

Computer Based Examination System

Exported On *	2023/04/03 12:11:45
Title *	Question Paper Answer Key
OES Exam *	GPSC12202228 / Assistant Professors in Government College in Computer Science/ Completed / 2023-04-01

1	Question Description	The maximum number of edges in a bipartite graph on 12 vertices is
	A	12
	B	24
	C	48
	D	36
	E	None of the above
	Correct Answer	D
	Marks	1

2

Question Description	Let G be an undirected complete graph on n vertices, where $n > 2$. Then, the number of different Hamiltonian cycles in G is equal to
A	N!
B	$(N-1)!/2$
C	$(N-1)!$
D	1
E	None of the above
Correct Answer	B
Marks	1

3

Question Description	P is a 16-bit signed integer. The 2's complement representation of P is $(F87B)_{16}$. The 2's complement representation of $8*P$
A	$F878_{16}$
B	$187B_{16}$
C	$C3D8_{16}$
D	$987B_{16}$
E	None of the above
Correct Answer	C
Marks	1

4

Question Description

Given the following input (4322, 1334, 1471, 9679, 1989, 6171, 6173, 4199) and the hash function $x \bmod 10$, which of the following statements are true?

1. 9679, 1989, 4199 hash to the same value
2. All elements hash to the same value
3. Each element hashes to a different value
4. 1471, 6171 has to the same value

A

1 and 2

B

1 and 3

C

1 and 4

D

2 and 3

E

None of the above

Correct Answer

C

Marks

1

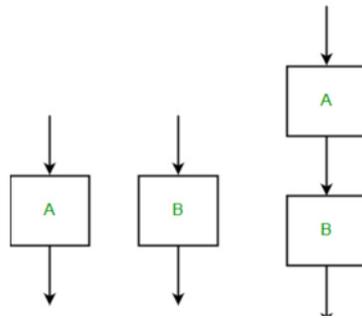
5

Question Description	Which one of the following statements about normal forms is FALSE?
A	BCNF is stricter than 3NF
B	Lossless, dependency-preserving decomposition into 3NF is always possible
C	Any relation with two attributes is in BCNF
D	Lossless, dependency-preserving decomposition into BCNF is always possible
E	None of the above
Correct Answer	D
Marks	1

6

Question Description

The cyclomatic complexity of each of the module's A and B shown below is 10. What is the cyclomatic complexity of the sequential integration shown on the right hand side?



A

17

B

18

C

19

D

20

E

None of the above

Correct Answer

C

Marks

1

7

Question Description

The relation book (title, price) contains the titles and prices of different books. Assuming that no two books have the same price, what does the following SQL query list?

```
select title
from book as B
where (select count(*)
from book as T
where T.price > B.price) < 5
```

A Titles of the five most expensive books

B Titles of the four most expensive books

C Title of the fifth most inexpensive book

D Title of the fifth most expensive book

E None of the above

Correct Answer A

Marks 1

8

Question Description	Edge computing brings analytical computational resources close to the end users and therefore can _____ the responsiveness and throughput of applications
A	Minimize
B	Equal
C	Increase
D	Constant
E	None of the above
Correct Answer	C
Marks	1

9

Question Description	An advantage of chained hash table (external hashing) over the open addressing scheme is
A	Worst case complexity of search is less
B	Deletion is easier
C	Insertion is easier
D	Less space complexity
E	None of the above
Correct Answer	B
Marks	1

10	Question Description	In a packet switching network, packets are routed from source to destination along a single path having two intermediate nodes. If the message size is 24 bytes and each packet contains a header of 3 bytes, then the optimum packet size is:
	A	4
	B	6
	C	8
	D	9
	E	None of the above
	Correct Answer	D
	Marks	1

11	Question Description	Which normal form is considered adequate for normal relational database design?
	A	2NF
	B	3NF
	C	4NF
	D	5NF
	E	None of the above
	Correct Answer	B
	Marks	1

