔ Useful Data has been mentioned above.

B. ✖ This data attachment is just for a reference & not for an evaluation.

Question Type : COMPREHENSION

Question Numbers : (3 to 8)

Question Label : Comprehension

Let **L** be a non-empty list, and **D** be a non-empty dictionary. Choose whether the given statements are true or false:

Sub questions

Question Number : 3 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Elements of **L** can be lists.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 4 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Let **a** be a key of dictionary **D** , then **a** must be an integer

Options :

A. ✖ TRUE

B. ✔ FALSE

Question Number : 5 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

For keys **a** and **b** in **D** , if **a ≠ b** then **D** [**a**] ≠ **D**[**b**] is always True.

Options :

A. ✖ TRUE

B. ✔ FALSE

Question Number : 6 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

For keys **a** and **b** in **D** , **a ≠ b** is always True.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 7 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

For a key **a** in **D** , **D** [**a**] can be a dictionary.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 8 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Let **D** = { 3 : {'a': 5, 'b' : 4}, 5 : {'c' : 6}}, then the value of **D** ['c'] is 6.

Options :

A. ✖ TRUE

B. ✔ FALSE

Question Number : 9 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

Consider the procedure **doSomething** given below. If **A** = [4, 5, 3, 1, 9, 4, 6, 5, 9] and **B** = **doSomething(A)**.

```
1  Procedure doSomething(A)
2      outList = [first(A)]
3      foreach X  in rest(A) {
4          if (X ≠ first(A)) {
5              outList = outList ++ [X]
6          }
7      }
8      return (outList)
9  End doSomething
```

Choose the correct option.

Options :

A. ✔ **B** = [4, 5, 3, 1, 9, 6, 5, 9]

B. ✖ **B** = [4, 5, 3, 1, 9, 6]

C. ✖ **B** = [3, 1, 6]

D. ✖ **B** = [5, 3, 1, 9, 4, 6, 5, 9]

Question Number : 10 Question Type : MCQ

Correct Marks : 4

Question Label : Multiple Choice Question

The following table contains information regarding authors from the "Library" dataset. Each row in the table corresponds to an author and list of publication years. There are **n** authors, each author is being assigned a unique index between 0 and **n**−**1**.

S.No	Author Name	Publication year
0	Kalam	[1998,..., 2015]
...	...	....
n - 1	Narayanan	[1935,..., 2001]

The table is represented by a dictionary named **authors**, with S.No as keys and lists of publication years as values. Assume that **authors** has already been computed. For example, we have: **authors** [0] = [1998,..., 2015]

isCommon(**L1, L2**) returns True if there are at least two common elements in lists **L1** and **L2**.

```
M = createMatrix (n, n)
foreach i in keys (authors) {
    foreach j in keys (authors) {
        if (i > j and isCommon(authors[i], authors[j])) {
            M[i][j] = 1
            M[j][i] = 1
        }
    }
}

A = { }
foreach i in rows (M) {
    count = 0
    foreach j in columns (M) {
        if (M[i][j] ≠ 0) {
            count = count + 1
        }
    }
    A[i]= count
}
```

What does an entry **A[i]** represent at the end of the execution of the pseudocode above?

Options :

A. ✖ Author **A[i]** has published books in **i** years

B. ✖ Author **i** has published books in **A[i]** years

C. ✖ Author **A[i]** has published at least two books in common years with **i** authors

D. ✔ Author **i** has published at least two books in common years with **A[i]** authors

Question Number : 11 Question Type : MCQ

Correct Marks : 4

Question Label : Multiple Choice Question

In a shop selling soft drinks, Ritvika wants to combine two soft drinks to see which combinations taste better. The drinks are labeled from 0 to $n-1$. To keep track of these combinations, she creates a matrix **M**. For drink **i** and **j** such that **i ≠ j**, if the combination of **i** and **j** tastes good, then **M[i][j]** = 1, otherwise 0. **leastSuitable(M)** returns the list of drinks which are least suitable for

mixing with the maximum number of drinks. Choose the correct code fragment

```
Procedure leastSuitable(M)
    min = 10000
    minList = [ ]
    foreach i in rows(M) {
        k = 0
        **********************
        *      Fill the code      *
        **********************
    }
    return (minList)
End leastSuitable
```

Options :

A. ✖

```
foreach j in columns(M) {
    k = k + M[i][j]
}
if (k == min) {
    minList = minList ++ [i]
}
if (k > min) {
    min = k
    minList = [i]
}
```


B. ✔

```
foreach j in columns(M) {
    k = k + M[i][j]
}
if (k == min) {
    minList = minList ++ [i]
}
if (k < min) {
    min = k
    minList = [i]
}
```

C. ✖

```
foreach j in columns(M) {
    k = k + M[i][j]
}
if (k == min) {
    minList = [i]
}
if (k > min) {
    min = k
    minList = minList ++ [i]
}
```

D. ✖

```
foreach j in columns(M) {
    k = k + M[i][j]
}
if (k == min) {
    minList = [i]
}
if (k < min) {
    min = k
    minList = minList ++ [i]
}
```

Question Type : COMPREHENSION

Question Numbers : (12 to 13)

Question Label : Comprehension

Consider the procedure given below.

```
Procedure eliminate (L1, L2)
    L3 = [ ], Found = False
    foreach i in L2 {
        foreach j in L1 {
            if (i == j) {
                Found = True
            }
        }
        if (not Found) {
            L3 = L3 ++ [i]
        }
        Found = False
    }
    return (L3)
End eliminate
```

If **L1** and **L2** are two lists, and **L = eliminate (L1, L2)**, then answer the given subquestions.

