

Andhra Pradesh State Council of Higher Education

Notations :

- 1.Options shown in green color and with ✓ icon are correct.
- 2.Options shown in red color and with ✗ icon are incorrect.

Question Paper Name :	Environmental Sciences 18th Oct 2022 Shift 1
Duration :	120
Total Marks :	140
Display Marks:	No
Share Answer Key With Delivery Engine :	Yes
Calculator :	None
Magnifying Glass Required? :	No
Ruler Required? :	No
Eraser Required? :	No
Scratch Pad Required? :	No
Rough Sketch/Notepad Required? :	No
Protractor Required? :	No
Show Watermark on Console? :	Yes
Highlighter :	No
Auto Save on Console?	Yes
Change Font Color :	No
Change Background Color :	No
Change Theme :	No
Help Button :	No
Show Reports :	No
Show Progress Bar :	No
Is this Group for Examiner? :	No
Examiner permission :	Cant View
Show Progress Bar? :	No





Research Methodology

Section Id :	549470347
Section Number :	1
Mandatory or Optional :	Mandatory
Number of Questions :	59
Section Marks :	70
Enable Mark as Answered Mark for Review and Clear Response :	Yes
Maximum Instruction Time :	0
Is Section Default? :	null

Question Number : 1 Question Id : 54947024672 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

A teacher can motivate the students by _____.

Options :

1.  Giving suitable prizes
2.  Giving proper guidance
3.  Giving examples
4.  Delivering speech in the class

Question Number : 2 Question Id : 54947024673 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The aim of education should be _____.

Options :

1. ✘ To develop vocational skills in the students
2. ✘ To develop social awareness in the students
3. ✘ To Prepare the students for examinations
4. ✔ To prepare the students for practical life

Question Number : 3 Question Id : 54947024674 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The quality of school education is exclusively depending upon _____.

Options :

1. ✘ Infrastructural facilities

2. ✘ Finance

3. ✘ Internal support

4. ✔ The quality of teacher education

Question Number : 4 Question Id : 54947024675 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following, which one is not predominant in modern teaching method?

Options :

1. ✘ Activity based teaching

2. ✘ Learner- centered method

3. ✔ Teacher – centric

Smart board

4. ✖

Question Number : 5 Question Id : 54947024676 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following aspects, which is not figured in Choice Based Credit System?

Options :

Students to pursue courses of their choice

1. ✖

Students confine their basic course

2. ✔

Students learn extra courses

3. ✖

Students acquire more than the required credits

4. ✖

Question Number : 6 Question Id : 54947024677 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The major disadvantage in computer based testing is _____.

Options :

1. ✘ Efficiency
2. ✘ Automatic scoring with instant feedback
3. ✘ Less human error
4. ✔ Factual knowledge

Question Number : 7 Question Id : 54947024678 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The most important trait of a student is _____.

Options :

1. ✘ Sense of responsibility
2. ✔ Obedience

To speak truth

3. ✘

Co-operation

4. ✘

Question Number : 8 Question Id : 54947024679 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following, which one is not considered as characteristic of research?

Options :

Testing Hypothesis

1. ✘

Systematic work

2. ✘

Establishing cause and effect relationship

3. ✘

It is not a process

4. ✔

Question Number : 9 Question Id : 54947024680 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

_____ type of research that test the validity of already made hypothesis.

Options :

1. ✘ Descriptive
2. ✔ Confirmatory
3. ✘ Explanatory
4. ✘ Exploratory

Question Number : 10 Question Id : 54947024681 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the post- positivist approach of research, the following types of research got emphasized except _____ research.

Options :

1. ✘ Phenomenological

2. ✘ Ethnographic

3. ✘ Action

4. ✔ Experimental

Question Number : 11 Question Id : 54947024682 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The research outcomes of which type of research cannot be generalized to other situations?

Options :

1. ✔ Descriptive

2. ✘ Historical

3. ✘ Experimental

4. ✘ Fundamental

Question Number : 12 Question Id : 54947024683 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which salient feature is not figured in the qualitative research?

Options :

Naturalist approach

1. ✘

Objective measurements

2. ✔

It deals with human behavior

3. ✘

Non-numeric data

4. ✘

Question Number : 13 Question Id : 54947024684 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which one is not covered in the quantitative research approaches?

Options :

Simulation

1. ✘

2. ✘ Inferential

3. ✘ Experimental

4. ✔ Naturalist

Question Number : 14 Question Id : 54947024685 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The fundamentals of integrity, credibility and transparency are important in _____.

Options :

1. ✘ Business

2. ✘ Entertainment

3. ✔ Research Ethics

Diplomacy

4. ✖

Is Section Default? :

null

Question Id : 54947024686 Sub Question Shuffling Allowed : Yes Group Comprehension Questions : No Question Pattern Type : NonMatrix Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Question Numbers : (15 to 21)

Read the following passage carefully and answer the questions from 15 to 21:

Many people believe that science and religion are contrary to each other. But his notation is wrong. As a matter of fact, both are correlated to each other. There is no doubt that the method of science and religion are different.

The method of science is observation, experimentation and experience. Science takes it recourse to progressive march towards perfection. The rules of religion are faith, intuition and spoken word of the enlightened. In general, while science is inclined towards reason and rationality, spiritualism is the essence of religion.