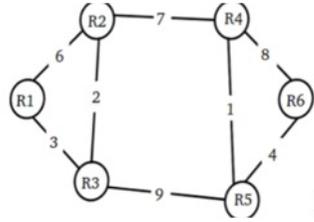
12

Question Description	Consider a schema $R(A, B, C, D)$ and functional dependencies $A \rightarrow B$ and $C \rightarrow D$. Then the decomposition of R into $R_1(A, B)$ and $R_2(C, D)$ is
A	loss less join but not dependency preserving
B	dependency preserving and loss less join
C	dependency preserving but not loss less join
D	not dependency preserving and not loss less join
E	None of the above
Correct Answer	C
Marks	1

13

Question Description

Consider a network with 6 routers R1 to R6 connected with links having weights as shown in the following diagram



All the routers use the distance vector-based routing algorithm to update their routing tables. Each router starts with its routing table initialized to contain an entry for each neighbor with the weight of the respective connecting link. After all the routing tables stabilize, how many links in the network will never be used for carrying any data?

A	4
B	3
C	2
D	1
E	None of the above
Correct Answer	C
Marks	1

14

Question Description

Consider the following C program segment.

```
while (first <= last)
{
if (array [middle] < search)
first = middle +1;
else if (array [middle] == search)
found = True;
else last = middle - 1;
middle = (first + last)/2;
}
if (first < last) not Present = True;
```

The cyclomatic complexity of the program segment is _____.

A 2

B 3

C 4

D 5

E None of the above

Correct Answer D

Marks 1

15

Question Description

What is the minimal form of the Karnaugh map shown below? Assume that X denotes a don't care term.

		ab			
		00	01	11	10
cd	00	1	X	X	1
	01	X			1
	11				
	10	1			X

A $b'd' + b'c' + c'd'$

B $b'd'$

C $b'd' + b'c'$

D $bd + ab'cd$

E None of the above

Correct Answer C

Marks 1

16

Question Description	Suppose the round trip propagation delay for a 10 Mbps Ethernet having 48-bit jamming signal is 46.4 ms. The minimum frame size is:
A	562
B	464
C	416
D	512
E	None of the above
Correct Answer	B
Marks	1

17	Question Description	Which of the following transport layer protocols is used to support electronic mail?
	A	SMTP
	B	TCP
	C	UDP
	D	HTTP
	E	None of the above
	Correct Answer	B
	Marks	1

18	Question Description	SR latch made by cross coupling two NAND gates if $S=R=0$, Then it will result in
	A	$Q=1, Q'=1$
	B	$Q=1, Q'=0$
	C	$Q=0, Q'=1$
	D	Indeterminate state
	E	None of the above
	Correct Answer	A
	Marks	1

19

Question Description

The coupling between different modules of a software is categorized as follows:

- I. Content coupling
- II. Common coupling
- III. Control coupling
- IV. Stamp coupling
- V. Data coupling

Coupling between modules can be ranked in the order of strongest (least desirable) to weakest (most desirable) as follows:

A

I-II-III-IV-V

B

V-IV-III-II-I

C

I-III-V -II-IV

D

IV-II-V-III-I

E

None of the above

Correct Answer

A

Marks

1

20

Question Description

In the following truth table, $V = 1$ if and only if the input is valid.

Inputs			Outputs			
D_0	D_1	D_2	D_3	X_0	X_1	V
0	0	0	0	X	X	0
1	0	0	0	0	0	1
0	1	0	0		1	1
1	X	1	0		0	1
X	X	X	1	1	1	1

A Decoder

B Encoder

C Demultiplexer

D Priority Encoder

E None of the above

Correct Answer D

Marks 1

21	Question Description	In the slow start phase of the TCP congestion control algorithm, the size of the congestion window
	A	Increases exponentially
	B	increases quadratically
	C	increases linearly
	D	do not increase
	E	None of the above
	Correct Answer	A
	Marks	1

22	Question Description	In the IEEE floating point representation, the hexadecimal value 0 × 00000000 corresponds to
	A	Normalized value 2^{-127}
	B	Special value +0
	C	Normalized value +0
	D	Normalized value 2^{-126}
	E	None of the above
	Correct Answer	B
	Marks	1