Sub questions

Question Number : 12 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

What will **L** represent?

Options :

A. ✔ It will contain all elements of **L2** that are not present in **L1**.

B. ✖ It will contain all elements of **L1** that are not present in **L2** .

C. ✖ It will contain the elements common to **L1** and **L2** .

D. ✖ It will contain the elements present in **L1** or **L2** but not both.

Question Number : 13 Question Type : MSQ

Correct Marks : 2

Question Label : Multiple Select Question

Which of the following option(s) is/are always correct? It is a Multiple Select Question (MSQ).

Options :

A. ✖ **length(L2) − length(L1) = length(L)**

B. ✖ **length(L2) > length(L1)**

C. ✔ **length(L2) ≥ length(L)**

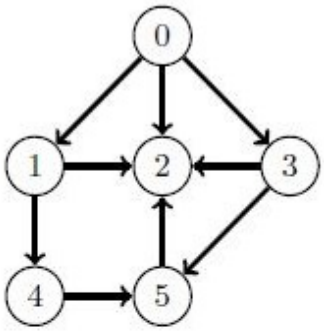
D. ✖ **length(L1) ≤ length(L)**

Question Type : COMPREHENSION

Question Numbers : (14 to 15)

Question Label : Comprehension

Let M be the adjacency matrix of the graph G given below, where $M[i][j] = 1$ if there is an edge from i to j, otherwise 0.




```
1  Procedure countSomething(M, i, j)
2       count = 0
3       foreach k in rows(M) {
4            if (M[i][k] == 1 and M[k][j] == 1) {
5                 count = count + 1
6            }
7       }
8       return (count)
9  End countSomething
```

Based on the above information, answer the given subquestions.

Sub questions

Question Number : 14 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

What will **countSomething**(**M**, 0, 5) return?

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

1

Question Number : 15 Question Type : SA

Correct Marks : 2

Question Label : Short Answer Question

If Line 2 is replaced by **count** = **M**[**i**][**j**], then what will **countSomething**(**M**, 0, 5) return?

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

1

Question Type : COMPREHENSION

Question Numbers : (16 to 17)

Question Label : Comprehension

The following pseudocode is executed using the “Words” dataset. Assume that words are arranged in increasing order of sequence number.

```
B = 0
sList = [ ], wList = [ ]
while (Table 1 has more rows) {
    Read the first row X in Table 1
    Move X to Table 2
    wList = wList ++ [X.PartOfSpeech]
    if (X.Word ends with a full stop) {
        A = doSomething(wList)
        if (A > B) {
            B = A
        }
        sList = sList ++ [wList]
        wList = [ ]
    }
}
Procedure doSomething(L)
    count = 0
    foreach p in L {
        if (p == “Noun”) {
            count = count + 1
        }
    }
    return(count)
End doSomething
```


Based on the above data, answer the given subquestions.

Sub questions

Question Number : 16 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

What will **B** represent at the end of the execution?

Options :

A. ✔ Maximum number of nouns in a sentence across all sentences.

B. ✖ Total number of nouns across all sentences.

C. ✖ Minimum number of nouns in a sentence across all sentences.

D. ✖ Number of sentences having maximum number of nouns.

Question Number : 17 Question Type : MCQ

Correct Marks : 4

Question Label : Multiple Choice Question

What will **length(sList)** represent at the end of execution.

Options :

A. ✖ Total number of words in “Words” dataset

B. ✔ Total number of sentences in “Words” dataset

C. ✖ Total number of words with same part of speech in “Words” dataset

D. ✖ Total number of words with different part of speech in “Words” dataset

Question Type : COMPREHENSION

Question Numbers : (18 to 19)

Question Label : Comprehension

The following pseudocode is executed using the “Shopping Bills” dataset.

```
D = { }
while (Pile 1 has more cards) {
    Read the top card X in Pile 1
    foreach a in X.ItemList {
        if (isKey(D, a.Category)) {
            if (isKey(D[a.Category], a.ItemName)) {
                D[a.Category][a.ItemName] = D[a.Category][a.ItemName] ++ [a.Price]
            }
            else {
                D[a.Category][a.ItemName] = [a.Price]
            }
        }
        else {
            D[a.Category] = { }
            D[a.Category][a.ItemName] = [a.Price]
        }
    }
    Move card X to Pile 2
}
```

Based on the above data, answer the given subquestions.

Sub questions

Question Number : 18 Question Type : MCQ

Correct Marks : 4

Question Label : Multiple Choice Question

What will each value **D[i][j]** represent at the end of the execution?