In earlier times when man appeared on Earth, he was over-awed at the sight of violent and powerful aspects of nature. In certain cases, the usefulness of different natural objects of nature overwhelmed man. Thus began the worship of forces of nature — fire, the sun, the rivers, the rocks, the trees, the snakes etc. The holy scriptures were written by those who had developed harmony between external nature and their inner self. Their objective was to ennoble, elevate and liberate the human spirit and mind. But the priestly class took upon itself the monopoly of scriptural knowledge and interpretation to its own advantage.

Thus, the entire human race was in chains. Truth was flouted and progressive, liberal and truthful ideas or ideas expressing doubt and scepticism were suppressed and their holders punished. It was in these trying circumstances the science emerged as a savior of mankind. But its path was not smooth and safe. The scientists and free thinkers were tortured. This was the fate of Copernicus, Galileo, Bruno and others. But side by side science gained ground.

Sub questions

Question Number : 15 Question Id : 54947024687 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the reasons for man to worship the forces of nature?

Options :

The holy scriptures advocate the worship of forces of nature

1. ✘

The worship elevates and liberates the human spirit and mind

2. ✔

The worship makes man believe in faith and intuition

3. ✘

Forces of nature teach us spiritualism

4. ✘

Question Number : 16 Question Id : 54947024688 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

According to the passage both science and religion :

Options :

Emerged out of the fear of man

1. ✘

Emerged from the desire of man to worship the forces of nature

2. ✘

Employee different methods of enquiry

3. ✔

Work at the cross-purpose of each other

4. ✘

**Question Number : 17 Question Id : 54947024689 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

What was the objective of the authors of the holy scriptures?

Options :

To teach man the methods of worshipping nature

1. ✘

To educate and raise the human spirit and mind

2. ✘

Work at the cross-purpose of each other

3. ✘

To develop harmony between external nature and their inner self

4. ✓

**Question Number : 18 Question Id : 54947024690 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

According to the passage, at present juncture there is a need to:

Options :

Free man from all sorts of bondages

1. ✘

Judiciously mix the principles of science and true spirit of religion

2. ✓

Teach people to workshop the forces of nature

3. ✘

Encourage spiritualism as much as possible

4. ✘

**Question Number : 19 Question Id : 54947024691 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

Why it is said in the passage that, “science emerged as a saviour of mankind”?

Options :

Science takes recourse to progressive march towards perfection

1. ✘

Science is inclined towards reason and rationality

2. ✘

Man was bound in chains by religious orthodoxy

3. ✔

The free thinkers and enlightened men were tortured

4. ✘

Question Number : 20 Question Id : 54947024692 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Truth was :

Options :

Flouted

1. ✘

Progressive

2. ✘

Both flouted and progressive

3. ✓

Intuition

4. ✘

Question Number : 21 Question Id : 54947024693 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Find the synonym of the word 'belief' used in paragraph 2.

Options :

Observation

1. ✘

Experience

2. ✘

Enlightened

3. ✘

Faith

4. ✓

Is Section Default? : null

Question Number : 22 Question Id : 54947024694 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The major components of communication except _____.

Options :

The actual message being sent

1. ✘

With confused ideas

2. ✔

The encoding of the message

3. ✘

The decoding of the message

4. ✘

Question Number : 23 Question Id : 54947024695 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Interpersonal communication of exchange of ideas between two or more persons in the form of the following except _____.

Options :

Voice

1. ✘

2. ✘ Facial expression

3. ✘ Body language and gestures

4. ✔ Self-talk

Question Number : 24 Question Id : 54947024696 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Written communication refers to _____.

Options :

1. ✔ Verbal

2. ✘ Non- verbal

3. ✘ Wordless

4. ✘ Unstructured

Question Number : 25 Question Id : 54947024697 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The interaction analysis with observing classroom language in order to find out _____.

Options :

The text book effectiveness

1. ✘

Learning and teaching

2. ✔

Students behavior

3. ✘

How the language works

4. ✘

Question Number : 26 Question Id : 54947024698 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What type of problem is arising from expression?

Options :

1. ✘ Perception
2. ✘ Cultural
3. ✔ Semantic
4. ✘ Wrong presumption

Question Number : 27 Question Id : 54947024699 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The communication word derived from _____.

Options :

1. ✘ French
2. ✔ Latin
3. ✘ German

Greek

4. ✘

Question Number : 28 Question Id : 54947024700 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following, which is not considered as mass media?

Options :

Socialization

1. ✘

Education

2. ✘

Entertainment

3. ✘

Interpretation

4. ✔

Question Number : 29 Question Id : 54947024701 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The following aspects are covered in the analytical reasoning except _____.

Options :

Blood relations

1. ✘

Statements and assumptions

2. ✔

Conditions and grouping

3. ✘

Ranking and time sequence test

4. ✘

**Question Number : 30 Question Id : 54947024702 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

Find out the wrong term in the following number series: 3,7, 15, 30,63.

Options :

30

1. ✔

63

2. ✘

15

3. ✘

3

4. ✖

Question Number : 31 Question Id : 54947024703 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What comes next in the following series: 3W, 7V, 11U, 15T.

Options :

19Z

1. ✖

20P

2. ✖

22Q

3. ✖

19S

4. ✔

Question Number : 32 Question Id : 54947024704 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following, which one is the greatest one?