23

Question Description	Given relations $r(w, x)$ and $s(y, z)$, the result of select distinct w, x from r, s is guaranteed to be same as r , provided
A	r and s have no duplicates
B	r has no duplicates and s is non-empty
C	s has no duplicates and r is non-empty
D	r and s have the same number of tuples
E	None of the above
Correct Answer	B
Marks	1

24

Question Description

The availability of a complex software is 90%. Its Mean Time Between Failure (MTBF) is 200 days. Because of the critical nature of the usage, the organization deploying the software further enhanced it to obtain an availability of 95%. In the process, the Mean Time To Repair (MTTR) increased by 5 days. What is the MTBF of the enhanced software:

A

200 days

B

300 days

C

400 days

D

500 days

E

None of the above

Correct Answer

D

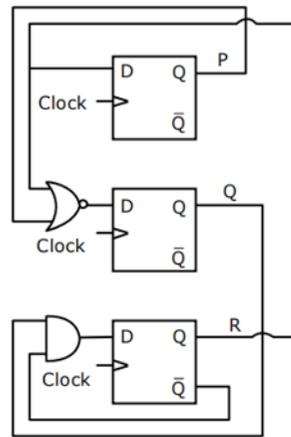
Marks

1

25

Question Description

Consider the following circuit involving three D-type flip-flops used in a certain type of counter configuration.



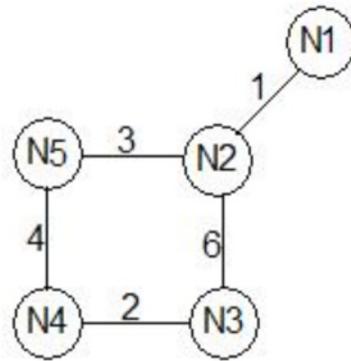
If all the flip-flops were reset to 0 at power on, what is the total number of distinct outputs (states) represented by PQR generated by the counter?

A	1
B	2
C	3
D	4
E	None of the above
Correct Answer	D
Marks	1

26

Question Description

Consider a network with five nodes, N1 to N5, as shown below.



The network uses a Distance Vector Routing Distance Vector Routing protocol. Once the routes have stabilized, the distance vectors at different nodes are as following.

N1:(0, 1, 7, 8, 4)

N2:(1, 0, 6, 7, 3)

N3:(7, 6, 0, 2, 6)

N4:(8, 7, 2, 0, 4)

N5:(4, 3, 6, 4, 0)

Each distance vector is the distance of the best-known path at that instance to nodes, N1 to N5, where the distance to itself is 0. Also, all links are symmetric and the cost is identical in both directions. In each round, all nodes exchange their distance vectors with their respective neighbors. Then all nodes update their distance vectors. In between two rounds, any change in cost of a link will cause the two incident nodes to change only that entry in their distance vectors.

The cost of link N2-N3 reduces to 2 (in both directions). After the next round of update what will be the new distance vector at node, N3?

A (3, 2, 0, 2, 6)

B (7, 2, 0, 2, 5)

C	(7, 2, 0, 2, 6)
D	(3, 2, 0, 2, 5)
E	None of the above
Correct Answer	D
Marks	1

27

Question Description

A shared variable x , initialized to zero, is operated on by four concurrent processes W, X, Y, Z as follows. Each of the processes W and X reads x from memory, increments by one, stores it to memory, and then terminates. Each of the processes Y and Z reads x from memory, decrements by two, stores it to memory, and then terminates. Each process before reading x invokes the P operation (i.e., wait) on a counting semaphore S and invokes the V operation (i.e., signal) on the semaphore S after storing x to memory. Semaphore S is initialized to two. What is the maximum possible value of x after all process's complete execution?