Options :

A. ✖ Price of item **i** of category **j** across all bills

B. ✖ Price of item **j** of category **i** across all bills

C. ✖ List of prices of item **i** of category **j** across all bills

D. ✔ List of prices of item **j** of category **i** across all bills

Question Number : 19 Question Type : MCQ

Correct Marks : 4

Question Label : Multiple Choice Question

Using the dictionary **D** created in the previous question, what will the value of **L** represent at the end of the execution of the pseudocode below?

```
A = 100000, L = [ ]
foreach i in keys(D) {
    foreach j in keys(D[i]) {
        data = findRange(D[i][j])
        B = first(data) - last(data)
        if (B == A) {
            L = L ++ [j]
        }
        if (B < A) {
            A = B
            L = [j]
        }
    }
}

Procedure findRange(Y)
    p = 0, q = 100000
    foreach k in Y{
        if (k > p) {
            p = k
        }
        if (k < q) {
            q = k
        }
    }
    return([p, q])
End findRange
```


Options :

A. ✖ List of items for which the difference between the highest and lowest price is the same

B. ✖ List of items for which the difference between the highest and lowest price is maximum

C. ✔ List of items for which the difference between the highest and lowest price is minimum

D. ✖ List of items with same price in all shops

Question Type : COMPREHENSION

Question Numbers : (20 to 21)

Question Label : Comprehension

The following pseudocode is executed using the “Shopping Bills” dataset. Procedure **similar**(**X, Y**) returns True if the difference between **X** and **Y** is less than 100.

```
A = { }
while (Pile 1 has more cards) {
    Read the top card X in Pile 1
    A[X.Seq_No] = [X.ShopName, X.Total]
    Move card X to Pile 2
}
n = length(keys(A))
S = CreateMatrix(n, n)
foreach i in keys(A) {
    foreach j in keys(A) {
        if (i > j and isPair(A[i], A[j])) {
            S[i][j] = 1
            S[j][i] = 1
        }
    }
}
Procedure isPair(P, Q)
    if (first(P) ≠ first(Q) and similar(last(P), last(Q))) {
        return (True)
    }
    else {
        return (False)
    }
End isPair
```

A graph is constructed using matrix **S** created by the above pseudocode. Based on the given information answer the subquestions.

Sub questions

Question Number : 20 Question Type : MSQ

Correct Marks : 4

Question Label : Multiple Select Question

Choose the correct statement(s). It is a Multiple Select Question (MSQ).

Options :

A. ✖ For all i, j with $i \neq j$, $S[i][j] + S[j][i] = 1$

B. ✖ For all i, j with $i \neq j$, if $S[i][j] = 0$ then $S[j][i] = 1$

C. ✔ For all i, j with $i \neq j$, if $S[i][j] = 0$ then $S[j][i] = 0$

D. ✔ For all i, j with $i \neq j$, if $S[i][j] = 1$ then $S[j][i] = 1$

E. ✖ For all i, j with $i \neq j$, if $S[i][j] = 1$ then $S[j][i] = 0$

Question Number : 21 Question Type : MSQ

Correct Marks : 4

Question Label : Multiple Select Question

There will be an edge between bills **i** and **j** if:

It is a Multiple Select Question (MSQ).

Options :

A. ✔ The total bill amount of **i** is lower than the total bill amount of **j** by less than 100 and both bills are from the different shops.

B. ✔ The total bill amount of **i** is greater than the total bill amount of **j** by less than 100 and both bills are from the different shops.

C. ✔ The total bill amounts of bills **i** and **j** are same but both bills are from the different shops.

D. ✖ The total bill amounts of bills **i** and **j** are same and both bills are from the same shop.

Sem1 Eng1

Number of Questions : 29

Section Marks : 50

Question Number : 22 Question Type : MCQ

Correct Marks : 0

Question Label : Multiple Choice Question

THIS IS QUESTION PAPER FOR THE SUBJECT "FOUNDATION LEVEL: SEMESTER 1: ENGLISH 1"

ARE YOU SURE YOU HAVE TO WRITE EXAM FOR THIS SUBJECT?
CROSS CHECK YOUR HALL TICKET TO CONFIRM THE SUBJECTS TO BE WRITTEN.

(IF IT IS NOT THE CORRECT SUBJECT, PLS CHECK THE SECTION AT THE TOP FOR THE SUBJECTS REGISTERED BY YOU)

Options :

A. ✔ YES

B. ✖ NO

Question Type : COMPREHENSION

Question Numbers : (23 to 32)

Question Label : Comprehension

Read the following passage and answer the subquestions:

Master was a little crazy; he had spent too many years reading books overseas, talked to himself in his office, did not always return greetings, and had too much hair. Ugwu's aunty said this in a low voice as they walked on the path. "But he is a good man," she added. "And as long as you work well, you will eat well. You will even eat meat every day." She stopped to spit; the saliva left her mouth with a sucking sound and landed on the grass.

Ugwu did not believe that anybody, not even this master he was going to live with, ate meat every day. He did not disagree with his aunty, though,because he was too choked with expectation, too busy imagining his new life away from the village. They had been walking for a while now, since they got off the lorry at the motor park, and the afternoon sun burned the back of his neck. But he did not mind. He was prepared to walk hours more in even hotter sun. He had never seen anything like the streets that appeared after they went past the university gates, streets so

smooth and tarred that he itched to lay his cheek down on them. He would never be able to describe to his sister Anulika how the bungalows here were painted the colour of the sky and sat side by side like polite, well-dressed men, how the hedges separating them were trimmed so flat on top that they looked like tables wrapped with leaves.

His aunty walked faster, her slippers making slap-slap sounds that echoed in the silent street. Ugwu wondered if she, too, could feel the coal tar getting hotter underneath, through her thin soles. They went past a sign, ODIM STREET, and Ugwu mouthed street, as he did whenever he saw an English word that was not too long. He smelt something sweet, heady, as they walked into a compound, and was sure it came from the white flowers clustered on the bushes at the entrance. The bushes were shaped like slender hills. The lawn glistened. Butterflies hovered above."I told Master you will learn everything fast, osiso-osiso," his aunty said.