Options :

1. ✘ $3/12$

2. ✘ $6/12$

3. ✔ $9/12$

4. ✘ $8/12$

Question Number : 33 Question Id : 54947024705 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The ratio of market prices of Wheat and Paddy is 2:3 and the ratio of quantities consumed in a family is 5 : 4. Find out the ratio of expenditure of wheat and paddy

Options :

1. ✘ 8: 15

2. ✘ 6:5

3. ✘ 1:1

4. ✓ 5: 6

Question Number : 34 Question Id : 54947024706 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Suppose the average of fifty numbers is 28. If two numbers , namely 25 and 35 are discarded, the average of the remaining numbers is nearly _____.

Options :

1. ✘ 27.29

2. ✓ 27.92

3. ✘ 29.27

4. ✘ 29.72

Question Number : 35 Question Id : 54947024707 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Calculate the simple interest on Rs. 5200 for 2 years at 6% per annum Rs._____.

Options :

1. ✓ 624
2. ✘ 600
3. ✘ 650
4. ✘ 450

Question Number : 36 Question Id : 54947024708 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the nature of the logical argument?

Options :

1. ✘ True or false
2. ✓ Valid or invalid
3. ✘ Verifiable or unverifiable

Justified or unjustified

4. ✘

Question Number : 37 Question Id : 54947024709 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The origin of 'Fallacy' comes from the _____.

Options :

Latin

1. ✔

Greek

2. ✘

German

3. ✘

Sweden

4. ✘

Question Number : 38 Question Id : 54947024710 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the essence of 'Stipulative' definition ?

Options :

Always true

1. ✘

Sometimes false and sometimes true

2. ✘

Always false

3. ✘

Neither true nor false

4. ✔

Question Number : 39 Question Id : 54947024711 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The deduction logic is to be carried on from _____ aspect.

Options :

Universal to particular

1. ✔

Particular to universal

2. ✘

Particular to particular

3. ✘

Universal to universal

4. ✘

**Question Number : 40 Question Id : 54947024712 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

_____ reasoning can be regarded as an instrument that enables mankind to grasp
'unknown' with the help of 'known'.

Options :

Demonstrative

1. ✘

Inductive

2. ✔

Speculative

3. ✘

Deductive

4. ✘

Question Number : 41 Question Id : 54947024713 Display Question Number : Yes Is Question Mandatory : No Calculator : None

Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

‘Pratyaksha’ means _____.

Options :

Inference

1. ✘

Implication

2. ✘

Perception

3. ✔

Transcendental

4. ✘

Question Number : 42 Question Id : 54947024714 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

‘Vyapati’ refers to _____.

Options :

Fallacies

1. ✘

Inference

2. ✖

Implication

3. ✖

Invariable relation

4. ✔

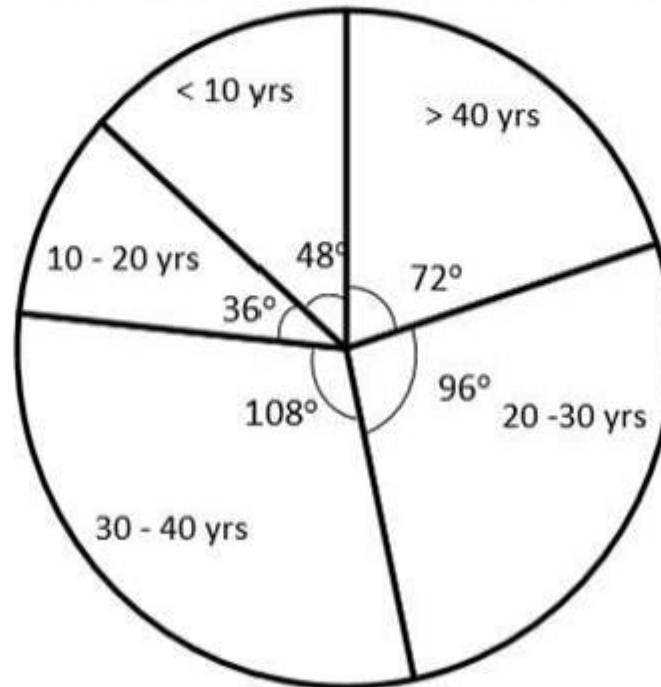
Is Section Default? :

null

Question Id : 54947024715 Sub Question Shuffling Allowed : Yes Group Comprehension Questions : No Question Pattern Type : NonMatrix Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0 Question Numbers : (43 to 45)

Note:

Study the following Pie-chart carefully and answer the questions 43 – 45. It gives data on how the people of a town in different age groups are represented.



Sub questions

Question Number : 43 Question Id : 54947024716 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The number of children whose age is less than 10 years is

Options :

1. ✘ 5625
2. ✘ 5600
3. ✘ 6200
4. ✔ 6000

Question Number : 44 Question Id : 54947024717 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The number of people in the age group (20 – 40) is

Options :

1. ✘ 26000
2. ✔ 25500
3. ✘ 25000

26500

4. ✖

Question Number : 45 Question Id : 54947024718 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The number of people whose age is above 40 years is

Options :

1. ✔ 9000

2. ✖ 8500

3. ✖ 9125

4. ✖ 8000

Is Section Default? : null

Question Id : 54947024719 Sub Question Shuffling Allowed : Yes Group Comprehension Questions : No Question Pattern Type : NonMatrix Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Question Numbers : (46 to 49)

Note:

Study the following table carefully and answer the questions 46 – 49. It gives the data on promotion of employees in different banks during 2017-22.