A

2

B

1

C

0

D

-1

E

None of the above

Correct Answer

A

Marks

1

28

Question Description

Consider the virtual page reference string:

1,2,3,2,4,1,3,2,4,1

on a demand paged virtual memory system running on a computer system that has main memory size of 3-page frames which are initially empty. Let LRU, FIFO and OPTIMAL denote the number of page faults under the corresponding page replacement policy. Then,

A

OPTIMAL = FIFO

B

OPTIMAL < FIFO < LRU

C

OPTIMAL < LRU < FIFO

D

OPTIMAL = LRU

E

None of the above

Correct Answer

B

Marks

1

29

Question Description

Match the problem domains in GROUP I with the solution technologies in GROUP II

GROUP I

(P) Service oriented computing

(Q) Heterogeneous communicating systems

(R) Information representation

(S) Process description

GROUP II

(1) Interoperability

(2) BPMN

(3) Publish-find-bind

(4) XML

A

P-1, Q-2, R-3, S-4

B

P-3, Q-1, R-4, S-2

C

P-3, Q-4, R-2, S-1

D

P-4, Q-3, R-2, S-1

E

None of the above

Correct Answer

B

Marks

1

30

Question Description

Which one of the following states the correct difference between object-oriented programming and object-based programming?

1. A procedure-oriented language emphasizes data rather than procedure. An object-oriented language emphasizes doing things or algorithms.
2. A procedure-oriented language emphasizes doing things or algorithms. An object-oriented language emphasizes data rather than procedure.
3. In procedure-oriented programs are decomposed into functions. In an object-oriented language, large programs are decomposed into functions.
4. In procedure-oriented language, large programs are decomposed into functions. In an object-oriented language, programs are decomposed into functions.

A

1 and 2

B

2 and 4

C

3 and 4

D

2 and 3

E

None of the above

Correct Answer

B

Marks

1

31	Question Description	Data mining is?
	A	time variant non-volatile collection of data
	B	The actual discovery phase of a knowledge
	C	Both A and B
	D	Neither A nor B
	E	None of the above
	Correct Answer	B
	Marks	1

32	Question Description	Consider a 4-bit Johnson counter with an initial value of 0000. The counting sequence of this counter is
	A	0,2,4,6,8,10,12,14,0
	B	0,8,12,14,15,7,3,1,0
	C	0,1,3,5,7,9,11,13,15,0
	D	0,1,3,7,15,14,12,8,0
	E	None of the above
	Correct Answer	B
	Marks	1

33

Question Description	There are n stations in a slotted LAN. Each station attempts to transmit with a probability p in each time slot. What is the probability that ONLY one station transmits in a given time slot?
A	$p(1-p)^{(n-1)}$
B	$np(1-p)^{(n-1)}$
C	$(1-p)^{(n-1)}$
D	$1-(1-p)^{(n-1)}$
E	None of the above
Correct Answer	B
Marks	1

34

Question Description	Which one of the following is NOT desired in a good Software Requirement Specifications (SRS) document?
A	Goals of Implementation
B	Functional Requirements
C	Non-Functional Requirements
D	Algorithms for Software Implementation
E	None of the above
Correct Answer	D
Marks	1

35

Question Description

Which of the following problems are decidable?

1. Does a given program ever produce an output?
2. If L is a context-free language, then, is L' also context-free?
3. If L is a regular language, then, is L' also regular?
4. If L is a recursive language, then, is L' also recursive?

A

1,2,3,4

B

1,2

C

1,2,3

D

3,4

E

None of the above

Correct Answer

D

Marks

1

36

Question Description	Which of the following forms of data mining assigns records to one of a predefined set of classes?
A	Classification
B	Clustering
C	Both A and B
D	Neither A nor B
E	None of the above
Correct Answer	B
Marks	1

37

Question Description

Which of the following are decidable?