Ugwu nodded attentively although she had already told him this many times, as often as she told him the story of how his good fortune came about: While she was sweeping the corridor in the Mathematics Department a week ago, she heard Master say that he needed a houseboy to do his cleaning, and she immediately said she could help, speaking before his typist or office messenger could offer to bring someone.

~Half of a Yellow Sun - Chimamanda Ngozi Adichie

Sub questions

Question Number : 23 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

This passage hints that Ugwu is _____.

Options :

A. ✖ A new student at university

B. ✔ From a poor household

C. ✖ Meeting his professor

D. ✖ Vacationing with his aunt

Question Number : 24 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

You will even eat meat every day. This sentence signifies _____.

Options :

A. ✖ The economic stature of Ugwu's master

B. ✖ The job at the hotel

C. ✖ Ugwu's inability to afford meat for food

D. ✔ The expectation of Ugwu's aunt

Question Number : 25 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

He was prepared to walk hours more in even hotter sun. Why was he prepared to walk under even hotter sun?

Options :

A. ✖ He was running away from his village

B. ✖ He was competing with his aunt

C. ✔ He was determined to lead a good life away from his village

D. ✖ He was not expecting any vehicles

Question Number : 26 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

The bushes were shaped like slender hills. The figure of speech used here is _____.

Options :

A. ✖ Metaphor

B. ✔ Simile

C. ✖ Hyperbole

D. ✖ Adjective

Question Number : 27 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

What makes the narrator to consider the Master as crazy?

Options :

A. ✖ He reads a lot of books

B. ✖ He has long hair

C. ✖ He talks to himself

D. ✔ All of these

Question Number : 28 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

The hedges are compared to _____.

Options :

A. ✖ Hills

B. ✖ Fountain

C. ✔ Tables

D. ✖ Gentlemen

Question Number : 29 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

An appropriate substitute for *wrap* would be _____.

Options :

A. ✔ Cover

B. ✖ End

C. ✖ Both Cover and End

D. ✖ None of these

Question Number : 30 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

The bungalows here were painted the colour of the sky and sat side by side like polite, well-dressed men.

The figure of speech used here is _____.

Options :

A. ✖ Metaphor

B. ✔ Simile

C. ✖ Hyperbole

D. ✖ Personification

Question Number : 31 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

Ugwu sensed the smell from _____.

Options :

A. ✖ Streets

B. ✖ His village

C. ✖ Tarred roads

D. ✔ White flowers

Question Number : 32 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

The mood of Ugwu was _____.

Options :

A. ✖ Tensed

B. ✖ Thrilled

C. ✔ Hopeful

D. ✖ Despair

Question Number : 33 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

She _____ working here since 2015.

Options :

A. ✖ Has been

B. ✔ Have been

Question Number : 34 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

'*We love hiking*' is a sentence where agreement is followed.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 35 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Context: A professor to a student.

'Come by my office tomorrow and we can discuss your idea' is a command.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 36 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

'Please help me' from one friend to another is a _____.

Options :

A. ✖ Command

B. ✔ Request

Question Number : 37 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

'*Boiling tomato soup is cooled off later*'. Find the subject here.

Options :

A. ✖ Boiling tomato

B. ✔ Boiling tomato soup

C. ✖ Boiling

Question Number : 38 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

'*This is a book*' is a sentence with no predicate.

Options :

A. ✖ TRUE

B. ✔ FALSE

Question Number : 39 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Benito _____ know the answer.

Options :

A. ✔ Doesn't

B. ✖ Don't

Question Number : 40 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Thermodynamics and Nuclear Physics chapters _____ not included in this text book.

Options :

A. ✖ Is

B. ✔ Are

Question Number : 41 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Either answer _____ acceptable.

Options :

A. ✔ Is

B. ✖ Are

Question Number : 42 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Nobody _____ the trouble I've seen.

Options :

A. ✖ Know

B. ✔ Knows

Question Number : 43 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Two pairs of scissors _____ missing since morning.

Options :

A. ✖ Has been

B. ✔ Have been

Question Number : 44 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Either Rahul or Sagar _____ a doctor.

Options :

A. ✖ Are

B. ✔ Is

C. ✖ Am

D. ✖ Were

Question Number : 45 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

"*Toni passed the test.*" Convert this into the negative form.

Options :

A. ✖ Toni did not passed the test.

B. ✖ Toni had not passed the test.

C. ✔ Toni did not pass the test.

D. ✖ Toni was not passed the test.

Question Number : 46 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

'Move heaven and earth' and *'cutting corners'* are opposite in meaning.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 47 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Reema is living within her budget. She is_____.

Options :

A. ✖ Pulling herself together

B. ✖ Getting a taste of her own medicine

C. ✖ Between the devil and the deep sea

D. ✔ Cutting her coat according to her cloth

Question Number : 48 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

The sentences '*Reema analyses bones for a living*' and '*Reports published by the WHO draw on numerous analyses*' have the word 'analyses' pronounced differently.

Options :

A. ✔ TRUE

B. ✖ FALSE

Question Number : 49 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

In the words *'abdomen'*, *'barber'*, and *'governor'*, the stressed syllable is:

Options :

A. ✖ In the final position

B. ✖ In the middle position

C. ✔ In the initial position

D. ✖ In different places in each word

Question Number : 50 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

'concerned' and *'condemned'* are examples of :

Options :

A. ✖ Verbs stressed on the pre-final syllable

B. ✖ Verbs stressed on the final syllable

C. ✖ Adjectives stressed on the pre-final syllable

D. ✔ Adjectives stressed on the final syllable

Question Number : 51 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Word stress is encouraged to be learnt via the _____.