Bank / Year	Luck Bank	Maha Bank	Nag Bank	Oris Bank	Punj Bank	Del Bank
2017	48	46	52	44	37	39
2018	50	47	50	32	44	46
2019	46	40	50	42	38	35
2020	38	48	36	51	35	39
2021	32	44	46	45	48	40
2022	52	39	47	41	46	43

Sub questions

Question Number : 46 Question Id : 54947024720 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the ratio of total employees who got promoted by Luck Bank and Maha Bank over all the years together?

Options :

133:132

1. ✓

132:133

2. ✘

133:134

3. ✘

132:134

4. ✘

Question Number : 47 Question Id : 54947024721 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the average number of employees promoted by Oris Bank over all the years together ?

Options :

44

1. ✘

39.50

2. ✘

35

3. ✘

42.50

4. ✔

Question Number : 48 Question Id : 54947024722 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the total number of employees who got promoted in all the banks together in the year 2019 ?

Options :

1. ✓ 251
2. ✘ 234
3. ✘ 243
4. ✘ 266

Question Number : 49 Question Id : 54947024723 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Number of employees promoted by Punj Bank in the year 2020 forms approximately what percent of the total number of employees promoted by all the banks together in that year ?

Options :

- 1. ✘ 30 %
- 2. ✘ 90 %
- 3. ✔ 14 %
- 4. ✘ 19 %

Is Section Default? : null

Question Number : 50 Question Id : 54947024724 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following devices, which device enables the users to verify a person's identity?

Options :

- 1. ✘ Barcode reader
- 2. ✔ Finger print scanner

3. ✘
Scanner

4. ✘
Keyboard

**Question Number : 51 Question Id : 54947024725 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

What does WWW stand for ?

Options :

1. ✘
Microsoft

2. ✔
World Wide Web

3. ✘
Where Why What

4. ✘
Web Website World

**Question Number : 52 Question Id : 54947024726 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

'e-mail' stands for _____.

Options :

Electronic mail

1. ✓

Electromagnetic mail

2. ✘

Engine mail

3. ✘

Electric mail

4. ✘

**Question Number : 53 Question Id : 54947024727 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

In the Audio and Video compression, the term RGB means _____.

Options :

Red, Grey, Blue

1. ✘

2. ✓ Red, Green, Blue

3. ✘ Red, Green, Block

4. ✘ Red, Grey, Black

Question Number : 54 Question Id : 54947024728 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

URL stands for _____.

Options :

1. ✘ Universal Resource Location

2. ✘ Universal Response Location

3. ✘ Unified Response Location

Uniform Resource Locators

4. ✓

Question Number : 55 Question Id : 54947024729 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The central government initiative of ATL to create scientific temperament, innovation amongst Indian students .What is the full form of ATL?

Options :

Atal Tinkering Lab

1. ✓

Applied Tech. Lab

2. ✘

Alternative Tech Lab

3. ✘

Atal Tech. Lab

4. ✘

Question Number : 56 Question Id : 54947024730 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The MHRD's initiative to create digital learning environment for design is known as --

Options :

1. ✘ e- Acharya

2. ✔ e- Kalpa

3. ✘ e- Yantra

4. ✘ e- Vidwan

Question Number : 57 Question Id : 54947024731 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The world leaders met at United Nations Headquarters in September 2000 focuses on the available benefits with reference to _____ aspects.

Options :

1. ✘ Artificial Intelligence

Nuclear Technology

2. ✘

Information and Communication

3. ✔

Solid waste treatment technology

4. ✘

Question Number : 58 Question Id : 54947024732 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In the following, which one is not covered in the Millennium development goals?

Options :

Human Rights

1. ✔

Primary Education

2. ✘

Reduction of child mortality

3. ✘

Ensure environmental sustainability

4. ✖

**Question Number : 59 Question Id : 54947024733 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

In the following aspects, what is conservation?

Options :

Saving of plants and animals from natural death

1. ✖

Political practices that support traditions

2. ✖

Preservation and wise use of natural resources

3. ✔

Precipitation patterns to be maintained

4. ✖

**Question Number : 60 Question Id : 54947024734 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

Which one is considered as non-renewable energy source?.

Options :

1. ✘ Wind

2. ✘ Solar

3. ✘ Tidal

4. ✔ Coal

Question Number : 61 Question Id : 54947024735 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which one is Green House gas?

Options :

1. ✘ Oxygen

2. ✔ Carbon dioxide

Nitrogen

3. ✖

Methane

4. ✖

Question Number : 62 Question Id : 54947024736 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is the main reason for Acid Rain to occur?

Options :

Deforestation

1. ✖

Forest fires

2. ✖

Industrial burning of coal and other fossil fuels

3. ✔

Use of fertilizers and pesticides in agriculture

4. ✖

Question Number : 63 Question Id : 54947024737 Display Question Number : Yes Is Question Mandatory : No Calculator : None

Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which Act gives rights to citizens to file cases against violations of environmental norms?

Options :

1. ✘ Water
2. ✘ Forest
3. ✘ Air
4. ✔ Environmental protection

Question Number : 64 Question Id : 54947024738 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Whose name is figured on the commission ' Education System in India' in 1964?

Options :

1. ✘ Radhakrishnan

Mudilier

2. ✘

Kothari

3. ✔

Sadler

4. ✘

Question Number : 65 Question Id : 54947024739 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which country has the most number of Universities in the world as on the year 2021?