1. Whether the intersection of two regular languages is infinite
2. Whether a given context-free language is regular
3. Whether two push-down automata accept the same language
4. Whether a given grammar is context-free

A

1 and 2

B

2 and 3

C

1 and 4

D

3 and 4

E

None of the above

Correct Answer

C

Marks

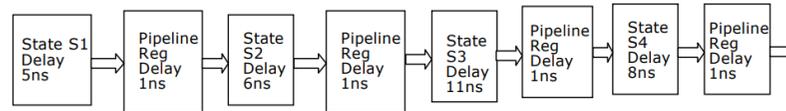
1

38	Question Description	Data can be stored , retrieved and updated in ...
	A	OLTP
	B	OLAP
	C	FTP
	D	SMTP
	E	None of the above
	Correct Answer	A
	Marks	1

39	Question Description	Which of the following scenarios may lead to an irrecoverable error in a database system?
	A	A transaction writes a data item after it is read by an uncommitted transaction
	B	A transaction reads a data item after it is read by an uncommitted transaction
	C	A transaction reads a data item after it is written by an committed transaction
	D	A transaction reads a data item after it is written by an uncommitted transaction
	E	None of the above
	Correct Answer	D
	Marks	1

Question Description

Consider an instruction pipeline with four stages (S1, S2, S3 and S4) each with combinational circuit only. The pipeline registers are required between each stage and at the end of the last stage. Delays for the stages and for the pipeline registers are as given in the figure.



What is the approximate speed up of the pipeline in steady state under ideal conditions when compared to the corresponding non-pipeline implementation?

- | | |
|-----------------------|-------------------|
| A | 2.5 |
| B | 3.1 |
| C | 1.0 |
| D | 4.0 |
| E | None of the above |
| Correct Answer | A |
| Marks | 1 |

41

Question Description	Which one of the following is TRUE?
A	The requirements document also describes how the requirements that are listed in the document are implemented efficiently.
B	Requirements review is carried out to find the errors in system design
C	Prototyping is a method of requirements validation.
D	Consistency and completeness of functional requirements are always achieved in practice
E	None of the above
Correct Answer	C
Marks	1

42

Question Description	_____ is a distributed computing paradigm that brings computation and data storage closer to the sources of data.
A	Quantum Computing
B	Edge computing
C	Both A and B
D	Cloud computing
E	None of the above
Correct Answer	B
Marks	1

43

Question Description	A priority queue Q is used to implement a stack that stores characters. PUSH (C) is implemented as INSERT (Q, C, K) where K is an appropriate integer key chosen by the implementation. POP is implemented as DELETETEMIN(Q). For a sequence of operations, the keys chosen are in
A	Strictly increasing order
B	Non increasing order
C	Strictly decreasing order
D	Non decreasing order
E	None of the above
Correct Answer	B
Marks	1

44	Question Description	A community of 5 members is to be formed out of 10 people. The names are written in chits of paper and put into 6 boxes. So how many chits will go into the same box?
	A	30
	B	40
	C	32
	D	42
	E	None of the above
	Correct Answer	D
	Marks	1

45	Question Description	Let G be a finite group on 84 elements. The size of a largest possible proper subgroup of is _____.
	A	42
	B	32
	C	22
	D	12
	E	None of the above
	Correct Answer	A
	Marks	1

46

Question Description	If a class B network on the Internet has a subnet mask of 255.255.248.0, what is the maximum number of hosts per subnet?
A	2042
B	2046
C	2047
D	2048
E	None of the above
Correct Answer	B
Marks	1

47

Question Description	Consider the equation $(123)_5 = (x8)_y$ with x and y as unknown. The number of possible solutions is _____ .
A	4
B	5
C	2
D	3
E	None of the above
Correct Answer	D
Marks	1

48

Question Description

$$P(x) = \neg(x=1) \wedge \forall y(\exists z(x=y*z) \Rightarrow (y=x) \vee (y=1))$$

Which one of the following options is CORRECT given three positive integers x, y and z, and a predicate?