Options :

A. ✖ Television

B. ✖ Newspaper

C. ✔ Dictionary

D. ✖ Novels

Question Number : 52 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Derived words are obtained by:

Options :

A. ✔ Attaching an affix to a root word

B. ✖ Attaching a suffix to a root word

C. ✖ Attaching a prefix to a root word

D. ✖ None of these

Question Number : 53 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Identify whether the vowel sound (in bold) in the following word is short or long.

C**a**st

Options :

A. ✖ Short

B. ✔ Long

Question Number : 54 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Identify whether the consonant sound (in bold) in the following word is voiced or voiceless:

Chase

Options :

A. ✔ Voiceless

B. ✖ Voiced

Question Number : 55 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Identify the number of consonant sounds in the following word:

'Thoughtful'

Options :

A. ✖ 3

B. ✔ 4

C. ✖ 5

D. ✖ 6

Question Number : 56 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Identify the number of consonant sounds in the following word:

'Progressive'

Options :

A. ✖ 3

B. ✖ 4

C. ✖ 5

D. ✔ 6

Question Number : 57 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Identify whether the vowel sound (in bold) in the following word is monophthong or diphthong.

F**ou**ght

Options :

A. ✔ Monophthong

B. ✖ Diphthong

Question Type : COMPREHENSION

Question Numbers : (58 to 61)

Question Label : Comprehension

Read the following situation and answer the given subquestions that follow.

You are the team leader of an important project at a start-up, and you have to present a business proposal to a group of investors tomorrow so that your project can be realised. However, with less

than a day to go, your team has been (1) _____ a lot, and have only begun to resume panic-induced work at the eleventh hour. When you, in a fit of anger, ask them to get their (2) _____, one of them gets offended and hurls abuses at you. To add insult to injury, one other colleague walks out of the room, tired of the raised voices and the hostile environment.

As the situation gets (3) _____, you realise it is time for you to take the (4) _____, and get to work yourself, so that you can present the proposal yourself by the next morning. You calm down, ask your team members to leave the room in a low and firm voice, roll up your sleeves, and get down to business.

Sub questions

Question Number : 58 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Choose the correct expression for blank (1)

Options :

A. ✖ Taking off

B. ✖ Backing off

C. ✖ Shirking off

D. ✔ Slacking off

Question Number : 59 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Choose the correct expression for blank (2)

Options :

A. ✖ Work together

B. ✖ Team together

C. ✔ Act together

D. ✖ Plan together

Question Number : 60 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Choose the correct answer for blank (3)

Options :

A. ✖ Out of mind

B. ✔ Out of hand

C. ✖ Out of habit

D. ✖ Out of sight

Question Number : 61 Question Type : MCQ

Correct Marks : 1

Question Label : Multiple Choice Question

Choose the correct answer for blank (4)

Options :

A. ✖ Chew the cud

B. ✖ The mantle of duty

C. ✔ Bull by its horns

D. ✖ Day by its ends

Question Number : 62 Question Type : MSQ

Correct Marks : 1

Question Label : Multiple Select Question

Choose the correct option for the blank. “I wanted to give _____ a parting gift.”

Options :

A. ✔ Him

B. ✔ Her

C. ✖ To them

D. ✖ All of these

Sem1 Maths1

Number of Questions : 11

Section Marks : 50

Question Number : 63 Question Type : MCQ

Correct Marks : 0

Question Label : Multiple Choice Question

THIS IS QUESTION PAPER FOR THE SUBJECT "FOUNDATION LEVEL: SEMESTER 1: MATHEMATICS FOR DATA SCIENCE 1"

ARE YOU SURE YOU HAVE TO WRITE EXAM FOR THIS SUBJECT?
CROSS CHECK YOUR HALL TICKET TO CONFIRM THE SUBJECTS TO BE WRITTEN.

(IF IT IS NOT THE CORRECT SUBJECT, PLS CHECK THE SECTION AT THE TOP FOR THE SUBJECTS REGISTERED BY YOU)

Options :

A. ✔ YES

B. ✖ NO

Question Number : 64 Question Type : MCQ

Correct Marks : 0

Question Label : Multiple Choice Question

Instructions:

- There are some questions which have functions with discrete valued domains (such as day, month, year etc). For simplicity, we treat them as continuous functions.
- For NAT type question, enter only one right answer even if you get multiple answers for that particular question.
- Notations:
  - $\mathbb{R}$= Set of real numbers
  - $\mathbb{Q}$= Set of rational numbers
  - $\mathbb{Z}$= Set of integers
  - $\mathbb{N}$= Set of natural numbers
- The set of natural numbers includes 0.

Options :

A. ✔ Useful Data has been mentioned above.

B. ✖ This data attachment is just for a reference & not for an evaluation.

Question Number : 65 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

Simplify the expression $\left(\frac{a^x}{a^y}\right)^{(x+y-z)}.\left(\frac{a^y}{a^z}\right)^{(y+z-x)}.\left(\frac{a^z}{a^x}\right)^{(z+x-y)}$

Options :

A. ✖ a^{x+y+z}

B. ✔ 1

C. ✖ a

D. ✖ $a^{x^2+y^2+z^2-xy-yz-zx}$

Question Number : 66 Question Type : MSQ

Correct Marks : 5

Question Label : Multiple Select Question

Which of the following statements are correct?