Options :

China

1. ✘

India

2. ✔

USA

3. ✘

Australia

4. ✘

Question Number : 66 Question Id : 54947024740 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What are the three cardinal principles of 'SWAYAM'?

Options :

Access, Equity and Quality

1. ✔

Quality, Career and Skills

2. ✘

Innovation, Collaboration and Diversification

3. ✘

Affordability, Equity and Quality

4. ✘

Question Number : 67 Question Id : 54947024741 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

According to National Skill qualification Framework (NSQF) learning outcome levels are---

Options :

Skills, Experience Aptitude

1. ✖

Skills, Achievement and Aptitude

2. ✖

Knowledge , Skills, Experience

3. ✖

Knowledge, Skills and Aptitude

4. ✔

Question Number : 68 Question Id : 54947024742 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

How many life skills are there?

Options :

9

1. ✖

2. ✓ 10

3. ✘ 12

4. ✘ 14

Question Number : 69 Question Id : 54947024743 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

According to Indian Value system 'VASUDHIVAKUTUMBAKAM' reflects
'Learning to --

Options :

1. ✘ Know

2. ✘ Do

3. ✓ Live together

Be

4. ✖

Question Number : 70 Question Id : 54947024744 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The Indian GST is based on the Canadian model and was made on the recommendations of the _____ committee.

Options :

R Rangarajan

1. ✖

G S Balla

2. ✖

Vijay Kelkar

3. ✔

Y V Reddy

4. ✖

Environmental Sciences

Section Id :

549470348

Section Number :	2
Mandatory or Optional :	Mandatory
Number of Questions :	70
Section Marks :	70
Enable Mark as Answered Mark for Review and Clear Response :	Yes
Maximum Instruction Time :	0
Is Section Default? :	null

Question Number : 71 Question Id : 54947024745 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Leslie matrix population model is generally used to estimate

- i. the growth of population.
- ii. the age distribution within population over time.
- iii. the prey-predator interactions
- iv. the change in growth rate

Choose the correct answer :

Options :

1. ✓ i and ii
2. ✘ ii and iii
3. ✘ i and iii
4. ✘ ii and iv

Question Number : 72 Question Id : 54947024746 Display Question Number : Yes Is Question Mandatory : No Calculator : None

Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Geographical extent of India is

Options :

1. ✓ 329 M ha
2. ✘ 3290 M ha
3. ✘ 3.29 M ha
4. ✘ 32.9 M ha

**Question Number : 73 Question Id : 54947024747 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0**

Which one of the following is an adaptation among mangrove plants?

Options :

1. ✘ Ornithophily
2. ✓ Vivipary
3. ✘ Entomophily
4. ✘ Anaemophily

Question Number : 74 Question Id : 54947024748 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Gas generated from smelting of mineral ores as pollutant of lower atmosphere is

Options :

1. ✘ Chlorofluoro carbon
2. ✘ Nitrogen dioxide
3. ✘ Ozone
4. ✔ Sulfur dioxide

Question Number : 75 Question Id : 54947024749 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Biological indicator for microwave treatment of waste is

Options :

1. ✔ Bacillus atrophaeus spores
2. ✘ Bacillus anthracis
3. ✘ Thiobacillus oxidans

Leptospirillum ferroxidans

4. ✘

Question Number : 76 Question Id : 54947024750 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The GWP of the three top GHGs, CO₂ : CH₄ : N₂O are in the ratio of

Options :

- 1. ✘ 1 : 3 : 35
- 2. ✘ 1 : 48 : 150
- 3. ✘ 1 : 8 : 290
- 4. ✔ 1 : 25 : 298

Question Number : 77 Question Id : 54947024751 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Halophytes are

Options :

- 1. ✘ Plants growing on River banks
- 2. ✘ Plants growing on rocks

3. ✖ Plants growing in highly polluted areas

4. ✔ Plants growing in high saline areas

Question Number : 78 Question Id : 54947024752 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Ecotones are

Options :

1. ✖ Degraded Ecosystems

2. ✖ Succession of ecosystems

3. ✖ Evolving ecosystems

4. ✔ Regions between Ecosystems

Question Number : 79 Question Id : 54947024753 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Species diversity deals with

Options :

1. ✔ Variations and variability between the species in a community

2. ✘ Variations and variability between the varieties with in a Species
3. ✘ Variations and variability between the species of different ecosystems
- Variations and variability within the species of different trophic levels
4. ✘

Question Number : 80 Question Id : 54947024754 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Increase in the toxicant's concentration with the increase in trophic levels is called

Options :

1. ✔ Biomagnification
2. ✘ Biostratification
3. ✘ Bioaccumulation
4. ✘ Biopolarisation

Question Number : 81 Question Id : 54947024755 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The Model that predicts dispersion of air pollutants is

Options :

1. ✘ Lotka-Volterra Model
2. ✘ Herbert's Model
3. ✔ Gaussian Plume Model
4. ✘ Cascade Model

Question Number : 82 Question Id : 54947024756 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Compounds with typical sweet smell are

Options :

1. ✔ Esters
2. ✘ Alkenes
3. ✘ Haloalkanes
4. ✘ Alkanoic acids

Question Number : 83 Question Id : 54947024757 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Chlorine is used in the treatment of water to

Options :

1. ✓ kill bacteria
2. ✘ precipitate heavy metals
3. ✘ promote sedimentation
4. ✘ deodorize

Question Number : 84 Question Id : 54947024758 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Term that describes the relationship between Oxygen and Ozone