A

P(x) being true means that x has exactly two factors other than 1 and x

B

P(x) is always true irrespective of the value of x

C

P(x) being true means that x is a prime number

D

P(x) being true means that x is a number other than 1

E

None of the above

Correct Answer

C

Marks

1

49

Question Description	The following postfix expression with single digit operands is evaluated using a stack: $8\ 2\ 3\ ^\ / \ 2\ 3\ * \ + \ 5\ 1\ * \ -$ - Note that $^$ is the exponentiation operator. The top two elements of the stack after the first $*$ is evaluated are
A	6,1
B	3,2
C	1,5
D	5,7
E	None of the above
Correct Answer	A
Marks	1

50

Question Description	Which features of OOP are extensively used in implementing inheritance?
A	Abstraction
B	Overloading
C	Encapsulation
D	Polymorphism
E	None of the above
Correct Answer	D
Marks	1

51

Comprehension

Read the passage and answer the questions below:

We can break mountains apart; we can drain the rivers and flood the valleys. We can turn the most luxurious forests into throwaway paper products. We can tear apart the great grass cover of the western plains and pour toxic chemicals into the soil and pesticides onto the fields until the soil is dead and blown away in the wind. We can pollute air with acids, rivers with sewage, the sea with oil—all this with an intoxication with our power for devastation at an order of magnitude beyond all reckoning. We can invent computers capable of processing ten million calculations per second. And why? To increase the volume and speed with which we move natural resources through the consumer economy to the junk pile or waste heap.

Question Description

Identify a word or phrase from the options given below which implies “being overcome with”

A

reckoning

B

magnitude

C

intoxication

D

luxurious

E

None of the above

Correct Answer

C

Marks

1

52

Comprehension

Read the passage and answer the questions below:

We can break mountains apart; we can drain the rivers and flood the valleys. We can turn the most luxurious forests into throwaway paper products. We can tear apart the great grass cover of the western plains and pour toxic chemicals into the soil and pesticides onto the fields until the soil is dead and blown away in the wind. We can pollute air with acids, rivers with sewage, the sea with oil—all this with an intoxication with our power for devastation at an order of magnitude beyond all reckoning. We can invent computers capable of processing ten million calculations per second. And why? To increase the volume and speed with which we move natural resources through the consumer economy to the junk pile or waste heap.

Question Description

Identify from the options provided below, the expression used to convey the damage directly caused to nature and environment

A

devastation

B

waste heap

C

beyond all reckoning

D

junk pile

E

None of the above

Correct Answer

A

Marks

1

Comprehension

Read the passage and answer the questions below:

We can break mountains apart; we can drain the rivers and flood the valleys. We can turn the most luxurious forests into throwaway paper products. We can tear apart the great grass cover of the western plains and pour toxic chemicals into the soil and pesticides onto the fields until the soil is dead and blown away in the wind. We can pollute air with acids, rivers with sewage, the sea with oil—all this with an intoxication with our power for devastation at an order of magnitude beyond all reckoning. We can invent computers capable of processing ten million calculations per second. And why? To increase the volume and speed with which we move natural resources through the consumer economy to the junk pile or waste heap.

Question Description

“To increase the volume and speed with which we move natural resources through the consumer economy to the junk pile or waste heap”. This statement is an indictment of

A

superfast computers

B

insensitive consumerism

C

natural resources

D

junk pile or waste heap

E

None of the above

Correct Answer

B

Marks

1

54

Comprehension

Read the passage and answer the questions below:

We can break mountains apart; we can drain the rivers and flood the valleys. We can turn the most luxurious forests into throwaway paper products. We can tear apart the great grass cover of the western plains and pour toxic chemicals into the soil and pesticides onto the fields until the soil is dead and blown away in the wind. We can pollute air with acids, rivers with sewage, the sea with oil—all this with an intoxication with our power for devastation at an order of magnitude beyond all reckoning. We can invent computers capable of processing ten million calculations per second. And why? To increase the volume and speed with which we move natural resources through the consumer economy to the junk pile or waste heap.