Options :

A. ✔ The domain of the real-valued function $f(x) = \sqrt{e^{x^2-8x} - 1}$ is $(-\infty, 0] \cup [8, \infty)$.

B. ✔ The line $x = 3$ is a vertical asymptote of the function $f(x) = ln(x^2 + 5x - 24)$.

C. ✖ The functions $f(x) = -\sqrt{ln(x)}$ and $g(x) = e^{x^2}$ are inverses to each other.

D. ✔ f may be continuous at the point $x = a$ even if f is not differentiable at a point $x = a$.

Question Number : 67 Question Type : MSQ

Correct Marks : 5

Question Label : Multiple Select Question

Suppose $f(x) = \frac{x+5}{x-3}$ and $g(x) = \sqrt{x^2 - 1}$ are functions on their respective domains.
Which of the following statements are correct?

Options :

A. ✔ The domain of the composite function $(f \circ g)(x)$ is $(-\infty, -\sqrt{10}) \cup (-\sqrt{10}, -1] \cup [1, \sqrt{10}) \cup (\sqrt{10}, \infty)$.

B. ✖ The domain of the composite function $(f \circ g)(x)$ is $\mathbb{R} \setminus \{-\sqrt{10}, \sqrt{10}\}$.

C. ✔ $(f \circ g)(x) = \frac{\sqrt{x^2-1}+5}{\sqrt{x^2-1}-3}$.

D. ✔ $(g \circ f)(x) = \frac{4\sqrt{x+1}}{|x-3|}$.

Question Number : 68 Question Type : MSQ

Correct Marks : 5

Question Label : Multiple Select Question

Consider a sequence $\{a_n\}$ defined as $a_n = \frac{a_{n-1}+a_{n-2}}{2}$ for all $n \geq 3$ and $a_1 = 0, a_2 = 1$. Which of the following statements are correct?

Options :

A. ✔ $\lim_{n\to\infty} a_n = \frac{2}{3}.$

B. ✔ $\sum_{i=3}^{n} a_i = \frac{a_{n-1}}{2} + \sum_{i=2}^{n-2} a_i.$

C. ✖ $\sum_{i=3}^{n} a_i = \frac{a_2 + a_{n-1}}{2} + \sum_{i=3}^{n-2} a_i.$

D. ✖ The sequence $\{a_n\}$ is not convergent.

Question Number : 69 Question Type : SA

Correct Marks : 4

Question Label : Short Answer Question

Stock price (y) (in ₹) for a motor cycle company (A) is predicted by the equation

$$y = -7log_2(x + a) + 28,$$

where x represents the number of months since January of the year 2022 (note: for January, consider $x = 0$) and $a \in \mathbb{N}$. If the stock price of the company goes to zero in December of the year 2022, following the same trend, then find the value of a.

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

5

Question Number : 70 Question Type : SA

Correct Marks : 5

Question Label : Short Answer Question

Ravi borrowed ₹3,000 and ₹12,000 from his friends Vinay and Bhumi respectively. Vinay lent the money at 7 percent simple interest per annum for 4 years and Bhumi lent the money at 10 percent compound interest per annum for x years. The compound interest which Bhumi received after x years is thrice the value of the simple interest which Vinay received after 4 years. What is the value of x?

[Note: Simple interest $= \frac{PTR}{100}$ and Compound Interest $= P(1+\frac{R}{100})^T - P$, where P is the principle amount, T is time (in years) and R is the interest rate per annum, i.e., if $x\%$ is the interest rate per annum then $R = x$]

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

2

Question Type : COMPREHENSION

Question Numbers : (71 to 73)

Question Label : Comprehension

Use the following information and answer the given subquestions.

Consider the function defined as follows with $p, q, r \in \mathbb{R}$:

$$f(x) = \begin{cases} 8sin(x) + pcos(x) & \text{if } x < 0 \\ q - 1 & \text{if } x = 0 \\ 4e^x - rx + 3 & \text{if } x < 0 \end{cases}$$

Sub questions

Question Number : 71 Question Type : SA

Correct Marks : 2

Question Label : Short Answer Question

If the limit exists at $x = 0$ for the given function $f(x)$, then what will be the value of p?

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

7

Question Number : 72 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

If f is continuous at $x = 0$,
then find the value of $\frac{q}{2}$.

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

4

Question Number : 73 Question Type : SA

Correct Marks : 4

Question Label : Short Answer Question

If *f* is differentiable everywhere, then find the value of *r*.

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

-4

Question Type : COMPREHENSION

Question Numbers : (74 to 75)

Question Label : Comprehension

Use the following information and answer the given subquestions.

Suppose f is a real valued function defined on domain D.

let $f(x+y) = f(x)f(y)$ for all $x, y \in D$ and $f(1) = 6$, $f'(0) = 3$.

Sub questions

Question Number : 74 Question Type : SA

Correct Marks : 2

Question Label : Short Answer Question

What is the value of *f*(0)?

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

1

Question Number : 75 Question Type : SA

Correct Marks : 4

Question Label : Short Answer Question

What is the value of *f* '(1)?

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

18

Question Type : COMPREHENSION

Question Numbers : (76 to 78)

Question Label : Comprehension

Use the following information and answer the given subquestions.