Options :

1. ✓ Allotropes
2. ✘ Conjugates
3. ✘ Isomers
4. ✘ Isotopes

Question Number : 85 Question Id : 54947024759 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The Law “At a constant temperature, the amount of a given gas dissolved in a given type and volume of liquid is directly proportional to the partial pressure of that gas in equilibrium with that liquid” is known as

Options :

1. ✓ Henry's Law
2. ✗ Kelvin's Law
3. ✗ Rounsted's Law
4. ✗ Loury's Law

Question Number : 86 Question Id : 54947024760 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The air pollutant in the ambient atmosphere that contributes to acid rains is

Options :

1. ✗ O_2
2. ✓ NO_2
3. ✗ CO_2

4. ✘ O₃

Question Number : 87 Question Id : 54947024761 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The survival rate for fish in Bioassay test for treated Biomedical liquid wastes effluents after 96 hours shall be

Options :

1. ✔ 96%

2. ✘ 70%

3. ✘ 50%

4. ✘ 25%

Question Number : 88 Question Id : 54947024762 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The disease linked with Iodine deficiency is

Options :

1. ✘ Rickets

2. ✘ Nocturia

3. ✘ Cirrhosis

4. ✔ Goiter

Question Number : 89 Question Id : 54947024763 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The present CO₂ concentration in the Atmospheric air as per the IPCC

Options :

1. ✘ 334 ppm

2. ✘ 370 ppm

3. ✔ 412 ppm

4. ✘ 454 ppm

Question Number : 90 Question Id : 54947024764 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The population (N) of an animal species is following logistic growth. If K is its carrying capacity, then the environmental resistance is

Options :

1. ✘ N/K

2. ✓ $(1 - N/K)$

3. ✘ $2N/K$

4. ✘ (NK)

Question Number : 91 Question Id : 54947024765 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Under aerobic biodegradation of DDT, which of the following compound is formed?

Options :

1. ✘ DDS

2. ✘ DDD

3. ✓ DDE

4. ✘ DDN

Question Number : 92 Question Id : 54947024766 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

With the decrease in the temperature, the specific conductivity of water

Options :

1. ✘ Increases
2. ✘ Remain Unchanged
3. ✔ Decreases
4. ✘ contributes to turbidity

Question Number : 93 Question Id : 54947024767 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Fossil evidences of the Modern Homo sapiens were dated

Options :

1. ✔ 200,000 years ago
2. ✘ 500,000 years ago
3. ✘ 5,000,000 years ago
4. ✘ 2,000,000 years ago

Question Number : 94 Question Id : 54947024768 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which is the third most abundant gas in the Earth's atmosphere?

Options :

1. ✘ Carbondioxide
2. ✘ Helium
3. ✘ Sulphurdioxide
4. ✔ Argon

Question Number : 95 Question Id : 54947024769 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The humus layer of the soil is referred to as

Options :

1. ✘ A-Horizon
2. ✔ O-Horizon
3. ✘ C-Horizon
4. ✘ R-Horizon

Question Number : 96 Question Id : 54947024770 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The unit for rate of heat transfer is

Options :

1. ✘ Newton
2. ✘ Pascal
3. ✘ Joule
4. ✔ Watt

Question Number : 97 Question Id : 54947024771 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The solar radiation received by the Earth's surface in a given time period is called

Options :

1. ✘ Incident Energy
2. ✔ Insolation
3. ✘ Convection
4. ✘ Photonic Energy

Question Number : 98 Question Id : 54947024772 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which of the following is not a soil micronutrient?

Options :

1. ✘ Nickel
2. ✘ Molybdenum
3. ✘ Zinc
4. ✔ Sulphur

Question Number : 99 Question Id : 54947024773 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which of the following is an example for *Lotic Ecosystem*?

Options :

1. ✘ Bog
2. ✔ Riverine
3. ✘ Lake
4. ✘ Pond

Question Number : 100 Question Id : 54947024774 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Symbiotic blue-green algal biofertilizer is obtained from

Options :

1. ✓ Azolla mass culture
2. ✘ Rhizobium species
3. ✘ Nostoc species
4. ✘ Azospirillum mass culture

Question Number : 101 Question Id : 54947024775 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The point at which the light intensity is just enough to produce energy by photosynthesis which equal to the energy used in respiration is called

Options :

1. ✘ Regulatory point
2. ✘ Equalization point
3. ✘ Equilibrium point

4. ✓ Compensation point

Question Number : 102 Question Id : 54947024776 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The amount of accumulated dead organic matter in different forest types

Options :

1. ✘ Increases from tropics to Poles
2. ✓ Increases from pole to equator
3. ✘ Increase with increased longitudes
4. ✘ Decreases from pole to equator

Question Number : 103 Question Id : 54947024777 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The change in species diversity between different habitats across a local scale is
Called

Options :

1. ✘ Beta Diversity
2. ✘ Genetic Diversity

3. ✘ Gama Diversity

4. ✔ Alpha diversity

Question Number : 104 Question Id : 54947024778 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

A land form that results from free fall of rocks is

Options :

1. ✘ Debris Flow

2. ✘ Valley fills

3. ✔ Talus slope

4. ✘ Allivius fan

Question Number : 105 Question Id : 54947024779 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Each degree of latitude on the earth's surface represents approximately

Options :