Question Description

From the phrases listed below, select the one which is used in the passage in a non-destructive sense by itself

A

drain the rivers

B

break mountains

C

invent computers

D

flood the valleys

E

None of the above

Correct Answer

C

Marks

1

55

Comprehension

Read the passage and answer the questions below:

We can break mountains apart; we can drain the rivers and flood the valleys. We can turn the most luxurious forests into throwaway paper products. We can tear apart the great grass cover of the western plains and pour toxic chemicals into the soil and pesticides onto the fields until the soil is dead and blown away in the wind. We can pollute air with acids, rivers with sewage, the sea with oil—all this with an intoxication with our power for devastation at an order of magnitude beyond all reckoning. We can invent computers capable of processing ten million calculations per second. And why? To increase the volume and speed with which we move natural resources through the consumer economy to the junk pile or waste heap.

Question Description

Identify from the options given below, the one that indicates “harmful substances, used to protect food crops from destruction”

A

toxic chemicals

B

pesticides

C

sewage

D

acids

E

None of the above

Correct Answer

B

Marks

1

56	Question Description	On which date is World Anthropology Day observed every year?
	A	February 16
	B	February 12
	C	February 14
	D	February 10
	E	None of the above
	Correct Answer	A
	Marks	1

57	Question Description	On which state highway was the world's first bamboo crash barrier installed?
	A	Rajasthan
	B	Assam
	C	Maharashtra
	D	Gujarat
	E	None of the above
	Correct Answer	C
	Marks	1

58	Question Description	Which countries lead the International Biofuels Alliance?
	A	India, Brazil, and the United States
	B	India, Germany, and France
	C	Brazil, UAE, Nepal
	D	USA, Bhutan, India
	E	None of the above
	Correct Answer	A
	Marks	1

59	Question Description	How many Lok Sabha seats belong to Rajasthan?
	A	32
	B	25
	C	30
	D	17
	E	None of the above
	Correct Answer	B
	Marks	1

60	Question Description	When is World Unani Day observed every year?
	A	February 10
	B	February 11
	C	February 05
	D	February 08
	E	None of the above
	Correct Answer	B
	Marks	1
61	Question Description	Which state defeated Maharashtra to win the Senior Women's 13th National Hockey Championship 2023?
	A	Uttar Pradesh
	B	Madhya Pradesh
	C	Himachal Pradesh
	D	Arunachal Pradesh
	E	None of the above
	Correct Answer	B
	Marks	1

62	Question Description	Where is India's first Geological Park going to be built?
	A	Bhopal
	B	Shivpuri
	C	Sagar
	D	Jabalpur
	E	None of the above
	Correct Answer	D
	Marks	1

63	Question Description	Ms. Medha Patkar is closely associated with the
	A	Tehri project
	B	Enron project
	C	Sardar Sarovar project
	D	Dabhol project
	E	None of the above
	Correct Answer	C
	Marks	1

64	Question Description	With the help of ISRO, in which city of Bhutan was the ground station of the India-Bhutan satellite established?
	A	Paro
	B	Punakha
	C	Thimphu
	D	Jakar
	E	None of the above
	Correct Answer	C
	Marks	1

65	Question Description	What is the country of origin for ULTRASAT, the first telescope mission?
	A	Iran
	B	Iraq
	C	Israel
	D	India
	E	None of the above
	Correct Answer	C
	Marks	1

66

Question Description

Directions: Read the following information carefully and answer the questions given beside.

In a city, SRK Mall was to the north-west of Cosmos Mall. Shanti Mall was in the east of SRK Mall which was towards the south of TDI Mall. Saket Mall was towards the south-west of Shanti Mall such that it was situated towards the east of Cosmos Mall. DB Mall was 20 km towards the north of Cosmos Mall, which was 4 times the distance between Cosmos Mall and Saket Mall. Rajan Mall was the mid point between SRK Mall and Shanti Mall and also Cosmos Mall and DB Mall. The distance between TDI Mall and SRK Mall was half of the distance between DB Mall and Rajan Mall.

If the straight distance between the SRK Mall and the Shanti Mall is 14 km, what total distance one needs to cover if one travels from SRK Mall to Saket Mall via Rajan Mall and Cosmos Mall?

A 16km

B 20km

C 21km

D 22km

E None of the above

Correct Answer D

Marks 1

67

Question Description

Directions: Read the following information carefully and answer the questions given beside.