Consider a sequence $\{a_n\}$ defined as

$$a_n = \begin{cases} \frac{3n-\lfloor \frac{n}{2} \rfloor}{7+n} & \text{when } n \text{ is odd} \\ \frac{5n^2-4n+1}{6n+2n^2} & \text{when } n \text{ is even} \end{cases}$$

where $\lfloor x \rfloor$ is the greatest integer that is less than or equal to a real number x.

Sub questions

Question Number : 76 Question Type : MSQ

Correct Marks : 2

Question Label : Multiple Select Question

Which of the following statements are correct?

Options :

A. ✔ If n is odd, then $\lfloor \frac{n}{2} \rfloor = \frac{n-1}{2}$.

B. ✖ If n is even, then $\lfloor \frac{n}{2} \rfloor = \frac{n}{2} + 1$.

C. ✔ If n is even, then $\lfloor \frac{n}{2} \rfloor = \frac{n}{2}$.

D. ✖ If n is odd, then $\lfloor \frac{n}{2} \rfloor = \frac{n+1}{2}$.

Question Number : 77 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

Find the limit of the sequence $\{2a_n\}$.

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

5

Question Number : 78 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

Find the limit of the sequence $\{b_n\}$

defined as $b_n = 4a_n^2 - 10a_n$.

NOTE: Enter your answer to the nearest integer.

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

0

Sem1 Stats1

Number of Questions : 15

Section Marks : 50

Question Number : 79 Question Type : MCQ

Correct Marks : 0

Question Label : Multiple Choice Question

THIS IS QUESTION PAPER FOR THE SUBJECT "FOUNDATION LEVEL: STATISTICS FOR DATA SCIENCE I"

ARE YOU SURE YOU HAVE TO WRITE EXAM FOR THIS SUBJECT?
CROSS CHECK YOUR HALL TICKET TO CONFIRM THE SUBJECTS TO BE WRITTEN.

(IF IT IS NOT THE CORRECT SUBJECT, PLS CHECK THE SECTION AT THE TOP FOR THE SUBJECTS REGISTERED BY YOU)

Options :

A. ✔ Yes

B. ✖ No

Question Type : COMPREHENSION

Question Numbers : (80 to 81)

Question Label : Comprehension

Answer the given subquestions.

Sub questions

Question Number : 80 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

From a box containing 5 dark chocolates and 3 milk chocolates, 3 chocolates are to be selected randomly without replacement. In how many ways can the chocolates be selected such that at least one milk chocolate is selected?

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

46

Question Number : 81 Question Type : MSQ

Correct Marks : 0

Question Label : Multiple Select Question

Select the steps from the following options, that you will use for the selection of chocolates.

Note: This question is optional. We will check your answer to this question if you make a mistake in the previous one.

Options :

A. ✔ Selection of chocolates will occur simultaneously.

B. ✖ Selection of chocolates will not occur simultaneously.

C. ✖ With replacement.

D. ✔ Without replacement.

E. ✖ Order matters.

F. ✔ Order does not matter.

Question Number : 82 Question Type : MCQ

Correct Marks : 2

Question Label : Multiple Choice Question

Suppose Ankit has 2 empty pen boxes which are to be filled by 3 pens. In how many ways can the boxes be filled with pens such that none of the box remains empty?

Options :

A. ✖ 18

B. ✖ $3^2 - 2$

C. ✖ 19

D. ✔ $2^3 - 2$

Question Number : 83 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

Calculate the value of the expression $r \times \frac{(2n+2)!}{(2n)!} + 2r \times \frac{(2n+2)!}{(2n)!} + 3r \times \frac{(2n+2)!}{(2n)!} + \ldots + nr \times \frac{(2n+2)!}{(2n)!}$,

for $n = 10$ and $r = \frac{1}{2}$.

Options :

A. ✖ 20790

B. ✔ 12705

C. ✖ 25410

D. ✖ 1210

Question Number : 84 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

Consider the following events:

A: Throwing a 4 with one unbiased die.

B: Throwing a sum of 8 with two independent rolls of an unbiased die.

Which of these events has the maximum probability?

Options :

A. ✔ A

B. ✖ B

C. ✖ Both have the same probability

Question Number : 85 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

X contains observations of the speed of a car and Y contains the observations of the speed of another car, and it is noted that each observation of Y is $\frac{1}{2}$ times each observation of X. If the sample variance of X is 64, then calculate the sample covariance between X and Y?

Options :

A. ✖ 128

B. ✖ 64

C. ✔ 32

D. ✖ 0

Question Number : 86 Question Type : MCQ

Correct Marks : 3

Question Label : Multiple Choice Question

If we have observations 30, 25, 35, 40 and 45, then find the sample variance of the data?

Options :

A. ✔ 62.5

B. ✖ 50

C. ✖ 40

D. ✖ 35

Question Type : COMPREHENSION

Question Numbers : (87 to 88)

Question Label : Comprehension

Answer the given subquestions.

Sub questions

Question Number : 87 Question Type : SA

Correct Marks : 4

Question Label : Short Answer Question

How many words, with or without meaning, can be formed using the letters of the word 'MADRAS' (without repetition), such that the alphabet 'R' occupies the 2^{nd} position (moving from left to right) in each of the words formed?

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

Question Number : 88 Question Type : MSQ

Correct Marks : 0

Question Label : Multiple Select Question

Select the steps from the following options, that you will use for forming words using letters of the word 'MADRAS'.