1. ✘ 90 km

2. ✓ 111 km

3. ✘ 96 km

4. ✘ 223 km

Question Number : 106 Question Id : 54947024780 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The dominant carbon dioxide species in sea water in equilibrium with CO_2 is

Options :

1. ✓ HCO_3^-

2. ✘ $\text{CO}_2(\text{g})$

3. ✘ $\text{CO}_2 \cdot \text{H}_2\text{O}$

4. ✘ $\text{CO} = .2\text{H}_2\text{O}$

Question Number : 107 Question Id : 54947024781 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Kaolinite is a type of clay Mineral with layers of silicon and aluminium in the ratio of

Options :

1. ✘ 1 : 4

2. ✘ 1 : 3

3. ✘ 1 : 2

4. ✔ 1 : 1

Question Number : 108 Question Id : 54947024782 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Earth Core is mainly composed of

Options :

1. ✘ Magnesium

2. ✘ Carbon

3. ✔ Iron

4. ✘ Nitrogen

Question Number : 109 Question Id : 54947024783 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Energy intensity is a measure of

Options :

1. ✘ Energy produced per unit area
2. ✘ Energy produced per unit area/time
3. ✔ Effective Utilization of Energy
4. ✘ Energy produced per unit volume

Question Number : 110 Question Id : 54947024784 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Solid Waste Treatment of plastics' fraction of by pyrolysis involves

Options :

1. ✘ Open lot Burning
2. ✘ Heating in presence of Air
3. ✔ Heating in the absence of air
4. ✘ Heating under High pressure

Question Number : 111 Question Id : 54947024785 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The reaction $O_2 \rightarrow 2O$, which occurs in the stratosphere, does not occur in the troposphere to produce ozone due to

Options :

1. ✘ High Air pressure
2. ✘ Lower tropospheric temperatures
3. ✘ High density of gas molecules
4. ✔ Absence of $\lambda < 242$ nm radiation

Question Number : 112 Question Id : 54947024786 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Noise level of 70 dB corresponds to sound intensity of

Options :

1. ✘ 10^{-3} W/m²
2. ✔ 10^{-5} W/m²
3. ✘ 10^{-7} W/m²

4. ✘ 10^{-9} W/m^2

Question Number : 113 Question Id : 54947024787 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

“Blue baby syndrome” is caused due to intake of water high in

Options :

1. ✔ Nitrates

2. ✘ Chlorides

3. ✘ Sulphates

4. ✘ Sulphides

Question Number : 114 Question Id : 54947024788 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which one of the following is haemotoxic?

Options :

1. ✘ NH_3

2. ✘ CO_2

3. ✘ CH₄

4. ✔ CO

Question Number : 115 Question Id : 54947024789 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

“Black Foot” disease in human beings caused by

Options :

1. ✘ Mercury

2. ✔ Arsenic

3. ✘ Cadmium

4. ✘ Chromium

Question Number : 116 Question Id : 54947024790 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The instrument used for determination of transparency of water is

Options :

1. ✘ Photometer

2. ✘ Conductivity Bridge

3. ✘ Spectrophotometer

4. ✔ Sechhi Disk

Question Number : 117 Question Id : 54947024791 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

During which stage of EIA process, the *Terms of Reference* (TOR) is issued?

Options :

1. ✘ Screening

2. ✘ Public Hearing

3. ✔ Scoping

4. ✘ Appraisal

Question Number : 118 Question Id : 54947024792 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

As per the Biological Diversity Act, 2002, Biodiversity Management Committees are to be formed at

Options :

1. ✓ Local Body level

2. ✗ Tehsil level

3. ✗ District level

4. ✗ Assembly Constituency level

Question Number : 119 Question Id : 54947024793 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The air quality standard for SO₂ in residential area as per NAAQM (Annual weighted average) is

Options :

1. ✗ 60 µg/m³

2. ✗ 80 µg/m³

3. ✗ 70 µg/m³

4. ✓ 50 $\mu\text{g}/\text{m}^3$

Question Number : 120 Question Id : 54947024794 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In which year, Rules for Construction and Demolition Wastes have come in to force?

Options :

1. ✘ 2009

2. ✓ 2016

3. ✘ 2020

4. ✘ 2021

Question Number : 121 Question Id : 54947024795 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Among the biogeographic zones of India, which zone has the largest biogeographic region?

Options :

1. ✘ Himalayas

2. ✘ Desert

3. ✓ Deccan Plateau

Semi arid

4. ✗

Question Number : 122 Question Id : 54947024796 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

What is temperature inversion?

Options :

1. ✗ Environmental lapse rate is less than wet adiabatic rate

2. ✗ Environmental lapse rate is greater than dry adiabatic rate

3. ✗ Environmental lapse rate is equal to adiabatic rates

4. ✓ The temperature in a layer of air actually increases with altitude

Question Number : 123 Question Id : 54947024797 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

_____ measures atmospheric humidity

Options :

1. ✓ Psychrometer

2. ✘ Anemometer

3. ✘ Lysimeter

4. ✘ Hydrometer

Question Number : 124 Question Id : 54947024798 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Identify the statement, best describes the second law of thermodynamics

Options :

1. ✘ The internal energy of the universe is constant

2. ✘ Energy can be neither created nor destroyed

3. ✘ At absolute zero, entropy of a substance is considered to be zero

When an isolated system undergoes a spontaneous change, the entropy of the universe increases

4. ✔

Question Number : 125 Question Id : 54947024799 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In flame photometry if the fuel gas is hydrogen and oxidant gas is oxygen the temperature of the flame is _____ °C.