Certain number of persons (that does not exceed 15) are standing in a straight linear row facing towards the north. 5 persons stand between B and E, who is third to the left of A. U is to the right of A. Not more than 3 persons stand between U and T. B is third to the left of U. I is fifth to the right of T. 2 persons stand between E and F, who is sitting at the extreme left end of the row.. Three persons stand between A and L, who is towards the right of E.

What is the position of E with respect to L?

A 4th to the left

B 7th to the left

C 6th to the right

D 5th to the left

E None of the above

Correct Answer B

Marks 1

68

Question Description

Direction: In each of the following question, there is a certain relationship between two given pair on both side of ':' . One word is given on another side of ':' while another word is to be found from the given options, having the same relation with this word as the words of the given pair . Choose the correct word from the following options..

SHI : RIJ :: QJK : ?

A

TDE

B

PKL

C

UGH

D

VPQ

E

None of the above

Correct Answer

B

Marks

1

69

Question Description

Direction: In each of the following question, there is a certain relationship between two given pair on both side of '::' . One word is given on another side of '::' while another word is to be found from the given options, having the same relation with this word as the words of the given pair . Choose the correct word from the following options.

pongee : Silk : : Shallot : ?

A

Boat

B

Building

C

Ship

D

Stream

E

None of the above

Correct Answer

A

Marks

1

70

Question Description

Direction: In each of the following question, there is a certain relationship between two given pair on both side of '::<' . One part is given on another side of '::<' while another part is to be found from the given options, having the same relation with this part as the parts of the given pair . Choose the correct part from the following options.

91 : ? :: 64 : 54

A

63

B

101

C

32

D

70

E

None of the above

Correct Answer

A

Marks

1

71

Question Description

Choose the pair that best represents a similar relationship to the one expressed in the original pair of words.
DELTOID : MUSCLE

A

radius : bone

B

brain : nerve

C

tissue : organ

D

blood : vein

E

None of the above

Correct Answer

A

Marks

1

Question Description

Directions : Each of the following consists of a question and two statements numbered I and II given below it. You have to decide whether the data provided in the statements are sufficient to answer the question.

A teacher wrote a meaningful English word on the black-board. Find the exactly middle letter of the 5 letter word?

Statement I : The first and last letter of the word is 'E'. The second and fourth letters of the word are consecutive letters in English alphabet series. R is adjacent to A.

Statement II : The first and last vowel is same. Only one letter is placed between A and E. S is written after R. The vowels are placed at odd numbered positions.

A

If the data in statement I is sufficient to answer the question

B

If the data in statement II is sufficient to answer the question.

C

If the data in either statement I or statement II is sufficient to answer the question.

D

If the data in both statement I and statement II is necessary to answer the question.

E

None of the above

Correct Answer

C

Marks

1

73

Question Description

Directions: Read the following information carefully and answer the questions given beside.

G is the mother of F, who is the spouse of D. M is the daughter of D, who is the only brother of C. E is the son of G, who is married to H. A is the niece of C, who has no sister and is unmarried. T is the father of D and has no daughter. V is the sister-in-law of F. G has only two children. M is the granddaughter of O.

How is F's mother-in-law related to T?

A

Sister

B

Father

C

Wife

D

Brother

E

None of the above

Correct Answer

C

Marks

1

74

Question Description

Directions: Read the following information carefully and answer the questions given beside.

In a certain code language “hunger and poverty remain” is coded as “ner gup jil mub”, “people count poverty records” is coded as “abc gup xyz def” , “count remain unchanged records” is coded as “buf ner def xyz”, “people and poverty rate” is coded as “abc mub for gup”.

What is the code for "poverty unchanged"?

A

buf jil

B

buf ner

C

ner gup

D

gup buf

E

None of the above

Correct Answer

D

Marks

1

75

Question Description

Find missing numbers?

36	6	9	15
88	11	9	?
120	?	6	18

A

54,41

B

17,82

C

17,10

D

96,13

E

None of the above

Correct Answer

C

Marks

1