Note: This question is optional. We will check your answer to this question if you make a mistake in the previous one.

Options :

A. ✔ Selection of letters will occur simultaneously.

B. ✖ Selection of letters will not occur simultaneously.

C. ✖ With replacement.

D. ✔ Without replacement.

E. ✔ Order matters.

F. ✖ Order does not matter.

Question Number : 89 Question Type : MCQ

Correct Marks : 4

Question Label : Multiple Choice Question

The sum of length and breadth of a rectangle is 12. Find the probability that the area of the rectangle is not less than $\frac{3}{4}$ times the greatest area possible for this rectangle.

Hint: The area of a rectangle is maximum when length=breadth.

Options :

A. ✔ $\frac{1}{2}$

B. ✖

$\frac{1}{3}$

C. ✖ $\frac{1}{4}$

D. ✖ $\frac{1}{5}$

Question Number : 90 Question Type : SA

Correct Marks : 4

Question Label : Short Answer Question

A salesman wants to sell two products, 'A' and 'B'. The chances of him selling the products 'A' and 'B' are 30% and 70% respectively. The two products can be sold independently. Given that he is able to sell at least one product, what is the probability that the product *B* has been sold? (Enter the answer correct to 2 decimal accuracy)

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Range

Text Areas : PlainText

Possible Answers :

0.85 to 0.93

Question Number : 91 Question Type : MCQ

Correct Marks : 5

Question Label : Multiple Choice Question

Urn 'A' contains 3 white and 5 black balls. 4 balls are transferred to an empty urn *B* from urn *A*. From urn *B*, a ball is drawn at random and is found to be white. What is the probability that out of

4 balls transferred 2 are white and 2 are black?

Options :

A. ✖ $\frac{1}{7}$

B. ✖ $\frac{3}{4}$

C. ✖ $\frac{3}{7}$

D. ✔ $\frac{4}{7}$

Question Type : COMPREHENSION

Question Numbers : (92 to 93)

Question Label : Comprehension

The probability of team A, B and C winning a tournament is $\frac{4}{9}$, $\frac{2}{9}$ and $\frac{1}{3}$ respectively. The probability that the winner will be given direct entry to the knock-out stage in the next tournament is $\frac{3}{10}$ if the team A wins, $\frac{1}{2}$ if the team B wins, and $\frac{4}{5}$ if the team C wins. Based on the given information, answer the subquestions.

Sub questions

Question Number : 92 Question Type : SA

Correct Marks : 4

Question Label : Short Answer Question

What is the probability that the team will be given direct entry to the knock-out stage in the next

tournament?(Enter the answer correct to 2 decimal accuracy)

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Range

Text Areas : PlainText

Possible Answers :

0.47 to 0.55

Question Number : 93 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

If the team is given direct entry to the knock-out stage in the next tournament, what is the probability that the team *C* has won the current tournament?(Enter the answer correct to 2 decimal accuracy)

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Range

Text Areas : PlainText

Possible Answers :

0.48 to 0.56

Question Number : 94 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

The Statistics department of a college has a batch of 50 students. Of the total number of students in the batch, 28 are boys and the rest are girls. If two students are selected at random (without

replacement) to represent the college in a competition, then find the probability that the both student selected are boys?(Enter the answer correct to 2 decimal places)

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Range

Text Areas : PlainText

Possible Answers :

0.27 to 0.35

Question Type : COMPREHENSION

Question Numbers : (95 to 96)

Question Label : Comprehension

Answer the given subquestions.

Sub questions

Question Number : 95 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

Rohit wants to create a 4-digit numerical password for his mobile phone. In how many ways, can he create a 4-digit numerical password between 3999 and 10000 with digits 0, 2, 3, 4, 5, 6 if repetition of digits is allowed?

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

Question Number : 96 Question Type : MSQ

Correct Marks : 0

Question Label : Multiple Select Question

Select the steps from the following options, that you will use to create 4-digit numerical password using the given digits.

Note: This question is optional. We will check your answer to this question if you make a mistake in the previous one.

Options :

A. ✔ Selection of digits will occur simultaneously.

B. ✖ Selection of digits will not occur simultaneously.

C. ✔ With replacement.

D. ✖ Without replacement.

E. ✔ Order matters.

F. ✖ Order does not matter.

Question Type : COMPREHENSION

Question Numbers : (97 to 98)

Question Label : Comprehension

Answer the given subquestions.

Sub questions

Question Number : 97 Question Type : SA

Correct Marks : 3

Question Label : Short Answer Question

In how many ways can, 7 team members including a captain, vice-captain and a coach, sit around a circular table, when the captain is to sit on one side of the coach and the vice-captain on the other side?

Response Type : Numeric

Evaluation Required For SA : Yes

Show Word Count : Yes

Answers Type : Equal

Text Areas : PlainText

Possible Answers :

48

Question Number : 98 Question Type : MSQ

Correct Marks : 0

Question Label : Multiple Select Question

Select the steps from the following options, that you will use for arranging team members around a circular table.

Note: This question is optional. We will check your answer to this question if you make a mistake in the previous one.

Options :

A. ✔ Selection of team members will occur simultaneously.

B. ✖ Selection of team members will not occur simultaneously.

C. ✖ With replacement.

D. ✔ Without replacement.

E. ✔ Order matters.

F. ✖ Order does not matter.

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