Options :

1. ✘ 2100 °C
2. ✘ 1900°C
3. ✔ 2800°C
4. ✘ 1500 °C

Question Number : 126 Question Id : 54947024800 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Scattering of light by non-transparent particles suspended in a solution is dealt by

Options :

1. ✘ Spectrophotometry
2. ✔ Nephelometry
3. ✘ Oscilography

Photochemistry

4. ✖

Question Number : 127 Question Id : 54947024801 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

After reaching a new area, the process of successful establishment of the species as a result of adjustment with the conditions prevailing there is known as

Options :

1. ✖ Migration

2. ✖ Nudation

3. ✔ Ecesis

4. ✖ Aggregation

Question Number : 128 Question Id : 54947024802 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Variety of different species, genetic variability among individuals within each species and variety of ecosystems constitute the so called

Options :

1. ✖ Species diversity

2. ✖ Genetic diversity
3. ✔ Biological diversity
4. ✖ Ecological diversity

Question Number : 129 Question Id : 54947024803 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which of the following species in the atmosphere is called atmospheric detergent?

Options :

1. ✖ Chlorine radical
2. ✔ Hydroxyl radical
3. ✖ Methyl radical
4. ✖ Ozone radical

Question Number : 130 Question Id : 54947024804 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

When the atmosphere is very stable, the gaseous effluent from a vertical stack form a

Options :

1. ✓ Fanning plume
2. ✗ Trapping plume
3. ✗ Coning plume
4. ✗ Lofting plume

Question Number : 131 Question Id : 54947024805 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Which one of the following is the Newton's equation for settling velocity of a discrete spherical particle in turbulent settling conditions?

When S is the specific gravity of particle, d is the diameter of the particle, C_d is the drag coefficient, and μ is the dynamic viscosity.

Options :

1. ✓ $3.33g(S - 1)d$
2. ✗ $\sqrt{3.33gC_d (S - 1)d}$

3. ✖ $\frac{1}{18\mu} g (S - 1)d$

4. ✖ $\frac{1}{18\mu} g (S - 1)d^2$

Question Number : 132 Question Id : 54947024806 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

In split treatment process often used to soften the water with high magnesium hardness the fraction of total flow bypassed is given by _____.

When Mg_f is the magnesium concentration in the finished water, Mg_r is the magnesium concentration in the raw water Mg_1 is the magnesium concentration remaining in the fraction of water receiving first stage treatment.

Options :

1. ✖ $\frac{Mg_f - Mg_r}{Mg_r - Mg_1}$

2. ✖ $\frac{Mg_r - Mg_1}{Mg_f - Mg_1}$

3. ✖ $\frac{Mg_f - Mg_1}{Mg_r - Mg_f}$

4. ✓
$$\frac{Mg_f - Mg_1}{Mg_r - Mg_1}$$

Question Number : 133 Question Id : 54947024807 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The total energy of a sample from 100kg solid waste is estimated as 14.74×10^5 kj.
What is the energy content on an ash free dry basis, if the moisture and ash content are 21% and 5% respectively?

Options :

1. ✗ 18,658kj/kg
2. ✓ 19,919 kj/kg
3. ✗ 17,547kj/kg
4. ✗ 11,68kj/kg

Question Number : 134 Question Id : 54947024808 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The composition of biogas is as follows

Options :

1. ✗ Methane, Caron dioxide, H₂O, and SO₂

2. ✓ Methane, Carbon dioxide, H₂S, and N₂
3. ✗ Methane, Carbon monoxide, and SO₂
4. ✗ Methane, Carbon monoxide, SO₂ and hydrocarbons

Question Number : 135 Question Id : 54947024809 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Limit for the noise in dB(A) Leq for residential zone during day time is

Options :

1. ✓ 55
2. ✗ 60
3. ✗ 65
4. ✗ 70

Question Number : 136 Question Id : 54947024810 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The recommended detention period for grit chambers is

Options :

1. ✘ 6 minutes
2. ✘ 5 minutes
3. ✘ 3 minutes
4. ✔ 1 minute

Question Number : 137 Question Id : 54947024811 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

The method which is capable of identifying cause – condition-effect relationship between the specific activities and impacts is

Options :

1. ✘ Check List
2. ✘ Matrices
3. ✘ Overlays
4. ✔ Network

Question Number : 138 Question Id : 54947024812 Display Question Number : Yes Is Question Mandatory : No Calculator : None Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Water having 1 unit lesser pH, will be:

Options :

1. ✘ 1 time more acidic
2. ✘ 100 times more acidic
3. ✔ 10 times more acidic
4. ✘ 1000 times more acidic

Question Number : 139 Question Id : 54947024813 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Substrate removal rate in a reactor removing organic matter is maximum during

Options :

1. ✘ Lag phase
2. ✔ Log phase
3. ✘ Stationary phase
4. ✘ Endogenous phase

Question Number : 140 Question Id : 54947024814 Display Question Number : Yes Is Question Mandatory : No Calculator : None
Response Time : N.A Think Time : N.A Minimum Instruction Time : 0

Sewage treatment in an oxidation pond is accomplished primarily by

Options :

1. ✓ Algal-bacterial symbiosis
2. ✗ Algal photosynthesis only
3. ✗ Bacterial oxidation only
4. ✗ Chemical oxidation only